

Amendment No. 1 to Draft Registration Statement, as confidentially submitted to the Securities and Exchange Commission on June 12, 2020. This draft registration statement has not been publicly filed with the Securities and Exchange Commission and all information herein remains strictly confidential.

Registration No. 333-

**UNITED STATES
SECURITIES AND EXCHANGE COMMISSION**
Washington, D.C. 20549

**FORM S-1
REGISTRATION STATEMENT**
*Under
The Securities Act of 1933*

ALX ONCOLOGY HOLDINGS INC.

(Exact name of Registrant as specified in its charter)

Delaware
(State or other jurisdiction of
incorporation or organization)

2834
(Primary Standard Industrial
Classification Code Number)
866 Malcolm Road, Suite 100
Burlingame, California 94010
650-466-7125

85-0642577
(I.R.S. Employer
Identification Number)

(Address, including zip code and telephone number, including area code, of Registrant's principal executive offices)

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Chief Executive Officer
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650-466-7125

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Approximate date of commencement of proposed sale to the public: As soon as practicable after the effective date of this registration statement.

If any of the securities being registered on this form are to be offered on a delayed or continuous basis pursuant to Rule 415 under the Securities Act of 1933, check the following box.

If this form is filed to register additional securities for an offering pursuant to Rule 462(b) under the Securities Act, please check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

If this form is a post-effective amendment filed pursuant to Rule 462(c) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

If this form is a post-effective amendment filed pursuant to Rule 462(d) under the Securities Act, check the following box and list the Securities Act registration statement number of the earlier effective registration statement for the same offering.

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, smaller reporting company or an emerging growth company. See the definitions of "large accelerated filer," "accelerated filer," "smaller reporting company," and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large accelerated filer Accelerated filer
Non-accelerated filer Smaller reporting company
Emerging growth company

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 7(a)(2)(B) of the Securities Act.

CALCULATION OF REGISTRATION FEE

| Title of Each Class of Securities to be Registered | Proposed Maximum Aggregate Offering Price ⁽¹⁾⁽²⁾ | Amount of Registration Fee |
|--|---|----------------------------|
| Common Stock, \$ 0.001 par value | \$ | \$ |

(1) Includes offering price of any additional shares of common stock that the underwriters have the option to purchase.

(2) Estimated solely for the purpose of calculating the registration fee pursuant to Rule 457(o) under the Securities Act of 1933, as amended.

The Registrant hereby amends this Registration Statement on such date or dates as may be necessary to delay its effective date until the Registrant shall file a further amendment which specifically states that this Registration Statement shall thereafter become effective in accordance with Section 8(a) of the Securities Act of 1933, as amended, or until the Registration Statement shall become effective on such date as the Commission, acting pursuant to said Section 8(a), may determine.

The information in this preliminary prospectus is not complete and may be changed. We may not sell these securities until the registration statement filed with the Securities and Exchange Commission is effective. This preliminary prospectus is not an offer to sell these securities and is not soliciting an offer to buy these securities in any jurisdiction where the offer or sale is not permitted.

SUBJECT TO COMPLETION, DATED _____, 2020

PRELIMINARY PROSPECTUS

Shares



Common Stock

We are offering _____ shares of our common stock. This is our initial public offering of our common stock, and no public market currently exists for our common stock. We expect the initial public offering price to be between \$ _____ and \$ _____ per share. We have applied to list our common stock on the Nasdaq Global Select Market under the symbol "ALXO."

We are an "emerging growth company" as defined under the federal securities laws and, as such, we have elected to comply with certain reduced reporting requirements for this prospectus and may elect to do so in future filings.

Investing in our common stock involves a high degree of risk. Please read "[Risk Factors](#)" beginning on page 11 of this prospectus.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or determined if this prospectus is truthful or complete. Any representation to the contrary is a criminal offense.

| | <u>PER SHARE</u> | <u>TOTAL</u> |
|---|------------------|--------------|
| Initial Public Offering Price | \$ | \$ |
| Underwriting Discounts and Commissions ⁽¹⁾ | \$ | \$ |
| Proceeds to ALX Oncology Holdings Inc., before expenses | \$ | \$ |

⁽¹⁾ See "Underwriting" beginning on page 155 for additional information regarding underwriter compensation.

Delivery of the shares of common stock is expected to be made on or about _____, 2020. We have granted the underwriters an option for a period of 30 days to purchase an additional _____ shares of our common stock. If the underwriters exercise the option in full, the total underwriting discounts and commissions payable by us will be \$ _____ and the total proceeds to us, before expenses, will be \$ _____.

Jefferies

Credit Suisse

Piper Sandler

Cantor

LifeSci Capital

Prospectus dated _____, 2020

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Through and including _____, 2020 (the 25th day after the date of this prospectus), all dealers effecting transactions in these securities, whether or not participating in this offering, may be required to deliver a prospectus. This is in addition to a dealer's obligation to deliver a prospectus when acting as an underwriter and with respect to an unsold allotment or subscription.

We and the underwriters have not authorized anyone to provide you any information other than that contained in this prospectus or in any free writing prospectus prepared by or on behalf of us or to which we have referred you. We take no responsibility for, and can provide no assurance as to the reliability of, any other information that others may give you. We and the underwriters are not making an offer to sell these securities in any jurisdiction where the offer or sale is not permitted. You should assume that the information appearing in this prospectus is accurate only as of the date of this prospectus unless the information specifically indicates that another date applies, regardless of the time of delivery of this prospectus or of any sale of the shares of common stock offered hereby. Our business, financial condition, results of operations and prospects may have changed since that date.

For investors outside of the United States: we have not, and the underwriters have not, done anything that would permit this offering or possession or distribution of this prospectus in any jurisdiction where action for that purpose is required, other than the United States. Persons outside of the United States who come into possession of this prospectus must inform themselves about, and observe any restrictions relating to, the offering of the shares of common stock and the distribution of this prospectus outside of the United States.

PROSPECTUS SUMMARY

This summary highlights selected information contained elsewhere in this prospectus and is qualified in its entirety by the more detailed information and consolidated financial statements included elsewhere in this prospectus. It does not contain all of the information that may be important to you and your investment decision. You should carefully read this entire prospectus, including the sections titled "Risk Factors," "Management's Discussion and Analysis of Financial Condition and Results of Operations," and our consolidated financial statements and related notes. In this prospectus, unless the context requires otherwise, references to "we," "us," "our," "ALX," "ALX Oncology," or "the Company" refer to ALX Oncology Holdings Inc. and its subsidiaries on a combined basis.

Overview

We are a clinical-stage immuno-oncology company focused on helping patients fight cancer by developing therapies that block the CD47 checkpoint pathway and bridge the innate and adaptive immune system. Cancer cells leverage CD47, a cell surface protein, as a "don't eat me" signal to evade detection by the immune system. Our company is developing a next-generation checkpoint inhibitor designed to have a high affinity for CD47 and to avoid the limitations caused by hematologic toxicities inherent in other CD47 blocking approaches. We believe our lead product candidate, ALX148, will have a wide therapeutic window to block the "don't eat me" signal on cancer cells, and to leverage the immune activation of broadly used anti-cancer agents through combination strategies. We have dosed over 150 subjects with ALX148 across a range of hematologic and solid malignancies in combination with a number of leading anti-cancer agents. We intend to advance ALX148 into clinical development for the treatment of myelodysplastic syndromes, or MDS, acute myeloid leukemia, or AML, and to continue clinical development for the treatment of a range of solid tumor indications. Based on our clinical results to date in multiple oncology indications showing encouraging anti-tumor activity and tolerability and our clinical development plans, our strategy is to pursue ALX148 as a potentially critical component for future combination treatments in oncology.

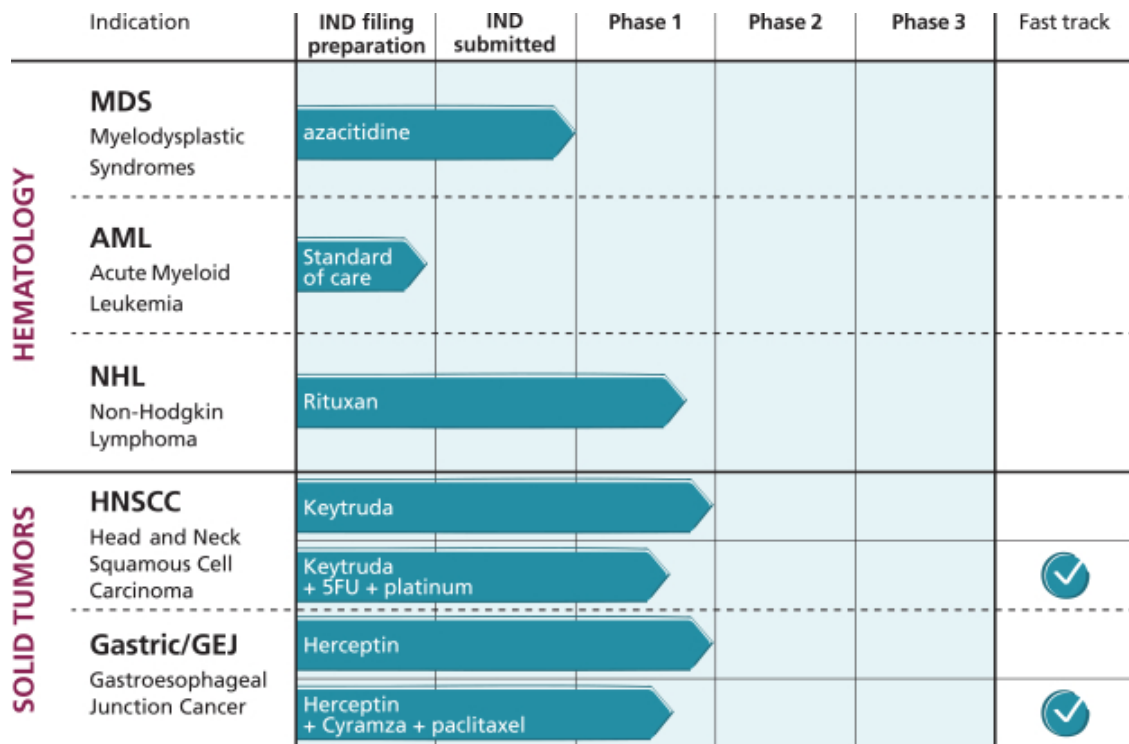
Anti-cancer agents, including many chemotherapies, other small molecules and anti-cancer antibodies, can stimulate immune cells such as macrophages to engulf and kill cancer cells, a process known as phagocytosis, by providing so-called "eat me" signals on cancer cells. In response, cancer cells frequently overexpress CD47 to counteract these "eat me" signals. As a result, high expression of CD47 on cancer cells has been associated with reduced patient survival in multiple cancers. The therapeutic blockade of CD47 in combination with an "eat me" signal enables the immune system to detect and phagocytose cancer cells. However, healthy blood cells and nearly all other cells in the body also express CD47 as a way to protect against pathologic phagocytosis by immune cells. There have been a number of approaches to blocking CD47, including monoclonal antibodies and fusion proteins that include an active Fc region. These approaches have encountered limitations, including limited dosing and therapeutic window, limited ability to combine with other anti-cancer agents, limited efficacy in solid tumors and limited indications due to patient selection, that have challenged their ability to maximize the full potential of CD47 blockade. In addition, most of these therapeutic approaches to CD47 blockade have resulted in the destruction of patients' healthy blood cells, causing cytopenias that limit the dosing and therapeutic potential of those molecules.

ALX Oncology was founded by Corey Goodman, Ph.D., K. Christopher Garcia, Ph.D., and Jaume Pons, Ph.D., to address fundamental challenges in blocking CD47 and to realize the full potential of this therapeutic target. We have developed a new approach to CD47 blockade that is designed to maximize clinical activity and minimize toxicities. All competing clinical data to date have come from product candidates that incorporate an active antibody Fc region in addition to a CD47 blocking region. The Fc region provides a positive, pro-phagocytic "eat me" signal to macrophages and other cells of the immune system. Since healthy blood cells also express CD47, these competing therapeutic approaches can cause a reduction in the number of blood cells in the body, resulting in anemia, thrombocytopenia and neutropenia, which can be dangerous to patients and may limit the ability to combine these agents with other anti-cancer medicines.

Our lead product candidate, ALX148, is a next-generation CD47 blocking therapeutic that we believe has significantly enhanced properties compared to competing CD47 blocking approaches. ALX148 is a fusion protein that combines a high-affinity CD47 binding domain with a proprietary inactivated Fc domain. The CD47 binding domain of ALX148 is an affinity enhanced extracellular domain of signal regulatory protein alpha, or SIRP α , a protein that is the natural receptor to CD47 found on myeloid cells. We have engineered the Fc domain of ALX148 so that it does not provide a pro-phagocytic signal while still maintaining an antibody-like half-life for the molecule. We believe our inactive Fc approach improves tolerability when compared to other CD47 blocking approaches that have an Fc domain that engages activating receptors on macrophages, causing phagocytosis and death of healthy cells in addition to cancer cells. Clinical data to date in ALX148 have not shown dose-dependent hematologic toxicities, which are characteristic of other CD47 blockers that incorporate an active Fc domain.

Pipeline

Our initial programs are focused on targeting CD47 across various oncology indications. Many forms of cancer use CD47 expression as a means of evading immune response. We are targeting the hematologic malignancies and solid tumor indications where we believe we have the greatest potential to address large markets and unmet medical needs.



ALX148 for the Treatment of MDS and AML

We plan to advance ALX148 for the treatment of MDS, a hematologic malignancy affecting over 70,000 people in the United States. We initially explored the treatment of patients with hematologic malignancies in our ongoing Phase 1b trial of ALX148 in combination with rituximab, an anti-CD20 agent in subjects with relapsed/refractory Non-Hodgkin's lymphoma, or NHL. ALX148 demonstrated a higher response rate at higher doses and achieved a 54.6% objective response rate, or ORR, in the highest dose (15 mg/kg once per week) cohort. We view this ORR as compelling evidence for the role of ALX148 in treating hematologic malignancies and as a

favorable comparison to outcomes reported by other CD47 blocking agents in a similar patient population. Furthermore, other CD47 blocking agents in development have demonstrated clinical evidence supporting the role of CD47 blockade in treating hematologic malignances, specifically in MDS, albeit with high rates of cytopenias. We have conducted preclinical studies of ALX148 combined with azacitidine, a standard of care agent for the treatment of MDS, that support our clinical development plan in MDS. Our studies and those of others show that azacitidine increases calreticulin display, an “eat me” signal, in tumor models. The addition of ALX148 to azacitidine shows increased phagocytic activity in vitro and tumor growth inhibition in mouse models as compared to azacitidine alone. We are planning to advance ALX148 into a Phase 1b/2 trial in combination with azacitidine for the first-line treatment of subjects with higher-risk MDS by the end of 2020.

We also plan to develop ALX148 for the treatment of AML, a hematologic malignancy affecting over 35,000 people in the United States with an expected 20,000 newly diagnosed patients and over 11,000 deaths from the disease in 2020. Over half of these patients are diagnosed at age 65 or older. ALX148’s potential for the treatment of patients with AML is supported by our existing data in NHL, preclinical studies of ALX148 in combination with azacitidine or venetoclax, and clinical evidence from other CD47 blocking agents studied in AML. The addition of ALX148 to venetoclax in preclinical studies also increased tumor growth inhibition as compared to single-agent venetoclax. Both azacitidine and venetoclax are standard of care options for patients with AML who are not candidates for intensive induction chemotherapy regimens. Consequently, we view our preclinical studies as supportive of ALX148’s potential role as a tolerable combination agent that may increase the activity of standard of care agents in an unfit, older population. We are planning to advance ALX148 into a Phase 1b/2 trial in combination with standard of care agents in the first-line treatment of subjects with AML in 2021.

ALX148 for the Treatment of Solid Tumors

ALX148 has generated promising clinical data in solid tumors in combinations with a leading tumor antigen targeting antibody, a leading checkpoint inhibitor and chemotherapy. We believe that ALX148 induces multiple responses that bridge innate and adaptive immunity. We are investigating ALX148 for the first-line treatment of head and neck squamous cell carcinoma, or HNSCC and for second-line treatment of human epidermal growth factor receptor 2, or HER2-positive gastric/gastroesophageal junction, or GEJ, carcinoma. In the United States there are over 38,000 people living with metastatic HNSCC, and there are over 25,000 people living with metastatic gastric/GEJ carcinoma. In Phase 1b clinical trials, ALX148 has demonstrated both promising levels of anti-tumor activity and tolerability in combination with other broadly utilized cancer agents. Based on these results, the Food & Drug Administration, or FDA, has granted Fast Track designation for ALX148 for both the treatment of patients with HNSCC in the first-line setting and for HER2-positive advanced gastric/GEJ carcinoma in the second-line setting. While other CD47 blockers have failed to achieve meaningful clinical activity in the treatment of solid tumors, we believe ALX148’s properties, including favorable tolerability and ability to escalate to higher doses, coupled with high affinity and small size for enhanced solid tumor penetration, may underlie the observed anti-tumor activity of ALX148 in solid tumors. We are planning to advance ALX148 into Phase 2 trials in subjects with HNSCC in combination with pembrolizumab, marketed as Keytruda, the market leading anti-programmed cell death protein-1, or PD-1, checkpoint inhibitor, in the first half of 2021, and gastric/GEJ carcinoma in combination with trastuzumab, marketed as Herceptin, the market-leading anti-HER2 antibody, in the second half of 2021.

Our Strategy

Our goal is to transform treatment options for patients with cancer by developing ALX148 as a foundational checkpoint immunotherapy.

Key elements of our strategy to support this goal include:

- **Advance our lead product candidate, ALX148, through clinical development for MDS and AML.** We plan to initiate a Phase 1b/2 trial of ALX148, in combination with azacitidine, for the first-line treatment of patients with higher-risk MDS by the end of 2020 and in combination with standard of

care agents for the first-line treatment of patients with AML in 2021. Given the limitations of current treatment options for patients with MDS, preclinical activity of ALX148 in combination with azacitidine, clinical data from competitor programs and the differentiated tolerability profile of ALX148, we intend to pursue a strategy in which we will leverage the data generated from this Phase 1b/2 trial to request from the FDA that ALX148 be a candidate for accelerated approval in the first-line treatment of high-risk MDS. Similarly, we believe ALX148 combination therapies could address the significant unmet need for more active tolerable regimens in the majority of patients with AML who are not fit for intensive induction chemotherapy.

- **Expanding the therapeutic potential of CD47 blockade into solid tumors.** We believe ALX148 can overcome the limitations of other CD47 blocking approaches in solid tumors. We have generated encouraging data in subjects with HNSCC treated with ALX148 in combination with a PD-1 checkpoint inhibitor and in subjects with HER2-positive gastric/GEJ cancer, who have progressed on prior HER2-targeted therapy and chemotherapy, treated in combination with a HER2-targeted antibody. We have initiated additional Phase 1b cohorts for the first-line treatment of subjects with HNSCC and patients with HER2-positive gastric/GEJ cancer, with Phase 1b data expected in 2021. The FDA has granted ALX148 Fast Track designation in first-line HNSCC and advanced HER2 positive gastric/GEJ cancer. We intend to pursue a strategy in which we will leverage the data generated from our planned Phase 2 randomized trials of ALX148 and pembrolizumab with and without chemotherapy to request from the FDA that ALX148 be a candidate for accelerated approval in the first-line treatment of HNSCC. We are also planning a randomized Phase 2 trial of ALX148, trastuzumab and chemotherapy in first-line HER2-positive gastric/GEJ cancer to inform future paths to registration in this indication.
- **Continuing development of a pipeline of innovative therapeutics based on our protein engineering expertise and knowledge of the immune system and cancer biology.** We specialize in designing and developing drug candidates that engage the immune system. We continue to develop a pipeline of immuno-oncology programs that represent complementary, but differentiated, approaches to engaging the innate and adaptive immune systems.
- **Developing strategic partnerships to broaden the potential impact of our current and future product candidates across patient populations.** In order to advance treatment options for the most patients, we may partner with other companies with complementary resources that will maximize the value of our current and future product candidates. Such partnerships may allow us to pair ALX148 and our future product candidates with other novel agents owned fully or in part by strategic partners. Partnerships may also help realize the full potential of our product candidates in markets where we are unlikely to pursue development or commercialization on our own. We intend to maintain significant economic interest in our product candidates and selectively consider partnership opportunities.

Our Team

Our team of industry veterans plans to continue to advance a broad development plan for ALX148 that balances speed to market, scale of unmet need and existing clinical evidence for ALX148's combination mechanisms. Members of our management team have brought multiple drugs to FDA approval. Our President, Chief Executive Officer and founder, Jaume Pons, Ph.D., was Chief Science Officer of Rinat's (a subsidiary of Pfizer), invented fremanezumab (FDA approved in 2018), tanezumab (Biologics License Application filed in 2020) and additional antibodies in late-stage development at Pfizer and advanced nine more drugs into human trials. Our Chief Medical Officer, Sophia Randolph, M.D., Ph.D., was the global clinical franchise lead for Ibrance at Pfizer, where she oversaw the program from first-in-human trials to regulatory approval. Our Executive Chairman and founder, Corey Goodman, Ph.D., an elected member of the National Academy of Sciences, has co-founded seven biopharmaceutical companies, including Exelixis and Labrys (acquired by Teva Pharmaceuticals in 2014), and led Pfizer's Biotherapeutics and Bioinnovation Center. Our Chief Financial Officer, Peter Garcia, has over 20 years of experience guiding public and private life science companies and has raised over \$1.5 billion in debt and equity offerings. We have funded ALX Oncology to date primarily through the issuance and sale of our convertible preferred stock to investors including venBio, Lightstone Ventures, Vivo Capital, Logos Capital, Janus Henderson,

Foresite Capital, Stanford University, Cormorant Asset Management, BVF Partners, HBM Healthcare Investments and the Longevity Fund.

Risks Associated with Our Business

Our business is subject to numerous risks and uncertainties that you should consider before investing in our company. These risks are described more fully in the section titled "Risk Factors" in this prospectus. These risks include, but are not limited to, the following:

- We have incurred significant net losses since our inception, and we expect to continue to incur significant net losses for the foreseeable future.
- We will require substantial additional capital to finance our operations, such capital may not be available to us or may only be available on terms that are unfavorable to us and, in addition, our current loan agreement may restrict our ability to take on additional debt without the consent of our lenders.
- We have a limited operating history and have no products approved for commercial sale.
- We are substantially dependent on the success of our lead product candidate, ALX148, which is in clinical development and which has not completed a pivotal trial.
- The outcome of preclinical testing and early clinical trials may not be predictive of the success of later clinical trials, and the results of our clinical trials may not satisfy the requirements of the FDA or other comparable foreign regulatory authorities.
- Our product candidates may cause significant adverse events or other undesirable side effects when used alone or in combination with other treatments.
- Clinical trials of our product candidates are expensive, time consuming and difficult to design and implement and may fail to demonstrate adequate safety, efficacy and potency of our product candidates or provide the basis for marketing approval.
- The regulatory approval processes of the FDA and comparable foreign regulatory authorities are lengthy, time-consuming and inherently unpredictable, which could lead to our inability to generate product revenue.
- If we are unable to obtain, maintain and enforce patent protection and other intellectual property for our product candidates and related technology, our business could be materially harmed.
- We are highly dependent on our key personnel, and if we are not successful in attracting, motivating, and retaining highly qualified personnel, we may not be able to successfully implement our business strategy.
- The novel coronavirus, or COVID-19, pandemic could adversely impact our business including our ongoing and planned clinical trials and preclinical research.
- We have identified material weaknesses in our internal control over financial reporting. If remediation measures are not effective, investors may lose confidence in our financial reports.

Corporate Information and History

Our predecessor company, ALX Oncology Limited, an Irish private company limited by shares, was initially incorporated in Ireland on March 13, 2015 under the name Alexo Therapeutics Limited and changed its name to ALX Oncology Limited on October 11, 2018. We were then incorporated in Delaware on April 1, 2020 under the name ALX Oncology Holdings Inc. and completed a reorganization effective as of the same date whereby ALX Oncology Limited became our wholly-owned subsidiary and all of the shareholders, warrant holders and option holders of ALX Oncology Limited became our stockholders, warrant holders and option holders, holding the same number of corresponding shares, warrants and/or options in ALX Oncology Holdings Inc. as they did in ALX Oncology Limited immediately prior to the reorganization. We present the information included in this prospectus as that of ALX Oncology Holdings Inc. unless such information refers to a date prior to April 1, 2020, in which case it will reflect that of our predecessor company. In addition, we present our capitalization information as "preferred stock" and "common stock" of ALX Oncology Holdings Inc., while we present any

capitalization information from a date prior to April 1, 2020 as “preferred shares” and “ordinary shares” of ALX Oncology Limited.

Our principal executive offices are located at 866 Malcolm Road, Suite 100, Burlingame, California 94010. Our telephone number is 650-466-7125. Our website address is <http://alxoncology.com>. Information contained on, or that can be accessed through, our website is not incorporated by reference into this prospectus and should not be considered to be part of this prospectus.

We use ALX Oncology and other marks as trademarks in the United States and other countries. This prospectus contains references to our trademarks and service marks and to those belonging to other entities. Solely for convenience, trademarks and trade names referred to in this prospectus, including logos, artwork and other visual displays, may appear without the ® or TM symbols, but such references are not intended to indicate in any way that we will not assert, to the fullest extent under applicable law, our rights or the rights of the applicable licensor to these trademarks and trade names. We do not intend our use or display of other entities’ trade names, trademarks or service marks to imply a relationship with, or endorsement or sponsorship of us by, any other entity.

Implications of Being an Emerging Growth Company

We are an “emerging growth company” as defined in the Jumpstart Our Business Startups Act of 2012, as amended, or the JOBS Act. We will remain an emerging growth company until the earliest to occur of: the last day of the fiscal year in which we have more than \$1.07 billion in annual revenue; the date we qualify as a “large accelerated filer,” with at least \$700 million of equity securities held by non-affiliates; the issuance, in any three-year period, by us of more than \$1.0 billion in non-convertible debt securities; and the last day of the fiscal year ending after the fifth anniversary of our initial public offering. As a result of this status, we have taken advantage of reduced reporting requirements in this prospectus and may elect to take advantage of other reduced reporting requirements in our future filings with the Securities and Exchange Commission. In particular, in this prospectus, we have provided only two years of audited consolidated financial statements and have not included all of the executive compensation related information that would be required if we were not an emerging growth company. In addition, the JOBS Act provides that an emerging growth company can take advantage of an extended transition period for complying with new or revised accounting standards, delaying the adoption of these accounting standards until they would apply to private companies. We have elected to use this extended transition period to enable us to comply with new or revised accounting standards that have different effective dates for public and private companies until the earlier of the date we (i) are no longer an emerging growth company or (ii) affirmatively and irrevocably opt out of the extended transition period provided in the JOBS Act. As a result, our consolidated financial statements may not be comparable to companies that comply with the new or revised accounting standards as of public company effective dates.

The Offering

| | |
|---|--|
| Common stock offered | shares. |
| Underwriters' option to purchase additional shares of common stock | shares. |
| Common stock to be outstanding after the offering | shares (or shares if the underwriters exercise in full their option to purchase additional shares). |
| Use of proceeds | <p>We estimate that the net proceeds to us from this offering will be approximately \$ million, based upon the assumed initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us.</p> <p>We currently intend to use the net proceeds from this offering, together with our existing cash and cash equivalents, to fund the development of ALX148 through Phase 1b and Phase 2 clinical trials in several indications, as well as for working capital and other general corporate activities. See "Use of Proceeds" on page 64 for a more complete description of the intended use of proceeds from this offering.</p> |
| Risk factors | See "Risk Factors" beginning on page 11 and other information included in this prospectus for a discussion of factors that you should consider carefully before deciding to invest in our common stock. |
| Proposed Nasdaq Global Select Market trading symbol | "ALXO" |
| The number of shares of our common stock to be outstanding after this offering is based on the outstanding as of March 31, 2020 (including preferred stock on an as-converted basis), and excludes: | shares of our common stock that are subject to a right of repurchase and our convertible |
| | <ul style="list-style-type: none">▪ 21,063,923 shares of common stock issuable upon exercise of options outstanding as of March 31, 2020, at a weighted-average exercise price of \$0.47 per share;▪ 4,150,000 shares of common stock issuable upon exercise of options granted after March 31, 2020, at a weighted-average exercise price of \$0.75 per share;▪ warrants to purchase an aggregate of 403,348 shares of our convertible preferred stock that were outstanding as of March 31, 2020 that will be converted into warrants to purchase an aggregate of 403,348 shares of our common stock, with an exercise price of \$1.4432 per share; and▪ 1,277,036 shares of common stock reserved for issuance pursuant to future awards under our 2020 Equity Incentive Plan, or the 2020 Plan, including the amendment thereto that will become effective immediately prior to the completion of this offering, and any additional shares that become available under our 2020 Plan pursuant to provisions thereof that automatically increase the share reserve under the plan each year. |

Unless otherwise indicated or the context otherwise requires, this prospectus reflects and assumes the following:

- a -for-1 reverse stock split to be effected prior to the closing of this offering;
- no exercise of the outstanding options and the warrants described above;
- no exercise by the underwriters of their option to purchase additional shares of our common stock;
- the automatic conversion of all of our outstanding shares of convertible preferred stock, including cumulative dividends, into an aggregate of _____ shares of common stock, which will occur immediately prior to the completion of this offering;
- warrants to purchase an aggregate of _____ shares of our convertible preferred stock that will be converted into warrants to purchase an aggregate of _____ shares of our common stock, which will occur immediately prior to the completion of this offering; and
- the filing and effectiveness of our amended and restated certificate of incorporation and the adoption of our amended and restated bylaws, each of which will occur immediately prior to the completion of this offering.

Summary Consolidated Financial Data

The following tables summarize our consolidated financial data for the periods and as of the dates indicated. We derived the summary consolidated statements of operations and comprehensive loss data for the years ended December 31, 2018 and December 31, 2019, and consolidated balance sheet data as of December 31, 2019, from our audited consolidated financial statements included elsewhere in this prospectus. We have derived the consolidated statements of operations and comprehensive loss data for the three months ended March 31, 2019 and March 31, 2020, and the consolidated balance sheet data as of March 31, 2020 from our unaudited interim condensed consolidated financial statements included elsewhere in this prospectus. In our opinion, these unaudited interim condensed consolidated financial statements have been prepared on a basis consistent with our audited consolidated financial statements and contain all adjustments, consisting only of normal and recurring adjustments, necessary for a fair presentation of such financial data. Our historical results are not necessarily indicative of the results that may be expected in the future. You should read the following summary consolidated financial data in conjunction with our consolidated financial statements and the related notes appearing elsewhere in this prospectus and the information in the sections titled "Selected Consolidated Financial Data" and "Management's Discussion and Analysis of Financial Condition and Results of Operations."

| Consolidated Statements of Operations and Comprehensive Loss Data: | YEAR ENDED DECEMBER 31, | | THREE MONTHS ENDED MARCH 31, | |
|---|--|-------------|---------------------------------|------------|
| | 2018 | 2019 | 2019 | 2020 |
| | (in thousands, except share and per share amounts) | | | |
| | (unaudited) | | | |
| Related-party revenue | \$ 2,067 | \$ 4,796 | \$ 1,032 | \$ 655 |
| Operating expenses: | | | | |
| Research and development | 11,270 | 16,306 | 3,733 | 3,828 |
| General and administrative | 2,601 | 3,313 | 588 | 1,473 |
| Cost of services for related-party revenue | 1,880 | 4,360 | 938 | 596 |
| Total operating expenses | 15,751 | 23,979 | 5,259 | 5,897 |
| Loss from operations | (13,684) | (19,183) | (4,227) | (5,242) |
| Interest expense | — | (21) | — | (215) |
| Other income (expense), net | (2) | (5) | (2) | 7 |
| Loss before income taxes | (13,686) | (19,209) | (4,229) | (5,450) |
| Income tax provision | (45) | (34) | (9) | (4) |
| Net loss and comprehensive loss | (13,731) | (19,243) | (4,238) | (5,454) |
| Cumulative dividends allocated to preferred shareholders | (3,671) | (4,028) | (905) | (1,983) |
| Net loss attributable to ordinary shareholders | \$ (17,402) | \$ (23,271) | \$ (5,143) | \$ (7,437) |
| Net loss per share attributable to ordinary shareholders, basic and diluted | \$ (0.96) | \$ (1.15) | \$ (0.26) | \$ (0.36) |
| Weighted-average shares used to compute net loss per share attributable to ordinary shareholders, basic and diluted | 18,102,402 | 20,245,115 | 19,749,549 | 20,684,025 |

| Consolidated Statements of Operations and Comprehensive Loss Data: | YEAR ENDED DECEMBER 31, | | THREE MONTHS ENDED MARCH 31, | |
|--|---|------------|---------------------------------|-------------|
| | 2018 | 2019 | 2019 | 2020 |
| | (in thousands, except share and per share amounts) (unaudited) | | | |
| Pro forma net loss attributable to ordinary shareholders, basic and diluted (unaudited)(1) | | \$ (0.20) | | \$ (0.04) |
| Weighted-average shares used to compute pro forma net loss per share attributable to ordinary shareholders, basic and diluted (unaudited)(1) | | 94,274,058 | | 144,442,583 |

(1) See Note 12 to our audited consolidated financial statements and the Note 8 of our unaudited interim condensed consolidated financial statements included elsewhere in this prospectus for an explanation of the method used to calculate historical and pro forma basic and diluted net loss per share, and the weighted-average number of shares used in the computation of the per share amounts and unaudited pro forma information.

| Consolidated Balance Sheet Data: | AS OF MARCH 31, 2020 | | |
|--------------------------------------|-------------------------------|--------------------------|---|
| | ACTUAL | PRO FORMA ⁽¹⁾ | PRO FORMA AS ADJUSTED ⁽²⁾ |
| | (unaudited) (in thousands) | | |
| Cash and cash equivalents | \$105,035 | \$ 105,035 | \$ |
| Working capital ⁽³⁾ | 103,423 | 103,423 | |
| Total assets | 108,399 | 108,399 | |
| Total liabilities | 9,282 | 8,835 | |
| Convertible preferred shares | 175,043 | — | |
| Accumulated deficit | (78,236) | (92,968) | |
| Total stockholders' equity (deficit) | (75,926) | 99,564 | |

(1) The pro forma consolidated balance sheet data in the table above reflects the conversion of our outstanding shares of our convertible preferred stock and cumulative dividends into 154,917,050 shares of our common stock, the resulting reclassification of the convertible preferred stock immediately prior to the completion of this offering and the reclassification of our convertible preferred stock warrant liability to additional paid-in capital immediately prior to the completion of this offering.

(2) The pro forma as adjusted consolidated balance sheet data in the table above reflects the pro forma adjustments described in footnote (1) above plus the sale and issuance by us of shares of our common stock in this offering, based upon the assumed initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. Each \$1.00 increase or decrease in the assumed initial public offering price of \$ per share would increase or decrease, as applicable, the pro forma as adjusted amount of each of cash and cash equivalents, working capital, total assets and total stockholders' equity (deficit) by approximately \$ million, assuming that the number of shares offered by us, as set forth on the cover page of this prospectus, remains the same and after deducting the underwriting discounts and commissions. Similarly, each increase or decrease of 1.0 million shares in the number of shares offered by us would increase or decrease, as applicable, each of cash and cash equivalents, working capital, total assets and total stockholders' equity (deficit) by approximately \$ million, assuming the assumed initial public offering price of \$ per share remains the same, and after deducting the underwriting discounts and commissions. The pro forma as adjusted information discussed above is illustrative only and will be adjusted based on the actual public offering price and other terms of this offering determined at pricing.

(3) We define working capital as current assets less current liabilities. See our consolidated financial statements for further details regarding our current assets and current liabilities.

RISK FACTORS

Investing in our common stock involves a high degree of risk. You should carefully consider the risks described below, as well as the other information in this prospectus, including our consolidated financial statements and the related notes and the section titled "Management's Discussion and Analysis of Financial Condition and Results of Operations" in this prospectus, before deciding whether to invest in our common stock. The occurrence of any of the events or developments described below could harm our business, financial condition, results of operations and growth prospects. In such an event, the market price of our common stock could decline, and you may lose all or part of your investment. Additional risks and uncertainties not presently known to us or that we currently deem immaterial also may impair our business operations and the market price of our common stock.

Risks Related to Our Financial Position and Need for Additional Capital

We have incurred significant net losses since our inception, and we expect to continue to incur significant net losses for the foreseeable future.

We have incurred significant net losses in each reporting period since our inception, have not generated any revenue to date and have financed our operations principally through private placements of our convertible preferred stock. Our net loss was \$19.2 million for the year ended December 31, 2019, and \$5.5 million for the three months ended March 31, 2020. As of March 31, 2020, we had an accumulated deficit of \$78.2 million. We have devoted substantially all of our resources and efforts to research and development. Our lead product candidate, ALX148, is in early-stage clinical trials. Our other programs are in preclinical discovery and research stages. As a result, we expect that it will be several years, if ever, before we have a commercialized product and generate revenue from product sales. Even if we succeed in receiving marketing approval for and commercializing one or more of our product candidates, we expect that we will continue to incur substantial research and development and other expenses in order to discover, develop and market additional potential products.

We expect to continue to incur significant expenses and increasing operating losses for the foreseeable future. The net losses we incur may fluctuate significantly from quarter to quarter such that a period-to-period comparison of our results of operations may not be a good indication of our future performance. The size of our future net losses will depend, in part, on the rate of future growth of our expenses and our ability to generate revenue. Our prior losses and expected future losses have had and will continue to have an adverse effect on our working capital, our ability to fund the development of our product candidates and our ability to achieve and maintain profitability and the performance of our stock.

Even if this offering is successful, we will require substantial additional capital to finance our operations. If we are unable to raise such capital when needed, or on acceptable terms, we may be forced to delay, reduce and/or eliminate one or more of our research and drug development programs or future commercialization efforts.

Developing pharmaceutical products, including conducting preclinical studies and clinical trials, is a very time-consuming, expensive and uncertain process that takes years to complete. Our operations have consumed substantial amounts of cash since inception, and we expect our expenses to increase in connection with our ongoing activities, particularly as we conduct clinical trials of, and seek marketing approval for ALX148 and advance our other programs. In addition, if we obtain marketing approval for any of our product candidates, we expect to incur significant commercialization expenses related to drug sales, marketing, manufacturing and distribution activities. Our expenses could increase beyond expectations if we are required by the U.S. Food and Drug Administration, or FDA, the European Medicines Agency, or EMA, or other regulatory agencies to perform clinical trials or preclinical studies in addition to those that we currently anticipate. Other unanticipated costs may also arise. Because the design and outcome of our planned and anticipated clinical trials are highly uncertain, we cannot reasonably estimate the actual amount of resources and funding that will be necessary to successfully complete the development and commercialization of any product candidate we develop. Commencing upon the closing of this offering, we also expect to incur additional costs associated with operating as a public company. Accordingly, we will need to obtain substantial additional funding in order to maintain our continuing operations. If we are unable to raise capital when needed or on acceptable terms, we may be forced to delay, reduce and/or eliminate one or more of our research and drug development programs or future commercialization efforts.

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As of March 31, 2020, we had working capital of \$103.4 million and cash and cash equivalents of \$105.0 million. Based on our current operating plan, we believe that the proceeds from this offering, together with our existing cash and cash equivalents, will be sufficient to fund our operations for at least the next months. Our estimate as to how long we expect the net proceeds from this offering, together with our existing cash and cash equivalents, to be able to continue to fund our operations is based on assumptions that may prove to be wrong, and we could use our available capital resources sooner than we currently expect. Changing circumstances, some of which may be beyond our control, could cause us to consume capital significantly faster than we currently anticipate, and we may need to seek additional funds sooner than planned.

We plan to use the net proceeds from this offering to advance the clinical development of ALX148, as well as for working capital and other general corporate purposes. This may include additional research, hiring additional personnel, capital expenditures, the potential acquisition of businesses or assets and the costs of operating as a public company, as well as for working capital and other general corporate purposes. Advancing the development of ALX148 and our other programs will require a significant amount of capital. The net proceeds from this offering, together with our cash, may not be sufficient to fund all of the actions that are necessary to complete the development of ALX148 or our other programs.

We will be required to obtain further funding through public or private equity offerings, debt financings, collaborations and licensing arrangements or other sources, which may dilute our stockholders or restrict our operating activities. We do not have any committed external source of funds. Adequate additional financing may not be available to us on acceptable terms, or at all. In addition, our Loan and Security Agreement, or the Loan Agreement, with Silicon Valley Bank, or SVB, and WestRiver Innovation Lending Fund VIII, LP, or WestRiver, and collectively, the Lenders, restricts our ability to incur additional indebtedness without the consent of the Lenders. To the extent that we raise additional capital through the sale of equity or convertible debt securities, your ownership interest will be diluted, and the terms may include liquidation or other preferences that adversely affect your rights as a stockholder. Debt financing may result in imposition of debt covenants, increased fixed payment obligations or other restrictions that may affect our business. If we raise additional funds through upfront payments or milestone payments pursuant to strategic collaborations with third parties, we may have to relinquish valuable rights to our product candidates or grant licenses on terms that are not favorable to us. In addition, we may seek additional capital due to favorable market conditions or strategic considerations even if we believe we have sufficient funds for our current or future operating plans.

Our failure to raise capital as and when needed would have a negative impact on our financial condition and our ability to pursue our business strategy, and we may have to delay, reduce the scope of, suspend or eliminate one or more of our research-stage programs, clinical trials or future commercialization efforts.

We have a limited operating history and have no products approved for commercial sale, which may make it difficult for you to evaluate our current business and likelihood of success and viability.

We are a clinical-stage biopharmaceutical company with a limited operating history upon which you can evaluate our business and prospects. We were incorporated and commenced operations in 2015, have no products approved for commercial sale and have not generated any revenue. Drug development is a highly uncertain undertaking and involves a substantial degree of risk. Our operations to date have been limited to organizing and staffing our company, business planning, raising capital, identifying and developing potential product candidates and conducting preclinical and clinical trials of our product candidates, including a Phase 1 clinical trial of ALX148. We have not yet demonstrated our ability to successfully complete any large-scale, pivotal clinical trials, obtain marketing approvals, manufacture a commercial-scale drug or arrange for a third party to do so on our behalf or conduct sales and marketing activities. As a result, it may be more difficult for you to accurately predict our likelihood of success and viability than it could be if we had a longer operating history.

In addition, as a business with a limited operating history, we may encounter unforeseen expenses, difficulties, complications, delays and other known and unknown factors and risks frequently experienced by early-stage biopharmaceutical companies in rapidly evolving fields. We also may need to transition from a company with a research focus to a company capable of supporting commercial activities. We have not yet demonstrated an ability to successfully overcome such risks and difficulties or to make such a transition. If we do not adequately address these risks and difficulties or successfully make such a transition, our business will suffer.

Our ability to generate revenue and achieve profitability depends significantly on our ability to achieve several objectives relating to the discovery, development and commercialization of our product candidates.

Our business depends entirely on the successful development and commercialization of our product candidates. We currently generate no revenue from any product sales, licenses or collaborations and do not expect to generate any revenue from the sale of product candidates in the foreseeable future. We have no products approved for commercial sale and do not anticipate generating any revenue from product sales for the next several years, if ever. Our ability to generate revenue and achieve profitability depends significantly on our ability to achieve a number of objectives, including:

- successful and timely completion of preclinical and clinical development of our lead product candidate, ALX148, and our other future product candidates;
- establishing and maintaining relationships with contract research organizations, or CROs, and clinical sites for the clinical development of ALX148 and our other future product candidates;
- timely receipt of marketing approvals from applicable regulatory authorities for any product candidates for which we successfully complete clinical development;
- the extent of any required post-marketing approval commitments to applicable regulatory authorities;
- developing an efficient and scalable manufacturing process for ALX148 and any future product candidates, including establishing and maintaining commercially viable supply and manufacturing relationships with third parties to obtain finished products that are appropriately packaged for sale;
- establishing and maintaining commercially viable supply and manufacturing relationships with third parties that can provide adequate, in both amount and quality, products and services to support clinical development and meet the market demand for our product candidates, if approved;
- successful commercial launch following any marketing approval, including the development of a commercial infrastructure, whether in-house or with one or more collaborators;
- a continued acceptable safety profile following any marketing approval;
- commercial acceptance of ALX148 and any future product candidates as viable treatment options by patients, the medical community and third-party payors;
- obtaining favorable coverage and adequate reimbursement by third-party payors for our product candidates;
- addressing any competing therapies and technological and market developments;
- identifying, assessing, acquiring and developing new product candidates;
- obtaining, maintaining and expanding patent protection, trade secret protection and regulatory exclusivity, both in the United States and internationally;
- protecting our rights in our intellectual property portfolio, including our licensed intellectual property;
- defending against third-party interference or infringement claims, if any;
- entering into, on favorable terms, any collaboration, licensing or other arrangements that may be necessary or desirable to develop, manufacture or commercialize our product candidates;
- negotiating favorable terms in any collaboration, licensing or other arrangements that may be necessary to develop, manufacture or commercialize our product candidate; and
- attracting, hiring and retaining qualified personnel.

We may never be successful in achieving our objectives and, even if we do, may never generate revenue that is significant or large enough to achieve profitability. If we do achieve profitability, we may not be able to sustain or increase profitability on a quarterly or annual basis. Our failure to become and remain profitable would decrease the value of our company and could impair our ability to maintain or further our research and development efforts, raise additional necessary capital, grow our business and/or continue our operations.

Risks Related to the Discovery, Development and Commercialization of Our Product Candidates

We are substantially dependent on the success of our lead product candidate, ALX148, which is in clinical development and which has not completed a pivotal trial. If we do not obtain regulatory approval for and successfully commercialize ALX148 in one or more indications, or we experience significant delays in doing so, we may never generate any revenue or become profitable.

We do not have any products that have received regulatory approval and may never be able to develop marketable product candidates. We expect that a substantial portion of our efforts and expenses over the next several years will be devoted to the development of our lead product candidate, ALX148, in our ongoing clinical trials. As a result, our business currently depends heavily on the successful development, regulatory approval and, if approved, commercialization of ALX148 in one or more of these indications, such as myelodysplastic syndromes, or MDS, acute myeloid leukemia, or AML, head and neck squamous cell carcinoma, or HNSCC, or gastric/gastroesophageal junction, or GEJ, carcinoma. We cannot be certain that ALX148 will receive regulatory approval or will be successfully commercialized even if it receives regulatory approval. The research, testing, manufacturing, safety, efficacy and potency, labeling, approval, sale, marketing and distribution of ALX148 is, and will remain, subject to comprehensive regulation by the FDA and similar foreign regulatory authorities. Our failure to timely complete clinical trials, obtain regulatory approval or, if approved, commercialize ALX148 or any of our future product candidates, would materially harm our business, financial condition and results of operations. We are not permitted to market or promote ALX148, or any other product candidate, before we receive marketing approval from the FDA and comparable foreign regulatory authorities, and we may never receive such marketing approvals. If we do not receive marketing approvals for ALX148, we may not be able to continue our operations.

The outcome of preclinical testing and early clinical trials may not be predictive of the success of later clinical trials, and the results of our clinical trials may not satisfy the requirements of the FDA or other comparable foreign regulatory authorities. The clinical trials of our product candidates may not produce positive results or demonstrate adequate safety, purity and efficacy and potency to the satisfaction of regulatory authorities.

Before obtaining marketing approval from regulatory authorities for the sale of our product candidates, we must complete preclinical development and then conduct extensive clinical trials to demonstrate the safety and efficacy/potency of our product candidates. Clinical testing is expensive, difficult to design and implement, can take many years to complete, and its ultimate outcome is uncertain. A failure of one or more clinical trials can occur at any stage of the process. The outcome of preclinical studies and early-stage clinical trials may not be predictive of the success of later clinical trials. Moreover, preclinical and clinical data are often susceptible to varying interpretations and analyses, and many companies that have believed their product candidates performed satisfactorily in preclinical studies and clinical trials have nonetheless failed to obtain approval of their drugs.

Positive or timely results from preclinical or early-stage trials do not ensure positive or timely results in future clinical trials or registrational clinical trials because product candidates in later-stage clinical trials may fail to demonstrate sufficient safety, purity and efficacy and potency to the satisfaction of the FDA or comparable international regulatory authorities, despite having progressed through preclinical studies or initial clinical trials. In addition, the FDA or any comparable international regulatory authorities may conclude that the results from our clinical trials are insufficient to support any accelerated approval that we may seek with respect to ALX148 or any of our future product candidates in general or with respect to any specific indications. Product candidates that have shown promising results in early clinical trials may still suffer significant setbacks in subsequent clinical trials or registration clinical trials. For example, a number of companies in the pharmaceutical industry, including those with greater resources and experience than us, have suffered significant setbacks in advanced clinical trials, even after obtaining promising results in earlier clinical trials.

Clinical trials of our product candidates are expensive, time consuming and difficult to design and implement and may fail to demonstrate adequate safety, purity and efficacy and potency of our product candidates or provide the basis for marketing approval.

Before obtaining marketing approval from regulatory authorities for the sale of our product candidates, we must conduct preclinical development and then extensive clinical trials to demonstrate their safety, purity and efficacy and potency. Clinical trials are expensive and difficult to design and implement. Clinical trials can take many years

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to complete, and their ultimate outcome is uncertain. A failure of one or more clinical trials can occur at any stage of the process. We will be required to demonstrate with substantial evidence through well-controlled clinical trials that our product candidates are safe, pure and effective or potent for use in a diverse patient population before we can seek regulatory approvals for their commercial sale. Our clinical trials may produce negative or inconclusive results and we may decide, or regulators may require us, to conduct additional and expansive preclinical or clinical testing.

We do not know whether our future clinical trials will begin on time or enroll patients on time or whether our ongoing and/or future clinical trials will be completed on schedule or at all. Clinical trials can be delayed for a variety of reasons, including delays related to:

- obtaining approval to commence a clinical trial;
- reaching agreement on acceptable terms with prospective CROs and clinical trial sites;
- obtaining institutional review board approval at each clinical trial site;
- adding necessary new clinical trial sites;
- recruiting suitable patients to participate in a trial;
- failing in having clinical trial sites or patients comply with trial protocols;
- suffering clinical trial sites or patients dropping out of trials; or
- manufacturing sufficient quantities of product candidate for use in clinical trials.

We may experience numerous unforeseen events during, or as a result of, clinical trials that could delay or prevent receipt of marketing approval or our ability to commercialize our product candidates, including:

- receipt of feedback from regulatory authorities that requires us to modify the design of our clinical trials;
- negative or inconclusive clinical trial results that may require us to conduct additional clinical trials or abandon certain drug development programs;
- the number of patients required for clinical trials being larger than anticipated, enrollment in these clinical trials being slower than anticipated or subjects dropping out of these clinical trials at a higher rate than anticipated;
- delays in clinical trials due to outbreaks or public health crises, such as the COVID-19 pandemic, that impact both trial site operations and patient selection;
- third-party contractors failing to comply with regulatory requirements or meet their contractual obligations to us in a timely manner, or at all;
- the suspension or termination of our clinical trials for various reasons, including non-compliance with regulatory requirements, a finding that our product candidates have undesirable side effects or other unexpected characteristics or risks;
- the cost of clinical trials of our product candidates are greater than anticipated;
- the supply or quality of our product candidates or other materials necessary to conduct clinical trials of our product candidates being insufficient or inadequate; and
- regulators revising the requirements for approving our product candidates.

As a result of any of these delays or other circumstances, we may incur unplanned costs, not obtain or be delayed in obtaining marketing approval, receive more limited or restrictive marketing approval, be subject to additional post-marketing testing requirements or have our drug removed from the market after obtaining marketing approval.

We do not know whether any clinical trials we may conduct will demonstrate consistent or adequate safety, purity and efficacy and potency sufficient to obtain marketing approval or our product candidates or to market our drugs after any such approval.

If we experience delays or difficulties in the enrollment of patients in clinical trials and/or retention of patients in clinical trials, our regulatory submissions or receipt of necessary marketing approvals could be delayed or prevented.

We may not be able to initiate or continue clinical trials for our product candidates if we are unable to locate and enroll a sufficient number of eligible patients to participate in these trials as required by the FDA or comparable

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international regulatory authorities. Patient enrollment is a significant factor in the timing of clinical trials. In particular, because certain of our clinical trials of ALX148 are focused on indications with small patient populations, our ability to enroll eligible patients may be limited or may result in slower enrollment than we anticipate. Patient enrollment may be affected if our competitors have ongoing clinical trials for product candidates that are under development for the same indications as our product candidates, and patients who would otherwise be eligible for our clinical trials instead enroll in clinical trials of our competitors' product candidates. Patient enrollment may also be affected by other factors, including:

- size and nature of the patient population;
- severity of the disease under investigation;
- availability and efficacy or potency of approved drugs for the disease under investigation;
- patient eligibility criteria for the trial in question;
- perceived risks and benefits of the product candidate under study;
- efforts to facilitate timely enrollment in clinical trials by us and the clinical trial sites;
- patient referral practices of physicians;
- the ability to monitor patients adequately during and after treatment;
- proximity of clinical trial sites to prospective patients;
- risk of patients enrolled in clinical trials dropping out before completion; and
- inability or delay in enrollment of patients due to a variety of reasons, including outbreaks and public health crises, such as the COVID-19 pandemic.

Our inability to enroll a sufficient number of patients for our clinical trials would result in significant delays or may require us to abandon one or more clinical trials altogether. Enrollment delays in our clinical trials may result in increased development costs for our product candidates and jeopardize our ability to obtain marketing approval for the sale of our drugs.

Interim, topline and preliminary data from our clinical trials that we announce or publish from time to time may change as more patient data become available and are subject to audit and verification procedures that could result in material changes in the final data.

From time to time, we may publicly disclose preliminary, interim or topline data from our clinical trials. These interim updates are based on a preliminary analysis of then-available data, and the results and related findings and conclusions are subject to change following a more comprehensive review of the data related to the particular study or trial. Further, interim, topline and preliminary data include certain assumptions, estimations, calculations and conclusions as part of our analyses of data available at that time, and we may not have received or had the opportunity to fully and carefully evaluate all data. As a result, the topline results that we report may differ from future results of the same studies, or different conclusions or considerations may qualify such results, once additional data have been received and fully evaluated. Topline data also remain subject to audit and verification procedures that may result in the final data being materially different from the preliminary data we previously published. Interim data from clinical trials that we may complete are subject to the risk that one or more of the clinical outcomes may materially change as patient enrollment continues and more patient data become available. Adverse changes between interim data and final data could significantly harm our business and prospects. Further, additional disclosure of interim data by us or by our competitors in the future could result in volatility in the price of our common stock. You or others may not agree with what we determine is the material or otherwise appropriate information to include in our disclosure, and any information we determine not to disclose may ultimately be deemed significant with respect to future decisions, conclusions, views, activities or otherwise regarding a particular product candidate or our business. If the preliminary or topline data that we report differ from late, final or actual results, or if others, including regulatory authorities, disagree with the conclusions reached, our ability to obtain approval for product candidates may be harmed, which could harm our business, financial condition, results of operations and prospects.

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Our product candidates may cause significant adverse events, toxicities or other undesirable side effects when used alone or in combination with other approved products or investigational new drugs that may result in a safety profile that could prevent regulatory approval, prevent market acceptance, limit their commercial potential or result in significant negative consequences.

If ALX148 and any of our product candidates are associated with undesirable side effects or have unexpected characteristics in preclinical studies or clinical trials when used alone or in combination with other approved products or investigational new drugs we may need to interrupt, delay or abandon their development or limit development to more narrow uses or subpopulations in which the undesirable side effects or other characteristics are less prevalent, less severe or more acceptable from a risk-benefit perspective. For example, we have observed single-digit incident rates of treatment-related grade three and higher cytopenias occurred across each of the trial cohorts in our ALX148 combination clinical trials with pembrolizumab, trastuzumab and rituximab in a heavily pre-treated group of subjects who are typical participants in early stage cancer trials and are often hematologically fragile at baseline. Subjects in our ALX148 combination clinical trials experienced a number of treatment-related adverse events that were low-grade and manageable, including fatigue, rash, aspartate aminotransferase, or AST, increase, platelets decrease, alanine aminotransferase, or ALT, increase, pruritus, pyrexia, decreased appetite, anemia, infusion reaction, neutropenia, nausea, alkaline phosphate increase, arthralgia, white blood cell decrease and myalgia. Treatment-related side effects could also affect patient recruitment or the ability of enrolled subjects to complete the trial or result in potential product liability claims. Any adverse events as a result of ALX148 or any of our future product candidates, including in combination therapy, may prevent us from achieving or maintaining market acceptance of the affected product candidate and may harm our business, financial condition and prospects significantly.

We face substantial competition which may result in others discovering, developing or commercializing products before or more successfully than we do.

The development and commercialization of new product candidates is highly competitive. We face competition with respect to ALX148 and will face competition with respect to any product candidates that we may seek to develop or commercialize in the future, from major pharmaceutical, specialty pharmaceutical and biotechnology companies among others. We compete in the segments of the pharmaceutical, biotechnology and other related markets that develop immuno-oncology therapies for the treatment of cancer. There are other companies working to develop immuno-oncology therapies for the treatment of cancer including divisions of large pharmaceutical and biotechnology companies of various sizes. The large pharmaceutical and biotechnology companies that have commercialized and/or are developing immuno-oncology treatments for cancer include AstraZeneca, Bristol Myers Squibb, Gilead Sciences, Merck, Novartis, Pfizer and Roche/Genentech.

Some of these competitive products and therapies are based on scientific approaches that are the same as or similar to our approach, including with respect to the targeting of CD47 pathway and others are based on entirely different approaches. We are aware that Arch Therapeutics, Bristol Myers Squibb, Gilead Sciences (through its recent acquisition of Forty Seven), I-Mab, Novimmune, OSE Immunotherapeutics, Seattle Genetics, Surface Oncology and Trillium Therapeutics, among others, are developing drugs targeting the CD47 pathway that may have utility for the treatment of indications that we are targeting. Potential competitors also include academic institutions, government agencies and other public and private research organizations that conduct research, seek patent protection and establish collaborative arrangements for research, development, manufacturing and commercialization.

There are already a variety of available drug therapies marketed for cancer and some of the currently approved drug therapies are branded and subject to patent protection and others are available on a generic basis. Many of these approved drugs are well established therapies and are widely accepted by physicians, patients and third-party payors. Insurers and other third-party payors may also encourage the use of generic products. We expect that if ALX148 and any of our other future product candidates are approved, they will be priced at a significant premium over competitive generic products. This may make it difficult for us to achieve our business strategy of using our product candidates in combination with existing therapies or replacing existing therapies with our product candidates.

Many of the companies against which we are competing or against which we may compete in the future have significantly greater financial resources and expertise in research and development, manufacturing, preclinical testing, conducting clinical trials, obtaining regulatory approvals and marketing approved drugs than we do. Mergers

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and acquisitions in the pharmaceutical and biotechnology industries may result in even more resources being concentrated among a smaller number of our competitors. Smaller or early-stage companies may also prove to be significant competitors, particularly through collaborative arrangements with large and established companies. These competitors also compete with us in recruiting and retaining qualified scientific and management personnel, in establishing clinical trial sites and enrolling subjects for our clinical trials and in acquiring technologies complementary to, or necessary for, our programs.

We could see a reduction or elimination of our commercial opportunity if our competitors develop and commercialize products that are safer, more effective, are more convenient or are less expensive than any products that we or our collaborators may develop. Our competitors also may obtain FDA or foreign regulatory approval for their products more rapidly than we may obtain approval for ours, which could result in our competitors establishing a strong market position before we are able to enter the market. The key competitive factors affecting the success of all our product candidates, if approved, are likely to be their efficacy, safety, convenience, price, the level of biosimilar or generic competition and the availability of reimbursement from government and other third-party payors. The inability to compete with existing or subsequently introduced drugs would harm our business, financial condition and results of operations.

Even if our product candidates receive regulatory approval, they will be subject to significant post-marketing regulatory requirements and oversight.

Even after approval, our manufacturing processes, labeling, packaging, distribution, adverse event reporting, storage, advertising, promotion, import, export and recordkeeping for our approved products will be subject to extensive and ongoing regulatory requirements. These requirements include submissions of safety and other post-marketing information and reports, registration, as well as on-going compliance with current good manufacturing practices, or cGMPs, and current good clinical practices, or cGCPs, for any clinical trials that we conduct post-approval. Regulatory approvals may contain significant limitations related to use restrictions for specific target population subsets, *e.g.*, age groups, warnings, precautions or contraindications, or may include costly and burdensome post-approval study or risk management requirements and regulatory inspection. For example, the FDA may require a Risk Evaluation and Mitigation Strategy, or REMS, as a condition for approval of our product candidates, which could entail requirements for a medication guide, physician training, and communication plans or additional elements to ensure safe use, such as restricted distribution methods, patient registries and other risk mitigation tools.

In addition, manufacturers of drug products and their facilities are subject to continual review and periodic, unannounced inspections by the FDA and other regulatory authorities for compliance with cGMP regulations and standards. If we or a regulatory agency discover previously unknown problems with a product, such as adverse events of unanticipated severity or frequency, or problems with a contract supplier, vendor, or facility where the product is manufactured or processed, a regulatory agency may impose restrictions on that product, the manufacturing facility or contractor, or us, including requiring recall or withdrawal of the product from the market or suspension of manufacturing. In addition, failure to comply with FDA, EMA and other comparable foreign regulatory requirements may subject our company to administrative or judicially imposed sanctions or enforcement actions, including:

- delays in or the rejection of product approvals;
- restrictions on our ability to conduct clinical trials, including full or partial clinical holds on ongoing or planned trials;
- restrictions on the products, manufacturers or manufacturing process;
- warning or untitled letters;
- civil and criminal penalties;
- injunctions;
- suspension or withdrawal of regulatory approvals;
- product seizures, detentions or import bans;
- voluntary or mandatory product recalls and publicity requirements;
- total or partial suspension of production; and
- imposition of restrictions on operations, including costly new manufacturing requirements.

The occurrence of any of these sanctions, enforcement actions, or penalties described above may inhibit our ability to commercialize our product candidates, even if approved, and generate revenue.

We contract with third parties for the manufacture of our product candidates for preclinical development and clinical trials, and we expect to continue to do so for commercialization. This reliance on third parties increases the risk that we will not have sufficient quantities of our product candidates or drugs or such quantities at an acceptable cost or quality, which could delay, prevent or impair our development or commercialization efforts.

We do not currently own or operate, nor do we have any plans to establish in the future, any manufacturing facilities or personnel. We rely, and expect to continue to rely, on third parties for the manufacture of our product candidates for preclinical development and clinical testing, as well as for the commercial manufacture of our drugs if any of our product candidates receive marketing approval. No assurance can be given that long-term, scalable manufacturers can be identified or that they can make clinical and commercial supplies of our product candidates that meet the product specifications of previously manufactured batches, or are of a sufficient quality, or at an appropriate scale and cost to make it commercially feasible. Such third-party manufacturers may also be subject to delays due to circumstances outside of their control for a variety of reasons, including outbreaks and public health crises, such as the COVID-19 pandemic, that could shut down or cause limited staffing of their facilities. Our reliance on third parties increases the risk that we will not have sufficient quantities of our product candidates or drugs or such quantities at an acceptable cost or quality, which could delay, prevent or impair our development or commercialization efforts. If they are unable to do so, it could have a material adverse impact on our business.

The facilities used by contract manufacturers to manufacture our product candidates must be approved by the FDA or any applicable foreign regulatory authority pursuant to inspections that may be conducted after we submit our marketing applications to the FDA or any such foreign regulatory authority. We do not control the manufacturing process of, and will be completely dependent on, our contract manufacturers for compliance with cGMPs in connection with the manufacture of our product candidates. If our contract manufacturers cannot successfully manufacture material that conforms to our specifications and the strict regulatory requirements of the FDA or others, they will not be able to secure and/or maintain regulatory approval for their manufacturing facilities. In addition, we have no control over the ability of our contract manufacturers to maintain adequate quality control, quality assurance and qualified personnel. If the FDA or any applicable foreign regulatory authority does not approve these facilities for the manufacture of our product candidates or if it withdraws any such approval in the future, we may need to find alternative manufacturing facilities, which would significantly impact, including causing substantial delay, in our ability to develop, obtain regulatory approval for or market our product candidates. Further, our failure, or the failure of our third-party manufacturers, to comply with applicable regulations could result in sanctions being imposed on us, including clinical holds, fines, injunctions, civil penalties, delays, suspension or withdrawal of approvals, license revocation, seizures or recalls of drug candidates or drugs, operating restrictions and criminal prosecutions, any of which could significantly and adversely affect our business and supplies of our product candidates.

Our product candidates and any drugs that we may develop may compete with other product candidates and approved drugs for access to manufacturing facilities. There are a limited number of manufacturers that operate under cGMP regulations and that might be capable of manufacturing for us.

We also expect to rely on other third parties to store and distribute product candidate supplies for our clinical trials. Any performance failure on the part of our distributors could delay clinical development or marketing approval of any future product candidates or commercialization of our products, producing additional losses and depriving us of potential drug revenue.

Any performance failure on the part of our existing or future manufacturers could delay clinical development, marketing approval or commercial drug supply after marketing approval. If our current contract manufacturers cannot perform as agreed, we may be required to replace such manufacturers causing additional costs and delays in identifying and qualifying any such replacement.

Material modifications in the methods of product candidate manufacturing or formulation may result in additional costs or delay.

The manufacture of drugs is complex, and our third-party manufacturers may encounter difficulties in production. If any of our third-party manufacturers encounter such difficulties, our ability to provide adequate supply of our product candidates for clinical trials or our products for patients, if approved, could be delayed or prevented. Also,

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as product candidates progress through preclinical and clinical trials to marketing approval and commercialization, it is common that various aspects of the development program, such as manufacturing, suppliers and formulation, are altered in an effort to optimize yield and manufacturing batch size, minimize costs and achieve consistent quality and results. Any of these changes could cause our product candidates to perform differently and affect the results of planned clinical trials or other future clinical trials conducted with the modified manufacturing, materials or process. This could delay completion of clinical trials, require the conduct of additional clinical trials, such as bridging studies to demonstrate the product is substantially equivalent to product used during earlier clinical trials or the repetition of one or more clinical trials, increase clinical trial costs, delay approval of our product candidates and jeopardize our ability to commercialize our product candidates, if approved, and generate revenue.

Lack of third-party combination drugs may materially and adversely affect demand for our product candidates.

Our product candidates may be administered in combination with drugs of other pharmaceutical companies as one regimen. In addition, we plan to use third-party drugs in our development and clinical trials as controls for our studies, such as our current plans to conduct Phase 2 clinical trials of ALX148 in combination with pembrolizumab for HNSCC and trastuzumab for gastric/GEJ carcinoma. As a result, both the results of our clinical trials and the sales of our drugs may be affected by the availability of these third-party drugs. If other pharmaceutical companies discontinue these drugs for combination therapies in the future, regimens that use these combination drugs may no longer be prescribed, and we may not be able to introduce or find an alternative drug to be used in combination with our drugs at all or in a timely manner and on a cost-effective basis. Use of new combination drugs with our approved product candidates will require further regulatory approval before we can promote such new combination therapies. As a result, demand for our product candidates may be lowered, which would in turn materially and adversely affect our business and results of operations.

We may not be able to obtain regulatory approval for our product candidates or commercialize any product candidates that may result from our development efforts, or may miss expected deadlines, if we are not able to maintain or secure agreements with the third parties that conduct the activities related to our clinical trials on acceptable terms, if these third parties do not perform their services as contractually required, or if these third parties fail to timely transfer any regulatory information held by them to us.

We rely on entities outside of our control, which may include academic institutions, CROs, hospitals, clinics and other third-party strategic partners, to monitor, support, conduct and oversee preclinical studies and clinical trials of our current and future product candidates. As a result, we have less control over the timing and cost of these studies and the ability to recruit trial subjects than if we conducted these trials with our own personnel. If we are unable to maintain or enter into agreements with these third parties on acceptable terms, or if any such engagement is terminated prematurely, we may be unable to enroll patients on a timely basis or otherwise conduct our clinical trials as planned. In addition, there is no guarantee that these third parties will devote adequate time and resources to our clinical trials or perform as required by our contract or in accordance with regulatory requirements, including maintenance of clinical trial information regarding our product candidates. For example, these third parties may be adversely impacted by the COVID-19 pandemic. If these third parties fail to meet expected deadlines, fail to transfer to us any regulatory information in a timely manner, fail to adhere to protocols or fail to act in accordance with regulatory requirements or our agreements with them, or if they otherwise perform in a substandard manner or in a way that compromises the quality or accuracy of their activities or the data they obtain, then clinical trials of our product candidates may be extended or delayed with additional costs incurred, or our data may be rejected by the FDA or other regulatory agencies. Ultimately, we are responsible for ensuring that each of our clinical trials is conducted in accordance with the applicable protocol, legal, regulatory and scientific standards, and our reliance on third parties does not relieve us of our regulatory responsibilities.

We and our CROs are required to comply with cGCPs, regulations and guidelines enforced by the FDA and comparable foreign regulatory authorities for products in clinical development. Regulatory authorities enforce these cGCPs through periodic inspections of clinical trial sponsors, principal investigators and clinical trial sites. If we or any of our CROs fail to comply with applicable cGCPs, the clinical data generated in our clinical trials may be deemed unreliable and our submission of marketing applications may be delayed, or the FDA or foreign regulatory authority may require us to perform additional clinical trials before approving our marketing applications. Upon inspection, the FDA or foreign regulatory authority could determine that any of our clinical trials fail or have failed to comply with applicable cGCPs.

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Our business also may be implicated if any of our CROs violates fraud and abuse or false claims laws and regulations or healthcare privacy and security laws.

If any of our third-party clinical trial sites terminate for any reason, we may experience the loss of follow-up information on subjects enrolled in our ongoing clinical trials unless we are able to transfer the care of those subjects to another qualified clinical trial site. Further, our CROs are not required to work indefinitely or exclusively with us. Our existing agreements with our CROs may be subject to termination by the counterparty upon the occurrence of certain circumstances. If any CRO terminates its agreement with us, the research and development of the relevant product candidate would be suspended, and our ability to research, develop and license future product candidates would be impaired. We may be required to devote additional resources to the development of our product candidates or seek a new CRO partner, and the terms of any additional arrangements that we establish may not be favorable to us. Switching or adding CROs or other service providers can involve substantial cost and require extensive management time and focus. In addition, there is a natural transition period when a new CRO or service provider commences work. As a result, delays may occur, which can materially impact our ability to meet our desired clinical development timelines. If we are required to seek alternative arrangements, the resulting delays and potential inability to find suitable replacements could materially and adversely impact our business.

Even if we receive marketing approval for any of our product candidates, we may not achieve market acceptance, which would limit the revenue that we can generate from sales of any of our approved product candidates.

Even if the FDA and applicable foreign regulatory authorities approve the marketing of any product candidates that we develop, physicians, patients, third-party payors or the medical community may not accept or use our product candidates. Efforts to educate the medical community and third-party payors on the benefits of our product candidates may require significant resources and may not be successful. Market acceptance of ALX148 and any other product candidates, if any are approved, will depend on a number of factors, including, among others:

- the ability of ALX148 and our other product candidates to treat cancer or other applicable targeted diseases, as compared with other available drugs, treatments or therapies;
- the timing of market introduction of the product candidate as well as competitive products;
- the clinical indications for which a product candidate is approved;
- the approval of other new therapies for the same indications;
- the prevalence and severity of any adverse side effects associated with ALX148 and our other product candidates;
- limitations or warnings contained in the labeling approved for ALX148 or our other product candidates by the FDA or foreign regulatory authorities;
- availability of alternative treatments and the potential and perceived advantages of our product candidates over alternative treatments;
- the size of the target patient population and the willingness of the target patient population to try new therapies and of physicians to prescribe these therapies;
- the strength and effectiveness of marketing and distribution support and timing of market introduction of competitive products;
- publicity for our product candidates and competing products and treatments;
- pricing and cost-effectiveness in relation to alternative treatments;
- relative convenience and ease of administration;
- our ability to obtain sufficient third-party coverage or reimbursement, and the willingness of patients to pay out-of-pocket in the absence of third-party coverage; and
- the likelihood that the FDA or any foreign regulatory authority may impose additional requirements that limit the promotion, advertising, distribution or sales of our product candidates.

Adverse events in clinical trials for our product candidates or in clinical trials of others developing similar products and the resulting publicity, as well as any other adverse events in the field of immuno-oncology that may occur in the future, could result in a decrease in demand for ALX148 or any other product candidate that we may develop. If public perception is influenced by claims that the use of cancer immunotherapies is unsafe, whether related to our

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therapies or those of our competitors, our products may not be accepted by the general public or the medical community. Future adverse events in immuno-oncology or the biopharmaceutical industry generally could also result in greater governmental regulation and stricter labeling requirements.

If any of our product candidates is approved but does not achieve an adequate level of acceptance by patients, physicians and third-party payors, we may not generate sufficient revenue to become or remain profitable and our business may be harmed.

We have never commercialized a product candidate and we may lack the necessary expertise, personnel and resources to successfully commercialize any of our products that receive regulatory approval.

We currently have no marketing and sales organization and we have never commercialized a product candidate. To achieve commercial success of our product candidates, if any are approved, we will have to develop our own sales, marketing and supply capabilities or outsource these activities to a third party.

If any of our product candidates ultimately receives regulatory approval, we may choose to establish an internal marketing and sales organization with technical expertise and supporting distribution capabilities to commercialize each such product in major markets, which will be expensive and time consuming. We have no prior experience as a company in the marketing, sale and distribution of pharmaceutical products and there are significant risks involved in building and managing a sales organization. Factors that may affect our ability to commercialize our product candidates on our own include recruiting and retaining adequate numbers of effective sales and marketing personnel, obtaining access to or persuading adequate numbers of physicians to prescribe our product candidates and other unforeseen costs associated with creating an independent sales and marketing organization. Developing a sales and marketing organization requires significant investment, is time-consuming and could delay the launch of our product candidates. We may not be able to build an effective sales and marketing organization in the United States, the European Union or other key global markets. If we are unable to build our own distribution and marketing capabilities or to find suitable partners for the commercialization of our product candidates, we may have difficulties generating revenue from them.

We may also choose to collaborate with third parties that have direct sales forces and established distribution systems, either to augment our own sales force and distribution systems or in lieu of our own sales force and distribution systems. We may not be able to enter into collaborations or hire consultants or external service providers to assist us in sales, marketing and distribution functions on acceptable financial terms, or at all. In addition, our product revenue and our profitability, if any, may be lower if we rely on third parties for these functions than if we were to market, sell and distribute any products that we develop ourselves. We likely will have little control over such third parties, and any of them may fail to devote the necessary resources and attention to sell and market our products effectively. If we are not successful in commercializing our products, either on our own or through arrangements with one or more third parties, we may not be able to generate any future product revenue and we would incur significant additional losses. We have no internal sales, marketing or distribution capabilities.

The market opportunities for the product candidates we develop, if approved, may be limited to certain smaller patient subsets.

There is no guarantee that the product candidates we develop, even if approved, would be approved for the currently proposed indications. We may have to conduct additional clinical trials that may be costly, time-consuming and subject to risk. Regulators, like FDA, may require us to narrow our indications to smaller patient subsets, and the number of patients in such subsets may turn out to be lower than expected.

Our current and future product candidates may have undesirable side effects that may delay or prevent marketing approval or, if approval is received, require them to be taken off the market, require them to include new safety warnings, contraindications or precautions, or otherwise limit their sales. No regulatory agency has made a determination that any of our product candidates are safe, pure, potent or effective for use by the target patient population for any indication.

Our lead product candidate, ALX148, is at an early stage of clinical development and not all adverse effects can be predicted or anticipated. Unforeseen side effects from ALX148 or any of our future product candidates may arise at

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any time during clinical development or, if approved by regulatory authorities, after the approved drug product has been marketed. Any undesirable or unacceptable side effects of ALX148 or our future product candidates could interrupt, delay or halt clinical trials, and result in delay of, or failure to obtain, marketing approval from the FDA or comparable international regulatory authorities, or result in marketing approval from the FDA or comparable international regulatory authorities with restrictive label warnings or for limited patient populations. Ultimately, such side effects could result in product liability claims. No regulatory agency has made any determination that any of our product candidates or discovery programs is safe or effective for use by the general public for any indication.

Even if any of our product candidates receive marketing approval, if we or others later identify undesirable or unacceptable side effects caused by such products:

- regulatory authorities may require us to take our approved product off the market;
- regulatory authorities may require the addition of labeling statements, specific warnings, contraindication, precaution or field alerts to physicians and pharmacies;
- we may be required to change the way the product is administered, limit the patient population who can use the product or conduct additional clinical trials;
- we may be subject to limitations on how we may promote the product;
- sales of the product may decrease significantly;
- we may be subject to litigation or product liability claims; and
- our reputation may suffer.

Any of these events could prevent us from achieving or maintaining market acceptance of the affected product or could substantially increase commercialization costs and expenses, which in turn could delay or prevent us from generating revenue from the sale of any future product candidates.

Failure to obtain or maintain adequate coverage and reimbursement for our product candidates, if approved, could limit our ability to market those products and decrease our ability to generate revenue.

The availability and adequacy of coverage and reimbursement by governmental healthcare programs such as Medicare and Medicaid, private health insurers and other third-party payors are essential for most patients to be able to afford products such as our product candidates, if approved. Our ability to achieve acceptable levels of coverage and reimbursement for products by governmental authorities, private health insurers and other organizations will have an effect on our ability to successfully commercialize our product candidates. Coverage under certain government programs, such as Medicare, Medicaid and TRICARE, may not be available for certain of our product candidates. Assuming we obtain coverage for a given product by a third-party payor, the resulting reimbursement payment rates may not be adequate or may require co-payments that patients find unacceptably high. We cannot be sure that coverage and reimbursement in the United States, the European Union or elsewhere will be available for any product that we may develop, and any reimbursement that may become available may be decreased or eliminated in the future.

Third-party payors increasingly are challenging prices charged for pharmaceutical products and services, and many third-party payors may refuse to provide coverage and reimbursement for particular drugs when an equivalent generic drug, biosimilar or a less expensive therapy is available. It is possible that a third-party payor may consider our product candidates and other therapies as substitutable and only offer to reimburse patients for the less expensive product. Even if we show improved efficacy and potency or improved convenience of administration with our product candidates, pricing of existing drugs may limit the amount we will be able to charge for our product candidates. These payors may deny or revoke the reimbursement status of a given product or establish prices for new or existing marketed products at levels that are too low to enable us to realize an appropriate return on our investment in product development. If reimbursement is not available or is available only at limited levels, we may not be able to successfully commercialize our product candidates and may not be able to obtain a satisfactory financial return on products that we may develop.

Obtaining and maintaining reimbursement status is time-consuming and costly. No uniform policy for coverage and reimbursement for products exists among third-party payors in the United States. Therefore, coverage and

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reimbursement for products can differ significantly from payor to payor. As a result, the coverage determination process is often a time-consuming and costly process that will require us to provide scientific and clinical support for the use of our products to each payor separately, with no assurance that coverage and adequate reimbursement will be applied consistently or obtained in the first instance. Furthermore, rules and regulations regarding reimbursement change frequently, in some cases at short notice, and we believe that changes in these rules and regulations are likely.

Moreover, increasing efforts by governmental and third-party payors in the United States and abroad to cap or reduce healthcare costs may cause such organizations to limit both coverage and the level of reimbursement for newly approved products and, as a result, they may not cover or provide adequate payment for our product candidates. We expect to experience pricing pressures in connection with the sale of any of our product candidates due to the trend toward managed healthcare, the increasing influence of health maintenance organizations and additional legislative changes. The downward pressure on healthcare costs in general, particularly prescription drugs, has become very intense. As a result, increasingly high barriers are being erected to the entry of new products. The continuing efforts of the government, insurance companies, managed care organizations and other payors of health care services to contain or reduce costs of health care may adversely affect:

- the demand for any products for which we may obtain regulatory approval;
- our ability to set a price that we believe is fair for our products;
- our ability to obtain and maintain coverage and adequate reimbursement for a product;
- our ability to generate revenue and achieve or maintain profitability; and
- the level of taxes that we are required to pay.

The FDA and other regulatory agencies actively enforce the laws and regulations prohibiting the promotion of off-label uses.

The FDA strictly regulates manufacturers' promotional claims of drug products. In particular, a product may not be promoted for uses that are not approved by the FDA as reflected in the FDA-approved labeling. The FDA, the Department of Justice, the Inspector General of the Department of Health and Human Services, among other government agencies, actively enforce the laws and regulations prohibiting the promotion of off-label uses, and a company that is found to have improperly promoted off-label uses may be subject to significant liability, including large civil and criminal fines, penalties and enforcement actions. The FDA has also imposed consent decrees or permanent injunctions under which specified promotional conduct is changed or curtailed for companies that engaged in such prohibited activities. If we cannot successfully manage the promotion of our approved product candidates, we could become subject to significant liability, which would materially adversely affect our business and financial condition.

Risks Related to Government Regulation

Even if we receive regulatory approval to commercialize any of our product candidates, we will be subject to ongoing regulatory obligations and continued regulatory review with respect to our drugs, which will result in significant additional expense.

Any regulatory approvals that we receive for our product candidates may be subject to limitations on the approved indicated uses for which the product may be marketed, or subject to certain conditions of approval and may contain requirements for potentially costly post-approval trials and surveillance to monitor the safety, purity and efficacy/potency of the marketed product. For any approved drug, we will be subject to ongoing regulatory obligations and extensive oversight by regulatory authorities, including with respect to manufacturing processes, labeling, packaging, distribution, adverse event reporting, storage, advertising, promotion and recordkeeping for the product. These requirements include submissions of safety and other post-approval information and reports, as well as continued compliance with cGMPs and cGCP for any clinical trials that we conduct post-approval. Later discovery of previously unknown problems with a drug, including adverse events of unanticipated severity or frequency, or with third-party manufacturers or manufacturing processes, or failure to comply with regulatory requirements, may result in, among other things:

- restrictions on the marketing or manufacturing of the drug;

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- withdrawal of the drug from the market or voluntary or mandatory product recalls;
- adverse publicity, fines, warning letters or holds on clinical trials;
- refusal by the FDA or any other applicable regulatory authority to approve pending applications or supplements to approved applications filed by us, or suspension or revocation of product license approvals;
- drug product seizure or detention, or refusal to permit the import or export of product candidates; and
- injunctions or the imposition of civil or criminal penalties.

The occurrence of any of the foregoing could have a material and adverse effect on our business and results of operations. Further, the policies of the FDA or other comparable foreign regulatory authorities may change, and additional government regulations may be enacted that could prevent, limit or delay regulatory approval of our product candidates or impact any already approved drugs. If we are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we are not able to maintain regulatory compliance, we may lose any marketing approval that we may have obtained, which would adversely affect our business, prospects and ability to generate revenue or achieve or sustain profitability.

The regulatory approval processes of the FDA and comparable foreign regulatory authorities are lengthy, time-consuming and inherently unpredictable, which could lead to our inability to generate product revenue. Even if we obtain FDA approval of any of our product candidates, we may never obtain approval or commercialize such products outside of the United States, which would limit our ability to realize their full market potential.

The time required to obtain approval by the FDA and comparable foreign regulatory authorities is unpredictable, typically takes many years following the commencement of clinical trials and depends upon numerous factors, including the type, complexity and novelty of the product candidates involved. Seeking foreign regulatory approvals could result in significant delays, difficulties and costs for us and may require additional preclinical studies or clinical trials which would be costly and time consuming. Regulatory requirements can vary widely from country to country and could delay or prevent the introduction of our product candidates in those countries. In addition, approval policies, regulations or the type and amount of clinical data necessary to gain approval may change during the course of a product candidate's clinical development and may vary among jurisdictions, which may cause delays in the approval or the decision not to approve an application. Regulatory authorities have substantial discretion in the approval process and may refuse to accept any application or may decide that our data are insufficient for approval and require additional preclinical, clinical or other data. Satisfying these and other regulatory requirements is costly, time consuming, uncertain and subject to unanticipated delays. Our failure to obtain regulatory approval in any country may delay or have negative effects on the process for regulatory approval in other countries. Even if we eventually complete clinical testing and receive approval of any regulatory filing for our product candidates, the FDA and comparable foreign regulatory authorities may approve our product candidates for a more limited indication or a narrower patient population than we originally requested. We have not submitted for or obtained regulatory approval for any product candidate and it is possible that ALX148 or any product candidates we may seek to develop in the future will ever obtain regulatory approval. If we fail to comply with regulatory requirements in international markets or to obtain and maintain required approvals, our target market will be reduced and our ability to realize the full market potential of our product candidates will be harmed.

Applications for our product candidates could fail to receive regulatory approval for many reasons, including but not limited to the following:

- the FDA or comparable international regulatory authorities may disagree with the design, implementation or results of our clinical trials;
- the FDA or comparable international regulatory authorities may determine that our product candidates are not safe and effective, only moderately effective or have undesirable or unintended side effects, toxicities or other characteristics that preclude our obtaining marketing approval or prevent or limit commercial use;
- the population studied in the clinical program may not be sufficiently broad or representative to assure efficacy and potency and safety in the full population for which we seek approval;
- the FDA or comparable international regulatory authorities may disagree with our interpretation of data from preclinical studies or clinical trials;

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- the data collected from clinical trials of our product candidates may not be sufficient to support the submission of a Biologics License Application, New Drug Application or other submission or to obtain regulatory approval in the United States or elsewhere;
- we may be unable to demonstrate to the FDA or comparable international regulatory authorities that a product candidate's risk-benefit ratio for its proposed indication is acceptable;
- the FDA or comparable international regulatory authorities may fail to approve the manufacturing processes, test procedures and specifications or facilities of third-party manufacturers with which we contract for clinical and commercial supplies; and
- the approval policies or regulations of the FDA or international foreign regulatory authorities may significantly change in a manner rendering our clinical data insufficient for approval.

In order to market any product candidates outside of the United States, we must establish and comply with numerous and varying regulatory requirements of other countries regarding safety and efficacy and potency and approval standards. Clinical trials conducted in one country may not be accepted by regulatory authorities in other countries, and regulatory approval in one country does not mean that regulatory approval will be obtained in any other country.

The ability of the FDA to review and approve new products can be affected by a variety of factors, including government budget and funding levels, ability to hire and retain key personnel and accept the payment of user fees, government shutdowns, including as a result of budget delays or other circumstances like the COVID-19 pandemic and statutory, regulatory and policy changes. Average review times at the agency have fluctuated in recent years as a result. This lengthy approval process, as well as the unpredictability of the results of clinical trials, may result in our failing to obtain regulatory approval to market any of our product candidates, which would significantly harm our business, results of operations and prospects.

While we have received certain FDA Fast Track designations, such Fast Track designations may not lead to a faster development or regulatory review or approval process, and does not increase the likelihood that the drug will receive marketing approval.

In February 2020, the FDA granted Fast Track designations to ALX148 for first-line HNSCC and for second-line treatment of advanced human epidermal growth factor receptor 2, or HER2-positive gastric/GEJ carcinoma. If a product candidate is intended for the treatment of a serious condition and preclinical or clinical data demonstrate the potential to address unmet medical need for such condition, a sponsor may apply for FDA Fast Track designation. Even though we received these Fast Track designations for ALX148, Fast Track designation does not ensure that we will receive marketing approval or that approval will be granted within any particular timeframe. We may not experience a faster development or regulatory review or approval process with Fast Track designation compared to conventional FDA procedures. In addition, the FDA may withdraw Fast Track designation if it believes that the designation is no longer supported by data from our clinical development program. Fast Track designation alone does not guarantee qualification for the FDA's priority review procedures.

If we decide to seek orphan drug designation for one or more of our product candidates, we may be unsuccessful or may be unable to maintain the benefits associated with such orphan drug designation.

Under the Orphan Drug Act, the FDA may designate a product candidate as an orphan drug if it is a drug intended to treat a rare disease or condition, which is generally defined as a patient population of fewer than 200,000 individuals annually in the United States. We may seek Orphan Drug Designation for certain indications for our product candidates in the future. Orphan Drug Designation neither shortens the development time or regulatory review time of a product candidate nor gives the product candidate any advantage in the regulatory review or approval process. Generally, if a product candidate with an Orphan Drug Designation subsequently receives the first marketing approval for the indication for which it has such designation, the drug is entitled to a period of marketing exclusivity that precludes the FDA from approving another marketing application for the same drug for the same indication for seven years. Therefore, if our competitors are able to obtain orphan product exclusivity for their product candidates in the same indications we are pursuing, we may not be able to have competing product candidates approved in those indications by the FDA for a significant period of time. There are also limited circumstances where the FDA may reduce the seven-year exclusivity for a product candidate with an orphan drug

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designation where other product candidates show clinical superiority to the product with orphan exclusivity or if the FDA finds that the holder of the orphan exclusivity has not shown that it can assure the availability of sufficient quantities of the orphan product to meet the needs of patients with the disease or condition for which the drug was designated. However, even if one of our product candidates receives orphan exclusivity, the FDA can still approve other drugs that have a different active ingredient for use in treating the same indication or disease. Furthermore, the FDA can waive orphan exclusivity if we are unable to manufacture a sufficient supply of our product.

Current and future legislation may increase the difficulty and cost for us to commercialize our products, if approved, and affect the prices we may obtain. We may face difficulties from changes to current regulations and future legislation.

Existing regulatory policies may change, and additional government regulations may be enacted that could prevent, limit or delay regulatory approval of our product candidates. We cannot predict the likelihood, nature or extent of government regulation that may arise from future legislation or administrative action, either in the United States or abroad. If we are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we are not able to maintain regulatory compliance, we may lose any marketing approval that we may have obtained, and we may not achieve or sustain profitability.

Third-party payors, whether domestic or foreign, or governmental or commercial, are developing increasingly sophisticated methods of controlling healthcare costs. In both the United States and certain foreign jurisdictions, there have been, and likely will continue to be, legislative and regulatory proposals at the foreign, federal and state levels directed at containing or lowering the cost of healthcare. We cannot predict the initiatives that may be adopted in the future. The continuing efforts of the government, insurance companies, managed care organizations and other payors of healthcare services to contain or reduce costs of healthcare and/or impose price controls may adversely affect:

- the demand for our drugs, if we obtain regulatory approval;
- our ability to receive or set a price that we believe is fair for our drugs;
- our ability to generate revenue and achieve or maintain profitability;
- the level of taxes that we are required to pay; and
- the availability of capital.

The Patient Protection and Affordable Care Act, as amended by the Health Care and Education Reconciliation Act, or collectively ACA, was enacted in 2010 and includes measures that have significantly changed the way healthcare is financed by both governmental and private insurers. The ACA continues to impact the U.S. pharmaceutical industry. Since its enactment, there have been judicial, executive and Congressional challenges to certain aspects of the ACA. In December 2018, the Centers for Medicare & Medicaid Services, or CMS, published a new final rule permitting further collections and payments to and from certain ACA-qualified health plans, or QHPs, and health insurance issuers under the ACA risk adjustment program in response to the outcome of federal district court litigation regarding the method CMS uses to determine this risk adjustment. On April 27, 2020, the United States Supreme Court reversed a Federal Circuit decision that previously upheld Congress' denial of \$12 billion in "risk corridor" funding. Further, in December 2018, a Texas U.S. District Court Judge ruled that the ACA is unconstitutional in its entirety because the "individual mandate" was repealed by the U.S. Congress as part of a tax act. Additionally, in December 2019, the U.S. Court of Appeals for the 5th Circuit upheld the district court ruling that the individual mandate was unconstitutional and remanded the case back to the district court to determine whether the remaining provisions of the ACA are invalid as well. In March 2020, the U.S. Supreme Court agreed to hear the case, which is expected to occur in the fall of 2020. It is unclear how such litigation and other efforts to repeal and replace the ACA will impact the ACA and our business. Complying with any new legislation or reversing changes implemented under the ACA could be time-intensive and expensive, resulting in a material adverse effect on our business.

In addition, other legislative changes have been proposed and adopted since the ACA was enacted. These changes include aggregate reductions to Medicare payments to providers of up to 2% per fiscal year pursuant to the Budget Control Act of 2011, which began in 2013 and will remain in effect through 2030 unless additional Congressional action is taken. The Coronavirus Aid, Relief and Economic Security Act, or CARES Act, which was signed into law in March 2020 and is designed to provide financial support and resources to individuals and businesses affected by

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the COVID-19 pandemic, suspended the 2% Medicare sequester from May 1, 2020 through December 31, 2020, and extended the sequester by one year, through 2030, in order to offset the added expense of the 2020 cancellation. Additionally, it is possible that additional governmental action is taken to address the COVID-19 pandemic, resulting in a material adverse effect on our business. For example, on April 18, 2020, CMS announced that QHP issuers under the ACA may suspend activities related to the collection and reporting of quality data that would have otherwise been reported between May and June 2020 given the challenges healthcare providers are facing responding to the COVID-19 virus.

There also has recently been heightened governmental scrutiny over the manner in which drug manufacturers set prices for their drugs, which has resulted in several U.S. congressional inquiries and proposed and enacted federal and state legislation designed to, among other things, bring more transparency to product pricing, review the relationship between pricing and manufacturer patient programs and reform government program reimbursement methodologies for drug products. At the federal level, the Trump administration's budget proposal for fiscal year 2021 includes a \$135 billion allowance to support legislative proposals seeking to reduce drug prices, increase competition, lower out-of-pocket drug costs for patients and increase patient access to lower-cost generic and biosimilar drugs. On March 10, 2020, the Trump administration sent "principles" for drug pricing to Congress, calling for legislation that would, among other things, cap Medicare Part D beneficiary out-of-pocket pharmacy expenses, provide an option to Medicare Part D beneficiary monthly out-of-pocket expenses, and place limits on pharmaceutical price increases. The Trump administration previously released a "Blueprint" to lower drug prices and reduce out of pocket costs of drugs that contained proposals to increase manufacturer competition, increase the negotiating power of certain federal healthcare programs, incentivize manufacturers to lower the list price of their products and reduce the out-of-pocket costs of drug products paid by consumers. The Department of Health and Human Services, or HHS, has solicited feedback on some of these measures and, at the same, has implemented others under its existing authority. For example, in May 2019, CMS issued a final rule to allow Medicare Advantage plans the option to use step therapy for Part B drugs beginning January 1, 2020, codifying a policy change that was effective January 1, 2019. While some of these and other measures may require additional authorization to become effective, Congress and the Trump administration have each indicated that they would continue to seek new legislative and/or administrative measures to control drug costs. At the state level, legislatures have increasingly passed legislation and implemented regulations designed to control pharmaceutical and biological product pricing, including price or patient reimbursement constraints, discounts, restrictions on certain product access and marketing cost disclosure and transparency measures and, in some cases, designed to encourage importation from other countries and bulk purchasing.

The ACA, as well as other healthcare reform measures that may be adopted in the future, may result in additional reductions in Medicare and other healthcare funding, more rigorous coverage criteria, lower reimbursement and new payment methodologies. This could lower the price that we receive for any approved drug product. Any denial in coverage or reduction in reimbursement from Medicare or other government funded programs may result in a similar denial or reduction in payments from private payors, which may prevent us from being able to generate sufficient revenue, attain profitability or commercialize our product candidates, if approved.

In the European Union, similar political, economic and regulatory developments may affect our ability to profitably commercialize our current or any future products. In addition to continuing pressure on prices, price controls and cost containment measures, legislative developments at the European Union or member state level may result in significant additional requirements or obstacles that may increase our operating costs. In international markets, reimbursement and healthcare payment systems vary significantly by country, and many countries have instituted price ceilings on specific products and therapies. Our future product candidates, if any, might not be considered medically reasonable and necessary for a specific indication or cost-effective by third-party payors, an adequate level of reimbursement might not be available for such product candidates and third-party payors' reimbursement policies might adversely affect our ability to sell any future product candidates profitably.

Some countries require approval of the sale price of a drug before it can be marketed. In many countries, the pricing review period begins after marketing or product licensing approval is granted. In some foreign markets, prescription pharmaceutical pricing remains subject to continuing governmental control even after initial approval is granted. As a result, we might obtain marketing approval for a product candidate in a particular country, but then be subject to

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price regulations that delay the commercial launch of the product candidate, possibly for lengthy time periods, and negatively impact the revenue that are generated from the sale of the product in that country. If reimbursement of such product candidates is unavailable or limited in scope or amount, or if pricing is set at unsatisfactory levels, or if there is competition from lower-priced cross-border sales, our profitability will be negatively affected.

We cannot predict the likelihood, nature or extent of government regulation that may arise from future legislation or administrative action, either in the United States or abroad. If we are slow or unable to adapt to changes in existing requirements or the adoption of new requirements or policies, or if we are not able to maintain regulatory compliance, our product candidates may lose any marketing approval that may have been obtained and we may not achieve or sustain profitability, which would adversely affect our business.

Our business operations and current and future relationships with investigators, health care professionals, consultants, third-party payors and customers will be subject, directly or indirectly, to federal and state healthcare fraud and abuse laws, false claims laws, health information privacy and security laws and other healthcare laws and regulations. If we are unable to comply, or have not fully complied, with such laws, we could face substantial penalties.

Although we do not currently have any products on the market, if we obtain FDA approval for our product candidates and begin commercializing those products in the United States, our operations may be directly, or indirectly through our prescribers, customers and third-party payors, subject to various U.S. federal and state healthcare laws and regulations, including, without limitation, the U.S. federal Anti-Kickback Statute, the U.S. federal civil and criminal false claims laws and the Physician Payments Sunshine Act and regulations. Healthcare providers, physicians and others play a primary role in the recommendation and prescription of any products for which we obtain marketing approval. These laws may impact, among other things, our current business operations, including our clinical research activities and proposed sales, marketing and education programs and constrain the business of financial arrangements and relationships with healthcare providers, physicians and other parties through which we market, sell and distribute our products for which we obtain marketing approval. In addition, we may be subject to patient data privacy and security regulation by both the U.S. federal government and the states in which we conduct our business. Finally, we may be subject to additional healthcare, statutory and regulatory requirements and enforcement by foreign regulatory authorities in jurisdictions in which we conduct our business. The laws that may affect our ability to operate are described in the following paragraphs:

- The U.S. federal Anti-Kickback Statute prohibits, among other things, persons or entities from knowingly and willfully soliciting, offering, receiving or paying any remuneration (including any kickback, bribe or certain rebates), directly or indirectly, overtly or covertly, in cash or in kind, to induce or reward either the referral of an individual for, or the purchase, lease, order or recommendation of, any good, facility, item or service, for which payment may be made, in whole or in part, under U.S. federal and state healthcare programs such as Medicare and Medicaid. Moreover, the ACA provides that the government may assert that a violation of the federal Anti-Kickback Statute also constitutes a false or fraudulent claim for purposes of the civil False Claims Act.
- The federal civil and criminal false claims, including the civil False Claims Act, or FCA, that can be enforced by private citizens through civil whistleblower or qui tam actions, prohibit individuals or entities from, among other things, knowingly presenting, or causing to be presented, to the federal government, claims for payment that are false or fraudulent or making a false statement to avoid, decrease or conceal an obligation to pay money to the federal government. No specific intent to defraud is required under the civil FCA. The criminal FCA provides for criminal penalties for submitting false claims, including imprisonment and criminal fines.
- The Civil Monetary Penalty Act of 1981 and implementing regulations impose penalties against any person or entity that, among other things, is determined to have presented or caused to be presented a claim to a federal healthcare program that the person knows or should know is for an item or service that was not provided as claimed or is false or fraudulent, or offering or transferring remuneration to a federal healthcare beneficiary that a person knows or should know is likely to influence the beneficiary's decision to order or receive items or services reimbursable by the government from a particular provider or supplier.
- The U.S. federal Health Insurance Portability and Accountability Act of 1996, or HIPAA, imposes criminal and civil liability for, among other things, knowingly and willfully executing, or attempting to execute, a

scheme to defraud any healthcare benefit program or knowingly and willfully falsifying, concealing or covering up a material fact or making any materially false statement, in connection with the delivery of, or payment for, healthcare benefits, items or services. Similar to the U.S. federal Anti-Kickback Statute, a person or entity does not need to have actual knowledge of the statute or specific intent to violate it in order to have committed a violation.

- HIPAA, as amended by the Health Information Technology for Economic and Clinical Health Act of 2009, or HITECH, and its implementing regulations, as amended again by the Modifications to the HIPAA Privacy, Security, Enforcement and Breach Notification Rules Under HITECH and the Genetic Information Nondiscrimination Act and Other Modifications to the HIPAA Rules, commonly referred to as the Final HIPAA Omnibus Rule, published in January 2013, impose certain obligations, including mandatory contractual terms, on covered entities subject to the Final HIPAA Omnibus Rule, *i.e.*, health plans, healthcare clearinghouses and healthcare providers, as well as their business associates that perform certain services for or on their behalf involving the use or disclosure of individually identifiable health information with respect to safeguarding the privacy, security and transmission of individually identifiable health information.
- The U.S. Federal Food, Drug and Cosmetic Act prohibits, among other things, the adulteration or misbranding of drugs, biologics and medical devices.
- The federal Physician Payments Sunshine Act requires applicable manufacturers of covered drugs, medical devices, biologics and medical supplies for which payment is available under Medicare, Medicaid or the Children's Health Insurance Program, with specific exceptions, to annually report to CMS information regarding payments and other transfers of value to physicians, as defined by such law, and teaching hospitals as well as information regarding ownership and investment interests held by physicians and their immediate family members. Additionally, President Trump signed into law in 2018 the "Substance Use-Disorder Prevention that Promoted Opioid Recovery and Treatment for Patients and Communities Act" which, under the provision entitled "Fighting the Opioid Epidemic with Sunshine," in part, extends the reporting and transparency requirements for physicians under the Physician Payments Sunshine Act to physician assistants, nurse practitioners and other mid-level practitioners, with reporting requirements going into effect in 2022 for payments made in 2021.
- The distribution of pharmaceutical products is subject to additional requirements and regulations, including extensive record-keeping, licensing, price reporting, storage and security requirements intended to prevent the unauthorized sale of pharmaceutical products. Pricing and rebate programs must also comply with the Medicaid rebate requirements of the U.S. Omnibus Budget Reconciliation Act of 1990 and more recent requirements in the ACA. If products are made available to authorized users of the Federal Supply Schedule of the General Services Administration, additional laws and requirements apply. Manufacturing, sales, promotion and other activities also are potentially subject to federal and state consumer protection and unfair competition laws.
- Analogous state laws and regulations impose additional obligations, including: state anti-kickback and false claims laws, which may apply to our business practices, including, but not limited to, research, distribution, sales and marketing arrangements and claims involving healthcare items or services reimbursed by any third-party payor, including private insurers; state laws that require pharmaceutical companies to comply with the pharmaceutical industry's voluntary compliance guidelines and the relevant compliance guidance promulgated by the U.S. federal government, or otherwise restrict payments that may be made to healthcare providers and other potential referral sources; state laws and regulations that require drug manufacturers to file reports relating to pricing and marketing information, which requires tracking gifts and other remuneration and items of value provided to healthcare professionals and entities; state and local laws requiring the registration of pharmaceutical sales representatives; and state laws governing the privacy and security of health information in certain circumstances, many of which differ from each other in significant ways and often are not preempted by HIPAA, thus complicating compliance efforts.
- European and other foreign law equivalents of each of the laws also impose legal requirements, including reporting requirements detailing interactions with and payments to healthcare providers.

Ensuring that our internal operations and future business arrangements with third parties comply with applicable healthcare laws and regulations will involve substantial costs. It is possible that governmental authorities will conclude that our business practices do not comply with current or future statutes, regulations, agency guidance or

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case law involving applicable fraud and abuse or other healthcare laws and regulations. If our operations are found to be in violation of any of the laws described above or any other governmental laws and regulations that may apply to us, we may be subject to significant penalties, including civil, criminal and administrative penalties, damages, fines, exclusion from U.S. government funded healthcare programs, such as Medicare and Medicaid, or similar programs in other countries or jurisdictions, disgorgement, imprisonment, contractual damages, reputational harm, diminished profits, additional reporting requirements and oversight, and the delay, reduction, termination or restructuring of our operations. Further, defending against any such actions can be costly and time-consuming, and may require significant financial and personnel resources. Therefore, even if we are successful in defending against any such actions that may be brought against us, our business may be impaired. If any of the physicians or other providers or entities with whom we expect to do business is found not to be in compliance with applicable laws, they may be subject to significant criminal, civil or administrative sanctions, including exclusions from government funded healthcare programs and imprisonment. If any of the above occur, it could adversely affect our ability to operate our business and our results of operations.

If we, our employees, independent contractors, principal investigators, consultants, vendors or agents acting on our behalf fail to comply with healthcare laws and regulatory requirements, we could be subject to fines, penalties or enforcement actions, or incur costs that could have a material adverse effect on our business.

We are exposed to the risk of employee fraud or other misconduct as well as risks of noncompliance by contractors or agents acting on our behalf. Misconduct by employees and independent contractors, such as principal investigators, consultants and vendors, could include intentional failures to comply with FDA regulations, to provide accurate information to the FDA, to comply with health care fraud and abuse laws, to report financial information or data accurately or to disclose unauthorized activities to us. In particular, research, sales, marketing and business arrangements in the health care industry are subject to extensive laws intended to prevent fraud, misconduct, kickbacks, self-dealing and other abusive practices. These laws may restrict or prohibit a wide range of research, pricing, discounting, marketing and promotion, sales commission, customer incentive programs and other business arrangements. Employee and independent contractor misconduct could also involve the improper use of information obtained in the course of clinical trials, which could result in regulatory sanctions and serious harm to our reputation. We have adopted a written code of business conduct and ethics, but it is not always possible to identify and deter employee or independent contractor misconduct, and the precautions we take to detect and prevent this activity may not be effective in controlling unknown or unmanaged risks or losses or in protecting us from governmental investigations or other actions or lawsuits stemming from a failure to comply with these laws or regulations. If any such actions are instituted against us and we are not successful in defending ourselves or asserting our rights, those actions could have a significant impact on our business, including the imposition of significant fines, exclusion from participation in government-funded healthcare programs, or other sanctions.

If we do not comply with laws regulating the protection of the environment and health and human safety, our business could be adversely affected.

We are subject to numerous environmental, health and safety laws and regulations, including those governing laboratory procedures and the handling, use, storage, treatment and disposal of hazardous materials and wastes. Our research and development involve, and may in the future involve, the use of potentially hazardous materials and chemicals. Our operations may produce hazardous waste products. Although we believe that our safety procedures for handling and disposing of these materials comply with the standards mandated by local, state and federal laws and regulations, the risk of accidental contamination or injury from these materials cannot be eliminated. If an accident occurs, we could be held liable for resulting damages, which could be substantial. We are also subject to numerous environmental, health and workplace safety laws and regulations and fire and building codes, including those governing laboratory procedures, exposure to blood-borne pathogens, use and storage of flammable agents and the handling of biohazardous materials. Although we maintain workers' compensation insurance as prescribed by the State of California to cover us for costs and expenses, we may incur due to injuries to our employees resulting from the use of these materials, this insurance may not provide adequate coverage against potential liabilities. We do not maintain insurance for environmental liability or toxic tort claims that may be asserted against us. Additional laws and regulations affecting our operations may be adopted in the future. Current or future laws and regulations may impair our research, development or commercialization efforts. We may incur substantial costs to comply with, and substantial fines or penalties if we violate, any of these laws or regulations.

Inadequate funding for the FDA, the SEC and other government agencies could hinder their ability to hire and retain key leadership and other personnel, prevent new products and services from being developed or commercialized in a timely manner or otherwise prevent those agencies from performing normal business functions on which the operation of our business may rely, which could negatively impact our business.

The ability of the FDA to review and approve new products can be affected by a variety of factors, including government budget and funding levels and the ability to hire and retain key personnel. Average review times at the agency have fluctuated in recent years as a result. In addition, government funding of the Securities and Exchange Commission, or SEC, and other government agencies on which our operations may rely, including those that fund research and development activities is subject to the political process, which is inherently fluid and unpredictable. Disruptions at the FDA and other agencies, such as recent furloughs or government shutdowns, may also slow the time necessary for new drugs to be reviewed and/or approved by necessary government agencies, which would adversely affect our business.

Our business activities may be subject to the Foreign Corrupt Practices Act and similar anti-bribery and anti-corruption laws, as well as U.S. and certain foreign export controls, trade sanctions and import laws and regulations, all of which can subject us to criminal liability and other serious consequences for violations.

Our business activities may be subject to the U.S. Foreign Corrupt Practices Act, or FCPA, and similar anti-bribery or anti-corruption laws, regulations or rules of other countries in which we operate. These laws generally prohibit companies and their employees and third party business partners, representatives and agents from engaging in corruption and bribery, including offering, promising, giving or authorizing the provision of anything of value, either directly or indirectly, to a government official or commercial party in order to influence official action, direct business to any person, gain any improper advantage, or obtain or retain business. The FCPA also requires public companies to make and keep books and records that accurately and fairly reflect the transactions of the corporation and to devise and maintain an adequate system of internal accounting controls. Our business is heavily regulated and therefore involves significant interaction with government officials, including officials of non-U.S. governments.

Additionally, in many countries, healthcare providers are employed by the government, and the purchasers of biopharmaceuticals are government entities. As a result, our dealings with these providers and purchasers are subject to regulation and such healthcare providers and employees of such purchasers may be considered "foreign officials" as defined in the FCPA. Recently, the SEC and Department of Justice have increased their FCPA enforcement activities with respect to biotechnology companies. In addition to our own employees, we leverage third parties to conduct our business abroad, such as obtaining government licenses and approvals. We and our third-party business partners, representatives and agents may have direct or indirect interactions with officials and employees of government agencies, state-owned or affiliated entities and we may be held liable for the corrupt or other illegal activities of our employees, our third-party business partners, representatives and agents, even if we do not explicitly authorize such activities. There is no certainty that our employees or the employees of our third-party business partners, representatives and agents will comply with all applicable laws and regulations, particularly given the high level of complexity of these laws. Violations of these laws and regulations could result in whistleblower complaints, adverse media coverage, investigations, loss of export privileges, debarment from U.S. government contracts, substantial diversion of management's attention, significant legal fees and fines, severe criminal or civil sanctions against us, our officers or our employees, disgorgement and other penalties and remedial measures and prohibitions on the conduct of our business. Any such violations could include prohibitions on our ability to offer our products in one or more countries and could materially damage our reputation, our brand, our international expansion efforts, our ability to attract and retain employees, and our business, prospects, operating results, financial condition and stock price.

In addition, our products may be subject to U.S. and foreign export controls, trade sanctions and import laws and regulations. Governmental regulation of the import or export of our products, or our failure to obtain any required import or export authorization for our products, when applicable, could harm our business. Furthermore, U.S. export control laws and economic sanctions prohibit the provision of certain products and services to countries, governments and persons targeted by U.S. sanctions. If we fail to comply with export and import regulations and such economic sanctions, penalties could be imposed, including fines and/or denial of certain export privileges.

Data collection under European and U.S. laws is governed by restrictive regulations addressing the collection, use, processing and, in the case of Europe, cross-border transfer, of personal information.

We may collect, process, use or transfer personal information from individuals located in the European Union in connection with our business, including in connection with conducting clinical trials in the European Union. Additionally, if any of our product candidates are approved, we may seek to commercialize those products in the European Union. The collection and use of personal health data in the European Union is governed, in part, by the provisions of the General Data Protection Regulation (EU) 2016/679, or the GDPR. This legislation imposes requirements relating to having legal bases for processing personal information relating to identifiable individuals and transferring such information outside of the European Economic Area, including to the United States, providing details to those individuals regarding the processing of their personal information, keeping personal information secure, having data processing agreements with third parties who process personal information, responding to individuals' requests to exercise their rights in respect of their personal information, reporting security breaches involving personal data to the competent national data protection authority and affected individuals, appointing data protection officers, conducting data protection impact assessments and record-keeping. The GDPR imposes additional responsibilities and liabilities in relation to personal data that we process, and we may be required to put in place additional mechanisms ensuring compliance. Failure to comply with the requirements of the GDPR and related national data protection laws of the member states of the European Union may result in substantial fines, other administrative penalties and civil claims being brought against us, which could have a material adverse effect on our business, financial condition and results of operations.

In addition, U.S. states are adopting new laws or amending existing laws, requiring attention to frequently changing regulatory requirements related to personal information. For example, California enacted the California Consumer Privacy Act, or the CCPA, in 2018, which took effect on January 1, 2020 and has been dubbed the first "GDPR-like" law in the United States. The CCPA gives California residents expanded rights to access and delete their personal information, opt out of certain personal information sharing and receive detailed information about how their personal information is used by requiring covered companies to provide new disclosures to California consumers (as that term is broadly defined and which can include any of our current or future employees who may be California residents or any other California residents whose data we collect or process) and provide such residents new ways to opt out of certain sales of personal information. The CCPA provides for civil penalties for violations, as well as a private right of action for data breaches that is expected to increase data breach litigation. As we expand our operations, preclinical studies and clinical trials, the CCPA may increase our compliance costs and potential liability. Other states are beginning to consider and pass similar laws.

Privacy and data security laws and regulations are not consistent across jurisdictions, and they may impose conflicting or uncertain obligations. Compliance with these and any other applicable privacy and data security laws and regulations is a rigorous, costly and time-intensive process, and we may be required to put in place additional mechanisms ensuring compliance with new and changing data protection obligations under these laws and regulations. Actual or alleged noncompliance with any such laws and regulations may lead to regulatory investigations, enforcement actions, claims and litigation, and if we fail to comply with any such laws or regulations, we may face significant fines and penalties. Any of these could adversely affect our business, financial condition and results of operations.

Risks Related to Intellectual Property

If we are unable to obtain, maintain and enforce patent protection for our product candidates and related technology, our business could be materially harmed.

Our strategy depends on our ability to identify, seek, obtain and maintain patent protection for our product candidates and other research and development discoveries. Our patent portfolio is relatively small compared to many large and more established pharmaceutical and biotechnology companies. As our patent portfolio grows, we expect patent protection will continue to be an important part of our strategy. The patent protection process is expensive and time-consuming, and we may not be able to file and prosecute all necessary or desirable patent applications or maintain and enforce any patents that may issue from such patent applications, at a reasonable cost or in a timely manner or in all jurisdictions where protection may be commercially advantageous. It is also possible

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that we will fail to identify patentable aspects of our research and development discoveries before it is too late to obtain patent protection. Moreover, in some circumstances, we may not have the right to control the preparation, filing and prosecution of patent applications, or to maintain the patents, covering technology that we have licensed from third parties. Therefore, our in-licensed patents and patent applications may not be prosecuted and enforced in a manner consistent with the best interests of our business. Our patent applications cannot be enforced against third parties practicing the technology claimed in such applications unless, and until, patents issue from such applications, and then only to the extent the issued claims cover the technology. The patent applications that we own or in-license may fail to result in issued patents with claims that cover our current and future product candidates in the United States or in foreign countries or may fail to effectively prevent third parties from commercializing competitive product candidates.

The patent position of biotechnology companies generally is highly uncertain, involves complex legal and factual questions, and has in recent years been the subject of much litigation. We may be subject to a third-party pre-issuance submission of prior art to the U.S. Patent and Trademark Office, or USPTO, and such prior art may affect the scope of any claims we ultimately get allowed or it may prevent our patent applications from issuing as patents. Further, the issuance of a patent does not ensure that it is valid or enforceable, nor is the issuance conclusive as to inventorship or the scope of any claims. Third parties may challenge the validity, enforceability or scope of our issued patents or claim that they should be inventors on such patents, and such patents may be narrowed, invalidated, circumvented or deemed unenforceable and such third parties may gain rights to such patents. We could also become involved in reexamination, *inter partes* review, post-grant review, opposition or derivation proceedings challenging our patent rights or the patent rights of others.

In addition, changes in law may introduce uncertainty in the enforceability or scope of patents owned by us. If our patents are narrowed, invalidated or held unenforceable, third parties may be able to commercialize our technology or products and compete directly with us without payment to us. There is no assurance that all potentially relevant prior art relating to our patents and patent applications has been found, and such prior art could potentially invalidate one or more of our patents or prevent a patent from issuing from one or more of our pending patent applications. There is also no assurance that there is no prior art that may ultimately be found to affect the validity or enforceability of a claim. Furthermore, even if our patents are unchallenged, they may not adequately protect our intellectual property, provide exclusivity for our product candidates, prevent others from designing around our claims or provide us with a competitive advantage. The legal systems of certain countries do not favor the aggressive enforcement of patents, and the laws of foreign countries may not allow us to protect our inventions with patents to the same extent as the laws of the United States. Because patent applications in the United States and many foreign jurisdictions are typically not published until 18 months after filing, or in some cases not at all, and because publications of discoveries in scientific literature lag behind actual discoveries, we cannot be certain that we were the first to make the inventions claimed in our issued patents or pending patent applications, or that we were the first to file for protection of the inventions set forth in our patents or patent applications. As a result, we may not be able to obtain or maintain protection for certain inventions.

For all of the foregoing reasons, the issuance, validity, enforceability, scope and commercial value of our patents in the United States and in foreign countries cannot be predicted with certainty and, as a result, any patents that we own or license may not provide sufficient protection against competitors. We may not be able to obtain or maintain patent protection from our pending patent applications, from those we may file in the future, or from those we may license from third parties. Moreover, even if we are able to obtain patent protection, such patent protection may be of insufficient scope to achieve our business objectives. In addition, the issuance of a patent does not give us the right to practice the patented invention. Third parties may have blocking patents that could prevent us from marketing our own patented product and practicing our own patented technology.

We may not be able to protect our intellectual property rights throughout the world.

Filing, prosecuting and defending patents on product candidates in all countries throughout the world would be prohibitively expensive, and our intellectual property rights in some countries outside the United States can be less extensive than those in the United States. In addition, the laws of some foreign countries do not protect intellectual property rights to the same extent as federal and state laws in the United States. Consequently, we may not be able to prevent third parties from practicing our inventions in all countries outside the United States, or from selling or

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importing products made using our inventions in and into the United States or other jurisdictions. Competitors may use our technologies to develop their own products in jurisdictions where we have not obtained patent protection and further, may export otherwise infringing products to territories where we have patent protection, but enforcement is not as strong as that in the United States. These products may compete with our current or future products, if any, and our patents or other intellectual property rights may not be valid or sufficient to prevent them from competing.

Many companies have encountered significant problems in protecting and defending intellectual property rights in foreign jurisdictions. The legal systems of certain countries, particularly certain developing countries, do not favor the enforcement of patents, trade secrets and other intellectual property protection, particularly those relating to biotechnology products, which could make it difficult for us to stop the infringement of our patents or marketing of competing products in violation of our proprietary rights generally. Proceedings to enforce our patent rights in foreign jurisdictions could result in substantial costs and divert our efforts and attention from other aspects of our business, could put our patents at risk of being invalidated or interpreted narrowly and our patent applications at risk of not issuing and could provoke third parties to assert claims against us. We may not prevail in any lawsuits that we initiate, and the damages or other remedies awarded, if any, may not be commercially meaningful. Accordingly, our efforts to enforce our intellectual property rights around the world may be inadequate to obtain a significant commercial advantage from the intellectual property that we develop or license.

Additionally, the requirements for patentability may differ in certain countries. For example, in India, unlike the United States, there is no link between regulatory approval of a drug and its patent status, and patenting of medical uses of a claimed drug are prohibited. In addition to India, certain countries in Europe and other countries, including China, have compulsory licensing laws under which a patent owner may be compelled to grant licenses to third parties. In those countries, we and our licensors may have limited remedies if patents are infringed or if we or our licensors are compelled to grant a license to a third party, which could materially diminish the value of those patents. This could limit our potential revenue opportunities. Accordingly, our efforts to enforce intellectual property rights around the world may be inadequate to obtain a significant commercial advantage from the intellectual property that we own or license.

Obtaining and maintaining our patent protection depends on compliance with various procedural, documentary, fee payment and other requirements imposed by regulations and governmental patent agencies, and our patent protection could be reduced or eliminated for non-compliance with these requirements.

Periodic maintenance fees, renewal fees, annuity fees and various other governmental fees on patents or applications will be due to the USPTO and various foreign patent offices at various points over the lifetime of our patents or applications. We have systems in place to remind us to pay these fees, and we rely on our outside patent annuity service to pay these fees automatically when due, but we must notify the provider of any new patents or applications. Additionally, the USPTO and various foreign patent offices require compliance with many procedural, documentary, fee payment and other similar provisions during the patent application process. We employ reputable law firms and other professionals to help us comply, and in many cases, an inadvertent lapse can be cured by payment of a late fee or by other means in accordance with rules applicable to the particular jurisdiction. However, there are situations in which noncompliance can result in abandonment or lapse of the patent or patent application, resulting in partial or complete loss of patent rights in the relevant jurisdiction. If such an event were to occur, it could have a material adverse effect on our business.

Changes in patent laws or patent jurisprudence could diminish the value of patents in general, thereby impairing our ability to protect our product candidates.

The patent positions of biotechnology companies can be highly uncertain and involve complex legal and factual questions for which important legal principles remain unresolved. Changes in either the patent laws or in the interpretations of patent laws in the United States and other countries may diminish the value of our intellectual property. We cannot predict the breadth of claims that may be allowed or found to be enforceable in our patents or in third-party patents. The United States has enacted and implemented wide-ranging patent reform legislation. Further, recent U.S. Supreme Court rulings have either narrowed the scope of patent protection available in certain circumstances or weakened the rights of patent owners in certain situations. In addition to increasing uncertainty with regard to our ability to obtain patents in the future, this combination of events has created uncertainty with respect to the validity, scope and value of patents, once obtained.

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For our U.S. patent applications containing a priority claim after March 16, 2013, there is a higher level of uncertainty in the patent law. In September 2011, the Leahy-Smith America Invents Act, also known as the America Invents Act, or AIA, was signed into law. The AIA includes a number of significant changes to U.S. patent law, including provisions that affect the way patent applications are prosecuted and may also affect patent litigation. The AIA and its implementation may increase the uncertainties and costs surrounding the prosecution of our patent applications and the enforcement or defense of our issued patents, all of which could have an adverse effect on our business. An important change introduced by the AIA is that, as of March 16, 2013, the United States transitioned to a “first-to-file” system for deciding which party should be granted a patent when two or more patent applications are filed by different parties disclosing or claiming the same invention. A third party that has filed, or does file a patent application in the USPTO after March 16, 2013 but before us, could be awarded a patent covering a given invention, even if we had made the invention before it was made by the third party. This requires us to be cognizant going forward of the time from invention to filing of a patent application.

Among some of the other changes introduced by the AIA are changes that limit where a patentee may file a patent infringement suit and providing opportunities for third parties to file third party submissions of prior art to the USPTO during patent prosecution and to challenge any issued patent in the USPTO (e.g., via post-grant reviews or *inter partes* reviews). Because of a lower evidentiary standard in USPTO proceedings compared to the evidentiary standard in U.S. federal court necessary to invalidate a patent claim, a third party could potentially provide evidence in a USPTO proceeding sufficient for the USPTO to hold a claim invalid even though the same evidence would be insufficient to invalidate the claim if first presented in a district court action. Accordingly, a third party may attempt to use the USPTO procedures to invalidate our patent claims that would not have been invalidated if first challenged by the third party as a defendant in a district court action.

Depending on decisions by the U.S. Congress, the U.S. federal courts, the USPTO or similar authorities in foreign jurisdictions, the laws and regulations governing patents could change in unpredictable ways that may weaken our and our licensors' ability to obtain new patents or to enforce existing patents we and our licensors or partners may obtain in the future.

Our patents covering one or more of our product candidates could be found invalid or unenforceable if challenged.

Any of our intellectual property rights could be challenged or invalidated despite measures we take to obtain patent and other intellectual property protection with respect to our product candidates and proprietary technology. For example, if we were to initiate legal proceedings against a third party to enforce a patent covering one of our product candidates, the defendant could counterclaim that our patent is invalid and/or unenforceable. In patent litigation in the United States and in some other jurisdictions, defendant counterclaims alleging invalidity and/or unenforceability are commonplace. Grounds for a validity challenge could be an alleged failure to meet any of several statutory requirements, for example, lack of novelty, obviousness or non-enablement. Grounds for an unenforceability assertion could be an allegation that someone connected with prosecution of the patent withheld material information from the USPTO, or the applicable foreign counterpart, or made a misleading statement, during prosecution. A litigant or the USPTO itself could challenge our patents on this basis even if we believe that we have conducted our patent prosecution in accordance with the duty of candor and in good faith. The outcome following such a challenge is unpredictable.

With respect to challenges to the validity of our patents, for example, there might be invalidating prior art, of which the patent examiner and we were unaware during prosecution. If a defendant were to prevail on a legal assertion of invalidity and/or unenforceability, we would lose at least part, and perhaps all, of the patent protection on a product candidate. Even if a defendant does not prevail on a legal assertion of invalidity and/or unenforceability, our patent claims may be construed in a manner that would limit our ability to enforce such claims against the defendant and others. The cost of defending such a challenge, particularly in a foreign jurisdiction, and any resulting loss of patent protection could have a material adverse impact on one or more of our product candidates and our business.

Enforcing our intellectual property rights against third parties may also cause such third parties to file other counterclaims against us, which could be costly to defend, particularly in a foreign jurisdiction, and could require us to pay substantial damages, cease the sale of certain products or enter into a license agreement and pay royalties (which may not be possible on commercially reasonable terms or at all). Any efforts to enforce our intellectual property rights are also likely to be costly and may divert the efforts of our scientific and management personnel.

Patent terms may be inadequate to protect our competitive position on our product candidates for an adequate amount of time.

Patents have a limited lifespan. In the United States, if all maintenance fees are timely paid, the natural expiration of a patent is generally 20 years from its earliest U.S. non-provisional filing date. Various extensions may be available, but the life of a patent, and the protection it affords, is limited. Even if patents covering our product candidates are obtained, once the patent life has expired, we may be open to competition from competitive products, including biosimilars. Given the amount of time required for the development, testing and regulatory review of new product candidates, patents protecting such candidates might expire before or shortly after such candidates are commercialized. As a result, our owned and licensed patent portfolio may not provide us with sufficient rights to exclude others from commercializing products similar or identical to ours.

Patent protection, prosecution, assertion and defense for some of our product candidates may be dependent on third parties.

There may be times in the future when certain patents that relate to our product candidates or any approved products are controlled by our licensees or licensors, such as with respect to our Stanford license agreements. Although we may, under such arrangements, have rights to consult with our strategic partners on actions taken as well as back-up rights of prosecution and enforcement, we have in the past and may in the future relinquish rights to prosecute and maintain patents and patent applications within our portfolio as well as the ability to assert such patents against infringers. If any current or future licensee or licensor with rights to prosecute, assert or defend patents related to our product candidates fails to appropriately prosecute and maintain patent protection for patents covering any of our product candidates, or if patents covering any of our product candidates are asserted against infringers or defended against claims of invalidity or unenforceability in a manner which adversely affects such coverage, our ability to develop and commercialize any such product candidate may be adversely affected and we may not be able to prevent competitors from making, using and selling competing products.

If we are unable to protect the confidentiality of our trade secrets and proprietary information or obtain proper assignment of such intellectual property, the value of our technology and products could be adversely affected.

In addition to patent protection, we also rely on other proprietary rights, including protection of trade secrets and other proprietary information. Trade secrets and know-how can be difficult to protect. Trade secrets and know-how can also in some instances be independently derived or reverse-engineered by a third party. We maintain the confidentiality of trade secrets and proprietary information in part by entering into confidentiality agreements with our employees, consultants, strategic partners and others upon the commencement of their relationships with us. These agreements require that all confidential information developed by the individual or made known to the individual by us during the course of the individual's relationship with us be kept confidential and not disclosed to third parties. Our agreements with employees and our personnel policies also provide that any inventions conceived by the individual in the course of rendering services to us shall be our exclusive property. However, we may not obtain these agreements in all circumstances, and even when we obtain these agreements, individuals with whom we have these agreements may not comply with their terms. Any of the parties to these agreements may breach such agreements and disclose our proprietary information, including our trade secrets, and we may not be able to obtain adequate remedies for such breaches. In the event of unauthorized use or disclosure of our trade secrets or proprietary information, these agreements, even if obtained, may not provide meaningful protection, particularly for our trade secrets or other confidential information. We may also become involved in inventorship disputes relating to inventions and patents developed by our employees or consultants under such agreements. To the extent that our employees, consultants or contractors use technology or know-how owned by third parties in their work for us, disputes may arise between us and those third parties as to the rights in related inventions. To the extent that an individual who is not obligated to assign rights in intellectual property to us is rightfully an inventor of intellectual property, we may need to obtain an assignment or a license to that intellectual property from that individual, or a third party or from that individual's assignee. Such assignment or license may not be available on commercially reasonable terms or at all.

Enforcing a claim that a party illegally disclosed or misappropriated a trade secret is difficult, expensive and time-consuming and the outcome is unpredictable. In addition, some courts in the United States and certain foreign

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jurisdictions are less willing or unwilling to protect trade secrets. The disclosure of our trade secrets would impair our competitive position and may materially harm our business, financial condition and results of operations. Costly and time-consuming litigation could be necessary to enforce and determine the scope of our proprietary rights, and failure to maintain trade secret protection could adversely affect our competitive business position. In addition, if any of our trade secrets were to be lawfully obtained or independently developed by a competitor, we would have no right to prevent such third party, or those to whom they communicate such technology or information, from using that technology or information to compete with us. If any of our trade secrets were to be disclosed to or independently developed by a competitor or if we otherwise lose protection for our trade secrets or proprietary know-how, the value of this information may be greatly reduced, and our business and competitive position could be harmed. Adequate remedies may not exist in the event of unauthorized use or disclosure of our proprietary information.

We may become involved in lawsuits to protect or enforce our patents and trade secrets, which could be expensive, time-consuming and unsuccessful.

Third parties may seek approval to market their own products similar to or otherwise competitive with our product candidates or biosimilar versions of any approved product candidates. In these circumstances, we may need to defend or assert our patents, including by filing lawsuits alleging patent infringement. If we were to initiate legal proceedings against a third party to enforce a patent covering our product candidates, the defendant could counterclaim that the patent covering our product candidate is invalid and/or unenforceable. In patent litigation in the United States, defendant counterclaims alleging invalidity and/or unenforceability are commonplace. Grounds for an invalidity challenge could be an alleged failure to meet any of several statutory requirements, including lack of novelty, obviousness, written description or enablement. Grounds for an unenforceability assertion could be an allegation that someone connected with prosecution of the patent withheld relevant information from the USPTO, or made a misleading statement, during prosecution. The outcome following legal assertions of invalidity and unenforceability is unpredictable. In any of these types of proceedings, a court or agency with jurisdiction may find our patents invalid or unenforceable. Even if we have valid and enforceable patents, these patents still may not provide protection against competing products sufficient to achieve our business objectives.

Even after they have issued, our patents and any patents that we license may be challenged, narrowed, invalidated or circumvented. If our patents are invalidated or otherwise limited or will expire prior to the commercialization of our product candidates, other companies may be better able to develop products that compete with ours, which could adversely affect our competitive business position, business prospects and financial condition. In addition, if the breadth or strength of protection provided by our patents and patent applications is threatened, it could dissuade companies from collaborating with us to license, develop or commercialize current or future product candidates.

The following are examples of litigation and other adversarial proceedings or disputes that we could become a party to involving our patents or patents licensed to us:

- we may initiate litigation or other proceedings against third parties to enforce our patent and trade secret rights;
- third parties may initiate litigation or other proceedings seeking to invalidate patents owned by or licensed to us or to obtain a declaratory judgment that their product or technology does not infringe our patents or patents licensed to us;
- third parties may initiate opposition or other proceedings challenging the validity or scope of our patent rights, requiring us and/or licensors to participate in such proceedings to defend the validity and scope of our patents;
- there may be a challenge or dispute regarding inventorship or ownership of patents or trade secrets currently identified as being owned by or licensed to us; or
- third parties may seek approval to market biosimilar versions of our future approved products prior to the expiration of relevant patents owned by or licensed to us under the Biologics Price Competition and Innovation Act of 2009, requiring us to defend our patents, including by filing lawsuits alleging patent infringement.

Any litigation or other proceedings would be costly and could affect our results of operations and divert the attention of our management and scientific personnel. Some of our competitors may be able to sustain the cost of such

litigation and proceedings more effectively than we can because of their substantially greater resources. There is a risk that a court would decide that we are infringing the third party's patents and would order us to stop the activities covered by the patents. In that event, we may not have a viable alternative to the technology protected by the patent and may need to halt work on the affected product candidate or cease commercialization of an approved drug. In addition, there is a risk that a court will order us to pay third party damages or some other monetary award, depending upon the jurisdiction. An adverse outcome in any litigation or other proceeding could subject us to significant liabilities to third parties, potentially including treble damages and attorneys' fees if we are found to have willfully infringed, and we may be required to cease using the technology that is at issue or to license the technology from third parties. We may not be able to obtain any required licenses on commercially acceptable terms or at all. We may not be able to prevent, alone or with our licensors, infringement or misappropriation of our intellectual property rights, particularly in countries where the laws may not protect those rights as fully as in the United States. Any litigation or other proceedings to enforce our intellectual property rights may fail, and even if successful, may result in substantial costs and distract our management and other employees.

In addition, because of the substantial amount of discovery required in connection with intellectual property litigation, there is a risk that some of our confidential information could be compromised by disclosure during this type of litigation. There could also be public announcements of the results of hearings, motions or other interim proceedings or developments. If securities analysts or investors perceive these results to be negative, it could have an adverse effect on the price of our common stock. In addition, any uncertainties resulting from the initiation and continuation of any litigation could have a material adverse effect on our ability to raise additional funds or on our business, results of operations, financial condition and prospects. Any of these outcomes could have a material adverse effect on our business.

We may be subject to claims that we or our employees or consultants have wrongfully used or disclosed alleged trade secrets or other proprietary information of our employees' or consultants' former employers or their clients.

We employ individuals who were previously or concurrently employed at research institutions and/or other biotechnology or pharmaceutical companies, including our competitors or potential competitors. We may be subject to claims that these employees, or we, have inadvertently or otherwise used or disclosed trade secrets or other proprietary information of their former employers, or that patents and applications we have filed to protect inventions of these employees, even those related to one or more of our product candidates, are rightfully owned by their former or concurrent employer. Litigation may be necessary to defend against these claims. If we fail in defending such claims, in addition to paying monetary damages, trade secrets or other proprietary information could be awarded to a third party, and we could be required to obtain a license from such third party to commercialize our technology or products. Such license may not be available on commercially reasonable terms or at all. A loss of key research personnel or their work product could limit our ability to commercialize, or prevent us from commercializing, our current or future technologies or product candidates, which could materially harm our business. Even if we are successful in defending against these claims, litigation would expose us to the risk described above under "—We may become involved in lawsuits to protect or enforce our patents and trade secrets, which could be expensive, time consuming and unsuccessful."

Our commercial success depends significantly on our ability to operate without infringing the patents and other proprietary rights of third parties.

Our success will depend in part on our ability to operate without infringing the proprietary rights of third parties. Other entities may have or obtain patents or proprietary rights that could limit our ability to make, use, sell, offer for sale or import our future approved products or impair our competitive position. Our research, development and commercialization activities may be subject to claims that we infringe or otherwise violate patents or other intellectual property rights owned or controlled by third parties.

We are aware of third-party patents and patent applications containing claims in the immuno-oncology field based on scientific approaches that are the same as or similar to our approach, including with respect to the targeting of the CD47 and signal regulatory protein alpha, or SIRP α , pathways, and others that are based on entirely different approaches. These patents and applications could potentially be construed to cover our product candidates and their use. For example, we are aware of a revoked European patent (EP 2 429 574) owned by University Health Network,

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or UHN, and The Hospital for Sick Children that may encompass certain therapies for the treatment of cancer using polypeptides comprising soluble human SIRP α , or a CD47-binding fragment thereof. This revoked patent related to the treatment of cancer with polypeptides comprising soluble human SIRP α , or a CD47-binding fragment thereof. This patent was revoked by the European Patent Office and UHN and The Hospital for Sick Children have appealed the decision. The U.S. counterpart is not yet granted. If UHN and the Hospital for Sick Children win their appeal of the European Patent Office decision revoking their European patent, or if the U.S. counterpart grants them a patent, the resulting patent claims could potentially limit our ability to pursue ALX148 in certain new indications or geographies in the future. As the biotechnology industry expands and more patents are issued, the risk increases that we may be subject to claims of infringement of the patent rights of third parties. There is no assurance that there are not third-party patents or patent applications of which we are aware, but which we do not believe are relevant to our business, which may, nonetheless, ultimately be found to limit our ability to make, use, sell, offer for sale or import our future approved products or impair our competitive position.

Third parties may have or obtain valid and enforceable patents or proprietary rights that could block us from developing product candidates. These patents may not expire before we receive any marketing approval for our product candidates, and they could delay the commercial launch of one or more future product candidates. If our product candidates were to be found to infringe any such patents, and we were unable to invalidate those patents, or if licenses for them are not available on commercially reasonable terms or at all, our business, financial condition and results of operations could be materially harmed. Furthermore, even if a license is available, it may be non-exclusive, which could result in our competitors gaining access to the same intellectual property. Our failure to maintain a license to any technology that we require may also materially harm our business, financial condition and results of operations, and we would be exposed to a threat of litigation.

Any litigation resulting from claims of infringement or failure to license patents and proprietary rights of others would expose us to the risk described above under “—We may become involved in lawsuits to protect or enforce our patents and trade secrets, which could be expensive, time consuming and unsuccessful.” Any of the aforementioned threats to our competitive advantage could have a material adverse effect on our business.

Our intellectual property rights will not necessarily provide us with competitive advantages.

The degree of future protection afforded by our intellectual property rights is uncertain because intellectual property rights have limitations and may not adequately protect our business or permit us to maintain our competitive advantage. The following examples are illustrative:

- others may be able to make products that are similar to our product candidates but that are not covered by the claims of the patents that we own or have exclusively licensed;
- others may independently develop similar or alternative technologies without infringing our intellectual property rights;
- issued patents that we own or have exclusively licensed may not provide us with competitive advantages, or may be held invalid or unenforceable, as a result of legal challenges by our competitors;
- we may obtain patents for product candidates many years before we obtain marketing approval for such product candidates and because patents have a limited life, which may begin to run prior to the commercial sale of the related product, the commercial value of our patents may be limited;
- our competitors might conduct research and development activities in countries where we do not have patent rights and then use the information learned from such activities to develop competitive products for sale in our major commercial markets;
- we may fail to develop additional proprietary technologies that are patentable;
- the laws of certain foreign countries may not protect our intellectual property rights to the same extent as the laws of the United States, or we may fail to apply for or obtain adequate intellectual property protection in all the jurisdictions in which we operate; and
- the patents of others may have an adverse effect on our business, for example by preventing us from marketing one or more of our product candidates for one or more indications.

Any of the aforementioned threats to our competitive advantage could have a material adverse effect on our business.

We will need to obtain FDA approval for any proposed product candidate names, and any failure or delay associated with product candidate name approval may adversely affect our business.

Any proprietary name or trademark we intend to use for our product candidates will require approval from the FDA regardless of whether we have secured a formal trademark registration from the USPTO. The FDA typically conducts a review of proposed product candidate names, including an evaluation of the potential for confusion with other product names and potential pharmacy dispensing errors. The FDA may also object to a product name if it believes the name inappropriately implies certain medical claims or contributes to an overstatement of efficacy. If the FDA objects to any product candidate names we propose, we may be required to adopt an alternative name for our product candidates. If we adopt an alternative name, we would lose the benefit of any existing trademark applications for such product candidate and may be required to expend significant additional resources in an effort to identify a suitable product name that would qualify under applicable trademark laws, not infringe the existing rights of third parties and be acceptable to the FDA. We may be unable to build a successful brand identity for a new trademark in a timely manner or at all, which would limit our ability to commercialize our product candidates.

Our rights to develop and commercialize our product candidates may be subject, in part, to the terms and conditions of agreements with others.

Our current agreements do not, and future agreements we may enter into in the future may not, provide exclusive rights to use certain intellectual property and technology retained by a collaborator in all relevant fields of use and in all territories in which we may wish to develop or commercialize our technology and products in the future. As a result, we may not be able to prevent competitors or other third parties from developing and commercializing competitive products that utilize technology retained by such collaborators to the extent such products are not also covered by our intellectual property.

We may need to obtain additional intellectual property rights from others to advance our research or allow commercialization of product candidates we may develop. We may be unable to obtain additional intellectual property rights at a reasonable cost or on reasonable terms, if at all. In that event, we may be required to expend significant time and resources to redesign our technology, product candidates or the methods for manufacturing them or to develop or license replacement technology, all of which may not be feasible on a technical or commercial basis. If we are unable to do so, we may be unable to develop or commercialize the affected product candidates, which could harm our business, financial condition, results of operations and prospects significantly. We cannot provide any assurances that third-party patents do not exist which might be enforced against our current technology, manufacturing methods, product candidates or future methods or products resulting in either an injunction prohibiting our manufacture or future sales, or, with respect to our future sales, an obligation on our part to pay royalties and/or other forms of compensation to third parties, which could be significant.

Furthermore, our current or our future collaborators' patents may be subject to a reservation of rights by one or more third parties. The U.S. government may have certain rights to resulting intellectual property. When new technologies are developed with U.S. government funding, the U.S. government generally obtains certain rights in any resulting patents, including a non-exclusive license authorizing the U.S. government to use the invention or to have others use the invention on its behalf. The U.S. government's rights may also permit it to disclose the funded inventions and technology to third parties and to exercise march-in rights to use or allow third parties to use the technology developed using U.S. government funding. The U.S. government may exercise its march-in rights if it determines that action is necessary because we fail to achieve the practical application of the government funded technology, or because action is necessary to alleviate health or safety needs, to meet requirements of federal regulations, or to give preference to U.S. industry. In addition, our rights in such inventions may be subject to certain requirements to manufacture products embodying such inventions in facilities in the United States in certain circumstances and if this requirement is not waived. Any exercise by the U.S. government of such rights or by any third-party of its reserved rights could have a material adverse effect on our competitive position, business, financial condition, results of operations and prospects.

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If we fail to comply with our obligations in agreements under which we option or license intellectual property rights from collaborators or licensors or otherwise experience disruptions to our business relationships with future collaborators or licensors, we could lose intellectual property rights that are important to our business.

Our current agreements do and our future agreements may impose various economic, development, diligence, commercialization and other obligations on us. Such agreements may also require us to meet development timelines, or to exercise commercially reasonable efforts to develop and commercialize licensed products. It might be concluded that we have materially breached our obligations under such agreements and licensors or collaborators might therefore terminate or seek damages under the agreements, thereby removing or limiting our ability to develop and commercialize products and technology covered by these agreements. Termination of these agreements could cause us to lose the rights to certain patents or other intellectual property, or the underlying patents could fail to provide the intended exclusivity, and competitors or other third parties may have the freedom to seek regulatory approval of, and to market, products similar to or identical to ours and we may be required to cease our development and commercialization of certain of our product candidates. Any of the foregoing could have a material adverse effect on our competitive position, business, financial conditions, results of operations and growth prospects.

Moreover, disputes may arise regarding intellectual property subject to a collaboration agreement, including:

- the scope of the option or license rights granted under the agreement and other interpretation-related issues;
- the extent to which our technology and processes infringe on intellectual property of the collaborator that is not subject to the option or license rights granted under the agreement;
- the sublicensing of patent and other rights under our collaborative development relationships;
- our diligence obligations under the agreement and what activities satisfy those diligence obligations;
- the inventorship and ownership of inventions and know-how resulting from the joint creation or use of intellectual property by our collaborators and us and our other partners; and
- the priority of invention of patented technology.

We may enter into agreements to option or license intellectual property or technology from third parties that are complex, and certain provisions in such agreements may be susceptible to multiple interpretations. The resolution of any contract interpretation disagreement that may arise could narrow what we believe to be the scope of our rights to the relevant intellectual property or technology, or increase what we believe to be our financial or other obligations under the relevant agreement, either of which could have a material adverse effect on our business, financial condition, results of operations and growth prospects. Moreover, if disputes over intellectual property that we have optioned or licensed prevent or impair our ability to maintain such arrangements on commercially acceptable terms, we may be unable to successfully develop and commercialize the affected product candidates, which could have a material adverse effect on our business, financial conditions, results of operations and growth prospects.

Risks Related to Our Operations

In order to successfully implement our plans and strategies, we will need to grow the size of our organization, and we may experience difficulties in managing this growth.

As of May 31, 2020, we had 24 full-time employees, including 16 employees engaged in research and development. In order to successfully implement our development and commercialization plans and strategies, and as we transition into operating as a public company, we expect to need additional managerial, scientific, technical, medical, operational, sales, marketing, financial and other personnel. Future growth would impose significant added responsibilities on members of management, including:

- identifying, recruiting, integrating, maintaining and motivating additional employees;
- managing our internal development efforts effectively, including the clinical and FDA review process for ALX148 and any other future product candidates, while complying with any contractual obligations to contractors and other third parties we may have; and
- improving our operational, financial and management controls, reporting systems and procedures.

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Our future financial performance and our ability to successfully develop and, if approved, commercialize ALX148 and any other future product candidates will depend, in part, on our ability to effectively manage any future growth, and our management may also have to divert a disproportionate amount of its attention away from day-to-day activities in order to devote a substantial amount of time to managing these growth activities.

We currently rely, and for the foreseeable future will continue to rely, in substantial part on specific independent organizations, advisors and consultants to provide certain services, including substantially all aspects of clinical management and manufacturing. We cannot assure you that the services of independent organizations, advisors and consultants will continue to be available to us on a timely basis when needed, or that we can find qualified replacements. In addition, if we are unable to effectively manage our outsourced activities or if the quality or accuracy of the services provided by third-party service providers is compromised for any reason, our clinical trials may be extended, delayed or terminated, and we may not be able to obtain marketing approval of ALX148 and any other future product candidates or otherwise advance our business. We cannot assure you that we will be able to manage our existing third-party service providers or find other competent outside contractors and consultants on economically reasonable terms, or at all.

If we are not able to effectively expand our organization by hiring new employees and/or engaging additional third-party service providers, we may not be able to successfully implement the tasks necessary to further develop and commercialize ALX148 and other future product candidates and, accordingly, may not achieve our research, development and commercialization goals.

Our product candidates are based on a novel technology, which makes it difficult to predict the time and cost of product candidate development.

We have concentrated our product research and development efforts on our novel immuno-oncology approach, and our future success depends on the successful development of our lead product candidate, ALX148, and any future product candidates that we develop. There can be no assurance that any development problems we experience in the future related to our novel immuno-oncology approach will not cause significant delays or unanticipated costs or that such development problems can be solved. We may also experience delays in developing a sustainable, reproducible and scalable manufacturing process or transferring that process to commercial partners, which may prevent us from completing our clinical trials or commercializing our product candidates on a timely or profitable basis, if at all.

We are highly dependent on our key personnel, and if we are not successful in attracting, motivating and retaining highly qualified personnel, we may not be able to successfully implement our business strategy.

Our ability to compete in the highly competitive biotechnology and life science industries depends upon our ability to attract, motivate and retain highly qualified managerial, scientific and medical personnel. We are highly dependent on our management and our scientific, technical, business and medical personnel. The loss of the services provided by any of our executive officers, other key employees and other scientific and medical advisors, and our inability to find suitable replacements, could result in delays in the development of our product candidates and harm our business.

We conduct our operations at our facility in the San Francisco Bay Area of California, a region that is headquarters to many other biopharmaceutical companies and many academic and research institutions. To succeed, we must recruit, retain, manage and motivate qualified clinical, scientific, manufacturing and sales and marketing personnel, and we face significant competition for experienced personnel. In addition, we will need to expand and effectively manage our managerial, operational, financial, development and other resources in order to successfully pursue our research, development and commercialization efforts for our existing and future product candidates. Furthermore, replacing executive officers and key employees may be difficult and may take an extended period of time because of the limited talent pool in our industry due to the breadth of skills and experience required to successfully develop, gain regulatory approval of and commercialize products. Competition for skilled personnel is intense and the turnover rate can be high, which may limit our ability to hire and retain highly qualified personnel on acceptable terms or at all. We expect that we may need to recruit talent from outside of our region and doing so may be costly and difficult.

Many of the other biotechnology companies that we compete against for qualified personnel have considerably more financial and other resources, different risk profiles and a more extended history in the industry than we do. They

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also may provide more diverse opportunities and better prospects for career advancement. Some of these characteristics may be more appealing to high-quality candidates than what we can offer. We also experience competition for the hiring of scientific and clinical personnel from universities and research institutions. In addition to competition for personnel, the San Francisco Bay Area in particular is characterized by a high cost of living. We could in the future have difficulty attracting experienced personnel to our company and may be required to expend significant financial resources in our employee recruitment and retention efforts. To induce valuable employees to remain at our company, in addition to salary and cash incentives, we have provided equity grants that vest over time. The value to employees of these equity grants that vest over time may be significantly affected by movements in our stock price that are beyond our control and may at any time be insufficient to counteract more lucrative offers from other companies. Although we have employment agreements with our key employees, these employment agreements provide for at-will employment, which means that any of our employees could leave our employment at any time, with or without notice. If we are unable to attract and incentivize quality personnel on acceptable terms, or at all, it may cause our business and operating results to suffer. Our international operations may expose us to business, regulatory, political, operational, financial, pricing and reimbursement risks associated with doing business outside of the United States.

Our predecessor company, which after our reorganization is now our wholly-owned subsidiary, was an Irish private company limited by shares. Our business is subject to risks associated with conducting business internationally. Some of our subsidiaries and operations, in addition to suppliers, industry partners and clinical study centers, are located outside of the United States. Furthermore, our business strategy incorporates potential international expansion as we seek to obtain regulatory approval for, and commercialize, our product candidates in patient populations outside the United States. If approved, we expect to hire sales representatives and conduct physician and patient association outreach activities outside of the United States. Doing business internationally involves a number of risks and complexities, including but not limited to:

- multiple, conflicting and changing laws and regulations such as privacy regulations, tax laws, export and import restrictions, employment laws, regulatory requirements and other governmental approvals, permits and licenses;
- failure by us to obtain and maintain regulatory approvals for the use of our products in various countries;
- rejection or qualification of foreign clinical trial data by the competent authorities of other countries;
- complexities and difficulties in obtaining, maintaining, protecting and enforcing our intellectual property, including as a result of potentially relevant third-party patent rights;
- difficulties in staffing and managing foreign operations;
- complexities associated with managing multiple payor reimbursement regimes, government payors or patient self-pay systems;
- limits in our ability to penetrate international markets;
- financial risks, such as longer payment cycles, difficulty collecting accounts receivable, the impact of local and regional financial crises on demand and payment for our drugs;
- exposure to foreign currency exchange rate fluctuations;
- political and economic instability, including wars, terrorism and political unrest, boycotts, curtailment of trade and other business restrictions;
- natural disasters, outbreaks or public health crises, such as the COVID-19 pandemic;
- certain expenses including, among others, expenses for travel, translation and insurance; and
- regulatory and compliance risks that relate to anti-corruption compliance and record-keeping that may fall within the purview of the FCPA, its accounting provisions or its anti-bribery provisions, or provisions of anti-corruption or anti-bribery laws in other countries.

Any of these factors could harm our future international expansion and operations and, consequently, our results of operations.

If any of the third parties that we rely on for various operational and administrative aspects of our business fail to provide timely, accurate and ongoing service or if the technology systems and infrastructure suffer outages that we are unable to mitigate, our business may be adversely affected.

We currently rely upon third-party consultants and contractors to provide specific operational and administrative services, including research and clinical consultation and management. The failure of any of these third parties to provide accurate and timely service may adversely impact our business operations. In addition, if such third-party service providers were to cease operations, temporarily or permanently, face financial distress or other business disruption, increase their fees or if our relationships with these providers deteriorate, we could suffer increased costs until an equivalent provider could be found, if at all, or we could develop internal capabilities, if ever. In addition, if we are unsuccessful in choosing or finding high-quality partners, if we fail to negotiate cost-effective relationships with them, or if we ineffectively manage these relationships, it could have an adverse impact on our business and financial performance.

Further, our operations depend on the continuing and efficient operation of our information technology, communications systems and infrastructure, and on cloud-based platforms. Any of these systems and infrastructure are vulnerable to damage or interruption from earthquakes, vandalism, sabotage, terrorist attacks, floods, fires, power outages, telecommunications failures, computer viruses or other deliberate attempts to harm the systems. The occurrence of a natural or intentional disaster, any decision to close a facility we are using without adequate notice, or particularly an unanticipated problem at a cloud-based virtual server facility, could result in harmful interruptions in our service, resulting in adverse effects to our business.

We may become exposed to costly and damaging product liability claims, either when testing our product candidates in the clinic or at the commercial stage, and our product liability insurance may not cover all damages from such claims.

We are exposed to potential product liability and professional indemnity risks that are inherent in the research, development, manufacturing, marketing and use of pharmaceutical products. We currently have no products that have been approved for commercial sale. However, the current and future use of product candidates by us in clinical trials and the sale of any approved products in the future, may expose us to liability claims. These claims might be made by patients that use the product, healthcare providers, pharmaceutical companies or others selling such products. In addition, we have agreed to indemnify various counterparties related to our product candidates against certain liability claims and any agreements or collaborations in the future may include such indemnification obligations. Any claims against us, or with respect to which we are obligated to provide indemnification, regardless of their merit, could be difficult and costly to defend or settle and could compromise the market acceptance of our product candidates or any prospects for commercialization of our product candidates, if approved.

Although the clinical trial process is designed to identify and assess potential side effects, it is always possible that a drug, even after regulatory approval, may exhibit unforeseen side effects. If any of our product candidates were to cause adverse side effects during clinical trials or after approval of the product candidate, we may be exposed to substantial liabilities. Physicians and patients may not comply with any warnings that identify known potential adverse effects or that certain patients should not use our drugs for various reasons.

Although we maintain product liability insurance coverage, such insurance may not be adequate to cover all liabilities that we may incur. We may need to increase our insurance coverage each time we commence a clinical trial and if we successfully commercialize any product candidate. As the expense of insurance coverage is increasing, we may not be able to maintain insurance coverage at a reasonable cost or in an amount adequate to satisfy any liability that may arise. If a successful product liability claim or series of claims is brought against us for uninsured liabilities or in excess of insured liabilities, our assets may not be sufficient to cover such claims and our business operations could be impaired. We may expend our limited resources to pursue a particular product candidate or indication and fail to capitalize on product candidates or indications that may be more profitable or for which there is a greater likelihood of success.

Because we have limited financial and managerial resources, we focus on research programs that we identify for specific indications. As a result, we may forego or delay pursuit of opportunities with other product candidates or for other indications that later prove to have greater commercial potential. Our resource allocation decisions may cause

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us to fail to capitalize on viable commercial therapies or profitable market opportunities. Our spending on current and future research and development programs, such as ALX148, for specific indications may not yield any commercially viable products. If we do not accurately evaluate the commercial potential or target market for a particular product candidate, we may relinquish valuable rights to that product candidate through collaboration, licensing or other royalty arrangements in cases in which it would have been more advantageous for us to retain sole development and commercialization rights to such product candidate.

Business disruptions could seriously harm our future revenue and financial condition and increase our costs and expenses.

Our operations, and those of our service providers and suppliers and other contractors and consultants, could be subject to earthquakes, power shortages, telecommunications failures, water shortages, floods, hurricanes, typhoons, fires, extreme weather conditions, medical or public health crises, such as the COVID-19 pandemic, and other natural or man-made disasters or business interruptions, for which we are partly uninsured. The occurrence of any of these business disruptions could seriously harm our operations and financial condition and increase our costs and expenses. We rely on third-party manufacturers to produce and process our product candidates. Our ability to obtain clinical supplies of our product candidates could be disrupted if the operations of these suppliers are affected by a man-made or natural disaster or other business interruption.

The majority of our operations including our corporate headquarters are located in the San Francisco Bay Area in California. Damage or extended periods of interruption to our corporate, development or research facilities due to fire, natural disaster, power loss, communications failure, unauthorized entry or other events could cause us to cease or delay development of some or all of our product candidates. Although we maintain property damage and business interruption insurance coverage on these facilities, our insurance might not cover all losses under such circumstances and our business may be seriously harmed by such delays and interruption.

The COVID-19 pandemic could adversely impact our business including our ongoing and planned clinical trials and preclinical research.

In December 2019, COVID-19 was reported to have surfaced in Wuhan, China, resulting in significant disruptions to Chinese manufacturing and travel. Since then, the virus has spread to numerous other countries, including the United States, resulting in the World Health Organization characterizing COVID-19 as a pandemic. The extent to which the COVID-19 pandemic impacts our business will depend on future developments, which are highly uncertain and cannot be predicted, such as the ultimate geographic spread of the disease, the duration of the outbreak, travel restrictions and social distancing in the United States and other countries, business closures or business disruptions, and the effectiveness of actions taken in the United States and other countries to contain and treat the disease and to address its impact, including on financial markets or otherwise. As the COVID-19 pandemic continues to spread around the globe, we could experience other disruptions that could severely impact our business, current and planned clinical trials and preclinical research, including:

- delays or difficulties in enrolling and retaining subjects in our ongoing clinical trial of ALX148 and our future clinical trials;
- delays or difficulties in clinical site initiation, including difficulties in recruiting clinical site investigators and clinical site staff;
- diversion of healthcare resources away from the conduct of clinical trials, including the diversion of hospitals serving as our clinical trial sites and hospital staff supporting the conduct of clinical trials;
- interruption of key clinical trial activities, such as clinical trial site monitoring, due to limitations on travel imposed or recommended by federal or state governments, employers and others or interruption of clinical trial subject visits and study procedures, which may impact the integrity of subject data and clinical study endpoints;
- limitations in resources, including our employees, that would otherwise be focused on the conduct of our business or our current or planned clinical trials or preclinical research, including because of sickness, the desire to avoid contact with large groups of people, or restrictions on movement or access to our facility as a result of government-imposed “shelter in place” or similar working restrictions;

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- interruptions or delays in the operations of the FDA or other domestic or foreign regulatory authorities, which may impact review and approval timelines;
- delays in receiving the supplies, materials and services needed to conduct clinical trials and preclinical research;
- changes in regulations as part of a response to the COVID-19 pandemic which may require us to change the ways in which our clinical trials are conducted, which may result in unexpected costs or require us to discontinue the clinical trial altogether;
- interruptions or delays to our development pipeline;
- delays in necessary interactions with regulators, ethics committees and other important agencies and contractors due to limitations in employee resources or furlough of government or contractor personnel; and
- refusal of the FDA to accept data from clinical trials in affected geographies outside of the United States.

We are still assessing the impact that COVID-19 may have on our ability to effectively conduct our business operations as planned and there can be no assurance that we will be able to avoid a material impact on our business from the spread of COVID-19 or its consequences, including disruption to our business and downturns in business sentiment generally or in our industry. For example, on March 16, 2020, San Mateo County, where our headquarters are located, issued a “shelter-in-place” order, effective March 17, 2020, and on March 19, 2020, the Executive Department of the State of California issued Executive Order N-33-20, ordering all individuals in the State of California to stay home or at their place of residence except as needed to maintain continuity of operations of the federal critical infrastructure sectors. Our primary operations are located in Burlingame, California. As a result of such county and California state orders, the majority of our employees are currently telecommuting, which may impact certain of our operations over the near term and long term.

Further, as a result of the COVID-19 pandemic, the extent and length of which is uncertain, we may be required to develop and implement additional clinical trial policies and procedures designed to help protect subjects from the COVID-19 virus, which may include using telemedicine visits, remote monitoring of subjects and clinical sites and measures to ensure that data from clinical trials that may be disrupted as a result of the pandemic are collected pursuant to the study protocol and consistent with GCPs, with any material protocol deviation reviewed and approved by the site Institutional Review Board. Subjects who may miss scheduled appointments, any interruption in study drug supply, or other consequences that may result in incomplete data being generated during a clinical trial as a result of the pandemic must be adequately documented and justified. For example, in March 2020, the FDA issued a guidance on conducting clinical trials during the pandemic, which describe a number of considerations for sponsors of clinical trials impacted by the pandemic, including the requirement to include in the clinical trial report contingency measures implemented to manage the trial, and any disruption of the trial as a result of the COVID-19 pandemic; a list of all subjects affected by the COVID-19-pandemic related study disruption by unique subject identifier and by investigational site and a description of how the individual's participation was altered; and analyses and corresponding discussions that address the impact of implemented contingency measures (e.g., participant discontinuation from investigational product and/or study, alternative procedures used to collect critical safety and/or efficacy data) on the safety and efficacy results reported for the trial.

The global outbreak of COVID-19 continues to rapidly evolve. While the extent of the impact of the COVID-19 pandemic on our business and financial results is uncertain, a continued and prolonged public health crisis such as the COVID-19 pandemic could have a material negative impact on our business, financial condition and operating results.

To the extent the COVID-19 pandemic adversely affects our business and financial results, it may also have the effect of heightening many of the other risks described in this section and in this “Risk Factors” section.

We may experience disruptions and delays or incur financial damages as a result of system failures or security breaches.

Despite the implementation of security measures, any of the internal computer systems belonging to us or our third-party service providers are vulnerable to damage from computer viruses, unauthorized access, natural disasters, terrorism, war and telecommunication and electrical failure. Any system failure, accident or security breach that causes interruptions in our own or in third-party service providers' operations could result in a material disruption of our drug discovery and development programs. A system failure or security breach that causes the loss of clinical trial

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data from completed or future clinical trials could result in delays in our regulatory approval efforts and significantly increase our costs in order to recover or reproduce the lost data. In addition, to the extent that any disruption or security breach results in a loss or damage to our data or applications or inappropriate disclosure of confidential or proprietary information, including personal information related to the subjects in our clinical trial, we may incur liability as a result, our drug discovery programs and competitive position may be adversely affected and further development of our product candidates may be delayed. Any such disruption, failure or security breach could also cause us to incur additional costs to remedy the damages that arise from such disruption, failure or security breach.

Our insurance policies may not be adequate to compensate us for the potential losses arising from any such disruption, failure or security breach. In addition, such insurance may not be available to us in the future on economically reasonable terms, or at all. Further, our insurance may not cover all claims made against us and could have high deductibles in any event, and defending a suit, regardless of its merit, could be costly and divert management attention.

We may seek to enter into collaborations, including strategic collaborations, licenses and other similar arrangements related to our product candidates and may not be successful in doing so, and even if we are, we may not be able to maintain or realize the benefits of such relationships. If we are not able to establish future collaborations, we may have to alter some of our future development and commercialization plans and our business could be adversely affected.

We may seek to enter into collaborations, licenses and other similar arrangements for the development or commercialization of our product candidates, due to capital costs required to develop or commercialize the product candidate in such markets. We may not be successful in our efforts to establish such collaborations for our product candidates because our product candidates may be deemed to be at too early of a stage of development for collaborative effort or third parties may not view our product candidates as having the requisite potential to demonstrate safety and efficacy or significant commercial opportunity. Further, any future collaboration agreements may restrict us from entering into additional agreements with potential collaborators. We cannot be certain that, following a strategic transaction or license, we will achieve an economic benefit that justifies such transaction.

Even if we are successful in our efforts to establish such collaborations, the terms that we agree upon may not be favorable to us, and we may not be able to maintain such collaborations if, for example, development or of a product candidate is delayed, the safety of a product candidate is questioned or sales of an approved product are unsatisfactory. We also may not be able to realize the benefit of such collaborations if we are unable to successfully integrate them with our existing operations and company culture. In any such collaborations, we may likely have limited control over the amount and timing of resources that our collaborators dedicate to the development or commercialization of any product candidates we may seek to develop with them. We cannot predict the success of any collaboration that we may enter into.

We face significant competition in seeking appropriate collaborators and a number of more established companies may also be pursuing strategies to license or acquire third-party intellectual property rights that we may consider attractive. These established companies may have a competitive advantage over us due to their size, financial resources and greater clinical development and commercialization capabilities. In addition, companies that perceive us to be a competitor may be unwilling to assign or license rights to us. Whether we reach a definitive agreement for a collaboration will depend, among other things, upon our assessment of the collaborator's resources and expertise, the terms and conditions of the proposed collaboration and the proposed collaborator's evaluation of a number of factors. Those factors may include the design or results of clinical trials, the likelihood of approval by the FDA or similar foreign regulatory authorities, the potential market for the subject product candidate, the costs and complexities of manufacturing and delivering such product candidate to patients, competing products, the existence of uncertainty with respect to our ownership of technology, which can exist if there is a challenge to such ownership without regard to the merits of the challenge and industry and market conditions generally. The collaborator may also consider alternative product candidates or technologies for similar indications that may be available to collaborate on and whether such a collaboration could be more attractive than the one with us for our product candidate. Collaborations are complex and time-consuming to negotiate and document. In addition, there have been a significant number of recent business combinations among large pharmaceutical companies that have resulted in a reduced number of potential future collaborators.

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We may not be able to negotiate further collaborations on a timely basis, on acceptable terms, or at all. We also may find that our programs require the use of proprietary rights held by third parties, and the growth of our business may depend in part on our ability to acquire, in-license or use these proprietary rights. Even if we are able to obtain a license to intellectual property of interest, we may not be able to secure exclusive rights, in which case others could use the same rights and compete with us. Our future collaboration partners may not prioritize our product candidates or otherwise not effectively pursue the development of our product candidates which may delay, reduce or terminate the development of such product candidate, reduce or delay its development program, or delay its potential commercialization. Further, if we are unable to successfully obtain rights to required third-party intellectual property rights or maintain the existing intellectual property rights we have, we may have to delay, reduce or terminate the development of such product candidate, reduce or delay its development program or one or more of our other development programs, delay its potential commercialization or reduce the scope of any sales or marketing activities or increase our expenditures and undertake development or commercialization activities at our own expense. Any of the foregoing factors would likely harm our ability to execute our business plans. If we elect to increase our expenditures to fund development or commercialization activities on our own, we may need to obtain additional capital, which may not be available to us on acceptable terms or at all. If we do not have sufficient funds, we may not be able to further develop our product candidates or bring them to market and generate product revenue.

We may acquire businesses or assets and we may not realize the benefits of such acquisitions.

We may acquire businesses or assets or create joint ventures with third parties that we believe may complement our existing product candidates. We may not be able to realize the benefit of acquiring such businesses or joint ventures if we are not able to successfully integrate them with our existing operations and company culture. We may encounter difficulties in developing, manufacturing and marketing any new product candidates resulting from an acquisition or that delay or prevent us from realizing their expected benefits.

Also, the anticipated benefit of any joint venture or acquisition may not materialize or such joint venture or acquisition may be prohibited. The Loan Agreement which governs our term loan limits our ability to pursue certain mergers, acquisitions, amalgamations or consolidations that we may believe to be in our best interest. Additionally, future acquisitions or dispositions could result in potentially dilutive issuances of our equity securities, the incurrence of debt, contingent liabilities or amortization expenses or write-offs of goodwill, any of which could harm our financial condition. We cannot predict the number, timing or size of future joint ventures or acquisitions, or the effect that any such transactions might have on our operating results.

The terms of our Loan Agreement require us to meet certain operating and financial covenants and place restrictions on our operating and financial flexibility. If we raise additional capital through debt financing, the terms of any new debt could further restrict our ability to operate our business.

The loans under the Loan Agreement are secured by substantially all of our assets, except our intellectual property, which is the subject of a negative pledge. The \$6.0 million in term loans under the Loan Agreement bear interest at a floating per annum interest rate equal to the greater of 7.0% or 2.0% plus the prime rate as reported in The Wall Street Journal. We are required to make interest-only payments for the first 12 months after the closing of the Loan Agreement, followed by consecutive equal monthly payments of principal and interest commencing on January 1, 2021 and continuing through the maturity date of September 1, 2022. The Loan Agreement also provides for a final payment equal to 6.0% multiplied by the aggregate principal amount of the term loans funded, which is due on the maturity date, upon the acceleration of the term loans, or upon prepayment of the term loans. If we elect to prepay the term loans, there is also a prepayment fee of between 1.0% and 3.0% of the principal amount being prepaid depending on the timing and circumstances of prepayment.

The Loan Agreement contains customary affirmative and negative covenants, indemnification provisions and events of default. The affirmative covenants include, among others, covenants requiring us and our subsidiaries to maintain legal existence and good standing, deliver certain financial reports, keep inventory in good and marketable condition, timely file tax returns and reports, maintain insurance, maintain operating accounts and maintain certain intellectual property rights. The negative covenants include, among others, restrictions on transferring or licensing our assets, changing our business, engaging in mergers or acquisitions, incurring additional indebtedness, paying dividends or making other distributions and creating other liens on our assets, in each case subject to customary exceptions.

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If we default under the Loan Agreement, the Lenders will be able to declare all obligations immediately due and payable and take control of our pledged assets, potentially requiring us to renegotiate our agreement on terms less favorable to us or to immediately cease operations. The Lenders could declare a default under the Loan Agreement upon the occurrence of any event that the Lenders interpret as a material adverse change as defined under the Loan Agreement, thereby requiring us to repay the loan immediately or to attempt to reverse the declaration of default through negotiation or litigation. Any declaration by the Lenders of an event of default could significantly harm our business and prospects and could cause the price of our common stock to decline. If we raise any additional debt financing, the terms of such additional debt could further restrict our operating and financial flexibility.

Our ability to utilize our net operating loss carryforwards and certain other tax attributes may be limited.

Under the U.S. Internal Revenue Code of 1986, as amended, if a corporation undergoes an "ownership change" (generally defined as a greater than 50 percentage points change (by value) in the ownership of its equity over a rolling three-year period), the corporation's ability to use its pre-change net operating loss carryforwards and other pre-change tax attributes to offset its post-change income and taxes may be limited. We may have experienced such ownership changes in the past, and we may experience ownership changes in the future as a result of this offering or subsequent shifts in our stock ownership, some of which are outside our control. As of December 31, 2019, we had net operating loss carryforwards for U.S. state income tax purposes of approximately \$30.9 million, and our ability to utilize those net operating loss carryforwards could be limited by an "ownership change" as described above, which could result in increased tax liability to our company.

As of December 31, 2019, we had Irish net operating loss carryforwards of approximately \$4.0 million. These Irish net operating loss carryforwards do not expire but may not be fully utilized unless we generate sufficient income in Ireland. Under Irish law, where a company makes a loss in its trade, it can carry that loss forward to subsequent accounting periods and offset the loss against profits or gains of the same trade. The utilization of carried forward losses is disallowed where (i) the trade that gave rise to the losses is discontinued or (ii) within any period of three years, there is both a change in the ownership of a company and (whether earlier or later in that period or at the same time) a major change in the nature or conduct of a trade carried on by the company or (iii) at any time after the scale of the activities in a trade carried on by a company has become small or negligible and before any considerable revival of the trade, there is a change in ownership of the company. There are no legislative explanations of what constitutes a major change in the nature or conduct of a trade. Relevant case law indicates that there must be a difference in the kind of trade/goods (and not just a quantitative difference) or a major difference in client outlets or markets of the trade but whether there has been a major change in the nature or conduct of a trade is a qualitative matter, and one which is to be judged on the facts of any particular set of circumstances. We may experience ownership changes in the future as a result of this initial public offering and subsequent movements in our share ownership. If we also experience a major change in the nature or conduct of our trade or our trade becomes small or negligible, we may be limited in the amount of loss carryforwards that we can use in the future to offset taxable income for Irish corporation tax purposes. Furthermore, in the event we incur net income in certain jurisdictions but incur losses (or have loss carryforwards) in other jurisdictions, we cannot offset the income from one jurisdiction with the loss from another, which could increase our effective tax rate.

Risks Related to this Offering and Ownership of Our Common Stock

We do not know whether an active, liquid and orderly trading market will develop for our common stock or what the market price of our common stock will be and as a result it may be difficult for you to sell your shares of our common stock.

Prior to this offering, no market for shares of our common stock existed and an active trading market for our shares may never develop or be sustained following this offering. If an active market for our common stock does not continue, it may be difficult for our stockholders to sell their shares without depressing the market price for the shares or sell their shares at or above the prices at which they acquired their shares or sell their shares at the time they would like to sell. The initial public offering price of our common stock will be determined through negotiations between us and the underwriters. The initial public offering price may not be indicative of the market price of our common stock after the offering and the market value of our common stock may decrease from the initial public offering price. Any inactive trading market for our common stock may also impair our ability to raise capital to

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continue to fund our operations by selling shares and may impair our ability to acquire other companies or technologies by using our shares as consideration.

Investors in this offering will pay a much higher price than the book value of our common stock and therefore you will incur immediate and substantial dilution of your investment.

The initial public offering price will be substantially higher than the net tangible book value per common share based on the total value of our tangible assets less our total liabilities immediately following this offering. Therefore, if you purchase common stock in this offering, you will experience immediate and substantial dilution of approximately \$ _____ per share, representing the difference between our pro forma as adjusted net tangible book value per share after giving effect to this offering at an assumed initial public offering price of \$ _____ per share, the midpoint of the price range set forth on the cover page of this prospectus. As of _____ 2020, we had outstanding stock options to purchase _____ shares of our common stock, some of which have exercise prices below the assumed initial public offering price. In addition, following this offering, purchasers in this offering will have contributed approximately _____ % of the total gross consideration paid by stockholders to us to purchase shares of our common stock, but will own only approximately _____ % of the shares of common stock outstanding immediately after this offering. Furthermore, if the underwriters exercise their option to purchase additional shares, or outstanding options and warrants are exercised, you could experience further dilution. For a further description of the dilution that you will experience immediately after this offering, see the section titled "Dilution."

The price of our stock may be volatile, and you could lose all or part of your investment.

You should consider an investment in our common stock as risky and invest only if you can withstand a significant loss and wide fluctuations in the market value of your investment. You may be unable to sell your common stock at or above the initial public offering price due to fluctuations in the market price of our common stock arising from changes in our operating performance or prospects. In addition, the stock market has recently experienced significant volatility, particularly with respect to biotechnology and other life sciences company stocks. The volatility of biotechnology and other life sciences company stocks often does not relate to the operating performance of the companies represented by the stock. Some of the factors that may cause the market price of our common stock to fluctuate or decrease below the price paid in this offering include:

- results and timing of our preclinical studies and clinical trials and studies and trials of our competitors;
- failure or discontinuation of any of our development programs;
- issues in manufacturing our product candidates or any future approved products;
- regulatory developments or enforcement in the United States and foreign countries with respect to our product candidates or our competitors' products;
- competition from existing products or new products that may emerge;
- actual or anticipated changes in our growth and development relative to our competitors;
- developments or disputes concerning patents or other proprietary rights;
- introduction of new product candidates or technological innovations by us or our competitors;
- announcements by us, our future strategic partners or our competitors of significant acquisitions, strategic partnerships, joint ventures or capital commitments;
- actual or anticipated changes in estimates or recommendations by securities analysts, if any cover our common stock;
- fluctuations in the valuation of companies perceived by investors to be comparable to us;
- public concern over our product candidates or any future approved products;
- litigation;
- future sales of our common stock by us, our insiders or our other stockholders;
- expiration of market stand-off or lock-up agreements;
- share price and volume fluctuations attributable to inconsistent trading volume levels of our shares;
- additions or departures of key personnel;

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- changes in the structure of health care payment systems in the United States or overseas;
- failure of any of our product candidates, if approved, to achieve commercial success;
- economic and other external factors such as macroeconomic, disasters, crises or health matters, including the impact of the COVID-19 pandemic;
- period-to-period fluctuations in our financial condition and results of operations, including the timing of payment or receipt of any future milestone or other payments under commercialization or licensing agreements;
- announcements or expectations of additional financing efforts;
- overall fluctuations in U.S. equity markets, general market conditions and market conditions for biotechnology stocks; and
- other factors that may be unanticipated or out of our control.

In addition, in the past, when the market price of a stock has been volatile, holders of that stock have instituted securities class action litigation against the company that issued the stock. If any of our stockholders brought a lawsuit against us, we could incur substantial costs defending the lawsuit and divert the time and attention of our management, which could seriously harm our business.

The realization of any of the above risks or any of a broad range of other risks, including those described in this “Risk Factors” section, could have a dramatic and adverse impact on the market price of our common stock.

Our operating results may fluctuate significantly, which makes our future operating results difficult to predict and could cause our operating results to fall below expectations or our guidance.

Our quarterly and annual operating results may fluctuate significantly in the future, which makes it difficult for us to predict our future operating results. From time to time, we may enter into license or collaboration agreements or strategic partnerships with other companies that include development funding and significant upfront and milestone payments and/or royalties, which may become an important source of our revenue. These upfront and milestone payments may vary significantly from period to period and any such variance could cause a significant fluctuation in our operating results from one period to the next.

In addition, we measure compensation cost for stock-based awards made to employees at the grant date of the award, based on the fair value of the award as determined by our board of directors, and recognize the cost as an expense over the employee's requisite service period. As the variables that we use as a basis for valuing these awards change over time, including, after the closing of this offering, our underlying stock price and stock price volatility, the magnitude of the expense that we must recognize may vary significantly.

Furthermore, our operating results may fluctuate due to a variety of other factors, many of which are outside of our control and may be difficult to predict, including the following:

- the timing and cost of, and level of investment in, research and development activities relating to our current product candidates and any future product candidates and research-stage programs, which will change from time to time;
- our ability to enroll subjects in clinical trials and the timing of enrollment;
- the cost of manufacturing our current product candidates and any future product candidates, which may vary depending on FDA, EMA or other comparable foreign regulatory authority guidelines and requirements, the quantity of production and the terms of our agreements with manufacturers;
- expenditures that we will or may incur to acquire or develop additional product candidates and technologies or other assets;
- the timing and outcomes of clinical trials for ALX148, and any of our other product candidates, or competing product candidates;
- the need to conduct unanticipated clinical trials or trials that are larger or more complex than anticipated;
- competition from existing and potential future products that compete with ALX148 and any of our other product candidates, and changes in the competitive landscape of our industry, including consolidation among our competitors or partners;

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- any delays in regulatory review or approval of ALX148 or any of our other product candidates;
- the level of demand for ALX148 and any of our other product candidates, if approved, which may fluctuate significantly and be difficult to predict;
- the risk/benefit profile, cost and reimbursement policies with respect to our product candidates, if approved, and existing and potential future products that compete with ALX148 and any of our other product candidates;
- our ability to commercialize ALX148 and any of our other product candidates, if approved, inside and outside of the United States, either independently or working with third parties;
- our ability to establish and maintain collaborations, licensing or other arrangements;
- our ability to adequately support future growth;
- potential unforeseen business disruptions that increase our costs or expenses;
- future accounting pronouncements or changes in our accounting policies;
- the COVID-19 pandemic; and
- the changing and volatile global economic and political environment.

The cumulative effect of these factors could result in large fluctuations and unpredictability in our quarterly and annual operating results. As a result, comparing our operating results on a period-to-period basis may not be meaningful. Investors should not rely on our past results as an indication of our future performance. This variability and unpredictability could also result in our failing to meet the expectations of industry or financial analysts or investors for any period. If our revenue or operating results fall below the expectations of analysts or investors or below any forecasts we may provide to the market, or if the forecasts we provide to the market are below the expectations of analysts or investors, the price of our common stock could decline substantially. Such a stock price decline could occur even when we have met any previously publicly stated guidance we may provide.

Sales of a substantial number of shares of our common stock in the public market could cause our stock price to fall.

Sales of a substantial number of shares of our common stock in the public market could occur at any time. These sales, upon the expiration of the market standoff and lock-up agreements, the early release of these agreements, or the perception in the market that the holders of a large number of shares of common stock intend to sell shares, could reduce the market price of our common stock. After this offering and after giving effect to the automatic conversion of all outstanding shares of our convertible preferred stock into _____ shares of our common stock immediately prior to the completion of this offering, we will have shares of common stock outstanding based on _____ shares of our common stock outstanding as of _____, 2020. Of these shares, the shares we are selling in this offering may be resold in the public market immediately, unless purchased by our affiliates. The remaining _____ shares, or _____ % of our outstanding shares after this offering, are currently prohibited without the permission of the underwriters or otherwise restricted under securities laws, market standoff agreements entered into by our stockholders with us or lock-up agreements entered into by our directors, officers and stockholders with the underwriters. However, subject to applicable securities law restrictions and excluding shares of restricted stock that will remain unvested, these shares will be able to be sold in the public market beginning after the 180th day after the date of this prospectus. Shares issued upon the exercise of stock options outstanding under our equity incentive plans or pursuant to future awards granted under those plans will become available for sale in the public market to the extent permitted by the provisions of applicable vesting schedules, any applicable market standoff and lock-up agreements, and Rule 144 and Rule 701 under the Securities Act of 1933, as amended, or Securities Act. See the section titled "Shares Eligible for Future Sale" for additional information.

Moreover, after this offering, holders of an aggregate of _____ shares of our common stock will have rights, subject to conditions, to require us to file registration statements covering their shares or to include their shares in registration statements that we may file for ourselves or other stockholders. We also plan to register all shares of common stock that we may issue under our equity compensation plans. Once we register these shares, they can be freely sold in the public market upon issuance and once vested, subject to volume limitations applicable to affiliates and the lock-up agreements described in the section titled "Underwriting." If any of these additional shares are sold, or if it is perceived that they will be sold, in the public market, the market price of our common stock could decline.

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Our executive officers, directors and the holders of substantially all of our capital stock and securities convertible into or exchangeable for our capital stock have entered into market stand-off agreements with us and lock-up agreements with the underwriters under which they have agreed, subject to specific exceptions described in the section titled “Underwriting,” not to sell, directly or indirectly, any shares of common stock without the permission of Jefferies LLC, Credit Suisse Securities (USA) LLC and Piper Sandler & Co. for a period of 180 days following the date of this prospectus. We refer to such period as the lock-up period. When the lock-up period expires, we and our securityholders subject to a lock-up agreement or market stand-off agreement will be able to sell our shares in the public market. In addition, the underwriters may, in their sole discretion, release all or some portion of the shares subject to lock-up agreements at any time and for any reason. See the description of the market stand-off agreement with us and the lock-up agreement with the underwriters in the section of this prospectus titled “Shares Eligible for Future Sale” for additional information. Sales of a substantial number of such shares upon expiration of the lock-up and market stand-off agreements, the perception that such sales may occur, or early release of these agreements, could cause our market price to fall or make it more difficult for you to sell your common stock at a time and price that you deem appropriate.

If securities or industry analysts do not publish research or publish inaccurate or unfavorable research about our business, our share price and trading volume could decline.

The trading market for our common stock is expected to depend on the research and reports that securities or industry analysts publish about us or our business. We do not have any control over these analysts. We cannot assure you that analysts will cover us or provide favorable coverage. If no or few securities or industry analysts commence coverage of us, the trading price for our stock would be negatively impacted. If one or more of the analysts who cover us downgrade our stock or change their opinion of our common stock, our share price would likely decline. If one or more of these analysts cease coverage of our company or fail to publish reports on us regularly, we could lose visibility in the financial markets, which could cause our share price or trading volume to decline.

We will incur significant increased costs and management resources as a result of operating as a public company.

As a public company, we will incur significant legal, accounting, compliance and other expenses that we did not incur as a private company and these expenses may increase even more after we are no longer an “emerging growth company.” Our management and other personnel will need to devote a substantial amount of time and incur significant expense in connection with compliance initiatives. For example, in anticipation of becoming a public company, we will need to adopt additional internal controls and disclosure controls and procedures, retain a transfer agent and adopt an insider trading policy. As a public company, we will bear all of the internal and external costs of preparing and distributing periodic public reports in compliance with our obligations under the securities laws.

In addition, we anticipate implementing an enterprise resource planning, or ERP, system for our company. An ERP system is intended to combine and streamline the management of our financial, accounting, human resources, sales and marketing and other functions, enabling us to manage operations and track performance more effectively. However, an ERP system would likely require us to complete many processes and procedures for the effective use of the system or to run our business using the system, which may result in substantial costs. Additionally, in the future, we may be limited in our ability to convert any business that we acquire to the ERP. Any disruptions or difficulties in using an ERP system could adversely affect our controls and harm our business, including our ability to forecast or make sales and collect our receivables. Moreover, such disruption or difficulties could result in unanticipated costs and diversion of management attention.

In addition, regulations and standards relating to corporate governance and public disclosure, including the Sarbanes-Oxley Act, or SOX, and the related rules and regulations implemented by the SEC and the Nasdaq Stock Market LLC, or Nasdaq, have increased legal and financial compliance costs and will make some compliance activities more time-consuming. We intend to invest resources to comply with evolving laws, regulations and standards, and this investment will result in increased general and administrative expenses and may divert management’s time and attention from our other business activities. If our efforts to comply with new laws, regulations and standards differ from the activities intended by regulatory or governing bodies due to ambiguities related to practice, regulatory authorities may initiate legal proceedings against us, and our business may be harmed. In connection with this offering, we intend to increase our directors’ and officers’ insurance coverage, which will

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increase our insurance cost. In the future, it may be more expensive or more difficult for us to obtain director and officer liability insurance, and we may be required to accept reduced coverage or incur substantially higher costs to obtain coverage. These factors could also make it more difficult for us to attract and retain qualified members of our board of directors, particularly to serve on our audit committee and compensation committee, and qualified executive officers.

We are an “emerging growth company,” and any decision on our part to comply only with certain reduced reporting and disclosure requirements applicable to emerging growth companies could make our common stock less attractive to investors.

We are an “emerging growth company,” as defined in the Jumpstart Our Business Startups Act of 2012, or the JOBS Act. For as long as we continue to be an emerging growth company, we may choose to take advantage of exemptions from various reporting requirements applicable to other public companies that are not emerging growth companies, including, but not limited to, not being required to comply with the auditor attestation requirements of Section 404(b), reduced disclosure obligations regarding executive compensation in our periodic reports and proxy statements and exemptions from the requirements of holding a nonbinding advisory vote on executive compensation and stockholder approval of any golden parachute payments not previously approved. We could be an “emerging growth company” for up to five years following the completion of this offering, although, if we have more than \$1.07 billion in annual revenue, if the market value of our common stock held by non-affiliates exceeds \$700 million as of June 30 of any year, or we issue more than \$1.0 billion of non-convertible debt over a three-year period before the end of that five-year period, we would cease to be an “emerging growth company” as of the following December 31. Investors could find our common stock less attractive if we choose to rely on these exemptions. In addition, the JOBS Act provides that an emerging growth company can take advantage of an extended transition period for complying with new or revised accounting standards. We have elected to use this extended transition period. As a result, our consolidated financial statements may not be comparable to companies that comply with the new or revised accounting standards as of public company effective dates. If some investors find our common stock less attractive as a result of any of our reliance on these exemptions, there may be a less active trading market for our common stock and our share price may be more volatile.

Our management team will have broad discretion to use the net proceeds from this offering and its investment of these proceeds may not yield a favorable return.

Our management team will have broad discretion in the application of the net proceeds from this offering and could spend or invest the proceeds in ways with which our stockholders disagree. Accordingly, investors will need to rely on our management team’s judgment with respect to the use of these proceeds. We intend to use the proceeds from this offering in the manner described in the section titled “Use of Proceeds.” The failure by management to apply these funds effectively could negatively affect our ability to operate and grow our business. We cannot specify with certainty all of the particular uses for the net proceeds to be received upon the completion of this offering. In addition, the amount, allocation and timing of our actual expenditures will depend upon numerous factors, including any milestone payments received from any future strategic partnerships and royalties on sales of any future approved product. Accordingly, we will have broad discretion in using these proceeds. Until the net proceeds are used, they may be placed in investments that do not produce significant income or that may lose.

Our principal stockholders and management own a significant percentage of our stock and will be able to exert significant control over matters subject to stockholder approval.

Prior to this offering, our executive officers, directors, holders of 5% or more of our capital stock and their respective affiliates beneficially owned approximately 61.6% of our voting stock and, upon the completion of this offering, that same group will beneficially own approximately % of our outstanding voting stock (based on the number of shares of common stock outstanding as of , 2020, assuming no exercise of the underwriters’ option to purchase additional shares, no exercise of outstanding options and no purchases of shares in this offering by any of this group), in each case assuming the conversion of all outstanding shares of our convertible preferred stock into shares of our common stock immediately prior to the completion of this offering. After this offering, this group of stockholders will have the ability to control us through this ownership position even if they do not purchase any additional shares in this offering. These stockholders may be able to determine all matters requiring stockholder

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approval. For example, these stockholders may be able to control elections of directors, amendments of our organizational documents or approval of any merger, sale of assets or other material corporate transaction. This may prevent or discourage unsolicited acquisition proposals or offers for our common stock that you may feel are in your best interest as one of our stockholders. The interests of this group of stockholders may not always coincide with your interests or the interests of other stockholders and they may act in a manner that advances their best interests and not necessarily those of other stockholders, including seeking a premium value for their common stock, and might affect the prevailing market price for our common stock.

We do not anticipate paying cash dividends and, accordingly, stockholders must rely on share appreciation for any return on their investment.

We have never paid any dividends on our capital stock. We currently intend to retain our future earnings, if any, to fund the development and growth of our businesses and do not anticipate that we will declare or pay any cash dividends on our capital stock in the foreseeable future. See the section titled "Dividend Policy." In addition, the Loan Agreement restricts our ability to pay dividends or make other distributions. As a result, capital appreciation, if any, of our common stock will be your sole source of gain on your investment for the foreseeable future. Investors seeking cash dividends should not invest in our common stock.

Raising additional capital may cause dilution to our stockholders, including purchasers of our common stock in this offering, restrict our operations or require us to relinquish substantial rights.

To the extent that we raise additional capital through the sale of equity or convertible debt securities, your ownership interest will be diluted, and the terms of these new securities may include liquidation or other preferences that adversely affect your rights as a common stockholder. Debt financing, if available, may involve fixed payment obligations or agreements that include covenants limiting or restricting our ability to take specific actions such as incurring additional debt, making capital expenditures or declaring dividends. If we raise additional funds through partnerships, collaborations, strategic alliances or licensing arrangements with third parties, we may have to relinquish valuable rights to our technologies, product candidates or future revenue streams, or grant licenses on terms that are not favorable to us. We cannot assure you that we will be able to obtain additional funding if and when necessary. If we are unable to obtain adequate financing on a timely basis, we could be required to delay, scale back or eliminate one or more of our clinical or discovery programs or grant rights to develop and market product candidates that we would otherwise prefer to develop and market ourselves. In addition, we may seek additional capital due to favorable market conditions or strategic considerations even if we believe we have sufficient funds for our current or future operating plans.

Delaware law and provisions in our amended and restated certificate of incorporation and bylaws that will become effective upon the completion of this offering might discourage, delay or prevent a change in control of our company or changes in our management and, therefore, depress the trading price of our common stock.

Provisions in our amended and restated certificate of incorporation and bylaws that will become effective upon the completion of this offering may discourage, delay or prevent a merger, acquisition or other change in control that stockholders may consider favorable, including transactions in which you might otherwise receive a premium for your shares of our common stock. These provisions may also prevent or frustrate attempts by our stockholders to replace or remove our management. Therefore, these provisions could adversely affect the price of our common stock. Among other things, our charter documents will:

- establish that our board of directors is divided into three classes, with each class serving staggered three-year terms;
- provide that vacancies on our board of directors may be filled only by a majority of directors then in office, even though less than a quorum;
- provide that our directors may only be removed for cause;
- eliminate cumulative voting in the election of directors;
- authorize our board of directors to issue shares of convertible preferred stock and determine the price and other terms of those shares, including preferences and voting rights, without stockholder approval;

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- provide our board of directors with the exclusive right to elect a director to fill a vacancy or newly created directorship;
- permit stockholders to only take actions at a duly called annual or special meeting and not by written consent;
- prohibit stockholders from calling a special meeting of stockholders;
- require that stockholders give advance notice to nominate directors or submit proposals for consideration at stockholder meetings;
- authorize our board of directors to amend the bylaws; and
- require the affirmative vote of at least 66 2/3% or more of the outstanding shares of common stock to amend many of the provisions described above.

In addition, Section 203 of the General Corporation Law of the State of Delaware prohibits a publicly-held Delaware corporation from engaging in a business combination with an interested stockholder, generally a person who together with its affiliates owns, or within the last three years has owned, 15% of our voting stock, for a period of three years after the date of the transaction in which the person became an interested stockholder, unless the business combination is approved in a prescribed manner.

Any provision of our amended and restated certificate of incorporation, amended and restated bylaws or Delaware law that has the effect of delaying or preventing a change in control could limit the opportunity for our stockholders to receive a premium for their shares of our capital stock and could also affect the price that some investors are willing to pay for our common stock.

Our amended and restated bylaws that will become effective upon the completion of this offering provide that the Court of Chancery of the State of Delaware and the federal district courts of the United States will be the exclusive forums for substantially all disputes between us and our stockholders, which could limit our stockholders' ability to obtain a favorable judicial forum for disputes with us or our directors, officers or employees.

Our amended and restated bylaws that will become effective upon the completion of this offering provide that the Court of Chancery of the State of Delaware (or, if the Court of Chancery does not have jurisdiction, another State court in Delaware or the federal district court for the District of Delaware) is the exclusive forum for the following (except for any claim as to which such court determines that there is an indispensable party not subject to the jurisdiction of such court (and the indispensable party does not consent to the personal jurisdiction of such court within ten days following such determination), which is vested in the exclusive jurisdiction of a court or forum other than such court or for which such court does not have subject matter jurisdiction):

- any derivative action or proceeding brought on behalf of us;
- any action asserting a claim of breach of a fiduciary duty;
- any action asserting a claim against us arising under the Delaware General Corporation Law, or DGCL, our amended and restated certificate of incorporation or our amended and restated bylaws (as either may be amended from time to time); and
- any action asserting a claim against us that is governed by the internal affairs doctrine.

This provision would not apply to suits brought to enforce a duty or liability created by the Securities Exchange Act of 1934, as amended, or Exchange Act, or any other claim for which the U.S. federal courts have exclusive jurisdiction.

Our amended and restated bylaws further provide that the federal district courts of the United States will be the exclusive forum for resolving any complaint asserting a cause of action arising under the Securities Act.

These exclusive-forum provisions may limit a stockholder's ability to bring a claim in a judicial forum that it finds favorable for disputes with us or our directors, officers or other employees, which may discourage lawsuits against us and our directors, officers and other employees. Any person or entity purchasing or otherwise acquiring any interest in any of our securities shall be deemed to have notice of and consented to these provisions. There is uncertainty as to whether a court would enforce such provisions, and the enforceability of similar choice of forum provisions in other companies' charter documents has been challenged in legal proceedings. It is possible that a court could find

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these types of provisions to be inapplicable or unenforceable, and if a court were to find either exclusive-forum provision in our amended and restated bylaws to be inapplicable or unenforceable in an action, we may incur additional costs associated with resolving the dispute in other jurisdictions, which could seriously harm our business.

We have identified material weaknesses in our internal control over financial reporting. If our remediation measures are not effective, we may not be able to report our financial condition or results of operations accurately or on a timely basis.

To date, we have never conducted a review of our internal control for the purpose of providing the reports required by SOX. During our review and testing, we may identify deficiencies and be unable to remediate them before we must provide the required reports. In connection with the audit of our consolidated financial statements for each of the years ended December 31, 2018 and December 31, 2019, we and our independent registered public accounting firm identified material weaknesses in our internal control over financial reporting resulting from a lack of sufficient qualified personnel. For the year ended December 31, 2018, the material weaknesses related to (i) independent reviews of journal entries not being performed prior to posting, (ii) account reconciliations not being performed and independently reviewed on a timely basis and (iii) lack of independent review of technical accounting matters. For the year ended in December 31, 2019, (i) and (ii) remained unremediated. A material weakness is a deficiency, or a combination of deficiencies, in internal control over financial reporting such that there is a reasonable possibility that a material misstatement of our consolidated financial statements will not be prevented or detected on a timely basis. During the first quarter of 2020, we have undertaken specific remediation actions to address the control deficiencies in our financial reporting. We have established more robust processes related to the review of complex accounting transactions, preparation of account reconciliations and review of journal entries which are outlined elsewhere in this prospectus.

While we have begun taking measures and plan to continue to take measures to design and implement an effective control environment, we cannot assure you that the measures we have taken to date, and are continuing to implement, will be sufficient to remediate or prevent future material weaknesses. If we are unable to successfully maintain internal control over financial reporting, or identify any additional material weaknesses, the accuracy and timing of our financial reporting may be adversely affected. In addition, if we are unable to assert that our internal control over financial reporting is effective, or if our independent registered public accounting firm is unable to express an opinion as to the effectiveness of our internal control over financial reporting, when required, investors may lose confidence in the accuracy and completeness of our financial reports, we may face restricted access to the capital markets, and our stock price may be materially adversely affected. Moreover, we could become subject to investigations by regulatory authorities, which could require additional financial and management resources.

If we fail to maintain an effective system of internal control over financial reporting, we may not be able to accurately report our financial results or prevent fraud, which would harm our business and the trading price of our common stock.

Effective internal controls over financial reporting are necessary for us to provide reliable financial reports and, together with adequate disclosure controls and procedures, are designed to prevent fraud. Any failure to implement required new or improved controls, or difficulties encountered in their implementation, could cause us to fail to meet our reporting obligations. In addition, any testing by us conducted in connection with Section 404(a) of SOX or any subsequent testing by our independent registered public accounting firm in connection with Section 404(b) of SOX, may reveal deficiencies in our internal controls over financial reporting that are deemed to be significant deficiencies or material weaknesses or that may require prospective or retroactive changes to our consolidated financial statements or identify other areas for further attention or improvement. As discussed above, we have identified material weaknesses in the past which we are in the process of remedying. However, our efforts to remediate previous material weaknesses may not be effective or prevent any future deficiency in our internal control over financial reporting. Inferior internal controls could also cause investors to lose confidence in our reported financial information, which could have a negative effect on the trading price of our common stock.

In connection with our evaluation of our internal controls over financial reporting, we expect to upgrade our finance and accounting systems and team. If we are unable to accomplish these objectives in a timely and effective manner, our ability to comply with the financial reporting requirements and other rules that apply to reporting companies could be

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adversely impacted. Any failure to maintain effective internal control over financial reporting could have a material adverse effect on our business, financial condition and results of operations and the trading price of our common stock.

We will be required to disclose material changes made in our internal controls over financial reporting and procedures on a quarterly basis and our management will be required to assess the effectiveness of these controls annually. Beginning with our second annual report on Form 10-K after we become a public company, we will be required to make a formal assessment of the effectiveness of our internal control over financial reporting, and once we cease to be an emerging growth company, we will be required to include an attestation report on internal control over financial reporting issued by our independent registered public accounting firm. However, for as long as we are an “emerging growth company” under the JOBS Act, our independent registered public accounting firm will not be required to attest to the effectiveness of our internal controls over financial reporting pursuant to Section 404(b).

To achieve compliance with Section 404(a) within the prescribed period, we will be engaging in a process to document and evaluate our internal control over financial reporting, which is both costly and challenging. In this regard, we will need to continue to dedicate internal resources, potentially engage outside consultants and adopt a detailed work plan to assess and document the adequacy of our internal control over financial reporting, continue steps to improve control processes as appropriate, validate through testing that controls are designed and operating effectively and implement a continuous reporting and improvement process for internal control over financial reporting.

We could be an “emerging growth company” for up to five years. An independent assessment of the effectiveness of our internal controls could detect problems that our management’s assessment might not identify. Undetected material weaknesses in our internal controls could lead to consolidated financial statement restatements and require us to incur the expense of remediation.

Our disclosure controls and procedures may not prevent or detect all errors or acts of fraud.

Upon the closing of this offering, we will become subject to the periodic reporting requirements of the Exchange Act. We designed our disclosure controls and procedures to reasonably assure that information we must disclose in reports we file or submit under the Exchange Act is accumulated and communicated to management, and recorded, processed, summarized and reported within the time periods specified in the rules and forms of the SEC. We believe that any disclosure controls and procedures or internal controls and procedures, no matter how well-conceived and operated, can provide only reasonable, not absolute, assurance that the objectives of the control system are met.

These inherent limitations include the facts that judgments in decision-making can be faulty and that breakdowns can occur because of simple error or mistake. Additionally, controls can be circumvented by the individual acts of some persons, by collusion of two or more people or by an unauthorized override of the controls. Accordingly, because of the inherent limitations in our control system, misstatements due to error or fraud may occur and not be detected.

Participation in this offering by our existing stockholders and/or their affiliated entities may reduce the public float for our common stock.

To the extent certain of our existing stockholders and their affiliated entities participate in this offering, such purchases would reduce the non-affiliate public float of our shares, meaning the number of shares of our common stock that are not held by officers, directors and controlling stockholders. A reduction in the public float could reduce the number of shares that are available to be traded at any given time, thereby adversely impacting the liquidity of our common stock and depressing the price at which you may be able to sell shares of common stock purchased in this offering.

We are organized in a holding company structure and we are, and will be, dependent upon the results of operations and cash flows of our subsidiaries and distributions we receive from our subsidiaries.

ALX Oncology Holdings Inc. is a holding company that currently has no material assets other than cash and our ownership of all of the equity issued by ALX Oncology Limited. As such, ALX Oncology Holdings Inc. will have no independent means of generating revenue or cash flow, and our ability to pay our taxes and operating expenses or declare and pay dividends in the future, if any, will be dependent upon the results of operations and cash flows of

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ALX Oncology Limited and its consolidated subsidiaries, including any distributions we receive from ALX Oncology Limited. There can be no assurance that our direct and indirect subsidiaries will generate sufficient cash flow to distribute funds to us or that applicable law and contractual restrictions, such as negative covenants in any debt instruments, will permit such distributions. In addition, in the event that the board of directors and stockholders of ALX Oncology Holdings Inc. were to approve a sale of all of our equity in ALX Oncology Limited or any of our other indirect subsidiaries, your equity interest would be in a holding company with no material assets other than those assets and other consideration received in such transaction.

We may be subject to securities litigation, which is expensive and could divert management attention.

The market price of our common stock may be volatile and, in the past, companies that have experienced volatility in the market price of their stock have been subject to securities class action litigation. We may be the target of this type of litigation in the future. Securities litigation against us could result in substantial costs and divert our management's attention from other business concerns, which could seriously harm our business.

SPECIAL NOTE REGARDING FORWARD-LOOKING STATEMENTS

This prospectus contains forward-looking statements. All statements other than statements of historical facts contained in this prospectus, including statements regarding our future results of operations and financial position, business strategy, product candidates, planned preclinical studies and clinical trials, results of clinical trials, research and development costs, regulatory approvals, timing and likelihood of success, as well as plans and objectives of management for future operations, are forward-looking statements. These statements involve known and unknown risks, uncertainties and other important factors that are in some cases beyond our control and may cause our actual results, performance or achievements to be materially different from any future results, performance or achievements expressed or implied by the forward-looking statements.

In some cases, you can identify forward-looking statements by terms such as “may,” “will,” “should,” “would,” “expect,” “plan,” “anticipate,” “could,” “intend,” “target,” “project,” “believe,” “estimate,” “predict,” “potential,” or “continue” or the negative of these terms or other similar expressions. Forward-looking statements contained in this prospectus include, but are not limited to, statements about:

- our financial performance;
- the sufficiency of our existing cash to fund our future operating expenses and capital expenditure requirements;
- the accuracy of our estimates regarding expenses, future revenue, capital requirements, and needs for additional financing;
- our plans relating to commercializing our product candidates, if approved, including the geographic areas of focus and our ability to grow a sales team;
- the implementation of our strategic plans for our business and product candidates;
- the size of the market opportunity for our product candidates in each of the diseases we target;
- our ability to obtain and maintain regulatory approval of our product candidates and the timing or likelihood of regulatory filings and approvals, including our expectation to seek special designations, such as orphan drug designation, for our product candidates for various diseases;
- the beneficial characteristics, safety, efficacy and therapeutic effects of our product candidates;
- our estimates of the number of patients in the United States who suffer from the diseases we target and the number of subjects that will enroll in our clinical trials;
- the progress and focus of our current and future clinical trials, and the reporting of data from those trials;
- our ability to advance product candidates into and successfully complete clinical trials;
- the ability of our clinical trials to demonstrate the safety and efficacy of our product candidates, and other positive results;
- the success of competing therapies that are or may become available;
- developments relating to our competitors and our industry, including competing product candidates and therapies;
- our plans relating to the further development and manufacturing of our product candidates, including additional indications that we may pursue;
- existing regulations and regulatory developments in the United States and other jurisdictions;
- our potential and ability to successfully manufacture and supply our product candidates for clinical trials and for commercial use, if approved;
- our continued reliance on third parties to conduct additional clinical trials of our product candidates, and for the manufacture of our product candidates;
- our plans and ability to obtain or protect intellectual property rights, including extensions of existing patent terms where available;
- the scope of protection we are able to establish and maintain for intellectual property rights, including our technology platform and product candidates;

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- our ability to retain the continued service of our key personnel and to identify, hire, and then retain additional qualified personnel;
- our expectations regarding the impact of the COVID-19 pandemic on our business;
- our expectations regarding the period during which we will qualify as an emerging growth company under the JOBS Act; and
- our anticipated use of our existing cash and cash equivalents and the proceeds from this offering.

We have based these forward-looking statements largely on our current expectations and projections about our business, the industry in which we operate and financial trends that we believe may affect our business, financial condition, results of operations and prospects, and these forward-looking statements are not guarantees of future performance or development. These forward-looking statements speak only as of the date of this prospectus and are subject to a number of risks, uncertainties and assumptions described in the section titled "Risk Factors" and elsewhere in this prospectus. Because forward-looking statements are inherently subject to risks and uncertainties, some of which cannot be predicted or quantified, you should not rely on these forward-looking statements as predictions of future events. The events and circumstances reflected in our forward-looking statements may not be achieved or occur and actual results could differ materially from those projected in the forward-looking statements. Except as required by applicable law, we do not plan to publicly update or revise any forward-looking statements contained herein until after we distribute this prospectus, whether as a result of any new information, future events or otherwise.

In addition, statements that "we believe" and similar statements reflect our beliefs and opinions on the relevant subject. These statements are based upon information available to us as of the date of this prospectus, and while we believe such information forms a reasonable basis for such statements, such information may be limited or incomplete, and our statements should not be read to indicate that we have conducted an exhaustive inquiry into, or review of, all potentially available relevant information. These statements are inherently uncertain, and you are cautioned not to unduly rely upon these statements.

MARKET, INDUSTRY AND OTHER DATA

This prospectus contains estimates, projections and other information concerning our industry, our business and the markets for our product candidates, including data regarding the estimated size of such markets and the incidence of certain medical conditions. We obtained the industry, market and similar dataset forth in this prospectus from our internal estimates and research and from academic and industry research, publications, surveys and studies conducted by third parties, including governmental agencies. In some cases, we do not expressly refer to the sources from which this information is derived. In that regard, when we refer to one or more sources of this type of information in any paragraph, you should assume that other information of this type appearing in the same paragraph is derived from the same sources, unless otherwise expressly stated or the context otherwise requires. Information that is based on estimates, forecasts, projections, market research or similar methodologies is inherently subject to uncertainties and actual events or circumstances may differ materially from events and circumstances that are assumed in this information. While we believe that the data we use from third parties are reliable, we have not separately verified these data. Further, while we believe our internal research is reliable, such research has not been verified by any third party. You are cautioned not to give undue weight to any such information, projections and estimates.

USE OF PROCEEDS

We estimate that the net proceeds from our issuance and sale of shares of our common stock in this offering will be approximately \$ million, or approximately \$ million if the underwriters exercise their option to purchase additional shares in full, based on an initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us.

Each \$1.00 increase or decrease in the assumed initial public offering price of \$ per share would increase or decrease, as applicable, the aggregate net proceeds to us from this offering by approximately \$ million, assuming the number of shares offered by us, as set forth on the cover page of this prospectus, remains the same and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. Similarly, each increase or decrease of 1.0 million shares in the number of shares offered by us would increase or decrease, as applicable, the net proceeds to us from this offering by approximately \$ million, assuming that the assumed initial public offering price remains the same, and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. We do not expect that a change in the initial public offering price or the number of shares by these amounts would have a material effect on our uses of the proceeds from this offering, although it may change the time at which we will need to seek additional capital.

The principal purposes of this offering are to obtain additional capital to support our operations, establish a public market for our common stock and facilitate our future access to the public capital markets.

We currently intend to use the net proceeds, together with our existing cash and cash equivalents, from the offering as follows:

- approximately \$ million to \$ million to advance the clinical development of ALX148 through completion of our existing Phase 1b clinical trials in HNSCC and gastric/GEJ cancer;
- approximately \$ million to \$ million to advance the clinical development of ALX148 through initiation and completion of our Phase 1b/2 combination clinical trial in MDS;
- approximately \$ million to \$ million to advance the clinical development of ALX148 through initiation and completion of our Phase 1b/2 combination clinical trial in AML;
- approximately \$ million to \$ million for manufacturing activities related to chemistry, manufacturing and controls, or CMC, activities;
- approximately \$ million to \$ million to advance the clinical development of ALX148 through initiation and completion of our Phase 2 combination clinical trials in HNSCC and gastric/GEJ cancer or alternative Phase 2 indications if there are compelling clinical data; and
- the remainder for working capital and other general corporate purposes.

Our expected use of proceeds from this offering represents our current intentions based on our present plans and business condition. As of the date of this prospectus, we cannot predict with certainty all of the particular uses for the proceeds to be received upon the completion of this offering or the actual amounts that we will spend on the uses set forth above. We may also use a portion of the proceeds to in-license, acquire or invest in additional businesses, technologies, products or assets. Although we have no specific agreements, commitments or understandings with respect to any in-licensing activity or acquisition, we evaluate these opportunities and engage in related discussions with other companies from time to time.

The net proceeds from this offering, together with our existing cash and cash equivalents, will not be sufficient for us to fund our clinical programs, and we will need to raise additional capital to achieve our business objectives. Based on current business plans, we believe that the net proceeds from this offering, together with our existing cash and cash equivalents, will be sufficient to fund our planned operations for at least the next months.

The amount and timing of our actual expenditures will depend on numerous factors, including the results of our research and development efforts, the timing and outcome of any ongoing or future preclinical studies and clinical trials the timing and outcome of regulatory submissions and any unforeseen cash needs. As a result, our management will have broad discretion over the use of the proceeds from this offering.

Pending their uses, we plan to invest the net proceeds of this offering in short-term, interest-bearing, investment-grade instruments, certificates of deposit or direct or guaranteed obligations of the U.S. government.

DIVIDEND POLICY

We have not declared or paid any cash dividends on our capital stock since our inception. We intend to retain future earnings, if any, to finance the operation and expansion of our business and do not anticipate paying any cash dividends in the foreseeable future. Payment of future cash dividends, if any, will be at the discretion of our board of directors after taking into account various factors, including our financial condition, operating results, current and anticipated cash needs, the requirements and contractual restrictions of then-existing debt instruments and other factors that our board of directors deems relevant. In addition, the terms of our Loan Agreement place certain limitations on the amount of cash dividends we can pay.

CAPITALIZATION

The following table sets forth our cash and cash equivalents and our capitalization as of March 31, 2020:

- on an actual basis;
- on a pro forma basis to give effect to:
 - the automatic conversion of all of our outstanding shares of convertible preferred stock into an aggregate of 154,917,050 shares of common stock upon the completion of this offering as if such conversion had occurred on March 31, 2020;
 - warrants to purchase an aggregate of 403,348 shares of our convertible preferred stock that were outstanding as of March 31, 2020 that will be converted into warrants to purchase an aggregate of 403,348 shares of our common stock, with an exercise price of \$1.4432 per share and the reclassification of our convertible preferred stock warrant liability to additional paid-in capital immediately prior to the completion of this offering;
 - the filing and effectiveness of our amended and restated certificate of incorporation, which will occur immediately prior to the completion of this offering; and
- on a pro forma as adjusted basis, to give effect to:
 - the pro forma adjustments set forth above; and
 - the sale and issuance of _____ shares of our common stock by us in this offering, based upon the assumed initial public offering price of \$ _____ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, after deducting underwriting discounts and commissions and estimated offering expenses payable by us.

The pro forma as adjusted information set forth in the table below is illustrative only and will be adjusted based on the actual initial public offering price and other terms of this offering determined at pricing.

You should read this information in conjunction with our consolidated financial statements and the related notes and the sections titled “Selected Consolidated Financial Data” and “Management’s Discussion and Analysis of Financial Condition and Results of Operations” that are included elsewhere in this prospectus.

| | AS OF MARCH 31, 2020 | | |
|---|--|--------------------------|--|
| | ACTUAL | PRO FORMA (unaudited) | PRO FORMA AS ADJUSTED ⁽¹⁾ |
| | (in thousands, except share and per share amounts) | | |
| Cash and cash equivalents | \$105,035 | \$ 105,035 | \$ — |
| Convertible preferred stock warrant liability | \$ 447 | \$ — | \$ — |
| Term loan | 5,529 | 5,529 | |
| Convertible preferred stock, par value \$0.001 per share; 141,231,241 shares authorized, 140,626,218 shares issued and outstanding, actual; no shares authorized, issued or outstanding, pro forma and pro forma as adjusted | 175,043 | — | |
| Stockholders' deficit: | | | |
| Common stock, par value \$0.001 per share; 10,000,000,000 shares authorized, 20,840,532 shares issued and outstanding, actual; 10,000,000,000 shares authorized, 175,757,582 shares issued and outstanding, pro forma, _____ shares issued and outstanding, pro forma as adjusted | 21 | 176 | |
| Additional paid-in capital | 2,289 | 192,356 | |
| Accumulated deficit | (78,236) | (92,968) | |
| Total stockholders' deficit | (75,926) | 99,564 | |
| Total capitalization | \$ 99,117 | \$ 99,564 | \$ — |

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- (1) Each \$1.00 increase or decrease in the assumed initial public offering price of \$ _____ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, would increase or decrease, as applicable, our cash and cash equivalents, additional paid-in capital, total stockholders' equity (deficit) and total capitalization by approximately \$ _____ million, assuming that the number of shares of our common stock offered by us, as set forth on the cover page of this prospectus, remains the same and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. Similarly, each increase or decrease of 1.0 million shares in the number of shares offered by us would increase or decrease, as applicable, the amount of our cash and cash equivalents and total stockholders' equity (deficit) by approximately \$ _____ million, based upon the assumed initial public offering price of \$ _____ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us.

The number of shares of our common stock to be outstanding after this offering, pro forma and pro forma as adjusted in the table above, is based on _____ shares of our common stock outstanding as of March 31, 2020 (including _____ shares of common stock that are subject to a right of repurchase and our convertible preferred stock on an as-converted basis), and excludes:

- 21,063,923 shares of common stock issuable upon exercise of options outstanding as of March 31, 2020, at a weighted-average exercise price of \$0.47 per share;
- 4,150,000 shares of common stock issuable upon exercise of options granted after March 31, 2020, at a weighted-average exercise price of \$0.75 per share;
- warrants to purchase an aggregate of 403,348 shares of our convertible preferred stock that were outstanding as of March 31, 2020 that will be converted into warrants to purchase an aggregate of 403,348 shares of our common stock, with an exercise price of \$1.4432 per share; and
- 1,277,036 shares of common stock reserved for issuance pursuant to future awards under our 2020 Plan, including the amendment thereto that will become effective in connection with this offering, and any additional shares that become available under our 2020 Plan pursuant to provisions thereof that automatically increase the share reserve under the plan each year.

DILUTION

If you invest in our common stock in this offering, your ownership interest will be diluted immediately to the extent of the difference between the initial public offering price per share of our common stock and the pro forma as adjusted net tangible book value per share of our common stock immediately after this offering.

Our historical net tangible book value (deficit) as of March 31, 2020 was (\$75.9 million), or \$(3.64) per share of our common stock. Our historical net tangible book value (deficit) is the amount of our total assets less our total liabilities and convertible preferred stock, which is not included in our stockholders' deficit. Historical net tangible book value per share represents historical net tangible book value (deficit) divided by the number of shares of our common stock outstanding as of March 31, 2020 (including _____ shares of common stock that are subject to a right of repurchase).

Our pro forma net tangible book value as of March 31, 2020 was \$99.6 million, or \$0.57 per share of our common stock. Pro forma net tangible book value represents the amount of our total assets less our total liabilities, after giving effect to the reclassification of our convertible preferred stock warrant liability to additional paid-in capital immediately prior to the completion of this offering and the conversion of all outstanding shares of our convertible preferred stock into an aggregate of 154,917,050 shares of common stock upon the completion of this offering. Pro forma net tangible book value per share represents pro forma net tangible book value divided by the total number of shares outstanding as of March 31, 2020, after giving effect to the conversion of all outstanding shares of our convertible preferred stock into an aggregate of 175,757,582 shares of our common stock upon the completion of this offering (including _____ shares issuable upon conversion of our convertible preferred stock).

After giving further effect to our sale of _____ shares of common stock in this offering at the assumed initial public offering price of \$ _____ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, and after deducting the underwriting discounts and commissions and estimated offering expenses payable by us, our pro forma as adjusted net tangible book value as of March 31, 2020 would have been approximately \$ _____ million, or approximately \$ _____ per share. This represents an immediate increase in pro forma as adjusted net tangible book value of \$ _____ per share to our existing stockholders and an immediate dilution in pro forma as adjusted net tangible book value of approximately \$ _____ per share to new investors purchasing common stock in this offering. Dilution per share to new investors purchasing common stock in this offering is determined by subtracting pro forma as adjusted net tangible book value per share after this offering from the assumed initial public offering price per share paid by new investors.

The following table illustrates this dilution on a per share basis:

| | | | |
|--|--|----------|---|
| Assumed initial public offering price per share | | \$ | — |
| Historical net tangible book value (deficit) per share as of March 31, 2020 | | \$(3.64) | |
| Pro forma increase in net tangible book value (deficit) per share as of March 31, 2020 | | | |
| Pro forma net tangible book value (deficit) per share as of March 31, 2020 | | | |
| Increase in pro forma net tangible book value per share attributable to investors purchasing shares in this offering | | | |
| Pro forma as adjusted net tangible book value per share after this offering | | | |
| Dilution per share to new investors purchasing shares in this offering | | \$ | — |

Each \$1.00 increase or decrease in the assumed initial public offering price of \$ _____ per share, the midpoint of the estimated offering price range set forth on the cover page of this prospectus, would increase or decrease, as applicable, our pro forma as adjusted net tangible book value as of March 31, 2020 after this offering by approximately \$ _____ million, or approximately \$ _____ per share, and would decrease (increase) dilution to investors in this offering by approximately \$ _____ per share, assuming that the number of shares offered by us,

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as set forth on the cover page of this prospectus, remains the same, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. We may also increase or decrease the number of shares we are offering. An increase or decrease of 1.0 million in the number of shares we are offering would increase or decrease, as applicable, our pro forma as adjusted net tangible book value as of March 31, 2020 after this offering by approximately \$ million, or approximately \$ per share, and would decrease or increase, as applicable, dilution to investors in this offering by approximately \$ per share, assuming the assumed initial public offering price per share remains the same, after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. The pro forma as adjusted information is illustrative only, and we will adjust this information based on the actual initial public offering price and other terms of this offering determined at pricing.

If the underwriters fully exercise their option to purchase additional shares of common stock at the assumed initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover of this prospectus, assuming the number of shares offered by us as set forth on the cover page of this prospectus remains the same, and after deducting underwriting discounts and commissions and estimated offering expenses payable by us, pro forma as adjusted net tangible book value after this offering would increase to approximately \$ per share, and there would be an immediate dilution of approximately \$ per share to new investors.

The following table summarizes, on a pro forma as adjusted basis, as of March 31, 2020, the difference between the number of shares of common stock purchased from us (on an as converted to common stock basis), the total consideration paid, and the weighted-average price per share paid, by existing stockholders and by new investors in this offering, assuming an initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, and before deducting underwriting discounts and commissions and estimated offering expenses payable by us.

| | SHARES PURCHASED | | TOTAL CONSIDERATION | | AVERAGE PRICE |
|--|------------------|---------|---------------------|---------|---------------|
| | NUMBER | PERCENT | AMOUNT | PERCENT | PER SHARE |
| Existing stockholders before this offering | | % | \$ — | % | \$ — |
| Investors participating in this offering | | | | | \$ — |
| Total | | 100% | \$ — | 100% | |

The table above assumes no exercise of the underwriters' option to purchase additional shares in this offering. If the underwriters' option to purchase additional shares is exercised in full, the number of shares of our common stock held by existing stockholders would be reduced to % of the total number of shares of our common stock outstanding after this offering, and the number of shares of common stock held by new investors participating in the offering would be increased to % of the total number of shares outstanding after this offering.

Each \$1.00 increase or decrease in the assumed initial public offering price of \$ per share, which is the midpoint of the price range set forth on the cover page of this prospectus, would increase or decrease, as applicable, the total consideration paid by new investors by \$ million, assuming that the number of shares offered by us, as set forth on the cover page of this prospectus, remains the same and after deducting the underwriting discounts and commissions payable by us. Similarly, an increase or decrease of 1.0 million shares in the number of shares offered by us would increase or decrease, as applicable, the total consideration paid by new investors by \$ million, assuming no change in the assumed initial public offering price and after deducting the underwriting discounts and commissions payable by us.

The foregoing tables and calculations (other than the historical net tangible book value calculations) are based on shares of our common stock outstanding as of March 31, 2020 (including shares of common stock that are subject to a right of repurchase and our convertible preferred stock on an as-converted basis), and excludes:

- 21,063,923 shares of common stock issuable upon exercise of options outstanding as of March 31, 2020, at a weighted-average exercise price of \$0.47 per share;

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- 4,150,000 shares of common stock issuable upon exercise of options granted after March 31, 2020, at a weighted-average exercise price of \$0.75 per share;
- warrants to purchase an aggregate of 403,348 shares of our convertible preferred stock that were outstanding as of March 31, 2020 that will be converted into warrants to purchase an aggregate of 403,348 shares of our common stock, with an exercise price of \$1.4432 per share; and
- 1,277,036 shares of common stock reserved for issuance pursuant to future awards under our 2020 Plan, including the amendment thereto that will become effective in connection with this offering, and any additional shares that become available under our 2020 Plan pursuant to provisions thereof that automatically increase the share reserve under the plan each year.

To the extent that any outstanding options are exercised or new options are issued under the equity benefit plans, the warrants described above are exercised or we issue additional shares of common stock or convertible securities in the future, there will be further dilution to investors participating in this offering.

SELECTED CONSOLIDATED FINANCIAL DATA

The following tables set forth our selected consolidated financial data for the periods and as of the dates indicated. We derived our consolidated statements of operations and comprehensive loss data for the years ended December 31, 2018 and December 31, 2019, and our consolidated balance sheet data as of December 31, 2018 and December 31, 2019, from our audited consolidated financial statements included elsewhere in this prospectus. The consolidated statements of operations and comprehensive loss data for the three months ended March 31, 2019 and March 31, 2020, and the consolidated balance sheet data as of March 31, 2020 have been derived from our unaudited interim condensed consolidated financial statements included elsewhere in this prospectus. In our opinion, these unaudited interim condensed consolidated financial statements have been prepared on a basis consistent with our audited consolidated financial statements and contain all adjustments, consisting only of normal and recurring adjustments, necessary for a fair presentation of such consolidated financial data. Our historical results are not necessarily indicative of the results that may be expected in the future. You should read the following selected consolidated financial data in conjunction with our consolidated financial statements and related notes included elsewhere in this prospectus and the information in the section titled "Management's Discussion and Analysis of Financial Condition and Results of Operations."

| Consolidated Statements of Operations and Comprehensive Loss Data: | YEAR ENDED DECEMBER 31, | | THREE MONTHS ENDED MARCH 31, | |
|--|---|-------------|---------------------------------|-------------|
| | 2018 | 2019 | 2019 | 2020 |
| | (in thousands, except share and per share amounts) (unaudited) | | | |
| Related-party revenue | \$ 2,067 | \$ 4,796 | \$ 1,032 | \$ 655 |
| Operating expenses: | | | | |
| Research and development | 11,270 | 16,306 | 3,733 | 3,828 |
| General and administrative | 2,601 | 3,313 | 588 | 1,473 |
| Cost of services for related-party revenue | 1,880 | 4,360 | 938 | 596 |
| Total operating expenses | 15,751 | 23,979 | 5,259 | 5,897 |
| Loss from operations | (13,684) | (19,183) | (4,227) | (5,242) |
| Interest expense | — | (21) | — | (215) |
| Other income (expense), net | (2) | (5) | (2) | 7 |
| Loss before income taxes | (13,686) | (19,209) | (4,229) | (5,450) |
| Income tax provision | (45) | (34) | (9) | (4) |
| Net loss and comprehensive loss | (13,731) | (19,243) | (4,238) | (5,454) |
| Cumulative dividends allocated to preferred shareholders | (3,671) | (4,028) | (905) | (1,983) |
| Net loss attributable to ordinary shareholders | \$ (17,402) | \$ (23,271) | \$ (5,143) | \$ (7,437) |
| Net loss per share attributable to ordinary shareholders, basic and diluted | \$ (0.96) | \$ (1.15) | \$ (0.26) | \$ (0.36) |
| Weighted-average shares used to compute net loss per share attributable to ordinary shareholders, basic and diluted | 18,102,402 | 20,245,115 | 19,749,549 | 20,684,025 |
| Pro forma net loss attributable to ordinary shareholders, basic and diluted (unaudited)(1) | | \$ (0.20) | | \$ (0.04) |
| Weighted-average shares used to compute pro forma net loss per share attributable to ordinary shareholders, basic and diluted (unaudited)(1) | | 94,274,058 | | 144,442,583 |

(1) See Note 12 to our audited consolidated financial statements and Note 8 to our unaudited interim condensed consolidated financial statements included elsewhere in this prospectus for an explanation of the method used to calculate historical and pro forma basic and diluted net loss per share, and the weighted-average number of shares used in the computation of the per share amounts and unaudited pro forma information.

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| | <u>AS OF DECEMBER 31,</u> | | <u>AS OF</u> |
|---|---------------------------|-------------|--------------------|
| | <u>2018</u> | <u>2019</u> | <u>MARCH 31,</u> |
| | | | <u>2020</u> |
| | | | <u>(unaudited)</u> |
| | (in thousands) | | |
| Consolidated Balance Sheet Data: | | | |
| Cash and cash equivalents | \$ 8,262 | \$ 9,017 | \$ 105,035 |
| Working capital ⁽¹⁾ | 8,335 | 4,825 | 103,423 |
| Total assets | 11,164 | 10,676 | 108,399 |
| Total liabilities | 2,009 | 10,952 | 9,282 |
| Convertible preferred shares | 60,933 | 70,363 | 175,043 |
| Accumulated deficit | (53,539) | (72,782) | (78,236) |
| Total shareholders' deficit | (51,778) | (70,639) | (75,926) |

(1) We define working capital as current assets less current liabilities. See our consolidated financial statements for further details regarding our current assets and current liabilities.

MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

You should read the following discussion of our financial condition and results of operations together with the section titled "Selected Consolidated Financial Data" and our consolidated financial statements and related notes included elsewhere in this prospectus. Some of the information contained in this discussion and analysis or set forth elsewhere in this prospectus, including information with respect to our plans and strategy for our business, include forward-looking statements that involve risks and uncertainties. Our actual results could differ materially from those anticipated in these forward-looking statements as a result of various factors, including those set forth under "Risk Factors" and elsewhere in this prospectus.

Overview

We are a clinical-stage immuno-oncology company focused on helping patients fight cancer by developing therapies that block the CD47 checkpoint pathway and bridge the innate and adaptive immune system. Cancer cells leverage CD47, a cell surface protein, as a "don't eat me" signal, to evade detection by the immune system. Our company is developing a next-generation checkpoint inhibitor designed to have a high affinity for CD47 and to avoid the limitations caused by hematologic toxicities inherent in other CD47 blocking approaches. We believe our lead product candidate, ALX148, will have a wide therapeutic window to block the "don't eat me" signal on cancer cells, and to leverage the immune activation of broadly used anti-cancer agents through combination strategies. We have dosed over 150 subjects with ALX148 across a range of hematologic and solid malignancies in combination with a number of leading anti-cancer agents. We intend to advance ALX148 into clinical development for the treatment of MDS and AML and to continue clinical development for the treatment of solid tumors. Based on our clinical results to date in multiple oncology indications showing encouraging anti-tumor activity and tolerability and our clinical development plans, our strategy is to pursue ALX148 as a potentially critical component for future combination treatments in oncology.

Our predecessor company, ALX Oncology Limited, an Irish private company limited by shares, was initially incorporated in Ireland on March 13, 2015 under the name Alexo Therapeutics Limited and changed its name to ALX Oncology Limited on October 11, 2018. We were then incorporated in Delaware on April 1, 2020 under the name ALX Oncology Holdings Inc. and completed a reorganization effective as of the same date whereby ALX Oncology Limited became our wholly-owned subsidiary and all of the shareholders, warrant holders and option holders of ALX Oncology Limited became our stockholders, warrant holders and option holders, holding the same number of corresponding shares, warrants and/or options in us as they did in ALX Oncology Limited immediately prior to the reorganization. The information included herein are presented as that of ALX Oncology Holdings Inc., unless such information refers to a date prior to April 1, 2020, in which case it will reflect that of our predecessor company. Relatedly, our capitalization information will be presented as "preferred stock" and "common stock," while capitalization information from a date prior to April 1, 2020 will be presented as "preferred shares" and "ordinary shares."

Since our founding, we have devoted substantially all of our resources to identifying and developing ALX148, advancing preclinical programs, scaling up manufacturing, conducting clinical trials and providing general and administrative support for these operations. We have no products approved for marketing and we have never received any revenue from drug product sales. From inception through March 31, 2020, we have raised an aggregate of \$180.9 million to fund our operations, of which \$175.1 million were net proceeds from sales of our convertible preferred shares and \$5.8 million were net proceeds from borrowings under a term loan.

We have incurred net losses in each year since inception. Our net losses were \$13.7 million and \$19.2 million for the years ended December 31, 2018 and December 31, 2019, respectively, and \$4.2 million and \$5.5 million for the three months ended March 31, 2019 and March 31, 2020, respectively. As of December 31, 2018, December 31, 2019 and March 31, 2020, we had an accumulated deficit of \$53.5 million, \$72.8 million and \$78.2 million, respectively. Substantially all of our operating losses are a result of expenses incurred in connection with our research and development programs, primarily ALX148, and from general and administrative expenses associated with our operations.

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We expect to continue to incur significant expenses and increasing operating losses over at least the foreseeable future. We expect our expenses will increase substantially in connection with our ongoing activities, as we:

- advance ALX148 through multiple clinical trials in multiple indications;
- pursue regulatory approval of ALX148 in hematological malignancies and solid tumors;
- continue our discovery and preclinical and clinical development efforts;
- obtain and maintain patent, trade secret and other intellectual property protection and regulatory exclusivity for our product candidates;
- manufacture supplies for our preclinical studies and clinical trials; and
- continue to add operational, financial and management information systems to support ongoing operations as a public company.

Components of Results of Operations

Related-Party Revenue

To date, we have not generated any revenue from product sales, licenses or collaborations and do not expect to generate any revenue from the sale of products in the foreseeable future. We have recognized related-party revenue related to research and development services to Tollnine, Inc., or Tollnine, as further described in “—License and Collaboration Agreements—Related-Party Agreement” below. If our clinical development efforts for our product candidates are successful and result in regulatory approval, we may generate revenue from future product sales. If we enter into license or collaboration agreements for any of our product candidates or intellectual property, we may generate revenue in the future from payments as a result of such license or collaboration agreements. We cannot predict if, when, or to what extent we will generate revenue from the commercialization and sale of our product candidates including ALX148. We may never succeed in obtaining regulatory approval for any of our product candidates.

Operating Expenses

Research and Development Expenses

Research and development expenses consist primarily of costs incurred for the development of our lead product candidate, ALX148, which include:

- expenses incurred in connection with the preclinical and clinical development, including expenses incurred under agreements with CROs;
- employee-related expenses, including salaries, related benefits, travel and stock-based compensation expense for employees engaged in research and development functions;
- expenses related to production of clinical materials, including fees paid to CMOs;
- laboratory and vendor expenses related to the execution of preclinical studies and clinical trials; and
- facilities and other expenses, which include expenses for rent and maintenance of facilities, depreciation and amortization expense and other supplies.

We expense research and development costs as incurred. Nonrefundable advance payments for goods or services to be received in future periods for use in research and development activities are deferred and capitalized. The capitalized amounts are then expensed as the related goods are delivered or as services are performed. We record accruals for estimated costs of research, preclinical studies and clinical trials and manufacturing development, which are a significant component of research and development expenses. We determine the estimated costs through discussions with internal personnel and external service providers as to the progress or stage of completion of the services and the agreed-upon fees to be paid for such services.

Our research and development expenses consist primarily of costs associated with the development of our lead product candidate ALX148 and include external costs, such as fees paid to consultants, central laboratories, contractors, CMOs and CROs in connection with our preclinical and clinical development activities. We allocate expenses, such as employee salaries, benefits, facilities, travel and other miscellaneous expenses, based on an estimated percentage of time worked on each program.

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Almost all of our research and development expenses to date related to the clinical development of our lead product candidate, ALX148.

We expect our research and development expenses to increase substantially for the foreseeable future as we continue to invest in research and development activities related to developing our product candidates, as our product candidates advance into later stages of development and as we begin to conduct larger clinical trials. The process of conducting the necessary clinical trials to obtain regulatory approval is costly and time-consuming, and the successful development of our product candidates is highly uncertain. As a result, we are unable to determine the duration and completion costs of our research and development projects or when and to what extent we will generate revenue from the commercialization and sale of any of our product candidates.

The successful development of our current and future product candidates is highly uncertain. This is due to the numerous risks and uncertainties, including the following:

- successful completion of preclinical studies and clinical trials;
- delays in regulators or institutional review boards authorizing us or our investigators to commence our clinical trials or in our ability to negotiate agreements with clinical trial sites or CROs;
- the number and location of clinical sites included in the trials;
- raising additional funds necessary to complete clinical development of our product candidates;
- obtaining and maintaining patent, trade secret and other intellectual property protection and regulatory exclusivity for our product candidates;
- contracting with third-party manufacturers for clinical supplies of our product candidates;
- protecting and enforcing our rights in our intellectual property portfolio, including, if necessary, litigation; and
- maintaining a continued acceptable safety profile of the products following approval.

A change in the outcome of any of these variables with respect to the development of our product candidates may significantly impact the costs and timing associated with the development of our product candidates. We may never succeed in obtaining regulatory approval for any of our product candidates.

Research and development activities are central to our business model. There are numerous factors associated with the successful commercialization of any of our product candidates, including future trial design and various regulatory requirements, many of which cannot be determined with accuracy at this time based on our stage of development. In addition, future regulatory factors beyond our control may impact the success, cost or timing of our clinical development programs.

General and Administrative Expenses

General and administrative expenses consist primarily of personnel-related expenses, facilities expenses, depreciation and amortization expenses and professional services expenses, including legal, human resources, audit, accounting and tax-related services. Personnel and related costs consist of salaries, benefits and stock-based compensation. Facilities costs consist of rent and maintenance of facilities.

We anticipate that our general and administrative expenses will increase as a result of increased headcount, expanded infrastructure and higher consulting, legal, tax and regulatory-related services associated with maintaining compliance with stock exchange listing and Securities and Exchange Commission requirements, audit and investor relations costs, director and officer insurance premiums and other costs associated with being a public company.

Cost of Services for Related-Party Revenue

We incur costs associated with related-party contract research services including direct labor and associated employee benefits, laboratory supplies and other expenses. These costs are recorded in cost of services for related-party transactions as a component of total operating expenses in the accompanying consolidated statements of operations and comprehensive loss.

Results of Operations and Net Loss**Comparisons of the Three Months Ended March 31, 2019 and March 31, 2020**

The following table summarizes our results of operations for the three months ended March 31, 2019 and March 31, 2020:

| | THREE MONTHS ENDED MARCH 31, | |
|--|---------------------------------|-------------------|
| | 2019 | 2020 |
| | (unaudited) (in thousands) | |
| Related-party revenue | \$ 1,032 | \$ 655 |
| Operating expenses: | | |
| Research and development | 3,733 | 3,828 |
| General and administrative | 588 | 1,473 |
| Cost of services for related-party revenue | 938 | 596 |
| Total operating expenses | 5,259 | 5,897 |
| Loss from operations | (4,227) | (5,242) |
| Interest expense | — | (215) |
| Other income (expense), net | (2) | 7 |
| Loss before income taxes | (4,229) | (5,450) |
| Income tax provision | (9) | (4) |
| Net loss and comprehensive loss | (4,238) | (5,454) |
| Cumulative dividends allocated to preferred shareholders | (905) | (1,983) |
| Net loss attributable to ordinary shareholders | <u>\$ (5,143)</u> | <u>\$ (7,437)</u> |

Related-Party Revenue

Related-party revenue for the three months ended March 31, 2019 and March 31, 2020 was \$1.0 million and \$0.7 million, respectively, which was generated solely from payments received for reimbursement of research and development expenses pursuant to the Research and Development Services Agreement with Tollnine, or Tollnine Agreement, as further described in "—License and Collaboration Agreements—Related-Party Agreement" below. The decrease of \$0.3 million relates to decreased fee-for-service hours provided to Tollnine.

Research and Development Expenses

The following table summarizes our research and development expenses incurred for the three months ended March 31, 2019 and March 31, 2020:

| | THREE MONTHS ENDED MARCH 31, | |
|---|---------------------------------|-----------------|
| | 2019 | 2020 |
| | (unaudited) (in thousands) | |
| Clinical development costs | \$ 3,055 | \$ 2,858 |
| Personnel and related costs | 633 | 847 |
| Stock-based compensation expense | 35 | 83 |
| Other research and development costs | 10 | 40 |
| Total research and development expenses | <u>\$ 3,733</u> | <u>\$ 3,828</u> |

Research and development expenses for the three months ended March 31, 2019 was \$3.7 million, compared to \$3.8 million for the three months ended March 31, 2020. The increase of \$0.1 million was primarily due to increases in personnel-related costs, including stock-based compensation, as result of an increase in our headcount.

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General and Administrative Expenses

The following table summarizes our general and administrative expenses incurred for the three months ended March 31, 2019 and March 31, 2020:

| | THREE MONTHS ENDED MARCH 31, | |
|---|---------------------------------|-----------------|
| | 2019 | 2020 |
| | (unaudited) (in thousands) | |
| Personnel and related costs | \$ 219 | \$ 479 |
| Stock-based compensation expense | 7 | 68 |
| Other general and administrative costs | 362 | 926 |
| Total general and administrative expenses | <u>\$ 588</u> | <u>\$ 1,473</u> |

General and administrative expenses for the three months ended March 31, 2019 was \$0.6 million, compared to \$1.5 million during the three months ended March 31, 2020. This increase of \$0.9 million was primarily attributable to an increase in other general and administrative costs of \$0.6 million, which was driven by increases in corporate legal costs leading up to the Company's internal reorganization effective on April 1, 2020. In addition, we incurred increased personnel-related costs, including stock-based compensation, of \$0.3 million due to an increase in our headcount in the three months ended March 31, 2020.

Cost of Services for Related-Party Revenue

Cost of services for related-party revenue for the three months ended March 31, 2019 was \$0.9 million, compared to \$0.6 million during the year ended March 31, 2020. This decrease of \$0.3 million was attributable to a decrease in services rendered to Tollnine.

Comparisons of the Years Ended December 31, 2018 and December 31, 2019

The following table summarizes our results of operations for the years ended December 31, 2018 and December 31, 2019:

| | YEAR ENDED DECEMBER 31, | |
|--|----------------------------|--------------------|
| | 2018 | 2019 |
| | (in thousands) | |
| Related-party revenue | \$ 2,067 | \$ 4,796 |
| Operating expenses: | | |
| Research and development | 11,270 | 16,306 |
| General and administrative | 2,601 | 3,313 |
| Cost of services for related-party revenue | 1,880 | 4,360 |
| Total operating expenses | <u>15,751</u> | <u>23,979</u> |
| Loss from operations | <u>(13,684)</u> | <u>(19,183)</u> |
| Interest expense | — | (21) |
| Other income (expense), net | (2) | (5) |
| Loss before income taxes | (13,686) | (19,209) |
| Income tax provision | (45) | (34) |
| Net loss and comprehensive loss | (13,731) | (19,243) |
| Cumulative dividends allocated to preferred shareholders | (3,671) | (4,028) |
| Net loss attributable to ordinary shareholders | <u>\$ (17,402)</u> | <u>\$ (23,271)</u> |

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Related-Party Revenue

Related-party revenue for the years ended December 31, 2018 and December 31, 2019 was \$2.1 million and \$4.8 million, respectively, which was generated solely from payments received for reimbursement of research and development expenses pursuant to the Tollnine Agreement, as further described in “—License and Collaboration Agreements—Related-Party Agreement” below. The increase of \$2.7 million relates to increased fee-for-service hours provided to Tollnine during 2019.

Research and Development Expenses

The following table summarizes our research and development expenses incurred for the years ended December 31, 2018 and December 31, 2019:

| | YEAR ENDED DECEMBER 31, | |
|---|----------------------------|-----------------|
| | 2018 | 2019 |
| | (in thousands) | |
| Clinical development costs | \$ 7,654 | \$14,011 |
| Personnel and related costs | 3,312 | 2,127 |
| Stock-based compensation expense | 195 | 105 |
| Other research and development costs | 109 | 63 |
| Total research and development expenses | <u>\$11,270</u> | <u>\$16,306</u> |

Research and development expenses for the year ended December 31, 2018 was \$11.3 million, compared to \$16.3 million for the year ended December 31, 2019. The increase of \$5.0 million was primarily due to increases in external research and development expenses related to our lead product candidate, as we significantly increased trial recruitment for our Phase 1 clinical trials for ALX 148 in the year ended December 31, 2019. In addition, in the year ended December 31, 2019, we incurred increased costs for additional preclinical studies and CMC manufacturing.

General and Administrative Expenses

The following table summarizes our general and administrative expenses incurred for the years ended December 31, 2018 and December 31, 2019:

| | YEAR ENDED DECEMBER 31, | |
|---|----------------------------|----------------|
| | 2018 | 2019 |
| | (in thousands) | |
| Personnel and related costs | \$ 695 | \$ 834 |
| Stock-based compensation expense | 16 | 33 |
| Other general and administrative costs | 1,890 | 2,446 |
| Total general and administrative expenses | <u>\$2,601</u> | <u>\$3,313</u> |

General and administrative expenses for the year ended December 31, 2018 was \$2.6 million, compared to \$3.3 million during the year ended December 31, 2019. This increase of \$0.7 million was due to increased administrative costs supporting the increased activities in connection with our Phase 1 clinical trials for ALX 148, resulting in increased other general and administrative expenses of \$0.6 million, which included increases in business development activities, legal, accounting and audit services, as well as increased personnel-related costs of \$0.1 million.

Cost of Services for Related-Party Revenue

Cost of services for related-party revenue for the year ended December 31, 2018 was \$1.9 million, compared to \$4.4 million during the year ended December 31, 2019. This increase of \$2.5 million was attributable to an increase in services rendered to Tollnine.

Liquidity and Capital Resources; Plan of Operations

Sources of Liquidity

Since our inception, we have incurred significant operating losses and have not generated any product revenue. We have not yet commercialized any of our product candidates and we do not expect to generate revenue from sales of any product candidates for several years, if at all, subject to marketing approval of any of our product candidates. To date, we have funded our operations with proceeds from the sales of shares of our common stock and convertible preferred stock and borrowings under our term loan. Through March 31, 2020, we had received net proceeds of \$175.1 million from sales of our ordinary shares and convertible preferred shares and net proceeds of \$5.8 million borrowings under our term loan. As of March 31, 2020, we had cash and cash equivalents of \$105.0 million.

Silicon Valley Bank and West River Group Loan and Security Agreement

We and our wholly-owned subsidiaries Alexo Therapeutics International and Sirpant Therapeutics, as borrowers, entered into the Loan Agreement, with SVB and WestRiver, collectively as lenders, and SVB as administrative agent and collateral agent. The Loan Agreement provided for term loans in an aggregate principal amount of up to \$10.0 million funded in two tranches, subject to the satisfaction of a certain milestone. The first tranche, in the amount of \$6.0 million, was funded on the closing date of the Loan Agreement in December 2019. A second tranche of \$4.0 million was available on or before March 31, 2020, upon our achievement of an equity financing resulting in net cash proceeds in an amount of at least \$30.0 million to us. We elected not to draw down on the second tranche, which is no longer available.

The loans under the Loan Agreement bear interest at a floating per annum interest rate equal to the greater of 7.0% or 2.0% plus the prime rate as reported in The Wall Street Journal. The Wall Street Journal prime rate was 3.25% as of March 31, 2020. Therefore, the rate applicable to the Company as of March 31, 2020 was 7.0%.

We are required to make interest-only payments for the first 12 months after the closing of the Loan Agreement, continuing through the maturity date of September 1, 2022. The Loan Agreement also provides for a final payment equal to 6.0% multiplied by the aggregate principal amount of the term loans funded, which is due on the maturity date, upon the acceleration of the term loans or upon prepayment of the term loans. If we elect to prepay the term loans, there is also a prepayment fee of between 1.0% and 3.0% of the principal amount being prepaid depending on the timing and circumstances of prepayment.

In conjunction with the Loan Agreement, we issued warrants to purchase 403,348 shares of Series B convertible preferred stock to SVB and WestRiver with an exercise price of \$1.4432 per share. The estimated fair value of the warrants at the date of issuance was approximately \$0.4 million. The fair value of the Series B convertible preferred stock warrant liability was determined using the Black-Scholes option-pricing model. As of March 31, 2020, the various assumptions used in the Black-Scholes option-pricing model were time to liquidity of 2.0 to 9.7 years, volatility of 97.4% and risk-free rate of 0.4%. The warrant liability was recorded at its fair value at inception and is being remeasured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the accompanying consolidated statement of operations and comprehensive loss. As of March 31, 2020, the fair value of the Series B convertible preferred stock warrant liabilities was approximately \$0.4 million and was recorded in other long-term liabilities on the condensed consolidated balance sheets.

The loans under the Loan Agreement are secured by substantially all of our assets, except our intellectual property, which is the subject of a negative pledge.

We determined that certain loan features were embedded derivatives requiring bifurcation and separate accounting. Those embedded derivatives were bundled together as a single, compound embedded derivative and then bifurcated and accounted for separately from the host contract. We recorded a term loan compound derivative liability of \$51,000, which is marked-to-market at each reporting date. We calculated the fair values of the compound derivative by computing the difference between the fair value of the term loans and the compound derivative using the "with and without" method under the income approach, and the fair value of the term loans without the compound derivative. We calculated the fair values using a probability-weighted discounted cash flow analysis. The key valuation assumptions used consist of the discount rate and the probability of a change in control event. The term loan compound derivative liability is being remeasured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the consolidated statements of

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operations and comprehensive loss. As of March 31, 2020, the fair value of the compound derivative liability was approximately \$65,000 and was recorded in other long-term liabilities on the condensed consolidated balance sheets.

The fair value of Series B convertible preferred stock warrant liability at issuance, fair value of embedded derivatives which were bifurcated and other debt issuance costs have been treated as debt discounts on our consolidated balance sheets and together with the final payment are being amortized to interest expense throughout the life of the term loans using the effective interest rate method.

Funding Requirements

We have incurred losses and negative cash flows from operations since inception and anticipate that we will continue to incur net losses for the foreseeable future. As of March 31, 2020, we had an accumulated deficit of \$78.2 million. We expect our expenses to increase substantially in connection with our ongoing activities, particularly as we advance the preclinical activities and clinical trials for our product candidates in development. In addition, upon the closing of this offering, we expect to incur additional costs associated with operating as a public company. Management recognizes the need to raise additional capital to fully implement its business plan. The timing and amount of such future capital requirements are difficult to forecast and will depend on many factors, including:

- the timing and progress of preclinical and clinical development activities;
- successful enrollment in and completion of clinical trials;
- the timing and outcome of regulatory review of our product candidates;
- our ability to establish agreements with third-party manufacturers for clinical supply for our clinical trials and, if any of our product candidates are approved, commercial manufacturing;
- addition and retention of key research and development personnel;
- our efforts to enhance operational, financial and information management systems, and hire additional personnel, including personnel to support development of our product candidates;
- the costs and timing of future commercialization activities, including product manufacturing, marketing, sales and distribution, for any of our product candidates for which we obtain marketing approval;
- the legal patent costs involved in prosecuting patent applications and enforcing patent claims and other intellectual property claims; and
- the terms and timing of any collaboration, license or other arrangement, including the terms and timing of any milestone and royalty payments thereunder.

Until such time, if ever, as we can generate substantial product revenue, we expect to finance our operations through a combination of equity offerings, debt financings, collaborations, strategic alliances and marketing, distribution or licensing arrangements. We do not currently have any committed external source of funds. To the extent that we raise additional capital through the sale of equity or convertible debt securities, your ownership interest will be diluted, and the terms of these securities may include liquidation or other preferences that adversely affect your rights as a common stockholder. Debt financing and preferred equity financing, if available, may involve agreements that include covenants limiting or restricting our ability to take specific actions, such as incurring additional debt, making acquisitions or capital expenditures or declaring dividends. If we raise additional funds through collaborations, strategic alliances or marketing, distribution or licensing arrangements with third parties, we may have to relinquish valuable rights to our technologies, future revenue streams, research programs or drug candidates or grant licenses on terms that may not be favorable to us. If we are unable to raise additional funds through equity or debt financings or other arrangements when needed, we may be required to delay, limit, reduce or terminate our research, product development or future commercialization efforts or grant rights to develop and market drug candidates that we would otherwise prefer to develop and market ourselves.

We estimate that our net proceeds from this offering will be approximately \$ _____ million based on an assumed initial public offering price of \$ _____ per share (the midpoint of the price range set forth on the cover page of this prospectus), after deducting the underwriting discounts and commissions and estimated offering expenses payable by us. We believe that the net proceeds from this offering, together with our existing cash and cash equivalents will enable us to fund our operating expenses and capital expenditure requirements for at least the next months. We have based these estimates on assumptions that may prove to be wrong, and we could utilize our

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available capital resources sooner than we expect. Our Loan Agreement includes covenants limiting or restricting our ability to take specific actions, such as incurring additional debt.

Cash Flows

The following table summarizes our sources and uses of cash for each of the periods set forth below:

| | YEARS ENDED | | THREE MONTHS ENDED | |
|---------------------------------|-------------------|---------------|--------------------|------------------|
| | DECEMBER 31, | DECEMBER 31, | MARCH 31, | MARCH 31, |
| | 2018 | 2019 | 2019 | 2020 |
| | (in thousands) | | | |
| Net cash provided by (used in): | | | | |
| Operating activities | \$(13,190) | \$(14,249) | \$ (3,861) | \$ (8,963) |
| Investing activities | (653) | (353) | (118) | (10) |
| Financing activities | 1 | 15,357 | — | 104,991 |
| Net (decrease) increase in cash | <u>\$(13,842)</u> | <u>\$ 755</u> | <u>\$ (3,979)</u> | <u>\$ 96,018</u> |

Operating Activities

In the three months ended March 31, 2019, cash used in operating activities of \$3.9 million was attributable to a net loss of \$4.2 million partially offset by \$0.2 million in non-cash charges and a change of \$0.2 million in our net operating assets and liabilities. The non-cash charges consisted of stock-based compensation of \$0.1 million and depreciation and amortization of \$0.1 million. The change in operating assets and liabilities was primarily due to a \$1.0 million increase in receivables due from a related-party, partially offset by a \$0.7 million increase in accounts payable and a \$0.4 million decrease in prepaid expenses.

In the three months ended March 31, 2020, cash used in operating activities of \$9.0 million was attributable to a net loss of \$5.5 million partially offset by \$0.5 million in non-cash charges and a change of \$4.0 million in our net operating assets and liabilities. The non-cash charges consisted of stock-based compensation of \$0.2 million, depreciation and amortization of \$0.1 million, amortization of term loan discount and issuance costs of \$0.1 million and change in fair value of Series B convertible preferred shares warrant liability and term loan compound derivative of \$0.1 million. The change in operating assets and liabilities was primarily due to a \$1.8 million decrease in accounts payable, \$0.6 million decrease in accrued expenses, \$0.9 million increase in prepaid expense and \$0.7 million increase in receivables due from a related-party. This is primarily due to timing of cash payments for CMC-related activities.

In the year ended December 31, 2018, cash used in operating activities of \$13.2 million was attributable to a net loss of \$13.7 million partially offset by \$0.7 million in non-cash charges and a net change of \$0.2 million in our net operating assets and liabilities. The non-cash charges consisted of stock-based compensation expense of \$0.3 million and depreciation and amortization expense of \$0.4 million. The change in operating assets and liabilities was primarily due to a \$0.9 million increase in receivables due from a related-party and \$0.3 million decrease in accounts payable. This was partially offset by a \$0.9 million decrease in prepaid expenses and other current assets resulting from the timing of prepayments made for research and development activities.

In the year ended December 31, 2019, cash used in operating activities of \$14.2 million was attributable to a net loss of \$19.2 million and a net change of \$4.3 million in our net operating assets and liabilities, partially offset by \$0.7 million in non-cash charges. The non-cash charges primarily consisted of stock-based compensation expense of \$0.3 million and depreciation and amortization expense of \$0.4 million. The change in operating assets and liabilities was primarily due to a \$3.0 million increase in accounts payable, a \$0.7 million decrease in prepaid expenses and other current assets and a \$0.4 million decrease in receivables due from a related-party. The increase in accounts payable is primarily due to the timing of cash payments and increased activities to support overall business growth.

Investing Activities

In the three months ended March 31, 2019, cash used in investing activities of \$0.1 million was related to capital expenditures on the purchase of property and equipment.

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In the three months ended March 31, 2020, cash used in investing activities was nominal.

In the year ended December 31, 2018, cash used in investing activities of \$0.7 million was related to capital expenditures on the purchase of property and equipment.

In the year ended December 31, 2019, cash used in investing activities of \$0.4 million was related to capital expenditures on the purchase of property and equipment.

Financing Activities

In the three months ended March 31, 2019, cash provided by financing activities was nominal.

In the three months ended March 31, 2020, cash provided by financing activities was \$105.0 million from the sale and issuance of Series C convertible preferred shares.

In the year ended December 31, 2018, cash provided by financing activities was nominal.

In the year ended December 31, 2019, cash provided by financing activities of \$15.4 million was related to net proceeds of \$9.4 million from the issuance of Series B convertible preferred shares and \$5.9 million from the net proceeds from a term loan entered into in December 2019.

Contractual Obligations and Commitments

The following table summarizes our commitments and contractual obligations as of March 31, 2020:

| | PAYMENTS DUE BY PERIOD | | | | |
|---|------------------------|---------------------|----------------|--------------|----------------------|
| | TOTAL | LESS THAN 1 YEAR | 1-3 YEARS | 3-5 YEARS | MORE THAN 5 YEARS |
| | | | (in thousands) | | |
| Operating lease obligations (1) | \$ 1,793 | \$ 548 | \$ 1,146 | \$ 99 | \$ — |
| Manufacturing and service contracts (2) | 5,782 | — | 5,782 | — | — |
| Term loan (3) | 7,071 | 1,278 | 5,793 | — | — |
| Total | \$14,646 | \$ 1,826 | \$12,721 | \$ 99 | \$ — |

(1) Payments due for our lease of office and laboratory space in Burlingame, California under a single operating lease agreement that expires in 2023.

(2) In November 2015, we entered into a Master Service Agreement, or the MSA, with KBI Biopharma, Inc. relating to formulation development, process development and cGMP manufacturing of ALX148 for use in clinical trials on a project basis. The MSA had an initial term of three years with successive one-year renewal periods, is cancellable upon notice and is non-exclusive. Statements of work under the MSA commit us to certain purchase obligations of approximately \$6.7 million. These amounts are based on non-cancellable commitments and forecasts that include estimates of future market demand, quantity discounts and manufacturing efficiencies that may impact timing of purchases.

(3) On December 20, 2019, we borrowed a loan pursuant to the Loan Agreement as described above under "—Silicon Valley Bank and West River Group Loan and Security Agreement."

We enter into contracts in the normal course of business with various third parties for clinical trials, preclinical research studies and testing, manufacturing and other services and products for operating purposes. These contracts generally provide for termination upon notice. Payments due upon cancellation consist only of payments for services provided or expenses incurred, including non-cancellable obligations of our service providers, up to the date of cancellation. These payments are not included in the table of contractual obligations above.

Cumulative Dividends on Convertible Preferred Shares

As of March 31, 2020, there were \$14.7 million of cumulative dividends on our Series A, Series B and Series C convertible preferred shares, which are payable upon the occurrence of certain change of control and liquidation events and upon the conversion of such convertible preferred shares upon a qualifying initial public offering, each as described in our organizational documents.

License and Collaboration Agreements

Exclusive (Equity) Agreement with The Board of Trustees of the Leland Stanford Junior University

In March 2015, we entered into a license agreement, or the Stanford Agreement, with the Board of Trustees of the

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Leland Stanford Junior University, or Stanford, under which we obtained a worldwide, royalty-bearing, sublicensable license under certain patents relating to our current product candidates, to develop, manufacture and commercialize products for use in certain licensed fields, the scope of which would include the application of the licensed intellectual property in oncology. The license granted to us in the Stanford Agreement includes an exclusive grant, subject to certain pre-existing non-exclusive or exclusive rights that Stanford retained for grant to third parties with respect to certain categories of the licensed patents in certain fields of use and retained rights by Stanford and all other nonprofit institutions to use and practice the licensed patents and technology for internal research and other nonprofit purposes. The license granted to us in the Stanford Agreement also includes non-exclusive grants to certain Stanford patents.

In consideration for the rights granted to us under the Stanford Agreement, we paid Stanford a nonrefundable license royalty and reimbursed Stanford for past patent expenses, together totaling less than \$0.1 million, and granted Stanford a specified number of our ordinary shares. In addition, we are obligated to pay Stanford ongoing patent expenses and an annual license maintenance fee, which are nominal and will be creditable against any royalties payable to Stanford in the applicable year. We are required to make milestone payments up to a specified aggregate amount in respect of a specified number of licensed products that successfully satisfy certain clinical and regulatory milestones. No milestone payments have been made through December 31, 2019. We also agreed to pay Stanford tiered royalties on a specified percentage of net sales made by us, our affiliates and our sublicensees of licensed products at rates ranging within low single-digit percentages, subject to certain reductions and offsets. Our license, on a licensed product-by-licensed product and country-by-country basis, shall become royalty-free and fully paid-up upon the later of the date on which the last valid claim included in the exclusively or non-exclusively licensed patents expires and ten years after the first commercial sale of the licensed product in such country.

The Company may terminate the Stanford Agreement, on a licensed product-by-licensed product basis, at any time for any reason by providing at least 60 days' written notice to Stanford. Stanford may terminate the Stanford Agreement, if the Company is in breach of any provision of the Stanford Agreement and fail to remedy such breach within 60 days after written notice of such breach by Stanford. In addition, Stanford has the right to terminate the Stanford Agreement, on a licensed product-by-licensed product basis, if the Company is not diligently developing and commercializing such licensed product under certain conditions or if the Company fails to achieve specified development milestones for such licensed product by certain dates, subject to the Company's extension rights.

Commercial License Agreement with Selexis SA

In June 2016, we entered into a license agreement with Selexis SA, or Selexis, under which we obtained a worldwide, royalty-bearing, sublicensable license under certain patents, know-how and other intellectual property, to use Selexis generated cell lines to manufacture ALX148 and to make, use and sell licensed products containing such compound in all fields of use. The rights granted under this agreement include the rights to grant sublicenses to contractors or other collaboration partners, in each case to develop production processes or manufacture licensed products, containing ALX148.

In consideration for the rights granted to us under the agreement, we paid Selexis a nominal one-time fee and will pay Selexis an annual maintenance fee. We also agreed to pay Selexis milestone payments in respect of each licensed product developed and/or commercialized under the grant, that successfully satisfies certain milestone events. We also agreed to pay Selexis a flat royalty of a very low single-digit percentage on net sales made by us, our affiliates and our sublicensees of products. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the passing of ten years after the first commercial sale of the product in such country or our exercise of the royalty buyout option, exercisable at any time prior to the first commercial sale of a licensed product.

We may terminate the license agreement at any time for any reason with at least 60 days' written notice to Selexis. Either party may terminate the license agreement if the other party enters into a bankruptcy event or in the event of a material breach of the agreement (that cannot be cured or remains uncured for 60 days after the date that the defaulting party is provided with written notice of such breach). Our obligations to make payments that are accrued or accruable will survive any termination of the agreement, and in certain circumstances the licenses granted under the agreement will terminate unless they have become fully paid up as described in the previous paragraph.

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Commercial Antibody Agreement with Crystal Bioscience, Inc. (Now a Subsidiary of Ligand Pharmaceuticals Incorporated)

In March 2017, we entered into an agreement with Crystal Bioscience, Inc. (now a subsidiary of Ligand Pharmaceuticals Incorporated), or Crystal, under which we obtained an assignment of certain patents, covering certain SIRPa antibodies. Under this agreement, we also received a worldwide, royalty-bearing non-exclusive license, with the right to grant sublicenses through multiple tiers of sublicenses, under certain of Crystal's background patents and know-how necessary to commercialize the rights under the assigned patents.

In consideration for the rights granted to us under the agreement, we agreed to pay Crystal milestone payments up to \$11.1 million in respect of all licensed products developed under the assigned patents, that successfully satisfy certain clinical and regulatory milestones, each milestone being paid only once for all products. We also agreed to pay Crystal tiered royalties on net sales of licensed products made by us, our affiliates and our sublicensees of products at rates ranging within low single-digit percentages, subject to certain potential reductions. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the later of the date on which the last valid claim included in the licensed patents expires and ten years after the first commercial sale of the product in such country.

We agreed to use commercially reasonable efforts to develop and commercialize licensed products, including meeting defined development milestones by certain specified dates.

We may terminate the agreement at any time for any reason with at least 60 days' written notice to Crystal. Either party may terminate the agreement if the other party enters into a bankruptcy event or in the event of material breach of the agreement (that remains uncured for 60 days after the date that it is provided with written notice of such breach). Our obligations to pay royalties and milestone payments which accrued pre-termination or accrue post-termination will survive any termination.

Related-Party Agreement

In June 2018, we entered into the Tollnine Agreement with Tollnine, a related-party, to provide research and development services to Tollnine. Since June 2018 to April 2020, our Chief Executive Officer was also the Chief Executive Officer of Tollnine and currently two of our investors are also investors in Tollnine. In April 2020, our Chief Scientific Officer replaced our Chief Executive Officer to become the Chief Executive Officer of Tollnine. As such, Tollnine was deemed to be a related-party. The Tollnine Agreement has an initial term of three years, to be automatically renewed for additional one-year terms unless terminated by either party. The services are to be provided at a price based on the costs incurred by us plus a mark-up equal to 10.0% of such costs. We recognize revenue when Tollnine, as our customer, obtains control of promised goods or services, in an amount that reflects the consideration which we expect to receive in exchange for those goods or services.

For the years ended December 31, 2018, and December 31, 2019, and for the three months ended March 31, 2019 and March 31, 2020, we recognized related-party revenues of \$2.1 million and \$4.8 million, and \$1.0 million and \$0.7 million, respectively, under the Tollnine Agreement.

As of December 31, 2018, December 31, 2019 and March 31, 2020, we had outstanding related-party receivables from Tollnine of \$0.9 million, \$0.5 million and \$1.2 million, respectively.

Internal Control Over Financial Reporting

In connection with the audit of our consolidated financial statements for each of the years ended December 31, 2018 and December 31, 2019, we and our independent registered public accounting firm identified material weaknesses in our internal control over financial reporting resulting from a lack of sufficient qualified personnel. For the year ended December 31, 2018, the material weaknesses related to (i) independent reviews of journal entries not being performed prior to posting, (ii) account reconciliations not being performed and independently reviewed on a timely basis and (iii) lack of independent review of technical accounting matters. For the year ended December 31, 2019, (i) and (ii) remain unremediated. A material weakness is a deficiency, or a combination of deficiencies, in internal control over financial reporting such that there is a reasonable possibility that a material misstatement of our consolidated basis. During the first quarter of 2020, we have undertaken specific remediation actions to address the

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control deficiencies in our financial reporting. We have established more robust processes related to the review of complex accounting transactions, the preparation of account reconciliations and the review of journal entries. These remediation actions included hiring a full time Chief Financial Officer in January 2020 and a Vice President, Finance and Chief Accounting Officer in March 2020, both of whom have extensive experience in developing and implementing internal controls and executing plans to remediate control deficiencies. We added new control activities, modified existing controls, and enhanced the documentation that evidences that controls are performed.

If remediation of these material weaknesses is not effective, or if we fail to develop and maintain an effective system of disclosure controls and internal control over financial reporting, our ability to produce timely and accurate consolidated financial statements or comply with applicable laws and regulations could be impaired. See “Risk Factors—Risks Related to Our Operations—We identified material weaknesses in our internal control over financial reporting. If our remediation measures are not effective, we may not be able to report our financial condition or results of operations accurately or on a timely basis.”

Off-Balance Sheet Arrangements

During the period presented, we did not have, nor do we currently have, any off-balance sheet arrangements, as defined in the rules and regulations of the SEC.

Quantitative and Qualitative Disclosures about Market Risks

Interest Rate Risk

We are exposed to market risks in the ordinary course of our business. These risks primarily include interest rate sensitivities. As of March 31, 2020, we had cash and cash equivalents of \$105.0 million. We generally hold our cash and cash equivalents in interest-bearing bank accounts and money market funds. Our primary exposure to market risk is interest rate sensitivity, which is affected by changes in the general level of U.S. interest rates. An immediate 100 basis point change in interest rates would not have a material effect on the fair market value of our cash and cash equivalents.

Financial Institution Risk

Substantially all of our cash and cash equivalents is held with a single financial institution. Due to its size, this financial institution represents a minimal credit risk. Cash amounts held at financial institutions are insured by the Federal Deposit Insurance Corporation up to \$250,000. At March 31, 2020, we had \$104.8 million in excess of this insured limit.

Foreign Currency Risk

Our expenses are generally denominated in U.S. dollars. However, we have entered into a limited number of contracts with vendors for services with payments denominated in foreign currencies, primarily the Euro. We are subject to foreign currency transaction gains or losses on our contracts denominated in foreign currencies. To date, foreign currency transaction gains and losses have not been material to our consolidated financial statements, and we have not had a formal hedging program with respect to foreign currency. A 10.0% increase or decrease in current exchange rates would not have a material effect on our financial results.

Effects of Inflation

Inflation generally affects us by increasing our cost of labor and clinical trial costs. We do not believe that inflation has had a material effect on our results of operations during the periods presented.

Emerging Growth Company Status

We are an “emerging growth company,” as defined in the JOBS Act, and may take advantage of reduced reporting requirements that are otherwise applicable to public companies. Section 107 of the JOBS Act exempts emerging growth companies from being required to comply with new or revised financial accounting standards until private companies are required to comply with those standards. We have elected to take advantage of the extended transition period for complying with new or revised accounting standards. As a result of this election, our consolidated financial statements may not be comparable to companies that comply with public company effective dates. The JOBS Act also exempts us from having to provide an auditor attestation of internal control over financial reporting under SOX Section 404(b).

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We will remain an “emerging growth company” until the earliest of (1) the last day of the fiscal year in which we have total annual gross revenues of \$1.07 billion or more, (2) the last day of the fiscal year following the fifth anniversary of the completion of this initial public offering, (3) the date on which we have issued more than \$1.0 billion in nonconvertible debt during the previous three years or (4) the date on which we are deemed to be a large accelerated filer under the rules of the SEC, which generally is when we have more than \$700 million in market value of our stock held by non-affiliates and we have been a public company for at least 12 months and have filed one annual report on Form 10-K.

Critical Accounting Policies and Significant Judgments and Estimates

Our management’s discussion and analysis of our financial condition and results of operations are based on our consolidated financial statements, which have been prepared in accordance with U.S. generally accepted accounting principles. The preparation of our consolidated financial statements and related disclosures requires us to make estimates and judgments that affect the reported amounts of assets, liabilities, expenses and the disclosure of our contingent liabilities in our consolidated financial statements. We base our estimates on historical experience, known trends and events and various other factors that we believe are reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. We evaluate our estimates and assumptions on an ongoing basis. Our actual results may differ from these estimates under different assumptions or conditions.

While our significant accounting policies are described in more detail in Note 1 to our audited consolidated financial statements elsewhere in this prospectus, we believe that the following accounting policies are those most critical to the judgments and estimates used in the preparation of our audited consolidated financial statements.

Clinical and Manufacturing Accruals

We accrue for estimated costs of research and development activities conducted by third-party service providers, which include the conduct of clinical trials and contract manufacturing activities. We record the estimated costs of research and development activities based upon the estimated amount of services provided. These costs are included in either prepaid expenses and other current assets or accrued expenses and other current liabilities in the consolidated balance sheets and within research and development expense in the consolidated statements of operations and comprehensive loss. We accrue for these costs based on factors such as estimates of the work completed and in accordance with agreements established with its third-party service providers. We record prepaid expenses which consists of amounts paid in advance for services that have not yet been incurred as of the end of the fiscal year.

Stock-Based Compensation Expense

We account for stock-based compensation by measuring and recognizing compensation expense for all stock-based payments made to employees, directors and non-employees based on estimated grant-date fair values. We use the straight-line method to allocate compensation cost to reporting periods over each optionee’s requisite service period, which is generally the vesting period, and estimates the fair value of stock-based awards to employees, directors and non-employees using the Black-Scholes option-pricing model. The Black-Scholes option-pricing model requires the input of subjective assumptions, including expected volatility, expected dividend yield, expected term, risk-free rate of return, and the estimated fair value of the underlying common shares on the date of grant.

Expected Term—We have opted to use the “simplified method” for estimating the expected term of options, whereby the expected term equals the arithmetic average of the vesting term and the original contractual term of the option (generally 10 years).

Risk-Free Interest Rate—The risk-free rate assumption is based on the U.S. Treasury instruments with maturities similar to the expected term of our stock options.

Expected Dividend—We have not issued any dividends and do not expect to issue dividends over the life of the options. As a result, we have estimated the dividend yield to be zero.

Expected Volatility—Due to our limited operating history and a lack of company specific historical and implied volatility data, we have based our estimate of expected volatility on the historical volatility of a group of similar

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companies that are publicly traded. The historical volatility data was computed using the daily closing prices for the selected companies' shares during the equivalent period of the calculated expected term of the stock-based awards.

The estimated fair value of stock options granted to employees and non-employee service providers are expensed over the requisite service period (generally the vesting term) on a straight-line basis. We account for the impact of forfeitures as they occur.

The fair values of the stock options granted during the years ended December 31, 2018 and December 31, 2019 and the three months ended March 31, 2019 and March 31, 2020 were estimated at the date of grant using the Black-Scholes option-pricing model with the following assumptions:

| | YEAR ENDED DECEMBER 31, | | THREE MONTHS ENDED MARCH 31, | |
|---------------------------------|-------------------------|------------|------------------------------|------------|
| | 2018 | 2019 | 2019 | 2020 |
| Expected term (in years) | 5.2—6.0 | 4.4—6.0 | — | 6.0—6.1 |
| Risk-free interest rate | 2.6—3.0% | 1.7—2.1% | — | 0.5—0.8% |
| Expected dividend rate | — | — | — | — |
| Expected share price volatility | 66.5—68.7% | 75.2—80.5% | — | 79.6—80.0% |

Stock-based compensation expense, net of forfeitures, is reflected in the consolidated statements of operations and comprehensive loss as follows (in thousands):

| | YEAR ENDED DECEMBER 31, | | THREE MONTHS ENDED MARCH 31, | |
|--|-------------------------|---------------|------------------------------|---------------|
| | 2018 | 2019 | 2019 | 2020 |
| Research and development | \$ 195 | \$ 105 | \$ 35 | \$ 83 |
| General and administrative | 16 | 33 | 7 | 68 |
| Cost of services for related-party revenue | 58 | 159 | 34 | — |
| Total | <u>\$ 269</u> | <u>\$ 297</u> | <u>\$ 76</u> | <u>\$ 151</u> |

As of March 31, 2020, total unamortized stock-based compensation expense was \$6.1 million.

The intrinsic value of all outstanding stock options as of March 31, 2020 was approximately \$ million based on the common stock fair value of \$ per share, the midpoint of the price range set forth on the cover page of this prospectus.

Determination of the Fair Value of Common Stock

We are required to estimate the fair value of the common stock underlying our stock-based awards when performing the fair value calculations using the Black-Scholes option pricing model. Because our common stock is not currently publicly traded, the fair value of the common stock underlying our stock-based awards has been determined on each grant date by our board of directors, with input from management, considering our most recently available third-party valuation of common shares. All options to purchase shares of our common stock are intended to be granted with an exercise price per share no less than the fair value per share of our common stock underlying those options on the date of grant, based on the information known to us on the date of grant.

In the absence of a public trading market for our common stock, on each grant date, our board of directors made a reasonable determination of the fair value of our common stock based on the information known to us on the date of grant, upon a review of any recent events and their potential impact on the estimated fair value per share of the common stock, and timely valuations from an independent third-party valuation in accordance with guidance

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provided by the American Institute of Certified Public Accountants Practice Aid, *Valuation of Privately-Held-Company Equity Securities Issued as Compensation*, or Practice Aid. In addition, our board of directors considered various objective and subjective factors to determine the fair value of our common stock, including:

- the estimated value of each security both outstanding and anticipated;
- the anticipated capital structure that will directly impact the value of the currently outstanding securities;
- our results of operations and financial position;
- the status of our research and development efforts;
- the composition of, and changes to, our management team and board of directors;
- the lack of liquidity of our common stock as a private company;
- our stage of development and business strategy and the material risks related to our business and industry;
- external market conditions affecting the life sciences and biotechnology industry sectors;
- U.S. and global economic conditions;
- the likelihood of achieving a liquidity event for the holders of our common stock, such as an initial public offering or a sale of our company, given prevailing market conditions; and
- the market value and volatility of comparable companies.

The Practice Aid identifies various available methods for allocating enterprise value across classes and series of capital stock to determine the estimated fair value of common stock at each valuation date. In accordance with the Practice Aid, our board of directors considered the following methods:

- *Option Pricing Method.* Under the option pricing method, or OPM, shares are valued by creating a series of call options with exercise prices based on the liquidation preferences and conversion terms of each equity class. The estimated fair values of the preferred and common stock are inferred by analyzing these options.
- *Probability-Weighted Expected Return Method.* The probability-weighted expected return method, or PWERM, is a scenario-based analysis that estimates value per share based on the probability-weighted present value of expected future investment returns, considering each of the possible outcomes available to us, as well as the economic and control rights of each share class
- *Current Value Method.* Under the Current Value Method, or CVM, our value is determined based on our balance sheet. This value is then first allocated based on the liquidation preference associated with convertible preferred stock issued as of the valuation date, and then any residual value is assigned to the common stock.
- *Hybrid Methods of Enterprise Value Allocation.* The hybrid method is a hybrid between the PWERM and OPM, estimating the probability-weighted value across multiple scenarios but using the OPM to estimate the allocation of value within one or more of those scenarios. The hybrid method can be a useful alternative to explicitly modeling all PWERM scenarios in situations when the company has transparency into one or more near-term exits but is unsure about what will occur if the current plans fall through.

Based on our early stage of development and other relevant factors, we determined that an OPM was the most appropriate method for allocating our enterprise value to determine the estimated fair value of our common stock for valuations performed.

The April 15, 2019 ordinary share valuation was based on a back-solve method of OPM, which derives the implied equity value for one type of equity security from a contemporaneous transaction involving another type of security, the Series B convertible preferred shares in this instance.

For valuations performed after this date, we began using a hybrid of the OPM and the PWERM methods to determine the estimated fair value of our common stock. In determining the estimated fair value of our common stock, our board of directors also considered the fact that our stockholders could not freely trade our common stock in the public markets. Accordingly, we applied discounts to reflect the lack of marketability of our common stock based on the weighted-average expected time to liquidity.

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For the February 10, 2020, April 1, 2020 and May 18, 2020 ordinary share valuations, we have used a hybrid method to determine the fair value of our common stock, in addition to giving consideration hybrid method, multiple valuation approaches were used and then combined into a single probability-weighted valuation, consistent with the Practice Aid. Our approach included the use of initial public offering scenario and an OPM.

Application of these approaches involves the use of estimates, judgment and assumptions that are highly complex and subjective, such as those regarding our expected future revenue, expenses, cash flows, discount rates, market multiples, the selection of comparable companies and the probability of future events. Changes in any or all of these estimates and assumptions, or the relationships between those assumptions, impact our valuations as of each valuation date and may have a material impact on the valuation of common stock.

Our board of directors and management develop best estimates based on application of these approaches and the assumptions underlying these valuations, giving careful consideration to the advice from our third-party valuation expert. Such estimates involve inherent uncertainties and the application of significant judgment. As a result, if factors or expected outcomes change and we use significantly different assumptions or estimates, our equity-based compensation could be materially different.

Following the closing of this offering, the fair value of our common stock will be the closing price of our common stock on the Nasdaq Global Select Market as reported on the date of the grant.

Recent Accounting Pronouncements

From time to time, new accounting pronouncements are issued by the Financial Accounting Standards Board, or FASB, or other standard setting bodies and adopted by us as of the specified effective date. Unless otherwise discussed, the impact of recently issued standards that are not yet effective are not expected to have a material impact on our financial position or results of operations upon adoption.

In February 2016, the FASB issued ASU No. 2016-02 (Topic 842), Leases (ASU 2016-02). ASU 2016-02 requires an entity to recognize assets and liabilities arising from a lease for both financing and operating leases. ASU No. 2016-02 will also require new qualitative and quantitative disclosures to help investors and other financial statement users better understand the amount, timing and uncertainty of cash flows arising from leases. In June 2020, the FASB issued ASU No. 2020-05, which extends the effective date of ASU No. 2016-02 for non-public business entities, including smaller reporting companies, to fiscal years beginning after December 15, 2021. The new standard is effective for us beginning January 1, 2022. Early adoption is permitted. We are currently evaluating the effects of the adoption of this guidance on our consolidated financial statements and related disclosures.

In December 2019, the FASB issued ASU No. 2019-12, Income Taxes (Topic 740): Simplifying the Accounting for Income Taxes, which is intended to simplify various aspects related to accounting for income taxes. The pronouncement is effective for fiscal years, and for interim periods within those fiscal years, beginning after December 15, 2021. ASU 2019-12 is effective for us beginning January 1, 2022. Early adoption is permitted. We are currently in the process of evaluating the effects of the adoption of this guidance on our consolidated financial statements and do not expect it to have a material impact on our consolidated financial statements.

BUSINESS

Overview

We are a clinical stage immuno-oncology company focused on helping patients fight cancer by developing therapies that block the CD47 checkpoint pathway and bridge the innate and adaptive immune system. Cancer cells leverage CD47, a cell surface protein, as a “don’t eat me” signal, to evade detection by the immune system. Our company is developing a next-generation checkpoint inhibitor designed to have a high affinity for CD47 and to avoid the limitations caused by hematologic toxicities inherent in other CD47 blocking approaches. We believe our lead product candidate, ALX148, will have a wide therapeutic window to block the “don’t eat me” signal on cancer cells, and to leverage the immune activation of broadly used anti-cancer agents through combination strategies. We have dosed over 150 subjects with ALX148 across a range of hematologic and solid malignancies in combination with a number of leading anti-cancer agents. We intend to advance ALX148 into clinical development for the treatment of myelodysplastic syndromes, or MDS, acute myeloid leukemia, or AML, and to continue clinical development for the treatment of a range of solid tumor indications. Based on our clinical results to date in multiple oncology indications showing encouraging anti-tumor activity and tolerability and our clinical development plans, our strategy is to pursue ALX148 as a potentially critical component for future combination treatments in oncology.

Anti-cancer agents, including many chemotherapies, other small molecules and anti-cancer antibodies, can stimulate immune cells such as macrophages to engulf and kill cancer cells, a process known as phagocytosis, by providing so-called “eat me” signals on cancer cells. In response, cancer cells frequently overexpress CD47 to counteract these “eat me” signals. As a result, high expression of CD47 on cancer cells has been associated with reduced patient survival in multiple cancers. The therapeutic blockade of CD47 in combination with an “eat me” signal enables the immune system to detect and phagocytose cancer cells. However, healthy blood cells and nearly all other cells in the body also express CD47 as a way to protect against pathologic phagocytosis by immune cells. There have been a number of approaches to blocking CD47, including monoclonal antibodies and fusion proteins that include an active Fc region. These approaches have encountered limitations, including limited dosing and therapeutic window, limited ability to combine with other anti-cancer agents, limited efficacy in solid tumors and limited indications due to patient selection, that have challenged their ability to maximize the full potential of CD47 blockade. In addition, most of these therapeutic approaches to CD47 blockade have resulted in the destruction of patients’ healthy blood cells, causing cytopenias that limit the dosing and therapeutic potential of those molecules.

ALX Oncology was founded by Corey Goodman, Ph.D., K. Christopher Garcia, Ph.D., and Jaume Pons, Ph.D. to address fundamental challenges in blocking CD47 and to realize the full potential of this therapeutic target. We have developed a new approach to CD47 blockade that is designed to maximize clinical activity and minimize toxicities. All competing clinical data to date have come from product candidates that incorporate an active antibody Fc region in addition to a CD47 blocking region. The Fc region provides a positive, pro-phagocytic “eat me” signal to macrophages and other cells of the immune system. Since healthy blood cells also express CD47, these competing therapeutic approaches can cause a reduction in the number of blood cells in the body, resulting in anemia, thrombocytopenia and neutropenia, which can be dangerous to patients and may limit the ability to combine these agents with other anti-cancer medicines.

Our lead product candidate, ALX148, is a next-generation CD47 blocking therapeutic that we believe has significantly enhanced properties compared to competing CD47 blocking approaches. ALX148 is a fusion protein that combines a high-affinity CD47 binding domain with a proprietary inactivated Fc domain. The CD47 binding domain of ALX148 is an affinity enhanced extracellular domain of SIRP α , a protein that is the natural receptor to CD47 found on myeloid cells. We have engineered the Fc domain of ALX148 so that it does not provide a pro-phagocytic signal while still maintaining an antibody-like half-life for the molecule. We believe our inactive Fc approach improves tolerability when compared to other CD47 blocking approaches that have an Fc domain that engages activating receptors on macrophages, causing phagocytosis and death of healthy cells in addition to cancer cells.

ALX148’s design has several advantages that we believe will make it broadly applicable to treating a number of oncology indications. Due to the inactive Fc, ALX148 is specifically designed for use in combination with other anti-

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cancer agents that provide a positive immune-stimulating signal. We believe ALX148 has a favorable tolerability profile that may enable higher dosing levels and greater combination potential with other leading anti-cancer agents. Additionally, the molecular weight of ALX148 is half that of a typical antibody. The relatively smaller size of our molecule may facilitate increased penetrance into the tumor microenvironment. We believe these properties may enable ALX148 to provide superior therapeutic benefits.

Clinical data to date in ALX148 have not shown dose-dependent hematologic toxicities, which are characteristic of other CD47 blockers that incorporate an active Fc domain. At least 122 subjects have been treated with ALX148 in combination with targeted anti-cancer agents and checkpoint inhibitors as of April 1, 2020. As of the same date, two subjects (2%) experienced treatment-related grade 3+ anemia and only five subjects (4%) treatment-related serious adverse events of any kind. ALX148 has not reached a maximum tolerated dose in any of the combinations evaluated to date.

We plan to advance ALX148 for the treatment of MDS and AML. In our ongoing Phase 1b trial of ALX148 in combination with an anti-CD20 agent to treat subjects with relapsed/refractory non-Hodgkin's lymphoma, or NHL, ALX148 demonstrated a higher response rate at higher doses and achieved a 54.6% objective response rate, or ORR, in the highest dose (15 mg/kg once per week, or QW) cohort as compared to a 40.9% ORR at the lower dose (10 mg/kg QW) cohort. We view this ORR as compelling evidence for the role of ALX148 in treating hematologic malignancies and as a favorable comparison to outcomes reported by other CD47 blocking agents in a similar patient population. Furthermore, other CD47 blocking agents in development have demonstrated clinical evidence supporting the role of CD47 blockade in treating hematologic malignancies, specifically in both MDS and AML, albeit with high rates of cytopenias. We have conducted preclinical studies of ALX148 combined with azacitidine or venetoclax that support our clinical development plan in MDS and AML. Azacitidine is a standard of care agent for the treatment of MDS. Azacitidine and venetoclax are both standard of care regimen components for the treatment of AML in older patients and those who are not candidates for intensive induction chemotherapy due to comorbidities. Our studies and those of others show that azacitidine increases calreticulin display, an "eat me" signal, in tumor models. Additionally, we have shown that azacitidine and ALX148 in combination produce increased phagocytosis in vitro and anti-tumor activity in mouse models compared to azacitidine alone. Furthermore, we have demonstrated in preclinical studies that ALX148 when combined with venetoclax increases tumor growth inhibition in a leukemia tumor model, compared to venetoclax alone. We are planning to advance ALX148 into a Phase 1b/2 trial in combination with azacitidine for the first-line treatment of subjects with higher-risk MDS by the end of 2020. We also plan to advance ALX148 into a Phase 1b/2 trial in combination with standard of care agents for the first-line treatment of subjects with AML in 2021.

ALX148 has also generated promising clinical data in solid tumors in combinations with a leading tumor antigen targeting antibody, a leading checkpoint inhibitor and chemotherapy. We believe that ALX148 induces multiple responses that bridge innate and adaptive immunity. We are investigating ALX148 for the treatment of HNSCC and HER2-positive gastric/GEJ carcinoma. In Phase 1b clinical trials, ALX148 has demonstrated both promising levels of anti-tumor activity and tolerability in combination with other broadly utilized cancer agents. Based on these results, the Food & Drug Administration, or FDA, has granted Fast Track designation for ALX148 for both the treatment of patients with HNSCC in the first-line setting and for patients with HER2-positive advanced gastric or GEJ carcinoma in the second-line setting. While other CD47 blockers have failed to achieve meaningful clinical activity in the treatment of solid tumors, we believe ALX148's properties, including favorable tolerability and ability to escalate to higher doses, coupled with high affinity and small size for enhanced solid tumor penetration, may underlie the observed anti-tumor activity in solid tumors. We are planning to advance ALX148 into Phase 2 trials in subjects with HNSCC in combination with pembrolizumab, marketed as Keytruda and the market leading anti-programmed cell death protein-1, or PD-1, checkpoint inhibitor, in the first half of 2021, and gastric/GEJ carcinoma in combination with trastuzumab, marketed as Herceptin, the market-leading anti-HER2 antibody, in the second half of 2021.

Our team of industry veterans plans to continue to advance a broad development plan for ALX148 that balances speed to market, scale of unmet need and existing clinical evidence for ALX148's combination mechanisms. Members of our management team have brought multiple drugs to FDA approval. Our President, Chief Executive Officer and founder, Jaume Pons, Ph.D., was Chief Science Officer of Rinat (a subsidiary of Pfizer), invented fremanezumab (FDA approved in 2018), tanezumab (Biologics License Application, or BLA, filed in 2020) and additional antibodies in late-stage development at Pfizer and advanced nine more drugs into human trials. Our Chief

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Medical Officer, Sophia Randolph, M.D., Ph.D., was the global clinical franchise lead for Ibrance at Pfizer, where she oversaw the program from first-in-human trials to regulatory approval. Our Executive Chairman and founder, Corey Goodman, Ph.D., an elected member of the National Academy of Sciences, has co-founded seven biopharmaceutical companies, including Exelixis and Labrys (acquired by Teva Pharmaceuticals in 2014), and led Pfizer's Biotherapeutics and Bioinnovation Center. Our Chief Financial Officer, Peter Garcia, has over 20 years of experience guiding public and private life science companies and has raised over \$1.5 billion in debt and equity offerings. We have funded ALX Oncology to date primarily through the issuance and sale of our convertible preferred stock to investors including venBio, Lightstone Ventures, Vivo Capital, Logos Capital, Janus Henderson, Foresite Capital, Stanford University, Cormorant Asset Management, BVF Partners, HBM Healthcare Investments and the Longevity Fund. We own global rights to all of our product candidates.

Our Strategy

Our goal is to transform treatment options for patients with cancer by developing ALX148 as a foundational checkpoint immunotherapy.

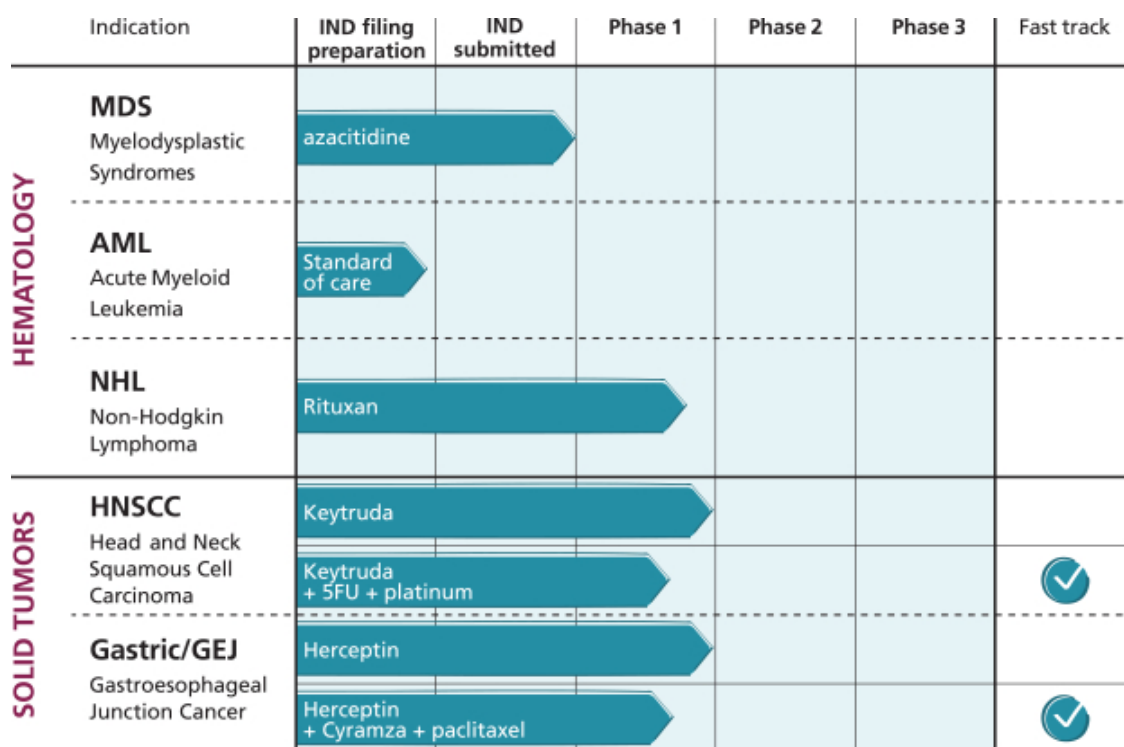
Key elements of our strategy to support this goal include:

- **Advance our lead product candidate, ALX148, through clinical development for MDS and AML.** We plan to initiate a Phase 1b/2 trial of ALX148, in combination with azacitidine, for the first-line treatment of patients with higher-risk MDS by the end of 2020 and in combination with standard of care agents for the first-line treatment of patients with AML in 2021. Given the limitations of current treatment options for patients with MDS, preclinical activity of ALX148 in combination with azacitidine, clinical data from competitor programs and the differentiated tolerability profile of ALX148, we intend to pursue a strategy in which we will leverage the data generated from this Phase 1b/2 trial to request from the FDA that ALX148 be a candidate for accelerated approval in the first-line treatment of high-risk MDS. Similarly, we believe ALX148 combination therapies could address the significant unmet need for more active tolerable regimens in the majority of patients with AML who are not fit for intensive induction chemotherapy.
- **Expanding the therapeutic potential of CD47 blockade into solid tumors.** We believe ALX148 can overcome the limitations of other CD47 blocking approaches in solid tumors. We have generated encouraging data in subjects with HNSCC treated with ALX148 in combination with a PD-1 checkpoint inhibitor and in subjects with HER2-positive gastric/GEJ cancer, who have progressed on prior HER2-targeted therapy and chemotherapy, treated in combination with a HER2-targeted antibody. We have initiated additional Phase 1b cohorts for the first-line treatment of subjects with HNSCC and patients with HER2-positive gastric/GEJ cancer, with Phase 1b data expected in 2021. The FDA has granted ALX148 Fast Track designation in first-line HNSCC and advanced gastric/GEJ cancer. We intend to pursue a strategy in which we will leverage the data generated from our planned Phase 2 randomized trials of ALX148 and pembrolizumab with and without chemotherapy to request from the FDA that ALX148 be a candidate for accelerated approval in the first-line treatment of HNSCC. We are also planning a randomized Phase 2 trial of ALX148, trastuzumab and chemotherapy in first-line HER2-positive gastric/GEJ cancer to inform future paths to registration in this indication.
- **Continuing development of a pipeline of innovative therapeutics based on our protein engineering expertise and knowledge of the immune system and cancer biology.** We specialize in designing and developing drug candidates that engage the immune system. We continue to develop a pipeline of immuno-oncology programs that represent complementary, but differentiated, approaches to engaging the innate and adaptive immune systems.
- **Developing strategic partnerships to broaden the potential impact of our current and future product candidates across patient populations.** In order to advance treatment options for the most patients, we may partner with other companies with complementary resources that will maximize the value of our current and future product candidates. Such partnerships may allow us to pair ALX148 and our future product candidates with other novel agents owned fully or in part by strategic partners. Partnerships may also help realize the full potential of our product candidates in markets where we are unlikely to pursue development or commercialization on our own. We intend to maintain significant economic interest in our product candidates and selectively consider partnership opportunities.

Pipeline

Our initial programs are focused on targeting CD47 across various oncology indications. Many forms of cancer use CD47 expression as a means of evading immune response. We are targeting the hematologic malignancies and solid tumor indications where we believe we have the greatest potential to address large markets and unmet medical needs.

The chart below summarizes the development status of our product candidate pipeline.



We are also developing preclinical programs that may offer additional ways to engage the innate and adaptive immune response to cancer.

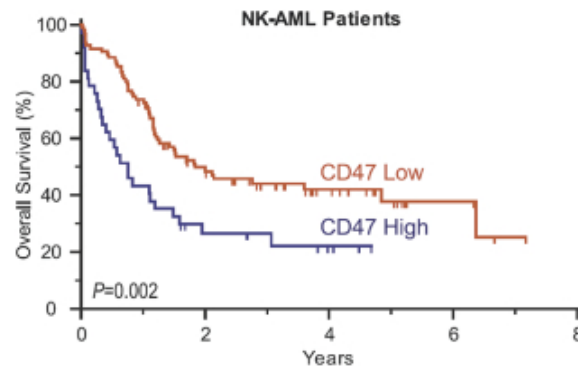
CD47 Scientific Background

Cancer immunotherapies targeting adaptive immune system checkpoints, notably those related to T cells, have transformed the standard of care in oncology across multiple cancer types. Initial clinical successes in this area have focused on stimulating the adaptive immune system. However, emerging evidence demonstrates that the innate immune system plays a crucial role in the first line of defense to eliminate transformed malignant cells and the subsequent activation of the adaptive immune system. Dendritic cells and macrophages are a type of myeloid cell and are important parts of the innate immune system. These cells eliminate cancer cells by phagocytosis and present tumor-derived antigens to T cells, a process known as cross-priming, which activates the adaptive immune system.

Cancer cells evade phagocytosis by up-regulating CD47, a transmembrane protein that mainly functions as an anti-phagocytic “don’t eat me” signal for healthy cells. CD47 interacts with its cognate receptor SIRP_a, a regulatory membrane glycoprotein, that is expressed on macrophages and other myeloid cells and serves to prevent phagocytosis when bound to CD47. By overexpressing CD47, cancer cells are able to avoid phagocytosis by macrophages and thereby evade subsequent detection by the adaptive immune system.

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High CD47 expression in cancer cells has been shown to be a prognostic indicator of decreased survival in multiple oncology indications. A study published by Majeti, et al. in 2009, assessed this association in a validation cohort of 137 subjects with acute myeloid leukemia, or AML. As shown in the figure below, normal karyotype AML, or NK-AML, subjects with high levels of CD47 expression had shorter median overall survival, or mOS, of 9.1 months compared to subjects with low levels of CD47 expression who had an mOS of 22.1 months.

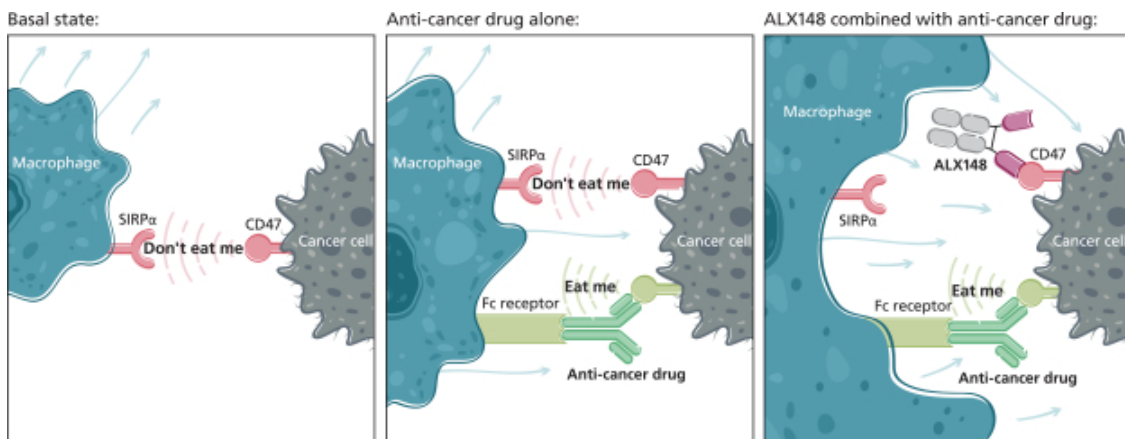


CD47 as a therapeutic checkpoint target

Data generated by our and other studies in the field have demonstrated that activating the immune system against cancer requires both blocking phagocytosis checkpoints and inducing pro-phagocytic signals. This can be achieved by combining CD47 blockade with either conventional chemotherapies or targeted therapies, which together promote phagocytosis by macrophages and maximize adaptive immune system response.

Existing anti-cancer therapeutics can increase “eat me” signals on cancer cells. For example, the hypomethylating agent, or HMA, azacitidine activates the immune system by increasing display of calreticulin, a multifunctional protein, on cancer cells. Calreticulin is an important example of a pro-phagocytic “eat me” signal that potentiates immune response when expressed on cancer cells. Therapeutic antibodies that target tumor-specific antigens, such as the HER2 receptor, also induce cellular phagocytosis, but through a slightly different mechanism. These antibodies direct macrophages to cancer cells by binding to the tumor-specific antigen and activating the macrophage by engaging the Fcγ receptors to induce phagocytosis. However, if CD47 is not blocked, the “don’t eat me” signal can limit the activity of this mechanism. CD47 blocking therapies can therefore maximize a combination agent’s clinical efficacy by overcoming the “don’t eat me” signal that is co-opted by cancer cells.

Our lead product candidate targets CD47 to maximize phagocytosis of cancer cells and activation of the adaptive immune system.



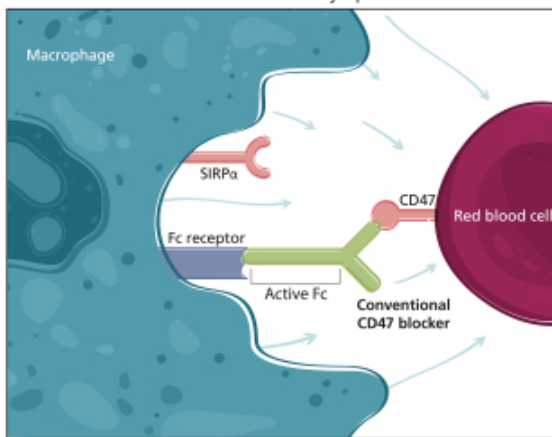
Cancer cells can also modulate their environment to suppress detection by immune cells. Overexpression of CD47 helps cancer cells avoid innate immune system detection by dendritic cells and subsequent antigen presentation to T cells, thereby limiting anti-tumor immune response. PD(L)-1 targeting immunotherapies are designed to reduce the suppression of T cells but do not address the initial evasion of the innate immune system by cancer cells. By removing the suppression of dendritic cells, CD47 blocking therapies in combination with PD(L)-1 targeted therapies can complement their T cell stimulatory activities.

Limitations of Current Approaches to Blocking CD47

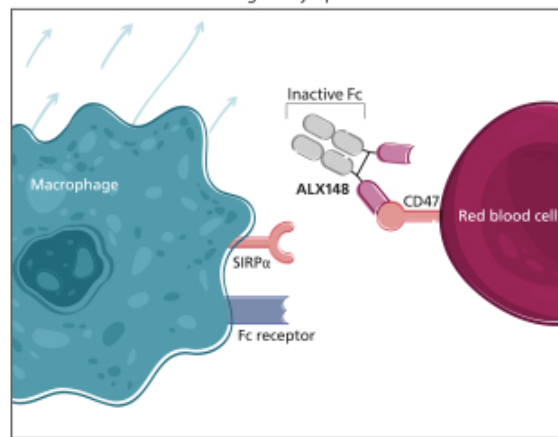
There have been a number of approaches to blocking CD47, including monoclonal antibodies and fusion proteins that include an active Fc region. These approaches have encountered limitations that have challenged their ability to maximize the full potential of CD47 blockade. These include:

- **Limited dosing and therapeutic window:** All clinical data to date from other CD47 blocking agents have come from approaches that incorporate an active Fc region that provides an “eat me” signal to macrophages. Given that healthy blood cells express CD47, the presence of an “eat me” signal coupled with CD47 binding in a single-agent leads to destruction of blood cells. This mechanism is illustrated in the figure below. The trials of these other CD47 blocking agents have resulted in frequent occurrence of treatment-related cytopenias that we believe limits the therapeutic window of these agents. In addition to limiting the dosing, cytopenias can be dangerous for patients undergoing treatment for cancer as they may already have a compromised immune system related to intensive treatment regimens and disease progression.
- **Limited ability to combine with other anti-cancer agents:** Combination therapies continue to play an important role in treating patients with cancer. Overlapping toxicities of these agents dictate which agents can and cannot be combined. The overlapping toxicity profiles of other CD47 blocking agents and most other anti-cancer agents create challenges for combination dosing. When combination dosing is possible, the therapeutic benefit of the combination is limited due to the minimal amount of the CD47 blocking agent that can be safely dosed. Moreover, many combinations are precluded entirely due to overlapping toxicity. In addition, an active Fc domain can compete with anti-cancer antibodies when used in combination treatments and can prevent such antibodies from binding with Fcγ receptors on immune cells.
- **Limited efficacy in solid tumors:** To date, other CD47 blocking agents have failed to achieve meaningful clinical activity in the treatment of solid tumors, as the balance between managing cytopenias and maximizing efficacy may lead to tolerable doses that are too low to facilitate tumor penetration and efficacy.
- **Limited indications due to patient selection:** Toxicities associated with other CD47 blocking agents may require careful patient selection when evaluating potential indications. In some cases, only subjects with lower risk of hematologic complications have been selected for treatment for other CD47 blocking agents due to drug related risk of severe cytopenias. Several sponsors have chosen to initially develop these investigational medicines in indications such as MDS, where patients are often already cytopenic upon presentation and receive regular transfusions, potentially obscuring the side effects of their CD47 blocking approaches.

CD47 blockers with an active Fc result in cytopenias:



ALX148 with an inactive Fc mitigates cytopenias:



Advantages of ALX's Approach to Blocking CD47

We founded ALX Oncology because we believed the limitations described above would prevent CD47 blockade from reaching its full potential as a therapy for patients with cancer. From the company's inception, we designed ALX148 to overcome these limitations and to maximize the utility of CD47 blockade as an effective anti-cancer therapeutic for a broad range of tumors. Specifically, we believe ALX148 may provide the following significant advantages:

- **Broader therapeutic window:** We believe ALX148's broader therapeutic window will allow for greater drug exposure than other CD47 blocking agents potentially translating into improved efficacy across a range of cancers, including MDS and AML, compared to other CD47 blocking agents. To date, we have not yet reached a maximum tolerated dose, or MTD, for ALX148. Furthermore, flexibility in dosing could allow for several administration schedules (weekly, bi-weekly, every three weeks, monthly) that are more amenable to combination therapy dosing schedules, potentially improving a patient's quality of life.
- **Strong potential for combination with other anti-cancer agents:** CD47 blocking agents are combined with other therapeutics in order to maximize their potential in treating patients with cancer. Unlike other CD47 blocking agents, ALX148 was specifically designed to be combined with other anti-cancer agents. We believe ALX148's favorable toxicity profile will enable it to be combined with a wider range of anti-cancer agents, including chemotherapy and cytotoxic containing regimens, compared to other CD47 blocking agents. Furthermore, we believe that ALX148's inactive Fc domain will neither compete with nor potentially limit the efficacy of anti-cancer antibodies when used in combination treatments.
- **Encouraging responses in solid tumors:** ALX148 has demonstrated meaningful Phase 1 clinical data in the treatment of solid tumors. While other CD47 blocking agents have failed to demonstrate meaningful clinical activity in solid tumors, ALX148's differentiated properties may underlie its encouraging results. Based on the data generated with ALX148 in combination with anti-cancer antibodies and checkpoint inhibitors, our strategy is to pursue ALX148 as a potentially critical component for future combination treatment of solid tumors.
- **Broader potential indications:** We believe ALX148's tolerability profile will allow for broad treatment of patient populations in a wide range of oncology indications. Toxicities such as cytopenias associated with other CD47 blocking agents may potentially constrain their development strategies. While initial activity of other CD47 blocking agents has been reported in indications such as MDS and AML where many patients already suffer from disease-induced cytopenias, their development in oncology indications that do not include associated cytopenias may be challenged. We believe ALX148 is well positioned to expand the therapeutic potential of CD47 blockade across a broad spectrum of hematologic and solid tumor indications.

ALX148

Our lead product candidate, ALX148, is a CD47 blocking biologic in development as a combination therapy with other anti-cancer agents for treatment of various oncology indications, including MDS, AML, HNSCC and gastric/GEJ. We engineered ALX148 to maximize CD47 blockade and to avoid hematologic toxicities. We believe ALX148 enhances the efficacy of both anti-cancer targeted antibodies, numerous small molecule drugs and T cell checkpoint inhibitors and exhibits no dose-dependent cytopenias. ALX148 has demonstrated encouraging clinical responses in combination with multiple anti-cancer regimens for both hematologic and solid malignancies.

Other companies have pursued CD47 blocking approaches that prioritize single-agent activity, albeit with limited success. Rather than designing a molecule for monotherapy activity that has been associated with cytopenias, we designed ALX148 for use in combination with anti-cancer agents. Our product candidate exclusively blocks the "don't eat me" pathway. A combination anti-cancer agent provides a specific pro-phagocytic signal on cancer cells. This approach may both increase the specificity to cancer cells and avoid dose-dependent destruction of healthy blood cells.

Fusion Protein Design

ALX148 is a fusion protein designed to provide a high CD47 blocking potency while potentially eliminating any associated toxicities. Our fusion protein comprises an engineered CD47-binding domain of SIRP α that has been genetically linked to a modified human immunoglobulin-derived Fc domain that does not bind to Fc γ receptors. We engineered ALX148 in two important ways:

- We mutated the binding domain to optimize CD47 affinity. ALX148 binding domain demonstrates an affinity that is over 3,000 times stronger than wildtype SIRP α .
- We fused the CD47-binding region of SIRP α to an inactive Fc domain. Incorporating an inactive Fc domain was intended to eliminate single-agent activation of macrophages while still maintaining an antibody-like pharmacokinetic, or PK, profile.

The successful design of ALX148 required in-house generation of approximately 280 different protein constructs to thoroughly evaluate and optimize the impact of differing designs on multiple important evaluation criteria.

In order to optimize ALX148's properties we conducted the following processes:

- Design of the high-affinity CD47 binding domain:
 - Optimization of binding affinity for human CD47;
 - Optimization of cross-reactivity to rodent and monkey CD47 to enable key translational experiments; and
 - Elimination of partially glycosylated sites in SIRP α to remove heterogeneity and enable consistent manufacturing.
- Design of the optimal fusion combination for PK extension:
 - Selection of an immunoglobulin isotype to prevent hemagglutination; and
 - Selection of mutations to immunoglobulin G1, or IgG1, to functionally eliminate Fc γ binding and avoid associated cytopenias while maintaining neonatal Fc receptor binding that enables antibody-like PK.

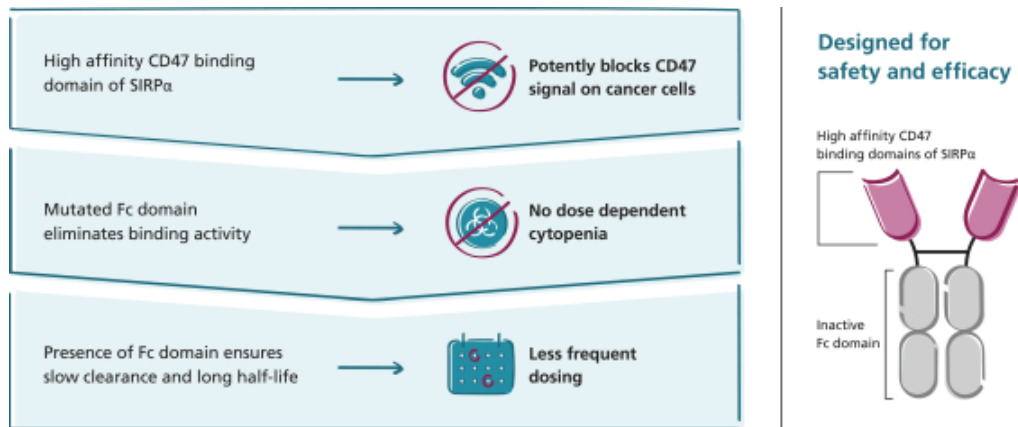
As illustrated in the figure below, ALX148 comprises:

- A SIRP α binding domain optimized to bind to CD47 with high affinity at a picomolar level; and
- An inactive Fc domain that reduces cytopenias while preserving the desired PK properties of antibodies with an active Fc domain.

The resulting fusion protein has approximately one-half the molecular weight of a typical antibody. ALX148's lower molecular weight enables it to deliver the molar equivalent of an antibody at one half the dose. For example, a 30 mg/kg dose of ALX148, the highest level that we have dosed to date, is approximately equivalent to a 60 mg/kg dose of an antibody. ALX148's lower molecular weight may also facilitate increased solid tumor penetration and provide greater potency within the tumor microenvironment. Furthermore, ALX148 can be efficiently and consistently produced at high yield at commercial scale utilizing standard monoclonal antibody manufacturing techniques. We believe ALX148's differentiated properties potentially overcome the limitations of other CD47 blocking agents and may have utility as a combination agent in oncology.

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Our lead candidate is a fusion protein that potently and selectively binds CD47 to block the SIRP α interaction.



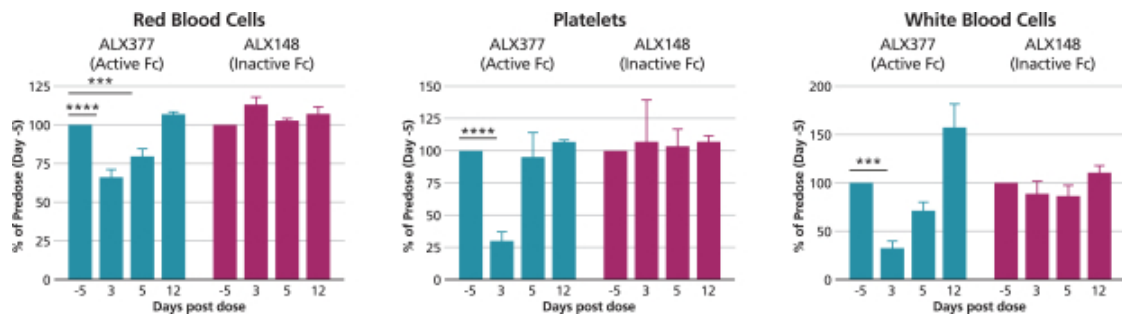
Pre-Clinical Differentiation

Our preclinical studies of ALX148 support a target product profile of favorable tolerability, the ability to be dosed in high levels and increased anti-tumor activity as compared to other CD47 blocking agents. These data include the following.

Lack of hematologic side effects

Our preclinical data demonstrate that CD47 blocking agents with an active Fc domain directly cause adverse hematologic side effects. To support this hypothesis, we engineered a fusion protein with a SIRP α CD47-binding domain identical to ALX148's binding domain but fused to an active, wild-type IgG1 Fc domain, ALX377. We administered 30 mg/kg ALX148 and 30 mg/kg ALX377 in mouse models and measured red blood cell, or RBC, platelet and white blood cell (lymphocyte, monocytes and granulocytes) counts. As shown in the figure below, mice treated with ALX148 having an inactive Fc domain showed blood count levels that were similar to the pre-dose baseline. In contrast, mice treated with ALX377 having an active Fc domain showed average decreases of 34% in RBC count, 70% in platelet count and 67% in white blood cell count three days post-dosing as compared to baseline counts.

The inactive Fc domain on ALX148 is responsible for improved hematologic tolerability in preclinical models.



*** p<0.001
**** p<0.0001

To further evaluate ALX148's preclinical tolerability, cynomolgus monkeys were treated by weekly intravenous injections at doses of zero (control), 10, 30 and 100 mg/kg for five consecutive weeks. No toxicity or adverse findings related to CD47 blockade by ALX148 were seen in analysis of RBCs, white blood cells, platelets, body weight, ophthalmic examination, cytokine analysis, ECG parameters and anatomical pathology assessment. The no-observable-adverse-effect-level in the study was the highest dose tested, 100 mg/kg.

Together, these preclinical studies demonstrate that inactivation of the Fc domain of ALX148 avoids adverse effects on normal blood cells seen on other CD47 blocking agents with an active Fc domain. They also supported our

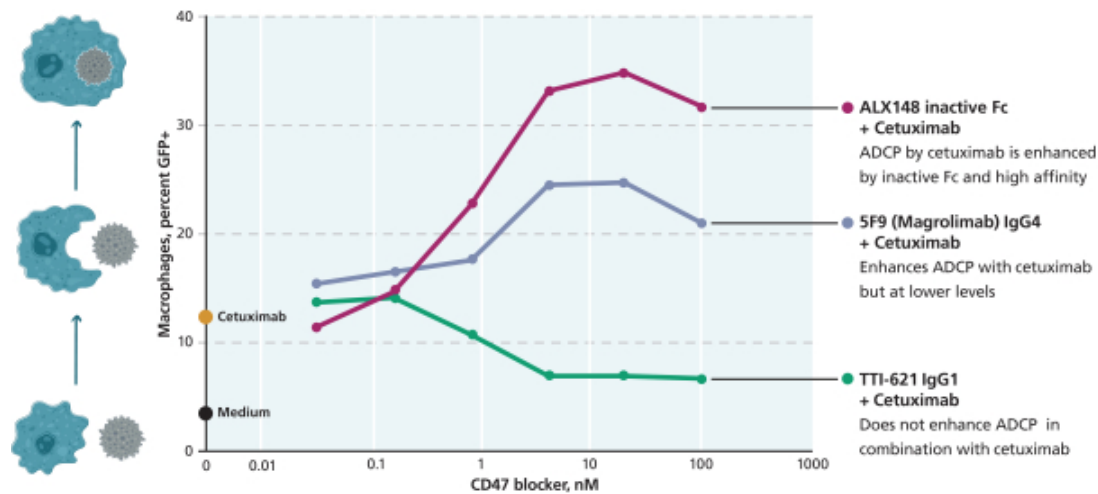
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expectation that ALX148's lack of overlapping toxicities with other anti-cancer therapies would result in fewer adverse outcomes in a clinic when combined with these therapies than combinations with conventional CD47 blocking agents.

ALX148 elicits superior phagocytosis in combination with anti-cancer antibodies

The inactive Fc of ALX148 does not compete with the active Fc domain of other therapeutic antibodies for binding with Fcγ receptors on effector cells of the immune system. This fact, coupled with the high-affinity CD47 binding of our agent, results in enhanced phagocytosis from ALX148 in combination with other anti-cancer antibodies to a greater extent than other CD47 blockers. We believe this will allow us to explore ALX148 in combination with a higher number of leading anti-cancer antibodies compared to other CD47 blocking agents in both hematologic malignancies and solid tumors. In order to investigate the potential effects of the Fc domain and CD47 binding affinity on phagocytic activity, we produced two CD47 blocking agents with either an IgG4 or IgG1 active Fc domain, based on published sequences from two other clinical CD47 blockade programs. We combined these agents and ALX148 with cetuximab, an epidermal growth factor receptor, or EGFR, inhibitor that is FDA approved for several solid tumors, to assess phagocytic activity as compared to single-agent cetuximab. Both cetuximab and the active Fc domain of a CD47 blocking agent bind to the same cell surface Fcγ receptors on a macrophage, potentially creating competition. IgG1 binds to receptors with higher affinity than IgG4 does, and ALX148's inactive Fc does not bind. This experiment shows that CD47 blocking agents with active Fc domains and lower affinity, combined with cetuximab result in lower phagocytic activity from macrophages as compared to ALX148 with cetuximab. This experiment suggests ALX148, the only clinical CD47 blocking agent with an inactive Fc domain and high-affinity CD47 binding, may be unique in its anti-tumor activity when combined with anti-tumor antibodies.

ALX148 has shown superior antibody-dependent cellular phagocytosis, or ADCC, of solid tumor cells compared to CD47 blockers with an active Fc domain and lower CD47 affinity when combined with an anti-tumor antibody.



Clinical Data

Favorable safety profile

Clinical trials to date continue to support ALX148's differentiated approach to CD47 blockade. ALX148 has been administered in over 150 subjects with advanced solid or hematologic malignancies, including in combination with a range of standard of care anti-cancer regimens. ALX148 has been consistently well-tolerated, with low occurrences of cytopenias and other toxicities. Adverse events are reported as of April 1, 2020.

We have not yet reached a maximum tolerated dose in any trial of ALX148 and are continuing to test higher doses. Because the half-life of ALX148 is longer with higher dose levels, such dosing may allow up to an every four weeks, or Q4W, administration schedule. Furthermore, ALX148's tolerability profile could potentially result in a broad therapeutic window. We believe its tolerability profile to date supports initiation of trials in combination with highly

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effective, but more toxic, standard of care agents, such as chemotherapies that can cause cytopenias. Many other CD47 blocking agents are unable to combine with these anti-cancer agents due to overlapping toxicity profiles. We believe ALX148 may be uniquely positioned in its ability to combine with standard of care agents including those with associated cytopenias.

Initial data suggests that ALX148 demonstrates a consistent tolerability profile in Phase 1 trial cohorts.

| Treatment related adverse events | ALX148 + Rituxan (N=33) | | ALX148 + Keytruda (N=52) | | ALX148 + Herceptin (N=30) | |
|-------------------------------------|-------------------------|----------|--------------------------|----------|---------------------------|----------|
| | Total n (%) | ≥Grade 3 | Total n (%) | ≥Grade 3 | Total n (%) | ≥Grade 3 |
| Fatigue | 3 (9.1%) | - | 6 (11.5%) | - | 9 (30.0%) | - |
| Rash | 6 (18.2%) | - | 5 (9.6%) | - | - | - |
| AST increased | - | - | 9 (17.3%) | - | - | - |
| Platelets decreased | - | - | 4 (7.7%) | 2 (3.8%) | 5 (16.7%) | 2 (6.7%) |
| ALT increased | - | - | 7 (13.5%) | 1 (1.9%) | - | - |
| Pruritus | - | - | 5 (9.6%) | - | 3 (10.0%) | - |
| Pyrexia | - | - | 3 (5.8%) | - | 3 (10.0%) | - |
| Decreased appetite | - | - | 2 (3.8%) | - | 3 (10.0%) | - |
| Anemia | 2 (6.1%) | 1 (3.0%) | 5 (9.6%) | 1 (1.9%) | 2 (6.7%) | - |
| Infusion reaction | - | - | 4 (7.7%) | - | - | - |
| Neutropenia / Neutrophil count decr | 2 (6.1%) | 2 (6.1%) | 2 (3.8%) | 1 (1.9%) | 2 (6.7%) | 2 (6.7%) |
| Nausea | 2 (6.1%) | - | 2 (3.8%) | - | 2 (6.7%) | - |
| Alkaline phosphatase incr | - | - | 3 (5.8%) | - | - | - |
| Arthralgia | - | - | 3 (5.8%) | - | - | - |
| WBC decreased | - | - | 3 (5.8%) | - | - | - |
| Myalgia | - | - | 2 (3.8%) | - | - | - |

As of April 1, 2020. Treatment-related adverse events occurring in 32 subjects in all histologies.

Single-digit incident rates of treatment-related grade three and higher cytopenias occurred across each of the trial cohorts in this heavily pre-treated group of subjects who are typical participants in early stage cancer trials and are often hematologically fragile at baseline. Additionally, the majority of treatment-related adverse events were of low-grade and were easily managed. Overall, ALX148 was well tolerated in an advanced cancer population and can be combined with a wide range of anti-cancer therapeutics.

All other CD47 blockers that have reported clinical data have reported high rates of both all grade and high grade cytopenias. A magrolimab clinical trial in solid tumors resulted in 56% anemia in the first 48 subjects dosed, despite each subject receiving an initial priming dose to mitigate anemia. A recent trial of magrolimab in 62 subjects with higher-risk MDS or AML presented in December 2019 reported over 35% grade 3 or 4 treatment-related anemia, over 20% grade 3 or 4 treatment-related neutropenia and over 15% grade 4 treatment-related thrombocytopenia. An unfavorable tolerability profile such as this could present challenges to these agents. In contrast, ALX148's tolerability profile may enhance the breadth of clinical development by providing better treatment options for patients with cancer.

Clinical PK and PD Data

Initial clinical trials have confirmed that ALX148 exhibits favorable PK, and CD47 target occupancy, or TO. Human PK following intravenous, or IV, doses of ALX148 ranging from 0.3 to 30 mg/kg either as a single-agent, or in combination with pembrolizumab, trastuzumab or rituximab have been characterized in 131 subjects as of January 21, 2020. ALX148's PK profiles demonstrated a non-linear PK trend with faster clearance at lower doses and slower clearance at higher doses of 10 mg/kg QW and 30 mg/kg once every other week, or QoW. ALX148's PK profile was not affected by combination with rituximab, trastuzumab or pembrolizumab.

The pharmacodynamics, or PD, following ALX148 IV infusion either as a single-agent or in combination with pembrolizumab, trastuzumab or rituximab have been characterized in 139 subjects in as of January 21, 2020. Target engagement has been confirmed based on CD47 TO in peripheral blood T lymphocytes and erythrocytes measured by a flow cytometry assay. At lower doses of 0.3 mg/kg and 1 mg/kg, a dose-dependent increase of TO was observed. Increased TO was observed following the subsequent IV dosing compared to the first IV infusion. Complete TO (> 85%) in peripheral blood was observed at doses 3 mg/kg QW. Complete TO in peripheral blood was also

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observed for ALX148 dosed at 10 mg/kg QW in combination with pembrolizumab, trastuzumab or rituximab. Based in part on this data, Phase 1b expansion trials used 10 mg/kg QW dosing of ALX148.

In our Phase 1b expansion trial to date, we have observed what may be a dose-response in subjects with NHL. While our data support full TO in the periphery at 10 mg/kg, enhanced tumor penetration may explain the higher response rate seen at 15 mg/kg in the clinic. Given the favorable tolerability observed to date at doses up to 15 mg/kg QW, we plan to evaluate these higher doses of ALX148.



Clinical Development of ALX148 in Hematologic Malignancies

The potential role of CD47 blockade to date has been clearly demonstrated in hematologic malignancies. This includes both our trials of ALX148 as well as trials by other CD47 blockade programs. We are planning to advance ALX148 in MDS and AML based on our initial trials in relapsed/refractory NHL, preclinical studies and evidence for the clinical utility of the CD47 blockade from other programs.

NHL Proof-of-Principle

ALX148's initial hematologic clinical trial is an ongoing Phase 1b expansion trial in combination with rituximab to treat subjects with relapsed/refractory NHL. This is an open-label, multisite trial to assess safety. Subjects received ALX148 10 mg/kg QW or 15 mg/kg QW in combination with rituximab 375 mg/m² administered as an intravenous infusion QW for four doses followed by once monthly for eight doses. In order to meet inclusion criteria, subjects must have had no curative therapy or standard approved therapy option available to them. Across all cohorts, as of April 1, 2020, subjects had received a median of three lines of therapy prior to enrollment in the ALX148 trial. These were heavily pre-treated subjects, all of whom had progressed on previous rituximab-containing regimens.

Responses were evaluated according to Lugano 2014 response criteria and reported as of April 1, 2020. As of April 1, 2020, ALX148 had been administered to 33 subjects. All subjects were response evaluable. 11 had indolent lymphomas and 22 had aggressive lymphomas. There were 11 subjects in the higher dose 15 mg/kg QW cohort. This cohort achieved an ORR of 54.6% (6/11). The ORR in the lower dose 10 mg/kg QW cohort was 40.9% (9/22).

| Phase 1b NHL cohorts | Population | 10 mg/kg QW | | 15 mg/kg QW | |
|--|------------|-------------|-------|-------------|-------|
| | | N | ORR | N | ORR |
|  Relapsed/Refractory NHL, prior regimen with Rituxan | All | 22 | 40.9% | 11 | 54.6% |
|  Treatment: ALX148 10 or 15 mg/kg once a week (QW) + Rituxan 375 mg/m ² once a week for 4 weeks, once monthly for 8 months | Aggressive | 15 | 33.3% | 7 | 42.9% |
| | Indolent | 7 | 57.1% | 4 | 75.0% |

N=Response evaluable patients
Indolent = Follicular Lymphoma and Marginal Zone Lymphoma.
Aggressive = Diffuse Large B-cell Lymphoma and Mantle Cell Lymphoma.
ORR = Objective Response Rate.

As of April 1, 2020.

We view ALX148's initial activity in heavily pre-treated subjects with NHL as compelling evidence for the role of ALX148 in treating hematologic malignancies and as a favorable comparison to outcomes reported by other CD47 blocking agents in similar subjects. We believe the data in our 10 and 15 mg/kg QW cohorts may show a dose-dependent response that demonstrates ALX148's activity and supports higher dose administration in trials for subjects with MDS.

Based on the activities seen at the 10 and 15 mg/kg QW doses coupled with a favorable tolerability profile, we are intending to test higher doses, up to 60 mg/kg Q4W in MDS. We believe this dosing schedule may be unique among

CD47 blockade programs and can potentially provide a more convenient regimen in combination with monthly azacitidine for patients. This data set also supported our decision to advance ALX148 into solid tumor indications at higher doses of 45 mg/kg once every three weeks, or Q3W, in combination with standard agents also administered Q3W.

ALX148 for the Treatment of MDS

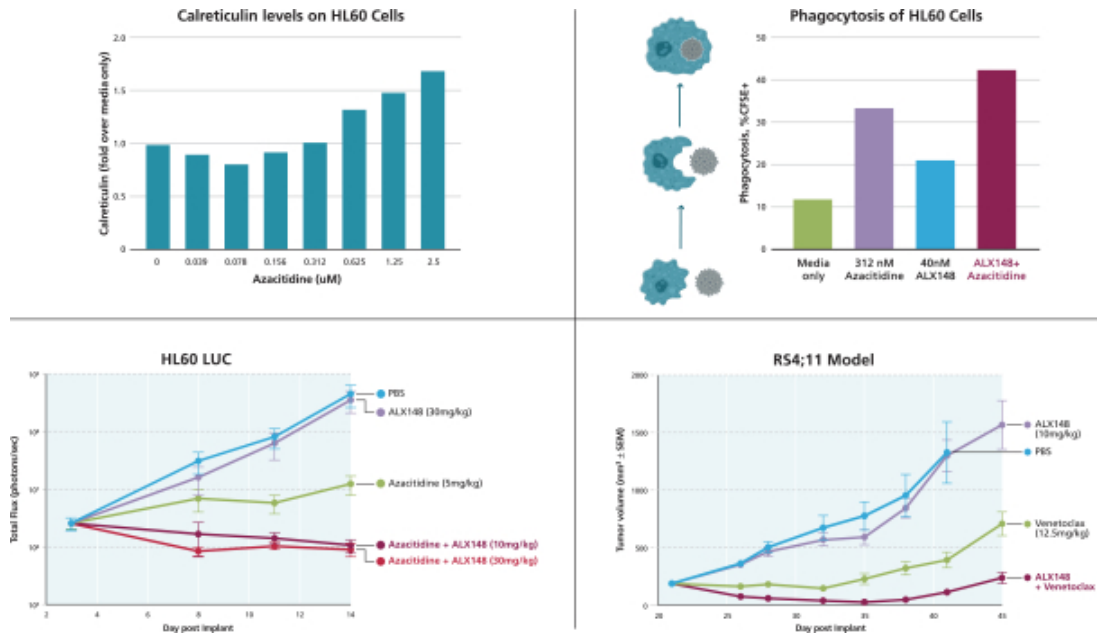
Our development of ALX148 in hematologic indications is initially focused on MDS. There are approximately 70,000 people living with diagnosed MDS in the U.S. Patients with MDS have a wide range of expected outcomes that can be estimated from their Revised International Prognostic Scoring System, or IPSS-R, risk category. Patients with very low IPSS-R have an mOS of 8.8 years, whereas those with very high IPSS-R have an mOS of under ten months. Since nearly 75% of new cases are in patients aged 70 or older, balancing a patient's age at prognosis with potential treatment-related impact on quality of life is important in considering treatment options. Regardless of age, treatment goals for patients with MDS are a balance of improved survival, symptom alleviation and quality of life.

For patients with higher-risk MDS (intermediate, high and very high IPSS-R), standard of care treatments include stem cell transplant, or SCT, high and low-intensity chemotherapy regimens and HMAs. SCT is the only therapy that is potentially curative; however, the procedure is difficult to tolerate, especially for older patients, and has a non-relapse mortality rate of approximately 40% at 200 days for all patients with MDS.

For patients who are ineligible for SCT, azacitidine, an HMA, is a standard backbone therapy for combination treatment regimens in MDS. The drug continues to be used in combination with investigational agents in a number of current MDS trials. Single-agent azacitidine is one of the few FDA-approved agents for patients with MDS. However, its FDA label indicates a complete response, or CR, rate of only 5.6% and an mOS of 2.0 years. A clinical complete response comprises normalizing peripheral blood counts, resolution of bone marrow dysplasia and reduction in the percentage of immature blood cells, or myeloblasts, to less than 5%. CD47 blockade in combination with azacitidine has shown early clinical evidence that suggests it may improve CR rates in MDS. For patients with higher-risk MDS, achieving a CR and improving overall survival are the central treatment goals. Treatment goals for patients with lower-risk MDS are different. The primary goal for those patients is resolution of cytopenias.

Red blood cell transfusions are a key element of treatment intended to address cytopenias in patients with MDS. The majority of patients have a hemoglobin count of less than 10 g/dL and approximately one-third of patients are RBC transfusion dependent. Transfusions impose significant time and cost burdens on patients and also cause clinical sequelae such as iron overload and associated liver fibrosis and cardiomyopathy. Therefore, achieving transfusion independence is an important secondary goal of treating patients with higher-risk MDS. A competitive CD47 blocking agent has generated encouraging clinical data, however, it is associated with high rates of anemia that may require additional transfusions upon treatment initiation, mitigating any success in peripheral blood count normalization.

The promising clinical data with CD47 blocking agents in MDS underscore the need for combination of two agents to achieve CRs. As previously discussed, pro-phagocytic signals in ALX148-based combinations can be provided by drugs that increase display of the "eat me" signal calreticulin on the surface of tumor cells. We have conducted preclinical studies that show that azacitidine increases the display of the "eat me" signal calreticulin on AML cells. Additionally, we have shown that azacitidine and ALX148 in combination produces increased phagocytosis in vitro and anti-tumor activity in mouse models compared to azacitidine alone. Furthermore, we have demonstrated in preclinical studies that ALX148 when combined with venetoclax, a BCL-2 inhibitor that is FDA-approved for the treatment of patients with AML, increases tumor growth inhibition in a leukemia tumor model, compared to venetoclax alone.



Recent data from a competitive CD47 blockade program, magrolimab, further support trials of ALX148 for treatment of MDS. Magrolimab was studied both as a single-agent and in combination with azacitidine in subjects with higher-risk MDS or AML. Magrolimab plus azacitidine achieved a 42% CR rate in previously untreated MDS and a 40% CR in previously untreated AML. As a single-agent, magrolimab achieved no CRs in relapsed/refractory MDS and AML, suggesting that a separate pro-phagocytic signal is required for the observed clinical activity. Despite the high rate of CRs achieved in combination, over 38% of subjects in these trials have experienced grade 3 or higher treatment-related anemia. Notwithstanding these limitations, magrolimab's data support the potential role of CD47 blockade in treating these subjects.

Our strategy is to pursue ALX148 as a potentially critical component for future combination treatment options for patients with higher-risk MDS. Our preclinical models, activity of ALX148 in NHL where magrolimab has reported similar data and available CD47 clinical data in this indication support a potential role for ALX148 for treatment of patients with MDS. Baseline characteristics of subjects in a recent trial of azacitidine plus venetoclax in treatment-naïve higher-risk MDS illustrated the need for therapies that do not induce cytopenias. Prior to treatment, 56% of subjects had grade 3 or higher neutropenia, 33% had grade 3 or higher thrombocytopenia, 40% had grade 3 or higher leukopenia and 12% had grade 3 or higher anemia. We believe that it is important to develop a CD47 blocking therapy that does not exacerbate cytopenias that patients may already exhibit pre-treatment. ALX148's tolerability profile to date suggests it may address this unmet need in patients who suffer from MDS.

We plan to initiate a Phase 1b/2 trial of ALX148 in combination with azacitidine for the first-line treatment of subjects with higher-risk MDS by the end of 2020. The Phase 1b portion of the trial will seek to evaluate up to 60 mg/kg Q4W of ALX148 plus standard azacitidine in subjects with relapsed/refractory and previously untreated MDS. The Phase 2 portion of the trial will assess the combination of ALX148 and azacitidine in subjects with previously untreated higher-risk MDS. The primary endpoint will be complete remission rate by six months. We intend to pursue a strategy in which we will leverage the data generated from the Phase 1b/2 trial to request from the FDA that ALX148 be a candidate for accelerated approval in the treatment of MDS.

ALX148 for the treatment of AML

Our preclinical studies and clinical studies from competing CD47 agents support the potential role of ALX148 in the treatment of patients with AML. In the United States, there are over 35,000 people living with AML with an expected 20,000 newly diagnosed cases and over 11,000 deaths from the disease in 2020. Overall survival for patients with AML is generally worse than patients with higher-risk MDS. Median overall survival for patients with

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AML ranges from approximately 15 months for patients with favorable cytogenetic risk factors to less than 5 months for those with adverse risk factors. Similar to MDS, patients tend to be older with a median age at diagnosis of 68.

First-line treatment options for patients can be broadly stratified into high-intensity and low-intensity induction regimens. High-intensity induction chemotherapy is typically cytarabine plus an anthracycline (so called "7+3") administered over a 28-day cycle. While patients can derive long term benefit from 7+3, the risks of the regimen are substantial. 60-day treatment-related mortality from 7+3 induction have been as high as 27% and have declined to 6-8% in recent years, likely due in part to more stringent patient selection and the decreased average age of patients who receive 7+3. Patients who are not candidates for intensive induction chemotherapy due to preference, performance status, or other reasons are likely to receive low-intensity regimens characterized by the use of HMAs, venetoclax or combined HMA plus venetoclax. In the past decade, the percentage of patients 65 and older who receive first-line high-intensity treatment has declined from approximately 70% to 40%, while the use of HMAs in this population increased from 11% to 44%. Venetoclax combined with an HMA recently received accelerated approval from the FDA for use in adults who are 75 years or older or who have comorbidities that exclude the use of intensive induction chemotherapy. Venetoclax was approved on the basis of CR rate and duration of CR and achieved a 37% CR rate in combination with azacitidine and 54% in combination with decitabine, and a median observed time in remission of 5.5 months. Despite these results, we believe there is a significant unmet need for more effective and well-tolerated first-line treatment options for patients who are not candidates for high-intensity therapy.

The mechanistic rationale for combining ALX148 with azacitidine in AML is similar to the rationale for MDS. Preclinical studies show that azacitidine increases the display of calreticulin, a pro-phagocytic signal, on cancer cells in AML models. The preclinical studies that support the use of ALX148 combinations in MDS also support its use in AML. Clinically, the CD47 agent magrolimab has achieved a 40% CR rate in untreated AML when used in combination with azacitidine. In a separate study in patients 65 and older with untreated AML, single-agent azacitidine as achieved a 20% CR rate. We believe this indicates CD47 agents could increase the activity of HMAs above their single-agent levels. Furthermore, our preclinical data of ALX148 in combination with venetoclax supports the combination with this agent that is increasingly being used in the treatment of patients with AML.

We plan to initiate a Phase 1b/2 trial of ALX148 in combination with standard of care agents for the first-line treatment of patients with AML in 2021.

ALX148 in Solid Tumors

We have generated promising clinical data with ALX148 in solid tumors. We believe the smaller molecular weight of ALX148 as compared to a typical antibody may facilitate greater penetration into solid tumors. In addition, we believe the favorable tolerability profile of ALX148 will allow for higher administered doses in a range of combination strategies with leading therapies for solid tumors. Solid tumors represent the largest markets within oncology and many of these oncology indications are poorly served by current therapies, both in front-line as well as in the relapsed and refractory settings. We have demonstrated proof of concept with ALX148 in combination treatment in two solid tumor settings in initial clinical trials: HNSCC and HER2-positive gastric/GEJ cancer. We believe these indications offer registration pathways in combination with existing approved therapies and we intend to advance ALX148 into randomized Phase 2 trials in both oncology indications in 2021.

ALX148 can be combined with PD-1/programmed death-ligand 1, or PD-(L)1, agents in a broad range of solid tumors. As part of our development strategy, we are exploring the use of ALX148 in combination with a PD-1 inhibitor in HNSCC. PD-(L)1 inhibitors are currently approved by the FDA for 18 indications and had over \$20 billion in 2019 sales. Other CD47 blocking approaches may be limited in their ability to combine with PD-(L)1 inhibitors due to cumulative or overlapping toxicities.

We are investigating ALX148 in subjects with solid tumors in additional cohorts as part of an extensive and ongoing Phase 1 trial. Part 1 was a dose escalation trial of single-agent ALX148 intended to examine tolerability and recommended dosing and was not expected to show single-agent activity. Sixteen subjects with solid tumors received ALX148 as a single-agent on a QW schedule at doses ranging from 0.1 mg/kg to 10 mg/kg and 12 subjects received ALX148 as a single-agent on a QoW dosing schedule at a dose of 30 mg/kg. The maximum tolerated dose was not determined on either schedule. However, the maximum administered dose was 30 mg/kg for the Q2W dosing schedule and 10 mg/kg for the QW schedule.

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Part 2, which is ongoing, is comprised of ALX148 escalation and expansion cohorts. In subjects with solid tumors, ALX148 was combined with various anti-cancer agents including pembrolizumab, trastuzumab and chemotherapy. Adverse events from the ALX148 plus pembrolizumab cohort and ALX148 plus trastuzumab cohort are reported above. As previously discussed, ALX148 has consistently displayed a favorable tolerability profile. Many of the reported adverse events have been associated with either pembrolizumab or trastuzumab.

In HNSCC, our initial Phase 1b expansion trial combined ALX148 with pembrolizumab, an anti-PD-1 agent, which is a standard of care for subjects with HNSCC. ALX148 plus pembrolizumab combination studies provided the first demonstration of ALX148's ability to enhance checkpoint inhibitor antibody activity in solid tumors and is the basis for FDA Fast Track designation in first-line treatment of HNSCC. Data from this trial support our recently initiated trial in HNSCC.

In HER2-positive gastric/GEJ cancer, our initial expansion trial included a combination with trastuzumab, an anti-HER2 agent, that is the standard of care for subjects with HER2-positive gastric/GEJ cancer and is FDA-approved for other HER2-expressing tumors. ALX148 combined with trastuzumab provided the first demonstration of ALX148 activity with an anti-tumor targeted antibody in subjects with solid tumors. Data from this trial formed the basis for FDA Fast Track designation in second-line subjects with advanced HER2-positive gastric/GEJ cancer and supports our recently initiated trial in gastric/GEJ cancer.

Overall, we believe our development plan for ALX148 in solid tumors has significant potential and represents a strong complement to our program in hematologic malignancies. With encouraging data in multiple drug combinations initially evaluated in the clinic, we plan to advance trials to assess efficacy in the solid tumor indications with substantial unmet medical need.

ALX148 in HNSCC

Disease background

There are estimated to be over 38,000 people living in the United States with metastatic HNSCC, with over 50,000 newly incident cases at all stages estimated to be diagnosed in 2020. Five-year survival is 85% for patients diagnosed with localized disease but decreases to only 40% for those diagnosed with metastatic disease, underlying the need for improved treatment options.

FDA-approved and National Comprehensive Cancer Network, or NCCN, recommended therapies for the first-line treatment of recurrent/metastatic disease include pembrolizumab monotherapy, pembrolizumab combined with chemotherapy, platinum and fluorouracil, and cetuximab, an anti-epidermal growth factor receptor antibody, combined with chemotherapy among other treatments. The KEYNOTE-048 clinical trial led to the FDA approval of pembrolizumab monotherapy as a first-line treatment in patients with HNSCC whose tumors express PD-L1 on a Combined Positive Score, or CPS, ³1 and approval of pembrolizumab plus chemotherapy as a first-line treatment in patients with HNSCC regardless of CPS. In KEYNOTE-048, pembrolizumab monotherapy achieved 17% ORR with a median progression-free survival, or mPFS, of 2.3 months in subjects with HNSCC regardless of CPS. Of particular note, in subjects with CPS <1 pembrolizumab monotherapy only achieved a 5% ORR.

Pembrolizumab monotherapy in previously treated HNSCC was reported in the Phase 3 KEYNOTE-040 trial. Subjects were excluded if they had prior therapy with an anti-PD-1 or anti-PD-L1 therapy. In KEYNOTE-040, pembrolizumab achieved a 15% ORR, mPFS of only 2.1 months and mOS of 8.4 months. While we believe pembrolizumab is an important treatment option for both first- and second-line HNSCC, the majority of patients do not have an objective response to pembrolizumab-based therapy.

Despite the recent approval of pembrolizumab, we believe that there is significant unmet need remaining for patients with HNSCC. The addition of ALX148 to pembrolizumab, or pembrolizumab plus chemotherapy, may have the potential to improve response rates and provide additional clinical benefit to patients with metastatic HNSCC. We have evaluated ALX148 in subjects with metastatic HNSCC and continue to develop ALX148 in this setting.

Trial design

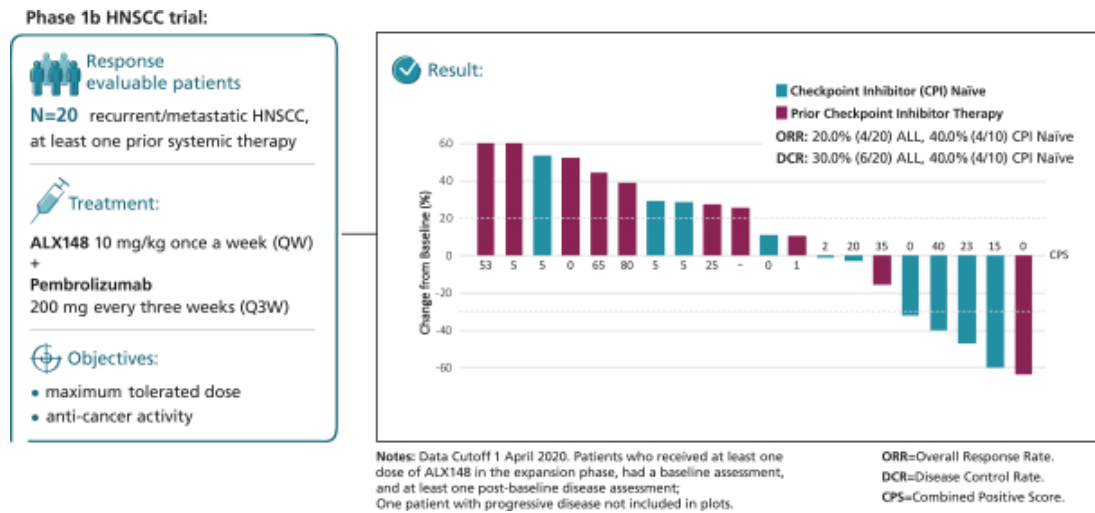
ALX148 was investigated in combination with pembrolizumab in subjects with recurrent/metastatic HNSCC who had received at least one prior systemic therapy. The clinical evaluation of ALX148 in HNSCC was an open-label, multisite expansion of our Phase 1 trial to assess safety and tolerability with response rate and duration as secondary

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endpoints. There was no requirement for PD-L1 expression. Subjects received ALX148 10 mg/kg QW in combination with pembrolizumab 200 mg on a Q3W dosing schedule. Subject response was evaluated based on RECIST version 1.1. Twenty subjects were dosed with ALX148 and as of April 1, 2020, all subjects in the HNSCC expansion cohort were response evaluable. Because standard of care in first-line HNSCC was evolving during the course of this trial to include checkpoint inhibitor inhibitors, 50% (10) of the subjects who enrolled were checkpoint inhibitor naïve and 50% (10) had previously received a checkpoint inhibitor.

Outcomes

The primary objective of the trial is to assess safety. As reported above in the summary tables of treatment-related adverse events from all ALX148 trials, the combination was well tolerated. As of April 1, 2020, ALX148 with pembrolizumab achieved an ORR of 40% (4/10) in checkpoint inhibitor naïve subjects while maintaining a tolerability profile consistent with earlier trials. Some of the 20 subjects had a CPS of zero and response was also observed within this subject population. We believe the addition of ALX148 to pembrolizumab represents a potentially significant advance over pembrolizumab monotherapy based on a review of the KEYNOTE-040 trial results that showed an ORR of 15%. Based on our clinical trial data, the FDA granted ALX148 Fast Track designation for first-line treatment of subjects with HNSCC.



We also analyzed paired pre- and on-treatment tumor biopsies from subjects for the presence of CD8+ T cells, CD68+ and CD163+ myeloid cells. After treatment with ALX148, tumor samples showed increased infiltration of CD8+, CD68+ and CD163+ cells in the tumor, which suggests that ALX148 also engages the innate and adaptive immune system consistent with its mechanism of action.

Clinical development plan

Our HNSCC development plan is to build on the initial results of ALX148 in checkpoint inhibitor naïve patients in combination with pembrolizumab. Given the results of KEYNOTE-048, we expect pembrolizumab, or pembrolizumab plus chemotherapy, to continue to be widely used in the first-line treatment of metastatic HNSCC. Therefore, our future plans will be focused on establishing additional efficacy, in the context of acceptable safety and tolerability, over pembrolizumab alone, or pembrolizumab plus chemotherapy, in the front-line metastatic HNSCC setting. In January 2020, we initiated a Phase 1b trial that is evaluating ALX148 plus pembrolizumab plus chemotherapy in subjects with no PD-L1 expression requirements. In addition to our initial dosing of 10 mg/kg QW, a higher dosing will be explored with 15 mg/kg QW dosing planned. We anticipate initiation of a Phase 2 trial of ALX148 and pembrolizumab by the first half of 2021.

ALX148 in HER2-Positive Gastric/GEJ

Disease background

Over 25,000 people are estimated to be living in the United States with diagnosed metastatic gastric/GEJ carcinoma. A large, international Phase 3 trial of trastuzumab in gastric/GEJ cancer found that of the nearly 4,000 subjects screened for inclusion in the trial, 17% of them were HER2-positive, which suggests a general HER2-

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positive rate for patients with gastric/GEJ cancer. In East Asian countries, gastric/GEJ cancer is much more common than in the United States, with incidence rates 4-10 times higher. China alone has a diagnosed incidence of over 900,000 patients with gastric/GEJ cancer per year.

First-line standard of care treatment is trastuzumab combined with the chemotherapy agents platinum and fluoropyrimidine. Trastuzumab, marketed as Herceptin, is an anti-HER2 antibody that has multiple FDA approvals in patients with HER2-positive cancers. In the second-line HER2-positive gastric setting, there are no HER2 targeted FDA-approved therapies. As such, the standard of care regimen in the U.S. is ramucirumab, marketed as Cyramza, a vascular endothelial growth factor 2 receptor monoclonal antibody, in combination with paclitaxel, a widely used chemotherapy. In a Phase 3 trial leading to FDA approval, ramucirumab plus paclitaxel achieved a 28% ORR with a 9.6 month mOS in subjects with previously treated gastric/GEJ cancer.

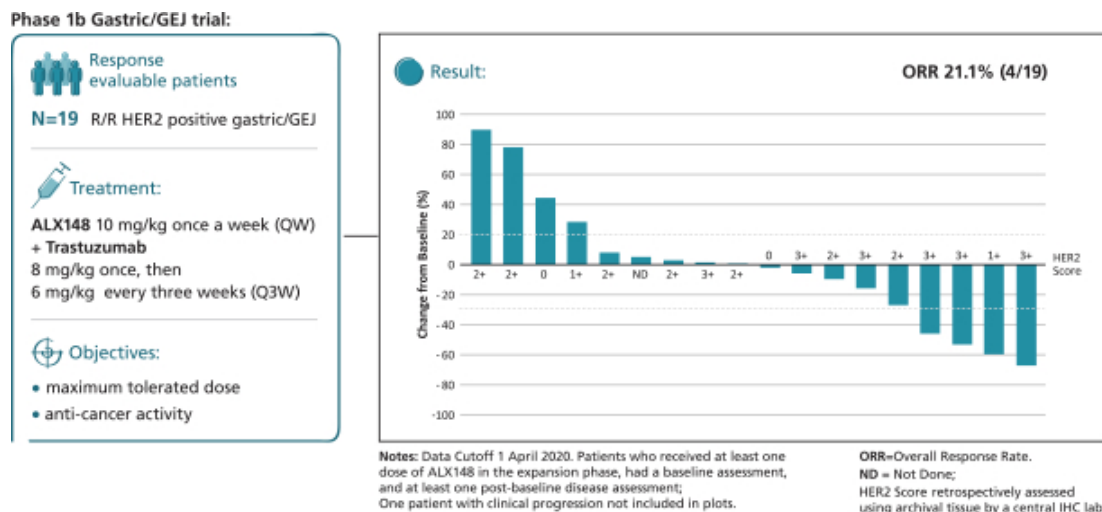
HER2-positive patients with gastric/GEJ cancers in second-line treatment are likely to have received an anti-HER2 antibody-based treatment in their first line of treatment. A recently reported prospective clinical trial studied trastuzumab plus paclitaxel compared to paclitaxel alone in previously treated HER2-positive subjects with gastric/GEJ cancer. Subjects were required to have progressed during the first line of treatment with trastuzumab plus chemotherapy (fluoropyrimidine plus platinum). The objective of this trial was to assess the clinical effect of trastuzumab after patients had progressed on prior trastuzumab treatment. The trial results showed that the addition of trastuzumab added no meaningful clinical benefit over paclitaxel alone. There was no significant improvement in mOS, mPFS or ORR compared to the paclitaxel arm. Based on these data, we hypothesized that we could attribute any observed responses when treating a similar subject population with ALX148 paired with trastuzumab, to a combination effect of the two agents and not simply a response to trastuzumab alone.

Trial design

ALX148 was investigated in combination with trastuzumab in subjects with relapsed/refractory HER2-positive gastric/GEJ cancer. This trial was an open-label, multisite expansion of our Phase 1 trial to assess safety and tolerability with response rate and duration as secondary endpoints. Twenty subjects from the gastric/GEJ expansion cohort received ALX148 10 mg/kg QW in combination with trastuzumab at an initial dose of 8 mg/kg followed by 6 mg/kg intravenous infusion Q3W. As of April 1, 2020, 19 subjects were response evaluable. One of the twenty subjects administered ALX148 discontinued the study due to clinical symptoms of progression prior to their first scheduled on study scan and therefore was not response evaluable per protocol definition.

As of April 1, 2020, in our trial of ALX148 plus trastuzumab, 18 of 19 response evaluable subjects from the gastric/GEJ expansion cohort, including all subjects who achieved a response, had been treated with at least one HER2-containing regimen prior to enrollment. Multiple subjects also received an investigational anti-HER2 agent and a PD-1 checkpoint inhibitor as prior treatment.

Outcomes



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The primary objective of the trial was to assess safety and the combination regimen was well tolerated as of April 1, 2020. Importantly, ALX148 with trastuzumab achieved an ORR of 21.1% (4/19) in these subjects. The FDA granted ALX148 Fast Track designation for second-line treatment of advanced HER2-positive gastric/GEJ carcinoma partly due to this data. Based on prior studies, one of which is described above, any observed response can likely be attributed to the combination effect and not a response to single-agent trastuzumab. We believe that an ORR of 21.1% in this second-line or later population supports further development of ALX148 in HER2-positive cancers.

Clinical development plans

Based on ALX148's activity in second-line and later subjects, in December 2019, we initiated a Phase 1b trial in HER2-positive subjects who previously received a trastuzumab-containing regimen. In this trial, we are combining ALX148 with trastuzumab, ramucirumab and paclitaxel to demonstrate the tolerability of ALX148, at doses of 10 mg/kg and 15 mg/kg QW, and an anti-HER2 antibody when combined with second-line standard-of-care treatment.

We intend to initiate a randomized Phase 2 trial of trastuzumab and chemotherapy with and without ALX148 for subjects with untreated HER2-positive gastric/GEJ cancer by the second half of 2021. Data from this trial would confirm whether ALX148 improves the response rate to anti-HER2-based therapy in patients with HER2-positive gastric/GEJ cancer. Of note, there are multiple emerging agents, predominantly antibody-based therapies, in development for patients with HER2-positive cancer. Because these agents target HER2 as does trastuzumab, we believe that ALX148 has the potential to maximize the anti-cancer activity of these novel agents should they supplant trastuzumab in the treatment paradigm for these patients.

Research Programs

In addition to ALX148, we are also developing preclinical programs that may offer additional ways to engage the innate and adaptive immune response to cancer.

Licensing and Intellectual Property

Our commercial success depends in part on our ability to obtain and maintain proprietary protection for our current and future product candidates, novel discoveries, product development technologies and knowhow and to operate without infringing on the proprietary rights of others. We seek to protect our proprietary position by, among other methods, filing or in-licensing U.S. and foreign patents and patent applications related to technology, inventions and improvements that are important to the development and implementation of our business. Our patent portfolio is intended to cover our product candidates and related components, their methods of use and processes for their manufacture and any other inventions that are commercially important to our business. We also rely on trademarks, trade secrets, knowhow, continuing technological innovation and confidential information to develop and maintain our proprietary position.

As of May 31, 2020, we own one issued U.S. patent, seven pending U.S. nonprovisional patent applications, seven pending U.S. provisional patent applications and a portfolio of national patent application filings in a variety of non-U.S. jurisdictions, including Europe, Hong Kong, Brazil, Mexico, New Zealand, Japan, Australia, Canada, China, India, Israel, Republic of Korea, Singapore and Russia. Of these patents and patent applications, the following relate to ALX148: one issued U.S. patent, four pending U.S. nonprovisional patent applications, seven pending U.S. provisional patent applications and a portfolio of national patent application filings in a variety of non-U.S. jurisdictions, including Europe, Hong Kong, Brazil, Mexico, New Zealand, Japan, Australia, Canada, China, India, Israel, Republic of Korea, Singapore and Russia.

The term of individual patents depends upon the legal term for patents in the countries in which they are granted. Our one U.S. issued patent and, if issued as U.S. patents, our seven U.S. nonprovisional patent applications and seven U.S. provisional patent applications are expected to expire between August 2036 and November 2040, excluding any additional term for patent term adjustments or patent term extensions, with an expiration of between August 2036 and November 2040 with respect to our patent and patent applications related to ALX148, excluding any additional term for patent term extensions.

We obtained a worldwide, royalty-bearing, sublicensable license from the Board of Trustees of the Leland Stanford Junior University, or Stanford, under certain patents relating to high-affinity SIRPa variant polypeptides, to develop,

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manufacture and commercialize products for use in certain licensed fields, the scope of which would include the application of the licensed intellectual property in oncology. Our portfolio of exclusively licensed patents from Stanford includes five issued patents (one of which is in the United States) and applications are pending in six jurisdictions (including the United States and the European Patent Office). For more information regarding our license agreement with Stanford, please see “—Exclusive (Equity) Agreement with The Board of Trustees of the Leland Stanford Junior University.”

Our patent portfolio exclusively licensed from Stanford contains patent families relating to high-affinity SIRPa variant polypeptides, which is comprised of one issued patent in each of U.S., Australia, China, Hong Kong and Japan, one pending U.S. patent application and one pending European patent application, which has been allowed and will be validated as national patents in 37 different European countries. These patents and patent applications are subject to retained rights by Stanford to allow academic and nonprofit research institutions to practice the licensed technology and patents for noncommercial purposes. In addition, these patents are subject to certain pre-existing rights that Stanford has granted to two third parties. These patents are expected to expire in 2033 excluding any extension of patent term that may be available.

We are aware of a revoked European patent (EP 2 429 574) owned by UHN and The Hospital for Sick Children that may encompass certain therapies for the treatment of cancer using polypeptides comprising soluble human SIRPa, or a CD47-binding fragment thereof. This revoked patent related to the treatment of cancer with polypeptides comprising soluble human SIRPa, or a CD47-binding fragment thereof. This patent was revoked by the European Patent Office and UHN and The Hospital for Sick Children have appealed the decision. The U.S. counterpart is not yet granted. If UHN and the Hospital for Sick Children win their appeal of the European Patent Office decision revoking their European patent, or if the U.S. counterpart grants them a patent, the resulting patent claims could potentially limit our ability to pursue ALX148 in certain new indications or geographies in the future.

For more information regarding the risks related to our intellectual property, including the above referenced intellectual property proceedings, see “Risk Factors—Risks Related to Our Intellectual Property.”

Exclusive (Equity) Agreement with The Board of Trustees of the Leland Stanford Junior University

In March 2015, we entered into a license agreement, or the Stanford Agreement, with Stanford under which we obtained a worldwide, royalty-bearing, sublicensable license under certain patents relating to our current product candidates, to develop, manufacture and commercialize products for use in certain licensed fields, the scope of which would include the application of the licensed intellectual property in oncology. The license granted to us in the Stanford Agreement includes an exclusive grant, subject to certain pre-existing non-exclusive or exclusive rights that Stanford retained for grant to third parties with respect to certain categories of the licensed patents in certain fields of use and retained rights by Stanford and all other nonprofit institutions to use and practice the licensed patents and technology for internal research and other nonprofit purposes. The license granted to us in the Stanford Agreement also includes non-exclusive grants to certain Stanford patents.

In consideration for the rights granted to us under the Stanford Agreement, we paid Stanford a nonrefundable license royalty and reimbursed Stanford for past patent expenses, together totaling less than \$0.1 million, and granted Stanford a specified number of our ordinary shares. In addition, we are obligated to pay Stanford ongoing patent expenses and an annual license maintenance fee, which are nominal and will be creditable against any royalties payable to Stanford in the applicable year. We are required to make milestone payments up to a specified aggregate amount in respect of a specified number of licensed products that successfully satisfy certain clinical and regulatory milestones. No milestone payments have been made through December 31, 2019. We also agreed to pay Stanford tiered royalties on a specified percentage of net sales made by us, our affiliates and our sublicensees of licensed products at rates ranging within low single-digit percentages, subject to certain reductions and offsets. Our license, on a licensed product-by-licensed product and country-by-country basis, shall become royalty-free and fully paid-up upon the later of the date on which the last valid claim included in the exclusively or non-exclusively licensed patents expires and ten years after the first commercial sale of the licensed product in such country.

We may terminate the Stanford Agreement, on a licensed product-by-licensed product basis, at any time for any reason by providing at least 60 days' written notice to Stanford. Stanford may terminate the Stanford Agreement if

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we are in breach of any provision of the Stanford Agreement and fail to remedy such breach within 60 days after written notice of such breach by Stanford. In addition, Stanford has the right to terminate the Stanford Agreement, on a licensed product-by-licensed product basis, if we are not diligently developing and commercializing such licensed product under certain conditions or if we fail to achieve specified development milestones for such licensed product by certain dates, subject to our extension rights.

Other Third-Party Agreements

We have entered into license agreements with third parties related to the development and commercialization of our product candidates, including ALX148, and SIRP_a antibodies which we are exploring in our research program. In consideration of the foregoing, we have agreed to customary payments terms in these agreements, including certain milestone payments upon the achievement of clinical and commercial milestones and low single-digit royalties. See the section titled “Management’s Discussion and Analysis of Financial Condition and Results of Operations—Contractual Obligations and Commitments—License and Collaboration Agreements.”

Commercialization

We intend to retain significant development and commercial rights to our product candidates and, if marketing approval is obtained, to commercialize our product candidates on our own, or potentially with a partner, in the United States and other regions. We currently have no sales, marketing or commercial product distribution capabilities and have no experience as a company commercializing products. We intend to build the necessary infrastructure and capabilities over time for the United States, and potentially other regions, following further advancement of our product candidates. Clinical data, the size of the addressable patient population, the size of the commercial infrastructure and manufacturing needs may all influence or alter our commercialization plans.

Manufacturing and Supply

We do not own or operate and do not intend to establish our own manufacturing facilities. We rely on, and will continue to rely on, CMOs for both drug substance and drug product. Both ALX148 bulk drug substance and finished drug product are produced in accordance with cGMPs.

Our existing supply of ALX148 drug product is sufficient to complete our clinical trials through the first half of 2021. We plan to manufacture additional supplies with our existing CMOs to produce ALX148 drug product sufficient to complete the ongoing and planned clinical trials described in this document. We first entered into an engagement with KBI Biopharma, Inc. in 2015 for analytical method development, formulation development, bulk drug manufacturing, release and stability testing. We first entered into a drug product manufacturing agreement with Lyophilization Services of New England, Inc. in 2016 and have subsequently used them for all ALX148 drug product used in clinical trials to date.

Competition

The development and commercialization of new product candidates is highly competitive. We face competition with respect to ALX148 and will face competition with respect to any product candidates that we may seek to develop or commercialize in the future, from major pharmaceutical, specialty pharmaceutical and biotechnology companies among others. We compete in the segments of the pharmaceutical, biotechnology and other related markets that develop immune-oncology therapies for the treatment of cancer. There are other companies working to develop immuno-oncology therapies for the treatment of cancer including divisions of large pharmaceutical and biotechnology companies of various sizes. The large pharmaceutical and biotechnology companies that have commercialized and/or are developing immuno-oncology treatments for cancer include AstraZeneca, Bristol Myers Squibb, Gilead Sciences, Merck, Novartis, Pfizer and Roche/Genentech.

Some of these competitive products and therapies are based on scientific approaches that are the same as or similar to our approach, including with respect to the targeting of CD47 pathway and others are based on entirely different approaches. We are aware that Arch Therapeutics, Bristol Myers Squibb, Gilead Sciences (through its recent acquisition of Forty Seven), I-Mab, Novimmune, OSE Immunotherapeutics, Seattle Genetics, Surface Oncology and Trillium Therapeutics, among others, are developing drugs targeting the CD47 pathway that may have utility for the treatment of indications that we are targeting. Potential competitors also include academic institutions, government

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agencies and other public and private research organizations that conduct research, seek patent protection and establish collaborative arrangements for research, development, manufacturing and commercialization.

Many of the companies against which we are competing or against which we may compete in the future have significantly greater financial resources and expertise in research and development, manufacturing, preclinical testing, conducting clinical trials, obtaining regulatory approvals and marketing approved drugs than we do. Mergers and acquisitions in the pharmaceutical and biotechnology industries may result in even more resources being concentrated among a smaller number of our competitors. Smaller or early-stage companies may also prove to be significant competitors, particularly through collaborative arrangements with large and established companies. These competitors also compete with us in recruiting and retaining qualified scientific and management personnel, in establishing clinical trial sites and enrolling subjects for our clinical trials and in acquiring technologies complementary to, or necessary for, our programs.

We could see a reduction or elimination of our commercial opportunity if our competitors develop and commercialize products that are safer, more effective, have fewer or less severe side effects, are more convenient or are less expensive than any products that we or our collaborators may develop. Our competitors also may obtain FDA or foreign regulatory approval for their products more rapidly than we may obtain approval for ours, which could result in our competitors establishing a strong market position before we are able to enter the market. The key competitive factors affecting the success of all our product candidates, if approved, are likely to be their efficacy, safety, convenience and price, if required, the level of biosimilar or generic competition and the availability of reimbursement from government and other third-party payors.

Government Regulation

In the United States, the FDA, regulates biologic products under the Food, Drug, and Cosmetic Act, or FDCA, and Public Health Service Act, or PHSA. Biologic products and substances are subject to other federal, state and local statutes and regulations. The process of obtaining regulatory approvals and the subsequent compliance with appropriate federal, state, local and foreign statutes and regulations requires the expenditure of substantial time and financial resources. Failure to comply with the applicable U.S. requirements at any time during the product development process, approval process or post-market may subject an applicant to administrative or judicial sanctions. These sanctions could include, among other actions, the FDA's refusal to approve pending applications, withdrawal of an approval, a clinical hold, untitled or warning letters, product recalls or market withdrawals, product seizures, total or partial suspension of production or distribution, injunctions, fines, refusals of government contracts, restitution, disgorgement and civil or criminal penalties. Any agency or judicial enforcement action could have a material adverse effect on us.

The FDA and other regulatory authorities at federal, state and local levels, as well as in foreign countries, extensively regulate, among other things, the research, development, testing, manufacture, quality control, import, export, safety, effectiveness, labeling, packaging, storage, distribution, record keeping, approval, advertising, promotion, marketing, post-approval monitoring and post approval reporting of biologics such as those we are developing. We, along with third-party contractors, will be required to navigate the various preclinical, clinical and commercial approval requirements of the governing regulatory agencies of the countries in which we wish to conduct studies or seek approval or licensure of our product candidates.

U.S. Biologics Regulation

Any future product candidates must be approved by the FDA through the BLA process before they may be legally marketed in the United States. The process generally involves the following:

- Completion of extensive preclinical laboratory tests and animal studies performed in accordance with the FDA's current Good Laboratory Practices, or GLP, regulation.
- Submission to the FDA of an investigational new drug, or IND, application, which must become effective before clinical trials may begin and must be updated annually or when significant changes are made.
- Approval by an independent institutional review board, or IRB, or ethics committee at each clinical site before the trial is commenced.

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- Performance of adequate and well-controlled human clinical trials in accordance with the applicable IND regulations, good clinical practice, or GCP, requirements to establish the safety, purity and potency (*i.e.*, safety and effectiveness) of the proposed biologic product candidate for its intended purpose.
- Preparation of and submission to the FDA of a BLA after completion of all pivotal clinical trials.
- A determination by the FDA within 60 days of its receipt of a BLA to file the application for review.
- Satisfactory completion of any FDA audit of preclinical studies and/or clinical trial sites that generated the data in support of the BLA.
- Satisfactory completion of an FDA pre-approval inspection of the manufacturing facility or facilities at which the proposed product is produced to assess compliance with current good manufacturing practices, or cGMPs, and to assure that the facilities, methods and controls are adequate to preserve the biological product's continued safety, purity and potency, and of selected clinical investigation sites to assess compliance with GCPs.
- Satisfactory completion of an FDA Advisory Committee review, if applicable.
- FDA review and approval of a BLA to permit commercial marketing of the product for particular indications for use in the United States.
- Compliance with any post-approval requirements, including the potential requirement to implement a REMS and the potential requirement to conduct post-approval studies.

Preclinical and Clinical Development

The data required to support a BLA are generated in two distinct developmental stages: preclinical and clinical. The preclinical and clinical testing and approval process require substantial time, effort and financial resources, and we cannot be certain that any approvals for any future product candidates will be granted on a timely basis, or at all.

The preclinical developmental stage generally involves laboratory evaluations of product chemistry, formulation and stability, as well as studies to evaluate toxicity in animals, including pharmacology, PK, toxicokinetic and metabolism studies, that support subsequent clinical testing in humans. The sponsor must submit the results of the preclinical studies, together with manufacturing information, analytical data, any available clinical data or literature and a proposed clinical protocol, to the FDA as part of the IND. Preclinical studies include laboratory evaluation of product chemistry and formulation, as well as *in vitro* and animal studies to assess the potential for adverse events and in some cases to establish a rationale for therapeutic use. The conduct of preclinical studies is subject to federal regulations and requirements, including GLP regulations for safety/toxicology studies.

Prior to beginning the first clinical trial with a product candidate, we must submit an IND to the FDA. An IND is a request for authorization from the FDA to administer an investigational new biopharmaceutical product to humans. The central focus of an IND submission is on the general investigational plan and the protocol(s) for clinical trials. An IND must become effective before human clinical trials may begin. The IND automatically becomes effective 30 days after receipt by the FDA, unless before that time the FDA raises any concerns or questions about the proposed clinical trial(s) and places the trial(s) on clinical hold. In such a case, the IND may be placed on clinical hold and the IND sponsor and the FDA must resolve any outstanding concerns or questions before the clinical trial can begin. Submission of an IND therefore may or may not result in FDA authorization to begin a clinical trial.

Clinical trials involve the administration of the investigational product to human subjects under the supervision of qualified investigators in accordance with GCPs, which include the requirement that all research subjects provide their informed consent for their participation in any clinical trial. Clinical trials are conducted under protocols detailing, among other things, the objectives of the clinical trial, dosing procedures, subject selection and exclusion criteria and the parameters to be used to monitor subject safety and assess efficacy. Each protocol, and any subsequent amendments to the protocol, must be submitted to the FDA as part of the IND. Furthermore, an independent IRB for each site proposing to conduct the clinical trial must review and approve the plan for any clinical trial and its informed consent form before the clinical trial begins at that site and must monitor the trial until completed. Regulatory authorities, the IRB, or the sponsor may suspend a clinical trial at any time on various grounds, including a finding that the subjects are being exposed to an unacceptable health risk or that the trial is unlikely to meet its stated objectives. Some trials also include oversight by an independent group of qualified experts organized by the clinical trial sponsor, known as a data safety monitoring board, which provides authorization for whether or not a trial may move forward at designated check points based on access to certain data from the trial.

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and may halt the clinical trial if it determines that there is an unacceptable safety risk for subjects or other grounds, such as no demonstration of efficacy. There are also requirements governing the reporting of ongoing preclinical studies and clinical trials and clinical trial results to public registries.

A sponsor who wishes to conduct a clinical trial outside of the United States may, but need not, obtain FDA authorization to conduct the clinical trial under an IND. If a foreign clinical trial is not conducted under an IND, the sponsor may submit data from the clinical trial to the FDA in support of an BLA. The FDA will accept a well-designed and well-conducted foreign clinical trial not conducted under an IND if the trial was conducted in accordance with GCP requirements and the FDA is able to validate the data through an onsite inspection if deemed necessary.

For purposes of BLA approval, human clinical trials are typically conducted in three sequential phases that may overlap.

- Phase 1. For biologics being studied in oncology indications, the investigational product is initially introduced into patients with the target disease or condition. These trials are designed to test the safety, dosage tolerance, absorption, metabolism and distribution of the investigational product in humans, to identify possible side effects associated with increasing doses, and, if possible, to gain early evidence on effectiveness.
- Phase 2. The investigational product is administered to a limited patient population with a specified disease or condition to evaluate the preliminary efficacy, optimal dosages and dosing schedule and to identify possible adverse side effects and safety risks and additional information on PK and PD. Multiple Phase 2 clinical trials may be conducted to obtain information prior to beginning larger and more expensive Phase 3 clinical trials.
- Phase 3. The investigational product is administered to an expanded patient population to further evaluate dosage, to provide statistically significant evidence of clinical efficacy and to further test for safety, purity and potency for an intended use, and generally at multiple geographically dispersed clinical trial sites. These clinical trials are intended to establish the overall risk/benefit ratio of the investigational product and to provide an adequate basis for product approval. These trials may include comparisons with placebo and/or other comparator treatments.

In some cases, the FDA may require, or companies may voluntarily pursue, additional clinical trials after a product is approved to gain more information about the product. These so-called Phase 4 trials may be made a condition to approval of the BLA. Concurrent with clinical trials, companies may complete additional animal studies and develop additional information about the biological characteristics of the product candidate and must finalize a process for manufacturing the product in commercial quantities in accordance with cGMP requirements. The manufacturing process must be capable of consistently producing quality batches of the product candidate and, among other things, must develop methods for testing the identity, strength, quality and purity of the final product, or for biologics, the safety, purity and potency. Additionally, appropriate packaging must be selected and tested and stability studies must be conducted to demonstrate that the product candidate does not undergo unacceptable deterioration over its shelf life.

BLA Submission and Review

Assuming successful completion of all required testing in accordance with all applicable regulatory requirements, the results of product development, nonclinical studies and clinical trials are submitted to the FDA as part of a BLA requesting approval to market the product for one or more indications. The BLA must include all relevant data available from pertinent preclinical studies and clinical trials, including negative or ambiguous results as well as positive findings, together with detailed information relating to the product's chemistry, manufacturing, controls and proposed labeling, among other things. The submission of a BLA requires payment of a substantial application user fee to the FDA, unless a waiver or exemption applies.

Once a BLA has been submitted, the FDA's goal is to review standard applications within ten months after it accepts the application for filing, or, if the application qualifies for priority review, six months after the FDA accepts the application for filing. In both standard and priority reviews, the review process is often significantly extended by FDA requests for additional information or clarification. The FDA reviews a BLA to determine, among other things,

whether a product is safe, pure and potent and the facility in which it is manufactured, processed, packed or held meets standards designed to assure the product's continued safety, purity and potency. The FDA may convene an advisory committee to provide clinical insight on application review questions. Before approving a BLA, the FDA will typically inspect the facility or facilities where the product is manufactured. The FDA will not approve an application unless it determines that the manufacturing processes and facilities are in compliance with cGMP requirements and adequate to assure consistent production of the product within required specifications. Additionally, before approving a BLA, the FDA will typically inspect one or more clinical sites to assure compliance with GCPs. If the FDA determines that the application, manufacturing process or manufacturing facilities are not acceptable, it will outline the deficiencies in the submission and often will request additional testing or information. Notwithstanding the submission of any requested additional information, the FDA ultimately may decide that the application does not satisfy the regulatory criteria for approval.

After the FDA evaluates a BLA and conducts inspections of manufacturing facilities where the investigational product and/or its biopharmaceutical substance will be produced, the FDA may issue an approval letter or a Complete Response letter. An approval letter authorizes commercial marketing of the product with specific prescribing information for specific indications. A Complete Response letter will describe all of the deficiencies that the FDA has identified in the BLA, except that where the FDA determines that the data supporting the application are inadequate to support approval, the FDA may issue the Complete Response letter without first conducting required inspections, testing submitted product lots and/or reviewing proposed labeling. In issuing the Complete Response letter, the FDA may recommend actions that the applicant might take to place the BLA in condition for approval, including requests for additional information or clarification. The FDA may delay or refuse approval of a BLA if applicable regulatory criteria are not satisfied, require additional testing or information and/or require post-marketing testing and surveillance to monitor safety or efficacy of a product.

If regulatory approval of a product is granted, such approval will be granted for particular indications and may entail limitations on the indicated uses for which such product may be marketed. For example, the FDA may approve the BLA with a Risk Evaluation and Mitigation Strategy, or REMS, to ensure the benefits of the product outweigh its risks. A REMS is a safety strategy to manage a known or potential serious risk associated with a product and to enable patients to have continued access to such medicines by managing their safe use, and could include medication guides, physician communication plans, or elements to assure safe use, such as restricted distribution methods, patient registries and other risk minimization tools. The FDA also may condition approval on, among other things, changes to proposed labeling or the development of adequate controls and specifications. Once approved, the FDA may withdraw the product approval if compliance with pre- and post-marketing requirements is not maintained or if problems occur after the product reaches the marketplace. The FDA may require one or more Phase 4 post-market trials and surveillance to further assess and monitor the product's safety and effectiveness after commercialization and may limit further marketing of the product based on the results of these post-marketing studies.

Expedited Development and Review Programs

The FDA offers a number of expedited development and review programs for qualifying product candidates. The fast track program is intended to expedite or facilitate the process for reviewing new products that meet certain criteria. Specifically, new products are eligible for Fast Track designation if they are intended to treat patients with a serious or life-threatening disease or condition and demonstrate the potential to address unmet medical needs for the disease or condition. Fast Track designation applies to the combination of the product and the specific indication for which it is being studied. The sponsor of a fast track product has opportunities for frequent interactions with the review team during product development and, once a BLA is submitted, the product may be eligible for priority review. A fast track product may also be eligible for rolling review, where the FDA may consider for review sections of the BLA on a rolling basis before the complete application is submitted, if the sponsor provides a schedule for the submission of the sections of the BLA, the FDA agrees to accept sections of the BLA and determines that the schedule is acceptable, and the sponsor pays any required user fees upon submission of the first section of the BLA.

A product intended to treat patients with a serious or life-threatening disease or condition may also be eligible for breakthrough therapy designation to expedite its development and review. A product can receive breakthrough therapy designation if preliminary clinical evidence indicates that the product, alone or in combination with one or more other drugs or biologics, may demonstrate substantial improvement over existing therapies on one or more

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clinically significant endpoints, such as substantial treatment effects observed early in clinical development. The designation includes all of the fast track program features, as well as more intensive FDA interaction and guidance beginning as early as Phase 1 and an organizational commitment to expedite the development and review of the product, including involvement of senior managers.

Any marketing application for a biologic submitted to the FDA for approval, including a product with a Fast Track designation and/or breakthrough therapy designation, may be eligible for other types of FDA programs intended to expedite the FDA review and approval process, such as priority review and accelerated approval. A product is eligible for priority review if it has the potential to provide a significant improvement in the treatment, diagnosis or prevention of a serious disease or condition. For original BLAs, priority review designation means the FDA's goal is to take action on the marketing application within six months of the 60-day filing date (as compared to ten months under standard review).

Additionally, products studied for their safety and effectiveness in treating patients with serious or life-threatening diseases or conditions may receive accelerated approval upon a determination that the product has an effect on a surrogate endpoint that is reasonably likely to predict clinical benefit, or on a clinical endpoint that can be measured earlier than irreversible morbidity or mortality, that is reasonably likely to predict an effect on irreversible morbidity or mortality or other clinical benefit, taking into account the severity, rarity, or prevalence of the condition and the availability or lack of alternative treatments. As a condition of accelerated approval, the FDA will generally require the sponsor to perform adequate and well-controlled post-marketing clinical trials to verify and describe the anticipated effect on irreversible morbidity or mortality or other clinical benefit. In addition, the FDA currently requires as a condition for accelerated approval preapproval of promotional materials, which could adversely impact the timing of the commercial launch of the product.

Fast track designation, breakthrough therapy designation and priority review do not change the standards for approval but may expedite the development or approval process. Even if a product qualifies for one or more of these programs, the FDA may later decide that the product no longer meets the conditions for qualification or decide that the time period for FDA review or approval will not be shortened.

Orphan Drug Designation

Under the Orphan Drug Act, the FDA may grant orphan designation to a drug or biologic intended to treat patients with a rare disease or condition, which is a disease or condition that affects fewer than 200,000 individuals in the United States, or more than 200,000 individuals in the United States for which there is no reasonable expectation that the cost of developing and making available in the United States a drug or biologic for this type of disease or condition will be recovered from sales in the United States for that drug or biologic. Orphan drug designation must be requested before submitting a BLA. After the FDA grants orphan drug designation, the generic identity of the therapeutic agent and its potential orphan use are disclosed publicly by the FDA. The orphan drug designation does not convey any advantage in, or shorten the duration of, the regulatory review or approval process.

If a product that has orphan drug designation subsequently receives the first FDA approval for the disease for which it has such designation, the product is entitled to orphan drug exclusive approval (or exclusivity), which means that the FDA may not approve any other applications, including a full BLA, to market the same biologic for the same indication for seven years, except in limited circumstances, such as a showing of clinical superiority to the product with orphan drug exclusivity or if the FDA finds that the holder of the orphan drug exclusivity has not shown that it can assure the availability of sufficient quantities of the orphan drug to meet the needs of patients with the disease or condition for which the drug was designated. Orphan drug exclusivity does not prevent the FDA from approving a different drug or biologic for the same disease or condition, or the same drug or biologic for a different disease or condition. Among the other benefits of orphan drug designation are tax credits for certain research and a waiver of the BLA application fee.

A designated orphan drug may not receive orphan drug exclusivity if it is approved for a use that is broader than the indication for which it received orphan designation. In addition, exclusive marketing rights in the United States may be lost if the FDA later determines that the request for designation was materially defective or if the manufacturer is unable to assure sufficient quantities of the product to meet the needs of patients with the rare disease or condition.

Post-Approval Requirements

Any products manufactured or distributed by us pursuant to FDA approvals are subject to pervasive and continuing regulation by the FDA, including, among other things, requirements relating to facility registration, biopharmaceutical product listing, record-keeping, reporting of adverse experiences, periodic reporting, product sampling and distribution and advertising and promotion of the product. After approval, most changes to the approved product, such as adding new indications or other labeling claims, are subject to prior FDA review and approval. There also are continuing user fee requirements, under which the FDA assesses an annual program fee for each product identified in an approved BLA. Biologic manufacturers and their subcontractors are required to register their establishments with the FDA and certain state agencies and are subject to periodic unannounced inspections by the FDA and certain state agencies for compliance with cGMPs, which impose certain procedural and documentation requirements upon us and our third-party manufacturers. Changes to the manufacturing process are strictly regulated, and, depending on the significance of the change, may require prior FDA approval before being implemented. FDA regulations also require investigation and correction of any deviations from cGMPs and impose reporting requirements upon us and any third-party manufacturers that we may decide to use. Accordingly, manufacturers must continue to expend time, money and effort in the area of production and quality control to maintain compliance with cGMPs and other aspects of regulatory compliance. Further, if there are any modifications to the drug or biologic, including changes in indications, labeling or manufacturing processes or facilities, the applicant may be required to submit and obtain FDA approval of a new BLA or a supplement submission, which may require the development of additional preclinical studies, clinical trials, data and/or assays, such as comparability protocols.

The FDA may withdraw approval if compliance with regulatory requirements and standards is not maintained or if problems occur after the product reaches the market. Later discovery of previously unknown problems with a product, including adverse events of unanticipated severity or frequency, or with manufacturing processes, or failure to comply with regulatory requirements, may result in revisions to the approved labeling to add new safety information; imposition of post-market studies or clinical trials to assess new safety risks; or imposition of distribution restrictions or other restrictions under a REMS program. Other potential consequences include, among other things:

- Restrictions on the marketing or manufacturing of a product, complete withdrawal of the product from the market or product recalls.
- Fines, warning letters or holds on post-approval clinical trials.
- Refusal of the FDA to approve pending applications or supplements to approved applications, or suspension or revocation of existing product approvals.
- Product seizure or detention, or refusal of the FDA to permit the import or export of products.
- Consent decrees, corporate integrity agreements, debarment or exclusion from federal healthcare programs.
- Mandated modification of promotional materials and labeling and the issuance of corrective information.
- The issuance of safety alerts, Dear Healthcare Provider letters, press releases and other communications containing warnings or other safety information about the product.
- Injunctions or the imposition of civil or criminal penalties.

The FDA closely regulates the marketing, labeling, advertising and promotion of biologics. A company can make only those claims relating to safety and efficacy, purity and potency that are approved by the FDA and in accordance with the provisions of the approved label. The FDA and other agencies actively enforce the laws and regulations prohibiting the promotion of off-label uses.

Failure to comply with these requirements can result in, among other things, adverse publicity, warning letters, corrective advertising and potential civil and criminal penalties. Physicians may prescribe legally available products for uses that are not described in the product's labeling and that differ from those tested by us and approved by the FDA. Physicians may believe that such off-label uses are the best treatment for many patients in varied circumstances. The FDA does not regulate the behavior of physicians in their choice of treatments. The FDA does, however, restrict manufacturer's communications on the subject of off-label use of their products.

Biosimilars and Reference Product Exclusivity

The Patient Protection and Affordable Care Act, or ACA, includes a subtitle called the Biologics Price Competition and Innovation Act of 2009, or BPCIA, which created an abbreviated approval pathway for biological products that are biosimilar to or interchangeable with an FDA approved reference biological product.

Biosimilarity, which requires that there be no clinically meaningful differences between the biological product and the reference product in terms of safety, purity and potency, can be shown through analytical studies, animal studies and a clinical trial or trials. Interchangeability requires that a product is biosimilar to the reference product and the product must demonstrate that it can be expected to produce the same clinical results as the reference product in any given patient and, for products that are administered multiple times to an individual, the biologic and the reference biologic may be alternated or switched after one has been previously administered without increasing safety risks or risks of diminished efficacy relative to exclusive use of the reference biologic.

Under the BPCIA, an application for a biosimilar product may not be submitted to the FDA until four years following the date that the reference product was first licensed by the FDA. In addition, the approval of a biosimilar product may not be made effective by the FDA until 12 years from the date on which the reference product was first licensed. During this 12-year period of exclusivity, another company may still market a competing version of the reference product if the FDA approves a full BLA for the competing product containing that applicant's own preclinical data and data from adequate and well-controlled clinical trials to demonstrate the safety, purity and potency of its product. The BPCIA also created certain exclusivity periods for biosimilars approved as interchangeable products. At this juncture, it is unclear whether products deemed "interchangeable" by the FDA will, in fact, be readily substituted by pharmacies, which are governed by state pharmacy law. Additionally, prescribing physicians are free to specify "Do Not Substitute" in prescriptions, which would prohibit pharmacists from substituting a branded biologic product for a biosimilar product.

The BPCIA is complex and continues to be interpreted and implemented by the FDA. In addition, government proposals have sought to reduce the 12-year reference product exclusivity period. Other aspects of the BPCIA, some of which may impact the BPCIA exclusivity provisions, have also been the subject of recent litigation. As a result, the ultimate impact, implementation and impact of the BPCIA are subject to uncertainty.

Other Healthcare Laws and Compliance Requirements

Biopharmaceutical companies are subject to additional healthcare regulation and enforcement by the federal government and by authorities in the states and foreign jurisdictions in which they conduct their business. Research, manufacturing, sales, promotion and other activities following product approval are subject to regulation by numerous regulatory authorities in the United States in addition to the FDA, including CMS, other divisions of the Department of Health and Human Services, the Department of Justice, the Drug Enforcement Administration, the Consumer Product Safety Commission, the Federal Trade Commission, the Occupational Safety & Health Administration, the Environmental Protection Agency, and state and local governments. For example, in the United States, sales, marketing and scientific and educational programs also must comply with state and federal fraud and abuse laws, false claims laws, transparency laws, government price reporting and health information privacy and security laws. These laws include the following:

- The federal Anti-Kickback Statute, which makes it illegal for any person, including a prescription drug manufacturer (or a party acting on its behalf), to knowingly and willfully solicit, receive, offer or pay any remuneration that is intended to induce or reward referrals, including the purchase, recommendation, order or prescription of a particular drug, for which payment may be made under a federal healthcare program, such as Medicare or Medicaid. Moreover, the Patient Protection and Affordable Care Act, as amended by the Health Care and Education Reconciliation Act of 2010, or collectively, the ACA, provides that the government may assert that a claim including items or services resulting from a violation of the federal Anti-Kickback Statute constitutes a false or fraudulent claim for purposes of the civil False Claims Act. In addition, the intent standard under the federal Anti-Kickback Statute was amended by the ACA to eliminate the need to prove specific intent and actual knowledge to establish an Anti-Kickback Statute violation.
- The federal civil and criminal false claims, including the FCA that can be enforced by private citizens through civil whistleblower or qui tam actions, prohibit individuals or entities from, among other things,

knowingly presenting, or causing to be presented, to the federal government, claims for payment that are false or fraudulent or making a false statement to avoid, decrease or conceal an obligation to pay money to the federal government.

- The civil monetary penalties laws impose penalties against any person or entity that, among other things, is determined to have presented or caused to be presented a claim to a federal healthcare program that the person knows or should know is for an item or service that was not provided as claimed or is false or fraudulent, or offering or transferring remuneration to a federal healthcare beneficiary that a person knows or should know is likely to influence the beneficiary's decision to order or receive items or services reimbursable by the government from a particular provider or supplier.
- The Federal Health Insurance Portability and Accountability Act of 1996, or HIPAA, prohibits, among other things, executing or attempting to execute a scheme to defraud any healthcare benefit program or making false statements relating to healthcare matters. HIPAA, as amended by the Health Information Technology for Economic and Clinical Health Act and their implementing regulations, also imposes obligations, including mandatory contractual terms, on certain covered healthcare providers, health plans, and healthcare clearinghouses as well as their respective business associates that perform services for them that involve the use, or disclosure of, individually identifiable health information, with respect to safeguarding the privacy, security and transmission of individually identifiable health information.
- Federal consumer protection and unfair competition laws, which broadly regulate marketplace activities and activities that potentially harm consumers.
- The FDCA, which prohibits, among other things, the adulteration or misbranding of drugs, biologics and medical devices.
- The federal Physician Payments Sunshine Act requires applicable manufacturers of covered drugs, medical devices, biologics and medical supplies for which payment is available under Medicare, Medicaid, or the Children's Health Insurance Program, with specific exceptions, to annually report to CMS information regarding payments and other transfers of value to physicians, as defined by such law, and teaching hospitals as well as information regarding ownership and investment interests held by physicians and their immediate family members. Additionally, President Trump signed into law in 2018 the "Substance Use-Disorder Prevention that Promoted Opioid Recovery and Treatment for Patients and Communities Act" which, under the provision entitled "Fighting the Opioid Epidemic with Sunshine," in part, extends the reporting and transparency requirements for physicians under the Physician Payments Sunshine Act to physician assistants, nurse practitioners and other mid-level practitioners, with reporting requirements going into effect in 2022 for payments made in 2021.
- The distribution of pharmaceutical products is subject to additional requirements and regulations, including extensive record-keeping, licensing, price reporting, storage and security requirements intended to prevent the unauthorized sale of pharmaceutical products. Pricing and rebate programs must also comply with the Medicaid rebate requirements of the U.S. Omnibus Budget Reconciliation Act of 1990 and more recent requirements in the ACA. If products are made available to authorized users of the Federal Supply Schedule of the General Services Administration, additional laws and requirements apply. For example, products must meet applicable child-resistant packaging requirements under the U.S. Poison Prevention Packaging Act. Manufacturing, sales, promotion and other activities also are potentially subject to federal and state consumer protection and unfair competition laws.
- The Foreign Corrupt Practices Act, or FCPA, prohibits any U.S. individual or business from paying, offering, or authorizing payment or offering of anything of value, directly or indirectly, to any foreign official, political party or candidate for the purpose of influencing any act or decision of the foreign entity in order to assist the individual or business in obtaining or retaining business. The FCPA also obligates companies whose securities are listed in the United States to comply with accounting provisions requiring us to maintain books and records that accurately and fairly reflect all transactions of the corporation, including international subsidiaries, if any, and to devise and maintain an adequate system of internal accounting controls for international operations.
- Analogous state and foreign laws and regulations, such as state anti-kickback, anti-referral and false claims laws, which may apply to sales or marketing arrangements and claims involving healthcare items or services reimbursed by non-governmental third-party payors, including private insurers, state laws that require

biotechnology or pharmaceutical companies to comply with the biotechnology or pharmaceutical industry's voluntary compliance guidelines and the relevant compliance guidance promulgated by the federal government and may require drug manufacturers to report certain information related to payments and other transfers of value to physicians and other healthcare providers or marketing expenditures, state laws that require biotechnology companies to report information on the pricing of certain drug products, state and local laws that require the registration of pharmaceutical sales representatives, and state and foreign laws that govern the privacy and security of health information in some circumstances, many of which differ from each other in significant ways and often are not preempted by HIPAA, thus complicating compliance efforts; and state laws related to insurance fraud in the case of claims involving private insurers.

Because of the breadth of these laws and the narrowness of available statutory and regulatory exemptions or safe harbors, it is possible that some of our activities, such as stock-option compensation paid to physicians, could be subject to challenge under one or more of such laws. The growth of our business and sales organization and our expansion outside of the United States may increase the potential of violating these laws or our internal policies and procedures. Any action brought against us for violations of these laws or regulations, even successfully defended, could cause us to incur significant legal expenses and divert our management's attention from the operation of our business. Also, we may be subject to private "qui tam" actions brought by individual whistleblowers on behalf of the federal or state governments. If our operations are found to be in violation of any of the federal, state and foreign laws described above or any other current or future fraud and abuse or other healthcare laws and regulations that apply to us, we may be subject to penalties, including significant civil, criminal and administrative penalties, including damages, fines, disgorgement, imprisonment, exclusion from participation in government funded healthcare programs, such as Medicare and Medicaid, integrity oversight and reporting obligations, contractual damages, reputational harm, diminished profits and future earnings, injunctions, requests for recall, seizure of products, total or partial suspension of production, denial or withdrawal of product approvals or refusal to allow a firm to enter into supply contracts, including government contracts, and we could be required to curtail or cease our operations. Any of the foregoing consequences could seriously harm our business and our financial results.

Coverage and Reimbursement

Significant uncertainty exists as to the coverage and reimbursement status of any product candidates for which we may obtain regulatory approval. In the United States and markets in other countries, sales of any products for which we receive regulatory approval for commercial sale will depend, in part, on the availability of coverage and adequate reimbursement from third-party payors. Third-party payors include government programs such as Medicare or Medicaid, managed care plans, private health insurers and other organizations. These third-party payors may deny coverage or reimbursement for a product or therapy in whole or in part if they determine that the product or therapy was not medically appropriate or necessary. Third-party payors may attempt to control costs by limiting coverage to specific drug products on an approved list, or formulary, which might not include all of the FDA-approved drug products for a particular indication, and by limiting the amount of reimbursement for particular procedures or drug treatments. Additionally, coverage and reimbursement for drug products can differ significantly from payor to payor. The Medicare and Medicaid programs are often used as models by private payors and other governmental payors to develop their coverage and reimbursement policies for drugs and biologics. However, one third-party payor's decision to cover a particular drug product does not ensure that other payors will also provide coverage for the product or will provide coverage at an adequate reimbursement rate.

The cost of pharmaceuticals continues to generate substantial governmental and third-party payor interest. We expect that the pharmaceutical industry will experience pricing pressures due to the trend toward managed healthcare, the increasing influence of managed care organizations and additional legislative proposals. Third-party payors are increasingly challenging the price and examining the medical necessity and cost effectiveness of medical products and services, in addition to their safety and efficacy. We may need to conduct expensive pharmacoeconomic studies in order to demonstrate the medical necessity and cost-effectiveness of our products to obtain third-party payor coverage, in addition to the costs required to obtain the FDA approvals. Our product candidates may not be considered medically necessary or cost-effective. A payor's decision to provide coverage for a drug product does not imply that an adequate reimbursement rate will be approved. Adequate third-party reimbursement may not be available to enable us to maintain price levels sufficient to realize an appropriate return on our investment in product development.

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Some third-party payors also require pre-approval of coverage for new or innovative drug therapies before they will reimburse healthcare providers who use such therapies. While we cannot predict whether any proposed cost-containment measures will be adopted or otherwise implemented in the future, these requirements or any announcement or adoption of such proposals could have a material adverse effect on our ability to obtain adequate prices for our product candidates and to operate profitably. In international markets, reimbursement and healthcare payment systems vary significantly by country, and many countries have instituted price ceilings on specific products and therapies. There can be no assurance that our products will be considered medically reasonable and necessary for a specific indication, that our products will be considered cost-effective by third-party payors, that coverage or an adequate level of reimbursement will be available or that third-party payors' reimbursement policies will not adversely affect our ability to sell our products profitably.

Other Healthcare Laws

U.S. Healthcare Reform

The United States and some foreign jurisdictions are considering or have enacted a number of reform proposals to change the healthcare system. There is significant interest in promoting changes in healthcare systems with the stated goals of containing healthcare costs, improving quality or expanding access. In the United States, the pharmaceutical industry has been a particular focus of these efforts and has been significantly affected by federal and state legislative initiatives, including those designed to limit the pricing, coverage and reimbursement of pharmaceutical and biopharmaceutical products, especially under government-funded health care programs, and increased governmental control of drug pricing.

The ACA, which was enacted in March 2010, substantially changed the way healthcare is financed by both governmental and private insurers in the United States, and significantly affected the pharmaceutical industry. The ACA contains a number of provisions of particular import to the pharmaceutical and biotechnology industries, including, but not limited to, those governing enrollment in federal healthcare programs, a new methodology by which rebates owed by manufacturers under the Medicaid Drug Rebate Program are calculated for drugs that are inhaled, infused, instilled, implanted or injected, a new licensure framework for follow on biologic products, and annual fees based on pharmaceutical companies' share of sales to federal health care programs. There remain judicial and Congressional challenges to certain aspects of the ACA, as well as efforts by the Trump administration to repeal or replace certain aspects of the ACA. Since January 2017, President Trump has signed Executive Orders and other directives designed to delay the implementation of certain provisions of the ACA or otherwise circumvent some of the requirements for health insurance mandated by the ACA. Concurrently, Congress has considered legislation that would repeal or repeal and replace all or part of the ACA. While Congress has not passed comprehensive repeal legislation, several bills affecting the implementation of certain taxes under the ACA have passed. In January 2013, President Obama signed into law the American Taxpayer Relief Act of 2012, which, among other things, reduced Medicare payments to several providers, and increased the statute of limitations period for the government to recover overpayments to providers from three to five years.

On December 22, 2017, President Trump signed into law new federal tax legislation commonly referred to as the Tax Cuts and Jobs Act, or Tax Act, which includes a provision repealing, effective January 1, 2019, the tax-based shared responsibility payment imposed by the ACA on certain individuals who fail to maintain qualifying health coverage for all or part of a year that is commonly referred to as the "individual mandate." In addition, the 2020 federal spending package permanently eliminates, effective January 1, 2020, the ACA mandated "Cadillac" tax on high-cost employer-sponsored health coverage and medical device tax and, effective January 1, 2021, also eliminates the health insurer tax. The Bipartisan Budget Act of 2018, or BBA, among other things, amended the ACA, effective January 1, 2019, to close the coverage gap in most Medicare Part D drug plans. In December 2018, CMS published a new final rule permitting further collections and payments to and from certain ACA-qualified health plans and health insurance issuers under the ACA risk adjustment program in response to the outcome of federal district court litigation regarding the method CMS uses to determine this risk adjustment. However, on April 27, 2020, the U.S. Supreme Court reversed a Federal Circuit decision that previously upheld Congress' denial of \$12 billion in "risk corridor" funding. On December 14, 2018, a Texas U.S. District Court Judge ruled that the ACA is unconstitutional in its entirety because the "individual mandate" was repealed by Congress as part of the Tax Act. Additionally, on December 18, 2019, the U.S. Court of Appeals for the Fifth Circuit upheld the District Court ruling

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that the individual mandate was unconstitutional and remanded the case back to the District Court to determine whether the remaining provisions of the ACA are invalid as well. On March 2, 2020, the U.S. Supreme Court granted the petitions for writs of certiorari to review this case and will hear oral arguments, which are expected to occur later this year. It is unclear how such litigation and other efforts to repeal and replace the ACA will impact the ACA.

Other legislative changes have been proposed and adopted in the United States since the ACA was enacted. These changes included aggregate reductions to Medicare payments to providers of up to 2% per fiscal year, effective April 1, 2013, which, due to subsequent legislative amendments, will stay in effect through 2030 unless additional congressional action is taken. The CARES Act, which was signed into law on March 27, 2020, designed to provide financial support and resources to individuals and businesses affected by COVID-19 pandemic, suspended the 2% Medicare sequester from May 1, 2020, through December 31, 2020, and extended the sequester by one year, through 2030, in order to offset the added expense of the 2020 cancellation. Additionally, it is possible that additional governmental action is taken to address the COVID-19 pandemic, resulting in a material adverse effect on our business. For example, on April 18, 2020, CMS announced that qualified health plan issuers under the ACA may suspend activities related to the collection and reporting of quality data that would have otherwise been reported between May and June 2020 given the challenges healthcare providers are facing responding to the COVID-19 virus.

Moreover, there has recently been heightened governmental scrutiny over the manner in which manufacturers set prices for their marketed products, which has resulted in several Congressional inquiries and proposed and enacted federal and state legislation designed to, among other things, bring more transparency to product pricing, review the relationship between pricing and manufacturer patient programs, and reform government program reimbursement methodologies for drug products. For example, at the federal level, the Trump administration's budget proposals for fiscal year 2021 includes a \$135 billion allowance to support legislative proposals seeking to reduce drug prices, increase competition, lower out-of-pocket drug costs for patients and increase patient access to lower-cost generic and biosimilar drugs. On March 10, 2020, the Trump administration sent "principles" for drug pricing to Congress, calling for legislation that would, among other things, cap Medicare Part D beneficiary out-of-pocket pharmacy expenses, provide an option to cap Medicare Part D beneficiary monthly out-of-pocket expenses, and place limits on pharmaceutical price increases. Additionally, the Trump Administration previously released a "Blueprint" to lower drug prices and reduce out of pocket costs of drugs that contained proposals to increase manufacturer competition, increase the negotiating power of certain federal healthcare programs, incentivize manufacturers to lower the list price of their products and reduce the out of pocket costs of drug products paid by consumers. The U.S. Department of Health and Human Services has solicited feedback on certain of these measures and has implemented others under its existing authority. For example, in May 2019, the U.S. Centers for Medicare & Medicaid Services issued a final rule to allow Medicare Advantage plans the option to use step therapy for Part B drugs beginning January 1, 2020, codifying a policy change that was effective January 1, 2019. While some of these and other measures may require additional authorization to become effective, Congress and the Trump administration have each indicated that it will continue to seek new legislative and/or administrative measures to control drug costs. At the state level, legislatures have increasingly passed legislation and implemented regulations designed to control pharmaceutical product pricing, including price or patient reimbursement constraints, discounts, restrictions on certain product access and marketing cost disclosure and transparency measures, and, in some cases, designed to encourage importation from other countries and bulk purchasing. These and other new laws and regulations may result in additional reductions in Medicare and other healthcare funding, which could have a material adverse effect on customers for our biopharmaceutical products, if approved, and accordingly, our financial operations.

Additionally, the Right to Try Act, which was enacted on May 30, 2018, provides a federal framework for certain patients with life-threatening diseases to access certain investigational new drug products that have completed a Phase 1 clinical trial and that are undergoing investigation for FDA approval. Under certain circumstances, eligible patients can seek treatment without enrolling in clinical trials and without obtaining FDA permission under the FDA expanded access program. There is no obligation for a drug manufacturer to make its drug products available to eligible patients as a result of the Right to Try Act.

Employees

As of May 31, 2020, we had 24 full-time employees, 11 of whom hold Ph.D. or M.D. degrees and 16 of whom were engaged in research and development activities. None of our employees are represented by a labor union and we believe we maintain good relations with our employees.

Facilities

We currently lease 11,424 square feet of laboratory and office space in Burlingame, California, under a lease that expires in 2023. We believe that this space is sufficient to meet our needs for the foreseeable future and that any additional space we may require will be available on commercially reasonable terms.

Legal Proceedings

We are not currently a party to any material legal proceedings. From time to time, we may become involved in legal proceedings arising in the ordinary course of our business. Regardless of outcome, litigation can have an adverse impact on us due to defense and settlement costs, diversion of management resources, negative publicity, reputational harm and other factors.

MANAGEMENT

Executive Officers and Directors

The following table sets forth the names, ages and positions of our executive officers and directors as of May 31, 2020:

| <u>NAME</u> | <u>AGE</u> | <u>POSITION</u> |
|--------------------------------------|------------|--|
| Executive Officers: | | |
| Jaume Pons, Ph.D. | 54 | President, Chief Executive Officer and Director |
| Nathan Caffo | 51 | Chief Business Officer |
| Peter García | 59 | Chief Financial Officer |
| Steffen Pietzke | 48 | Vice President, Finance and Chief Accounting Officer |
| Sophia Randolph, M.D., Ph.D. | 52 | Chief Medical Officer |
| Hong Wan, Ph.D. | 47 | Chief Scientific Officer |
| Non-Employee Directors: | | |
| Corey Goodman, Ph.D. (2) (3) | 68 | Executive Chairman of the Board |
| Rekha Hemrajani (1) (3) | 51 | Director |
| Jason Lettmann (2) (3) | 42 | Director |
| Jack Nielsen (1) (2) | 56 | Director |
| Graham Walmsley, M.D., Ph.D. (1) (3) | 33 | Director |

(1) Member of the audit committee

(2) Member of the compensation committee

(3) Member of the corporate governance and nominating committee

Executive Officers

Jaume Pons, Ph.D. has served as our President, Chief Executive Officer and a member of our board of directors since April 2015. He has also served as a Scientific Advisor at Lightstone Ventures, a venture capital fund, since January 2019 and as a Venture Partner at venBio Partners, a venture capital firm, since January 2017. Prior to joining us, Dr. Pons was with Pfizer, Inc., a biopharmaceutical company, where he served as Senior Vice President and a member of the Pfizer World Research and Development Team and Chief Technology Officer for Pfizer Biotherapeutics from September 2009 to February 2015. From October 2007 to February 2015, he served as Chief Scientific Officer at Rinat Neuroscience Corporation, a subsidiary of Pfizer. Dr. Pons holds a B.S. in Biochemistry and an M.S. in Biotechnology from Autònoma University of Barcelona and a Ph.D. in Molecular and Cell Biology from the Institute on Fundamental Biology, Barcelona (Autonomous University of Barcelona).

We believe Dr. Pons is qualified to serve on our board of directors because of the perspective and experience he brings as our Chief Executive Officer, his experience in leadership positions in the biotechnology industry, his educational background and his strong scientific knowledge.

Nathan Caffo has served as our Chief Business Officer since September 2018. Prior to joining us, Mr. Caffo was with Presage Biosciences, an oncology company, from April 2009 to August 2018, where he served in various executive roles, including as President, from December 2011 to August 2018, and from September 2017 until August 2018, he also served as Presage's Chief Executive Officer. Mr. Caffo holds a B.S. in Microbiology from Pennsylvania State University.

Peter Garcia has served as our Chief Financial Officer since January 2020. Prior to joining us, he served as Vice President and Chief Financial Officer from May 2013 until August 2019 and as Acting Chief Accounting Officer from May 2013 until July 2013 at PDL BioPharma, Inc., an acquirer of royalties and pharmaceutical assets. From October 2011 to May 2013, Mr. Garcia served as Chief Financial Officer at BioTime, Inc., a clinical-stage biotechnology company now known as Lineage Cell Therapeutics. He previously served as Chief Financial Officer of six biotechnology and high technology companies, including Marina Biotech, Nanosys, Nuvelo, Novacept, IntraBiotics Pharmaceuticals and Dendreon. Mr. Garcia holds a B.A. in Economics and Sociology from Stanford University and an M.B.A. from the University of California, Los Angeles.

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Steffen Pietzke has served as our Vice President, Finance and Chief Accounting Officer since March 2020. Prior to joining us, he served as Senior Vice President, Finance and Chief Accounting Officer at Tricida, Inc., a biotechnology company, from April 2018 to March 2020. From June 2015 to April 2018, Mr. Pietzke served as Vice President, Finance and Chief Accounting Officer at PDL BioPharma. From July 2013 to June 2015, he served as a Senior Manager with Ernst & Young LLP, a professional services firm. From September 2000 to June 2013, Mr. Pietzke was with PricewaterhouseCoopers LLP, a professional services firm, where he served most recently as a Senior Manager. He holds a Bachelor of Business Science in Accounting from the University of Applied Sciences in Offenburg, Germany and is a certified public accountant.

Sophia Randolph, M.D., Ph.D. has served as our Chief Medical Officer since June 2016. Prior to joining us, she was with Pfizer Oncology Early and Late Development Groups from June 2008 to April 2016, where she served most recently as Executive Director, Oncology from June 2015 to April 2016. From June 2007 to May 2008, Dr. Randolph served as Director, Clinical Sciences, Oncology at Merck, a pharmaceutical company. She holds an A.B. in Biochemistry from Harvard University and an M.D. and a Ph.D. in Cellular and Molecular Biology from the University of Michigan. Dr. Randolph completed her oncology fellowship training at Seattle Cancer Care Alliance/Fred Hutchinson Cancer Research Center.

Hong Wan, Ph.D. has served as our Chief Scientific Officer since June 2017 and previously served as our Vice President, Early Development and Translational Medicine from April 2015 to May 2017. Prior to joining us, she was with Pfizer from September 2005 to March 2015 where she served most recently as Senior Director, Biotechnology Clinical Development from September 2012 to March 2015. Dr. Wan holds an A.B. in Biochemical Sciences from Harvard University and a Ph.D. in Molecular and Cell Biology from the University of California, Berkeley.

Non-Employee Directors

Corey Goodman, Ph.D. is our co-founder and has served as a member of our board of directors and as Executive Chairman since March 2015. He co-founded and has served as a Managing Partner of venBio Partners since March 2010. Dr. Goodman founded Labrys, a biopharmaceutical company acquired by Teva, where he served as chairman and as a member of the board of directors from December 2012 to June 2014. He founded Pfizer's Biotherapeutics and Bioinnovation Center where he served as President and a member of Pfizer's Executive Leadership Team from October 2007 until May 2009. He co-founded Renovis, a biopharmaceutical company acquired by Evotec, where he served as President, Chief Executive Officer and a director from September 2001 to October 2007. He is a former tenured biology professor at both Stanford University and the University of California, Berkeley, the co-founder of U.C. Berkeley's Wills Neuroscience Institute, Investigator with the Howard Hughes Medical Institute and currently is an adjunct professor at U.C. Berkeley. Dr. Goodman is a member of the U.S. National Academy of Sciences, the American Academy of Arts & Sciences and the American Philosophical Society. He currently serves as chairman and as a member of the board of directors of several privately held biotechnology companies. Dr. Goodman holds a B.S. in Biology from Stanford University and a Ph.D. in Neurobiology from U.C. Berkeley and was a postdoctoral fellow at the University of California, San Diego.

We believe Dr. Goodman is qualified to serve on our board of directors due to his experience founding and managing biotechnology companies in both the private and public markets.

Rekha Hemrajani has served as a member of our board of directors since April 2020. She served as President and Chief Executive Officer of Aravive, Inc., a clinical-stage biotechnology company, from January 2020 to April 2020. From March 2019 to September 2019, Ms. Hemrajani served as the Chief Operating Officer and Chief Financial Officer of Arcus Biosciences, a biotechnology company. From March 2016 to March 2019, she served as Chief Operating Officer of FLX Bio, Inc. (now RAPT Therapeutics, Inc.), a biotechnology company. From February 2015 to March 2016, Ms. Hemrajani served as Chief Financial Officer and Senior Vice President of Business and Financial Operations at 3-V Biosciences, Inc. (now Sagimet Biosciences, Inc.), a biotechnology company. From November 2013 to January 2015, Ms. Hemrajani advised privately held companies on strategic corporate development and financing activities at Ravinia Consulting, a consulting firm she founded. Ms. Hemrajani currently serves as a director at Adverum Biotechnologies, Inc., a clinical-stage gene therapy company, and previously served as a director at Aravive. She holds a B.S. in Economics and Computer Science from the University of Michigan and an M.B.A. from the Kellogg Graduate School of Management at Northwestern University.

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We believe Ms. Hemrajani is qualified to serve on our board of directors due to her executive and financial experience at multiple companies in the biopharmaceutical and biotechnology industries.

Jason Lettmann has served as a member of our board of directors since April 2020 and previously served as a member of our board of directors from March 2015 to May 2017. Mr. Lettmann has served as a General Partner of Lightstone Ventures since March 2012 and as a Partner at Morgenthaler Ventures, a venture capital and private equity firm, since June 2009. He previously served as Chief Executive Officer of Promedior Inc., a biotechnology company acquired by Roche, from January 2019 to February 2020 and as a Vice President at Split Rock Partners, a venture capital firm, from June 2006 to June 2009. Mr. Lettmann currently serves as a member of the board of directors of several privately-held companies and previously served as a director of Ra Pharmaceuticals, a clinical-stage pharmaceutical company acquired by UCB. Mr. Lettmann holds a B.A. in Psychology from the University of Iowa and an M.B.A. from the University of Michigan's Ross School of Business.

We believe Mr. Lettmann is qualified to serve on our board of directors because of his industry experience, his experience serving on the boards of directors for multiple life sciences companies and his extensive experience with venture capital investments.

Jack Nielsen has served as a member of our board of directors since February 2020. Mr. Nielsen has served as a Managing Director at Vivo Capital LLC, a healthcare focused investment firm, since August 2017, and previously served as a consultant from March 2017 to July 2017. From 2001 to February 2017, Mr. Nielsen was with the Novo A/S (Novozymes) organization and its venture activities in several roles, most recently as a Senior Partner based in Copenhagen, Denmark. From May 2006 to August 2012, Mr. Nielsen was a Partner at Novo Ventures (US) in San Francisco, where he established the office that provides certain consultancy services to Novo A/S. He currently serves as a member of the board of directors of Reata Pharmaceuticals, a pharmaceutical company, and previously served as a director of Akebia Therapeutics, Apollo Endosurgery, Crinetics Pharmaceuticals and Merus, N.V. Mr. Nielsen holds an M.Sc. in Chemical Engineering from the Technical University of Denmark and a Masters in Management of Technology from Center for Technology, Economics and Management, Technical University of Denmark.

We believe Mr. Nielsen is qualified to serve on our board of directors because of his experience working in the biotechnology industry, his experience as a venture capital investor and his board service for several companies in the biotechnology sector.

Graham Walmsley, M.D., Ph.D. has served as a member of our board of directors since February 2020. Dr. Walmsley is a Founding Member and has served as a Managing Partner of Logos Global Management, LP, a biotechnology-focused hedge fund, since August 2019. From July 2016 to August 2019, he served as a Principal at Versant Ventures, a healthcare focused venture capital firm. Dr. Walmsley served as Head of Business Development at Pipeline Therapeutics Inc., a biotechnology company, from April 2018 to December 2018 and as Head of Business Development at Jecure Therapeutics, Inc., a biotechnology company, from June 2017 until its acquisition by Genentech, a subsidiary of Roche, in November 2018. He currently serves as a member of the board of directors of Akeru Therapeutics, a clinical-stage biotechnology company. Dr. Walmsley received a B.A. in Molecular and Cell Biology from the University of California, Berkeley in June 2009 and a Ph.D. and an M.D. in Stem Cell Biology and Regenerative Medicine from Stanford University School of Medicine in June 2016 and June 2018, respectively.

We believe Dr. Walmsley is qualified to serve on our board of directors because of his significant experience in the healthcare and biotechnology industry, his educational background and his experience as a director for companies in the biotechnology sector.

Board Composition

Our board of directors currently consists of six members. After the completion of this offering, the number of directors will be fixed by our board of directors, subject to the terms of our amended and restated certificate of incorporation and amended and restated bylaws. Each of our current directors will continue to serve as a director until the election and qualification of his or her successor, or until his or her earlier death, resignation or removal.

Our amended and restated certificate of incorporation will provide that our board of directors will be divided into three classes with staggered three-year terms. Only one class of directors will be elected at each annual meeting of

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stockholders, with the other classes continuing for the remainder of their respective three-year terms. Our current directors will be divided among the three classes as follows:

- the Class I directors will be _____, and their terms will expire at the annual meeting of stockholders to be held in 2021;
- the Class II directors will be _____, and their terms will expire at the annual meeting of stockholders to be held in 2022; and
- the Class III directors will be _____, and their terms will expire at the annual meeting of stockholders to be held in 2023.

At each annual meeting of stockholders, upon the expiration of the term of a class of directors, the successor to each such director in the class will be elected to serve from the time of election and qualification until the third annual meeting following his or her election and until his or her successor is duly elected and qualified, in accordance with our amended and restated certificate of incorporation. Any additional directorships resulting from an increase in the number of directors will be distributed among the three classes so that, as nearly as possible, each class will consist of one-third of our directors.

This classification of our board of directors may have the effect of delaying or preventing changes in control of our company.

Director Independence

Upon the completion of this offering, we anticipate that our common stock will be listed on the Nasdaq Global Select Market. Under the rules of Nasdaq, independent directors must comprise a majority of a listed company's board of directors within one year of the completion of this offering. In addition, the rules of Nasdaq require that, subject to specified exceptions, each member of a listed company's audit, compensation and corporate governance and nominating committees be independent. Audit committee members and compensation committee members must also satisfy the independence criteria set forth in Rule 10A-3 and Rule 10C-1, respectively, under the Exchange Act. Under the rules of Nasdaq, a director will only qualify as an "independent director" if, in the opinion of that company's board of directors, that person does not have a relationship that would interfere with the exercise of independent judgment in carrying out the responsibilities of a director.

To be considered to be independent for purposes of Rule 10A-3 and under the rules of Nasdaq, a member of an audit committee of a listed company may not, other than in his or her capacity as a member of the audit committee, the board of directors or any other board committee: (1) accept, directly or indirectly, any consulting, advisory or other compensatory fee from the listed company or any of its subsidiaries or (2) be an affiliated person of the listed company or any of its subsidiaries.

To be considered independent for purposes of Rule 10C-1 and under the rules of Nasdaq, the board of directors must affirmatively determine that each member of the compensation committee is independent, including a consideration of all factors specifically relevant to determining whether the director has a relationship to the company which is material to that director's ability to be independent from management in connection with the duties of a compensation committee member, including, but not limited to: (1) the source of compensation of such director, including any consulting, advisory or other compensatory fee paid by the company to such director and (2) whether such director is affiliated with the company, a subsidiary of the company or an affiliate of a subsidiary of the company.

Our board of directors undertook a review of its composition, the composition of its committees and the independence of our directors and considered whether any director has a material relationship with us that could compromise his or her ability to exercise independent judgment in carrying out his or her responsibilities. Based upon information requested from and provided by each director concerning his background, employment and affiliations, including family relationships, our board of directors has determined that Corey Goodman, Ph.D., Rekha Hemrajani, Jason Lettmann, Jack Nielsen and Graham Walmsley, M.D., Ph.D., representing five of our six directors, do not have a relationship that would interfere with the exercise of independent judgment in carrying out the responsibilities of a director and that each of these directors is "independent" as that term is defined under the rules of Nasdaq.

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In making these determinations, our board of directors considered the current and prior relationships that each non-employee director has with our company and all other facts and circumstances our board of directors deemed relevant in determining their independence, including the beneficial ownership of our capital stock by each non-employee director, and the transactions involving them described in the section titled "Certain Relationships and Related-Party Transactions." There are no family relationships among any of our directors or executive officers.

Board Leadership Structure

Our board of directors is currently chaired by Dr. Goodman. As a general policy, our board of directors believes that separation of the positions of Executive Chairman of our board of directors and Chief Executive Officer reinforces the independence of our board of directors from management, creates an environment that encourages objective oversight of management's performance and enhances the effectiveness of our board of directors as a whole. As such, Dr. Pons serves as our Chief Executive Officer while Dr. Goodman serves as the Executive Chairman of our board of directors but is not an officer. We currently expect and intend the positions of Executive Chairman of our board of directors and Chief Executive Officer to continue to be held by two individuals in the future.

Role of the Board in Risk Oversight

Our board of directors has an active role, as a whole and also at the committee level, in overseeing the management of our risks. Our board of directors is responsible for general oversight of risks and regular review of information regarding our risks, including credit risks, liquidity risks and operational risks. The compensation committee is responsible for overseeing the management of risks relating to our executive compensation plans and arrangements. The audit committee is responsible for overseeing the management of risks relating to accounting matters and financial reporting. The corporate governance and nominating committee is responsible for overseeing the management of risks associated with the independence of our board of directors and potential conflicts of interest. Although each committee is responsible for evaluating certain risks and overseeing the management of such risks, our entire board of directors is regularly informed through discussions from committee members about such risks. Our board of directors believes its administration of its risk oversight function has not negatively affected the board of directors' leadership structure.

Board Committees

Our board of directors has an audit committee, a compensation committee and a corporate governance and nominating committee, each of which has the composition and the responsibilities described below.

Audit Committee

The members of our audit committee are Rekha Hemrajani, Jack Nielsen and Graham Walmsley, M.D., Ph.D. Ms. Hemrajani is the chair of our audit committee and is our audit committee financial expert, as that term is defined under the SEC rules implementing Section 407 of SOX, and possesses financial sophistication, as defined under the rules of Nasdaq. Our audit committee oversees our corporate accounting and financial reporting process and assists our board of directors in monitoring our financial systems. Our audit committee will also:

- select and hire the independent registered public accounting firm to audit our consolidated financial statements;
- help to ensure the independence and performance of the independent registered public accounting firm;
- approve audit and non-audit services and fees;
- review consolidated financial statements and discuss with management and the independent registered public accounting firm our annual audited and quarterly consolidated financial statements, the results of the independent audit and the quarterly reviews and the reports and certifications regarding internal controls over financial reporting and disclosure controls;
- prepare the audit committee report that the SEC requires to be included in our annual proxy statement;
- review reports and communications from the independent registered public accounting firm;
- review the adequacy and effectiveness of our internal controls and disclosure controls and procedure;
- review our policies on risk assessment and risk management;
- review related-party transactions; and

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- establish and oversee procedures for the receipt, retention and treatment of accounting related complaints and the confidential submission by our employees of concerns regarding questionable accounting or auditing matters.

Our audit committee will operate under a written charter, to be effective prior to the completion of this offering, which will satisfy the applicable rules of the SEC and the listing standards of Nasdaq.

Compensation Committee

The members of our compensation committee are Corey Goodman, Ph.D., Jason Lettmann and Jack Nielsen. Dr. Goodman is the chair of our compensation committee. Our compensation committee oversees our compensation policies, plans and benefits programs. The compensation committee will also:

- oversee our overall compensation philosophy and compensation policies, plans and benefit programs;
- review and approve or recommend to the board of directors for approval compensation for our executive officers and directors;
- prepare the compensation committee report that the SEC will require to be included in our annual proxy statement; and
- administer our equity compensation plans.

Our compensation committee will operate under a written charter, to be effective prior to the completion of this offering, which will satisfy the applicable rules of the SEC and the listing standards of Nasdaq.

Corporate Governance and Nominating Committee

The members of our corporate governance and nominating committee are Corey Goodman, Ph.D., Rekha Hemrajani, Jason Lettmann and Graham Walmsley, M.D., Ph.D. Mr. Lettmann is the chairman of our corporate governance and nominating committee. Our corporate governance and nominating committee oversees and assists our board of directors in reviewing and recommending nominees for election as directors. Specifically, the corporate governance and nominating committee will:

- identify, evaluate and make recommendations to our board of directors regarding nominees for election to our board of directors and its committees;
- consider and make recommendations to our board of directors regarding the composition of our board of directors and its committees;
- review developments in corporate governance practices;
- evaluate the adequacy of our corporate governance practices and reporting; and
- evaluate the performance of our board of directors and of individual directors.

Our corporate governance and nominating committee will operate under a written charter, to be effective prior to the completion of this offering, which will satisfy the applicable rules of the SEC and the listing standards of Nasdaq.

Director Compensation

As of May 31, 2020, none of our directors have received any cash or equity compensation for serving on our board of directors. This includes our current directors and Dr. Robert Adelman and Ms. Caroline Gaynor, each of whom served on our board of directors during the fiscal year ended December 31, 2019.

We do reimburse our directors for expenses associated with attending meetings of our board of directors and committees of our board of directors. Following the completion of this offering, we expect to implement an annual cash and equity compensation program for our non-employee directors.

Dr. Pons was our only employee director during 2019. See the section titled "Executive Compensation" for additional information about Dr. Pons' compensation.

Compensation Committee Interlocks and Inside Participation

None of the members of our compensation committee is or has been an officer or employee of our company. None of our executive officers currently serves, or in the past fiscal year has served, as a member of the board of directors or

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compensation committee (or other board committee performing equivalent functions or, in the absence of any such committee, the entire board of directors) of any entity that has one or more executive officers serving on our board of directors or compensation committee.

Code of Business Conduct and Ethics

Prior to the closing of this offering, we intend to adopt a written code of business conduct and ethics that will apply to our directors, officers and employees, including our principal executive officer, principal financial officer, principal accounting officer or controller or, persons performing similar functions. Following this offering, the code of business conduct and ethics will be available on our website at <http://alxoncology.com>. We intend to disclose future amendments to such code, or any waivers of its requirements, applicable to any principal executive officer, principal financial officer, principal accounting officer or controller or persons performing similar functions, or our directors on our website identified above. Information contained on the website is not incorporated by reference into this prospectus and should not be considered to be part of this prospectus.

EXECUTIVE COMPENSATION

Our named executive officers for the year ended December 31, 2019, which consist of our principal executive officer and the next two most highly compensated executive officers, are:

- Jaume Pons, Ph.D., our President and Chief Executive Officer;
- Sophia Randolph, M.D., Ph.D., our Chief Medical Officer; and
- Hong Wan, Ph.D., our Chief Scientific Officer.

Compensation of Named Executive Officers

Summary Compensation Table

The following table sets forth information regarding the compensation of our named executive officers for the year ended December 31, 2019.

| NAME AND PRINCIPAL POSITION | YEAR | SALARY (\$) | OPTION AWARDS (\$)(1) | NON-EQUITY INCENTIVE PLAN COMPENSATION (\$)(2) | TOTAL (\$) |
|---|------|----------------|-----------------------------|--|---------------|
| Jaume Pons, Ph.D. <i>President and Chief Executive Officer</i> | 2019 | 422,300 | 134,002 | 147,900 | 704,202 |
| Sophia Randolph, M.D., Ph.D. <i>Chief Medical Officer</i> | 2019 | 351,100 | 40,834 | 105,400 | 497,334 |
| Hong Wan, Ph.D. <i>Chief Scientific Officer</i> | 2019 | 313,100 | 40,372 | 94,000 | 447,472 |

(1) The amounts disclosed represent the aggregate grant date fair value of the award as calculated in accordance with ASC 718. The assumptions used in calculating the grant date fair value of the award disclosed in this column are set forth in the notes to our audited consolidated financial statements included elsewhere in this prospectus. These amounts do not correspond to the actual value that may be recognized by the named executive officers upon vesting of the applicable awards.

(2) The amounts disclosed represent discretionary bonuses based upon achievement of certain Company and individual performance metrics for the year ended December 31, 2019, which were paid in March 2020.

Outstanding Equity Awards at Fiscal Year-End

The following table sets forth information concerning outstanding equity awards held by each of our named executive officers as of December 31, 2019:

| NAME | OPTION AWARDS | | | | | STOCK AWARDS | |
|------------------------------|------------------|---|---|--|------------------------------|---|---|
| | GRANT DATE(1) | NUMBER OF SECURITIES UNDERLYING UNEXERCISED OPTIONS EXERCISABLE (#) | NUMBER OF SECURITIES UNDERLYING UNEXERCISED OPTIONS EXERCISABLE (#) | OPTION EXERCISE PRICE (\$)(2) | OPTION EXPIRATION DATE | NUMBER OF SHARES OR UNITS OF STOCK THAT HAVE NOT VESTED (#) | MARKET VALUE OF SHARES OR UNITS OF STOCK THAT HAVE NOT VESTED (\$)(3) |
| Jaume Pons, Ph.D. | 03/30/2017 | 1,150,200(4) | 575,100 | 0.15 | 03/30/2027 | — | — |
| | 09/12/2019 | 695,700(5) | — | 0.29 | 09/12/2029 | — | — |
| Sophia Randolph, M.D., Ph.D. | 11/10/2016 | — | — | — | — | 109,374(6) | 31,718 |
| | 03/30/2017 | 299,333(4) | 149,667 | 0.15 | 03/30/2027 | — | — |
| Hong Wan, Ph.D. | 09/12/2019 | 212,000(5) | — | 0.29 | 09/12/2029 | — | — |
| | 03/30/2017 | 297,600(4) | 148,800 | 0.15 | 03/30/2027 | — | — |
| | 09/12/2019 | 209,600(5) | — | 0.29 | 09/12/2029 | — | — |

(1) The outstanding options to purchase shares of our common stock, or ALX Options, were originally granted as options to purchase ordinary shares of ALX Oncology Limited, or ALX Ireland Options, pursuant to its share award scheme and U.S. sub-scheme. In

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connection with the reorganization effective as of April 1, 2020, the ALX Ireland Options have been substituted and replaced with ALX Options under our 2020 Plan. While the grant date of the ALX Option is April 1, 2020, each ALX Option has the same vesting terms, exercise price and expiration date as the corresponding ALX Ireland Option.

- (2) This column represents the fair market value of an ordinary share of ALX Oncology Limited on the date of grant, as determined by the board of directors of ALX Oncology Limited.
- (3) This column represents the fair market value of an ordinary share of ALX Oncology Limited of \$0.29 as of December 31, 2019 (the determination of the fair market value by our board of directors as of the most proximate date) multiplied by the amount shown in the column for the number of shares or units that have not vested.
- (4) The shares underlying this option vest in 48 equal monthly installments beginning on May 1, 2017, subject to continued service to the Company.
- (5) The option is subject to an early exercise provision and is immediately exercisable. The shares underlying this option vest in 48 equal monthly installments beginning on June 16, 2019, subject to continued service to the Company.
- (6) The shares were acquired pursuant to an early exercise provision and remain subject to our repurchase right in accordance with the vesting schedule of this option. The remaining shares underlying this option vest in six equal monthly installments beginning on January 1, 2020, subject to continued service to the Company.

Employment Arrangements with Our Named Executive Officers

Dr. Jaume Pons

Prior to the completion of this offering, we intend to enter into a confirmatory employment letter with Dr. Jaume Pons, our President and Chief Executive Officer. The confirmatory employment letter will have no specific term and will provide that Dr. Pons is an at-will employee. Dr. Pons current annual base salary is \$ and he is eligible for an annual target cash incentive payment equal to % of his annual base salary.

Dr. Sophia Randolph

Prior to the completion of this offering, we intend to enter into a confirmatory employment letter with Dr. Sophia Randolph, our Chief Medical Officer. The confirmatory employment letter will have no specific term and will provide that Dr. Randolph is an at-will employee. Dr. Randolph's current annual base salary is \$ and she is eligible for an annual target cash incentive payment equal to % of her annual base salary.

Dr. Hong Wan

Prior to the completion of this offering, we intend to enter into a confirmatory employment letter with Dr. Hong Wan, our Chief Scientific Officer. The confirmatory employment letter will have no specific term and will provide that Dr. Wan is an at-will employee. Dr. Wan's current annual base salary is \$ and she is eligible for an annual target cash incentive payment equal to % of her annual base salary.

Executive Incentive Compensation Plan

Prior to the completion of this offering, our board of directors intends to adopt our Executive Incentive Compensation Plan, or the Incentive Compensation Plan. Our Incentive Compensation Plan will allow our compensation committee to grant incentive awards, generally payable in cash, to employees selected by our compensation committee, including our named executive officers, based upon performance goals established by our compensation committee.

Under our Incentive Compensation Plan, our compensation committee determines the performance goals applicable to any award, which goals may include, without limitation, goals related to . The performance goals may differ from participant to participant and from award to award.

Our compensation committee will administer our Incentive Compensation Plan. The administrator of our Incentive Compensation Plan may, in its sole discretion and at any time, increase, reduce or eliminate a participant's actual award, and/or increase, reduce or eliminate the amount allocated to the bonus pool for a particular performance period. The actual award may be below, at or above a participant's target award, in the discretion of the administrator. The administrator may determine the amount of any reduction on the basis of such factors as it deems relevant, and it is not required to establish any allocation or weighting with respect to the factors it considers.

Actual awards will be paid in cash (or its equivalent) only after they are earned, and, unless otherwise determined by the administrator, a participant must be employed by us through the date the actual award is paid. The compensation committee reserves the right to settle an actual award with a grant of an equity award under our then-current equity compensation plan, which equity award may have such terms and conditions, including vesting, as the compensation committee determines. Payment of awards occurs as soon as administratively practicable after they are earned, but no later than the dates set forth in our Incentive Compensation Plan.

Our board of directors and our compensation committee will have the authority to amend, alter, suspend or terminate our Incentive Compensation Plan, provided such action does not impair the existing rights of any participant with respect to any earned awards.

Employee Benefit and Stock Plans

Amended and Restated 2020 Equity Incentive Plan

Prior to the completion of this offering, our board of directors intends to adopt, and we expect our stockholders will approve, an amendment and restatement of our 2020 Plan, or the Amended and Restated 2020 Plan. Our 2020 Plan previously was adopted by our board of directors and approved by our stockholders in April 2020. We expect that the Amended and Restated 2020 Plan will be effective on the business day immediately prior to the effective date of our registration statement related to this offering. Our Amended and Restated 2020 Plan will provide for the grant of incentive stock options, within the meaning of Section 422 of the Internal Revenue Code of 1986, as amended, or the Code, to our employees and any of our subsidiary corporations' employees, and for the grant of nonstatutory stock options, restricted stock, restricted stock units, stock appreciation rights, performance units and performance shares to our employees, directors and consultants and any of our subsidiary corporations' employees and consultants.

Authorized Shares. A total of _____ shares of our common stock will be reserved for issuance pursuant to our Amended and Restated 2020 Plan. The number of shares available for issuance under our Amended and Restated 2020 Plan will also include an annual increase on the first day of each fiscal year beginning on January 1, 2021, and ending on (and inclusive of) January 1, 2030, equal to the least of:

- _____ shares;
- _____ percent (_____ %) of the outstanding shares of our common stock as of the last day of the immediately preceding fiscal year; or
- such other amount as our board of directors may determine no later than the last day of our immediately preceding fiscal year.

If an award expires or becomes unexercisable without having been exercised in full, is surrendered pursuant to an exchange program, or, with respect to restricted stock, restricted stock units, performance units or performance shares, is forfeited to or repurchased due to failure to vest, the unpurchased shares (or for awards other than stock options or stock appreciation rights, the forfeited or repurchased shares) will become available for future grant or sale under the Amended and Restated 2020 Plan. With respect to stock appreciation rights, only the net shares actually issued will cease to be available under the Amended and Restated 2020 Plan and all remaining shares under stock appreciation rights will remain available for future grant or sale under the Amended and Restated 2020 Plan. Shares that have actually been issued under the Amended and Restated 2020 Plan under any award will not be returned to the Amended and Restated 2020 Plan; except if shares issued pursuant to awards of restricted stock, restricted stock units, performance shares or performance units are repurchased or forfeited, such shares will become available for future grant under the Amended and Restated 2020 Plan. Shares used to pay the exercise price of an award or satisfy the tax withholding obligations related to an award will become available for future grant or sale under the Amended and Restated 2020 Plan. To the extent an award is paid out in cash rather than shares, such cash payment will not result in a reduction in the number of shares available for issuance under the Amended and Restated 2020 Plan.

Plan Administration. Our board of directors or one or more committees appointed by our board of directors will have authority to administer our Amended and Restated 2020 Plan. We expect that the compensation committee of our board of directors will initially administer our Amended and Restated 2020 Plan. In addition, if we determine it is desirable to qualify transactions under our Amended and Restated 2020 Plan as exempt under Rule 16b-3 of the Exchange Act, such transactions will be structured to satisfy the requirements for exemption under Rule 16b-3. Subject to the provisions of our Amended and Restated 2020 Plan, the administrator has the power to administer our Amended and Restated 2020 Plan and make all determinations deemed necessary or advisable for administering the Amended and Restated 2020 Plan, including but not limited to, the power to determine the fair market value of our common stock, select the service providers to whom awards may be granted, determine the number of shares covered by each award, approve forms of award agreements for use under the Amended and Restated 2020 Plan,

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determine the terms and conditions of awards (including, but not limited to, the exercise price, the time or times at which awards may be exercised, any vesting acceleration or waiver or forfeiture restrictions and any restriction or limitation regarding any award or the shares relating thereto), construe and interpret the terms of our Amended and Restated 2020 Plan and awards granted under it, prescribe, amend and rescind rules relating to our Amended and Restated 2020 Plan, including creating sub-plans, modify or amend each award, including but not limited to the discretionary authority to extend the post-termination exercisability period of awards (except no option or stock appreciation right will be extended past its original maximum term), and allow a participant to defer the receipt of payment of cash or the delivery of shares that would otherwise be due to such participant under an award. The administrator also has the authority to allow participants the opportunity to transfer outstanding awards granted under the Amended and Restated 2020 Plan to a financial institution or other person or entity selected by the administrator, and to institute an exchange program by which outstanding awards granted under the Amended and Restated 2020 Plan may be surrendered or cancelled in exchange for awards of the same type, which may have a higher or lower exercise price and/or different terms, awards of a different type and/or cash, or by which the exercise price of an outstanding award granted under the Amended and Restated 2020 Plan is increased or reduced. The administrator's decisions, interpretations and other actions are final and binding on all participants and will be given the maximum deference permitted by applicable law.

Stock Options. Stock options may be granted under our Amended and Restated 2020 Plan. The exercise price of options granted under our Amended and Restated 2020 Plan must at least be equal to the fair market value of our common stock on the date of grant. The term of an option may not exceed ten years. With respect to any participant who owns more than 10% of the voting power of all classes of our (or any of our subsidiaries') outstanding stock, the term of an incentive stock option granted to such participant must not exceed five years and the per-share exercise price must equal at least 110% of the fair market value of a share of our common stock on the grant date. The administrator may grant incentive stock options under the Amended and Restated 2020 Plan for a period of ten years from the earlier of the date the Amended and Restated 2020 Plan becomes effective or the date that our stockholders approve the Amended and Restated 2020 Plan. The administrator will determine the methods of payment of the exercise price of an option, which may include cash, shares or other property acceptable to the administrator, cashless exercise, net exercise, as well as other types of consideration permitted by applicable law. After the termination of service of an employee, director or consultant, he or she may exercise his or her option for the period of time stated in his or her option agreement. In the absence of a specified time in an award agreement, if termination is due to death or disability, the option will remain exercisable for six months. In all other cases, in the absence of a specified time in an award agreement, the option will remain exercisable for 90 days following the termination of service. An option, however, may not be exercised later than the expiration of its term. Subject to the provisions of our Amended and Restated 2020 Plan, the administrator determines the terms of options.

Stock Appreciation Rights. Stock appreciation rights may be granted under our Amended and Restated 2020 Plan. Stock appreciation rights allow the recipient to receive the appreciation in the fair market value of our common stock between the exercise date and the date of grant. Stock appreciation rights may not have a term exceeding ten years. After the termination of service of an employee, director or consultant, he or she may exercise his or her stock appreciation right for the period of time stated in his or her stock appreciation rights agreement. In the absence of a specified time in an award agreement, if termination is due to death or disability, the stock appreciation rights will remain exercisable for six months. In all other cases, in the absence of a specified time in an award agreement, the stock appreciation rights will remain exercisable for 90 days following the termination of service. However, in no event may a stock appreciation right be exercised later than the expiration of its term. Subject to the provisions of our Amended and Restated 2020 Plan, the administrator determines the terms of stock appreciation rights, including when such rights become exercisable and whether to pay any increased appreciation in cash or with shares of our common stock, or a combination thereof, except that the per share exercise price for the shares to be issued pursuant to the exercise of a stock appreciation right will be no less than 100% of the fair market value per share on the date of grant.

Restricted Stock. Restricted stock may be granted under our Amended and Restated 2020 Plan. Restricted stock awards are grants of shares of our common stock that may vest in accordance with terms and conditions established by the administrator. The administrator will determine the number of shares of restricted stock granted to any employee, director or consultant and, subject to the provisions of our Amended and Restated 2020 Plan, will

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determine the terms and conditions of such awards. The administrator may impose whatever vesting conditions (if any) it determines to be appropriate (for example, the administrator may set restrictions based on the achievement of specific performance goals or continued service to us), except the administrator, in its sole discretion, may accelerate the time at which any restrictions will lapse or be removed. Recipients of restricted stock awards generally will have voting and dividend rights with respect to such shares upon grant, unless the administrator provides otherwise. Shares of restricted stock that do not vest are subject to our right of repurchase or forfeiture.

Restricted Stock Units. Restricted stock units may be granted under our Amended and Restated 2020 Plan. Restricted stock units are bookkeeping entries representing an amount equal to the fair market value of one share of our common stock. Subject to the provisions of our Amended and Restated 2020 Plan, the administrator determines the terms and conditions of restricted stock units, including any vesting criteria and the form and timing of payment. The administrator may set vesting criteria based upon the achievement of company-wide, divisional, business unit or individual goals (including, but not limited to, continued employment or service), applicable federal or state securities laws or any other basis determined by the administrator in its discretion. The administrator, in its sole discretion, may pay earned restricted stock units in the form of cash, in shares or in some combination thereof. Notwithstanding the foregoing, the administrator, in its sole discretion, may accelerate the time at which any restrictions will lapse or be removed.

Performance Units and Performance Shares. Performance units and performance shares may be granted under our Amended and Restated 2020 Plan. Performance units and performance shares are awards that will result in a payment to a participant if performance objectives established by the administrator are achieved or the awards otherwise vest. The administrator will establish performance objectives or other vesting criteria in its discretion, which, depending on the extent to which they are met, will determine the number and/or the value of performance units and performance shares to be paid out to participants. The administrator may set performance objectives based on the achievement of company-wide, divisional, business unit or individual goals (including, but not limited to, continued employment or service), applicable federal or state securities laws or any other basis determined by the administrator in its discretion. After the grant of a performance unit or performance share, the administrator, in its sole discretion, may reduce or waive any performance objectives or other vesting provisions for such performance units or performance shares. Performance units will have an initial dollar value established by the administrator on or prior to the grant date. Performance shares will have an initial value equal to the fair market value of our common stock on the grant date. The administrator, in its sole discretion, may pay out earned performance units or performance shares in cash, shares or in some combination thereof.

Outside Directors. All outside (non-employee) directors will be eligible to receive all types of awards (except for incentive stock options) under our Amended and Restated 2020 Plan. Prior to the completion of this offering, we intend to implement a formal policy pursuant to which our outside directors will be eligible to receive equity awards under our Amended and Restated 2020 Plan. In order to provide a maximum limit on the awards that can be made to our outside directors, our Amended and Restated 2020 Plan will provide that in any given fiscal year, an outside director will not be granted awards having a grant-date fair value greater than \$, but this limit is increased to \$ in connection with the outside director's initial service (in each case, excluding awards granted to the outside director as a consultant or employee). The grant-date fair values will be determined according to U.S. Generally Accepted Accounting Principles. The maximum limits do not reflect the intended size of any potential grants or a commitment to make grants to our outside directors under our Amended and Restated 2020 Plan in the future.

Non-Transferability of Awards. Unless the administrator provides otherwise, our Amended and Restated 2020 Plan generally does not allow for the transfer of awards other than by will or the laws of descent and distribution, and only the recipient of an award may exercise an award during his or her lifetime. If the administrator makes an award transferrable, such award will contain such additional terms and conditions as the administrator deems appropriate.

Certain Adjustments. In the event of certain changes in our capitalization, such as a dividend or other distribution, recapitalization, stock split, reverse stock split, reorganization, merger, consolidation, split-up, spin-off, combination, reclassification, repurchase or exchange of our shares or other securities or other change in our corporate structure affecting our shares (other than ordinary dividends or other ordinary distributions), to prevent diminution or enlargement of the benefits or potential benefits available under our Amended and Restated 2020 Plan, the administrator will adjust the number and class of shares that may be delivered under our Amended and Restated

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2020 Plan and/or the number, class and price of shares covered by each outstanding award and any numerical share limits set forth in our Amended and Restated 2020 Plan.

Dissolution or Liquidation. In the event of our proposed liquidation or dissolution, the administrator will notify participants as soon as practicable and all awards will terminate immediately prior to the consummation of such proposed transaction.

Merger or Change in Control. Our Amended and Restated 2020 Plan provides that in the event of a merger or change in control, as defined under our Amended and Restated 2020 Plan, each outstanding award will be treated as the administrator determines, without a participant's consent. The administrator may provide that awards granted under the Amended and Restated 2020 Plan will be assumed or substituted by substantially equivalent awards, be terminated immediately before the merger or change in control, become vested and exercisable or payable and be terminated in connection with the merger or change in control, be terminated in exchange for cash, other property or other consideration or any combination of the above. The administrator is not required to treat all awards, all awards held by a participant, all portions of awards, or all awards of the same type, similarly.

In the event that a successor corporation or its parent or subsidiary does not assume or substitute an equivalent award for any outstanding award (or a portion of such award), then such award (or its applicable portion) will fully vest, all restrictions on such award (or its applicable portion) will lapse, all performance goals or other vesting criteria applicable to such award (or its applicable portion) will be deemed achieved at 100% of target levels and such award (or its applicable portion) will become fully exercisable, if applicable, for a specified period prior to the transaction, unless specifically provided otherwise under the applicable award agreement or other written agreement with the participant. The award (or its applicable portion) will then terminate upon the expiration of the specified period of time. If an option or stock appreciation right is not assumed or substituted, the administrator will notify the participant in writing or electronically that such option or stock appreciation right will be exercisable for a period of time determined by the administrator in its sole discretion and the option or stock appreciation right will terminate upon the expiration of such period.

If an outside director's awards are assumed or substituted for in a merger or change in control and the service of such outside director is terminated (other than upon his or her voluntary resignation that does not include a resignation at the request of the acquirer) on or following the merger or change in control, all such awards will fully vest, all restrictions on such awards will lapse, all performance goals or other vesting criteria applicable to such awards will be deemed achieved at 100% of target levels and such awards will become fully exercisable, if applicable, unless specifically provided otherwise under the applicable award agreement or other written agreement with the outside director.

Clawback. Awards are subject to any clawback policy of ours, which we may establish and/or amend from time to time to comply with applicable laws. The administrator also may specify in an award agreement that the participant's rights, payments and benefits with respect to an award will be subject to reduction, cancellation, forfeiture or recoupment upon the occurrence of certain specified events. Our board of directors may require a participant to forfeit, return or reimburse us all or a portion of the award and any amounts paid under the award in order to comply with any clawback policy of ours or applicable laws.

Amendment; Termination. The administrator has the authority to amend, suspend or terminate our Amended and Restated 2020 Plan, provided such action does not materially impair the rights of any participant unless mutually agreed otherwise. Our Amended and Restated 2020 Plan will remain in effect until terminated in accordance with its terms.

401(k) Plan

We maintain a 401(k) retirement savings plan, or 401(k) plan, for the benefit of our employees, including our named executive officers, who satisfy certain eligibility requirements. Our 401(k) plan provides eligible employees with an opportunity to save for retirement on a tax-advantaged basis. Under our 401(k) plan, eligible employees may elect to defer a portion of their compensation, within the limits prescribed by the Code and the applicable limits under the 401(k) plan (generally, up to 90% of the employee's eligible compensation), on a pre-tax or after-tax (Roth) basis, through contributions to the 401(k) plan. All of a participant's contributions into the 401(k) plan are 100% vested

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when contributed. The 401(k) plan permits us to make matching contributions and profit-sharing contributions to eligible participants. The 401(k) plan is intended to qualify under Sections 401(a) and 501(a) of the Code. As a tax-qualified retirement plan, pre-tax contributions to the 401(k) plan and earnings on those pre-tax contributions are not taxable to the employees until distributed from the 401(k) plan, and earnings on Roth contributions are not taxable when distributed from the 401(k) plan.

Rule 10b5-1 Plan Sales

Our directors and executive officers may adopt written plans, known as Rule 10b5-1 plans, in which they will contract with a broker to buy or sell shares of our common stock on a periodic basis. Under a Rule 10b5-1 plan, a broker executes trades pursuant to parameters established by the director or executive officer when entering into the plan, without further direction from them. The director or executive officer may amend a Rule 10b5-1 plan in some circumstances and may terminate a plan at any time. Our directors and executive officers also may buy or sell additional shares outside of a Rule 10b5-1 plan when they are not in possession of material nonpublic information subject to compliance with the terms of our insider trading policy. Without the prior written consent of the representatives of the underwriters, prior to the day following the 180th day after the date of this offering, the sale of any shares under such plan would be subject to the lock-up agreement that the director or executive officer has entered into with the underwriters.

CERTAIN RELATIONSHIPS AND RELATED-PARTY TRANSACTIONS

The following is a description of certain relationships and transactions since January 2017 involving our directors, executive officers or beneficial holders of more than 5% of our capital stock. Compensation arrangements with our directors and officers are described in “Management—Director Compensation,” “Executive Compensation” and “Management.”

Prior to April 1, 2020, all of our beneficial holders were shareholders of our predecessor, ALX Oncology Limited. On April 1, 2020, we were incorporated in Delaware and completed a reorganization whereby ALX Oncology Limited became our wholly-owned subsidiary and all of the shareholders, warrant holders and option holders of ALX Oncology Limited became our stockholders, warrant holders and option holders, holding the same number of corresponding shares, warrants and/or options in us as they did in ALX Oncology Limited immediately prior to the reorganization.

The related-party transaction disclosures included below reflect transactions between ALX Oncology Limited and related parties from January 1, 2017 to March 31, 2020, the period prior to our incorporation and the effectiveness of the reorganization. For all other times, it includes transactions between us and related parties.

Reorganization Transaction

As described above, on April 1, 2020, we consummated a reorganization whereby we issued and sold to the existing shareholders of ALX Oncology Limited an aggregate of 20,840,532 shares of our common stock at purchase prices per share ranging from \$0.001 to \$0.29, an aggregate of 61,180,500 shares of our Series A convertible preferred stock at a purchase price per share of \$1.00, an aggregate of 6,690,729 shares of our Series B convertible preferred stock at a purchase price per share of \$1.4432 and an aggregate of 72,754,989 shares of our Series C convertible preferred stock at a purchase price per share of \$1.4432, in exchange for promissory notes with an aggregate principal amount of \$176.3 million. We also acquired 525,000,000 ordinary shares of ALX Oncology Limited in exchange for the promissory notes that were acquired in connection with such issuance and sale of our capital stock.

Purchasers of our shares of common stock, Series A convertible preferred stock, Series B convertible preferred stock and Series C convertible preferred stock include certain of our directors and executive officers and venture capital funds that beneficially own more than 5% of our outstanding capital stock and/or are represented on our board of directors. The following table presents the number of shares purchased and the total purchase price paid by these persons.

| INVESTOR | SHARES OF COMMON STOCK | TOTAL PURCHASE PRICE |
|---------------------------------|---------------------------|-------------------------|
| Sophia Randolph, M.D., Ph.D.(1) | 875,000 | \$ 131,250 |

(1) Dr. Randolph currently serves as our Chief Medical Officer.

| INVESTOR | SHARES OF SERIES A CONVERTIBLE PREFERRED STOCK | TOTAL PURCHASE PRICE |
|--|--|-------------------------|
| Entities affiliated with venBio Global Strategic Fund, LP(1) | 36,184,150 | \$ 36,184,150 |
| Entities affiliated with Lightstone Ventures, LP(2) | 16,976,504 | \$ 16,976,504 |
| Goodman Barinaga Trust(3) | 514,446 | \$ 514,446 |
| Jason Lettmann(4) | 514,446 | \$ 514,446 |

(1) Entities affiliated with venBio Global Strategic Fund, LP whose shares are aggregated for the purposes of reporting ownership information include venBio Global Strategic Fund LP and venBio Global Strategic Fund II L.P. Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners.

(2) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.

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- (3) Dr. Goodman, our Executive Chairman, is a trustee of the Goodman Barinaga Trust.
- (4) Mr. Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures.

| INVESTOR | SHARES OF SERIES B CONVERTIBLE | TOTAL PURCHASE |
|--|-----------------------------------|----------------|
| | PREFERRED STOCK | PRICE |
| Entities affiliated with venBio Global Strategic Fund, LP(1) | 3,227,201 | \$ 4,657,496 |
| Entities affiliated with Lightstone Ventures, LP(2) | 1,514,104 | \$ 2,185,155 |
| Goodman Barinaga Trust(3) | 103,935 | \$ 149,999 |

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- (1) Entities affiliated with venBio Global Strategic Fund, LP whose shares are aggregated for the purposes of reporting ownership information include venBio Global Strategic Fund LP and venBio Global Strategic Fund II L.P. Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners.
 - (2) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.
 - (3) Dr. Goodman, our Executive Chairman, is a trustee of the Goodman Barinaga Trust.

| INVESTOR | SHARES OF SERIES C CONVERTIBLE | TOTAL PURCHASE |
|--|-----------------------------------|----------------|
| | PREFERRED STOCK | PRICE |
| Emaldi Corporation(1) | 346,452 | \$ 500,000 |
| Entities affiliated with venBio Global Strategic Fund, LP(2) | 6,929,047 | \$ 10,000,001 |
| Entities affiliated with Lightstone Ventures, LP(3) | 5,654,798 | \$ 8,161,004 |
| Logos Opportunities Fund I, LP(4) | 13,858,093 | \$ 20,000,000 |
| Vivo Capital Fund IX, LP(5) | 20,787,140 | \$ 30,000,000 |

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- (1) Dr. Corey Goodman, our Executive Chairman, is a director of Emaldi Corporation.
 - (2) Entities affiliated with venBio Global Strategic Fund, LP whose shares are aggregated for the purposes of reporting ownership information include venBio Global Strategic Fund LP and venBio Global Strategic Fund II L.P. Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners.
 - (3) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.
 - (4) Dr. Graham Walmsley, a member of our board of directors, is a Founding Member and Managing Partner of Logos Capital.
 - (5) Jack Nielsen, a member of our board of directors, is a Managing Director of Vivo Capital.

Convertible Preferred Share Financings

Series C Convertible Preferred Shares Transaction

In February 2020, we issued and sold an aggregate of 72,754,989 shares of our Series C convertible preferred shares at a purchase price of \$1.4432 per share for an aggregate purchase price of approximately \$105.0 million.

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Purchasers of our Series C convertible preferred shares include venture capital funds that beneficially owned more than 5% of our outstanding share capital and/or are represented on our board of directors. The following table presents the number of shares and the total purchase price paid by these persons.

| INVESTOR | SERIES C CONVERTIBLE PREFERRED SHARES | TOTAL PURCHASE PRICE |
|--|--|---------------------------------|
| Emaldi Corporation(1) | 346,452 | \$ 500,000 |
| Entities affiliated with venBio Global Strategic Fund, LP(2) | 6,929,047 | \$ 10,000,001 |
| Entities affiliated with Lightstone Ventures, LP(3) | 5,654,798 | \$ 8,161,004 |
| Logos Opportunities Fund I, LP(4) | 13,858,093 | \$ 20,000,000 |
| Vivo Capital Fund IX, LP(5) | 20,787,140 | \$ 30,000,000 |

(1) Dr. Corey Goodman, our Executive Chairman, is a director of Emaldi Corporation.

(2) Entities affiliated with venBio Global Strategic Fund, LP whose shares are aggregated for the purposes of reporting ownership information include venBio Global Strategic Fund LP and venBio Global Strategic Fund II L.P. Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners.

(3) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.

(4) Dr. Graham Walmsley, a member of our board of directors, is a Founding Member and Managing Partner of Logos Capital.

(5) Jack Nielsen, a member of our board of directors, is a Managing Director of Vivo Capital.

Series B Convertible Preferred Shares Transaction

In May 2019, we issued and sold an aggregate of 6,690,729 shares of our Series B convertible preferred shares at a purchase price of \$1.4432 per share for an aggregate purchase price of approximately \$9.6 million.

Purchasers of our Series B convertible preferred shares include venture capital funds that beneficially owned more than 5% of our outstanding share capital and/or are represented on our board of directors. The following table presents the number of shares and the total purchase price paid by these persons.

| INVESTOR | SERIES B CONVERTIBLE PREFERRED SHARES | TOTAL PURCHASE PRICE |
|--|--|---------------------------------|
| Entities affiliated with venBio Global Strategic Fund, LP(1) | 3,227,201 | \$ 4,657,496 |
| Entities affiliated with Lightstone Ventures, LP(2) | 1,514,104 | \$ 2,185,155 |

(1) Entities affiliated with venBio Global Strategic Fund, LP whose shares are aggregated for the purposes of reporting ownership information include venBio Global Strategic Fund LP and venBio Global Strategic Fund II L.P. Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners. Dr. Robert Adelman previously served as a member of our board of directors and is a Managing Partner of venBio Partners.

(2) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Caroline Gaynor, a former member of our board of directors and after our reorganization continues to serve on the board of directors of ALX Oncology Limited, one of our subsidiaries, is a Vice President of Lightstone Ventures. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.

Convertible Promissory Notes Transaction

In March 2017, we entered into a convertible promissory note agreement with certain of our directors and venture capital funds that beneficially owned more than 5% of our outstanding share capital and/or are represented on our board of directors, pursuant to which we issued convertible promissory notes in an aggregate principal amount of approximately \$25.0 million. The convertible promissory notes bore interest at a rate of 2% per annum, had a maturity date of December 31, 2018 and were convertible into our Series A convertible preferred shares at a

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conversion price of \$1.00 per share. In September 2017, all of the convertible promissory notes were converted into our Series A convertible preferred shares.

Purchasers of our Series A convertible preferred shares include venture capital funds that beneficially own more than 5% of our outstanding share capital and/or are represented on its board of directors and are listed in the table below.

| INVESTOR | AGGREGATE PRINCIPAL AMOUNT |
|---|-----------------------------------|
| venBio Global Strategic Fund, II LP(1) | \$ 15,652,073 |
| Entities affiliated with Lightstone Ventures, LP(2) | \$ 6,750,000 |
| Corey Goodman, Ph.D.(1) | \$ 222,568 |
| Robert Adelman, M.D.(1) | \$ 222,568 |
| Jason Lettmann(3) | \$ 222,568 |

- (1) Dr. Corey Goodman, our Executive Chairman, is a Managing Partner of venBio Partners. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a venture partner of venBio Partners. Dr. Robert Adelman previously served as a member of our board of directors and is a Managing Partner of venBio Partners.
- (2) Entities affiliated with Lightstone Ventures, LP whose shares are aggregated for the purposes of reporting ownership information include Lightstone Ventures, LP, Lightstone Ventures (A), LP, Lightstone Ventures II, LP and Lightstone Ventures II (A), LP. Caroline Gaynor, a former member of our board of directors and after our reorganization continues to serve on the board of directors of ALX Oncology Limited, one of our subsidiaries, is a Vice President of Lightstone Ventures. Jason Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures. Dr. Jaume Pons, our Chief Executive Officer and a member of our board of directors, is a scientific advisor of Lightstone Ventures.
- (3) Mr. Lettmann, a member of our board of directors, is a General Partner of Lightstone Ventures.

Investors' Rights Agreement

We are party to an investors' rights agreement, as amended, with certain holders of our capital stock, including venBio, Lightstone Ventures, Vivo Capital and Logos Capital. Under our investors' rights agreement, certain holders of our capital stock have the right to demand that we file a registration statement or request that their shares of our capital stock be covered by a registration statement that we are otherwise filing. See the section titled "Description of Capital Stock—Registration Rights" for additional information regarding these registration rights.

venBio Consulting Agreement

In January 2017, Dr. Jaume Pons, our Chief Executive Officer and the Chief Executive Officer of ALX Oncology Limited, entered into a consulting agreement with venBio, one of our stockholders and an affiliate of one of our directors, Dr. Corey Goodman, to provide assistance with deal generation, evaluate potential investments and serve on boards of venBio's portfolio companies. In accordance with this agreement as compensation for services provided, venBio paid Dr. Pons approximately \$125,000 per year in 2017, 2018 and 2019. The consulting agreement remains in effect until terminated by either party with or without prior notice.

Tollnine Agreements

In May 2018, Dr. Jaume Pons, our Chief Executive Officer, and Dr. Hong Wan, our Chief Scientific Officer, each entered into a consulting agreement with Tollnine. Dr. Pons was engaged to provide management services, while Dr. Wan was engaged to provide scientific advisory services. In accordance with these agreements as compensation for their services, Tollnine issued Drs. Pons and Wan shares of its common stock. The consulting agreements will terminate automatically upon the later of completion of all projects under the consulting agreement or two years. In addition, Tollnine may terminate the agreements at any time without prior notice, and Drs. Pons and Wan may terminate their respective agreements upon 30 days' prior written notice if no services remain outstanding under the agreements.

Dr. Pons served as the Chief Executive Officer of Tollnine until April 2020, and Dr. Wan currently serves as the Chief Executive Officer of Tollnine.

In June 2018, we entered into the Tollnine Agreement to provide research and development services to Tollnine. The Tollnine Agreement, which was amended in May 2019, provides that Alexo Therapeutics Inc., our indirectly

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wholly-owned subsidiary, will provide certain research and development services to Tollnine for a service fee based on the costs incurred by the Company plus a mark-up. For the years ended December 31, 2018 and December 31, 2019, and for the three months ended March 31, 2019 and March 31, 2020, ALX Oncology Limited recognized related-party revenues of \$2.1 million and \$4.8 million, and \$1.0 million and \$0.7 million, respectively. As of December 31, 2018, December 31, 2019 and March 31, 2020, we had outstanding related-party receivables from Tollnine of \$0.9 million, \$0.5 million and \$1.2 million, respectively.

In addition, two of our current investors, venBio and Lightstone Ventures, who were also investors of ALX Oncology Limited prior to April 1, 2020, are also investors in Tollnine.

Indemnification Agreements

Our amended and restated certificate of incorporation, which will be in effect upon the completion of this offering, will contain provisions limiting the liability of the members of our board of directors, and our amended and restated bylaws, which will be in effect upon the completion of this offering, will provide that we will indemnify each of our officers and the members of our board of directors to the fullest extent permitted under Delaware law. Our amended and restated certificate of incorporation and amended and restated bylaws will also provide our board of directors with discretion to indemnify our employees and other agents when it determines to be appropriate. In addition, we have entered into or will enter into an indemnification agreement with each of our executive officers and the members of our board of directors requiring us to indemnify them. See the section titled “Executive Compensation—Limitation on Liability and Indemnification of Directors and Officers.”

Related-Party Transaction Policy

Our audit committee will have the primary responsibility for reviewing and approving or disapproving “related-party transactions,” which are transactions between us and related persons in which the aggregate amount involved exceeds or may be expected to exceed \$120,000 and in which a related person has or will have a direct or indirect material interest. The charter of our audit committee will provide that our audit committee shall review and approve in advance any related-party transaction.

Prior to the completion of this offering, we intend to adopt a formal written policy providing that we are not permitted to enter into any transaction that exceeds \$120,000 and in which any related person has a direct or indirect material interest without the consent of our audit committee. In approving or rejecting any such transaction, our audit committee is to consider the relevant facts and circumstances available and deemed relevant to our audit committee, including whether the transaction is on terms no less favorable than terms generally available to an unaffiliated third party under the same or similar circumstances and the extent of the related person's interest in the transaction.

PRINCIPAL STOCKHOLDERS

The following table sets forth the beneficial ownership of our common stock as of May 31, 2020 by:

- each person, or group of affiliated persons, who is known by us to beneficially own more than 5% of our common stock;
- each of the named executive officers;
- each of our directors; and
- all of our executive officers and directors as a group.

We have determined beneficial ownership in accordance with the rules of the SEC, and thus it represents sole or shared voting or investment power with respect to our securities. Unless otherwise indicated below, to our knowledge, the persons and entities named in the table have sole voting and sole investment power with respect to all shares that they beneficially owned, subject to community property laws where applicable. The information does not necessarily indicate beneficial ownership for any other purpose, including for purposes of Sections 13(d) and 13(g) of the Exchange Act.

We have based our calculation of the percentage of beneficial ownership prior to this offering on 161,466,750 shares of our common stock outstanding as of May 31, 2020, which includes 55,104 shares of common stock that are subject to a right of repurchase and 140,626,218 shares of our common stock resulting from the automatic conversion of all outstanding shares of our convertible preferred stock into our common stock upon the completion of this offering, as if this conversion had occurred as of May 31, 2020. We have based our calculation of the percentage of beneficial ownership after this offering on _____ shares of our common stock outstanding immediately after the completion of this offering, assuming no exercise by the underwriters of their option to purchase additional shares. We have deemed shares of our common stock subject to stock options that are currently exercisable or exercisable within 60 days of May 31, 2020, to be outstanding and to be beneficially owned by the person holding the stock option for the purpose of computing the percentage ownership of that person. We did not deem these shares outstanding, however, for the purpose of computing the percentage ownership of any other person.

Unless otherwise indicated, the address of each beneficial owner listed in the table below is c/o ALX Oncology Holdings Inc., 866 Malcolm Road, Suite 100, Burlingame, California 94010.

| NAME OF BENEFICIAL OWNER | NUMBER OF SHARES BENEFICIALLY OWNED | | PERCENTAGE OF SHARES BENEFICIALLY OWNED | |
|--|-------------------------------------|--------------------|---|--------------------|
| | BEFORE THE OFFERING | AFTER THE OFFERING | BEFORE THE OFFERING | AFTER THE OFFERING |
| 5% or Greater Stockholders: | | | | |
| Entities affiliated with venBio Partners(1) | 49,380,398 | | 30.6% | |
| Entities affiliated with Lightstone Ventures(2) | 24,145,406 | | 15.0 | |
| Vivo Capital Fund IX, L.P.(3) | 20,787,140 | | 12.9 | |
| Logos Opportunities Fund I, L.P.(4) | 13,858,093 | | 8.6 | |
| Named Executive Officers: | | | | |
| Jaume Pons, Ph.D.(5) | 9,344,685 | | 5.6 | |
| Sophia Randolph, M.D., Ph.D.(6) | 2,441,562 | | 1.5 | |
| Hong Wan, Ph.D.(7) | 2,550,781 | | 1.6 | |
| Non-Employee Directors: | | | | |
| Corey Goodman, Ph.D.(8) | 50,345,231 | | 31.2 | |
| Rekha Hemrajani | — | | * | |
| Jason Lettmann(9) | 24,729,142 | | 15.3 | |
| Jack Nielsen | — | | * | |
| Graham Walmsley, M.D., Ph.D.(10) | 13,858,093 | | 8.6 | |
| All executive officers and directors as a group (11 persons)(11) | 107,633,784 | | 61.6 | |

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* Represents beneficial ownership of less than one percent (1%) of the outstanding shares of our common stock.

- (1) Consists of (i) 25,940,398 shares held of record by venBio Global Strategic Fund II, L.P.; (ii) 20,401,000 shares held of record by venBio Global Strategic Fund, L.P.; and (iii) 3,039,000 shares held of record by venBio SPV, LLC. venBio Global Strategic GP II, L.P. (GS GP II LP) is the general partner of GSF II LP and venBio Global Strategic GP II, Ltd. (GS GP II Ltd) is the general partner of GS GP II LP. venBio Global Strategic GP, L.P. (GS GP LP) is the general partner of GSF LP and venBio Global Strategic GP, Ltd. (GS GP Ltd) is the general partner of GS GP LP. As the Directors of venBio Global GS GP II Ltd and GS GP Ltd and the Managing Directors of venBio SPV, LLC (SPV LLC), Robert Adelman and Corey Goodman, one of our directors, share voting and dispositive power with respect to the shares held of record by GSF II LP, GSF LP and SPV LLC. An additional 514,446 shares are held of record by Dr. Adelman. The address for these entities is c/o venBio Partners, LLC, 1700 Owens Street, Suite 595, San Francisco, California 94158.
- (2) Consists of (i) 12,049,278 shares held of record by Lightstone Ventures, LP (LV LP); (ii) 9,864,223 shares held of record by Lightstone Ventures II, LP (LV II LP); (iii) 1,642,746 shares held of record by Lightstone Ventures (A), LP (LV(A) LP); and (iv) 589,159 shares held of record by Lightstone Ventures II (A), LP (LV II(A) LP). LSV Associates, LLC (LSV Associates) is the General Partner of LV LP and LV(A) LP. As the individual general partners of LSV Associates, Michael A. Carusi, Jean M. George and Henry A. Plain Jr. share voting and dispositive power with respect to the shares held of record by LV LP and LV(A) LP. LSV Associates II, LLC (LSV Associates II) is the General Partner of LV II LP and LV II(A) LP. As the individual general partners of LSV Associates II, Michael A. Carusi, Jean M. George, Henry A. Plain Jr. and Jason W. Lettmann share voting and dispositive power with respect to the shares held of record by LV II LP and LV II(A) LP. The address for these entities is c/o LSV Capital Management, LLC, 2884 Sand Hill Road, Suite 121, Menlo Park, California 94025.
- (3) Consists of 20,787,140 shares held of record by Vivo Capital Fund IX, L.P. (VIVO IX LP). Vivo Capital IX, LLC (VIVO IX LLC) is the General Partner of VIVO IX LP. As the managing members of VIVO IX LLC, Frank Kung, Albert Cha, Edgar Engleman, Shan Fu and Chen Yu share voting and dispositive power with respect to the shares held of record by VIVO IX LP. The address for these entities is c/o Vivo Capital, 192 Lytton Avenue, Palo Alto, California 94301.
- (4) Consists of 13,858,093 shares held of record by Logos Opportunities Fund I, L.P. (Logos LP). Logos Opportunities GP, LLC (Logos GP) is the general partner of Logos Opportunities Fund I, L.P. (Logos LP). Arsani William and Graham Walmsley are the managing members of Logos GP and share voting and dispositive power with respect to the shares held of record by Logos Opportunities Fund I, LP. The address for these entities is c/o Logos Capital, 1 Letterman Drive, Building D, Suite D3-700, San Francisco, California 94129.
- (5) Consists of (i) 3,529,617 shares held of record by Dr. Pons and (ii) 5,815,068 shares issuable upon option exercise within 60 days of May 31, 2020, of which 1,989,280 are fully vested.
- (6) Consists of (i) 875,000 shares held of record by Dr. Randolph and (ii) 1,566,562 shares issuable upon option exercise within 60 days of May 31, 2020, of which 529,061 are fully vested.
- (7) Consists of (i) 142,044 shares held of record by the Kwauk and Wan Family Trust for which Dr. Wan serves as trustee; (ii) 860,000 shares held of record by Dr. Wan and (iii) 1,548,737 shares issuable upon option exercise within 60 days of May 31, 2020, of which 524,853 are fully vested.
- (8) Consists of (i) the shares disclosed in footnote (1) above which are held of record by entities affiliated with venBio Partners; (ii) 618,381 shares held of record by the Goodman Baringa Trust for which Dr. Goodman serves as trustee and (iii) 346,452 shares held of record by the Emaldi Corporation for which Dr. Goodman serves as a director.
- (9) Consists of (i) the shares disclosed in footnote (2) above which are held of record by entities affiliated with Lightstone Ventures and (ii) 583,736 shares held of record by Mr. Lettmann.
- (10) Consists of the shares disclosed in footnote (4) above which are held of record by Logos LP.
- (11) Consists of (i) 94,408,417 shares beneficially owned by our executive officers and directors and (ii) 13,225,367 shares issuable upon option exercise within 60 days of May 31, 2020, of which 3,503,455 are fully vested.

DESCRIPTION OF CAPITAL STOCK

The following descriptions of our capital stock and certain provisions of our amended and restated certificate of incorporation and amended and restated bylaws are summaries and are qualified by reference to the amended and restated certificate of incorporation and the amended and restated bylaws that will be in effect upon completion of this offering. Copies of these documents will be filed with the SEC as exhibits to our registration statement, of which this prospectus forms a part. The descriptions of the common stock and preferred stock reflect changes to our capital structure that will occur upon the completion of this offering.

Upon the completion of this offering and the filing of our amended and restated certificate of incorporation to be effective upon completion of this offering, our authorized capital stock will consist of _____ shares of common stock, par value \$0.001 per share, and _____ shares of convertible preferred stock, par value \$0.001 per share.

Upon the closing of this offering, all the outstanding shares of our convertible preferred stock will automatically convert into an aggregate of 140,626,218 shares of our common stock.

Based on 20,840,532 shares of common stock outstanding as of April 1, 2020 (including _____ shares of common stock that are subject to a right of repurchase), and after giving effect to the automatic conversion of all of our outstanding convertible preferred stock into an aggregate of 140,626,218 shares of common stock upon the completion of this offering and the issuance of _____ shares of common stock in this offering, there will be _____ shares of common stock outstanding upon the closing of this offering. As of April 1, 2020, we had 69 stockholders of record. As of April 1, 2020, there were 21,063,923 shares of common stock subject to outstanding options.

Common Stock

Voting Rights

Each holder of common stock is entitled to one vote for each share on all matters submitted to a vote of the stockholders, including the election of directors. Our certificate of incorporation and bylaws to be in effect upon the completion of this offering do not provide for cumulative voting rights. Because of this, the holders of a plurality of the shares of common stock entitled to vote in any election of directors can elect all of the directors standing for election, if they should so choose. With respect to matters other than the election of directors, at any meeting of the stockholders at which a quorum is present or represented, the affirmative vote of a majority of the voting power of the shares present in person or represented by proxy at such meeting and entitled to vote on the subject matter shall be the act of the stockholders, except as otherwise required by law. The holders of a majority of the stock issued and outstanding and entitled to vote, present in person or represented by proxy, shall constitute a quorum for the transaction of business at all meetings of the stockholders.

Dividends

Subject to preferences that may be applicable to any then-outstanding convertible preferred stock, holders of our common stock are entitled to receive dividends, if any, as may be declared from time to time by our board of directors out of legally available funds.

Liquidation

In the event of our liquidation, dissolution or winding up, holders of our common stock will be entitled to share ratably in the net assets legally available for distribution to stockholders after the payment of all of our debts and other liabilities and the satisfaction of any liquidation preference granted to the holders of any then-outstanding shares of convertible preferred stock.

Rights and Preferences

Holders of our common stock have no preemptive, conversion, subscription or other rights, and there are no redemption or sinking fund provisions applicable to our common stock. The rights, preferences and privileges of the holders of our common stock are subject to and may be adversely affected by the rights of the holders of shares of any series of our convertible preferred stock that we may designate in the future.

Fully Paid and Nonassessable

All of our outstanding shares of common stock are, and the shares of common stock to be issued in this offering, upon payment and delivery in accordance with the underwriting agreement, will be fully paid and nonassessable.

Preferred Stock

Upon the closing of this offering, our board of directors will have the authority, without further action by the stockholders, to issue up to shares of preferred stock in one or more series and to fix the rights, preferences, privileges and restrictions thereof. These rights, preferences and privileges could include dividend rights, conversion rights, voting rights, redemption rights, liquidation preferences, sinking fund terms and the number of shares constituting any series or the designation of such series, any or all of which may be greater than the rights of common stock. The issuance of preferred stock could adversely affect the voting power of holders of common stock and the likelihood that such holders will receive dividend payments and payments upon liquidation. In addition, the issuance of preferred stock could have the effect of delaying, deferring or preventing change in our control or other corporate action. Upon closing of this offering, no shares of preferred stock will be outstanding, and we have no present plan to issue any shares of preferred stock.

Options

As of April 1, 2020, we had outstanding options to purchase an aggregate of 21,063,923 shares of our common stock, with a weighted-average exercise price of \$0.47 per share, under our 2020 Plan. After April 1, 2020, we issued options to purchase an aggregate of _____ shares of our common stock, with a weighted-average exercise price of \$ _____ per share, under our 2020 Plan.

Warrants

As of April 1, 2020, we had outstanding warrants to purchase an aggregate of 403,348 shares of our Series B convertible preferred stock at \$1.4432 per share, pursuant to the Loan Agreement. Immediately prior to the completion of this offering, these warrants will be converted into warrants to purchase common stock.

Registration Rights

We are party to an amended and restated investors' rights agreement that provides that certain holders of our convertible preferred stock have certain registration rights as set forth below. The registration of shares of our common stock by the exercise of registration rights described below would enable the holders to sell these shares without restriction under the Securities Act when the applicable registration statement is declared effective. Generally, in an underwritten offering, the managing underwriter, if any, has the right, subject to specified conditions, to limit the number of shares such holders may include.

Demand Registration Rights

After this offering, the holders of an aggregate of 143,882,738 shares of our common stock will be entitled to certain demand registration rights. At any time beginning 180 days after the effective date of this offering and before the three-year anniversary of the date of the investors' rights agreement, the holders of at least 50% of the shares in the aggregate may request that we file a registration statement to register all or a portion of their shares. Such request for registration must cover at least 40% of the shares or shares with an anticipated aggregate public offering price, net of underwriting discounts and expenses, of at least \$15.0 million.

S-3 Registration Rights

After this offering, the holders of an aggregate of 143,882,738 shares of our common stock will be entitled to certain Form S-3 registration rights. At any time when we are eligible to file a registration statement on Form S-3, the holders of at least 10% of these shares can make a request that we register their shares on Form S-3 if such request covers shares with an anticipated aggregate public offering price, net of underwriting discounts and expenses, of at least \$1.0 million.

Piggyback Registration Rights

In connection with this offering, the holders of an aggregate of 143,882,738 shares of our common stock were entitled to, and the necessary percentage of holders waived, their rights to notice of this offering and to include their shares of registrable securities in this offering. After this offering, in the event that we propose to register any of our securities under the Securities Act, either for our own account or for the account of other security holders, the holders of these shares will be entitled to certain piggyback registration rights allowing the holder to include their shares in such registration, subject to certain marketing and other limitations. As a result, whenever we propose to file a registration statement under the Securities Act, the holders of these shares are entitled to notice of the

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registration and have the right to include their shares in the registration, subject to limitations that the underwriters may impose on the number of shares included in the offering.

Indemnification

Our amended and restated investors' rights agreement contains customary cross-indemnification provisions, under which we are obligated to indemnify holders of registrable securities in the event of material misstatements or omissions in the registration statement attributable to us, and they are obligated to indemnify us for material misstatements or omissions attributable to them.

Expenses of Registration

We will pay the registration expenses, other than underwriting discounts and commissions, of the shares registered by the demand, Form S-3 and piggyback registrations described above.

Termination of Registration Rights

The demand, Form S-3 and piggyback registration described above will expire upon the earliest of (1) the fifth anniversary after the closing of this offering, (2) a deemed liquidation event (as defined in our amended and restated certificate of incorporation, in effect prior to the completion of this offering) and (3) such time after the completion of this offering that such stockholder can sell all of its shares entitled to registration rights under Rule 144 of the Securities Act.

Anti-Takeover Effects of Certain Provisions of Delaware Law, Our Amended and Restated Certificate of Incorporation and Our Amended and Restated Bylaws

Certain provisions of Delaware law and certain provisions that will be included in our amended and restated certificate of incorporation and amended and restated bylaws summarized below may be deemed to have an anti-takeover effect and may delay, deter or prevent a tender offer or takeover attempt that a stockholder might consider to be in its best interests, including attempts that might result in a premium being paid over the market price for the shares held by stockholders.

Preferred Stock

Our amended and restated certificate of incorporation will contain provisions that permit our board of directors to issue, without any further vote or action by the stockholders, shares of preferred stock in one or more series and, with respect to each such series, to fix the number of shares constituting the series and the designation of the series, the voting rights (if any) of the shares of the series and the powers, preferences or relative, participation, optional and other special rights, if any, and any qualifications, limitations or restrictions, of the shares of such series.

Classified Board

Our amended and restated certificate of incorporation will provide that our board of directors is divided into three classes, designated Class I, Class II and Class III. Each class will be an equal number of directors, as nearly as possible, consisting of one-third of the total number of directors constituting the entire board of directors. The term of initial Class I directors shall terminate on the date of the 2021 annual meeting, the term of the initial Class II directors shall terminate on the date of the 2022 annual meeting, and the term of the initial Class III directors shall terminate on the date of the 2023 annual meeting. At each annual meeting of stockholders beginning in 2021, successors to the class of directors whose term expires at that annual meeting will be elected for a three-year term.

Removal of Directors

Our amended and restated certificate of incorporation will provide that stockholders may only remove a director for cause by a vote of no less than a majority of the shares present in person or by proxy at the meeting and entitled to vote.

Director Vacancies

Our amended and restated certificate of incorporation will authorize only our board of directors to fill vacant directorships.

No Cumulative Voting

Our amended and restated certificate of incorporation will provide that stockholders do not have the right to cumulate votes in the election of directors.

Special Meetings of Stockholders

Our amended and restated certificate of incorporation and amended and restated bylaws will provide that, except as otherwise required by law, special meetings of the stockholders may be called only by an officer at the request of a majority of our board of directors, by the Chair of our board of directors or by our Chief Executive Officer.

Advance Notice Procedures for Director Nominations

Our bylaws will provide that stockholders seeking to nominate candidates for election as directors at an annual or special meeting of stockholders must provide timely notice thereof in writing. To be timely, a stockholder's notice generally will have to be delivered to and received at our principal executive offices before notice of the meeting is issued by the secretary of the company, with such notice being served not less than 90 nor more than 120 days before the meeting. Although the amended and restated bylaws will not give the board of directors the power to approve or disapprove stockholder nominations of candidates to be elected at an annual meeting, the amended and restated bylaws may have the effect of precluding the conduct of certain business at a meeting if the proper procedures are not followed or may discourage or deter a potential acquirer from conducting a solicitation of proxies to elect its own slate of directors or otherwise attempting to obtain control of the company.

Action by Written Consent

Our amended and restated certificate of incorporation and amended and restated bylaws will provide that any action to be taken by the stockholders must be effected at a duly called annual or special meeting of stockholders and may not be effected by written consent.

Amending our Certificate of Incorporation and Bylaws

Our amended and restated certificate of incorporation may be amended or altered in any manner provided by the DGCL. Our amended and restated bylaws may be adopted, amended, altered or repealed by stockholders only upon approval of at least majority of the voting power of all the then outstanding shares of the common stock, except for any amendment of the above provisions, which would require the approval of a two-thirds majority of our then outstanding common stock. Additionally, our amended and restated certificate of incorporation will provide that our bylaws may be amended, altered or repealed by the board of directors.

Authorized but Unissued Shares

Our authorized but unissued shares of common stock and preferred stock will be available for future issuances without stockholder approval, except as required by the listing standards of Nasdaq, and could be utilized for a variety of corporate purposes, including future offerings to raise additional capital, acquisitions and employee benefit plans. The existence of authorized but unissued and unreserved common stock and preferred stock could render more difficult or discourage an attempt to obtain control of the company by means of a proxy contest, tender offer, merger or otherwise.

Exclusive Jurisdiction

Our amended and restated bylaws that will become effective upon the completion of this offering provide that, unless we consent to the selection of an alternative forum, the Court of Chancery of the State of Delaware shall be the sole and exclusive forum for any derivative action or proceeding brought on our behalf, any action asserting a claim of breach of fiduciary duty, any action asserting a claim arising pursuant to the DGCL, any action regarding our amended and restated certificate of incorporation or amended and restated bylaws, or any action asserting a claim against us that is governed by the internal affairs doctrine. This provision would not apply to suits brought to enforce a duty or liability created by the Exchange Act or any other claim for which the U.S. federal courts have exclusive jurisdiction. Our amended and restated bylaws further provide that the federal district courts of the United States will be the exclusive forum for resolving any complaint asserting a cause of action arising under the Securities Act. Any person or entity purchasing or otherwise acquiring any interest in our securities shall be deemed to have notice of and consented to these provisions. Although we believe these provisions benefit us by providing increased consistency in the application of law for the specified types of actions and proceedings, the provisions may have the effect of discouraging lawsuits against us or our directors and officers. For additional information, please also see the section titled "Risk Factors—Our amended and restated bylaws that will become effective upon the completion of this offering provide that the Court of Chancery of the State of Delaware and the federal district courts of the United States will be the exclusive forums for substantially all disputes between us and our stockholders, which could limit our stockholders' ability to obtain a favorable judicial forum for disputes with us or our directors, officers or employees."

Business Combinations with Interested Stockholders

We are governed by Section 203 of the DGCL. Subject to certain exceptions, Section 203 of the DGCL prohibits a public Delaware corporation from engaging in a business combination (as defined in such section) with an "interested stockholder" (defined generally as any person who beneficially owns 15% or more of the outstanding voting stock of such corporation or any person affiliated with such person) for a period of three years following the time that such stockholder became an interested stockholder, unless (i) prior to such time the board of directors of such corporation approved either the business combination or the transaction that resulted in the stockholder becoming an interested stockholder; (ii) upon consummation of the transaction that resulted in the stockholder becoming an interested stockholder, the interested stockholder owned at least 85% of the voting stock of such corporation at the time the transaction commenced (excluding for purposes of determining the voting stock of such corporation outstanding (but not the outstanding voting stock owned by the interested stockholder) those shares owned (A) by persons who are directors and also officers of such corporation and (B) by employee stock plans in which employee participants do not have the right to determine confidentially whether shares held subject to the plan will be tendered in a tender or exchange offer); or (iii) at or subsequent to such time the business combination is approved by the board of directors of such corporation and authorized at a meeting of stockholders (and not by written consent) by the affirmative vote of at least 66 2/3% of the outstanding voting stock of such corporation not owned by the interested stockholder.

Our amended and restated certificate of incorporation and our amended and restated bylaws will provide that we must indemnify our directors and officers to the fullest extent authorized by the DGCL. We are expressly authorized to, and do, carry directors' and officers' insurance providing coverage for our directors, officers and certain employees for some liabilities. We believe that these indemnification provisions and insurance are useful to attract and retain qualified directors and executive directors.

The limitation on liability and indemnification provisions in our certificate of incorporation and bylaws may discourage stockholders from bringing a lawsuit against directors for breach of their fiduciary duty. These provisions may also have the effect of reducing the likelihood of derivative litigation against directors and officers, even though such an action, if successful, might otherwise benefit us and our stockholders. In addition, your investment may be adversely affected to the extent we pay the costs of settlement and damage awards against directors and officers pursuant to these indemnification provisions.

Listing

We have applied to list our common stock on the Nasdaq Global Select Market under the symbol "ALXO."

Transfer Agent and Registrar

The transfer agent and registrar for our common stock is Computershare Trust Company, N.A. The transfer agent and registrar's address is 250 Royal Street, Canton, Massachusetts 02021.

SHARES ELIGIBLE FOR FUTURE SALE

Prior to this offering, there has been no public market for our common stock, and although we expect that our common stock will be approved for listing on Nasdaq, we cannot assure investors that there will be an active public market for our common stock following this offering. We cannot predict what effect, if any, sales of our shares in the public market or the availability of shares for sale will have on the market price of our common stock. Future sales of substantial amounts of common stock in the public market, including shares issued upon exercise of outstanding options, or the perception that such sales may occur, however, could adversely affect the market price of our common stock and also could adversely affect our future ability to raise capital through the sale of our common stock or other equity-related securities of ours at times and prices we believe appropriate.

Upon completion of this offering, based on our shares outstanding as of _____, 2020 and after giving effect to the automatic conversion of all outstanding shares of our convertible preferred stock, _____ shares of our common stock will be outstanding, or _____ shares of common stock if the underwriters exercise their option to purchase additional shares in full. All of the shares of common stock expected to be sold in this offering will be freely tradable without restriction or further registration under the Securities Act unless held by our "affiliates," as that term is defined in Rule 144 under the Securities Act. The remaining outstanding shares of our common stock will be deemed "restricted securities" as that term is defined under Rule 144. Restricted securities may be sold in the public market only if their offer and sale is registered under the Securities Act or if the offer and sale of those securities qualify for an exemption from registration, including exemptions provided by Rules 144 and 701 under the Securities Act, which are summarized below.

As a result of the lock-up agreements and market stand-off provisions described below and the provisions of Rules 144 or 701 and no exercise of the underwriters' option to purchase additional shares, the shares of our common stock that will be deemed "restricted securities" will be available for sale in the public market following the completion of this offering as follows:

- _____ shares will be eligible for sale on the date of this prospectus; and
- _____ shares will be eligible for sale upon expiration of the lock-up agreements and market stand-off provisions described below, beginning more than 180 days after the date of this prospectus.

Lock-Up Agreements and Market Stand-off Agreements

Our officers, directors and the holders of substantially all of our capital stock, options and warrants have entered into market stand-off agreements with us and have entered into or will enter into lock-up agreements with the underwriters, subject to certain exceptions, not to dispose of or hedge any of their common stock or securities convertible into or exchangeable for shares of common stock during the period from the date of this prospectus continuing through the date 180 days after the date of this prospectus, except with the prior consent of Jefferies LLC, Credit Suisse Securities (USA) LLC and Piper Sandler & Co. See the section titled "Underwriting" for additional information.

Rule 144

Rule 144, as currently in effect, generally provides that, once we have been subject to the public company reporting requirements of Section 13 or Section 15(d) of the Exchange Act for at least 90 days, a stockholder who is not deemed to have been one of our affiliates at any time during the preceding 90 days and who has beneficially owned the shares of our capital stock proposed to be sold for at least six months is entitled to sell such shares in reliance upon Rule 144 without complying with the volume limitation, manner of sale or notice conditions of Rule 144. If such stockholder has beneficially owned the shares of our capital stock proposed to be sold for at least one year, then such person is entitled to sell such shares in reliance upon Rule 144 without complying with any of the conditions of Rule 144.

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Rule 144 also provides that a stockholder who is deemed to have been one of our affiliates at any time during the preceding 90 days and who has beneficially owned the shares of our common stock proposed to be sold for at least six months is entitled to sell such shares in reliance upon Rule 144 within any three month period beginning 90 days after the date of this prospectus a number of shares that does not exceed the greater of the following:

- 1% of the number of shares of our capital stock then outstanding, which will equal shares immediately after the completion of this offering, assuming no exercise by the underwriters of their option to purchase additional shares (calculated as of _____, 2020); or
- the average weekly trading volume of our common stock during the four calendar weeks preceding the filing of a notice on Form 144 with respect to such sale.

Sales of our capital stock made in reliance upon Rule 144 by a stockholder who is deemed to have been one of our affiliates at any time during the preceding 90 days are also subject to the current public information, manner of sale and notice conditions of Rule 144.

Rule 701

Rule 701 generally provides that, once we have been subject to the public company reporting requirements of Section 13 or Section 15(d) of the Exchange Act for at least 90 days, a stockholder who purchased shares of our common stock pursuant to a written compensatory benefit plan or contract and who is not deemed to have been one of our affiliates at any time during the preceding 90 days may sell such shares in reliance upon Rule 144 without complying with the current public information or holding period conditions of Rule 144. Rule 701 also provides that a stockholder who purchased shares of our common stock pursuant to a written compensatory benefit plan or contract and who is deemed to have been one of our affiliates during the preceding 90 days may sell such shares under Rule 144 without complying with the holding period condition of Rule 144. However, all stockholders who purchased shares of our common stock pursuant to a written compensatory benefit plan or contract are required to wait until 90 days after the date of this prospectus before selling such shares pursuant to Rule 701.

Registration Rights

After the completion of this offering, the holders of up to 143,882,738 shares of our common stock will be entitled to certain rights with respect to the registration of such shares under the Securities Act. The registration of these shares of our common stock under the Securities Act would result in these shares becoming eligible for sale in the public market without restriction under the Securities Act immediately upon the effectiveness of such registration, subject to the Rule 144 limitations applicable to affiliates. See the section titled "Description of Capital Stock—Registration Rights" for a description of these registration rights.

Stock Plans

After the completion of this offering, we intend to file with the Securities and Exchange Commission a registration statement on Form S-8 under the Securities Act to register all of the shares of our common stock subject to equity awards outstanding or reserved for issuance under our equity compensation plans. Such registration statement is expected to be filed and become effective as soon as practicable after the completion of this offering. The shares of our common stock covered by such registration statement will be eligible for sale in the public market without restriction under the Securities Act immediately upon the effectiveness of such registration statement, subject to vesting restrictions, the conditions of Rule 144 applicable to affiliates and any applicable market stand-off agreements and lock-up agreements. See the section titled "Executive Compensation—Employee Benefit and Stock Plans" for a description of our equity compensation plans.

MATERIAL U.S. FEDERAL INCOME AND TAX CONSIDERATIONS FOR NON-U.S. HOLDERS OF OUR COMMON STOCK

The following is a summary of material U.S. federal income tax considerations of the ownership and disposition of our common stock acquired in this offering by a “non-U.S. holder” (as defined below) but does not purport to be a complete analysis of all the potential tax considerations relating thereto. This summary is based upon the provisions of the Code, Treasury Regulations promulgated thereunder and administrative rulings and judicial decisions, all as of the date hereof. These authorities may be changed, possibly retroactively, so as to result in U.S. federal income tax considerations different from those set forth below. We have not sought, and do not intend to seek, any ruling from the Internal Revenue Service, or the IRS, with respect to the statements made and the conclusions reached in the following summary, and there can be no assurance that the IRS or a court will agree with such statements and conclusions.

This summary also does not address the tax considerations arising under the laws of any non-U.S., state or local jurisdiction or under U.S. federal gift and estate tax rules, or the effect, if any, of the Medicare contribution tax on net investment income. In addition, this discussion does not address tax considerations applicable to an investor’s particular circumstances or to investors that may be subject to special tax rules, including, without limitation:

- banks, insurance companies, regulated investment companies, real estate investment trusts or other financial institutions;
- persons subject to the alternative minimum tax;
- tax-exempt organizations;
- pension plans and tax-qualified retirement plans;
- controlled foreign corporations, passive foreign investment companies and corporations that accumulate earnings to avoid U.S. federal income tax;
- entities or arrangements classified as partnerships for U.S. federal income tax purposes or other pass through entities such as subchapter S corporations (or investors in such entities or arrangements);
- brokers or dealers in securities or currencies;
- traders in securities that elect to use a mark-to-market method of accounting for their securities holdings;
- persons who own, or are deemed to own, more than five percent of our capital stock (except to the extent specifically set forth below);
- certain former citizens or long-term residents of the United States;
- persons who hold our common stock as a position in a hedging transaction, “straddle,” “conversion transaction,” or other risk reduction transaction;
- persons who hold or receive our common stock pursuant to the exercise of any option or otherwise as compensation;
- persons who do not hold our common stock as a capital asset within the meaning of Section 1221 of the Code (generally, property held for investment) or
- persons deemed to sell our common stock under the constructive sale provisions of the Code.

In addition, if a partnership (or other entity or arrangement classified as a partnership for U.S. federal income tax purposes) holds our common stock, the tax treatment of a partner in the partnership generally will depend on the status of the partner and upon the activities of the partnership. A partner in a partnership that will hold our common stock should consult his, her or its own tax advisor regarding the tax considerations of the purchase, ownership and disposition of our common stock through a partnership.

You are urged to consult your tax advisor with respect to the application of the U.S. federal income tax laws to your particular situation, as well as any tax considerations of the purchase, ownership and disposition of our common stock arising under the U.S. federal gift or estate tax rules or under the laws of any state, local, non-U.S. or other taxing jurisdiction or under any applicable tax treaty.

Non-U.S. Holder Defined

For purposes of this discussion, you are a “non-U.S. holder” if you are a beneficial owner of our common stock that, for U.S. federal income tax purposes, is neither a partnership nor:

- an individual who is a citizen or resident of the United States;
- a corporation or other entity taxable as a corporation created or organized in the United States or under the laws of the United States or any political subdivision thereof, or otherwise treated as such for U.S. federal income tax purposes;
- an estate whose income is subject to U.S. federal income tax regardless of its source; or
- a trust (x) whose administration is subject to the primary supervision of a U.S. court and that has one or more U.S. persons who have the authority to control all substantial decisions of the trust or (y) that has made a valid election under applicable Treasury Regulations to be treated as a U.S. person.

Distributions

As described in the section titled “Dividend Policy,” we have never declared or paid cash dividends on our common stock, and we do not anticipate paying any dividends on our common stock following the completion of this offering. However, if we do make distributions on our common stock, those payments will constitute dividends for U.S. federal income tax purposes to the extent paid from our current or accumulated earnings and profits, as determined under U.S. federal income tax principles. To the extent those distributions exceed both our current and our accumulated earnings and profits, the excess will constitute a return of capital and will first reduce your basis in our common stock, but not below zero, and then will be treated as gain from the sale of stock as described below under “—Gain on Disposition of Common Stock.”

Subject to the discussions below regarding effectively connected income, backup withholding and Foreign Account Tax Compliance Act, or FATCA, withholding, any dividend paid to you generally will be subject to U.S. federal withholding tax either at a rate of 30% of the gross amount of the dividend or such lower rate as may be specified by an applicable income tax treaty between the United States and your country of residence. In order to receive a reduced treaty rate, you must provide us or the applicable paying agent with an IRS Form W-8BEN or W-8BEN-E or other appropriate version of IRS Form W-8 certifying qualification for the reduced rate. We may withhold up to 30% of the gross amount of the entire distribution even if the amount constituting a dividend, as described above, is less than the gross amount to the extent provided for in the Treasury Regulations. A non-U.S. holder of shares of our common stock may obtain a refund of any excess amounts withheld by filing an appropriate claim for refund with the IRS. If the non-U.S. holder holds our common stock through a financial institution or other agent acting on the non-U.S. holder’s behalf, the non-U.S. holder will be required to provide appropriate documentation to the agent, which then will be required to provide certification to us or our paying agent, either directly or through other intermediaries.

Dividends received by you that are treated as effectively connected with your conduct of a U.S. trade or business (and, if required by an applicable income tax treaty, that are attributable to a permanent establishment or fixed base maintained by you in the United States) are generally exempt from the 30% U.S. federal withholding tax, subject to the discussions below regarding backup withholding and FATCA withholding. In order to obtain this exemption, you must provide us with a properly executed IRS Form W-8ECI or other applicable IRS Form W-8 properly certifying such exemption. Such effectively connected dividends, although not subject to U.S. federal withholding tax, generally are taxed at the same rates applicable to U.S. persons, net of certain deductions and credits. In addition, if you are a corporate non-U.S. holder, dividends you receive that are effectively connected with your conduct of a U.S. trade or business may also be subject to a branch profits tax at a rate of 30% or such lower rate as may be specified by an applicable income tax treaty between the United States and your country of residence. You should consult your tax advisor regarding the tax consequences of the ownership and disposition of our common stock, including the application of any applicable tax treaties that may provide for different rules.

Gain on Disposition of Common Stock

Subject to the discussions below regarding backup withholding and FATCA withholding, you generally will not be required to pay U.S. federal income tax on any gain realized upon the sale or other disposition of our common stock unless:

- the gain is effectively connected with your conduct of a U.S. trade or business (and, if an applicable income tax treaty so provides, the gain is attributable to a permanent establishment or fixed base maintained by you in the United States);
- you are an individual who is present in the United States for a period or periods aggregating 183 days or more during the calendar year in which the sale or disposition occurs and certain other conditions are met; or
- our common stock constitutes a U.S. real property interest by reason of our status as a “U.S. real property holding corporation,” or a USRPHC, for U.S. federal income tax purposes at any time within the shorter of the five-year period preceding your disposition of, or your holding period for, our common stock.

We believe that we are not currently and will not become a USRPHC for U.S. federal income tax purposes, and the remainder of this discussion so assumes. However, because the determination of whether we are a USRPHC depends on the fair market value of our U.S. real property interests relative to the fair market value of our U.S. and worldwide real property interests plus our other assets used or held for use in a trade or business, there can be no assurance that we will not become a USRPHC in the future. Even if we become a USRPHC, however, as long as our common stock is regularly traded on an established securities market, your common stock will be treated as U.S. real property interests only if you actually (directly or indirectly) or constructively hold more than five percent of such regularly traded common stock at any time during the shorter of the five-year period preceding your disposition of, or your holding period for, our common stock.

If you are a non-U.S. holder described in the first bullet above, you generally will be required to pay tax on the gain derived from the sale (net of certain deductions and credits) under regular U.S. federal income tax rates applicable to U.S. persons, and a corporate non-U.S. holder described in the first bullet above also may be subject to the branch profits tax at a 30% rate, or such lower rate as may be specified by an applicable income tax treaty. If you are an individual non-U.S. holder described in the second bullet above, you will be subject to tax at 30% (or such lower rate specified by an applicable income tax treaty) on the gain derived from the sale, which gain may be offset by U.S. source capital losses for the year, provided you have timely filed U.S. federal income tax returns with respect to such losses. You should consult your tax advisor regarding any applicable income tax or other treaties that may provide for different rules.

Backup Withholding and Information Reporting

Generally, we must report annually to the IRS the amount of dividends paid to you, your name and address and the amount of tax withheld, if any. A similar report will be sent to you. Pursuant to applicable income tax treaties or other agreements, the IRS may make these reports available to tax authorities in your country of residence.

Payments of dividends on or of proceeds from the disposition of our common stock made to you may be subject to backup withholding at the applicable statutory rate (currently, 24%) unless you establish an exemption, for example, by properly certifying your non-U.S. status on a properly completed IRS Form W-8BEN or W-8BEN-E or another appropriate version of IRS Form W-8. Notwithstanding the foregoing, backup withholding and information reporting may apply if either we or our paying agent has actual knowledge, or reason to know, that you are a U.S. person.

Backup withholding is not an additional tax; rather, the U.S. federal income tax liability of persons subject to backup withholding will be reduced by the amount of tax withheld. If withholding results in an overpayment of taxes, a refund or credit may generally be obtained from the IRS, provided that the required information is furnished to the IRS in a timely manner.

Additional Withholding Requirements under the Foreign Account Tax Compliance Act

Sections 1471 through 1474 of the Code and the Treasury Regulations and other official IRS guidance issued thereunder, or collectively FATCA, generally impose a U.S. federal withholding tax of 30% on dividends on, and the

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gross proceeds from a sale or other disposition of, our common stock, paid to a “foreign financial institution” (as specially defined under these rules), unless such institution enters into an agreement with the U.S. government to, among other things, withhold on certain payments and to collect and provide to the U.S. tax authorities substantial information regarding the U.S. account holders of such institution (which includes certain equity and debt holders of such institution, as well as certain account holders that are non-U.S. entities with U.S. owners) or otherwise establishes an exemption. FATCA also generally imposes a U.S. federal withholding tax of 30% on dividends on, and the gross proceeds from a sale or other disposition of, our common stock paid to a “non-financial foreign entity” (as specially defined under these rules) unless such entity provides the withholding agent with a certification identifying the substantial direct and indirect U.S. owners of the entity, certifies that it does not have any substantial U.S. owners, or otherwise establishes an exemption.

The withholding obligations under FATCA generally apply to dividends on our common stock and to the payment of gross proceeds of a sale or other disposition of our common stock. However, the U.S. Treasury Department has issued proposed regulations that, if finalized in their present form, would eliminate FATCA withholding on gross proceeds of the sale or other disposition of our common stock (but not on payments of dividends). The preamble of such proposed regulations state that they may be relied upon by taxpayers until final regulations are issued or until such proposed regulations are rescinded. The withholding tax will apply regardless of whether the payment otherwise would be exempt from withholding tax, including under the exemptions described above. Under certain circumstances, a non-U.S. holder might be eligible for refunds or credits of such taxes. An intergovernmental agreement between the United States and the non-U.S. holder’s country of residence may modify the requirements described in this section. Prospective investors should consult with their own tax advisors regarding the application of FATCA withholding to their investment in, and ownership and disposition of, our common stock.

The preceding discussion of U.S. federal income tax considerations is for general information only. It is not tax advice to investors in their particular circumstances. Each prospective investor should consult its own tax advisor regarding the particular U.S. federal, state and local and non-U.S. tax considerations of purchasing, owning and disposing of our common stock, including the consequences of any proposed change in applicable laws.

UNDERWRITING

Subject to the terms and conditions set forth in the underwriting agreement, dated _____, 2020, between us and Jefferies LLC, Credit Suisse Securities (USA) LLC, Piper Sandler & Co. and Cantor Fitzgerald & Co., as the representatives of the underwriters named below and the joint book-running managers of this offering, we have agreed to sell to the underwriters, and each of the underwriters has agreed, severally and not jointly, to purchase from us, the respective number of shares of common stock shown opposite its name below:

| <u>UNDERWRITER</u> | <u>NUMBER OF SHARES</u> |
|------------------------------------|-------------------------|
| Jefferies LLC | |
| Credit Suisse Securities (USA) LLC | |
| Piper Sandler & Co. | |
| Cantor Fitzgerald & Co. | |
| LifeSci Capital LLC | |
| Total | |

The underwriting agreement provides that the obligations of the several underwriters are subject to certain conditions precedent such as the receipt by the underwriters of officers' certificates and legal opinions and approval of certain legal matters by their counsel. The underwriting agreement provides that the underwriters will purchase all of the shares of common stock if any of them are purchased. If an underwriter defaults, the underwriting agreement provides that the purchase commitments of the non-defaulting underwriters may be increased or the underwriting agreement may be terminated. We have agreed to indemnify the underwriters and certain of their controlling persons against certain liabilities, including liabilities under the Securities Act, and to contribute to payments that the underwriters may be required to make in respect of those liabilities.

The underwriters have advised us that, following the completion of this offering, they currently intend to make a market in the common stock as permitted by applicable laws and regulations. However, the underwriters are not obligated to do so, and the underwriters may discontinue any market-making activities at any time without notice in their sole discretion. Accordingly, no assurance can be given as to the liquidity of the trading market for the common stock, that you will be able to sell any of the common stock held by you at a particular time or that the prices that you receive when you sell will be favorable.

The underwriters are offering the shares of common stock subject to their acceptance of the shares of common stock from us and subject to prior sale. The underwriters reserve the right to withdraw, cancel or modify offers to the public and to reject orders in whole or in part.

Commission and Expenses

The underwriters have advised us that they propose to offer the shares of common stock to the public at the initial public offering price set forth on the cover page of this prospectus and to certain dealers, which may include the underwriters, at that price less a concession not in excess of \$ _____ per share of common stock. The underwriters may allow, and certain dealers may reallow, a discount from the concession not in excess of \$ _____ per share of common stock to certain brokers and dealers. After the offering, the initial public offering price, concession and reallowance to dealers may be reduced by the representatives. No such reduction will change the amount of proceeds to be received by us as set forth on the cover page of this prospectus.

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The following table shows the public offering price, the underwriting discounts and commissions that we are to pay the underwriters and the proceeds, before expenses, to us in connection with this offering. Such amounts are shown assuming both no exercise and full exercise of the underwriters' option to purchase additional shares.

| | PER SHARE | | TOTAL | |
|---|--|---|--|---|
| | WITHOUT OPTION TO PURCHASE ADDITIONAL SHARES | WITH OPTION TO PURCHASE ADDITIONAL SHARES | WITHOUT OPTION TO PURCHASE ADDITIONAL SHARES | WITH OPTION TO PURCHASE ADDITIONAL SHARES |
| Public offering price | \$ | \$ | \$ | \$ |
| Underwriting discounts and commissions paid by us | \$ | \$ | \$ | \$ |
| Proceeds to us, before expenses | \$ | \$ | \$ | \$ |

We estimate expenses payable by us in connection with this offering, other than the underwriting discounts and commissions referred to above, will be approximately \$. We have also agreed to reimburse the underwriters for up to \$ for their Financial Industry Regulatory Authority, Inc., or FINRA, counsel fee. In accordance with FINRA Rule 5110, this reimbursed fee is deemed underwriting compensation for this offering.

Determination of Offering Price

Prior to this offering, there has not been a public market for our common stock. Consequently, the initial public offering price for our common stock will be determined by negotiations between us and the representatives. Among the factors to be considered in these negotiations will be prevailing market conditions, our financial information, market valuations of other companies that we and the underwriters believe to be comparable to us, estimates of our business potential, the present state of our development and other factors deemed relevant.

We offer no assurances that the initial public offering price will correspond to the price at which the common stock will trade in the public market subsequent to the offering or that an active trading market for the common stock will develop and continue after the offering.

Listing

We have applied to list our common stock on the Nasdaq Global Select Market under the symbol "ALXO."

Option to Purchase Additional Shares

We have granted to the underwriters an option, exercisable for 30 days from the date of this prospectus, to purchase, from time to time, in whole or in part, up to an aggregate of shares from us at the public offering price set forth on the cover page of this prospectus, less underwriting discounts and commissions. If the underwriters exercise this option, each underwriter will be obligated, subject to specified conditions, to purchase a number of additional shares proportionate to that underwriter's initial purchase commitment as indicated in the table above. This option may be exercised only if the underwriters sell more shares than the total number set forth on the cover page of this prospectus.

No Sales of Similar Securities

We, our officers, directors and holders of substantially all our outstanding capital stock have agreed, subject to specified exceptions, not to directly or indirectly:

- sell, offer to sell, contract to sell or lend any of our securities,
- effect any short sale, or establish or increase any "put equivalent position" (as defined in Rule 16a-1(h) under the Exchange Act) or liquidate or decrease any "call equivalent position" (as defined in Rule 16a-1(b) under the Exchange Act) of any of our securities,
- pledge, hypothecate or grant any security interest in any of our securities,

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- in any other way transfer or dispose of our securities,
- enter into any swap, hedge or similar arrangement or agreement that transfers, in whole or in part, the economic risk of ownership of any of our securities, regardless of whether any such transaction is to be settled in securities, in cash or otherwise,
- announce the offering of any of our securities,
- submit or file any registration statement under the Securities Act in respect of any of our securities,
- effect a reverse stock split, recapitalization, share consolidation, reclassification or similar transaction affecting our outstanding common stock or
- publicly announce an intention to do any of the foregoing for a period of 180 days after the date of this prospectus without the prior written consent of Jefferies LLC, Credit Suisse Securities (USA) LLC and Piper Sandler & Co.

This restriction terminates after the close of trading of the common stock on and including the 180th day after the date of this prospectus.

Jefferies LLC, Credit Suisse Securities (USA) LLC and Piper Sandler & Co. may, in their sole discretion and at any time or from time to time before the termination of the 180-day period, release all or any portion of the securities subject to lock-up agreements. There are no existing agreements between the underwriters and any of our shareholders who will execute a lock-up agreement, providing consent to the sale of shares prior to the expiration of the lock-up period.

Stabilization

The underwriters have advised us that they, pursuant to Regulation M under the Exchange Act, certain persons participating in the offering may engage in short sale transactions, stabilizing transactions, syndicate covering transactions or the imposition of penalty bids in connection with this offering. These activities may have the effect of stabilizing or maintaining the market price of the common stock at a level above that which might otherwise prevail in the open market. Establishing short sales positions may involve either "covered" short sales or "naked" short sales.

"Covered" short sales are sales made in an amount not greater than the underwriters' option to purchase additional shares of our common stock in this offering. The underwriters may close out any covered short position by either exercising their option to purchase additional shares of our common stock or purchasing shares of our common stock in the open market. In determining the source of shares to close out the covered short position, the underwriters will consider, among other things, the price of shares available for purchase in the open market as compared to the price at which they may purchase shares through the option to purchase additional shares.

"Naked" short sales are sales in excess of the option to purchase additional shares of our common stock. The underwriters must close out any naked short position by purchasing shares in the open market. A naked short position is more likely to be created if the underwriters are concerned that there may be downward pressure on the price of the shares of our common stock in the open market after pricing that could adversely affect investors who purchase in this offering.

A stabilizing bid is a bid for the purchase of shares of common stock on behalf of the underwriters for the purpose of fixing or maintaining the price of the common stock. A syndicate covering transaction is the bid for or the purchase of shares of common stock on behalf of the underwriters to reduce a short position incurred by the underwriters in connection with the offering. Similar to other purchase transactions, the underwriter's purchases to cover the syndicate short sales may have the effect of raising or maintaining the market price of our common stock or preventing or retarding a decline in the market price of our common stock. As a result, the price of our common stock may be higher than the price that might otherwise exist in the open market. A penalty bid is an arrangement permitting the underwriters to reclaim the selling concession otherwise accruing to a syndicate member in connection with the offering if the common stock originally sold by such syndicate member are purchased in a syndicate covering transaction and therefore have not been effectively placed by such syndicate member.

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Neither we, nor any of the underwriters make any representation or prediction as to the direction or magnitude of any effect that the transactions described above may have on the price of our common stock. The underwriters are not obligated to engage in these activities and, if commenced, any of the activities may be discontinued at any time.

The underwriters may also engage in passive market making transactions in our common stock on the Nasdaq Global Select Market in accordance with Rule 103 of Regulation M during a period before the commencement of offers or sales of shares of our common stock in this offering and extending through the completion of distribution. A passive market maker must display its bid at a price not in excess of the highest independent bid of that security. However, if all independent bids are lowered below the passive market maker's bid, that bid must then be lowered when specified purchase limits are exceeded.

Electronic Distribution

A prospectus in electronic format may be made available by e-mail or on the websites or through online services maintained by one or more of the underwriters or their affiliates. In those cases, prospective investors may view offering terms online and may be allowed to place orders online. The underwriters may agree with us to allocate a specific number of shares of common stock for sale to online brokerage account holders. Any such allocation for online distributions will be made by the underwriters on the same basis as other allocations. Other than the prospectus in electronic format, the information on the underwriters' websites and any information contained in any other website maintained by any of the underwriters is not part of this prospectus, has not been approved and/or endorsed by us or the underwriters and should not be relied upon by investors.

Other Activities and Relationships

The underwriters and certain of their affiliates are full service financial institutions engaged in various activities, which may include securities trading, commercial and investment banking, financial advisory, investment management, investment research, principal investment, hedging, financing and brokerage activities. The underwriters and certain of their affiliates have, from time to time, performed, and may in the future perform, various commercial and investment banking and financial advisory services for us and our affiliates, for which they received or will receive customary fees and expenses.

In the ordinary course of their various business activities, the underwriters and certain of their affiliates may make or hold a broad array of investments and actively trade debt and equity securities (or related derivative securities) and financial instruments (including bank loans) for their own account and for the accounts of their customers, and such investment and securities activities may involve securities and/or instruments issued by us and our affiliates. If the underwriters or their respective affiliates have a lending relationship with us, they routinely hedge their credit exposure to us consistent with their customary risk management policies. The underwriters and their respective affiliates may hedge such exposure by entering into transactions which consist of either the purchase of credit default swaps or the creation of short positions in our securities or the securities of our affiliates, including potentially the common stock offered hereby. Any such short positions could adversely affect future trading prices of the common stock offered hereby. The underwriters and certain of their respective affiliates may also communicate independent investment recommendations, market color or trading ideas and/or publish or express independent research views in respect of such securities or instruments and may at any time hold, or recommend to clients that they acquire, long and/or short positions in such securities and instruments.

Disclaimers About Non-U.S. Jurisdictions

European Economic Area and the United Kingdom

In relation to each Member State of the European Economic Area and the United Kingdom (each a “Relevant State”), no shares have been offered or will be offered pursuant to the offering to the public in that Relevant State prior to the publication of a prospectus in relation to the shares which has been approved by the competent authority in that Relevant State or, where appropriate, approved in another Relevant State and notified to the competent authority in that Relevant State, all in accordance with the Prospectus Regulation, except that offers of shares may be made to the public in that Relevant State at any time under the following exemptions under the Prospectus Regulation:

- to any legal entity which is a qualified investor as defined under the Prospectus Regulation;
- to fewer than 150 natural or legal persons (other than qualified investors as defined under the Prospectus Regulation), subject to obtaining the prior consent of the underwriters; or
- in any other circumstances falling within Article 1(4) of the Prospectus Regulation,

provided that no such offer of shares shall require us or any underwriter to publish a prospectus pursuant to Article 3 of the Prospectus Regulation or supplement a prospectus pursuant to Article 23 of the Prospectus Regulation and each person who initially acquires any shares or to whom any offer is made will be deemed to have represented, acknowledged and agreed to and with each of the underwriters and us that it is a “qualified investor” within the meaning of Article 2(e) of the Prospectus Regulation. In the case of any shares being offered to a financial intermediary as that term is used in the Prospectus Regulation, each such financial intermediary will be deemed to have represented, acknowledged and agreed that the shares acquired by it in the offer have not been acquired on a non-discretionary basis on behalf of, nor have they been acquired with a view to their offer or resale to, persons in circumstances which may give rise to an offer of any shares to the public other than their offer or resale in a Relevant State to qualified investors as so defined or in circumstances in which the prior consent of the underwriters have been obtained to each such proposed offer or resale.

For the purposes of this provision, the expression an “offer to the public” in relation to shares in any Relevant State means the communication in any form and by any means of sufficient information on the terms of the offer and any shares to be offered so as to enable an investor to decide to purchase or subscribe for any shares, and the expression “Prospectus Regulation” means Regulation (EU) 2017/1129.

United Kingdom

In addition, in the United Kingdom, this document is being distributed only to, and is directed only at, and any offer subsequently made may only be directed at persons who are “qualified investors” (as defined in the Prospectus Regulation) (i) who have professional experience in matters relating to investments falling within Article 19(5) of the Financial Services and Markets Act 2000 (Financial Promotion) Order 2005, as amended, or the Order, and/or (ii) who are high net worth companies (or persons to whom it may otherwise be lawfully communicated) falling within Article 49(2)(a) to (d) of the Order (all such persons together being referred to as “relevant persons”) or otherwise in circumstances which have not resulted and will not result in an offer to the public of the shares in the United Kingdom within the meaning of the Financial Services and Markets Act 2000.

Any person in the United Kingdom that is not a relevant person should not act or rely on the information included in this document or use it as basis for taking any action. In the United Kingdom, any investment or investment activity that this document relates to may be made or taken exclusively by relevant persons.

Canada

(A) Resale Restrictions

The distribution of shares of common stock in Canada is being made only in the provinces of Ontario, Quebec, Alberta and British Columbia on a private placement basis exempt from the requirement that we prepare and file a prospectus with the securities regulatory authorities in each province where trades of these securities are made. Any resale of the shares of our common stock in Canada must be made under applicable securities laws which may vary depending on the relevant jurisdiction, and which may require resales to be made under available statutory exemptions or under a discretionary exemption granted by the applicable Canadian securities regulatory authority. Purchasers are advised to seek legal advice prior to any resale of the shares of common stock.

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(B) Representations of Canadian Purchasers

By purchasing shares of our common stock in Canada and accepting delivery of a purchase confirmation, a purchaser is representing to us and the dealer from whom the purchase confirmation is received that:

- the purchaser is entitled under applicable provincial securities laws to purchase the shares of our common stock without the benefit of a prospectus qualified under those securities laws as it is an “accredited investor” as defined under National Instrument 45-106 – Prospectus Exemptions,
- the purchaser is a “permitted client” as defined in National Instrument 31-103—Registration Requirements, Exemptions and Ongoing Registrant Obligations,
- where required by law, the purchaser is purchasing as principal and not as agent and
- the purchaser has reviewed the text above under Resale Restrictions.

(C) Conflicts of Interest

Canadian purchasers are hereby notified that each of shares of our the underwriters are relying on the exemption set out in section 3A.3 or 3A.4, if applicable, of National Instrument 33-105 – Underwriting Conflicts from having to provide certain conflict of interest disclosure in this document.

(D) Statutory Rights of Action

Securities legislation in certain provinces or territories of Canada may provide a purchaser with remedies for rescission or damages if the prospectus (including any amendment thereto) such as this document contains a misrepresentation, provided that the remedies for rescission or damages are exercised by the purchaser within the time limit prescribed by the securities legislation of the purchaser’s province or territory. The purchaser of these securities in Canada should refer to any applicable provisions of the securities legislation of the purchaser’s province or territory for particulars of these rights or consult with a legal advisor.

(E) Enforcement of Legal Rights

All of our directors and officers as well as the experts named herein may be located outside of Canada and, as a result, it may not be possible for Canadian purchasers to effect service of process within Canada upon us or those persons. All or a substantial portion of our assets and the assets of those persons may be located outside of Canada and, as a result, it may not be possible to satisfy a judgment against us or those persons in Canada or to enforce a judgment obtained in Canadian courts against us or those persons outside of Canada.

(F) Taxation and Eligibility for Investment

Canadian purchasers of shares of common stock should consult their own legal and tax advisors with respect to the tax consequences of an investment in the shares of our common stock in their particular circumstances and about the eligibility of the shares of our common stock for investment by the purchaser under relevant Canadian legislation.

Australia

This prospectus is not a disclosure document for the purposes of Australia’s Corporations Act 2001 (Cth) of Australia, or Corporations Act, has not been lodged with the Australian Securities & Investments Commission and is only directed to the categories of exempt persons set out below. Accordingly, if you receive this prospectus in Australia:

You confirm and warrant that you are either:

- a “sophisticated investor” under section 708(8)(a) or (b) of the Corporations Act;
- a “sophisticated investor” under section 708(8)(c) or (d) of the Corporations Act and that you have provided an accountant’s certificate to the Company which complies with the requirements of section 708(8)(c)(i) or (ii) of the Corporations Act and related regulations before the offer has been made;
- a person associated with the Company under Section 708(12) of the Corporations Act; or
- a “professional investor” within the meaning of section 708(11)(a) or (b) of the Corporations Act.

To the extent that you are unable to confirm or warrant that you are an exempt sophisticated investor, associated person or professional investor under the Corporations Act any offer made to you under this prospectus is void and incapable of acceptance.

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You warrant and agree that you will not offer any of the securities issued to you pursuant to this prospectus for resale in Australia within 12 months of those securities being issued unless any such resale offer is exempt from the requirement to issue a disclosure document under section 708 of the Corporations Act.

Hong Kong

No shares of our common stock have been offered or sold, and no shares of our common stock may be offered or sold, in Hong Kong, by means of any document, other than to persons whose ordinary business is to buy or sell shares or debentures, whether as principal or agent; or to “professional investors” as defined in the Securities and Futures Ordinance (Cap. 571) of Hong Kong, or the SFO, and any rules made under that Ordinance; or in other circumstances which do not result in the document being a “prospectus” as defined in the Companies Ordinance (Cap. 32) of Hong Kong, or the CO, or which do not constitute an offer or invitation to the public for the purpose of the CO or the SFO. No document, invitation or advertisement relating to the shares of our common stock has been issued or may be issued or may be in the possession of any person for the purpose of issue (in each case whether in Hong Kong or elsewhere), which is directed at, or the contents of which are likely to be accessed or read by, the public of Hong Kong (except if permitted under the securities laws of Hong Kong) other than with respect to shares of our common stock which are or are intended to be disposed of only to persons outside Hong Kong or only to “professional investors” as defined in the SFO and any rules made under that Ordinance.

This prospectus has not been registered with the Registrar of Companies in Hong Kong. Accordingly, this prospectus may not be issued, circulated or distributed in Hong Kong, and the shares of our common stock may not be offered for subscription to members of the public in Hong Kong. Each person acquiring the shares of our common stock will be required, and is deemed by the acquisition of the shares of our common stock, to confirm that he is aware of the restriction on offers of the shares of our common stock described in this prospectus and the relevant offering documents and that he is not acquiring, and has not been offered any shares of our common stock in circumstances that contravene any such restrictions.

Israel

This document does not constitute a prospectus under the Israeli Securities Law, 5728-1968, or the Securities Law, and has not been filed with or approved by the Israel Securities Authority. In Israel, this prospectus is being distributed only to, and is directed only at, and any offer of shares is directed only at, (i) a limited number of persons in accordance with the Israeli Securities Law and (ii) investors listed in the first addendum, or the Addendum, to the Israeli Securities Law, consisting primarily of joint investment in trust funds, provident funds, insurance companies, banks, portfolio managers, investment advisors, members of the Tel Aviv Stock Exchange, underwriters, venture capital funds, entities with equity in excess of NIS 50 million and “qualified individuals,” each as defined in the Addendum (as it may be amended from time to time), collectively referred to as qualified investors (in each case, purchasing for their own account or, where permitted under the Addendum, for the accounts of their clients who are investors listed in the Addendum). Qualified investors are required to submit written confirmation that they fall within the scope of the Addendum, are aware of the meaning of same and agree to it.

Japan

The offering has not been and will not be registered under the Financial Instruments and Exchange Law of Japan (Law No. 25 of 1948 of Japan, as amended), or FIEL, and the underwriters will not offer or sell any securities, directly or indirectly, in Japan or to, or for the benefit of, any resident of Japan (which term as used herein means any person resident in Japan, including any corporation or other entity organized under the laws of Japan), or to others for re-offering or resale, directly or indirectly, in Japan or to, or for the benefit of, any resident of Japan, except pursuant to an exemption from the registration requirements of, and otherwise in compliance with, the FIEL and any other applicable laws, regulations and ministerial guidelines of Japan.

Singapore

This prospectus has not been and will not be lodged or registered as a prospectus with the Monetary Authority of Singapore. Accordingly, this prospectus and any other document or material in connection with the offer or sale, or invitation for subscription or purchase, of the common stock may not be circulated or distributed, nor may the common stock be offered or sold, or be made the subject of an invitation for subscription or purchase, whether directly or indirectly, to persons in Singapore other than (i) to an institutional investor under Section 274 of the Securities and Futures Act, Chapter 289 of Singapore, or the SFA, (ii) to a relevant person pursuant to Section 275(1), or any person pursuant to Section 275(1A), and in accordance with the conditions specified in

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Section 275, of the SFA, or (iii) otherwise pursuant to, and in accordance with the conditions of, any other applicable provision of the SFA.

Where the shares of our common stock are subscribed or purchased under Section 275 of the SFA by a relevant person which is:

- a corporation (which is not an accredited investor (as defined in Section 4A of the SFA)) the sole business of which is to hold investments and the entire share capital of which is owned by one or more individuals, each of whom is an accredited investor; or
- a trust (where the trustee is not an accredited investor) whose sole purpose is to hold investments and each beneficiary of the trust is an individual who is an accredited investor,

securities (as defined in Section 239(1) of the SFA) of that corporation or the beneficiaries' rights and interest (howsoever described) in that trust shall not be transferred within six months after that corporation or that trust has acquired the shares of our common stock pursuant to an offer made under Section 275 of the SFA except:

- to an institutional investor or to a relevant person defined in Section 275(2) of the SFA, or to any person arising from an offer referred to in Section 275(1A) or Section 276(4)(i)(B) of the SFA;
- where no consideration is or will be given for the transfer;
- where the transfer is by operation of law;
- as specified in Section 276(7) of the SFA; or
- as specified in Regulation 32 of the Securities and Futures (Offers of Investments) (Shares and Debentures) Regulations 2005 of Singapore.

Switzerland

The shares may not be publicly offered in Switzerland and will not be listed on the SIX Swiss Exchange, or the SIX, or on any other stock exchange or regulated trading facility in Switzerland. This prospectus has been prepared without regard to the disclosure standards for issuance prospectuses under art. 652a or art. 1156 of the Swiss Code of Obligations or the disclosure standards for listing prospectuses under art. 27 ff. of the SIX Listing Rules or the listing rules of any other stock exchange or regulated trading facility in Switzerland. Neither this prospectus nor any other offering or marketing material relating to the securities or the offering may be publicly distributed or otherwise made publicly available in Switzerland.

Neither this prospectus nor any other offering or marketing material relating to the offering, us or the securities have been or will be filed with or approved by any Swiss regulatory authority. In particular, this prospectus will not be filed with, and the offer of securities will not be supervised by, the Swiss Financial Market Supervisory Authority FINMA, and the offer of securities has not been and will not be authorized under the Swiss Federal Act on Collective Investment Schemes, or the CISA. The investor protection afforded to acquirers of interests in collective investment schemes under the CISA does not extend to acquirers of securities.

LEGAL MATTERS

The validity of the issuance of our common stock offered in this prospectus will be passed upon for us by Wilson Sonsini Goodrich & Rosati, Professional Corporation, Palo Alto, California. Cooley LLP, San Francisco, California, is representing the underwriters in connection with this offering.

EXPERTS

The consolidated financial statements of ALX Oncology Limited as of December 31, 2018 and 2019, and each of the years in the two-year period ended December 31, 2019, have been included herein and in the registration statement in reliance upon the report of KPMG LLP, independent registered public accounting firm, appearing elsewhere herein, and upon the authority of said firm as experts in accounting and auditing.

The financial statement of ALX Oncology Holdings Inc. as of April 1, 2020 (inception), has been included herein and in the registration statement in reliance upon the report of KPMG LLP, independent registered public accounting firm, appearing elsewhere herein, and upon the authority of said firm as experts in accounting and auditing.

WHERE YOU CAN FIND MORE INFORMATION

We have filed with the SEC a registration statement on Form S-1 under the Securities Act with respect to the shares of common stock offered by this prospectus. This prospectus, which constitutes a part of the registration statement, does not include all of the information contained in the registration statement, some of which is contained in exhibits to the registration statement as permitted by the rules and regulations of the SEC. You should refer to the registration statement and its exhibits for additional information. Whenever we make references in this prospectus to any of our contracts, agreements or other documents, such references are not necessarily complete and you should refer to the exhibits attached to the registration statement for copies of the actual contract, agreement or other document.

You can read our SEC filings, including the registration statement and its exhibits, over the Internet at the SEC's website at www.sec.gov.

When we complete this offering, we will be subject to the information reporting requirements of the Exchange Act, and we will file annual, quarterly and special reports, proxy statements and other information with the SEC. These reports, proxy statements and other information will be available at the website of the SEC referred to above. We also maintain a website at which you may access these materials free of charge as soon as reasonably practicable after they are electronically filed with, or furnished to, the SEC. The information contained on our website is not a part of this prospectus.

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ALX ONCOLOGY HOLDINGS INC.

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ALX ONCOLOGY LIMITED

Audited Consolidated Financial Statements

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ALX ONCOLOGY LIMITED

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REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Shareholders and Board of Directors
ALX Oncology Holdings Inc.:

Opinion on the Financial Statement

We have audited the accompanying balance sheet of ALX Oncology Holdings Inc. (the Company) as of April 1, 2020 (inception), and the related notes (collectively, the financial statement). In our opinion, the financial statement presents fairly, in all material respects, the financial position of the Company as of April 1, 2020 (inception), in conformity with U.S. generally accepted accounting principles.

Basis for Opinion

This financial statement is the responsibility of the Company's management. Our responsibility is to express an opinion on this financial statement based on our audit. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) (PCAOB) and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audit in accordance with the standards of the PCAOB and in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statement is free of material misstatement, whether due to error or fraud. Our audit included performing procedures to assess the risks of material misstatement of the financial statement, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the financial statement. Our audit also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the financial statement. We believe that our audit provides a reasonable basis for our opinion.

/s/ KPMG LLP

We have served as the Company's auditor since 2020.

San Francisco, California
June 12, 2020

ALX ONCOLOGY HOLDINGS INC.

Balance Sheet

| | APRIL 1, 2020 (INCEPTION) |
|---|---------------------------------|
| Assets | |
| Total assets | \$ — |
| Liabilities and stockholders' equity | |
| Total liabilities | \$ — |
| Commitments and contingencies | |
| Stockholders' equity: | |
| Common stock, \$0.001 par value, 1,000 shares authorized, none issued and outstanding | \$ — |
| Total liabilities and stockholders' equity | \$ — |

The accompanying notes are an integral part of this balance sheet.

ALX ONCOLOGY HOLDINGS INC.

Notes to Balance Sheet

1. Organization

ALX Oncology Holdings Inc., or the Company, was formed as a Delaware corporation on April 1, 2020, or Inception. The Company was formed for the purpose of completing the initial public offering and related transactions in order to carry on the business of ALX Oncology Limited. After Inception, ALX Oncology Limited became a wholly-owned subsidiary of the Corporation as result of the internal reorganization. As part of the transaction, all of the equity, option and warrant holders of ALX Oncology Limited became equity, option and warrant holders of the Company, holding the same number of corresponding shares, options and/or warrants in the Company as they did in ALX Oncology Limited immediately prior to the reorganization.

2. Summary of Significant Accounting Policies

Basis of Preparation

The balance sheet is presented in accordance with accounting principles generally accepted in the United States of America, or U.S. GAAP. The statements of operations and comprehensive loss, stockholders' equity, and cash flows have not been presented because there have been no activities at inception of this entity.

Underwriting Commissions and Offering Costs

Underwriting commissions and offering costs to be incurred in connection with the Company's common stock offerings will be reflected as a reduction in additional paid-in capital upon consummation of the equity financing.

Organizational Costs

Organizational costs for costs incurred to organize the Company will be expensed as incurred.

3. Stockholders' Equity

The Company is authorized to issue 1,000 shares of common stock at \$0.001 par value per share none of which are issued and outstanding as of inception on April 1, 2020.

4. Subsequent Events

Subsequent events through June 12, 2020, the date on which the balance sheet was available to be issued, were evaluated by the Company to determine the need, if any, for recognition or disclosure in this balance sheet. The Company concluded that no other subsequent events have occurred that would require recognition in this inception balance sheet.

On April 1, 2020 (subsequent to inception), the Company increased its authorized shares from 1,000 to 10,000,000,000 shares of common stock and 61,180,500 Series A convertible preferred stock 7,295,752 of Series B convertible preferred stock and 72,754,989 of Series C convertible preferred stock.

On April 1, 2020 (subsequent to inception), the board of directors approved a new equity incentive plan, or the 2020 Equity Incentive Plan or the Plan, that replaced the 2015 Share Award Scheme. The Plan is for employees, non-employee directors and consultants covering 28,817,368 shares of the Company's common stock and authorizes the award of stock options, restricted stock awards, stock appreciation rights and restricted stock units.

On April 1, 2020 (subsequent to inception), the Company consummated the internal reorganization whereby the Company issued and sold to the existing shareholders of ALX Oncology Limited an aggregate of 20,840,532 shares of our common stock at purchase prices per share ranging from \$0.001 to \$0.29, an aggregate of 61,180,500 shares of our Series A convertible preferred stock at a purchase price per share of \$1.00, an aggregate of 6,690,729 shares of our Series B convertible preferred stock at a purchase price per share of \$1.4432 and an aggregate of 72,754,989 shares of our Series C convertible preferred stock at a purchase price per share of \$1.4432, in exchange for promissory notes with an aggregate principal amount of \$176.3 million. The Company also acquired 525,000,000 ordinary shares of ALX Oncology Limited in exchange for the promissory notes that were acquired in connection with such issuance and sale of the Company's capital stock.

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

To the Shareholders and Board of Directors
ALX Oncology Limited

Opinion on the Consolidated Financial Statements

We have audited the accompanying consolidated balance sheets of ALX Oncology Limited and subsidiaries (the Company) as of December 31, 2018 and 2019, the related consolidated statements of operations and comprehensive loss, convertible preferred shares and shareholders' deficit, and cash flows for each of the years in the two-year period ended December 31, 2019, and the related notes (collectively, the consolidated financial statements). In our opinion, the consolidated financial statements present fairly, in all material respects, the financial position of the Company as of December 31, 2018 and 2019, and the results of its operations and its cash flows for each of the years in the two-year period ended December 31, 2019, in conformity with U.S. generally accepted accounting principles.

Basis for Opinion

These consolidated financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on these consolidated financial statements based on our audits. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) (PCAOB) and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB.

We conducted our audits in accordance with the standards of the PCAOB and in accordance with auditing standards generally accepted in the United States of America. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the consolidated financial statements are free of material misstatement, whether due to error or fraud. Our audits included performing procedures to assess the risks of material misstatement of the consolidated financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the consolidated financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the consolidated financial statements. We believe that our audits provide a reasonable basis for our opinion.

/s/ KPMG LLP

We have served as the Company's auditor since 2016.

San Francisco, California
May 5, 2020

ALX ONCOLOGY LIMITED
Consolidated Balance Sheets
(in thousands, except share and per share data)

| | DECEMBER 31, | | PRO FORMA SHAREHOLDERS' EQUITY AS OF DECEMBER 31, 2019 (Unaudited) |
|---|------------------|------------------|---|
| | 2018 | 2019 | |
| Assets | | | |
| Current assets: | | | |
| Cash | \$ 8,262 | \$ 9,017 | \$ |
| Receivables due from related-party | 932 | 536 | |
| Prepaid expenses and other current assets | 1,014 | 256 | |
| Total current assets | 10,208 | 9,809 | |
| Property and equipment, net | 956 | 860 | |
| Other assets | — | 7 | |
| Total assets | <u>\$ 11,164</u> | <u>\$ 10,676</u> | <u>\$</u> |
| Liabilities, convertible preferred shares and shareholders' deficit | | | |
| Current liabilities: | | | |
| Accounts payable | \$ 697 | \$ 3,748 | \$ |
| Accrued expenses and other current liabilities | 1,176 | 1,236 | |
| Total current liabilities | 1,873 | 4,984 | |
| Term loan | — | 5,421 | |
| Other long-term liabilities | — | 412 | |
| Deferred rent | 136 | 135 | |
| Total liabilities | 2,009 | 10,952 | |
| Commitments and contingencies (Note 8) | | | |
| Series A convertible preferred shares, \$0.001 par value; 62,000,000 shares authorized; 61,180,500 shares issued and outstanding at December 31, 2018 and 2019, respectively; aggregate liquidation preference of \$69,863 and \$73,571 as of December 31, 2018 and 2019, respectively; 0 shares authorized, issued and outstanding, pro forma (unaudited) | 60,933 | 60,933 | |
| Series B convertible preferred shares, \$0.001 par value; 14,117,822 shares authorized; 0 and 6,690,729 shares issued and outstanding at December 31, 2018 and 2019, respectively; aggregate liquidation preference of \$0 and \$10,014 as of December 31, 2018 and 2019, respectively; 0 shares authorized, issued and outstanding, pro forma (unaudited) | — | 9,430 | |
| Shareholders' equity (deficit): | | | |
| Ordinary shares, \$0.001 par value; 10,000,000,000 shares authorized; 20,806,306 and 20,840,532 shares issued and outstanding at December 31, 2018 and 2019, respectively; 10,000,000,000 shares authorized, 101,350,419 shares issued and outstanding, pro forma (unaudited) | 21 | 21 | 101 |
| Additional paid-in capital | 1,740 | 2,122 | 72,766 |
| Accumulated deficit | (53,539) | (72,782) | (72,782) |
| Total shareholders' equity (deficit) | (51,778) | (70,639) | 85 |
| Total liabilities, convertible preferred shares and shareholders' equity (deficit) | <u>\$ 11,164</u> | <u>\$ 10,676</u> | |

See accompanying notes to consolidated financial statements

ALX ONCOLOGY LIMITED
Consolidated Statements of Operations and Comprehensive Loss
(in thousands, except share and per share amounts)

| | YEAR ENDED DECEMBER 31, | |
|--|--------------------------------|-------------|
| | 2018 | 2019 |
| Related-party revenue | \$ 2,067 | \$ 4,796 |
| Operating expenses: | | |
| Research and development | 11,270 | 16,306 |
| General and administrative | 2,601 | 3,313 |
| Cost of services for related-party revenue | 1,880 | 4,360 |
| Total operating expenses | 15,751 | 23,979 |
| Loss from operations | (13,684) | (19,183) |
| Interest expense | — | (21) |
| Other income (expense), net | (2) | (5) |
| Loss before income taxes | (13,686) | (19,209) |
| Income tax provision | (45) | (34) |
| Net loss and comprehensive loss | (13,731) | (19,243) |
| Cumulative dividends allocated to preferred shareholders | (3,671) | (4,028) |
| Net loss attributable to ordinary shareholders | \$ (17,402) | \$ (23,271) |
| Net loss per share attributable to ordinary shareholders, basic and diluted | \$ (0.96) | \$ (1.15) |
| Weighted-average ordinary shares used to compute net loss per share attributable to ordinary shareholders, basic and diluted | 18,102,402 | 20,245,115 |
| Pro forma net loss attributable to ordinary shareholders per share, basic and diluted (unaudited) | | \$ (0.20) |
| Weighted-average ordinary shares used to compute pro forma net loss per share attributable to ordinary shareholders, basic and diluted (unaudited) | | 94,274,058 |

See accompanying notes to consolidated financial statements

ALX ONCOLOGY LIMITED
Consolidated Statements of Convertible Preferred Shares and Shareholders' Deficit
(in thousands, except share amounts)

| | CONVERTIBLE PREFERRED SHARES | | ORDINARY SHARES | | ADDITIONAL PAID-IN CAPITAL | ACCUMULATED DEFICIT | TOTAL SHAREHOLDERS' DEFICIT |
|---|---------------------------------|-----------|-----------------|--------|----------------------------------|------------------------|-----------------------------------|
| | SHARES | AMOUNT | SHARES | AMOUNT | | | |
| Balance as of December 31, 2017 | 61,180,500 | \$ 60,933 | 21,093,705 | \$ 21 | \$ 1,372 | \$ (39,808) | \$ (38,415) |
| Exercise of share options | — | — | 45,505 | — | 7 | — | 7 |
| Repurchase of ordinary shares | — | — | (287,500) | — | — | — | — |
| Vesting of early exercised share options | — | — | — | — | 92 | — | 92 |
| Repurchase of unvested early exercised share options | — | — | (45,404) | — | — | — | — |
| Share-based compensation | — | — | — | — | 269 | — | 269 |
| Net loss | — | — | — | — | — | (13,731) | (13,731) |
| Balance as of December 31, 2018 | 61,180,500 | 60,933 | 20,806,306 | 21 | 1,740 | (53,539) | (51,778) |
| Issuance of Series B convertible preferred shares, net of issuance costs of \$226 | 6,690,729 | 9,430 | — | — | — | — | — |
| Exercise of share options | — | — | 34,226 | — | 10 | — | 10 |
| Vesting of early exercised share options | — | — | — | — | 75 | — | 75 |
| Share-based compensation | — | — | — | — | 297 | — | 297 |
| Net loss | — | — | — | — | — | (19,243) | (19,243) |
| Balance as of December 31, 2019 | 67,871,229 | \$ 70,363 | 20,840,532 | \$ 21 | \$ 2,122 | \$ (72,782) | \$ (70,639) |

See accompanying notes to consolidated financial statements

ALX ONCOLOGY LIMITED
Consolidated Statements of Cash Flows
(in thousands)

| | YEAR ENDED DECEMBER 31, | |
|---|----------------------------|-------------------|
| | 2018 | 2019 |
| Operating activities | | |
| Net loss | \$(13,731) | \$(19,243) |
| Adjustments to reconcile net loss to net cash used in operating activities: | | |
| Depreciation and amortization expense | 431 | 429 |
| Share-based compensation expense | 269 | 297 |
| Amortization of term loan discount and issuance costs | — | 11 |
| Changes in operating assets and liabilities | | |
| Receivables due from related-party | (932) | 396 |
| Prepaid expenses and other current assets | 897 | 744 |
| Other assets | — | 7 |
| Accounts payable | (269) | 2,976 |
| Accrued expenses and other current liabilities | 9 | 134 |
| Deferred rent | 136 | — |
| Net cash used in operating activities | <u>\$(13,190)</u> | <u>\$(14,249)</u> |
| Investing activities | | |
| Purchase of property and equipment | (653) | (353) |
| Net cash used in investing activities | <u>(653)</u> | <u>(353)</u> |
| Financing activities | | |
| Proceeds from related parties for issuance of Series B convertible preferred shares, net of issuance costs of \$164 | — | 6,829 |
| Proceeds from issuance of Series B convertible preferred shares, net of issuance costs of \$62 | — | 2,601 |
| Proceeds from issuance of ordinary shares under equity incentive plan | 7 | 10 |
| Cash paid for repurchase of ordinary shares | (6) | — |
| Proceeds from issuance of term loan, net of issuance costs of \$83 | — | 5,917 |
| Net cash provided by financing activities | <u>1</u> | <u>15,357</u> |
| Net (decrease) increase in cash | <u>(13,842)</u> | <u>755</u> |
| Cash at beginning of year | 22,104 | 8,262 |
| Cash at end of year | <u>\$ 8,262</u> | <u>\$ 9,017</u> |
| Supplemental disclosure of non-cash investing and financing activities | | |
| Fair value of compound derivative liability and warrant liability related to term loan | <u>\$ —</u> | <u>\$ 412</u> |
| Vesting of early exercised share options | <u>\$ 92</u> | <u>\$ 75</u> |
| Acquisition of property and equipment in accounts payable | <u>\$ 20</u> | <u>\$ —</u> |
| Debt issuance costs in accounts payable | <u>\$ —</u> | <u>\$ 95</u> |

See accompanying notes to consolidated financial statements

(1) ORGANIZATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Organization

Alexo Therapeutics Limited, or the Company, was initially incorporated in Ireland on March 13, 2015 and changed its name to ALX Oncology Limited on October 11, 2018. The Company is a clinical-stage immuno-oncology company focused on helping patients fight cancer by developing therapies that block the CD47 checkpoint pathway and bridge the innate and adaptive immune system.

The Company owns a direct subsidiary, ALX Oncology Inc., incorporated in the United States, as well as a direct subsidiary incorporated in Malta, Alexo International Holdings Ltd. The Company also has two indirect subsidiaries, Alexo Therapeutics International, incorporated in the Cayman Islands, which is a wholly-owned subsidiary of Alexo International Holdings Ltd. and Sirpant Therapeutics, incorporated in the Cayman Islands, which is a wholly-owned subsidiary of Alexo Therapeutics International, collectively, the Subsidiaries.

The Company completed an internal reorganization transaction in April 2020, pursuant to which ALX Oncology Limited became a wholly-owned subsidiary of ALX Oncology Holdings Inc., a newly formed Delaware corporation. As part of the transaction, all of the equity, option and warrant holders of ALX Oncology Limited became equity, option and warrant holders of ALX Oncology Holdings Inc., holding the same number of corresponding shares, options and/or warrants in ALX Oncology Holdings Inc., as they did in the Company immediately prior to the reorganization (Note 13).

Basis of Preparation

These consolidated financial statements have been prepared in accordance with accounting principles generally accepted in the United States of America, or U.S. GAAP.

Principles of Consolidation

All intercompany balances and transactions have been eliminated in consolidation.

Unaudited Pro Forma Information

Immediately prior to the completion of this offering, all outstanding convertible preferred shares will automatically convert into ordinary shares. Unaudited pro forma balance sheet information as of December 31, 2019 assumes the conversion of all outstanding convertible preferred shares and cumulative undeclared dividends on the convertible preferred shares into 80,509,887 ordinary shares and the reclassification of warrant liability to additional paid-in capital in stockholders' equity. The ordinary shares issuable and the proceeds expected to be received in the initial public offering are excluded from such pro forma financial information. Unaudited pro forma basic and diluted net loss per share has been computed to give effect to the conversion of all outstanding convertible preferred shares and cumulative dividends on the convertible preferred shares into ordinary shares. The unaudited pro forma net loss per share does not include the shares expected to be sold and related proceeds to be received from the initial public offering.

Need for Additional Capital

Since commencing operations, none of the Company's product candidates have received marketing approval from the U.S. Food and Drug Administration, or FDA, or any other federal, state, local or foreign governmental or regulatory authority and therefore the Company has not generated any revenue from drug product sales. The Company had an accumulated deficit of \$72.8 million as of December 31, 2019 and management does not expect to experience positive cash flows in the foreseeable future. Based on management's current plans, management believes cash of \$9.0 million as of December 31, 2019, along with the \$105.0 million of gross proceeds from the issuance of Series C convertible preferred shares in February 2020 (Note 13), are sufficient to fund operations through at least one year from the date of the issuance of these consolidated financial statements.

Management expects to incur additional losses in the future to conduct product candidate research and development and to conduct pre-commercialization activities and recognizes the need to raise additional capital to fully implement its business plan. The Company intends to raise such capital through the sale of additional equity, debt financings or strategic alliances with third parties. However, there can be no assurance that the Company will be successful in acquiring additional funding at levels sufficient to fund its operations or on terms acceptable to the Company. If the Company is unsuccessful in its efforts to raise additional financing, the Company could be required to significantly reduce operating expenses and delay, reduce the scope of or

eliminate some of its development programs or its future commercialization efforts, out-license intellectual property rights to its product candidates and sell unsecured assets, or a combination of the above, any of which may have a material adverse effect on the Company's business, results of operations, financial condition and/or its ability to fund its scheduled obligations on a timely basis or at all.

Use of Estimates

The preparation of consolidated financial statements in conformity with U.S. GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the consolidated financial statements and the reported amounts of revenues and expenses during the reporting periods. On an ongoing basis, management evaluates its estimates, including those related to the estimated useful lives of long-lived assets, clinical trial accruals, fair value of assets and liabilities, Series B convertible preferred shares warrant liability, term loan compound derivative liability, term loan, valuation of ordinary shares, income taxes and share-based compensation. Management bases its estimates on historical experience and on various other market-specific and relevant assumptions that management believes to be reasonable under the circumstances. Actual results could differ from those estimates.

Cash

The Company holds its cash in checking and interest-bearing accounts.

Concentration of Credit Risk and Other Risks and Uncertainties

Financial instruments that potentially subject the Company to a concentration of credit risk consist primarily of cash. The Company maintains deposits in federally insured financial institutions in excess of federally insured limits. The Company is exposed to credit risk in the event of default by the financial institutions holding its cash. The Company has not experienced any losses on its deposits of cash.

The Company's future results of operations involve a number of other risks and uncertainties. Factors that could affect the Company's future operating results and cause actual results to vary materially from expectations include, but are not limited to, uncertainty of results of clinical trials and reaching milestones, uncertainty of regulatory approval of the Company's potential product candidates, uncertainty of market acceptance of the Company's product candidates, competition from substitute products and larger companies, securing and protecting proprietary technology, strategic relationships and dependence on key individuals or sole-source suppliers.

The Company's product candidates require approvals from the FDA and comparable foreign regulatory agencies prior to commercial sales in their respective jurisdictions. There can be no assurance that any product candidates will receive the necessary approvals. If the Company was denied approval, approval was delayed or the Company was unable to maintain approval for any product candidate, it could have a materially adverse impact on the Company.

Property and Equipment

Property and equipment are stated at cost less accumulated depreciation. Depreciation of property and equipment is provided using the straight-line method over the estimated useful lives of the assets (Note 3). Upon sale or retirement of assets, the cost and related accumulated depreciation or amortization are removed from the consolidated balance sheet and the resulting gain or loss is reflected in the consolidated statement of operations and comprehensive loss. Maintenance and repairs are charged to the consolidated statement of operations and comprehensive loss as incurred.

The useful lives of the property and equipment are as follows:

| | |
|------------------------------------|---|
| Research and development equipment | 5 years |
| Furniture and office equipment | 5 years |
| Computer equipment | 3 years |
| Software | 3 years |
| Leasehold improvements | Shorter of 7 years or remaining of lease term |

Impairment of Long-Lived Assets

The Company reviews property and equipment for impairment whenever events or changes in circumstances indicate that the carrying amount of an asset may not be recoverable. Recoverability is measured by comparison of the carrying amount to the future undiscounted net cash flows which the asset or asset group are expected to generate. If such assets are considered to be impaired, the impairment to be recognized is measured as the amount by which the carrying amount of the assets exceeds its fair value. Fair value is determined using various valuation techniques including discounted cash flow models, quoted market values and third-party independent appraisals, as considered necessary. There were no impairment charges recognized in the years ended December 31, 2018 and December 31, 2019.

Fair Value of Financial Instruments

The Company applies fair value accounting for all financial assets and liabilities and nonfinancial assets and liabilities that are required to be recognized or disclosed at fair value in the consolidated financial statements. The Company defines fair value as the price that would be received from selling an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. Where observable prices or inputs are not available valuation models are applied. These valuation techniques involve some level of management estimation and judgment, the degree of which is dependent on the price transparency for the instruments or market and the instruments' complexity.

The Company's financial instruments consist of cash, accounts receivable, accounts payable, the term loan compound derivative liability and the Series B convertible preferred shares warrant liability. The term loan compound derivative liability and the Series B convertible preferred shares warrant liability are re-measured at the end of every period and carried at fair value (Note 2). The recorded value of the Company's accounts receivable and accounts payable approximates its current fair value due to the relatively short-term nature of these items.

Term Loan

The Company accounts for the Loan and Security Agreement, dated as of December 20, 2019, with Silicon Valley Bank, and WestRiver Innovation Lending Fund VIII, LP, collectively as lenders, and Silicon Valley Bank, as administrative agent and collateral agent, as a liability measured at net proceeds less debt discount and is accreted to the face value of the term loan over its expected term using the effective interest method. The Company considers whether there are any embedded features in its debt instruments that require bifurcation and separate accounting as derivative financial instruments pursuant to Accounting Standards Codification, or ASC, Topic 815, *Derivatives and Hedging*.

Convertible Preferred Shares

The Company records convertible preferred shares net of issuance costs on the dates of issuance, which represents the carrying value. In the event of a change of control of the Company, proceeds will be distributed in accordance with the liquidation preferences set forth in its Constitution unless the holders of convertible preferred shares have converted their convertible preferred shares into ordinary shares. Convertible preferred shares are classified outside of shareholders' deficit on the accompanying consolidated balance sheets as events triggering the liquidation preferences are not solely within the Company's control. The Company has elected not to adjust the carrying values of the convertible preferred shares to the liquidation preferences of such shares because of the uncertainty of whether or when such an event would occur.

Series B Convertible Preferred Shares Warrant Liability

The Company has issued freestanding warrants to purchase its Series B convertible preferred shares. Freestanding warrants for the Company's convertible preferred shares that are classified outside of permanent equity are recorded at fair value, and are subject to re-measurement at each balance sheet date until the earlier of the exercise of the warrants or the completion of a liquidation event. Upon exercise, the Series B convertible preferred shares warrant liability would be reclassified to additional paid-in capital, with any change in fair value recognized as a component of other income (expense), net.

Revenue Recognition

To date, the Company has derived revenue from providing research and development services on a time and materials basis to a related-party. The Company recognizes such revenues over time as services are delivered, and invoices the customer as the work is incurred in arrears.

Effective January 1, 2018, the Company adopted ASC Topic 606, *Revenue from Contracts with Customers* (Topic 606) on a full retrospective basis. This standard applies to all contracts with customers, except for contracts that are within the scope of other standards, such as leases, insurance, collaboration arrangements and financial instruments. In accordance with Topic 606, the Company recognizes revenue when its customer obtains control of promised goods or services, in an amount that reflects the consideration which the Company expects to receive in exchange for those goods or services.

To determine revenue recognition for arrangements that the Company determines are within the scope of Topic 606, the Company performs the following five steps: (i) identify the contract(s) with a customer; (ii) identify the performance obligations in the contract; (iii) determine the transaction price; (iv) allocate the transaction price to the performance obligations in the contract; and (v) recognize revenue when (or as) the Company satisfies a performance obligation.

As part of the Company's consideration as to whether the Company has entered into a contract with a customer, it considers whether it is probable that it will collect the consideration it is entitled to in exchange for the goods and services it transfers to the customer. At contract inception, the Company assesses the goods or services promised within each contract that falls under the scope of Topic 606, determines those that are performance obligations, and assesses whether each promised good or service is distinct. The Company then recognizes as revenue the amount of the transaction price that is allocated based on their standalone selling price to the respective performance obligation when (or as) the performance obligation is satisfied.

Cost of Services for Related-Party Revenue

The Company incurs costs associated with related-party services including direct labor and associated employee benefits, laboratory supplies, and other expenses. These costs are recorded in cost of services for related-party revenue as a component of total operating expenses in the accompanying consolidated statements of operations and comprehensive loss.

Research and Development Costs

Research and development costs are expensed as incurred and consist primarily of salaries and benefits, share-based compensation expense, lab supplies and facility costs, as well as fees paid to nonemployees and entities that conduct certain research and development activities on behalf of the Company and expenses incurred in connection with license agreements (Note 9). Nonrefundable advance payments for goods or services to be received in the future for use in research and development activities are capitalized and recorded in prepaid expenses and other current assets, and then expensed as the related goods are delivered or the services are performed.

Clinical and Manufacturing Accruals

The Company records accruals for estimated costs of research, preclinical studies and clinical trials, and manufacturing development, which are a significant component of research and development expenses. A substantial portion of the Company's ongoing research and development activities are conducted by third-party service providers, including contract research organizations, or CROs, and contract manufacturing organizations, or CMOs. The Company's contracts with CROs generally include pass-through fees such as regulatory expenses, investigator fees, travel costs and other miscellaneous costs, including shipping and printing fees. The financial terms of these contracts are subject to negotiations, which vary from contract to contract and may result in payment flows that do not match the periods over which materials or services are provided to the Company under such contracts. The Company accrues the costs incurred under agreements with these third parties based on estimates of actual work completed in accordance with the respective agreements. The Company determines the estimated costs through discussions with internal personnel and external service providers as to the progress or stage of completion of the services and the agreed-upon fees to be paid for such services.

The Company makes significant judgments and estimates in determining the accrual balance at the end of each reporting period. As actual costs become known, the Company adjusts its accruals. Although the Company does not expect its estimates to be materially different from amounts actually incurred, the Company's understanding of the status and timing of services performed relative to the actual status and timing of services performed may vary and could result in the Company reporting amounts that are too high or too low in any particular period. To assist in its estimates the Company relies upon the receipt of timely and accurate reporting from information provided as part of its clinical and non-clinical studies and other third-party vendors. Through December 31, 2019, there have been no material differences from the Company's accrued estimated expenses to the actual clinical trial expenses. However, variations in the assumptions used to estimate accruals, including, but not limited to, the number of patients enrolled, the rate of patient enrollment, and the actual services performed, and related costs may vary from the Company's estimates, resulting in adjustments to clinical trial expense in future periods. Changes in these estimates that result in material changes to the Company's accruals could materially affect its financial position and results of operations.

Share-Based Compensation Expense

The Company accounts for share-based compensation by measuring and recognizing compensation expense for all share-based payments made to employees, directors and non-employees based on estimated grant-date fair values. The Company uses the straight-line method to allocate compensation expense to reporting periods over each optionee's requisite service period, which is generally the vesting period, and estimates the fair value of share-based awards to employees and directors using the Black-Scholes option-pricing model. The Black-Scholes model requires the input of subjective assumptions, including expected volatility, expected dividend yield, expected term, risk-free rate of return and the estimated fair value of the underlying ordinary shares on the date of grant. The Company accounts for the effect of forfeitures as they occur.

Segment Reporting

The Company manages its operations as a single operating segment for the purposes of assessing performance and making operating decisions. All of the Company's assets are maintained in the United States and Ireland.

Foreign Currency Transactions

The functional currency of the Company's operation and each of its subsidiaries is U.S. dollars. All assets and liabilities denominated in a foreign currency are translated into U.S. dollars at the exchange rate prevailing on the balance sheet date. Expenses are translated at the average exchange rates prevailing during the applicable period. Foreign currency transaction gains and losses are included in the consolidated statement of operations and comprehensive loss and recorded in other income (expense), net, and was immaterial for the years ended December 31, 2018 and December 31, 2019, respectively.

Income Taxes

The Company accounts for income taxes under the asset and liability method, which requires the recognition of deferred tax assets and liabilities for the expected future tax consequences of events that have been included in the consolidated financial statements. Under this method, deferred tax assets and liabilities are determined on the basis of the differences between the consolidated financial statement carrying amounts and tax bases of assets and liabilities using enacted tax rates in effect for the period in which the temporary differences are expected to reverse. The effect of a change in tax rates on deferred tax assets and liabilities is recognized in the consolidated statements of operations and comprehensive loss in the period that includes the enactment date.

The Company recognizes deferred tax assets to the extent that it believes these assets are more likely than not to be realized. In making such a determination, the Company considers all available positive and negative evidence, including future reversals of existing taxable temporary differences, projected future taxable income, tax-planning strategies and results of recent operations. If the Company determines that it would be able to realize its deferred tax assets in the future in excess of their net recorded amount, it would make an adjustment to the deferred tax asset valuation allowance, which would reduce the provision for income taxes.

The Company recognizes benefits of uncertain tax positions if it is more likely than not that such positions will be sustained upon examination based solely on their technical merits, as the largest amount of benefit that is

more likely than not to be realized upon the ultimate settlement. The Company's policy is to recognize interest and penalties related to the underpayment of income taxes as a component of income tax expense or benefit.

Net Loss Per Share Attributable to Ordinary Shareholders

Basic net loss per share is calculated by dividing the net loss attributable to ordinary shareholders by the weighted-average number of ordinary shares outstanding during the period, without consideration for ordinary share equivalents. Net loss attributable to ordinary shareholders is calculated by adjusting net loss of the Company for cumulative preferred share dividends. Diluted net loss per share is the same as basic net loss per share, since the effects of potentially dilutive securities are antidilutive given the net loss for each period presented.

The Company applies the two-class method to compute basic and diluted net loss per share when it has issued shares that meet the definition of participating securities. The two-class method determines net loss per share for each class of ordinary and participating securities according to dividends declared or accumulated and participation rights in undistributed earnings. The two-class method requires net loss available to ordinary shareholders for the period to be allocated between ordinary and participating securities based upon their respective rights to share in the earnings as if all net loss for the period had been distributed. The Company's convertible preferred shares participate in any dividends declared by the Company and are therefore considered to be participating securities. The participating securities are not required to participate in the losses of the Company, and therefore during periods of loss there is no allocation required under the two-class method.

Unaudited Pro Forma Net Loss Per Share Attributable to Ordinary Shareholders

In contemplation of an initial public offering, or IPO, the Company has presented unaudited pro forma basic and diluted net loss per share attributable to ordinary shareholders for the year ended December 31, 2019. Unaudited pro forma basic net loss per share attributable to ordinary shareholders as of December 31, 2019 is computed to give effect to adjustments to the denominator in the pro forma basic and diluted net loss per share calculation to reflect the conversion of all of the Company's outstanding convertible preferred shares and cumulative dividends into 74,028,943 ordinary shares, as if the conversion had occurred as of the beginning of the period or the original date of issuance, if later.

Unaudited pro forma diluted net loss attributable to ordinary shareholders is the same as unaudited pro forma basic net loss per share attributable to ordinary shareholders for the period as the impact of any potentially dilutive securities was anti-dilutive, which has been computed to give effect to the adjustment noted above. The pro forma net loss per share attributable to ordinary shareholders does not include proceeds to be received from nor does it include shares expected to be sold in the assumed IPO.

Recent Accounting Pronouncements

From time to time, new accounting pronouncements are issued by the Financial Accounting Standards Board, or FASB, or other standard setting bodies and adopted by the Company as of the specified effective date. Unless otherwise discussed, the impact of recently issued standards that are not yet effective will not have a material impact on the Company's financial position or results of operations upon adoption.

In February 2016, the FASB issued ASU No. 2016-02 (Topic 842), *Leases* (ASU 2016-02). ASU 2016-02 requires an entity to recognize assets and liabilities arising from a lease for both financing and operating leases. ASU No. 2016-02 will also require new qualitative and quantitative disclosures to help investors and other financial statement users better understand the amount, timing, and uncertainty of cash flows arising from leases. In November 2019, the FASB issued ASU No. 2019-10, which extends the effective date of ASU No. 2016-02 for non-public business entities, including smaller reporting companies, to fiscal years beginning after December 15, 2020. The new standard is effective for the Company beginning January 1, 2021. Early adoption is permitted. The Company is currently evaluating the effects of the adoption of this guidance on its consolidated financial statements and related disclosures.

In June 2016, the FASB issued ASU No. 2016-13, *Financial Instruments-Credit Losses* (Topic 326), which requires entities to measure all expected credit losses for financial assets held at the reporting date based on historical experience, current conditions, and reasonable and supportable forecasts. This replaces the existing

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incurred loss model and is applicable to the measurement of credit losses on financial assets measured at amortized cost. In February 2020, the FASB issued ASU No. 2020-02 and delayed the effective date of Topic 326 until fiscal year beginning after December 15, 2022. The new standard is effective for the Company beginning January 1, 2023. Early adoption is permitted. The Company is currently evaluating the effects of the adoption of this guidance on its consolidated financial statements and related disclosures.

In December 2019, the FASB issued ASU No. 2019-12, *Income Taxes (Topic 740): Simplifying the Accounting for Income Taxes*, which is intended to simplify various aspects related to accounting for income taxes. The pronouncement is effective for fiscal years, and for interim periods within those fiscal years, beginning after December 15, 2021. ASU 2019-12 is effective for the Company beginning January 1, 2022. Early adoption is permitted. The Company is currently in the process of evaluating the effects of the adoption of this guidance on the Company's financial statements and does not expect it to have a material impact on its consolidated financial statements.

New Accounting Pronouncements Recently Adopted

In November 2016, the FASB issued ASU No. 2016-18, *Statement of Cash Flows (Topic 230): Restricted Cash*, which requires that restricted cash and cash equivalents be included as components of total cash and cash equivalents as presented on the statement of cash flows. ASU 2016-18 was effective for fiscal years beginning after December 15, 2018, and a retrospective transition method is required. The Company adopted this guidance on January 1, 2019. The adoption of this guidance did not have a material impact on the Company's consolidated financial statements.

In July 2017, the FASB issued ASU No. 2017-11, *Earnings Per Share (Topic 260); Distinguishing Liabilities from Equity (Topic 480): Accounting for Certain Financial Instruments with Down Round Features*. ASU No. 2017-11 provides guidance that eliminates the requirement to consider "down round" features when determining whether certain financial instruments or embedded features are indexed to an entity's stock and need to be classified as liabilities. ASU 2017-11 provides for entities to recognize the effect of a down round feature only when it is triggered and then as a dividend and a reduction to income available to common stockholders in basic earnings per share. The Company adopted this guidance on January 1, 2019. The adoption of this guidance did not have a material impact on the Company's consolidated financial statements.

(2) FAIR VALUE OF FINANCIAL INSTRUMENTS

The fair value of the Company's financial assets and liabilities are determined in accordance with the fair value hierarchy established in ASC Topic 820, *Fair Value Measurements and Disclosures*. ASC Topic 820 defines fair value as the exchange price that would be received for an asset or paid to transfer a liability (an exit price) in the principal or most advantageous market for the asset or liability in an orderly transaction between market participants on the measurement date. The fair value hierarchy of ASC Topic 820 requires an entity to maximize the use of observable inputs when measuring fair value and classifies those inputs into three levels:

Level 1— Observable inputs, such as quoted prices in active markets

Level 2— Inputs, other than the quoted prices in active markets, which are observable either directly or indirectly such as quoted prices for similar assets or liabilities; quoted prices in markets that are not active; or other inputs that are observable or can be corroborated by observable market data for substantially the full term of the instrument's anticipated life

Level 3— Unobservable inputs in which there is little or no market data, which require the reporting entity to develop its own assumptions

The Company measures its Series B convertible preferred shares warrant liability and term loan compound derivative liability at fair value on a recurring basis and these are classified as Level 3 liabilities. The fair value of the Series B preferred shares warrant liability was determined using an option-pricing model. The Company calculated the fair value of the term loan compound derivative liability by computing the difference between the fair value of the term loan with the compound derivative using the "with and without" method under the income

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approach, and the fair value of the term loan without the compound derivative. The valuation methodology and underlying assumptions are discussed further in Note 4.

The following table sets forth the Company's financial liabilities that are measured at fair value on a recurring basis by level within the fair value hierarchy (in thousands):

| | AS OF DECEMBER 31, 2019 | | | |
|-------------------------------|-------------------------|---------|---------|------------|
| | LEVEL 1 | LEVEL 2 | LEVEL 3 | FAIR VALUE |
| Financial liabilities | | | | |
| <u>Long term liabilities</u> | | | | |
| Compound derivative liability | \$ — | — | 51 | \$ 51 |
| Warrant liability | \$ — | — | 361 | \$ 361 |

The following tables are a reconciliation of all financial liabilities measured at fair value using Level 3 unobservable inputs (in thousands):

| | WARRANT LIABILITY | COMPOUND DERIVATIVE LIABILITY |
|---------------------------------|----------------------|-------------------------------------|
| Balance as of December 31, 2018 | \$ — | \$ — |
| Additions | 361 | 51 |
| Change in market value | — | — |
| Balance as of December 31, 2019 | <u>\$ 361</u> | <u>\$ 51</u> |

The Company did not have any outstanding financial liabilities to be re-measured on a recurring basis as of December 31, 2018. There were no transfers of assets or liabilities between the fair value measurement levels during the years ended December 31, 2018 and December 31, 2019.

Term Loan

The estimated fair value of the Term Loan was \$5.7 million as of December 31, 2019 which approximates the carrying value and is classified as Level 3. The Company utilized a market yield analysis and income approach to estimate a value for the Term Loan. The key valuation assumptions used consist of the discount rate of 14.5% and the probability of the occurrence of a change in control event of 10.0%.

(3) BALANCE SHEET COMPONENTS**Property and Equipment, Net**

The following table presents the components of property and equipment, net as of December 31, 2018 and December 31, 2019 (in thousands):

| | DECEMBER 31, | |
|---|---------------|---------------|
| | 2018 | 2019 |
| Computer hardware and software | \$ 117 | \$ 146 |
| Machinery and equipment | 1,374 | 1,698 |
| Furniture and fixtures | 36 | 36 |
| Leasehold improvements | 429 | 429 |
| Construction in progress | 20 | — |
| | 1,976 | 2,309 |
| Less: accumulated depreciation and amortization | (1,020) | (1,449) |
| Total property and equipment, net | <u>\$ 956</u> | <u>\$ 860</u> |

Depreciation and amortization expense was approximately \$0.4 million for both years ended December 31, 2018 and December 31, 2019.

Accrued Expenses and Other Current Liabilities

The following table presents the components of accrued expenses and other current liabilities as of December 31, 2018 and December 31, 2019 (in thousands):

| | DECEMBER 31, | |
|--|----------------|----------------|
| | 2018 | 2019 |
| Payroll and related liabilities | \$ 62 | \$ 60 |
| Accrued bonus | 745 | 864 |
| Accrued legal costs | 98 | 122 |
| Early exercise liability | 105 | 27 |
| Other | 166 | 163 |
| Total accrued expenses and other current liabilities | <u>\$1,176</u> | <u>\$1,236</u> |

(4) TERM LOAN

The Company and its wholly-owned subsidiaries Alexo Therapeutics International and Sirpant Therapeutics, as borrowers, entered into a Loan and Security Agreement, or the Loan Agreement, dated as of December 20, 2019, with Silicon Valley Bank, or SVB, and WestRiver Innovation Lending Fund VIII, LP, or WestRiver, collectively as lenders, and SVB, as administrative agent and collateral agent. The Loan Agreement provides for term loans in an aggregate principal amount of up to \$10.0 million funded in two tranches, subject to the satisfaction of a certain milestone. The first tranche, in the amount of \$6.0 million, was funded on the closing date of the Loan Agreement in December 2019. A second tranche of \$4.0 million was available on or before March 31, 2020, upon the Company's achievement of an equity financing resulting in net cash proceeds in an amount of at least \$30.0 million to the Company. The Company elected not to draw down on the second tranche, which is no longer available.

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The loans under the Loan Agreement bear interest at a floating per annum interest rate equal to the greater of 7.0% or 2.0% plus the prime rate as reported in The Wall Street Journal. The Wall Street Journal prime rate was 4.75% as of December 31, 2019. Therefore, the rate applicable to the Company as of December 31, 2019 was 7.0%.

The Company is required to make interest-only payments for the first 12 months after the closing of the Loan Agreement, followed by consecutive equal monthly payments of principal and interest commencing on January 1, 2021 and continuing through the maturity date of September 1, 2022. The Loan Agreement also provides for a final payment equal to 6.0% multiplied by the aggregate principal amount of the term loans funded, which is due on the maturity date, upon the acceleration of the term loans, or upon prepayment of the term loans. If the Company elects to prepay the term loans, there is also a prepayment fee of between 1.0% and 3.0% of the principal amount being prepaid depending on the timing and circumstances of prepayment.

In conjunction with the Loan Agreement, the Company has issued warrants to purchase 403,348 Series B convertible preferred shares to SVB and WestRiver with an exercise price of \$1.4432 per share. The estimated fair value of the warrants at the date of issuance was approximately \$0.4 million. The fair value of the Series B convertible preferred shares warrant liability was determined using the Black-Scholes option-pricing model. As of December 20, 2019, the various assumptions used in the option-pricing model were time to liquidity of 2.0 to 10.0 years, volatility of 85.5%, risk-free rate of 1.7% and equity value of \$345.0 million. It was recorded at its fair value at inception and is being re-measured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the accompanying consolidated statement of operations and comprehensive loss. As of December 31, 2019, the fair value of the Series B convertible preferred shares warrant liability was approximately \$0.4 million and was recorded in other long-term liabilities on the consolidated balance sheet.

The loans under the Loan Agreement are secured by substantially all of the Company's assets, except the Company's intellectual property, which is the subject of a negative pledge.

The Company determined that certain loan features were embedded derivatives requiring bifurcation and separate accounting. Those embedded derivatives were bundled together as a single, compound embedded derivative and then bifurcated and accounted for separately from the host contract. The Company recorded a term loan compound derivative liability of approximately \$51,000 which will be marked-to-market in future periods. The Company calculated the fair value of the compound derivative by computing the difference between the fair value of the term loan with the compound derivative using the "with and without" method under the income approach, and the fair value of the term loan without the compound derivative. The Company calculated the fair values using a probability-weighted discounted cash flow analysis. The key valuation assumptions used consist of the discount rate and the probability of the occurrence of a change in control event. The term loan compound derivative liability is being re-measured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the consolidated statement of operations and comprehensive loss. As of December 31, 2019, the fair value of the compound derivative liability was approximately \$51,000 and was recorded in other long-term liabilities on the consolidated balance sheet.

The fair value of Series B convertible preferred shares warrant liability at issuance, fair value of embedded derivatives which were bifurcated and other debt issuance costs have been treated as debt discounts on the Company's consolidated balance sheet and together with the final payment are being amortized to interest expense throughout the life of the term loan using the effective interest rate method.

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As of December 31, 2019, there were unamortized issuance costs and debt discounts of \$0.6 million which were recorded as a direct deduction from the term loan on the consolidated balance sheet. Interest expense for the term loan was immaterial for the year ended December 31, 2019. For future payments of principal and interest as of December 31, 2019 is as follows.

| YEAR ENDING DECEMBER 31: | |
|---|----------------|
| 2020 | \$ 401 |
| 2021 | 3,743 |
| 2022 | 3,007 |
| | <u>7,151</u> |
| Less: amount representing interest | \$ (791) |
| Less: amount representing final payment | (360) |
| Long-term debt, gross | 6,000 |
| Less: unamortized issuance costs and debt discounts | (579) |
| Less: current portion | — |
| Long-term portion of term loan | <u>\$5,421</u> |

(5) CAPITAL STRUCTURE

Ordinary Shares

In 2015, in conjunction with the founding of the Company, 14,000,000 ordinary shares were issued to the founders, or Founder Stock, at a price of \$0.005 per share. These shares are subject to repurchase at the option of the Company at a price that is the lower of (i) the original issuance price or (ii) the fair market value as of the date of repurchase, in the event that the founders' employment is terminated either voluntarily or involuntarily. Such repurchase rights generally lapse over a period of four years from the date the Founder Stock was issued. As of December 31, 2018, and December 31, 2019, there were 749,333 and no founder shares subject to repurchase, respectively. See Note 6 for Founder Stock activity for the years ended December 31, 2018 and December 31, 2019.

Ordinary shares reserved for future issuance, on an as if converted basis, as of December 31, 2018 and December 31, 2019, consists of the following:

| | DECEMBER 31, | |
|--|---------------------|-------------------|
| | 2018 | 2019 |
| Convertible preferred shares, issued and outstanding | 61,180,500 | 67,871,229 |
| Share options, issued and outstanding | 5,691,123 | 7,789,923 |
| Share options, authorized for future issuance | 480,471 | 3,730,445 |
| Warrants, issued and outstanding | — | 403,348 |
| Warrants, authorized for future issuance | — | 201,674 |
| Total | <u>67,352,094</u> | <u>79,996,619</u> |

Convertible Preferred Shares

As of December 31, 2018 and December 31, 2019, the Company's convertible preferred shares consisted of the following (in thousands, except share amounts):

| | DECEMBER 31, 2018 | | | AGGREGATE LIQUIDATION PREFERENCE |
|---------------------------------------|-------------------|-------------------------------|-----------------------------|----------------------------------|
| | AUTHORIZED SHARES | SHARES ISSUED AND OUTSTANDING | NET PROCEEDS ⁽¹⁾ | |
| Shares designated as: | | | | |
| Series A convertible preferred shares | 62,000,000 | 61,180,500 | \$ 60,933 | \$ 69,863 |
| Total | <u>62,000,000</u> | <u>61,180,500</u> | <u>\$ 60,933</u> | <u>\$ 69,863</u> |
| | | | | |
| | DECEMBER 31, 2019 | | | AGGREGATE LIQUIDATION PREFERENCE |
| | AUTHORIZED SHARES | SHARES ISSUED AND OUTSTANDING | NET PROCEEDS ⁽¹⁾ | |
| Shares designated as: | | | | |
| Series A convertible preferred shares | 62,000,000 | 61,180,500 | \$ 60,933 | \$ 73,571 |
| Series B convertible preferred shares | 14,117,822 | 6,690,729 | 9,430 | 10,014 |
| Total | <u>76,117,822</u> | <u>67,871,229</u> | <u>\$ 70,363</u> | <u>\$ 83,585</u> |

(1) Net proceeds are gross proceeds from the offerings net of issuance costs.

In May 2015, the Company entered into a Series A Preferred Share Purchase Agreement, or Series A Agreement, with certain existing investors, employees, and new investors, or collectively, the Series A Investors. Under the terms of the Series A Agreement, the Company authorized the sale and issuance of up to 36,000,000 of the Company's Series A convertible preferred shares. The purchase and sale of the Series A convertible preferred shares could be sold in one or more closings in accordance with the Series A Agreement. In March 2017, the Company entered into a convertible promissory note purchase agreement, or the Note Purchase Agreement, with certain existing investors, employees and new investors, or collectively, the Promissory Note Investors. Under the terms of the Note Purchase Agreement, the Company issued promissory notes in the aggregate principal amount of \$25.0 million that are convertible into Series A convertible preferred shares to the Promissory Note Investors.

In 2015 and 2016, the Company issued a total of 36,000,000 Series A convertible preferred shares to investors at \$1.00 per share for cash proceeds of \$34.8 million. In September 2017, the Company issued a total of 25,180,500 Series A convertible preferred shares for cash proceeds of \$1.2 million pursuant to the conversion of outstanding convertible promissory notes. The gross proceeds of \$37.2 million were reduced by total issuance costs incurred of \$0.2 million.

In May 2019, the Company entered into a Series B Preferred Share Purchase Agreement or the Series B Agreement, with certain existing investors, employees and new investors, or collectively, the Series B Investors. Under the terms of the Series B Agreement, the Company authorized the sale and issuance of up to 14,117,822 of the Company's Series B convertible preferred shares at a purchase price of \$1.4432 per share. The purchase and sale of the Series B convertible preferred shares could be sold in one or more closings in accordance with the Series B Agreement. As of December 31, 2019, a total of 6,690,729 shares had been purchased with gross proceeds of \$9.6 million. The gross proceeds of \$9.6 million were reduced by total issuance costs incurred of \$0.2 million.

The rights, preferences and privileges of the Series A and Series B convertible preferred shares, or Preferred Shares, as of December 31, 2019 are as follows:

Dividend Provisions – Cumulative dividends of 6.0% per annum of the original issue price for each Preferred Shares series are payable when and as declared by the Company's Board of Directors, or Board of Directors,

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upon the occurrence of a liquidation event or upon a contingent mandatory conversion of the Preferred Shares in connection with a qualified initial public offering as described below. The Series A original issue price is \$1.00, and the Series B original issue price is \$1.4432. The original issue price is subject to adjustment in the event of any share dividend, share split, combination, consolidation or other recapitalization. The dividends shall accrue from day to day from the issue date of such Preferred Shares whether or not declared and shall be cumulative. In addition, the Preferred Shares participate on an as-converted basis in any dividends payable to ordinary shareholders. Cumulative dividends for the years ended December 31, 2018 and December 31, 2019 was \$8.7 million and \$12.7 million, respectively. No dividends have been declared or paid since the issuance of convertible preferred shares through December 31, 2019.

Liquidation – In the event of liquidation, dissolution or winding up of the Company, merger or a reduction of capital through the sale or lease of all or substantial part of the business of the Company, before any distribution or payment shall be made to the holders of ordinary shares, the holders of Preferred Shares shall be entitled to be paid an amount in cash equal to the original issue price (subject to adjustment in the event of any share dividend, share split, combination, or other recapitalization) plus all dividends accumulated and unpaid thereon. First, the holders of the Preferred Shares are paid in full the amounts specified in the immediately preceding sentence on a pro-rata basis; then, after holders of the Preferred Shares are satisfied, any remaining amounts shall be distributed on a pro-rata basis to the holders of the Preferred Shares (calculated on an as converted basis) and the ordinary shares.

Voting Rights – On any matter presented to the shareholders of the Company, each holder of outstanding Preferred Shares shall be entitled to cast the number of votes equal to the number of whole ordinary shares into which the Preferred Shares held by such holder are convertible. The holders of Preferred Shares shall vote together with the holders of ordinary shares as a single class. Additionally, as long as at least 9,000,000 Preferred Shares are outstanding (subject to adjustment in the event of any recapitalizations), the Company must receive approval of holders of at least two-third of the voting rights then held in aggregate by the holders of the Preferred Shares in issue on an as-converted basis in order to effect certain corporate actions. Two investors have contractual rights to elect three out of five board members.

Optional Conversion at Holders' Option – Each share of Preferred Shares shall be convertible, at the option of the holder, at any time and from time to time, into such number of fully paid and non-assessable ordinary shares as is determined by dividing the original issue price by the Applicable Conversion Price. The Applicable Conversion Price for each series of Preferred Shares is currently equal to the original issue price for such series. Upon conversion, the holders shall also receive only declared but as yet unpaid dividends. Note only holders of Preferred Shares receive declared and unpaid dividends; preferred shareholders who chose to convert prior to the declaration of such dividends are not entitled to receive accumulated dividends.

Contingent Mandatory Conversion – Upon the closing of the first underwritten public offering pursuant to an effective registration statement under the Securities Act of 1933, as amended, or pursuant to a corresponding securities issuance application process in any non-U.S. jurisdiction, covering the offer and sale of the Company's ordinary shares in which (i) the per share price is not less than \$2.30912 (as adjusted for any share dividends, combinations, splits, recapitalizations and the like with respect to such shares after the filing date hereof) and (ii) the gross cash proceeds to the Company (before underwriting discounts, commissions and fees) are at least \$50.0 million then all outstanding Preferred Shares shall automatically be converted into a number of ordinary shares, at a conversion rate determined by dividing the applicable original price of such Preferred Shares by the applicable conversion price of such Preferred Shares. Upon conversion, the holders shall also receive any cumulative and unpaid dividends, whether or not declared as conversion ordinary shares at the same conversion rate for the applicable Preferred Shares.

Down-Round Antidilution Protection – In the event the Company issues its ordinary shares without consideration or for consideration per share that is less than the conversion price in effect for each series of the Preferred Shares, then the conversion price for that series shall be reduced in order to increase the number of ordinary shares into which such series of Preferred Shares is convertible to.

(6) SHARE-BASED COMPENSATION

During 2015, the Company adopted an equity compensation plan, the 2015 Share Award Scheme, or the Plan, for eligible employees, officers, directors, advisors, and consultants. The Plan provides for the grant of incentive and non-statutory share options. The Plan permits the Company to grant up to 14,103,000 ordinary share awards, including incentive share options, non-statutory share options, conditional share awards and restricted share awards.

The terms of the share option agreements, including vesting requirements, are determined by the Board of Directors, subject to the provisions of the Plan. The term of the options generally expire, upon the earliest of (i) termination of continuous service for cause (ii) three months after the termination of continuous service for reasons other than cause, death or disability (iii) twelve months after the termination of continuous service due to disability (iv) eighteen months after the employee's death if the employee died during the period of continuous service (v) expiration date in the grant notice or (vi) the day before the tenth anniversary of the date of grant. The exercise price of the incentive share options must equal at least the fair market value of the share on the date of grant.

All awards that are canceled, forfeited or expired are returned to the Plan and are available for grant in conjunction with the issuance of new awards. Share options granted are exercisable over a maximum term of 10 years from the date of grant and generally vest over an agreed service period, usually four years.

Certain share options granted under the Plan provide option holders the right to elect to exercise unvested options in exchange for ordinary shares. Such unvested ordinary shares are subject to a repurchase right held by the Company at the original issuance price in the event the optionee's service to the Company is terminated either voluntarily or involuntarily. The right lapses as the underlying repurchase right expires. These repurchase terms are considered to be a forfeiture provision. The cash received from employees for exercise of unvested options is treated as a refundable deposit and is classified as a liability on the consolidated balance sheets. At December 31, 2018 and December 31, 2019, there were 763,708 and 223,923 unvested early exercised options and the liability related to these unvested options was \$0.1 million and approximately \$27,000, respectively.

(a) Option Activity

The following table provides a summary of share option activity under the Plan and related information:

| | SHARES AVAILABLE TO GRANT | NUMBER OF OPTIONS | OUTSTANDING OPTIONS | | |
|--|---------------------------------|----------------------|--|---|---|
| | | | WEIGHTED AVERAGE EXERCISE PRICE | WEIGHTED AVERAGE REMAINING CONTRACTUAL LIFE (YEARS) | AGGREGATE INTRINSIC VALUE (in thousands) |
| Balance outstanding at December 31, 2017 | 1,436,695 | 4,735,000 | \$ 0.15 | 9.18 | \$ — |
| Granted | (1,231,823) | 1,231,823 | \$ 0.28 | | |
| Exercised | — | (45,505) | \$ 0.15 | | |
| Canceled/forfeited | 230,195 | (230,195) | \$ 0.15 | | |
| Shares repurchased | 45,404 | — | — | | |
| Balance outstanding at December 31, 2018 | 480,471 | 5,691,123 | \$ 0.18 | 8.54 | \$ 582 |
| Authorized | 5,383,000 | | | | |
| Granted | (2,249,800) | 2,249,800 | \$ 0.29 | | |
| Exercised | — | (34,226) | \$ 0.28 | | |
| Canceled/forfeited | 116,774 | (116,774) | \$ 0.28 | | |
| Balance outstanding at December 31, 2019 | 3,730,445 | 7,789,923 | \$ 0.21 | 8.06 | \$ 638 |
| Exercisable at December 31, 2019 | | 3,724,615 | \$ 0.18 | 7.56 | \$ 424 |

As of December 31, 2019, there was unrecognized share-based compensation expense of \$0.6 million, related to unvested share options which the Company expects to recognize over a weighted-average period of 2.7 years.

The aggregate intrinsic values of options outstanding and exercisable were calculated as the difference between the exercise price of the options and the estimated fair value of the Company's ordinary shares as determined by the Board of Directors as of December 31, 2018 and December 31, 2019. The total intrinsic value of options exercised during the years ended December 31, 2018 and 2019 were immaterial.

Compensation cost for share options granted is based on the grant-date fair value estimated and is recognized over the vesting period of the applicable option on a straight-line basis. The weighted-average grant-date fair value per share for share options granted during the years ended December 31, 2018 and December 31, 2019 was \$0.17 and \$0.19, respectively. The total fair value of options that vested during the years ended December 31, 2018 and December 31, 2019 was approximately \$0.1 million and \$0.3 million, respectively.

Share-based compensation expense includes share options granted to employees and nonemployees and has been reported in the Company's consolidated statements of operations and comprehensive loss as follows (in thousands):

| | YEAR ENDED DECEMBER 31, | |
|--|-------------------------|--------|
| | 2018 | 2019 |
| Research and development | \$ 195 | \$ 105 |
| General and administrative | 16 | 33 |
| Cost of services for related-party revenue | 58 | 159 |
| Total | \$ 269 | \$ 297 |

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The Company's computation of share-based compensation expense for the years ended December 31, 2018 and December 31, 2019 is based on the fair value of ordinary shares of \$0.28 and \$0.29, respectively, and is adjusted for actual forfeitures as they occur. The fair value of each option grant during the years ended December 31, 2018 and December 31, 2019 was estimated on the date of grant using the Black-Scholes option-pricing model with the following:

| | YEAR ENDED DECEMBER 31, | |
|---------------------------------|-------------------------|---------------|
| | 2018 | 2019 |
| Expected term (in years) | 5.2 – 6.0 | 4.4 – 6.0 |
| Risk-free interest rate | 2.6% – 3.0% | 1.7% – 2.1% |
| Expected dividend rate | — | — |
| Expected share price volatility | 66.5% – 68.7% | 75.2% – 80.5% |

Expected Term. The expected term of the options represents the average period the share options are expected to remain outstanding. As the Company does not have sufficient historical information to develop reasonable expectations about future exercise patterns and post-vesting employment termination behavior, the expected term of options granted is derived from the average midpoint between the weighted average vesting and the contractual term, also known as the simplified method.

Risk-Free Interest Rate. The risk-free interest rate is based on the yield of U.S. Treasury notes as of the grant date with terms commensurate with the expected term of the option.

Dividend Yield. The expected dividends assumption is based on the Company's expectation of not paying dividends in the foreseeable future.

Volatility. Since the Company is private and does not have any trading history for its ordinary shares, the expected volatility is based on the historical volatilities of the common shares of comparable publicly traded companies. The Company selected companies with comparable characteristics, including enterprise value, risk profiles, position within the industry, and with historical share price information sufficient to meet the expected life of the Company's share-based awards.

Estimated Fair Value. The estimated fair value of the shares of common stock underlying stock options was determined by the Company's board of directors. Because there was no public market for the Company's common stock, the board of directors determined fair value of the common stock at the time of grant of the options by considering a number of objective and subjective factors including important developments in the Company's operations, valuations performed by an independent third party, sales of convertible preferred stock, actual operating results and financial performance, the conditions in the biotechnology industry and the economy in general, the stock price performance and volatility of comparable public companies, and the lack of liquidity of the Company's common stock, among other factors.

(b) Founder Stock Activity

The following table provides a summary of Founder Stock activity:

| | NUMBER OF SHARES | WEIGHTED-AVERAGE GRANT DATE FAIR VALUE |
|-------------------------------|---------------------|--|
| Unvested at December 31, 2017 | 2,997,333 | \$0.05 |
| Vested | (2,248,000) | 0.05 |
| Unvested at December 31, 2018 | 749,333 | 0.05 |
| Vested | (749,333) | 0.05 |
| Unvested at December 31, 2019 | — | \$ — |

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There were no Founder Stock granted during the years ended December 31, 2018 and December 31, 2019. The total fair value of Founder Stock that vested during the years ended December 31, 2018 and December 31, 2019 were \$0.1 million and \$40,000, respectively.

(7) INCOME TAXES

The domestic (Ireland) and foreign components of pre-tax loss for the years ending December 31, 2018 and December 31, 2019 are as follows (in thousands):

| | DECEMBER 31, | |
|--------------------------|--------------------|--------------------|
| | 2018 | 2019 |
| Foreign | \$ (12,576) | \$ (16,803) |
| Domestic (Ireland) | (1,110) | (2,406) |
| Loss before income taxes | <u>\$ (13,686)</u> | <u>\$ (19,209)</u> |

The provision for income taxes consist of the following (in thousands):

| | YEAR ENDED DECEMBER 31, | |
|----------------------------|----------------------------|--------------|
| | 2018 | 2019 |
| Current | | |
| Domestic (Ireland) | \$ — | \$ — |
| State (U.S.) | 1 | 1 |
| Foreign/federal | 44 | 33 |
| Total current | 45 | 34 |
| Deferred | | |
| Domestic (Ireland) | \$ — | \$ — |
| State (U.S.) | — | — |
| Foreign/federal | — | — |
| Total deferred | — | — |
| Provision for income taxes | <u>\$ 45</u> | <u>\$ 34</u> |

A reconciliation of the Irish statutory income tax rate of 12.5% to the actual tax rate for the years ended December 31, 2018 and December 31, 2019 are as follows (in thousands):

| | YEAR ENDED DECEMBER 31, | |
|---------------------------------------|----------------------------|--------------|
| | 2018 | 2019 |
| At statutory rate | \$ (1,711) | \$ (2,401) |
| Foreign income tax at different rates | 1,404 | 378 |
| U.S. R&D credits | (499) | (861) |
| Change in valuation allowance | 732 | 3,733 |
| Share-based compensation | 57 | 60 |
| Prior period true ups | (38) | (950) |
| Other | 100 | 75 |
| Provision for income taxes | <u>\$ 45</u> | <u>\$ 34</u> |

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Significant components of the Company's deferred tax assets as of December 31, 2018 and December 31, 2019 are as follows (in thousands):

| | DECEMBER 31, | |
|----------------------------------|-----------------|-----------------|
| | 2018 | 2019 |
| Deferred tax assets: | | |
| Net operating loss carryforwards | \$ 363 | \$ 3,259 |
| Research & other credits | 1,701 | 3,260 |
| Other | 208 | 333 |
| Total gross DTA | <u>\$ 2,272</u> | <u>\$ 6,852</u> |
| Less: Val. Allowance | <u>(2,181)</u> | <u>(6,686)</u> |
| Total deferred tax assets | <u>\$ 91</u> | <u>\$ 166</u> |
| Deferred tax liabilities: | | |
| Fixed assets | <u>\$ (91)</u> | <u>\$ 166</u> |
| Total gross DTL | <u>\$ (91)</u> | <u>\$ 166</u> |
| Net deferred tax assets | <u>\$ —</u> | <u>\$ —</u> |

Realization of deferred tax assets is dependent upon the Company generating future taxable income, the timing and amount of which are uncertain. Accordingly, the deferred tax assets have been largely offset by a valuation allowance. The valuation allowance increased by approximately \$0.8 million and \$4.5 million for the years ended December 31, 2018 and December 31, 2019, respectively.

As of December 31, 2019, the Company had a net operating loss carryforwards for U.S. state income tax purposes of approximately \$30.9 million, that expire in the year 2038, and for Ireland income tax purposes of approximately \$4.0 million that never expire. As of December 31, 2019, the Company had U.S. federal research and development credit carryforwards of approximately \$1.5 million, that expire in the year 2038, and U.S. state research and development credit carryforwards of approximately \$2.4 million, that do not expire.

Utilization of the Company's U.S. net operating loss and credit carryforwards may be subject to substantial annual limitation due to the ownership change limitations provided by the Internal Revenue Code and similar state provisions. Such annual limitation could result in the expiration of the U.S. net operating loss and credit carryforwards before utilization. To date, the Company has not performed an analysis to determine whether there would be a substantial annual limitation due to a change in ownership.

Unrecognized Tax Benefits

The Company's policy is to include interest and penalties related to unrecognized tax benefits, if any, within the provision for taxes in the consolidated statements of operations and comprehensive loss. If the Company is eventually able to recognize its uncertain tax positions, the Company's effective tax rate would be reduced. The Company currently has a full valuation allowance against its net deferred tax asset which would impact the timing of the effective tax rate benefit should any of these uncertain tax positions be favorably settled in the future.

The Company files income tax returns in Ireland, the U.S., and Malta. All of the Company's tax years since 2015 remain open to examination.

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The Company has the following activity relating to unrecognized tax benefits (in thousands):

| | DECEMBER 31, | |
|--|---------------|---------------|
| | 2018 | 2019 |
| Beginning balance | \$ 247 | \$ 418 |
| Gross increase—tax positions in prior periods | 11 | 9 |
| Gross decreases—tax positions in prior periods | — | (7) |
| Gross increases—tax positions in prior periods | 160 | 272 |
| Ending balance | <u>\$ 418</u> | <u>\$ 692</u> |

Although it is reasonably possible that certain unrecognized tax benefits may increase or decrease within the next 12 months due to tax examination changes, settlement activities, expirations of statute of limitations or the impact on recognition and measurement considerations related to the results of published tax cases or other similar activities, the Company does not anticipate any significant changes to unrecognized tax benefits over the next 12 months. During the years ended December 31, 2018 and December 31, 2019, no interest or penalties were required to be recognized relating to unrecognized tax benefits.

(8) COMMITMENTS & CONTINGENCIES

In the normal course of business, the Company enters into contracts and agreements that contain a variety of representations and warranties and provide for general indemnifications. The Company's exposure under these agreements is unknown because it involves claims that may be made against the Company in the future but have not yet been made. To date, the Company has not paid any claims or been required to defend any action related to its indemnification obligations. However, the Company may record charges in the future as a result of these indemnification obligations. The Company also has indemnification obligations to its officers and directors for specified events or occurrences, subject to some limits, while they are serving at the Company's request in such capacities. There have been no claims to date and the Company has director and officer insurance that may enable the Company to recover a portion of any amounts paid for future potential claims. The Company believes the fair value of these indemnification agreements is minimal. Accordingly, the Company has not recorded any liabilities for these agreements as of December 31, 2018 and December 31, 2019.

Legal Proceedings

From time to time, the Company may be a party to various claims in the normal course of business. Legal fees and other costs associated with such actions will be expensed as incurred. The Company will assess, in conjunction with its legal counsel, the need to record a liability for litigation and contingencies. Reserve estimates will be recorded when and if it is determined that a loss related matter is both probable and reasonably estimable. For the years ended December 31, 2018 and December 31, 2019, the Company had no pending or threatened litigation.

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Contractual Obligations and Other Commitments

The following table summarizes the Company's commitments and contractual obligations as of December 31, 2019 (in thousands):

| YEAR ENDED DECEMBER 31: | OPERATING LEASE OBLIGATIONS (1) | MANUFACTURING AND SERVICE CONTRACTS (2) | TERM LOAN (3) |
|--------------------------------|--|--|--------------------------|
| 2020 | \$ 544 | \$ 926 | \$ 401 |
| 2021 | 560 | 5,805 | 3,743 |
| 2022 | 577 | — | 3,007 |
| 2023 | 247 | — | — |
| Total | \$ 1,928 | \$ 6,731 | \$ 7,151 |

(1) Payments due for the office and laboratory space in Burlingame, California under a single operating lease agreement that expires in 2023.

(2) These amounts are based on non-cancellable commitments and forecasts that include estimates of future market demand, quantity discounts and manufacturing efficiencies that may impact timing of purchases.

(3) In December 2019, the Company entered into a term loan pursuant to the Loan Agreement as described above in Note 4.

Facilities

In 2015, the Company entered into a noncancelable lease for office space for a period of three years and two months, commencing March 2015 and ending May 31, 2018.

In 2016, the Company entered into a sublease agreement for office space for a period of four years, commencing June 2016 and ending May 31, 2020. This sublease was terminated early in May 2018 without any fees and penalties.

In 2017, the Company entered into a lease agreement for office space for a period of five years and four months, commencing February 1, 2018 and ending May 31, 2023.

Minimum rent payments under operating leases are recognized on a straight-line basis over the term of the lease including any periods of free rent. Rent expense for years ended December 31, 2018 and December 31, 2019 were \$1.0 million and \$0.8 million, respectively.

Manufacturing and Service Contracts

In November 2015, the Company entered into a Master Service Agreement, or MSA, with KBI Biopharma, Inc, or KBI, relating to formulation development, process development and cGMP manufacturing of ALX148 for use in clinical trials on a project basis. The MSA had an initial term of three years which the Company subsequently extended. See table above for future committed purchases with KBI.

The Company also enters into other contracts in the normal course of business with CROs, contract development and manufacturing organizations and other service providers and vendors. These contracts generally provide for termination on short notice and are cancelable contracts and, accordingly, are not included in the contractual obligations and disclosures summarized above.

(9) LICENSE AGREEMENT

Exclusive (Equity) Agreement with The Board of Trustees of the Leland Stanford Junior University

In March 2015, the Company entered into a license agreement, or the Stanford Agreement, with the Board of Trustees of the Leland Stanford Junior University, or Stanford, under which the Company obtained a worldwide, royalty-bearing, sublicensable license under certain patents relating to the Company's current product candidates, to develop, manufacture and commercialize products for use in certain licensed fields, the scope of

which would include the application of the licensed intellectual property in oncology. The license granted to the Company in the Stanford Agreement includes an exclusive grant, subject to certain pre-existing non-exclusive or exclusive rights that Stanford retained for grant to third parties with respect to certain categories of the licensed patents in certain fields of use and retained rights by Stanford and all other nonprofit institutions to use and practice the licensed patents and technology for internal research and other nonprofit purposes. The license granted to the Company in the Stanford Agreement also includes non-exclusive grants to certain Stanford patents.

In consideration for the rights granted to the Company under the Stanford Agreement, the Company paid Stanford a nonrefundable license royalty and reimbursed Stanford for past patent expenses, together totaling less than \$0.1 million, and granted Stanford a specified number of ordinary shares of the Company. In addition, the Company is obligated to pay Stanford ongoing patent expenses and an annual license maintenance fee, which are nominal and will be creditable against any royalties payable to Stanford in the applicable year. The Company is required to make milestone payments up to a specified aggregate amount in respect of a specified number of licensed products that successfully satisfy certain clinical and regulatory milestones. No milestone payments have been made through December 31, 2019. The Company also agreed to pay Stanford tiered royalties on a specified percentage of net sales made by the Company, its affiliates and its sublicensees of licensed products at rates ranging within low single-digit percentages, subject to certain reductions and offsets. The license, on a licensed product-by-licensed product and country-by-country basis, shall become royalty-free and fully paid-up upon the later of the date on which the last valid claim included in the exclusively or non-exclusively licensed patents expires and ten years after the first commercial sale of the licensed product in such country.

The Company may terminate the Stanford Agreement, on a licensed product-by-licensed product basis, at any time for any reason by providing at least 60 days' written notice to Stanford. Stanford may terminate the Stanford Agreement, if the Company is in breach of any provision of the Stanford Agreement and fail to remedy such breach within 60 days after written notice of such breach by Stanford. In addition, Stanford has the right to terminate the Stanford Agreement, on a licensed product-by-licensed product basis, if the Company is not diligently developing and commercializing such licensed product under certain conditions or if the Company fails to achieve specified development milestones for such licensed product by certain dates, subject to the Company's extension rights.

Commercial License Agreement with Selexis SA

In June 2016, the Company entered into a license agreement with Selexis SA, or Selexis, under which the Company obtained a worldwide, royalty-bearing, sublicensable license under certain patents, know-how and other intellectual property, to use Selexis generated cell lines to manufacture ALX148 and to make, use and sell licensed products containing such compound in all fields of use. The rights granted under this agreement include the rights to grant sublicenses to contractors or other collaboration partners, in each case to develop production processes or manufacture licensed products containing ALX148.

In consideration for the rights granted to the Company under the agreement, the Company paid Selexis a nominal one-time fee and will pay Selexis an annual maintenance fee. The Company also agreed to pay Selexis milestone payments in respect of each licensed product developed and/or commercialized under the grant that successfully satisfies certain milestone events. The Company also agreed to pay Selexis a flat royalty of a very low single-digit percentage on net sales made by the Company, its affiliates and sublicensees of products. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the passing of ten years after the first commercial sale of the product in such country, or the Company's exercise of the royalty buyout option exercisable at any time prior to the first commercial sale of a licensed product.

The Company may terminate the license agreement at any time for any reason with at least 60 days' written notice to Selexis. Either party may terminate the license agreement if the other party enters into a bankruptcy event or in the event of a material breach of the agreement (that cannot be cured or remains uncured for 60 days after the date that the defaulting party is provided with written notice of such breach). The Company's obligations to pay royalties that are accrued or accruable will survive any termination of the agreement, and in

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certain circumstances the licenses granted under the agreement will terminate unless they have become fully paid up as described in the previous paragraph.

Commercial Antibody Agreement with Crystal Bioscience, Inc. (Now a Subsidiary of Ligand Pharmaceuticals Incorporated)

In March 2017, the Company entered into an agreement with Crystal Bioscience, Inc. (now a subsidiary of Ligand Pharmaceuticals Incorporated), or Crystal, under which the Company obtained an assignment of certain patents, covering certain SIRPa antibodies. Under this agreement, the Company also received a worldwide, royalty-bearing non-exclusive license, with the right to grant sublicenses through multiple tiers of sublicenses, under certain of Crystal's background patents and know-how necessary to commercialize the rights under the assigned patents.

In consideration for the rights granted to the Company under the agreement, it agreed to pay Crystal milestone payments up to \$11.1 million in respect of all licensed products developed under the assigned patents, that successfully satisfy certain clinical and regulatory milestones, each milestone being paid only once for all products. The Company also agreed to pay Crystal tiered royalties on net sales made by the Company, its affiliates and sublicensees of products at rates ranging within low single-digit percentages, subject to certain potential reductions. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the later of the date on which the last valid claim included in the licensed patents expires and ten years after the first commercial sale of the product in such country.

The Company agreed to use commercially reasonable efforts to develop and commercialize licensed products, including meeting defined development milestones by certain specified dates.

The Company may terminate the agreement at any time for any reason with at least 60 days' written notice to Crystal. Either party may terminate the agreement if the other party enters into a bankruptcy event or in the event of material breach of the agreement (that remains uncured for 60 days after the date that it is provided with written notice of such breach). The Company's obligations to pay royalties and milestone payments which accrued pre-termination or accrue post-termination will survive any termination.

(10) DEFINED CONTRIBUTION PLAN

The Company has a qualified 401(k) Savings and Investment Plan, or the Plan, whereby employees may contribute up to the Federal annual limits. The Company does not match employee contributions.

(11) RELATED-PARTY TRANSACTIONS

Related-Party Revenue

In June 2018, the Company entered into a Research and Development Services Agreement, or Tollnine Agreement, with Tollnine, Inc., or Tollnine, a related-party of the Company, to provide research and development services to Tollnine. The Company's Chief Executive Officer is also the Chief Executive Officer of Tollnine and two of the Company's investors are also investors in Tollnine. As such, Tollnine was deemed to be a related-party. The Tollnine Agreement has an initial term of 3 years, to be automatically renewed for additional one-year terms unless terminated by either party. The services are to be provided at a price based on the costs incurred by the Company plus a mark-up equal to 10% of such costs. The Company recognizes revenue when Tollnine, as our customer, obtains control of promised goods or services, in an amount that reflects the consideration which the Company expects to receive in exchange for those goods or services. For the years ended December 31, 2018 and December 31, 2019, the Company recognized related-party revenues of \$2.1 million and \$4.8 million, respectively, under the Tollnine Agreement.

Receivables due from Related-Party

As of December 31, 2018, and 2019, the Company had outstanding related-party receivables from Tollnine of \$0.9 million and \$0.5 million, respectively.

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The following table sets forth the computation of the basic and diluted net loss per share attributable to ordinary shareholders (in thousands, except share and per share data):

| | YEAR ENDED DECEMBER 31, | |
|---|-------------------------|-------------------|
| | 2018 | 2019 |
| Numerator: | | |
| Net loss | \$ (13,731) | \$(19,243) |
| Less: cumulative dividends allocated to preferred shareholders | (3,671) | (4,028) |
| Net loss attributable to ordinary shareholders | <u>\$ (17,402)</u> | <u>\$(23,271)</u> |
| Denominator: | | |
| Weighted-average ordinary shares outstanding | 18,102,402 | 20,245,115 |
| Net loss per share attributable to ordinary shareholders, basic and diluted | <u>\$ (0.96)</u> | <u>\$ (1.15)</u> |

Since the Company was in a loss position for all periods presented, basic net loss per share is the same as diluted net loss per share for all periods as the inclusion of all potential ordinary shares outstanding would have been anti-dilutive. Potentially dilutive securities that were not included in the diluted per share calculations as of December 31, 2018 and December 31, 2019 because they would be anti-dilutive were as follows:

| | DECEMBER 31, | |
|---|-------------------|-------------------|
| | 2018 | 2019 |
| Series A convertible preferred shares | 61,180,500 | 61,180,500 |
| Series B convertible preferred shares | — | 6,690,729 |
| Warrants to purchase convertible preferred shares | — | 403,348 |
| Ordinary shares subject to repurchase | 1,513,041 | 223,923 |
| Options issued and outstanding | 5,691,123 | 7,789,923 |
| Total | <u>68,384,664</u> | <u>76,288,423</u> |

The following table sets forth the computation of the Company's unaudited pro forma basic and diluted net loss per share (in thousands, except share and per share amounts):

| | YEAR ENDED |
|---|----------------------|
| | DECEMBER 31, 2019 |
| Net loss | <u>\$ (19,243)</u> |
| Weighted-average ordinary shares used in computing net loss per share attributable to ordinary shareholders, basic and diluted | 20,245,115 |
| Pro forma adjustment to reflect assumed conversion of preferred shares and accrued dividends allocable to ordinary shareholders | <u>74,028,943</u> |
| Weighted-average ordinary shares used to compute pro forma net loss per share, basic and diluted | <u>94,274,058</u> |
| Pro forma net loss per share, basic and diluted | <u>\$ (0.20)</u> |

(13) SUBSEQUENT EVENTS

The Company has evaluated subsequent events from the balance sheet date through May 5, 2020, the date at which the consolidated financial statements were available to be issued.

In February 2020, the Company entered into a Series C Preferred Share Purchase Agreement, or the Series C Agreement, with certain existing investors, employees and new investors, or collectively, the Series C Investors. Under the terms of the Series C Agreement, the Company authorized the sale and issuance of up to 72,754,989 Series C convertible preferred shares at a purchase price of \$1.4432 per share. To date, all authorized Series C convertible preferred shares have been purchased with gross proceeds of \$105.0 million.

On April 1, 2020, the Company completed an internal reorganization transaction pursuant to which ALX Oncology Limited became a wholly-owned subsidiary ALX Oncology Holdings Inc., a newly formed Delaware corporation. As part of the transaction, all of the equity, option and warrant holders of ALX Oncology Limited became equity, option and warrant holders of ALX Oncology Holdings Inc., holding the same number of corresponding shares, options and/or warrants in ALX Oncology Holdings Inc., as they did in the Company immediately prior to the reorganization.

ALX ONCOLOGY LIMITED
Condensed Consolidated Balance Sheets
(in thousands, except share and per share data)

| | DECEMBER 31, 2019 (Note 1) | MARCH 31, 2020 (unaudited) | PRO FORMA SHAREHOLDERS' EQUITY AS OF MARCH 31, 2020 (unaudited) |
|--|----------------------------------|----------------------------------|--|
| Assets | | | |
| Current assets: | | | |
| Cash and cash equivalents | \$ 9,017 | \$ 105,035 | \$ |
| Receivables due from related-party | 536 | 1,191 | |
| Prepaid expenses and other current assets | 256 | 1,187 | |
| Total current assets | 9,809 | 107,413 | |
| Property and equipment, net | 860 | 757 | |
| Other assets | 7 | 229 | |
| Total assets | <u>\$ 10,676</u> | <u>\$ 108,399</u> | <u>\$</u> |
| Liabilities, convertible preferred shares and shareholders' equity (deficit) | | | |
| Current liabilities: | | | |
| Accounts payable | \$ 3,748 | \$ 1,987 | \$ |
| Accrued expenses and other current liabilities | 1,236 | 1,146 | |
| Term loan—current | — | 857 | |
| Total current liabilities | 4,984 | 3,990 | |
| Term loan—non-current | 5,421 | 4,672 | |
| Other long-term liabilities | 412 | 512 | |
| Deferred rent | 135 | 108 | |
| Total liabilities | <u>10,952</u> | <u>9,282</u> | |
| Commitments and Contingencies | | | |
| Series A convertible preferred shares: \$0.001 par value; 61,180,500 shares authorized; 61,180,500 shares issued and outstanding at December 31, 2019 and March 31, 2020, respectively; aggregate liquidation preference of \$73,571 and \$74,476 as of December 31, 2019 and March 31, 2020, respectively; 0 shares authorized, issued and outstanding, pro forma (unaudited) | 60,933 | 60,933 | — |
| Series B convertible preferred shares: \$0.001 par value; 7,295,752 shares authorized; 6,690,729 shares issued and outstanding at December 31, 2019 and March 31, 2020; aggregate liquidation preference of \$10,014 and \$10,158 as of December 31, 2019 and March 31, 2020, respectively; 0 shares authorized, issued and outstanding, pro forma (unaudited) | 9,430 | 9,430 | — |
| Series C convertible preferred shares: \$0.001 par value; 72,754,989 shares authorized; 0 and 72,754,989 shares issued and outstanding at December 31, 2019 and March 31, 2020, respectively; aggregate liquidation preference of \$0 and \$105,934 as of December 31, 2019 and March 31, 2020, respectively; 0 shares authorized, issued and outstanding, pro forma (unaudited) | — | 104,680 | — |

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| | <u>DECEMBER 31,</u> <u>2019</u> <u>(Note 1)</u> | <u>MARCH 31,</u> <u>2020</u> <u>(unaudited)</u> | <u>PRO FORMA</u> <u>SHAREHOLDERS'</u> <u>EQUITY AS OF</u> <u>MARCH 31,</u> <u>2020</u> <u>(unaudited)</u> |
|---|---|---|--|
| Shareholders' equity (deficit): | | | |
| Ordinary shares, \$0.001 par value; 10,000,000,000 shares authorized; 20,840,532 shares issued and outstanding at December 31, 2019 and March 31, 2020; 10,000,000,000 shares authorized, 175,757,582 shares issued and outstanding, pro forma (unaudited) | \$ 21 | \$ 21 | \$ 176 |
| Additional paid-in capital | 2,122 | 2,289 | 192,356 |
| Accumulated deficit | (72,782) | (78,236) | (92,968) |
| Total shareholders' equity (deficit) | <u>(70,639)</u> | <u>(75,926)</u> | <u>99,564</u> |
| Total liabilities, convertible preferred shares and shareholders' equity (deficit) | <u>\$ 10,676</u> | <u>\$ 108,399</u> | <u>\$</u> |

See accompanying notes to these condensed consolidated financial statements

ALX ONCOLOGY LIMITED
Condensed Consolidated Statements of Operations and Comprehensive Loss
(unaudited)
(in thousands, except share and per share amounts)

| | THREE MONTHS ENDED MARCH 31, | |
|--|-------------------------------------|-------------|
| | 2019 | 2020 |
| Related-party revenue | \$ 1,032 | \$ 655 |
| Operating expenses: | | |
| Research and development | 3,733 | 3,828 |
| General and administrative | 588 | 1,473 |
| Cost of services for related-party revenue | 938 | 596 |
| Total operating expenses | 5,259 | 5,897 |
| Loss from operations | (4,227) | (5,242) |
| Interest expense | — | (215) |
| Other income (expense), net | (2) | 7 |
| Loss before income taxes | (4,229) | (5,450) |
| Income tax provision | (9) | (4) |
| Net loss and comprehensive loss | (4,238) | (5,454) |
| Cumulative dividends allocated to preferred shareholders | (905) | (1,983) |
| Net loss attributable to ordinary shareholders | \$ (5,143) | \$ (7,437) |
| Net loss per share attributable to ordinary shareholders, basic and diluted | \$ (0.26) | \$ (0.36) |
| Weighted-average ordinary shares used to compute net loss per share attributable to ordinary shareholders, basic and diluted | 19,749,549 | 20,684,025 |
| Pro forma net loss attributable to ordinary shareholders per share, basic and diluted | | \$ (0.04) |
| Weighted-average ordinary shares used to compute pro forma net loss per share attributable to ordinary shareholders, basic and diluted | | 144,442,583 |

See accompanying notes to these condensed consolidated financial statements

ALX ONCOLOGY LIMITED
Condensed Consolidated Statements of Convertible Preferred Shares and Shareholders' Deficit
(unaudited)
(in thousands, except share amounts)

| | CONVERTIBLE PREFERRED SHARES | | ORDINARY SHARES | | ADDITIONAL PAID-IN CAPITAL | ACCUMULATED DEFICIT | TOTAL SHAREHOLDERS' DEFICIT |
|--|---------------------------------|-------------------|-------------------|--------------|----------------------------------|------------------------|-----------------------------------|
| | SHARES | AMOUNT | SHARES | AMOUNT | | | |
| Balance as of December 31, 2018 | 61,180,500 | \$ 60,933 | 20,806,306 | \$ 21 | \$ 1,740 | \$ (53,539) | \$ (51,778) |
| Vesting of early exercised share options | — | — | — | — | 21 | — | 21 |
| Share-based compensation | — | — | — | — | 76 | — | 76 |
| Net loss | — | — | — | — | — | (4,238) | (4,238) |
| Balance as of March 31, 2019 | <u>61,180,500</u> | <u>\$ 60,933</u> | <u>20,806,306</u> | <u>\$ 21</u> | <u>\$ 1,837</u> | <u>\$ (57,777)</u> | <u>\$ (55,919)</u> |
| Balance as of December 31, 2019 | 67,871,229 | \$ 70,363 | 20,840,532 | \$ 21 | \$ 2,122 | \$ (72,782) | \$ (70,639) |
| Vesting of early exercised share options | — | — | — | — | 16 | — | 16 |
| Issuance of Series C convertible preferred shares, net of issuance costs of \$320 | 72,754,989 | 104,680 | — | — | — | — | — |
| Share-based compensation | — | — | — | — | 151 | — | 151 |
| Net loss | — | — | — | — | — | (5,454) | (5,454) |
| Balance as of March 31, 2020 | <u>140,626,218</u> | <u>\$ 175,043</u> | <u>20,840,532</u> | <u>\$ 21</u> | <u>\$ 2,289</u> | <u>\$ (78,236)</u> | <u>\$ (75,926)</u> |

See accompanying notes to these condensed consolidated financial statements

ALX ONCOLOGY LIMITED
Condensed Consolidated Statements of Cash Flows
(unaudited)
(in thousands)

| | THREE MONTHS ENDED MARCH 31, | |
|---|-------------------------------------|-------------|
| | 2019 | 2020 |
| Operating activities | | |
| Net loss | \$ (4,238) | \$ (5,454) |
| Adjustments to reconcile net loss to net cash used in operating activities: | | |
| Depreciation and amortization expense | 97 | 113 |
| Share-based compensation expense | 76 | 151 |
| Amortization of term loan discount and issuance costs | — | 108 |
| Changes in fair value of compound derivative liability | — | 14 |
| Changes in fair value of Series B convertible preferred shares warrant liability | — | 86 |
| Changes in operating assets and liabilities | — | — |
| Receivables due from related-party | (1,031) | (655) |
| Prepaid expenses and other current assets | 365 | (931) |
| Other assets | — | 7 |
| Accounts payable | 721 | (1,761) |
| Accrued expenses and other current liabilities | 145 | (614) |
| Deferred rent | 4 | (27) |
| Net cash used in operating activities | (3,861) | (8,963) |
| Investing activities | | |
| Purchase of property and equipment | (118) | (10) |
| Net cash used in investing activities | (118) | (10) |
| Financing activities | | |
| Proceeds from related parties for issuance of Series C convertible preferred shares, net of issuance costs of \$6 | — | 68,655 |
| Proceeds from issuance of Series C convertible preferred shares, net of issuance costs of \$3 | — | 36,336 |
| Net cash provided by financing activities | — | 104,991 |
| Net (decrease) increase in cash | (3,979) | 96,018 |
| Cash at beginning of period | 8,262 | 9,017 |
| Cash at end of period | \$ 4,283 | \$ 105,035 |
| Supplemental disclosures | | |
| Cash paid for interest | \$ — | \$ 81 |
| Supplemental disclosure of non-cash investing and financing activities | | |
| Vesting of early exercised share options | \$ 21 | \$ 16 |
| Acquisition of property and equipment in accounts payable | \$ 277 | \$ — |
| Unpaid Series C convertible preferred shares issuance costs | \$ — | \$ 311 |
| Unpaid deferred offering costs | \$ — | \$ 229 |

See accompanying notes to these condensed consolidated financial statements

ALX ONCOLOGY LIMITED
Notes to Condensed Consolidated Financial Statements
(unaudited)

(1) ORGANIZATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Organization

Alexo Therapeutics Limited, or the Company, was initially incorporated in Ireland on March 13, 2015 and changed its name to ALX Oncology Limited on October 11, 2018. The Company is a clinical-stage immuno-oncology company focused on helping patients fight cancer by developing therapies that block the CD47 checkpoint pathway and bridge the innate and adaptive immune system.

The Company owns a direct subsidiary, ALX Oncology Inc., incorporated in the United States, as well as a direct subsidiary incorporated in Malta, Alexo International Holdings Ltd. The Company also has two indirect subsidiaries, Alexo Therapeutics International, incorporated in the Cayman Islands, which is a wholly-owned subsidiary of Alexo International Holdings Ltd. and Sirpant Therapeutics, incorporated in the Cayman Islands, which is a wholly-owned subsidiary of Alexo Therapeutics International, collectively, the Subsidiaries.

Subsequent to the balance sheet date as of March 31, 2020, the Company completed an internal reorganization transaction in April 2020, pursuant to which ALX Oncology Limited became a wholly-owned subsidiary of ALX Oncology Holdings Inc., a newly formed Delaware corporation. As part of the transaction, all of the equity, option and warrant holders of ALX Oncology Limited became equity, option and warrant holders of ALX Oncology Holdings Inc., holding the same number of corresponding shares, options and/or warrants in ALX Oncology Holdings Inc., as they did in the Company immediately prior to the internal reorganization (Note 9).

Basis of Preparation

These condensed consolidated financial statements have been prepared in accordance with accounting principles generally accepted in the United States of America, or U.S. GAAP.

Principles of Consolidation

All intercompany balances and transactions have been eliminated in consolidation.

Unaudited Interim Condensed Consolidated Financial Statements

The condensed consolidated balance sheet as of March 31, 2020 and the condensed consolidated statements of operations and comprehensive loss, condensed consolidated statements of convertible preferred shares and shareholders' deficit and the condensed consolidated statements of cash flows for the three months ended March 31, 2019 and March 31, 2020 are unaudited. These unaudited interim condensed consolidated financial statements have been prepared on the same basis as the annual consolidated financial statements and, in the opinion of management, reflect all adjustments, which include only normal recurring adjustments, necessary to present fairly the Company's financial position as of March 31, 2020 and its results of operations for the periods presented. The results of operations for the three months ended March 31, 2020, are not necessarily indicative of the results to be expected for any subsequent periods, including the year ended December 31, 2020, and therefore should not be relied upon as an indicator of future results. The condensed consolidated balance sheet as of December 31, 2019 included herein was derived from the audited consolidated financial statements as of that date. The accompanying condensed consolidated financial statements and related notes should be read in conjunction with the audited consolidated financial statements for the year ended December 31, 2019 and included elsewhere in this prospectus.

Pro Forma Net Loss Per Share Attributable to Ordinary Shareholders

In contemplation of an initial public offering, or IPO, the Company has presented pro forma basic and diluted net loss per share attributable to ordinary shareholders for the three months ended March 31, 2020.

Pro forma basic net loss per share attributable to ordinary shareholders as of March 31, 2020 is computed to give effect to adjustments to the denominator in the pro forma basic and diluted net loss per share calculation to reflect the conversion of all of the Company's outstanding convertible preferred shares and cumulative dividends into 123,758,558 ordinary shares as if the conversion had occurred as of the beginning of the period or the original date of issuance, if later.

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Pro forma diluted net loss attributable to ordinary shareholders is the same as pro forma basic net loss per share attributable to ordinary shareholders for the period as the impact of any potentially dilutive securities was anti-dilutive, which has been computed to give effect to the adjustment noted above. The pro forma net loss per share attributable to ordinary shareholders does not include proceeds to be received from nor does it include related shares expected to be sold in the assumed IPO.

Need for Additional Capital

Since commencing operations, none of the Company's product candidates have received marketing approval from the U.S. Food and Drug Administration, or FDA, or any other federal, state, local or foreign governmental or regulatory authority and therefore the Company has not generated any revenue from drug product sales. The Company had an accumulated deficit of \$78.2 million as of March 31, 2020 and management does not expect to experience positive cash flows in the foreseeable future. Based on management's current plans, management believes cash and cash equivalents of \$105.0 million as of March 31, 2020 are sufficient to fund operations through at least one year from the date of the issuance of these condensed consolidated financial statements.

Management expects to incur additional losses in the future to conduct product candidate research and development and to conduct pre-commercialization activities and recognizes the need to raise additional capital to fully implement its business plan. The Company intends to raise such capital through the sale of additional equity, debt financings or strategic alliances with third parties. However, there can be no assurance that the Company will be successful in acquiring additional funding at levels sufficient to fund its operations or on terms acceptable to the Company. If the Company is unsuccessful in its efforts to raise additional financing, the Company could be required to significantly reduce operating expenses and delay, reduce the scope of or eliminate some of its development programs or its future commercialization efforts, out-license intellectual property rights to its product candidates and sell unsecured assets, or a combination of the above, any of which may have a material adverse effect on the Company's business, results of operations, financial condition and/or its ability to fund its scheduled obligations on a timely basis or at all.

Use of Estimates

The preparation of condensed consolidated financial statements in conformity with U.S. GAAP requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the condensed consolidated financial statements and the reported amounts of revenues and expenses during the reporting periods. On an ongoing basis, management evaluates its estimates, including those related to the estimated useful lives of long-lived assets, clinical trial accruals, fair value of assets and liabilities, Series B convertible preferred shares warrant liability, term loan compound derivative liability, term loan, valuation of ordinary shares, income taxes and share-based compensation. Management bases its estimates on historical experience and on various other market-specific and relevant assumptions that management believes to be reasonable under the circumstances. Actual results could differ from those estimates.

Cash and Cash Equivalents

The Company holds its cash and cash equivalents in checking and money market accounts. The Company considers all highly liquid investments with original maturities of three months or less from the date of purchase to be cash equivalents. Cash equivalents consist primarily of amounts invested in money market accounts and are stated at fair value.

Concentration of Credit Risk and Other Risks and Uncertainties

Financial instruments that potentially subject the Company to a concentration of credit risk consist primarily of cash and cash equivalents. The Company maintains deposits in federally insured financial institutions in excess of federally insured limits, and invests in money market funds. The Company is exposed to credit risk in the event of default by the financial institutions holding its cash and cash equivalents. The Company has not experienced any losses on its deposits of cash and cash equivalents.

The Company's future results of operations involve a number of other risks and uncertainties. Factors that could affect the Company's future operating results and cause actual results to vary materially from expectations include, but are not limited to, uncertainty of results of clinical trials and reaching milestones, uncertainty of regulatory approval of the Company's potential product candidates, uncertainty of market acceptance of the Company's product candidates, competition from substitute products and larger companies, securing and protecting proprietary technology, strategic relationships and dependence on key individuals or sole-source suppliers.

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The Company's product candidates require approvals from the FDA and comparable foreign regulatory agencies prior to commercial sales in their respective jurisdictions. There can be no assurance that any product candidates will receive the necessary approvals. If the Company was denied approval, approval was delayed or the Company was unable to maintain approval for any product candidate, it could have a materially adverse impact on the Company.

Property and Equipment

Property and equipment are stated at cost less accumulated depreciation. Depreciation of property and equipment is provided using the straight-line method over the estimated useful lives of the assets (Note 3). Upon sale or retirement of assets, the cost and related accumulated depreciation or amortization are removed from the condensed consolidated balance sheet and the resulting gain or loss is reflected in the condensed consolidated statement of operations and comprehensive loss. Maintenance and repairs are charged to the condensed consolidated statement of operations and comprehensive loss as incurred.

The useful lives of the property and equipment are as follows:

| | |
|------------------------------------|---|
| Research and development equipment | 5 years |
| Furniture and office equipment | 5 years |
| Computer equipment | 3 years |
| Software | 3 years |
| Leasehold improvements | Shorter of 7 years or remaining of lease term |

Deferred Offering Costs

The Company capitalizes certain legal, professional accounting and other third-party fees that are directly associated with in-process equity financings as deferred offering costs until such financings are consummated. After consummation of the equity financing, these costs are recorded in shareholders' deficit as a reduction of additional paid-in capital generated as a result of the offering. Should the in-process equity financing be abandoned, the deferred offering costs will be expensed immediately as a charge to operating expenses in the consolidated statements of operations and comprehensive loss. As of March 31, 2020, \$0.2 million of deferred offering costs were capitalized and recorded as other assets on the condensed consolidated balance sheet.

Impairment of Long-Lived Assets

The Company reviews property and equipment for impairment whenever events or changes in circumstances indicate that the carrying amount of an asset may not be recoverable. Recoverability is measured by comparison of the carrying amount to the future undiscounted net cash flows which the asset or asset group are expected to generate. If such assets are considered to be impaired, the impairment to be recognized is measured as the amount by which the carrying amount of the assets exceeds its fair value. Fair value is determined using various valuation techniques including discounted cash flow models, quoted market values and third-party independent appraisals, as considered necessary. There were no impairment charges recognized in the three months ended March 31, 2019 and March 31, 2020.

Fair Value of Financial Instruments

The Company applies fair value accounting for all financial assets and liabilities and nonfinancial assets and liabilities that are required to be recognized or disclosed at fair value in the condensed consolidated financial statements. The Company defines fair value as the price that would be received from selling an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. Where observable prices or inputs are not available valuation models are applied. These valuation techniques involve some level of management estimation and judgment, the degree of which is dependent on the price transparency for the instruments or market and the instruments' complexity.

The Company's financial instruments consist of cash and cash equivalents, receivables due from related-party, accounts payable, the term loan compound derivative liability and the Series B convertible preferred shares warrant liability. The term loan compound derivative liability and the Series B convertible preferred shares warrant liability are re-measured at the end of every period and carried at fair value (Note 2). The recorded value of the Company's receivables due from related-party and accounts payable approximates its current fair value due to the relatively short-term nature of these items.

Term Loan

The Company accounts for the Loan and Security Agreement, dated as of December 20, 2019, with Silicon Valley Bank, and WestRiver Innovation Lending Fund VIII, LP, collectively as lenders, and Silicon Valley Bank, as administrative agent and collateral agent, as a liability measured at net proceeds less debt discount and is accreted to the face value of the term loan over its expected term using the effective interest method. The Company considers whether there are any embedded features in its debt instruments that require bifurcation and separate accounting as derivative financial instruments pursuant to Accounting Standards Codification, or ASC, Topic 815, *Derivatives and Hedging*.

Convertible Preferred Shares

The Company records convertible preferred shares net of issuance costs on the dates of issuance, which represents the carrying value. In the event of a change of control of the Company, proceeds will be distributed in accordance with the liquidation preferences set forth in its Constitution unless the holders of convertible preferred shares have converted their convertible preferred shares into ordinary shares. Convertible preferred shares are classified outside of shareholders' deficit on the accompanying condensed consolidated balance sheets as events triggering the liquidation preferences are not solely within the Company's control. The Company has elected not to adjust the carrying values of the convertible preferred shares to the liquidation preferences of such shares because of the uncertainty of whether or when such an event would occur.

Series B Convertible Preferred Shares Warrant Liability

The Company has issued freestanding warrants to purchase its Series B convertible preferred shares. Freestanding warrants for the Company's convertible preferred shares that are classified outside of permanent equity are recorded at fair value, and are subject to re-measurement at each balance sheet date until the earlier of the exercise of the warrants or the completion of a liquidation event, including the completion of an initial public offering. Upon exercise, the Series B convertible preferred shares warrant liability would be reclassified to additional paid-in capital, with any change in fair value recognized as a component of other income (expense), net.

Revenue Recognition

To date, the Company has derived revenue from providing research and development services on a time and materials basis to a related-party. The Company recognizes such revenues over time as services are delivered, and invoices the customer as the work is incurred in arrears.

Effective January 1, 2018, the Company adopted ASC Topic 606, *Revenue from Contracts with Customers* (Topic 606) on a full retrospective basis. This standard applies to all contracts with customers, except for contracts that are within the scope of other standards, such as leases, insurance, collaboration arrangements and financial instruments. In accordance with Topic 606, the Company recognizes revenue when its customer obtains control of promised goods or services, in an amount that reflects the consideration which the Company expects to receive in exchange for those goods or services.

To determine revenue recognition for arrangements that the Company determines are within the scope of Topic 606, the Company performs the following five steps: (i) identify the contract(s) with a customer; (ii) identify the performance obligations in the contract; (iii) determine the transaction price; (iv) allocate the transaction price to the performance obligations in the contract; and (v) recognize revenue when (or as) the Company satisfies a performance obligation.

As part of the Company's consideration as to whether the Company has entered into a contract with a customer, it considers whether it is probable that it will collect the consideration it is entitled to in exchange for the goods and services it transfers to the customer. At contract inception, the Company assesses the goods or services promised within each contract that falls under the scope of Topic 606, determines those that are performance obligations, and assesses whether each promised good or service is distinct. The Company then recognizes as revenue the amount of the transaction price that is allocated to the respective performance obligation when (or as) the performance obligation is satisfied.

Cost of Services for Related-Party Revenue

The Company incurs costs associated with related-party services including direct labor and associated employee benefits, laboratory supplies, and other expenses. These costs are recorded in cost of services for related-party revenue as a component of total operating expenses in the accompanying condensed consolidated statements of operations and comprehensive loss.

Clinical and Manufacturing Accruals

The Company records accruals for estimated costs of research, preclinical studies and clinical trials, and manufacturing development, which are a significant component of research and development expenses. A substantial portion of the Company's ongoing research and development activities are conducted by third-party service providers, including contract research organizations, or CROs, and contract manufacturing organizations, or CMOs. The Company's contracts with CROs generally include pass-through fees such as regulatory expenses, investigator fees, travel costs and other miscellaneous costs, including shipping and printing fees. The financial terms of these contracts are subject to negotiations, which vary from contract to contract and may result in payment flows that do not match the periods over which materials or services are provided to the Company under such contracts. The Company accrues the costs incurred under agreements with these third parties based on estimates of actual work completed in accordance with the respective agreements. The Company determines the estimated costs through discussions with internal personnel and external service providers as to the progress or stage of completion of the services and the agreed-upon fees to be paid for such services.

The Company makes significant judgments and estimates in determining the accrual balance at the end of each reporting period. As actual costs become known, the Company adjusts its accruals. Although the Company does not expect its estimates to be materially different from amounts actually incurred, the Company's understanding of the status and timing of services performed relative to the actual status and timing of services performed may vary and could result in the Company reporting amounts that are too high or too low in any particular period. To assist in its estimates the Company relies upon the receipt of timely and accurate reporting from information provided as part of its clinical and non-clinical studies and other third-party vendors. Through March 31, 2020, there have been no material differences from the Company's accrued estimated expenses to the actual clinical trial expenses. However, variations in the assumptions used to estimate accruals, including, but not limited to, the number of patients enrolled, the rate of patient enrollment, and the actual services performed, and related costs may vary from the Company's estimates, resulting in adjustments to clinical trial expense in future periods. Changes in these estimates that result in material changes to the Company's accruals could materially affect its financial position and results of operations.

Net Loss Per Share Attributable to Ordinary Shareholders

Basic net loss per share is calculated by dividing the net loss attributable to ordinary shareholders by the weighted-average number of ordinary shares outstanding during the period, without consideration for ordinary share equivalents. Net preferred share dividends. Diluted net loss per share is the same as basic net loss per share, since the effects of potentially dilutive securities are antidilutive given the net loss for each period presented.

The Company applies the two-class method to compute basic and diluted net loss per share when it has issued shares that meet the definition of participating securities. The two-class method determines net loss per share for each class of ordinary and participating securities according to dividends declared or accumulated and participation rights in undistributed earnings. The two-class method requires net loss available to ordinary shareholders for the period to be allocated between ordinary and participating securities based upon their respective rights to share in the earnings as if all net loss for the period had been distributed. The Company's convertible preferred shares participate in any dividends declared by the Company and are therefore considered to be participating securities. The participating securities are not required to participate in the losses of the Company, and therefore during periods of loss there is no allocation required under the two-class method.

Recent Accounting Pronouncements

From time to time, new accounting pronouncements are issued by the Financial Accounting Standards Board, or FASB, or other standard setting bodies and adopted by the Company as of the specified effective date. Unless otherwise discussed, the impact of recently issued standards that are not yet effective will not have a material impact on the Company's financial position or results of operations upon adoption.

In February 2016, the FASB issued ASU No. 2016-02 (Topic 842), *Leases* (ASU 2016-02). ASU 2016-02 requires an entity to recognize assets and liabilities arising from a lease for both financing and operating leases. ASU No. 2016-02 will also require new qualitative and quantitative disclosures to help investors and other financial statement users better understand the amount, timing, and uncertainty of cash flows arising from leases. In June 2020, the FASB issued ASU No. 2020-05, which extends the effective date of ASU No. 2016-02 for

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non-public business entities, including smaller reporting companies, to fiscal years beginning after December 15, 2021. The new standard is effective for the Company beginning January 1, 2022. Early adoption is permitted. The Company is currently evaluating the effects of the adoption of this guidance on its condensed consolidated financial statements and related disclosures.

In December 2019, the FASB issued ASU No. 2019-12, Income Taxes (Topic 740): Simplifying the Accounting for Income Taxes, which is intended to simplify various aspects related to accounting for income taxes. The pronouncement is effective for fiscal years, and for interim periods within those fiscal years, beginning after December 15, 2021. ASU 2019-12 is effective for the Company beginning January 1, 2022. Early adoption is permitted. The Company is currently in the process of evaluating the effects of the adoption of this guidance on the Company's financial statements and does not expect it to have a material impact on its condensed consolidated financial statements.

New Accounting Pronouncements Recently Adopted

In June 2016, the FASB issued ASU No. 2016-13, Financial Instruments-Credit Losses (Topic 326), which requires entities to measure all expected credit losses for financial assets held at the reporting date based on historical experience, current conditions, and reasonable and supportable forecasts. This replaces the existing incurred loss model and is applicable to the measurement of credit losses on financial assets measured at amortized cost. The Company adopted this guidance on January 1, 2020. The adoption of this guidance did not have a material impact on the Company's condensed consolidated financial statements.

In September 2018, the FASB issued ASU No. 2018-13, Fair Value Measurement (Topic 820): Disclosure Framework—Changes to the Disclosure Requirements for Fair Value Measurement. The FASB issued final guidance that eliminates, adds and modifies certain disclosure requirements for fair value measurements as part of its disclosure framework project. Under the ASU, entities will no longer be required to disclose the amount of transfers between Level 1 and Level 2 of the fair value hierarchy. Public companies will be required to disclose changes in unrealized gains and losses for the period included in other comprehensive income for recurring Level 3 fair value measurements held at the end of the reporting period and the range and weighted average used to develop significant unobservable inputs for Level 3 fair value measurements. ASU 2018-13 is effective for public business entities for annual reporting periods, and interim periods within those annual periods, beginning after December 15, 2019, with early adoption permitted. The Company adopted this guidance on January 1, 2020. The adoption of ASU 2018-13 did not have a material impact on its condensed consolidated financial statements.

(2) FAIR VALUE OF FINANCIAL INSTRUMENTS

The fair value of the Company's financial assets and liabilities are determined in accordance with the fair value hierarchy established in ASC Topic 820, Fair Value Measurements and Disclosures. ASC Topic 820 defines fair value as the exchange price that would be received for an asset or paid to transfer a liability (an exit price) in the principal or most advantageous market for the asset or liability in an orderly transaction between market participants on the measurement date. The fair value hierarchy of ASC Topic 820 requires an entity to maximize the use of observable inputs when measuring fair value and classifies those inputs into three levels:

Level 1—Observable inputs, such as quoted prices in active markets

Level 2—Inputs, other than the quoted prices in active markets, which are observable either directly or indirectly such as quoted prices for similar assets or liabilities; quoted prices in markets that are not active; or other inputs that are observable or can be corroborated by observable market data for substantially the full term of the instrument's anticipated life

Level 3—Unobservable inputs in which there is little or no market data, which require the reporting entity to develop its own assumptions

The Company's financial instruments consist primarily of cash, cash equivalents, Series B convertible preferred shares warrant liability, and a term loan compound derivative liability.

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Cash and cash equivalents are reported at their respective fair values on the Company's condensed consolidated balance sheets. Where quoted prices are available in an active market, securities are classified as Level 1. The Company classifies money market funds as Level 1. When quoted market prices are not available for the specific security, then the Company estimates fair value by using quoted prices for identical or similar instruments in markets that are not active and model-based valuation techniques for which all significant inputs are observable in the market or can be corroborated by observable market data for substantially the full term of the assets. Where applicable, these models project future cash flows and discount the future amounts to a present value using market-based observable inputs obtained from various third-party data providers, including but not limited to benchmark yields, reported trades and broker/dealer quotes. Where applicable the market approach utilizes prices and information from market transactions for similar or identical assets.

The Company measures its Series B convertible preferred shares warrant liability and term loan compound derivative liability at fair value on a recurring basis and these are classified as Level 3 liabilities. The fair value of the Series B preferred shares warrant liability was determined using an option-pricing model. The Company calculated the fair value of the term loan compound derivative liability by computing the difference between the fair value of the term loan with the compound derivative using the "with and without" method under the income approach, and the fair value of the term loan without the compound derivative. The valuation methodology and underlying assumptions are discussed further in Note 4.

The following table sets forth the Company's financial liabilities that are measured at fair value on a recurring basis by level within the fair value hierarchy (in thousands):

| | AS OF MARCH 31, 2020 | | | FAIR VALUE |
|-------------------------------|----------------------|---------|---------|------------|
| | LEVEL 1 | LEVEL 2 | LEVEL 3 | |
| Financial assets | | | | |
| Cash equivalents | | | | |
| Money market funds | \$90,067 | — | — | \$ 90,067 |
| Financial liabilities | | | | |
| Long term liabilities | | | | |
| Compound derivative liability | \$ — | — | 65 | \$ 65 |
| Warrant liability | \$ — | — | 447 | \$ 447 |

| | AS OF DECEMBER 31, 2019 | | | FAIR VALUE |
|-------------------------------|-------------------------|---------|---------|------------|
| | LEVEL 1 | LEVEL 2 | LEVEL 3 | |
| Financial liabilities | | | | |
| Long term liabilities | | | | |
| Compound derivative liability | \$ — | — | 51 | \$ 51 |
| Warrant liability | \$ — | — | 361 | \$ 361 |

The following tables are a reconciliation of all financial liabilities measured at fair value using Level 3 unobservable inputs (in thousands):

| | WARRANT LIABILITY | DERIVATIVE LIABILITY |
|---------------------------------|-------------------|----------------------|
| Balance as of December 31, 2019 | \$ 361 | \$ 51 |
| Change in market value | 86 | 14 |
| Balance as of March 31, 2020 | <u>\$ 447</u> | <u>\$ 65</u> |

The Company did not have any outstanding financial assets or liabilities to be re-measured on a recurring basis as of March 31, 2019. There were no transfers of assets or liabilities between the fair value measurement levels during the year ended December 31, 2019 and the three months ended March 31, 2020.

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Term Loan

The estimated fair value of the Term Loan was \$5.6 million as of March 31, 2020 which approximates the carrying value and is classified as Level 3. The Company utilized a market yield analysis and income approach to estimate a value for the Term Loan. The key valuation assumptions used consist of the discount rate of 17.5% and the probability of the occurrence of a change in control event of 10.0%

(3) BALANCE SHEET COMPONENTS

Property and Equipment, Net

The following table presents the components of property and equipment, net as of December 31, 2019 and March 31, 2020 (in thousands):

| | DECEMBER 31, 2019 | MARCH 31, 2020 |
|---|----------------------|-------------------|
| Computer hardware and software | \$ 146 | \$ 157 |
| Machinery and equipment | 1,698 | 1,698 |
| Furniture and fixtures | 36 | 36 |
| Leasehold improvements | 429 | 429 |
| Construction in progress | — | — |
| Less: accumulated depreciation and amortization | (1,449) | (1,563) |
| Total property and equipment, net | <u>\$ 860</u> | <u>\$ 757</u> |

Depreciation and amortization expense was \$0.1 million for the three months ended March 31, 2019 and March 31, 2020, respectively.

Accrued Expenses and Other Current Liabilities

The following table presents the components of accrued expenses and other current liabilities as of December 31, 2019 and March 31, 2020 (in thousands):

| | DECEMBER 31, 2019 | MARCH 31, 2020 |
|---------------------------------|----------------------|-------------------|
| Payroll and related liabilities | \$ 60 | \$ 114 |
| Accrued bonus | 864 | 301 |
| Accrued legal costs | 122 | 496 |
| Early exercise liability | 27 | 11 |
| Other | 163 | 224 |
| Total accrued liabilities | <u>\$ 1,236</u> | <u>\$ 1,146</u> |

(4) TERM LOAN

The Company and its wholly-owned subsidiaries Alexo Therapeutics International and Sirpant Therapeutics, as borrowers, entered into a Loan and Security Agreement, or the Loan Agreement, dated as of December 20, 2019, with Silicon Valley Bank, or SVB, and WestRiver Innovation Lending Fund VIII, LP, or WestRiver, collectively as lenders, and SVB, as administrative agent and collateral agent. The Loan Agreement provides for term loans in an aggregate principal amount of up to \$10.0 million funded in two tranches, subject to the satisfaction of a certain milestone. The first tranche, in the amount of \$6.0 million, was funded on the closing date of the Loan Agreement in December 2019. A second tranche of \$4.0 million was available on or before March 31, 2020, upon the Company's achievement of an equity financing resulting in net cash proceeds in an amount of at least \$30.0 million to the Company. The Company elected not to draw down on the second tranche, which is no longer available.

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The loans under the Loan Agreement bear interest at a floating per annum interest rate equal to the greater of 7.0% or 2.0% plus the prime rate as reported in The Wall Street Journal. The Wall Street Journal prime rate was 3.25% as of March 31, 2020. Therefore, the rate applicable to the Company as of March 31, 2020 was 7.0%.

The Company is required to make interest-only payments for the first 12 months after the closing of the Loan Agreement, followed by consecutive equal monthly payments of principal and interest commencing on January 1, 2021 and continuing through the maturity date of September 1, 2022. The Loan Agreement also provides for a final payment equal to 6.0% multiplied by the aggregate principal amount of the term loans funded, which is due on the maturity date, upon the acceleration of the term loans, or upon prepayment of the term loans. If the Company elects to prepay the term loans, there is also a prepayment fee of between 1.0% and 3.0% of the principal amount being prepaid depending on the timing and circumstances of prepayment.

In conjunction with the Loan Agreement, the Company has issued warrants to purchase 403,348 Series B convertible preferred shares to SVB and WestRiver with an exercise price of \$1.4432 per share. The estimated fair value of the warrants at the date of issuance was approximately \$0.4 million. The fair value of the Series B convertible preferred shares warrant liability was determined using the Black-Scholes option-pricing model. As of March 31, 2020, the various assumptions used in the option-pricing model were time to liquidity of 2.0 to 9.7 years, volatility of 97.4% and risk-free rate of 0.4%. It was recorded at its fair value at inception and is being re-measured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the accompanying condensed consolidated statement of operations and comprehensive loss. As of March 31, 2020, the fair value of the Series B convertible preferred shares warrant liability was approximately \$0.4 million and was recorded in other long-term liabilities on the condensed consolidated balance sheets.

The loans under the Loan Agreement are secured by substantially all of the Company's assets, except the Company's intellectual property, which is the subject of a negative pledge.

The Company determined that certain loan features were embedded derivatives requiring bifurcation and separate accounting. Those embedded derivatives were bundled together as a single, compound embedded derivative and then bifurcated and accounted for separately from the host contract. The Company recorded a term loan compound derivative liability of approximately \$51,000 which will be marked-to-market in future periods. The Company calculated the fair value of the compound derivative by computing the difference between the fair value of the term loan with the compound derivative using the "with and without" method under the income approach, and the fair value of the term loan without the compound derivative. The Company calculated the fair values using a probability-weighted discounted cash flow analysis. The key valuation assumptions used consist of the discount rate and the probability of the occurrence of a change in control event. The term loan compound derivative liability is being re-measured at each financial reporting period with any changes in fair value being recognized as a component of other income (expense), net in the condensed consolidated statement of operations and comprehensive loss. As of March 31, 2020, the fair value of the compound derivative liability was approximately \$65,000 and was recorded in other long-term liabilities on the condensed consolidated balance sheets.

The fair value of Series B convertible preferred shares warrant liability at issuance, fair value of embedded derivatives which were bifurcated and other debt issuance costs have been treated as debt discounts on the Company's condensed consolidated balance sheet and together with the final payment are being amortized to interest expense throughout the life of the term loan using the effective interest rate method.

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As of March 31, 2020, there were unamortized issuance costs and debt discounts of \$0.5 million, which were recorded as a direct deduction from the term loan on the condensed consolidated balance sheet. Interest expense for the term loan was \$0.2 million for the three months ended March 31, 2020. Future payments of principal and interest as of March 31, 2020 is as follows (in thousands):

| Years ending December 31: | |
|---|----------------|
| 2020 (remaining 9 months) | \$ 321 |
| 2021 | 3,743 |
| 2022 | 3,007 |
| | <u>7,071</u> |
| Less: amount representing interest | \$ (711) |
| Less: amount representing final payment | (360) |
| Long-term debt, gross | 6,000 |
| Less: unamortized issuance costs and debt discounts | (471) |
| Less: current portion | (857) |
| Long-term portion of term loan | <u>\$4,672</u> |

(5) CAPITAL STRUCTURE

Ordinary Shares

Ordinary shares reserved for future issuance, on an as if converted basis, as of December 31, 2019 and March 31, 2020, consists of the following:

| | <u>DECEMBER 31,</u> <u>2019</u> | <u>MARCH 31,</u> <u>2020</u> |
|--|------------------------------------|---------------------------------|
| Convertible preferred shares, issued and outstanding | 67,871,229 | 140,626,218 |
| Stock options issued and outstanding | 7,789,923 | 21,063,923 |
| Stock options authorized for future issuance | 3,730,445 | 1,277,036 |
| Warrants issued and outstanding | 403,348 | 403,348 |
| Warrants authorized for future issuance | 201,674 | 201,674 |
| Total | <u>79,996,619</u> | <u>163,572,199</u> |

Convertible Preferred Shares

As of December 31, 2019 and March 31, 2020, the Company's convertible preferred shares consisted of the following (in thousands, except share amounts):

| | <u>DECEMBER 31, 2019</u> | | | |
|---------------------------------------|------------------------------------|--|----------------------------------|---|
| | <u>AUTHORIZED</u> <u>SHARES</u> | <u>SHARES</u> <u>ISSUED AND</u> <u>OUTSTANDING</u> | <u>NET</u> <u>PROCEEDS(1)</u> | <u>AGGREGATE</u> <u>LIQUIDATION</u> <u>PREFERENCE</u> |
| Shares designated as: | | | | |
| Series A convertible preferred shares | 62,000,000 | 61,180,500 | \$ 60,933 | \$ 73,571 |
| Series B convertible preferred shares | 14,117,822 | 6,690,729 | 9,430 | 10,014 |
| Total | <u>76,117,822</u> | <u>67,871,229</u> | <u>\$ 70,363</u> | <u>\$ 83,585</u> |

| | MARCH 31, 2020 | | | |
|---------------------------------------|----------------------|-------------------------------------|--------------------|--|
| | AUTHORIZED SHARES | SHARES ISSUED AND OUTSTANDING | NET PROCEEDS(1) | AGGREGATE LIQUIDATION PREFERENCE |
| Shares designated as: | | | | |
| Series A convertible preferred shares | 61,180,500 | 61,180,500 | \$ 60,933 | \$ 74,476 |
| Series B convertible preferred shares | 7,295,752 | 6,690,729 | 9,430 | 10,158 |
| Series C convertible preferred shares | 72,754,989 | 72,754,989 | 104,680 | 105,934 |
| Total | 141,231,241 | 140,626,218 | \$ 175,043 | \$ 190,568 |

In February 2020, the company entered into a Series C Preferred Shares Purchase Agreement, or the Series C Agreement, with certain existing investors, employees and new investors, or collectively, the Series C Investors. Under the terms of the Series C Agreement, the Company authorized the sale and issuance of up to 72,754,989 of the Company's Series C convertible preferred shares at a purchase price of \$1.4432 per share. As of March 31, 2020, a total of 72,754,989 shares had been purchased with gross proceeds of \$105.0 million. The gross proceeds of \$105.0 million were reduced by total issuance costs incurred of \$0.3 million.

As of March 31, 2020, the holders of the convertible preferred shares had the following rights and preferences (in thousands, except share amounts):

Dividend Provisions—Cumulative dividends of 6.0% per annum of the original issue price for each Preferred Shares series are payable when and as declared by the Company's Board of Directors, or Board of Directors, upon the occurrence of a liquidation event or upon a contingent mandatory conversion of the Preferred Shares in connection with a qualified initial public offering as described below. The Series A original issue price is \$1.00, and the Series B and Series C original issue price is \$1.4432. The original issue price is subject to adjustment in the event of any share dividend, share split, combination, consolidation or other recapitalization. The dividends shall accrue from day to day from the issue date of such Preferred Shares whether or not declared and shall be cumulative. In addition, the Preferred Shares participate on an as-converted basis in any dividends payable to ordinary shareholders. As of March 31, 2020, cumulative dividends were \$14.7 million. No dividends have been declared or paid since the issuance of convertible preferred shares through March 31, 2020.

Liquidation—In the event of liquidation, dissolution or winding up of the Company, merger or a reduction of capital through the sale or lease of all or substantial part of the business of the Company, before any distribution or payment shall be made to the holders of ordinary shares, the holders of Preferred Shares shall be entitled to be paid an amount in cash equal to the original issue price (subject to adjustment in the event of any share dividend, share split, combination, or other recapitalization) plus all dividends accumulated and unpaid thereon. First, the holders of the Preferred Shares are paid in full the amounts specified in the immediately preceding sentence on a pro-rata basis; then, after holders of the Preferred Shares are satisfied, any remaining amounts shall be distributed on a pro-rata basis to the holders of the Preferred Shares (calculated on an as converted basis) and the ordinary shares.

Voting Rights—On any matter presented to the shareholders of the Company, each holder of outstanding Preferred Shares shall be entitled to cast the number of votes equal to the number of whole ordinary shares into which the Preferred Shares held by such holder are convertible. The holders of Preferred Shares shall vote together with the holders of ordinary shares as a single class. Additionally, the Company must receive approval of holders of at least two-third of the voting rights then held in aggregate by the holders of the Preferred Shares in issue on an as-converted basis in order to effect certain corporate actions. Four investors have contractual rights to elect four out of six board members.

Optional Conversion at Holders' Option—Each share of Preferred Shares shall be convertible, at the option of the holder, at any time and from time to time, into such number of fully paid and non-assessable ordinary shares as is determined by dividing the original issue price by the Applicable Conversion Price. The Applicable Conversion Price for each series of Preferred Shares is currently equal to the original issue price for such series. Upon conversion, the

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holders shall also receive only declared but as yet unpaid dividends. Note only holders of Preferred Shares receive declared and unpaid dividends; preferred shareholders who chose to convert prior to the declaration of such dividends are not entitled to receive accumulated dividends.

Contingent Mandatory Conversion—Upon the closing of the first underwritten public offering pursuant to an effective registration statement under the Securities Act of 1933, as amended, or pursuant to a corresponding securities issuance application process in any non-U.S. jurisdiction, covering the offer and sale of the Company's ordinary shares in which the gross cash proceeds to the Company (before underwriting discounts, commissions and fees) are at least \$50.0 million for each series of Preferred Shares then all outstanding Preferred Shares shall automatically be converted into a number of ordinary shares, at a conversion rate determined by dividing the applicable original price of such Preferred Shares by the applicable conversion price of such Preferred Shares. Upon conversion, the holders shall also receive any cumulative and unpaid dividends, whether or not declared as conversion ordinary shares at the same conversion rate for the applicable Preferred Shares.

Down-Round Antidilution Protection—In the event the Company issues its ordinary shares without consideration or for consideration per share that is less than the conversion price in effect for each series of the Preferred Shares, then the conversion price for that series shall be reduced in order to increase the number of ordinary shares into which such series of Preferred Shares is convertible to.

(6) LICENSE AGREEMENT

Exclusive (Equity) Agreement with The Board of Trustees of the Leland Stanford Junior University

In March 2015, the Company entered into a license agreement, or the Stanford Agreement, with the Board of Trustees of the Leland Stanford Junior University, or Stanford, under which the Company obtained a worldwide, royalty-bearing, sublicensable license under certain patents relating to the Company's current product candidates, to develop, manufacture and commercialize products for use in certain licensed fields, the scope of which would include the application of the licensed intellectual property in oncology. The license granted to the Company in the Stanford Agreement includes an exclusive grant, subject to certain pre-existing non-exclusive or exclusive rights that Stanford retained for grant to third parties with respect to certain categories of the licensed patents in certain fields of use and retained rights by Stanford and all other nonprofit institutions to use and practice the licensed patents and technology for internal research and other nonprofit purposes. The license granted to the Company in the Stanford Agreement also includes non-exclusive grants to certain Stanford patents.

In consideration for the rights granted to the Company under the Stanford Agreement, the Company paid Stanford a nonrefundable license royalty and reimbursed Stanford for past patent expenses, together totaling less than \$0.1 million, and granted Stanford a specified number of ordinary shares of the Company. In addition, the Company is obligated to pay Stanford ongoing patent expenses and an annual license maintenance fee, which are nominal and will be creditable against any royalties payable to Stanford in the applicable year. The Company is required to make milestone payments up to a specified aggregate amount in respect of a specified number of licensed products that successfully satisfy certain clinical and regulatory milestones. No milestone payments have been made through March 31, 2020. The Company also agreed to pay Stanford tiered royalties on a specified percentage of net sales made by the Company, its affiliates and its sublicensees of licensed products at rates ranging within low single-digit percentages, subject to certain reductions and offsets. The license, on a licensed product-by-licensed product and country-by-country basis, shall become royalty-free and fully paid-up upon the later of the date on which the last valid claim included in the exclusively or non-exclusively licensed patents expires and ten years after the first commercial sale of the licensed product in such country.

The Company may terminate the Stanford Agreement, on a licensed product-by-licensed product basis, at any time for any reason by providing at least 60 days' written notice to Stanford. Stanford may terminate the Stanford Agreement, if the Company is in breach of any provision of the Stanford Agreement and fail to remedy such breach within 60 days after written notice of such breach by Stanford. In addition, Stanford has the right to terminate the Stanford Agreement, on a licensed product-by-licensed product basis, if the Company is not diligently developing and commercializing such licensed product under certain conditions or if the Company fails to achieve specified development milestones for such licensed product by certain dates, subject to the Company's extension rights.

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Commercial License Agreement with Selexis SA

In June 2016, the Company entered into a license agreement with Selexis SA, or Selexis, under which the Company obtained a worldwide, royalty-bearing, sublicensable license under certain patents, know-how and other intellectual property, to use Selexis generated cell lines to manufacture ALX148 and to make, use and sell licensed product containing such compound in all fields of use. The rights granted under this agreement include the rights to grant sublicenses to contractors or other collaboration partners, in each case to develop production processes or manufacture licensed product containing ALX148.

In consideration for the rights granted to the Company under the agreement, the Company paid Selexis a nominal one-time fee and will pay Selexis an annual maintenance fee. The Company also agreed to pay Selexis milestone payments in respect of each licensed product developed and/or commercialized under the grant that successfully satisfies certain milestone events. The Company also agreed to pay Selexis a flat royalty of a very low single-digit percentage on net sales made by the Company, its affiliates and sublicensees of products. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the passing of ten years after the first commercial sale of the product in such country, or the Company's exercise of the royalty buyout option exercisable at any time prior to the first commercial sale of a licensed product.

The Company may terminate the license agreement at any time for any reason with at least 60 days' written notice to Selexis. Either party may terminate the license agreement if the other party enters into a bankruptcy event or in the event of a material breach of the agreement (that cannot be cured or remains uncured for 60 days after the date that the defaulting party is provided with written notice of such breach). The Company's obligations to pay royalties that are accrued or accruable will survive any termination of the agreement, and in certain circumstances the licenses granted under the agreement will terminate unless they have become fully paid up as described in the previous paragraph.

Commercial Antibody Agreement with Crystal Bioscience Inc. (Now a Subsidiary of Ligand Pharmaceuticals Incorporated)

In March 2017, the Company entered into an agreement with Crystal Bioscience Inc. (now a subsidiary of Ligand Pharmaceuticals Incorporated), or Crystal, under which the Company obtained an assignment of certain patents, covering certain SIRPa antibodies. Under this agreement, the Company also received a worldwide, royalty-bearing non-exclusive license, with the right to grant sublicenses through multiple tiers of sublicenses, under certain of Crystal's background patents and know-how necessary to commercialize the rights under the assigned patents.

In consideration for the rights granted to the Company under the agreement, it agreed to pay Crystal milestone payments up to \$11.1 million in respect of all licensed products developed under the assigned patents, that successfully satisfy certain clinical and regulatory milestones, each milestone being paid only once for all products. The Company also agreed to pay Crystal tiered royalties on net sales made by the Company, its affiliates and sublicensees of products at rates ranging within low single-digit percentages, subject to certain potential reductions. This royalty obligation, on a product-by-product and country-by-country basis, shall terminate and become fully paid-up upon the later of the date on which the last valid claim included in the licensed patents expires and ten years after the first commercial sale of the product in such country.

The Company agreed to use commercially reasonable efforts to develop and commercialize licensed products, including meeting defined development milestones by certain specified dates.

The Company may terminate the agreement at any time for any reason with at least 60 days' written notice to Crystal. Either party may terminate the agreement if the other party enters into a bankruptcy event or in the event of material breach of the agreement (that remains uncured for 60 days after the date that it is provided with written notice of such breach). The Company's obligations to pay royalties and milestone payments which accrued pre-termination or accrue post-termination will survive any termination.

(7) RELATED-PARTY TRANSACTIONS*Related-Party Revenue*

In June 2018, the Company entered into a Research and Development Services Agreement, or Tollnine Agreement, with Tollnine, Inc., or Tollnine, a related-party of the Company, to provide research and development services to Tollnine. The Company's Chief Executive Officer was also the Chief Executive Officer of Tollnine until April 2020 and two of the Company's investors are also investors in Tollnine. As such, Tollnine was deemed to be a related-party. The Tollnine Agreement has an initial term of 3 years, to be automatically renewed for additional one-year terms unless terminated by either party. The services are to be provided at a price based on the costs incurred by the Company plus a mark-up equal to 10% of such costs. The Company recognizes revenue when Tollnine, as the Company's customer, obtains control of promised goods or services, in an amount that reflects the consideration which the Company expects to receive in exchange for those goods or services. For the three months ended March 31, 2019 and March 31, 2020, the Company recognized related-party revenues of \$1.0 million and \$0.7 million, respectively, under the Tollnine Agreement.

Receivables due from Related-party

As of December 31, 2019 and March 31, 2020, the Company had outstanding related-party receivables from Tollnine of \$0.5 million and \$1.2 million, respectively.

(8) NET LOSS PER SHARE ATTRIBUTABLE TO ORDINARY SHAREHOLDERS AND PRO FORMA NET LOSS PER SHARE

The following table sets forth the computation of the basic and diluted net loss per share attributable to ordinary shareholders (in thousands, except share and per share data):

| | THREE MONTHS ENDED | |
|---|--------------------|-------------------|
| | MARCH 31, | |
| | 2019 | 2020 |
| Numerator: | | |
| Net loss | \$ (4,238) | \$ (5,454) |
| Less: cumulative preferred dividends allocated to preferred shareholders | (905) | (1,983) |
| Net loss attributable to ordinary shareholders | <u>\$ (5,143)</u> | <u>\$ (7,437)</u> |
| Denominator: | | |
| Weighted-average ordinary shares outstanding | 19,749,549 | 20,684,025 |
| Net loss per share attributable to ordinary shareholders, basic and diluted | <u>\$ (0.26)</u> | <u>\$ (0.36)</u> |

Since the Company was in a loss position for all periods presented, basic net loss per share is the same as diluted net loss per share for all periods as the inclusion of all potential ordinary shares outstanding would have been anti-dilutive. Potentially dilutive securities that were not included in the diluted per share calculations as of March 31, 2019 and March 31, 2020 because they would be anti-dilutive were as follows:

| | MARCH 31, | |
|--|-------------------|--------------------|
| | 2019 | 2020 |
| Series A convertible preferred shares | 61,180,500 | 61,180,500 |
| Series B convertible preferred shares | — | 6,690,729 |
| Series C convertible preferred shares | — | 72,754,989 |
| Warrants to purchase Series B convertible preferred shares | — | 403,348 |
| Ordinary shares subject to repurchase | 951,041 | 113,854 |
| Options issued and outstanding | 6,080,869 | 21,063,923 |
| Total | <u>68,212,410</u> | <u>162,207,343</u> |

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The following table sets forth the computation of the Company's pro forma basic and diluted net loss per share (in thousands, except share and per share amounts):

| | THREE MONTHS ENDED MARCH 31, 2020 |
|--|--|
| Net loss | \$ (5,454) |
| Pro forma adjustment to reflect change in fair value of Series B convertible preferred shares warrant liability | 86 |
| Pro forma net loss attributable to ordinary shareholders | <u>\$ (5,368)</u> |
| Weighted-average ordinary shares used to compute net loss per share attributable to ordinary shareholders, basic and diluted | 20,684,025 |
| Pro forma adjustment to reflect assumed conversion of convertible preferred shares and accrued dividends allocable to preferred shareholders | 123,758,558 |
| Weighted-average ordinary shares used to compute pro forma net loss per share, basic and diluted | <u>144,442,583</u> |
| Pro forma net loss per share, basic and diluted | <u>\$ (0.04)</u> |

(9) SUBSEQUENT EVENTS

The Company has evaluated subsequent events from the balance sheet date through June 12, 2020, the date at which the condensed consolidated financial statements were available to be issued.

On April 1, 2020, the Company completed an internal reorganization transaction pursuant to which ALX Oncology Limited became a wholly-owned subsidiary ALX Oncology Holdings Inc., a newly formed Delaware corporation. As part of the transaction, all of the equity, option and warrant holders of ALX Oncology Limited became equity, option and warrant holders of ALX Oncology Holdings Inc., as they did in the Company immediately prior to the reorganization.

Shares



ALX Oncology Holdings Inc.

Common Stock

PRELIMINARY PROSPECTUS

Jefferies

Credit Suisse

Piper Sandler

Cantor

LifeSci Capital

, 2020

PART II
INFORMATION NOT REQUIRED IN THE PROSPECTUS

Item 13. Other Expenses of Issuance and Distribution

The following table sets forth the expenses to be incurred in connection with the offering described in this Registration Statement, other than underwriting discounts and commissions, all of which will be paid by us. All amounts are estimates except the Securities and Exchange Commission's registration fee, the filing fee of the Financial Industry Regulatory Authority, Inc., or FINRA, and the Nasdaq Stock Market LLC, or Nasdaq, listing fee.

| | AMOUNT PAID OR TO BE PAID | |
|-----------------------------------|------------------------------|----------|
| SEC Registration Fee | \$ | * |
| FINRA filing fee | | * |
| Nasdaq listing fee | | * |
| Printing and engraving expenses | | * |
| Legal fees and expenses | | * |
| Accounting fees and expenses | | * |
| Transfer agent and registrar fees | | * |
| Miscellaneous expenses | | * |
| Total | \$ | * |

* To be completed by amendment.

Item 14. Indemnification of Directors and Officers

Section 145 of the Delaware General Corporation Law, or DGCL, empowers a corporation to indemnify its directors and officers and to purchase insurance with respect to liability arising out of their capacity or status as directors and officers, provided that the person acted in good faith and in a manner the person reasonably believed to be in our best interests, and, with respect to any criminal action, had no reasonable cause to believe the person's actions were unlawful. The DGCL further provides that the indemnification permitted thereunder shall not be deemed exclusive of any other rights to which the directors and officers may be entitled under the corporation's bylaws, any agreement, a vote of stockholders or otherwise. The certificate of incorporation of the registrant to be in effect upon the completion of this offering provides for the indemnification of the registrant's directors and officers to the fullest extent permitted under the DGCL. In addition, the bylaws of the registrant to be in effect upon the completion of this offering require the registrant to fully indemnify any person who was or is a party or is threatened to be made a party to any threatened, pending or completed action, suit or proceeding (whether civil, criminal, administrative or investigative) by reason of the fact that such person is or was a director or officer of the registrant, or is or was a director or officer of the registrant serving at the registrant's request as a director, officer, employee or agent of another corporation, partnership, joint venture, trust or other enterprise, against expenses (including attorney's fees), judgments, fines and amounts paid in settlement actually and reasonably incurred by such person in connection with such action, suit or proceeding, to the fullest extent permitted by applicable law.

Section 102(b)(7) of the DGCL permits a corporation to provide in its certificate of incorporation that a director of the corporation shall not be personally liable to the corporation or its stockholders for monetary damages for breach of fiduciary duty as a director, except (1) for any breach of the director's duty of loyalty to the corporation or its stockholders, (2) for acts or omissions not in good faith or which involve intentional misconduct or a knowing violation of law, (3) for payments of unlawful dividends or unlawful stock repurchases or redemptions or (4) for any transaction from which the director derived an improper personal benefit. The registrant's certificate of incorporation to be in effect upon the completion of this offering provides that the registrant's directors shall not be personally liable to it or its stockholders for monetary damages for breach of fiduciary duty as a director and that if the DGCL is amended to authorize corporate action further eliminating or limiting the personal liability of directors, then the liability of the registrant's directors shall be eliminated or limited to the fullest extent permitted by the DGCL, as so amended.

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Section 174 of the DGCL provides, among other things, that a director who willfully or negligently approves of an unlawful payment of dividends or an unlawful stock purchase or redemption may be held liable for such actions. A director who was either absent when the unlawful actions were approved, or dissented at the time, may avoid liability by causing his or her dissent to such actions to be entered in the books containing minutes of the meetings of the board of directors at the time such action occurred or immediately after such absent director receives notice of the unlawful acts.

As permitted by the DGCL, the registrant intends to enter into separate indemnification agreements with each of the registrant's directors and certain of the registrant's officers which would require the registrant, among other things, to indemnify them against certain liabilities which may arise by reason of their status as directors, officers or certain other employees.

The registrant expects to obtain and maintain insurance policies under which its directors and officers are insured, within the limits and subject to the limitations of those policies, against certain expenses in connection with the defense of, and certain liabilities which might be imposed as a result of, actions, suits or proceedings to which they are parties by reason of being or having been directors or officers. The coverage provided by these policies may apply whether or not the registrant would have the power to indemnify such person against such liability under the provisions of the DGCL.

These indemnification provisions and the indemnification agreements intended to be entered into between the registrant and the registrant's officers and directors may be sufficiently broad to permit indemnification of the registrant's officers and directors for liabilities (including reimbursement of expenses incurred) arising under the Securities Act.

The underwriting agreement between the registrant and the underwriters to be filed as Exhibit 1.1 to this registration statement provides for the indemnification by the underwriters of the registrant's directors and officers and certain controlling persons against specified liabilities, including liabilities under the Securities Act with respect to information provided by the underwriters specifically for inclusion in the registration statement.

Item 15. Recent Sales of Unregistered Securities

The following list sets forth information regarding all unregistered securities sold by ALX Oncology Limited from January 1, 2017 to March 31, 2020, the period prior to our incorporation and the effectiveness of the reorganization, and all unregistered securities sold by us since our incorporation on April 1, 2020. For all other times, it includes transactions between us and related parties. No underwriters were involved in the sales and the certificates representing the securities sold and issued contain legends restricting transfer of the securities without registration under the Securities Act or an applicable exemption from registration.

- (1) From March 2017 to August 2017, ALX Oncology Limited received total proceeds of \$25,000,000 from the issuance of convertible promissory notes to investors.
- (2) In September 2017, all of the convertible promissory notes were converted to an aggregate of 25,180,500 shares of Series A convertible preferred stock of ALX Oncology Limited at a conversion price of \$1.00 per share.
- (3) In May 2019, ALX Oncology Limited issued and sold to investors an aggregate of 6,690,729 shares of its Series B convertible preferred stock at \$1.4432 per share, for an aggregate consideration of approximately \$9.6 million.
- (4) In December 2019, ALX Oncology Limited issued to certain lenders warrants to purchase an aggregate of 403,348 shares of its Series B convertible preferred stock at \$1.4432 per share pursuant to a loan and security agreement.
- (5) In February 2020, ALX Oncology Limited issued and sold to investors an aggregate of 72,754,989 shares of its Series C convertible preferred stock at \$1.4432 per share for an aggregate consideration of approximately \$105.0 million.

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- (6) Between January 2017 to March 2020, ALX Oncology Limited granted to certain service providers stock options to purchase an aggregate of 21,465,623 shares of its common stock upon the exercise of options at exercise prices per share ranging from \$0.15 to \$0.62.
- (7) Between January 2017 to March 2020, ALX Oncology Limited issued and sold to certain service providers 99,731 shares of common stock upon the exercise of options at exercise prices per share ranging from \$0.15 to \$0.29, for an aggregate exercise price of approximately \$19,491.69.
- (8) On April 1, 2020, we incorporated ALX Oncology Holdings Inc. in Delaware, and we completed a reorganization whereby ALX Oncology Limited became our wholly-owned subsidiary and all of the shareholders, warrant holders and option holders of ALX Oncology Limited became our stockholders, warrant holders and option holders, holding the same number of corresponding shares, warrants and/or options in us as they did in ALX Oncology Limited immediately prior to the reorganization. In connection with this reorganization, on April 1, 2020: (a) we issued and sold to the existing shareholders of ALX Oncology Limited an aggregate of 20,840,532 shares of our common stock at purchase prices per share ranging from \$0.001 to \$0.29, an aggregate of 61,180,500 shares of our Series A convertible preferred stock at a purchase price per share of \$1.000, an aggregate of 6,690,729 shares of our Series B convertible preferred stock at a purchase price per share of \$1.4432 and an aggregate of 72,754,989 shares of our Series C convertible preferred stock at a purchase price per share of \$1.4432, in exchange for promissory notes with an aggregate principal amount of approximately \$176.3 million; (b) we acquired 525,000,000 shares of common stock of ALX Oncology Limited in exchange for the promissory notes that were acquired in connection with the issuance and sale of our capital stock described in clause (a); and (c) we granted stock options to the holders of outstanding options to purchase common stock of ALX Oncology Limited to purchase an aggregate of 21,063,923 shares of our common stock upon the exercise of options at exercise prices per share ranging from \$0.13 to \$0.62.
- (9) In connection with the reorganization and to replace the warrants that were originally issued by ALX Oncology Limited, on April 1, 2020, we issued to certain lenders warrants to purchase an aggregate of 403,348 shares of our Series B convertible preferred stock with an exercise price of \$1.4432 per share pursuant to the amended loan and security agreement that was originally entered into by ALX Oncology Limited in December 2019.
- (10) Since April 2, 2020, we have granted options to purchase an aggregate of 4,150,000 shares of our common stock at exercise prices per share ranging from \$0.73 to \$0.85, to a total of 16 service providers under our 2020 Equity Incentive Plan.

The offers, sales and issuances of the securities described in Items 15(1), (2), (3), (4), (5) and (9) were exempt from registration under the Securities Act under Section 4(a)(2) of the Securities Act as transactions by an issuer not involving a public offering. The recipients of securities in each of these transactions acquired the securities for investment only and not with a view to or for sale in connection with any distribution thereof and appropriate legends were affixed to the securities issued in these transactions. Each of the recipients of securities in these transactions was an accredited person and had adequate access, through employment, business or other relationships, to information about the registrant.

The offers, sales and issuances of the securities described in Items 15(6), (7) and (10) were exempt from registration under the Securities Act under Rule 701 in that the transactions were under compensatory benefit plans and contracts relating to compensation as provided under Rule 701. The recipients of such securities were the registrant's employees, consultants or directors and received the securities under ALX Oncology Limited's equity incentive plan. The recipients of securities in each of these transactions represented their intention to acquire the securities for investment only and not with view to or for sale in connection with any distribution thereof and appropriate legends were affixed to the securities issued in these transactions.

The offers, sales and issuances of the securities described in Items 15(8) were exempt from registration under the Securities Act under either (1) Rule 701 in that the transactions were under compensatory benefit plans and contracts relating to compensation as provided under Rule 701 or (2) Section 4(a)(2) of the Securities Act as transactions by an issuer not involving any public offering. The recipients of such securities were the registrant's employees, consultants or directors and received the securities under the registrant's 2020 Equity Incentive Plan.

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The recipients of securities in each of these transactions represented their intention to acquire the securities for investment only and not with view to or for sale in connection with any distribution thereof and appropriate legends were affixed to the securities issued in these transactions.

Item 16. Exhibit and Financial Statement Schedules

(a) Exhibits.

See the Exhibit Index immediately preceding the signature page hereto for a list of exhibits filed as part of this registration statement on Form S-1, which Exhibit Index is incorporated herein by reference.

(b) Financial Statement Schedules.

Schedules have been omitted because the information required to be set forth therein is not applicable or is shown in the consolidated financial statements or notes thereto.

Item 17. Undertakings

The undersigned registrant hereby undertakes to provide to the underwriters at the closing specified in the underwriting agreements, certificates in such denominations and registered in such names as required by the underwriters to permit prompt delivery to each purchaser.

Insofar as indemnification for liabilities arising under the Securities Act of 1933 may be permitted to directors, officers and controlling persons of the registrant pursuant to the foregoing provisions, or otherwise, the registrant has been advised that in the opinion of the Securities and Exchange Commission such indemnification is against public policy as expressed in the Securities Act and is, therefore, unenforceable. In the event that a claim for indemnification against such liabilities (other than the payment by the registrant of expenses incurred or paid by a director, officer or controlling person of the registrant in the successful defense of any action, suit or proceeding) is asserted by such director, officer or controlling person in connection with the securities being registered, the registrant will, unless in the opinion of its counsel the matter has been settled by controlling precedent, submit to a court of appropriate jurisdiction the question whether such indemnification by it is against public policy as expressed in the Securities Act and will be governed by the final adjudication of such issue.

The undersigned hereby undertakes that:

- (1) For purposes of determining any liability under the Securities Act, the information omitted from the form of prospectus filed as part of this registration statement in reliance upon Rule 430A and contained in a form of prospectus filed by the registrant pursuant to Rule 424(b)(1) or (4) or 497(h) under the Securities Act of 1933 shall be deemed to be part of this registration statement as of the time it was declared effective.
- (2) For the purpose of determining any liability under the Securities Act, each post-effective amendment that contains a form of prospectus shall be deemed to be a new registration statement relating to the securities offered therein, and the offering of such securities at that time shall be deemed to be the initial bona fide offering thereof.

EXHIBIT INDEX

| EXHIBIT NUMBER | DESCRIPTION |
|-----------------------|--|
| 1.1* | Form of Underwriting Agreement. |
| 3.1^ | Amended and Restated Certificate of Incorporation of the Registrant, as currently in effect. |
| 3.2* | Form of Amended and Restated Certificate of Incorporation of the Registrant, to be in effect upon the completion of this offering. |
| 3.3^ | Bylaws of the Registrant, as currently in effect. |
| 3.4* | Form of Amended and Restated Bylaws of the Registrant, to be in effect upon the completion of this offering. |
| 4.1^ | Amended and Restated Investors' Rights Agreement among the Registrant and certain of its stockholders, dated April 1, 2020. |
| 4.2* | Specimen common stock certificate of the Registrant. |
| 4.3 | Form of Amended and Restated Warrant to Purchase Stock. |
| 5.1* | Opinion of Wilson Sonsini Goodrich & Rosati, Professional Corporation. |
| 10.1+* | Form of Indemnification Agreement between the Registrant and each of its directors and executive officers. |
| 10.2+* | Amended and Restated 2020 Equity Incentive Plan and forms of agreements thereunder, to be in effect upon the completion of this offering. |
| 10.3+* | Confirmatory Offer Letter between the Registrant and Jaume Pons, Ph.D. effective as of _____, 2020. |
| 10.4+* | Confirmatory Offer Letter between the Registrant and Nathan Caffo, effective as of _____, 2020. |
| 10.5+* | Confirmatory Offer Letter between the Registrant and Peter García, effective as of _____, 2020. |
| 10.6+* | Confirmatory Offer Letter between the Registrant and Steffen Pietzke, effective as of _____, 2020. |
| 10.7+* | Confirmatory Offer Letter between the Registrant and Sophia Randolph, M.D., Ph.D., effective as of _____, 2020. |
| 10.8+* | Confirmatory Offer Letter between the Registrant and Hong Wan, Ph.D., effective as of _____, 2020. |
| 10.9+* | Executive Incentive Compensation Plan. |
| 10.10+* | Outside Director Compensation Policy. |
| 10.11+* | Change in Control and Severance Policy. |
| 10.12# | Exclusive (Equity) Agreement between the Registrant and The Board of Trustees of the Leland Stanford Junior University, effective as of March 24, 2015, as amended on April 24, 2015 and May 15, 2015. |
| 10.13 | Loan and Security Agreement, dated as of December 20, 2019, among the Registrant, certain of its affiliates, Silicon Valley Bank and WestRiver Innovation Lending Fund VIII, L.P., as amended by the Joinder and First Amendment to Loan and Security Agreement on May 21, 2020. |
| 10.14 | Conformed Copy of Amended and Restated Research and Development Services Agreement, dated as of June 18, 2018, between ALX Oncology Inc. and Tollnine, Inc., incorporating Amendment No. 1, dated as of May 3, 2019. |
| 21.1^ | List of subsidiaries of the Registrant. |
| 23.1* | Consent of Independent Registered Public Accounting Firm. |
| 23.2* | Consent of Wilson Sonsini Goodrich & Rosati, Professional Corporation (included in Exhibit 5.1). |
| 24.1 | Power of Attorney (see page II-6 to this Form S-1). |

* To be filed by amendment.

^ Previously submitted.

+ Indicated management contract or compensatory plan.

Portions of this exhibit (indicated by asterisks) have been omitted pursuant to a request for confidential treatment and this exhibit has been filed separately with the SEC.

SIGNATURES

Pursuant to the requirements of the Securities Act of 1933, as amended, the registrant has duly caused this registration statement to be signed on its behalf by the undersigned, thereunto duly authorized, in the City of Burlingame, State of California, on .

ALX ONCOLOGY HOLDINGS INC.

By: _____
Jaume Pons, Ph.D.
President and Chief Executive Officer

POWER OF ATTORNEY

KNOW ALL PERSONS BY THESE PRESENTS, that each person whose signature appears below constitutes and appoints Jaume Pons, Ph.D., and Peter Garcia as his or her true and lawful attorneys-in-fact and agents, with full power of substitution and substitution, for him or her and in his or her name, place and stead, in any and all capacities (including his or her capacity as a director and/or officer of ALX Oncology Holdings Inc.) to sign any or all amendments (including post-effective amendments) to this registration statement and any and all additional registration statements pursuant to Rule 462(b) of the Securities Act of 1933, as amended, and to file the same, with all exhibits thereto, and all other documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in-fact and agents, and each of them, full power and authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises, as fully to all intents and purposes as they, he or she might or could do in person, hereby ratifying and confirming all that said attorney-in-fact and agents or any of them, or their, his or her substitute or substitutes, may lawfully do or cause to be done by virtue hereof.

Pursuant to the requirements of the Securities Act of 1933, as amended, this registration statement has been signed by the following persons in the capacities and on the dates indicated.

| <u>SIGNATURE</u> | <u>TITLE</u> | <u>DATE</u> |
|---------------------------------------|---|-------------|
| _____ Jaume Pons, Ph.D. | President, Chief Executive Officer and Director <i>(Principal Executive Officer)</i> | |
| _____ Peter Garcia | Chief Financial Officer <i>(Principal Financial Officer)</i> | |
| _____ Steffen Pietzke | Vice President, Finance & Chief Accounting Officer <i>(Principal Accounting Officer)</i> | |
| _____ Corey Goodman, Ph.D. | Executive Chairman of the Board of Directors | |
| _____ Rekha Hemrajani | Director | |
| _____ Jason Lettmann | Director | |
| _____ Jack Nielsen | Director | |
| _____ Graham Walmsley, M.D., Ph.D. | Director | |

THIS WARRANT AND THE SHARES ISSUABLE HEREUNDER HAVE NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED (THE “**ACT**”), OR THE SECURITIES LAWS OF ANY STATE AND, EXCEPT AS SET FORTH IN SECTIONS 5.3 AND 5.4 BELOW, MAY NOT BE OFFERED, SOLD, PLEDGED OR OTHERWISE TRANSFERRED UNLESS AND UNTIL REGISTERED UNDER SAID ACT AND LAWS OR, IN THE OPINION OF LEGAL COUNSEL IN FORM AND SUBSTANCE SATISFACTORY TO THE ISSUER, SUCH OFFER, SALE, PLEDGE OR OTHER TRANSFER IS EXEMPT FROM SUCH REGISTRATION.

AMENDED AND RESTATED WARRANT TO PURCHASE STOCK

Company: ALX Oncology Holdings Inc., a Delaware corporation

Number of Shares:

Type/Series of Stock: Series B Preferred Stock, \$0.001 par value per share

Warrant Price:

Issue Date:

Expiration Date: See also Section 5.1(b).

Credit Facility: This Amended and Restated Warrant to Purchase Stock (as amended and in effect from time to time, this “**Warrant**”) is issued in connection with that certain Joinder and First Amendment, of even date herewith, to that certain Loan and Security Agreement dated December 20, 2019, among Silicon Valley Bank (“**Bank**”), WestRiver Innovation Lending Fund VIII, L.P. (“**WRG**”), Alexo Therapeutics International, Sirpant Therapeutics and the Company (collectively, and as may be further amended and/or modified and in effect from time to time, the “**Loan Agreement**”).

THIS WARRANT CERTIFIES THAT, for good and valuable consideration, (together with any successor or permitted assignee or transferee of this Warrant or of any shares issued upon exercise hereof, “**Holder**”) is entitled to purchase up to the above-stated number of fully paid and non-assessable shares (the “**Shares**”) of the above-stated Type/Series of Stock (the “**Class**”) of the above-named company (the “**Company**”), at the above-stated Warrant Price, all as set forth above and as adjusted pursuant to Section 2 of this Warrant, subject to the provisions and upon the terms and conditions set forth in this Warrant.

A. Recitals; Termination of Prior Warrant.

(1) Reference is made to (i) that certain Warrant Instrument, dated December 20, 2019, executed by ALX Oncology Limited, an Ireland registered company (the “**Original Issuer**”), in favor of each of Bank and WRG (as amended, the “**Warrant Instrument**”), and (ii) that certain Certificate issued by the Original Issuer to pursuant to the Warrant Instrument dated December 20, 2019 evidencing the right to subscribe for and purchase up to Series B Preferred Shares of the Original Issuer (the “**Certificate**” and, together with the Warrant Instrument, the “**Original Warrant**”).

(2) This Warrant is issued in exchange for and replacement of, and amends and restates in its entirety, the Original Warrant to the full extent of its right and interest therein and thereto. Effective upon execution and delivery of this Warrant by the parties hereto, the Original Warrant and its entire right and interest therein and thereto shall automatically terminate and be of no further force or effect.

SECTION 1. EXERCISE.

1.1 Method of Exercise. Holder may exercise this Warrant in whole or in part at any time and from time to time prior to the expiration or earlier termination hereof by delivering to the Company the original of this Warrant together with a duly executed Notice of Exercise in substantially the form attached hereto as Appendix 1 and, unless Holder is exercising this Warrant pursuant to a cashless exercise set forth in Section 1.2, a check, wire transfer of same-day funds (to an account designated by the Company), or other form of payment acceptable to the Company for the aggregate Warrant Price for the Shares being purchased. Notwithstanding any contrary provision herein, if this Warrant was originally executed and/or delivered electronically, in no event shall Holder be required to surrender or deliver an ink-signed paper copy of this Warrant in connection with its exercise hereof or of any rights hereunder, be required for any exercise of a Holder's rights hereunder, nor shall Holder be required to surrender or deliver a paper or other physical copy of this Warrant in connection with any exercise hereof.

1.2 Cashless Exercise. On any exercise of this Warrant, in lieu of payment of the aggregate Warrant Price in the manner as specified in Section 1.1 above, but otherwise in accordance with the requirements of Section 1.1, Holder may elect to receive Shares equal to the value of this Warrant, or portion hereof as to which this Warrant is being exercised. Thereupon, the Company shall issue to the Holder such number of fully paid and non-assessable Shares as are computed using the following formula:

$$X = Y(A-B)/A$$

where:

X = the number of Shares to be issued to the Holder;

Y = the number of Shares with respect to which this Warrant is being exercised (inclusive of the Shares surrendered to the Company in payment of the aggregate Warrant Price);

A = the fair market value (as determined pursuant to Section 1.3 below) of one Share; and

B = the Warrant Price.

1.3 Fair Market Value. If the Company's common stock is then traded or quoted on a nationally recognized securities exchange, inter-dealer quotation system or over-the-counter

market (a “**Trading Market**”) and the Class is common stock, the fair market value of a Share shall be the closing price or last sale price of a share of common stock reported for the Business Day immediately before the date on which Holder delivers this Warrant together with its Notice of Exercise to the Company. If the Company’s common stock is then traded in a Trading Market and the Class is a series of the Company’s convertible preferred stock, the fair market value of a Share shall be the closing price or last sale price of a share of the Company’s common stock reported for the Business Day immediately before the date on which Holder delivers this Warrant together with its Notice of Exercise to the Company multiplied by the number of shares of the Company’s common stock into which a Share is then convertible. If the Company’s common stock is not traded in a Trading Market, the Board of Directors of the Company shall determine the fair market value of a Share in its reasonable good faith judgment.

1.4 Delivery of Certificate and New Warrant. Within a reasonable time after Holder exercises this Warrant in the manner set forth in Section 1.1 or 1.2 above, the Company shall deliver to Holder a certificate (or, in the case of uncertificated securities, provide notice of book entry) representing the Shares issued to Holder upon such exercise and, if this Warrant has not been fully exercised and has not expired, a new warrant of like tenor representing the Shares not so acquired (or surrendered in payment of the aggregate Warrant Price).

1.5 Replacement of Warrant.

(a) Paper Original Warrant. To the extent that the original of this Warrant is a paper original, on receipt of evidence reasonably satisfactory to the Company of the loss, theft, destruction or mutilation of this Warrant and, in the case of loss, theft or destruction, on delivery of an indemnity agreement reasonably satisfactory in form, substance and amount to the Company or, in the case of mutilation, on surrender of this Warrant to the Company for cancellation, the Company shall, within a reasonable time, execute and deliver to Holder, in lieu of this Warrant, a new warrant of like tenor and amount.

(b) Electronic Original Warrant. To the extent that the original of this Warrant is an electronic original, if at any time this Warrant is rejected by any person (including, but not limited to, paying or escrow agents) or any such person fails to comply with the terms of this Warrant based on this Warrant being presented to such person as an electronic record or a printout hereof, or any signature hereto being in electronic form, the Company shall, promptly upon Holder’s request and without indemnity, execute and deliver to Holder, in lieu of electronic original versions of this Warrant, a new warrant of like tenor and amount in paper form with original ink signatures.

1.6 Treatment of Warrant Upon Acquisition of Company.

(a) Acquisition. For the purpose of this Warrant, “**Acquisition**” means any transaction or series of related transactions involving: (i) the sale, lease, exclusive license, or other disposition of all or substantially all of the assets of the Company; (ii) any merger or consolidation of the Company into or with another person or entity (other than a merger or consolidation effected exclusively to change the Company’s domicile), or any other corporate reorganization, in which the stockholders of the Company in their capacity as such immediately prior to such merger, consolidation or reorganization, own less than a majority of the Company’s (or the surviving or successor entity’s)

outstanding voting power immediately after such merger, consolidation or reorganization (or, if such Company stockholders beneficially own a majority of the outstanding voting power of the surviving or successor entity as of immediately after such merger, consolidation or reorganization, such surviving or successor entity is not the Company); or (iii) any sale or other transfer by the stockholders of the Company of shares representing at least a majority of the Company's then-total outstanding combined voting power.

(b) Treatment of Warrant at Acquisition. In the event of an Acquisition in which the consideration to be received by the Company's stockholders consists solely of cash, solely of Marketable Securities or a combination of cash and Marketable Securities (a "**Cash/Public Acquisition**"), and the fair market value of one Share as determined in accordance with Section 1.3 above would be greater than the Warrant Price in effect on such date immediately prior to such Cash/Public Acquisition, and Holder has not exercised this Warrant pursuant to Section 1.1 above as to all Shares, then this Warrant shall automatically be deemed to be Cashless Exercised pursuant to Section 1.2 above as to all Shares effective immediately prior to and contingent upon the consummation of a Cash/Public Acquisition. In connection with such Cashless Exercise, Holder shall be deemed to have restated each of the representations and warranties in Section 4 of the Warrant as of the date thereof and the Company shall promptly notify the Holder of the number of Shares (or such other securities) issued upon exercise. In the event of a Cash/Public Acquisition where the fair market value of one Share as determined in accordance with Section 1.3 above would be less than the Warrant Price in effect immediately prior to such Cash/Public Acquisition, then this Warrant will expire immediately prior to the consummation of such Cash/Public Acquisition.

(c) Upon the closing of any Acquisition other than a Cash/Public Acquisition, the acquiring, surviving or successor entity shall assume the obligations of this Warrant, and this Warrant shall thereafter be exercisable for the same securities and/or other property as would have been paid for the Shares issuable upon exercise of the unexercised portion of this Warrant as if such Shares were outstanding on and as of the closing of such Acquisition, subject to further adjustment from time to time in accordance with the provisions of this Warrant.

(d) As used in this Warrant, "**Marketable Securities**" means securities meeting all of the following requirements: (i) the issuer thereof is then subject to the reporting requirements of Section 13 or Section 15(d) of the Securities Exchange Act of 1934, as amended (the "**Exchange Act**"), and is then current in its filing of all required reports and other information under the Act and the Exchange Act; (ii) the class and series of shares or other security of the issuer that would be received by Holder in connection with the Acquisition were Holder to exercise this Warrant on or prior to the closing thereof is then traded in a Trading Market, and (iii) following the closing of such Acquisition, Holder would not be restricted from publicly re-selling all of the issuer's shares and/or other securities that would be received by Holder in such Acquisition were Holder to exercise this Warrant in full on or prior to the closing of such Acquisition, except to the extent that any such restriction (x) arises solely under federal or state securities laws, rules or regulations, and (y) does not extend beyond six (6) months from the closing of such Acquisition.

SECTION 2. ADJUSTMENTS TO THE SHARES AND WARRANT PRICE.

2.1 Stock Dividends, Splits, Etc. If the Company declares or pays a dividend or distribution on the outstanding shares of the Class payable in common stock or other securities or property (other than cash), then upon exercise of this Warrant, for each Share acquired, Holder shall receive, without additional cost to Holder, the total number and kind of securities and property which Holder would have received had Holder owned the Shares of record as of the date the dividend or distribution occurred. If the Company subdivides the outstanding shares of the Class by reclassification or otherwise into a greater number of shares, the number of Shares purchasable hereunder shall be proportionately increased and the Warrant Price shall be proportionately decreased. If the outstanding shares of the Class are combined or consolidated, by reclassification or otherwise, into a lesser number of shares, the Warrant Price shall be proportionately increased and the number of Shares shall be proportionately decreased.

2.2 Reclassification, Exchange, Combinations or Substitution. Upon any event whereby all of the outstanding shares of the Class are reclassified, exchanged, combined, substituted, or replaced for, into, with or by Company securities of a different class and/or series, then from and after the consummation of such event, this Warrant will be exercisable for the number, class and series of Company securities that Holder would have received had the Shares been outstanding on and as of the consummation of such event, and subject to further adjustment thereafter from time to time in accordance with the provisions of this Warrant. The provisions of this Section 2.2 shall similarly apply to successive reclassifications, exchanges, combinations, substitutions, replacements or other similar events.

2.3 Conversion of Preferred Stock. If the Class is a class and series of the Company's convertible preferred stock, in the event that all outstanding shares of the Class are converted, automatically or by action of the holders thereof, into common stock pursuant to the provisions of the Company's Certificate of Incorporation as amended and in effect from time to time (the "**COI**"), including, without limitation, in connection with the Company's initial, underwritten public offering and sale of its common stock pursuant to an effective registration statement under the Act (the "**IPO**"), then from and after the date on which all outstanding shares of the Class have been so converted, this Warrant shall be exercisable for such number of shares of common stock into which the Shares would have been converted had the Shares been outstanding on the date of such conversion, and the Warrant Price shall equal the Warrant Price in effect as of immediately prior to such conversion divided by the number of shares of common stock into which one Share would have been converted, all subject to further adjustment thereafter from time to time in accordance with the provisions of this Warrant.

2.4 Adjustments for Diluting Issuances. Without duplication of any adjustment otherwise provided for in this Section 2, the number of shares of common stock issuable upon conversion of the Shares shall be subject to anti-dilution adjustment from time to time in the manner set forth in the COI as if the Shares were issued and outstanding on and as of the date of any such required adjustment.

2.5 No Fractional Share. No fractional Share shall be issuable upon exercise of this Warrant and the number of Shares to be issued shall be rounded down to the nearest whole Share. If

a fractional Share interest arises upon any exercise of the Warrant, the Company shall eliminate such fractional Share interest by paying Holder in cash the amount computed by multiplying the fractional interest by (i) the fair market value (as determined in accordance with Section 1.3 above) of a full Share, less (ii) the then-effective Warrant Price.

2.6 Notice/Certificate as to Adjustments. Upon each adjustment of the Warrant Price, Class and/or number of Shares, the Company, at the Company's expense, shall notify Holder in writing within a reasonable time setting forth the adjustments to the Warrant Price, Class and/or number of Shares and facts upon which such adjustment is based. The Company shall, upon written request from Holder, furnish Holder with a certificate of its Chief Financial Officer, including computations of such adjustment and the Warrant Price, Class and number of Shares in effect upon the date of such adjustment.

2.7 Pay to Play Adjustments. Notwithstanding the definition of Class herein, if Pay to Play Provisions are at any time during the term of this Warrant applied to the outstanding shares of the Class, then from and after such application, "Class" shall mean that class and series of the Company's securities that a holder of outstanding shares of the Class as of immediately prior to such application would have received or retained had such holder participated in the manner necessary to receive or retain the class and series of the Company's securities having the relative rights, powers, privileges and preferences more favorable to the holder. As used herein, "**Pay to Play Provisions**" means provisions set forth in the COI or elsewhere that require holders of the outstanding shares of the Class to participate in a subsequent round of equity financing of the Company or lose all or a portion of the benefit of anti-dilution protection or any other right, power, privilege or preference applicable to such shares or have such shares automatically convert to common stock or another class or series of Company capital stock.

SECTION 3. REPRESENTATIONS AND COVENANTS OF THE COMPANY.

3.1 Representations and Warranties. The Company represents and warrants to, and agrees with, the Holder as follows:

(a) [Reserved]

(b) All Shares which may be issued upon the exercise of this Warrant, and all securities, if any, issuable upon conversion of the Shares, shall, upon issuance, be duly authorized, validly issued, fully paid and non-assessable, and free of any liens and encumbrances except for restrictions on transfer provided for herein or under applicable federal and state securities laws. The Company covenants that it shall at all times cause to be reserved and kept available out of its authorized and unissued capital stock such number of shares of the Class, common stock and other securities as will be sufficient to permit the exercise in full of this Warrant and the conversion of the Shares into common stock or such other securities.

(c) The Company's capitalization table attached hereto as Schedule 1 is true and complete, in all material respects, as of the Issue Date.

3.2 Notice of Certain Events. If the Company proposes at any time to:

(a) declare any dividend or distribution upon the outstanding shares of the Class or common stock, whether in cash, property, stock, or other securities and whether or not a regular cash dividend;

(b) offer for subscription or sale pro rata to all holders of the outstanding shares of the Class any additional shares of any class or series of the Company's stock (other than pursuant to contractual pre-emptive or first refusal rights);

(c) effect any reclassification, exchange, combination, substitution, reorganization or recapitalization of the outstanding shares of the Class;

(d) effect an Acquisition or to liquidate, dissolve or wind up; or

(e) effect an IPO;

then, in connection with each such event, the Company shall give Holder:

(1) in the case of the matters referred to in (a) and (b) above, at least seven (7) Business Days prior written notice of the earlier to occur of the effective date thereof or the date on which a record will be taken for such dividend, distribution, or subscription rights (and specifying the date on which the holders of outstanding shares of the Class will be entitled thereto) or for determining rights to vote, if any;

(2) in the case of the matters referred to in (c) and (d) above at least seven (7) Business Days prior written notice of the date when the same will take place (and specifying the date on which the holders of outstanding shares of the Class will be entitled to exchange their shares for the securities or other property deliverable upon the occurrence of such event and such reasonable information as Holder may reasonably require regarding the treatment of this Warrant in connection with such event giving rise to the notice); and

(3) with respect to the IPO, at least seven (7) Business Days prior written notice of the date on which the Company proposes to publicly file its registration statement in connection therewith.

The Company will also provide information requested by Holder from time to time, within a reasonable time following each such request, that is reasonably necessary to enable Holder to comply with Holder's accounting or reporting requirements. Prior to the IPO, such information may include, but shall not be limited to, the Company's then-current summary capitalization table, the price per share for which the Company most recently prior thereto sold or issued shares of its convertible preferred stock to investors for cash in a bona fide equity financing of the Company, and the most recently received valuation of the Company's common stock conducted for purposes of the Company's compliance with Section 409A of the Internal Revenue Code of 1986, as amended (or the corresponding section of any successor statute) and approved by the Company's Board of Directors. Holder agrees to treat and hold all information provided by the Company pursuant to this Warrant in confidence in accordance with the provisions of Section 12.9 of the Loan Agreement (regardless of whether the Loan Agreement shall then be in effect).

SECTION 4. REPRESENTATIONS AND COVENANTS OF THE HOLDER.

The Holder represents and warrants to, and agrees with, the Company as follows:

4.1 Purchase for Own Account. This Warrant and the securities to be acquired upon exercise of this Warrant by Holder are being acquired for investment for Holder's account, not as a nominee or agent, and not with a view to the public resale or distribution within the meaning of the Act. Holder also represents that it has not been formed for the specific purpose of acquiring this Warrant or the Shares.

4.2 Disclosure of Information. Holder is aware of the Company's business affairs and financial condition and has received or has had full access to all the information it considers necessary or appropriate to make an informed investment decision with respect to the acquisition of this Warrant and its underlying securities. Holder further has had an opportunity to ask questions and receive answers from the Company regarding the terms and conditions of the offering of this Warrant and its underlying securities and to obtain additional information (to the extent the Company possessed such information or could acquire it without unreasonable effort or expense) necessary to verify any information furnished to Holder or to which Holder has access.

4.3 Investment Experience. Holder understands that the purchase of this Warrant and its underlying securities involves substantial risk. Holder has experience as an investor in securities of companies in the development stage and acknowledges that Holder can bear the economic risk of such Holder's investment in this Warrant and its underlying securities and has such knowledge and experience in financial or business matters that Holder is capable of evaluating the merits and risks of its investment in this Warrant and its underlying securities and/or has a preexisting personal or business relationship with the Company and certain of its officers, directors or controlling persons of a nature and duration that enables Holder to be aware of the character, business acumen and financial circumstances of such persons.

4.4 Accredited Investor Status. Holder is an "accredited investor" within the meaning of Regulation D promulgated under the Act.

4.5 The Act. Holder understands that this Warrant and the Shares issuable upon exercise hereof have not been registered under the Act in reliance upon a specific exemption therefrom, which exemption depends upon, among other things, the bona fide nature of the Holder's investment intent as expressed herein. Holder understands that this Warrant and the Shares issued upon any exercise hereof must be held indefinitely unless subsequently registered under the Act and qualified under applicable state securities laws, or unless exemption from such registration and qualification are otherwise available. Holder is aware of the provisions of Rule 144 promulgated under the Act.

4.6 Market Stand-off Agreement. The Holder agrees that the Shares shall be subject to the Market Standoff provisions in Section 2.11 of the Company's Investors' Rights Agreement, as amended and in effect from time to time.

4.7 No Stockholder Rights. Without limiting any provision of this Warrant, Holder agrees that as a Holder of this Warrant it will not have any rights (including, but not limited to, voting

rights) as a stockholder of the Company with respect to the Shares issuable hereunder (or the securities issuable on conversion of such Shares, if any) unless and until the exercise of this Warrant and then only with respect to the Shares issued on such exercise (or the securities issued on conversion of such Shares, if any).

SECTION 5. MISCELLANEOUS.

5.1 Term; Automatic Cashless Exercise Upon Expiration.

(a) Term. Subject to the provisions of Section 1.6 above, this Warrant is exercisable in whole or in part at any time and from time to time on or before 6:00 PM, Pacific time, on the Expiration Date and shall be void thereafter.

(b) Automatic Cashless Exercise upon Expiration. In the event that, upon the Expiration Date, the fair market value of one Share (or other security issuable upon the exercise hereof) as determined in accordance with Section 1.3 above is greater than the Warrant Price in effect on such date, then this Warrant shall automatically be deemed on and as of such date to be exercised pursuant to Section 1.2 above as to all Shares (or such other securities) for which it shall not previously have been exercised, and the Company shall, within a reasonable time following Holder's written request therefor, deliver a certificate (or evidence of book entry) representing the Shares (or such other securities) issued upon such exercise to Holder.

5.2 Legends. Each certificate evidencing Shares (and each certificate evidencing securities issued upon conversion of any Shares, if any) shall be imprinted with a legend in substantially the following form:

THE SHARES EVIDENCED BY THIS CERTIFICATE HAVE NOT BEEN REGISTERED UNDER THE SECURITIES ACT OF 1933, AS AMENDED (THE "**ACT**"), OR THE SECURITIES LAWS OF ANY STATE AND, EXCEPT AS SET FORTH IN THAT CERTAIN AMENDED AND RESTATED WARRANT TO PURCHASE STOCK ISSUED BY THE ISSUER TO _____ DATED MAY 21, 2020, MAY NOT BE OFFERED, SOLD, PLEDGED OR OTHERWISE TRANSFERRED UNLESS AND UNTIL REGISTERED UNDER SAID ACT AND LAWS OR, IN THE OPINION OF LEGAL COUNSEL IN FORM AND SUBSTANCE SATISFACTORY TO THE ISSUER, SUCH OFFER, SALE, PLEDGE OR OTHER TRANSFER IS EXEMPT FROM SUCH REGISTRATION.

5.3 Compliance with Securities Laws on Transfer. This Warrant and the Shares issued upon exercise of this Warrant (and the securities issuable, directly or indirectly, upon conversion of the Shares, if any) may not be transferred or assigned in whole or in part except in compliance with applicable federal and state securities laws by the transferor and the transferee (including, without limitation, the delivery of investment representation letters and legal opinions reasonably satisfactory to the Company, as reasonably requested by the Company). The Company shall not require Holder to provide an opinion of counsel if the transfer is to an affiliate of Holder, provided that such affiliate is an "accredited investor" as defined in Regulation D promulgated under the Act. Additionally, the Company shall also not require an opinion of counsel if there is no material question as to the availability of Rule 144 promulgated under the Act.

5.4 Transfer Procedure. Subject to the provisions of Section 5.3 and upon providing the Company with written notice, Holder may transfer all or part of this Warrant or the Shares issued upon exercise of this Warrant (or the securities issued upon conversion of the Shares, if any) to any transferee, provided, however, in connection with any such transfer, Holder will give the Company notice of the portion of the Warrant and/or Shares (and/or securities issued upon conversion of the Shares, if any) being transferred with the name, address and taxpayer identification number of the transferee and Holder will surrender this Warrant to the Company for reissuance to the transferee(s) (and Holder if applicable); and provided further, that any transferee shall make substantially the representations and warranties set forth in Section 4 above and shall agree in writing with the Company to be bound by all of the terms and conditions of this Warrant. Notwithstanding any contrary provision herein, at all times prior to the IPO, Holder may not, without the Company's prior written consent, transfer this Warrant or any portion hereof, or any Shares issued upon any exercise hereof, or any shares or other securities issued upon any conversion of any Shares issued upon any exercise hereof, to any person or entity who directly competes with the Company, except in connection with an Acquisition of the Company by such a direct competitor.

5.5 Notices. All notices and other communications hereunder from the Company to the Holder, or vice versa, shall be deemed delivered and effective (i) when given personally, (ii) on the third (3rd) Business Day after being mailed by first-class registered or certified mail, postage prepaid, (iii) upon actual receipt if given by facsimile or electronic mail and such receipt is confirmed in writing by the recipient, or (iv) on the first Business Day following delivery to a reliable overnight courier service, courier fee prepaid, in any case at such address as may have been furnished to the Company or Holder, as the case may be, in writing by the Company or such Holder from time to time in accordance with the provisions of this Section 5.5. All notices to Holder shall be addressed as follows until the Company receives notice of a change of address in connection with a transfer or otherwise:

Notice to the Company shall be addressed as follows until Holder receives notice of a change in address:

ALX Oncology Holdings Inc.
Attn: Chief Financial Officer
866 Malcolm Road, Suite 100
Burlingame, CA 94010
With a copy (which shall not constitute notice) to:

Wilson Sonsini Goodrich & Rosati, P.C.
Attn: Kenneth A. Clark, Esq.
650 Page Mill Road
Palo Alto, CA 94304

5.6 Waiver. This Warrant and any term hereof may be changed, waived, discharged or terminated (either generally or in a particular instance and either retroactively or prospectively) only by an instrument in writing signed by the party against which enforcement of such change, waiver, discharge or termination is sought.

5.7 Attorneys' Fees. In the event of any dispute between the parties concerning the terms and provisions of this Warrant, the party prevailing in such dispute shall be entitled to collect from the other party all costs incurred in such dispute, including reasonable attorneys' fees.

5.8 Counterparts; Electronic Signatures; Status as Certificated Security. This Warrant may be executed by one or more of the parties hereto in any number of separate counterparts, all of which together shall constitute one and the same instrument. The Company, Holder and any other party hereto may execute this Warrant by electronic means and each party hereto recognizes and accepts the use of electronic signatures, including any Electronic Signature as defined in the Electronic Transactions Law (2003 Revision) of the Cayman Islands (the "Cayman Islands Electronic Signature Law"), and the keeping of records in electronic form, including any Electronic Record, as defined in Cayman Islands Electronic Signature Law, by any other party hereto in connection with the execution and storage hereof. To the extent that this Warrant or any agreement subject to the terms hereof or any amendment hereto is executed, recorded or delivered electronically, it shall be binding to the same extent as though it had been executed on paper with an original ink signature, as provided under applicable law, including, without limitation, any state law based on the Uniform Electronic Transactions Act or the Cayman Islands Electronic Signature Law; *provided* that sections 8 and 19(3) of the Cayman Islands Electronic Signature Law shall not apply to this Warrant or the execution or delivery hereof. The fact that this Warrant is executed, signed, stored or delivered electronically shall not prevent the transfer by any Holder of this Warrant pursuant to Section 5.4 or the enforcement of the terms hereof. To the extent that the original of this Warrant is an electronic original, this Warrant, and any copies hereof, shall NOT be deemed to be a "certificated security" within the meaning of section 8102(a)(4) of the California Commercial Code. Physical possession of the original of this Warrant or any paper copy thereof shall confer no special status to the bearer thereof.

5.9 Headings. The headings in this Warrant are for purposes of reference only and shall not limit or otherwise affect the meaning of any provision of this Warrant.

5.10 Business Days. "Business Day" is any day that is not a Saturday, Sunday or a day on which _____ is closed.

SECTION 6. GOVERNING LAW, VENUE, JURY TRIAL WAIVER,
AND JUDICIAL REFERENCE.

6.1 Governing Law. This Warrant shall be governed by and construed in accordance with the laws of the State of California, without giving effect to its principles regarding conflicts of law.

6.2 Jurisdiction and Venue. The Company and Holder each submit to the exclusive jurisdiction of the State and Federal courts in Santa Clara County, California; provided, however, that nothing in this Warrant shall be deemed to operate to preclude Holder from bringing suit or taking other legal action in any other jurisdiction to enforce a judgment or other court order in favor of Holder. The Company expressly submits and consents in advance to such jurisdiction in any action or suit commenced in any such court, and the Company hereby waives any objection that it may have based upon lack of personal jurisdiction, improper venue, or forum non conveniens and hereby consents to the granting of such legal or equitable relief as is deemed appropriate by such court. The Company hereby waives personal service of the summons, complaints, and other process issued in such action or suit and agrees that service of such summons, complaints, and other process may be made in accordance with Section 7.5 of this Warrant.

6.3 Jury Trial Waiver. **TO THE FULLEST EXTENT PERMITTED BY APPLICABLE LAW, THE COMPANY AND HOLDER EACH WAIVE THEIR RIGHT TO A JURY TRIAL OF ANY CLAIM OR CAUSE OF ACTION ARISING OUT OF OR BASED UPON THIS WARRANT, THE LOAN AGREEMENT OR ANY CONTEMPLATED TRANSACTION, INCLUDING CONTRACT, TORT, BREACH OF DUTY AND ALL OTHER CLAIMS. THIS WAIVER IS A MATERIAL INDUCEMENT FOR THE PARTIES' AGREEMENT TO THIS WARRANT. EACH PARTY HAS REVIEWED THIS WAIVER WITH ITS COUNSEL.**

6.4 Judicial Reference. **WITHOUT INTENDING IN ANY WAY TO LIMIT THE PARTIES' AGREEMENT TO WAIVE THEIR RESPECTIVE RIGHT TO A TRIAL BY JURY**, if the waiver of the right to a trial by jury in Section 6.3 above is not enforceable, the parties agree that any and all disputes or controversies of any nature between them arising at any time shall be decided by a reference to a private judge, mutually selected by the parties (or, if they cannot agree, by the Presiding Judge of the Santa Clara County, California Superior Court) appointed in accordance with California Code of Civil Procedure Section 638 (or pursuant to comparable provisions of federal law if the dispute falls within the exclusive jurisdiction of the federal courts), sitting without a jury, in Santa Clara County, California; and the parties hereby submit to the jurisdiction of such court. The reference proceedings shall be conducted pursuant to and in accordance with the provisions of California Code of Civil Procedure §§ 638 through 645.1, inclusive. The private judge shall have the power, among others, to grant provisional relief, including without limitation, entering temporary restraining orders, issuing preliminary and permanent injunctions and appointing receivers. All such proceedings shall be closed to the public and confidential and all records relating thereto shall be permanently sealed. If during the course of any dispute, a party desires to seek provisional relief, but a judge has not been appointed at that point pursuant to the judicial reference procedures, then such party may apply to the Santa Clara County, California Superior Court for such relief. The proceeding before the private judge shall be conducted in the same manner as it would be before a court under the rules of evidence applicable to judicial proceedings. The parties shall be entitled to discovery which shall be conducted in the same manner as it would be before a court under the rules of discovery applicable to judicial proceedings. The private judge shall oversee discovery and may enforce all discovery rules and orders applicable to judicial proceedings in the same manner as a trial court judge. The parties agree that the selected or appointed private judge shall have the power to decide all issues in the action or proceeding, whether of fact or of law, and shall report a statement of decision thereon pursuant to California Code of Civil Procedure § 644(a). Nothing in this Section 6.4 shall limit the

right of any party at any time to exercise self-help remedies or obtain provisional remedies. The private judge shall also determine all issues relating to the applicability, interpretation, and enforceability of this Section 6.4.

6.5 Survival. This Section 6 shall survive the termination of this Warrant.

[Remainder of page left blank intentionally]

[Signature page follows]

IN WITNESS WHEREOF, the parties have caused this Amended and Restated Warrant to Purchase Stock to be executed as a Deed by their duly authorized representatives effective as of the Issue Date written above.

“COMPANY”

ALX ONCOLOGY HOLDINGS INC.

By: _____

Name: _____
(Print)

Title:

“ORIGINAL ISSUER”

(solely with respect to Paragraph A above)

SIGNED AND DELIVERED for an on behalf of and as the deed of ALX ONCOLOGY LIMITED by its lawfully appointed attorney

_____ in the presence of:

(Signature)

(Signature of Witness)

(Name of Witness)

(Address of Witness)

(Occupation of Witness)

“HOLDER”

By: _____

Name: _____
(Print)

Title:

APPENDIX 1

NOTICE OF EXERCISE

1. The undersigned Holder hereby exercises its right to purchase _____ shares of the Common/Series _____ Preferred [circle one] Stock of _____ (the "**Company**") in accordance with the attached Warrant To Purchase Stock, and tenders payment of the aggregate Warrant Price for such shares as follows:

- check in the amount of \$ _____ payable to order of the Company enclosed herewith
- Wire transfer of immediately available funds to the Company's account
- Cashless Exercise pursuant to Section 1.2 of the Warrant
- Other [Describe] _____

2. Please issue a certificate or certificates representing the Shares in the name specified below:

 Holder's Name

 (Address)

3. By its execution below and for the benefit of the Company, Holder hereby restates each of the representations and warranties in Section 4 of the Warrant to Purchase Stock as of the date hereof.

HOLDER:

 By: _____
 Name: _____
 Title: _____
 (Date): _____

SCHEDULE 1

Company Capitalization Table

[OMITTED]

SPECIFIC TERMS IN THIS EXHIBIT HAVE BEEN REDACTED BECAUSE CONFIDENTIAL TREATMENT FOR THOSE TERMS HAS BEEN REQUESTED. THE REDACTED MATERIAL HAS BEEN SEPARATELY FILED WITH THE SECURITIES AND EXCHANGE COMMISSION, AND THE TERMS HAVE BEEN MARKED AT THE APPROPRIATE PLACE WITH THREE ASTERISKS [***].

EXCLUSIVE (EQUITY) AGREEMENT

This Exclusive (Equity) Agreement (“Agreement”) between THE BOARD OF TRUSTEES OF THE LELAND STANFORD JUNIOR UNIVERSITY (“Stanford”), an institution of higher education having powers under the laws of the State of California, and Alexo Therapeutics International, (“Alexo”), a Cayman Islands exempted company is effective on the 24th day of March, 2015 (“Effective Date”).

1. BACKGROUND

Stanford has an assignment of an invention that are [***] useful in treating diseases such as cancer. It is entitled [***] was invented in the laboratory of Drs. Chris Garcia and Irving Weissman, and is described in [***]. The invention was made in the course of research supported by the Howard Hughes Medical Institute (“HHMI”), the National Institutes of Health (NIH), and Ludwig Center at Stanford. HHMI has assigned its rights in such invention to Stanford and Stanford has the authority to license the entire interest in the invention subject to the reservation of rights to HHMI specified in this Agreement. In addition, Stanford is nonexclusively licensing a number of inventions in order to provide freedom to operate should claims be issued to such applications that would be necessary to practice the Licensed Patents. These include [***] Stanford wants to have the inventions perfected and marketed as soon as possible so that resulting products may be available for public use and benefit.

2. DEFINITIONS

- 2.1 “Exclusive” means that, subject to Articles 3 and 5, Stanford will not grant further licenses under the Licensed Patents in the Licensed Field of Use in the Licensed Territory.
- 2.2 “FDA” means the United States Food and Drug Administration, or any successor thereto.
- 2.3 “FD&C Act” means the United States Federal Food, Drug and Cosmetic Act of 1938 and applicable regulations promulgated thereunder, as amended from time to time.
- 2.4 “First Commercial Sale” of Licensed Product(s) means any transfer for value in an arms-length transaction to an independent third party distributor, agent or end user in a country after obtaining all approvals or authorizations from applicable regulatory authorities required for the manufacture, importation, marketing, promotion, pricing, reimbursement and sale of the Licensed Product(s) in such country.

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- 2.5 “Fully Diluted Basis” means the total number of shares of Alexo’s issued and outstanding common stock, assuming:
- (A) the conversion of all issued and outstanding securities convertible into common stock;
the exercise of all issued and outstanding warrants or options, regardless of whether then exercisable; and
 - (B) the issuance, grant, and exercise of all securities reserved for issuance pursuant to any Alexo stock or stock option plan then in effect.
- 2.6 “Human Efficacy Proof-of-Concept Clinical Trial” means a Phase I Expansion Clinical Trial or Phase II Clinical Trial designed to test some measure of efficacy of the drug in question.
- 2.7 “HHMI Indemnitees” means HHMI and its trustees, officers, employees, and agents.
- 2.8 “IND” means an investigational new drug application, as defined in the FD&C Act, or any equivalent document filed with the FDA and necessary for beginning clinical trials of any product in humans or any application or other documentation filed with any Regulatory Authority of a country other than the United States prior to beginning clinical trials of any product in humans in that country.
- 2.9 “Licensed Field of Use” means:
- (1) A SIRP α Component for use (a) [***] or (b) [***].
 - (2) The Licensed Field of Use specifically excludes [***].
 - (3) The SIRP α Component [***].
 - (4) The SIRP α Component [***].
 - (5) Any [***] containing SIRP α or any [***].
 - (6) For avoidance of doubt, the grant of a license to use a SIRP α Component [***] does not explicitly or implicitly grant Alexo a license to [***].
- [***] means [***].
- “SIRP α Component” means [***].
- 2.10 “Licensed Patents” means Stanford’s U.S. Patent Application, Serial Number [***], and any patents issued in respect of such applications; (ii) any continuation, division or continuation-in-part (to the extent such continuation-in-part relates to the Licensed Field of Use) of the patents and patent applications described in clause (i), (iii) any reissue, reexamination or extension of the patents and patent applications described in clauses (i) or (ii); and (iv) any foreign patent application or Letters Patent or supplementary protection certificates or the equivalent thereof in respect of the patents and patent applications described in clauses (i)-(iii).

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- 2.11 “Licensed Product” means [***] products:
the making, using, importing or selling of which, absent the license granted under this Agreement, would infringe a Valid Claim in the Licensed Patents or Nonexclusive Licensed Patents.
- 2.12 “Licensed Territory” means worldwide.
- 2.13 “Net Sales” means the aggregate amounts invoiced for sales or transfers for value of Licensed Products by Alexo, its affiliates or any of its sublicensees to an independent third party distributor, agent or end user (other than sales of Licensed Products at cost by Alexo, its affiliates or sublicensees to a third party for use in a clinical study prior to regulatory approval of such Licensed Product) less deductions selected as appropriate from: (i) customary discounts in the trade for quantity purchased, prompt payment or wholesalers and distributors; (ii) credits or refunds separately and actually credited or paid to customers for defective, spoiled, damaged, outdated or returned Licensed Products that do not exceed the original invoice amount; (iii) discounts mandated by, or granted to meet the requirements of, applicable state, provincial or federal law, paid or credited to a wholesaler, purchaser, third party or other contractee including required chargebacks and retroactive price reductions; (iv) rebates actually paid or credited to any governmental agency (or branch thereof) or to any third party payor, administrator or contractee; (v) sales, excise or use taxes paid, absorbed or allowed excluding net income tax, imposed upon the sale of the Licensed Product; and (vi) prepaid outbound transportation expenses and transportation insurance premiums that are separately billed to the customer or prepaid.
- In the event the Licensed Product is sold [***], or [***], the Net Sales [***], shall be determined by [***].
- Net Sales shall not include [***].
- Net Sales shall not include [***].
- 2.14 “Nonexclusive Licensed Patents” means Stanford’s U.S. Patent Application Serial Nos. [***]; (2) any continuation, division or continuation-in-part (to the extent such continuation-in-part relates to the Licensed Products and the Licensed Field of Use) of such patent application; (3) any reissue, reexamination or extension of such patent application; or
- (4) any foreign patent application or Letters Patent or supplementary protection certificates or the equivalent thereof in respect of such patent application, that would be infringed by the practice of the Licensed Patents to make, have made, use, import and sell Licensed Products for use in the Licensed Field of Use.
- 2.15 “Nonroyalty Sublicensing Consideration” means any consideration received by Alexo from a sublicensee hereunder but excluding any consideration for:
- [***].

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- 2.16 “Patent Matters” means preparing, filing, and prosecuting broad and extensive patent claims (including any interference or reexamination actions) for Stanford’s benefit in the Licensed Territory and for maintaining all Licensed Patents.
- 2.17 “Phase I Clinical Trial” means for the purpose of obtaining regulatory approval a study in humans the purpose of which is preliminary determination of safety of a Licensed Product in healthy individuals or patients that would satisfy the requirements of 21 C.F.R. 312.21(a).
- 2.18 “Phase I Expansion Clinical Trial” means a study in humans the purpose of which is further determination of safety and preliminary determination of signs of efficacy of a Licensed Product in patients of defined disease parameters after the initial completion of a Phase 1 dose escalation study.
- 2.19 “Phase II Clinical Trial” means for the purpose of obtaining regulatory approval a study in humans of the safety, dose range and efficacy of a Licensed Product that is prospectively designed to generate sufficient data to commence a Phase III Clinical Trial that would satisfy the requirements of 21 C.F.R. 312.21(b).
- 2.20 “Phase III Clinical Trial” means a controlled study in humans of the efficacy and safety of a Licensed Product that is prospectively designed to demonstrate statistically whether such Licensed Product is effective and safe for use in a particular indication in a manner sufficient to obtain regulatory approval to market such Licensed Product that would satisfy the requirements of 21 C.F.R. 312.21(c).
- 2.21 “Regulatory Authority” means any national, supra-national, regional, state or local regulatory agency, department, bureau, commission, council or other governmental entity in the Territory, including, without limitation, the FDA.
- 2.22 “Stanford Indemnitees” means Stanford and Stanford Hospitals and Clinics, and their respective trustees, officers, employees, students, agents, faculty, representatives, and volunteers.
- 2.23 “Sublicense(s)” means any agreement between Alexo and a third party that contains a grant to Stanford’s Licensed Patents regardless of the name given to the agreement by the parties; however, an agreement to make, have made, use or sell Licensed Products on behalf of Alexo is not considered a Sublicense.
- 2.24 “Valid Claim” means (1) an unexpired claim of an issued patent which has not been found to be un-patentable, invalid or unenforceable by a court or other authority in the subject country, from which decision no appeal is taken or can be taken; or (2) a claim of a pending application, which application claims a first priority no more than [***] years prior to the date upon which pendency is determined. For purposes of clarification, if a claim in an application has been pending for more than [***] years from its priority date, and a patent subsequently issues containing such claim, then upon issuance of the patent, the claim shall thereafter be considered a Valid Claim.

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2.25 Other Defined Terms. The following terms shall have the meanings set forth in the section appearing opposite such term

| | |
|--------------------------|--------------|
| “Agreement” | Recitals |
| “Alexo” | Recitals |
| “Claims” | Section 10.1 |
| “Effective Date” | Recitals |
| “First Round” | Section 7.3 |
| “HHMI” | Section 1 |
| “HHMI License” | Section 3.3 |
| “Losses” | Section 10.1 |
| “Major Market Countries” | Section 7.8 |
| “Parent” | Section 7.2 |
| “Stanford” | Recitals |
| “Successful Completion” | Appendix A. |

3. GRANT

- 3.1 **Grant.** Subject to the terms and conditions of this Agreement, Stanford grants Alexo (i) a exclusive, royalty-bearing, license under the Licensed Patents, including the right to make, have made, use, import, offer to sell and sell Licensed Products in the Licensed Territory in the Licensed Field of Use; and (ii) a non-exclusive, royalty-bearing license under the Nonexclusive Licensed Patents, including the right to make, have made, use, import, offer to sell and sell Licensed Products in the Licensed Territory in the Licensed Field of Use.
- 3.2 **Term.** The license granted under Section 3.1 shall take effect as of the Effective date and will remain in effect on a Licensed Product-by-Licensed Product and country-by-country basis until the later of (i) the expiration or revocation or complete rejection of the last to expire or to be revoked or to be completely rejected of any Licensed Patents or Nonexclusive Licensed Patents covering such Licensed Product in the country in which the Licensed Product is manufactured or sold, or (ii) if no Licensed Patents or Nonexclusive Licensed Patents exists in the relevant country covering the manufacture, use or sale of the relevant Licensed Product, until 10 years from the First Commercial Sale of such Licensed Product in such country. Thereafter, the licenses shall be fully paid-up and royalty-free.

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3.3 **Retained Rights.** (A) Stanford retains the right, on behalf of itself and all other non-profit research institutions, to practice the Licensed Patents and the Nonexclusive Licensed Patents for any non-profit purpose, including sponsored research and collaborations. Alexo agrees that, notwithstanding any other provision of this Agreement, it has no right to enforce the Licensed Patents and Nonexclusive Licensed Patents against any such institution. Stanford and any such other institution have the right to publish any information included in the Nonexclusive Licensed Patents or a Licensed Patent.

(B) Alexo acknowledges that it has been informed that the [***] Patents were developed, at least in part, by employees of HHMI and that HHMI has a paid-up, non-exclusive, irrevocable license to use the Licensed Patents or Nonexclusive Licensed Patents for HHMI's research purposes, but with no right to assign or sublicense (the "HHMI License"). This Agreement is explicitly made subject to the HHMI License.

3.4 **Other Rights.**

I) Stanford's Office of Technology Licensing, to the best of its knowledge as of the Effective Date, is not aware of any other patent applications controlled by Stanford and filed as of the Effective Date or any invention disclosure documents submitted to Stanford's Office of Technology Licensing on or before the Effective Date that are believed to be infringed by the practice of the Licensed Patents to make, have made, use, import and sell Licensed Products for use in the Licensed Field of Use.

II) Stanford does not:

(A) grant to Alexo any other licenses, implied or otherwise, to any patents or other rights of Stanford other than those rights granted under Licensed Patents and Nonexclusive Licensed Patents, regardless of whether the patents or other rights are dominant or subordinate to any Licensed Patents, or are required to exploit any Licensed Patents;

(B) commit to Alexo to bring suit against third parties for infringement, except as described in Article 14; and

(C) agree to furnish to Alexo any technology or technological information or to provide Alexo with any assistance.

4. **SUBLICENSING**

4.1 **Permitted Sublicensing.** Alexo may grant Sublicenses in the Licensed Field of Use only and only if Alexo is developing or selling Licensed Products. Sublicenses with any exclusivity must include diligence requirements commensurate with the diligence requirements of Appendix A. Stanford agrees that Alexo may apportion without discrimination between Alexo patents and the Licensed Patents and Nonexclusive Licensed Patents a commercially reasonable percentage of sublicensing payments made to Stanford pursuant to Section 4.6, provided however that Alexo provides Stanford with the proposed apportionment and justification prior Alexo's payment pursuant to Section 8.1. Stanford and Alexo agree to meet to discuss such proposed apportionment if in Stanford's opinion the apportionment does not reasonably reflect the value of the Licensed Patents.

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- 4.2 **Required Sublicensing.** If Alexo is not developing or commercializing Licensed Product with respect to an indication or a geography for which there is a company willing to be a sublicensee, Alexo will, at Stanford's request, negotiate in good faith a Sublicense with any such sublicensee for such indication or geography. Stanford would like licensees to address unmet needs, such as those of neglected patient populations or geographic areas, giving particular attention to improved therapeutics, diagnostics and agricultural technologies for the developing world. As an alternative to negotiating a Sublicense to a third party, Alexo (or one of its Affiliates or sublicensees) may submit to Stanford, within [***] after such third party's request for a sublicense, a plan for prompt and diligent development of a Licensed Product for the applicable indication or market. If Stanford approves this plan, such approval not to be unreasonably withheld, no third-party sublicense shall be required pursuant to this Section 4.2.
- 4.3 **Sublicense Requirements.** Any Sublicense:
- (A) is subject to this Agreement;
 - (B) will reflect that any sublicensee will not further sublicense;
 - (C) will prohibit sublicensee from paying royalties to an escrow or other similar account;
 - (D) will expressly include the provisions of Articles 8, 9, 10, 13, and Section 19.6 for the benefit of Stanford and/or HHMI, as applicable; and
 - (E) will include the provisions of Section 4.4 and require the transfer of all the sublicensee's obligations to Alexo, including the payment of royalties specified in the Sublicense, to Stanford or its designee, if this Agreement is terminated. If the sublicensee is a spin-out from Alexo, Alexo must guarantee the sublicensee's performance with respect to the payment of Stanford's share of Sublicense royalties.
- 4.4 **Litigation by Sublicensee.** Any Sublicense must include the following clauses:
- (A) In the event sublicensee brings an action seeking to invalidate any Licensed Patent:
 - (1) sublicensee will [***] during the pendency of such action. Moreover, should the outcome of such action determine that any claim of a patent challenged by the sublicensee is both valid and infringed by a Licensed Product, sublicensee will [***];
 - (2) sublicensee will [***] during the period challenge;
 - (3) any dispute regarding the validity of any Licensed Patent shall be [***], and the parties agree [***]; and
 - (4) sublicensee shall [***].

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(B) Sublicensee will provide written notice to Stanford at least [***] prior to bringing an action seeking to invalidate a Licensed Patent. Sublicensee will include with such written notice [***].

- 4.5 **Copy of Sublicenses and Sublicensee Royalty Reports.** Alexo will submit to Stanford a copy of each Sublicense, any subsequent amendments and all copies of sublicensees' royalty reports. Beginning with the first Sublicense, the Chief Financial Officer or equivalent will certify annually regarding the name and number of sublicensees.
- 4.6 **Sharing of Sublicensing Income.** Alexo will pay to Stanford a portion of all Nonroyalty Sublicensing Consideration for the Sublicense of Licensed Patents, as provided below:
- (A) The percentage payable to Stanford shall be (i) [***]% if the Sublicense is signed [***]; (ii) [***]% if the Sublicense is signed [***]; and (iii) [***]% if the Sublicense is signed [***].
- 4.7 **Royalty-Free Sublicenses.** Subject to Section 7.10(c) (concerning instances where Alexo may as part of an infringement or potential infringement dispute in which it believes it may be subject to infringement proceedings elect to as part of the resolution of such matter to enter into a royalty-free cross-licensing arrangement with a third party) and Section 14.7(C), if Alexo pays all royalties due Stanford from a sublicensee's Net Sales, Alexo may grant that sublicensee a royalty-free or non-cash:
- (A) Sublicense or
- (B) cross-license.

5. GOVERNMENT RIGHTS

This Agreement is subject to Title 35 Sections 200-204 of the United States Code. Among other things, these provisions provide the United States Government with nonexclusive rights in the Licensed Patent. They also impose the obligation that Licensed Product sold or produced in the United States be "manufactured substantially in the United States." Alexo will ensure all obligations of these provisions are met.

6. DILIGENCE

- 6.1 **Milestones.** Alexo will use commercially reasonable efforts to develop, commercialize, market and sell Licensed Products, in a manner consistent with the efforts normally used by similarly situated biotechnology companies with respect to a product to which such companies hold similar rights which is of similar market potential at a similar stage in the development or life of such product, taking into account issues of safety, efficacy, product profile, the competitiveness of the marketplace, the proprietary position of the product, the regulatory structure involved, profitability of the product and other relevant commercial factors. Stanford shall have the right to terminate the License Agreement if Alexo shall fail to apply such "commercially reasonable efforts" to develop, commercialize, market and sell Licensed Products. A determination of Alexo's satisfaction of its diligence obligations shall be made with reference to the milestones set forth in Appendix A.

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- 6.2 **Progress Report.** By [***] of each year, Alexo will submit a written annual report to Stanford covering the preceding calendar year. The report will include information sufficient to enable Stanford to satisfy reporting requirements of the U.S. Government and for Stanford to ascertain progress by Alexo toward meeting this Agreement’s diligence requirements. Each report will describe, where relevant: Alexo’s progress toward commercialization of Licensed Product, including work completed, key scientific discoveries, summary of work-in-progress, current schedule of anticipated events or milestones, market plans for introduction of Licensed Product, and significant corporate transactions involving Licensed Product. Alexo will specifically describe how each Licensed Product is related to each Licensed Patent.
- 6.3 **Clinical Trial Notice.** Alexo will notify Stanford prior to commencing any clinical trials at Stanford.

7. ROYALTIES

- 7.1 **Issue Royalty.** Alexo will pay to Stanford a non-creditable, nonrefundable license issue royalty of [***] within [***] days of the Effective Date.
- 7.2 **Equity Interest.** As further consideration, Alexo will cause Alexo Therapeutics Limited, a Private Irish Company Limited by Shares that is the sole shareholder of Alexo (“Parent”), to grant to Stanford [***] Ordinary Shares of stock in Parent. When issued, those shares will represent [***]% of the stock in Parent on a Fully Diluted Basis. Alexo agrees to provide Stanford with the capitalization table upon which the above calculation is made. All shares issued pursuant to this Section 7.2 and Section 7.3 shall be issued pursuant to a Stock Issuance Agreement between Parent and the recipient of the shares containing standard representations and warranties and other provisions with respect to the shares and the recipient’s qualifications under applicable securities laws to receive the shares. At that time, such Stock Issuance Agreement will provide share valuation information as needed in order for Stanford to issue 1099s to the inventors listed below.

Subject to compliance with applicable securities laws, Alexo will cause Parent to issue [***]% of all shares granted to Stanford pursuant to Section 7.2 and Section 7.3 directly to and in the name of the inventors listed below allocated as stated below:

- [***] — [***]%
- [***] – [***]%
- [***] – [***]%
- [***] – [***]%
- [***] – [***]%

- 7.3 **Anti-Dilution Protection.** Alexo will cause Parent, to issue Stanford, without further consideration, any additional shares of stock of the class issued pursuant to Section 7.2 necessary

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to ensure that the number of shares issued Stanford pursuant to Section 7.2 and this Section 7.3 does not represent less than [***]% of the shares issued and outstanding on a Fully-Diluted Basis at any time through the completion of issuance of all shares to be issued in connection with the First Round of bona fide equity investment in Parent from a single or group of investors which is both (i) at least \$[***] in size and (ii) involves the sale to outside investors of at least [***]% of the shares outstanding after such round on a Fully-Diluted Basis at a price per share which, when applied to stock actually outstanding immediately after such round, implies a post-financing equity valuation of Parent of at least \$[***]. A “First Round” is a bona fide round of equity, warrant, option or convertible equity investment which includes all the tranches prior to the completion of the financing. This right will expire upon the issuance of all shares to be issued in connection with such First Round, but will apply to all shares to be issued in or in connection with such First Round. The issuance of equity to Stanford will be pursuant to a Stock Subscription Agreement and a Stockholders Agreement between Parent and Stanford containing standard representations and warranties and other provisions consistent with the provisions applicable to other holders of Parent’s Ordinary Shares, including provisions consistent with Sections 7.2, 7.3, 7.4, 7.5, 7.6 and 7.7 of this Agreement.

7.4 Section 7.4 is set forth in Appendix D of this Agreement.

7.5 Section 7.5 is set forth in Appendix D of this Agreement.

7.6 Section 7.6 is set forth in Appendix D of this Agreement.

7.7 **License Maintenance Fee.** Alexo will pay Stanford a yearly license maintenance fee within [***] days after each of the following anniversaries of the Effective Date. Yearly maintenance payments are nonrefundable, but they are creditable each year as described in Section 7.11. The annual fee shall be [***] on the [***] anniversary of the Effective Date, \$[***] on the [***] anniversary of the Effective Date, and [***] on the [***] and each subsequent anniversary of the Effective Date.

7.8 **Milestone Payments.** Alexo will pay Stanford the following milestone payments upon the occurrence of each of the milestone events listed below. Milestones shall be due for the [***] Licensed Products that achieves the particular milestone regardless of the number of Licensed Products that achieve such milestone; such that if either of the [***] Licensed Products does not achieve any milestone(s), such non-achieved milestones shall be paid on any subsequent Licensed Product that achieves such milestone. On the date any one milestone set forth below is achieved, all lower numbered unachieved milestones shall be deemed to have been achieved and shall be paid (except to the extent they have been previously paid). In the event that a milestone payment is received by Alexo from a sublicensee for attaining any of the milestones listed below, Alexo shall pay to Stanford an amount equal to [***]:

| Milestone Event | Payment |
|-----------------|---------|
| (1)[***] | \$[***] |
| (2)[***] | \$[***] |

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| | |
|----------|---------|
| (3)[***] | [\$***] |
| (4)[***] | [\$***] |
| (5)[***] | [\$***] |
| (6)[***] | [\$***] |
| Total | [\$***] |

Alexo shall pay milestone payments within [***] days of the applicable milestone event, if achieved by Alexo, and within the earlier of [***] days of the applicable event or [***] days following the receipt of funds milestones, if a sublicensee achieves the milestone.

- 7.9 **Earned Royalty.** (a) Commencing with [***], Alexo shall pay to Stanford royalties [***] with respect to Licensed Products covered by Valid Claims of Licensed Patents or Nonexclusive Licensed Patents, equal to (i) [***]% of the portion of aggregate annual Net Sales of such Licensed Product that is [***]; (ii) [***]% of the portion of aggregate annual Net Sales of such Licensed Product that is [***]; and (iii) [***]% of the portion of aggregate annual Net Sales of such Licensed Product that is [***]. Alexo shall pay Stanford royalties with respect to Net Sales of Licensed Products that are not covered by Valid Claims of Licensed Patents or Nonexclusive Licensed Patents in the country where the sale is made but are covered by Valid Claims of Licensed Patents or Nonexclusive Licensed Patents in another country at a rate equal to [***]% of the rates set forth in clauses (a)(i)-(iii).
- (b) Alexo shall pay royalties with respect to each Licensed Product [***], or (ii) if [***].
- (c) If Alexo, in its reasonable judgment, elects to pay royalties or similar payments to one or more third parties for patented technology to avoid infringement by a Licensed Product or the manufacture of a Licensed Product of such third party patent(s), Alexo may, beginning from the date of such third party license, deduct [***]% of the amount of royalties paid to such third party on sales of Licensed Product under such licenses from the amounts payable to Stanford, provided that such deductions reduce by no more than [***]% the royalties otherwise due Stanford with respect to such Licensed Product.
- (d) Royalties are payable as long as a Valid Claim for the particular Licensed Product remains in effect.
- 7.10 **Earned Royalty if Alexo Challenges the Patent.** Notwithstanding the above, should Alexo bring an action seeking to invalidate any Licensed Patent, Alexo will pay royalties to Stanford [***] during the pendency of such action. Moreover, should the outcome of such action determine that any claim of a patent challenged by Alexo is both valid and infringed by a Licensed Product, Alexo will pay royalties [***].
- 7.11 **Creditable Payments.** The license maintenance fee for a year may be offset against earned royalty payments due on Net Sales occurring in that year.

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For example:

- (A) if Alexo pays Stanford a \$10 maintenance payment for year Y, and according to Section 7.9 \$15 in earned royalties are due Stanford for Net Sales in year Y, Alexo will only need to pay Stanford an additional \$5 for that year's earned royalties.
- (B) if Alexo pays Stanford a \$10 maintenance payment for year Y, and according to Section 7.9 \$3 in earned royalties are due Stanford for Net Sales in year Y, Alexo will not need to pay Stanford any earned royalty payment for that year. Alexo will not be able to offset the remaining \$7 against a future year's earned royalties.

7.12 **Obligation to Pay Royalties.** A royalty is due Stanford under this Agreement for any activity conducted under the licenses granted. For convenience's sake, the amount of that royalty is calculated using Net Sales. Nonetheless, if certain Licensed Products are [***], and those Licensed Products are [***], Alexo will pay Stanford an earned royalty for its exercise of rights based on the Net Sales of those Licensed Products.

7.13 **No Escrow.** Alexo shall not pay royalties into any escrow or other similar account.

7.14 **Currency.** Alexo will calculate the royalty on sales in currencies other than U.S. Dollars using the appropriate foreign exchange rate for the currency quoted by the Wall Street Journal on the close of business on the last banking day of each calendar quarter. Alexo will make royalty payments to Stanford in U.S. Dollars.

7.15 **Non-U.S. Taxes.** Alexo will pay all non-U.S. taxes related to royalty payments. These payments are not deductible from any payments due to Stanford.

7.16 **Interest.** Any payments not made when due will bear interest at the lower of (a) the Prime Rate published in the Wall Street Journal plus [***] basis points or (b) the maximum rate permitted by law.

8. ROYALTY REPORTS, PAYMENTS, AND ACCOUNTING

8.1 **Quarterly Earned Royalty Payment and Report.** Beginning with the first sale of a Licensed Product by Alexo or a sublicensee, Alexo will submit to Stanford a written report (even if there are no sales) and an earned royalty payment within [***] days after the end of each calendar quarter. This report will be in the form of Appendix B and will state the number, description, and aggregate Net Sales of Licensed Product during the completed calendar quarter. The report will include an overview of the process and documents relied upon to permit Stanford to understand how the earned royalties are calculated. With each report Alexo will include any earned royalty payment due Stanford for the completed calendar quarter (as calculated under Section 7.9).

8.2 **No Refund.** In the event that a validity or non-infringement challenge of a Licensed Patent brought by Alexo is successful, Alexo will have no right to recoup any royalties paid before or during the period challenge.

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- 8.3 **Termination Report.** Alexo will pay to Stanford all applicable royalties and submit to Stanford a written report within [***] days after the license terminates. Alexo will continue to submit earned royalty payments and reports to Stanford after the license terminates, until all Licensed Products made or imported under the license have been sold.
- 8.4 **Accounting.** Alexo will maintain complete and accurate records showing sufficient information to permit Stanford to determine the accuracy of royalty payments (including manufacture and sale), sublicensing revenue, and milestone achievement, in respect of a Licensed Product for [***] years from the date of sale of that unit of Licensed Product. Records shall be kept in accordance with Generally Accepted Accounting Practices or International Financial Reporting Standards, as applicable, and will include general-ledger records showing cash receipts and expenses, and records that include: production records, customers invoices, and related information in sufficient detail to enable Stanford to determine the royalties and other amounts payable under this Agreement.
- 8.5 **Audit by Stanford.** Alexo will allow an independent, certified public accountant selected by Stanford and reasonably acceptable to Alexo, which acceptance will not be unreasonably withheld or delayed to audit or inspect those records of Alexo relating to any amounts payable to Stanford under this Agreement for the purpose of verifying the accuracy of the reports required under Section 8.1. Such inspection will be conducted during Alexo's normal business hours at such place where such records are customarily kept, no more than [***]. Stanford agrees to hold in confidence all information concerning royalty payments and reports, and all information learned in the course of any audit or inspection, except to the extent necessary for Stanford to reveal such information in order to enforce its rights under this Agreement or if disclosure is required by law, regulation or judicial order. Any person or entity conducting such audit or inspection will agree in writing with Alexo to: (a) treat all records reviewed in the course of the audit or inspection as the confidential information of Alexo; (b) disclose to Stanford only the amount and accuracy of payments reported and actually paid or otherwise payable under this Agreement and the specific details concerning any discrepancies.
- 8.6 **Paying for Audit.** Stanford will pay for any audit done under Section 8.5. But if the audit reveals an underreporting of earned royalties due Stanford of [***]% or more for the period being audited, Alexo will pay the audit costs.

9. EXCLUSIONS AND NEGATION OF WARRANTIES

- 9.1 **Negation of Warranties.** Stanford provides Alexo the rights granted in this Agreement AS IS and WITH ALL FAULTS. Stanford makes no representations and extends no warranties of any kind, either express or implied. Among other things, Stanford disclaims any express or implied warranty:
- (A) of merchantability, of fitness for a particular purpose;
 - (B) of non-infringement; or
 - (C) arising out of any course of dealing.

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9.2 **No Representation of Licensed Patent.** Alexo also acknowledges that Stanford does not represent or warrant:

- (A) the validity or scope of any Licensed Patents or Nonexclusive Licensed Patents; or
- (B) that the exploitation of Licensed Patents or Nonexclusive Licensed Patents will be successful.

10. INDEMNITY

10.1 **Indemnification.** (A) Alexo will, and will require sublicensees to, indemnify, hold harmless, and defend all Stanford Indemnitees against any claims, suits, losses, damages, costs, fees, and expenses of any kind (collectively, "Losses") incurred by or imposed upon them in connection with any third party claims, suits or actions resulting from arising out of or related to the exercise of any rights granted Alexo under this Agreement or the breach of this Agreement by Alexo, its sublicensees or affiliates. Alexo's indemnification under this Section 10.1(A) shall not apply to Losses that arise as a result of Stanford's practice of the rights it reserves under Section 3.3.

(B) HHMI and its trustees, officers, employees and agents (collectively, "HHMI Indemnitees"), will be indemnified, defended by counsel acceptable to HHMI, and held harmless by Alexo from and against any claim, expense, damage, deficiency, liability, cost, loss or obligation of any kind or nature (including, without limitation, reasonable attorneys' fees and other costs and expenses of defense), (collectively, "Claims"), based upon, arising out of, or otherwise relating to this Agreement or any Sublicense, including without limitation any cause of action relating to product liability. The previous sentence will not apply to any Claim that is determined with finality by a court of competent jurisdiction to result solely from the gross negligence or willful misconduct of an HHMI employee.

(C) To receive the benefit of indemnification under Section 10.1(a) or Section 10.1(b), as applicable, Stanford Indemnitees or HHMI Indemnitees must promptly notify Alexo in writing of any claim or suit brought against Stanford Indemnitees or HHMI Indemnitees in respect of which Stanford Indemnitees or HHMI Indemnitees intend(s) to invoke the provisions of this Article 10. In the case of any HHMI Indemnitee, such notice shall be given reasonably promptly following actual receipt of written notice thereof by an officer or attorney of HHMI. Notwithstanding the foregoing, the delay or failure of any Stanford Indemnitee or HHMI Indemnitee to give reasonably prompt notice to Alexo of any such claim or suit shall not affect the rights of such Stanford Indemnitee or HHMI Indemnitee under this Article 10 unless, and then solely to the extent that, such failure actually and materially prejudices the rights of Alexo. To receive the benefit of indemnification under Section 10.1(a) or Section 10.1(b), as applicable, the Stanford Indemnitees or HI-MI Indemnitees, as applicable, will provide reasonable cooperation (at Alexo's expense) in the defense or settlement of such claim or suit; and tender to Alexo (and its insurer) full authority to defend or settle the claim or suit, subject to the limitation set forth below with respect to settlement by Alexo. Alexo shall keep the Stanford Indemnitees or HHMI Indemnitees, as applicable, informed on a current basis of its defense of any claims or suits under this Article. Alexo will not settle any claim or suit against Stanford Indemnitees or HHMI Indemnitees without Stanford's or HHMI's written consent, as applicable, where (1) such settlement would include any admission of liability or admission of wrong doing on the part of the indemnified

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party, (2) such settlement would impose any restriction on Stanford Indemnitees or HHMI Indemnitees' conduct of any of its activities, or (3) such settlement would not include an unconditional release of Stanford Indemnitees or HHMI Indemnitees from all liability for claims that are the subject matter of the settled claim. Alexo has no obligation to indemnify Stanford Indemnitees' or HHMI Indemnitees' in connection with any settlement made without Alexo's written consent.

- 10.2 **No Indirect Liability.** Stanford is not liable for any special, consequential, lost profit, expectation, punitive or other indirect damages in connection with any claim arising out of or related to this Agreement, whether grounded in tort (including negligence), strict liability, contract, or otherwise.
- 10.3 **Workers' Compensation.** Alexo will comply with all statutory workers' compensation and employers' liability requirements for activities performed under this Agreement.
- 10.4 **Insurance.** During the term of this Agreement, Alexo will maintain Comprehensive General Liability Insurance, including Product Liability Insurance, at all times when any Licensed Product is being clinically tested with human subjects or commercially distributed or sold, with a reputable and financially secure insurance carrier or self-insurance that is reasonably acceptable to Stanford to cover the activities of Alexo and its sublicensees. The insurance will provide minimum limits of liability of \$[***] and will include all Stanford Indemnitees and HHMI Indemnitees as additional insureds. Insurance must cover claims incurred, discovered, manifested, or made during or after the expiration of this Agreement and must be placed with carriers with ratings of at least A- as rated by A.M. Best. Within [***] days of the Effective Date of this Agreement, Alexo will furnish a Certificate of Insurance evidencing primary coverage and additional insured requirements. Alexo will provide to Stanford [***] days prior written notice of cancellation or material change to this insurance coverage. Alexo will advise Stanford in writing that it maintains excess liability coverage (following form) over primary insurance for at least the minimum limits set forth above. All insurance of Alexo will be primary coverage; insurance of Stanford Indemnitees and HHMI Indemnitees will be excess and noncontributory.

11. EXPORT

Alexo and its affiliates and sublicensees shall comply with all United States laws and regulations controlling the export of licensed commodities and technical data. (For the purpose of this paragraph, "licensed commodities" means any article, material or supply but does not include information; and "technical data" means tangible or intangible technical information that is subject to U.S. export regulations, including blueprints, plans, diagrams, models, formulae, tables, engineering designs and specifications, manuals and instructions.) These laws and regulations may include, but are not limited to, the Export Administration Regulations (15 CFR 730-774), the International Traffic in Arms Regulations (22 CFR 120-130) and the various economic sanctions regulations administered by the U.S. Department of the Treasury (31 CFR 500-600).

Among other things, these laws and regulations prohibit or require a license for the export or retransfer of certain commodities and technical data to specified countries, entities and persons. Alexo hereby gives written assurance that it will comply with, and will cause its affiliates and sublicensees

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to comply with all United States export control laws and regulations, that it bears sole responsibility for any violation of such laws and regulations by itself or its affiliates or sublicensees, and that it will indemnify, defend and hold Stanford and HHMI harmless for the consequences of any such violation.

12. MARKING

Before any Licensed Patent issues, Alexo will mark Licensed Product with the words "Patent Pending." Otherwise, Alexo will mark Licensed Product with the number of any issued Licensed Patent.

13. STANFORD AND HHMI NAMES AND MARKS

Alexo will not use (i) Stanford's or HHMI's name or other trademarks, (ii) the name or trademarks of any organization related to Stanford or HHMI, or (iii) the name of any Stanford or HHMI faculty member, employee, student or volunteer without the prior written consent of the party (Stanford or HHMI as the case may be) whose name or trademark is being used. Permission may be withheld at Stanford's or HHMI's sole discretion. This prohibition includes, but is not limited to, use in press releases, advertising, marketing materials, other promotional materials, presentations, case studies, reports, websites, application or software interfaces, and other electronic media.

14. PROSECUTION AND PROTECTION OF PATENTS

14.1 Patent Prosecution.

Stanford will control, in consultation with Alexo, the preparation and prosecution of all patent applications and the maintenance of all patents related to Licensed Patents using independent patent counsel mutually acceptable to each of Stanford and Alexo. Patent counsel will directly notify Alexo and provide Alexo copies of any official communications from United States and foreign patent offices relating to prosecution of the Licensed Patents, as well as copies of relevant communications to the various patent offices so that Alexo may be informed and apprised of the continuing prosecution of Licensed Patents. Alexo will have reasonable opportunities to participate in key decisions affecting filing, prosecution and maintenance of the Licensed Patents, including, without limitation, opportunity to review and provide comment on amendments and responses in the course of the prosecution of Licensed Patents. Stanford will consider in good faith Alexo's reasonable suggestions regarding said prosecution. Stanford will use reasonable efforts to amend any patent application to include claims reasonably requested by Alexo in order to cover a Licensed Product. Any differences between Alexo and Stanford with respect to preparation, filing, prosecution, issuance and maintenance matters will be discussed and resolved to their mutual satisfaction; provided, that if any disagreement regards solely the costs associated with a particular proposed action, the requirement that the parties mutually agree upon resolution of the matter shall not apply. No case will be abandoned without giving Alexo at least [***] days notice and opportunity to pursue the application. Alexo will reimburse Stanford upon receipt of invoice for all documented expenses related to prosecution of the Licensed Patents upon receipt of invoice incurred in connection with the filing and prosecution of the patent applications and maintenance of the patents. If Alexo is not interested in filing patent applications covering Licensed Patents in a particular jurisdiction and Stanford determines that it wishes to file patent applications in said jurisdiction, Stanford may do so at its expense and Alexo's license shall not include rights in such jurisdiction.

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- 14.2 **Patent Costs.** Within [***] days after receiving a statement from Stanford, Alexo will reimburse Stanford:
- (A) [***] to offset Licensed Patent's patenting expenses, including any interference or reexamination matters, incurred by Stanford before the Effective Date; and
 - (B) for all Licensed Patent's patenting expenses, including any interference or reexamination matters, incurred by Stanford after the Effective Date. In all instances, Stanford will pay the fees prescribed for large entities to the United States Patent and Trademark Office.
- 14.3 **Infringement Procedure.** Alexo will promptly notify Stanford if it believes a third party infringes a Licensed Patents or if a third party files a declaratory judgment action with respect to any Licensed Patents. Alexo shall have the right to institute a suit against or defend any declaratory judgment action initiated by this third party as provided in Section 14.4 through and including Section 14.8.
- 14.4 **Stanford Suit.** Subject to Section 14.6, Stanford has the first right to institute suit, and may name Alexo as a party for standing purposes for Licensed Patents and Stanford has the sole right to institute suit as it relates to Nonexclusive Licensed Patents. If Stanford decides to institute suit for Licensed Patents, it will notify Alexo in writing. If Alexo does not notify Stanford in writing that it desires to jointly prosecute the suit within [***] days after the date of the notice, Alexo will [***]. Stanford will bear the entire cost of the litigation and will [***]. Stanford will not [***]. Stanford shall impose this obligation on [***].
- 14.5 **Joint Suit.** If Stanford and Alexo so agree, they may institute suit or defend the declaratory judgment action jointly. If so, they will:
- (A) prosecute the suit in both their names;
 - (B) bear the out-of-pocket costs [***];
 - (C) share any recovery or settlement [***]; and
 - (D) agree how they will exercise control over the action.
- 14.6 **Alexo Suit.** With respect to patents licensed exclusively to Alexo, Alexo shall have a [***] option to pursue infringers. If Alexo [***], or if Alexo [***], Stanford may [***]. Alexo will diligently pursue the suit and Alexo will bear the entire cost of the litigation, including expenses and counsel fees incurred by Stanford. Alexo will keep Stanford reasonably apprised of all developments in the suit, and will seek Stanford's input and approval on any substantive submissions or positions taken in the litigation regarding the scope, validity and enforceability of the Licensed Patent. Alexo will not prosecute, settle or otherwise compromise any such suit in a manner that adversely affects Stanford's interests without Stanford's prior written consent. Stanford may be named as a party only if:
- (A) Alexo's and Stanford's respective counsel recommend that such action is necessary in their reasonable opinion to achieve standing;

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(B) Stanford is not the first named party in the action; and

(C) the pleadings and any public statements about the action state that Alexo is pursuing the action and that Alexo has the right to join Stanford as a party.

14.7 **Recovery.** If Alexo sues under Section 14.6, then any recovery in excess of any unrecovered litigation costs and fees will be shared with Stanford as follows:

[***]

14.8 **Abandonment of Suit.** If either Stanford or Alexo commences a suit and then wants to abandon the suit, it will give timely notice to the other party. The other party may continue prosecutions of the suit after Stanford and Alexo agree on the sharing of expenses and any recovery in the suit.

15. TERMINATION

15.1 **Termination by Alexo.** Alexo may terminate this Agreement on a Licensed Product-by-Licensed product basis by giving Stanford written notice at least 60 days in advance of the effective date of termination selected by Alexo.

15.2 Termination by Stanford.

(A) Stanford may also terminate this Agreement on a Licensed Product-by-Licensed product basis if Alexo:

(1) is delinquent on any report or payment;

(2) is not diligently developing and commercializing Licensed Product with respect to a market or indication and a third party seeks rights with respect to such indication or market and Alexo does not within [***] either (A) [***] or (B) [***];

(3) misses a milestone described in Appendix A;

(4) is in breach of any provision of this Agreement; or

(5) provides any false report.

(B) Termination under this Section 15.2 will take effect 60 days after written notice by Stanford unless Alexo remedies the problem in that 60-day period.

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15.3 **Surviving Provisions.** Surviving any termination or expiration are:

- (A) Alexo's obligation to pay royalties accrued or accruable;
- (B) any claim of Alexo or Stanford, accrued or to accrue, because of any breach or default by the other party; and
- (C) the provisions of Articles 8, 9, 10, and 19.6 and any other provision that by its nature is intended to survive.
- (D) Sublicenses granted in accordance with this Agreement shall survive termination, provided the sublicensee agrees in writing that: [***]. All payments due to Alexo from such sublicensees under the Sublicense will [***], but Alexo shall [***].

16. ASSIGNMENT

16.1 **Permitted Assignment by Alexo.** Subject to Section 16.3, Alexo may assign this Agreement as part of a sale or change of control, regardless of whether such a sale or change of control occurs through an asset sale, stock sale, merger or other combination, or any other transfer of:

- (A) Alexo's entire business; or
- (B) that part of Alexo's business that exercises all rights granted under this Agreement.
- (C) For the avoidance of doubt, it is understood and agreed that a change of control shall not include (i) the grant of a sublicense or (ii) any transaction or series of related transactions effected primarily for the purpose of providing financing to Alexo or (iii) any transaction or series of related transactions effected primarily for the purpose of reincorporating in another jurisdiction.

16.2 **Any Other Assignment by Alexo.** Any other attempt to assign this Agreement by Alexo is null and void; provided that Alexo may assign this Agreement in any transaction or series of related transactions among Alexo and any entity that, directly or indirectly, is controlled by, controls or is under common control with Alexo. For purposes of this Section 16.2 only, "control" means the direct or indirect ownership of more than fifty percent (50%) of the voting or income interest in the applicable entity (or such lesser maximum percentage permitted in those jurisdictions where majority ownership by foreign entities is prohibited) or the possession otherwise, directly or indirectly, of the power to direct the management or policies of such entity.

16.3 **Conditions of Assignment.** Prior to any assignment, the following conditions must be met:

- (A) Alexo must give Stanford [***] written notice of the assignment, including the new assignee's contact information; and
- (B) the new assignee must agree in writing to Stanford to be bound by this Agreement; and
- (C) Stanford must have received [***].

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16.4 **After the Assignment.** Upon a permitted assignment of this Agreement pursuant to Article 16.3, Alexo will be released of liability under this Agreement and the term “Alexo” in this Agreement will mean the assignee.

16.5 **Bankruptcy.** In the event of a bankruptcy, assignment is permitted only to a party that can provide adequate assurance of future performance, including diligent development and sales, of Licensed Product.

17. DISPUTE RESOLUTION

17.1 **Dispute Resolution by Arbitration.** Any dispute between the parties regarding [***] will be settled by arbitration in accordance with the JAMS Arbitration Rules and Procedures. The parties are not obligated to settle any other dispute that may arise under this Agreement by arbitration. Notwithstanding the foregoing, no dispute affecting the rights or property of HHMI shall be subject to the arbitration provisions set forth in this Article 17.

17.2 **Request for Arbitration.** Either party may request such arbitration. Stanford and Alexo will mutually agree in writing on a third party arbitrator within [***] of the arbitration request. The arbitrator’s decision will be final and nonappealable and may be entered in any court having jurisdiction.

17.3 **Discovery.** The parties will be entitled to discovery as if the arbitration were a civil suit in the California Superior Court. The arbitrator may limit the scope, time, and issues involved in discovery.

17.4 **Place of Arbitration.** The arbitration will be held in Stanford, California unless the parties mutually agree in writing to another place.

17.5 **Patent Validity.** Any dispute regarding the validity of any Licensed Patent shall be litigated in the courts located in Santa Clara County, California, and the parties agree not to challenge personal jurisdiction in that forum.

18. NOTICES

18.1 **Legal Action.** Alexo will provide written notice to Stanford at least [***] prior to bringing an action seeking to invalidate any Licensed Patents or a declaration of non-infringement. Alexo will include with such written notice [***].

18.2 **All Notices.** All notices under this Agreement are deemed fully given when written, addressed, and sent as follows:

All general notices to Alexo are mailed or emailed to:

Alexo Therapeutics International
c/o Alexo Therapeutics, Inc.
[***]

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All financial invoices to Alexo (i.e., accounting contact) are e-mailed to:
Alexo Therapeutics International
c/o Alexo Therapeutics, Inc.
[***]

All progress report invoices to Alexo (i.e., technical contact) are e-mailed to:
Alexo Therapeutics International
c/o Alexo Therapeutics, Inc.
[***]

All general notices to Stanford are e-mailed or mailed to:
Office of Technology Licensing
1705 El Camino Real
Palo Alto, CA 94306-1106
info@otlmail.stanford.edu

All payments to Stanford are mailed to:
Stanford University
Office of Technology Licensing
Department #44439
P.O. Box 44000
San Francisco, CA 94144-4439

All progress reports to Stanford are e-mailed or mailed to:
Office of Technology Licensing
3000 El Camino Real
Building 5, Suite 300
Palo Alto, CA 94306-1106
info@otlmail.stanford.edu

Either party may change its address with written notice to the other party.

19. MISCELLANEOUS

19.1 **Waiver.** No term of this Agreement can be waived except by the written consent of the party waiving compliance.

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- 19.2 **Choice of Law.** This Agreement and any dispute arising under it is governed by the laws of the State of California, United States of America, applicable to agreements negotiated, executed, and performed within California.
- 19.3 **Entire Agreement.** The parties have read this Agreement and agree to be bound by its terms, and further agree that it constitutes the complete and entire agreement of the parties and supersedes all previous communications, oral or written, and all other communications between them relating to the license and to the subject hereof. This Agreement may not be amended except by writing executed by authorized representatives of both parties. No representations or statements of any kind made by either party, which are not expressly stated herein, will be binding on such party.
- 19.4 **Exclusive Forum.** The state and federal courts having jurisdiction over Stanford, California, United States of America, provide the exclusive forum for any court action between the parties relating to this Agreement. Alexo submits to the jurisdiction of such courts, and waives any claim that such a court lacks jurisdiction over Alexo or constitutes an inconvenient or improper forum.
- 19.5 **Headings.** No headings in this Agreement affect its interpretation.
- 19.6 **HHMI Third Party Beneficiary Status.** HHMI is not a party to this Agreement and has no liability to Alexo, Affiliates, any sublicensee, or user of anything covered in this Agreement, but HHMI is an intended third-party beneficiary of this Agreement and certain of its provisions are for the benefit of HHMI and are enforceable by HHMI in its own name.
- 19.7 **Electronic Copy.** The parties to this document agree that a copy of the original signature (including an electronic copy) may be used for any and all purposes for which the original signature may have been used. The parties further waive any right to challenge the admissibility or authenticity of this document in a court of law based solely on the absence of an original signature.

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The parties execute this Agreement in duplicate originals by their duly authorized officers or representatives.

THE BOARD OF TRUSTEES OF THE LELAND
STANFORD JUNIOR UNIVERSITY

Signature: /s/ Kirsten Leute
Name: Kirsten Leute
Acting Director, Office of Technology
Title: Licensing
Date: March 24, 2015

Alexo Therapeutics International

Signature: /s/ Corey Goodman
Name: Corey Goodman
Chair, Board of Directors
Title: March 24, 2015
Date:

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*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. *** indicates that text has been omitted and is the subject of a confidential treatment request.

Stanford Docket No. S

This report is provided pursuant to the license agreement between Stanford University and
(Alexo Name)

License Agreement Effective Date:

Name(s) of Licensed Products being reported:

| | |
|--------------------------------|----|
| Report Covering Period | |
| Yearly Maintenance Fee | \$ |
| Number of Sublicenses Executed | |
| Gross Revenue | |
| U.S. Gross Revenue | \$ |
| Non-U.S. Gross Revenue | \$ |
| Net Sales | |
| U.S. Gross Revenue | \$ |
| Non-U.S. Gross Revenue | \$ |
| Royalty Calculation | |
| Royalty Subtotal | \$ |
| Credit | \$ |
| Royalty Due | \$ |

Comments:

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The Board of Trustees of the Leland Stanford Junior University (“STANFORD”); and Alexo Therapeutics International a Cayman Islands exempted company, with a mailing address at [951 Gateway Blvd, Suite 201, South San Francisco, CA 94080], (“ALEXO”); have agreed to use the law firm of _____ (“FIRM”) to prepare, file and prosecute the pending patent applications listed in Exhibit A attached hereto and maintain the patents that issue thereon (“Patents”).

WHEREAS, FIRM desires to perform the legal services related to obtaining and maintaining the Patents; and

WHEREAS, STANFORD remains the client of the FIRM; and

WHEREAS, ALEXO is the licensee of STANFORD’s interest in the Patents;

NOW THEREFORE, in consideration of the premises and the faithful performance of the covenants herein contained, IT IS AGREED:

1. FIRM can interact directly with ALEXO on all patent prosecution matters related to the Patents and will copy STANFORD on all correspondence. STANFORD will be notified by FIRM prior to any substantive actions and will have final approval on proceeding with such actions. In addition, as prosecution proceeds, FIRM will notify STANFORD if there is any change in inventorship from the originally filed application.
2. ALEXO is responsible for the payment of all charges and fees by FIRM related to the prosecution and maintenance of the Patents. FIRM will invoice ALEXO and ALEXO must pay FIRM directly for all charges. If STANFORD requests, STANFORD will be copied on all invoices and payments. FIRM must inform STANFORD within 90 days if the licensee is delinquent on payment. Otherwise, STANFORD will not be responsible for those expenses.
3. Notices and copies of all correspondence should be sent to the following:

To ALEXO:

Name, Title
Alexo
Address

To STANFORD:

Office of Technology Licensing
Stanford University
3000 El Camino Real
Building 5, Suite 300
Palo Alto, CA 94306-1106

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To FIRM:

Attorney Name
Law Firm Address

4. The parties to this document agree that a copy of the original signature (including an electronic copy) may be used for any and all purposes for which the original signature may have been used. The parties further waive any right to challenge the admissibility or authenticity of this document in a court of law based solely on the absence of an original signature.

ACCEPTED AND AGREED TO:

STANFORD

By: _____
Name: Katharine Ku
Title: Director
Date: _____

Alexo Therapeutics International

By: _____
Name: _____
Title: _____
Date: _____

Law Firm Name

By: _____
Name: _____
Title: _____
Date: _____

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- 7.4 [***] Purchase Right. In any private offering of Parent's equity securities (or securities convertible into or exercisable for Parent's equity securities) for cash (or in satisfaction of debt issued for cash) having its final closing held on or after the date of this Agreement, Stanford may purchase for cash up to [***]% of the securities issued in such offering. This right will expire following the [***] round of bona fide equity investment in Parent from a single investor or group of investors that includes at least one venture capital, professional angel, corporate or other similar institutional investor (other than Stanford) and that either (i) [***] or (ii) [***]. For the avoidance of doubt, any securities Stanford may acquire or have the right to acquire under Sections 7.2 and 7.3 shall not reduce or increase the number of securities Stanford may purchase under this Section 7.4.
- 7.5 Future Offerings; Limitation on Right to Purchase. In any private offering of Parent's equity securities (or securities convertible into or exercisable for Parent's equity securities) in exchange for cash (or in satisfaction of debt issued for cash) after the offering described in Section 7.4, Stanford may purchase for cash that number of the securities issued in such offering as is necessary for Stanford to maintain its pro rata ownership interest in Parent Preferred Shares on a Fully-Diluted Basis. For the avoidance of doubt: (i) any securities Stanford may acquire or have the right to acquire under Section 7.3 shall not reduce or increase the number of securities Stanford may purchase under this Section 7.5; (ii) if both Section 7.4 and this Section 7.5 apply to an offering, the provision granting Stanford the superior rights will govern; and (iii) Stanford shall not be obligated to purchase under Section 7.4 or 7.5 any Parent securities it has the right to acquire under Section 7.3. This participation right will expire [***].
- 7.6 Purchase Terms and Procedures; Financial Information; Notices.
- (A) In any offering subject to Section 7.4 or 7.5:
- (1) Parent will give Stanford notice of the terms of the offering, including: (i) the names of the investors, the allocation of shares among them and the total amounts to be invested by each of them in such offering; (ii) pre- and post-(projected) financing capitalization table; (iii) investor presentation (if available); (iv) an introduction to the lead investor in such offering for the purpose of discussing the lead investor's due diligence process; and (v) such other documents and information as Stanford may reasonably request for the purpose of making an investment decision or verifying the number of shares it is entitled to purchase in such offering;
 - (2) Stanford's purchase right shall be on the same terms and conditions as the other investors in such offering and Stanford shall enter into any necessary agreement with Parent and such other investors for the purpose of implementing the provisions of Sections 7.4, 7.5, and 7.6, except that [***];
 - (3) Stanford may elect to exercise its right of purchase, in whole or in part, by notice given to Parent within 15 Stanford business days (i.e., days other than Saturdays, Sundays, and holidays or other days on which Stanford is officially closed) after receipt of Parent's notice; and

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- (4) If Stanford elects not to purchase, or fails to give an election notice within such period, Stanford's purchase right will not apply to the offering if (and only if and to the extent) it is consummated within [***] on the same or less favorable (to the investor) terms as stated in Parent's notice to Stanford.
- (B) Stanford's rights under Sections 7.4 and 7.5 will not apply to: **(1)** Ordinary Shares issued or issuable as a dividend or other distribution on Preferred Shares; **(2)** Ordinary Shares issued or issuable by reason of a dividend or other distribution on Ordinary Shares **(3)** Ordinary Shares issued or issuable upon conversion of shares of Preferred Shares; **(4)** Ordinary Shares or options or restricted stock awards or other rights therefore issued or issuable to directors, officers, employees or consultants of Parent in consideration for their service to Parent pursuant to any written agreement, plan or arrangement (including, without limitation, any stock option plan, stock purchase plan, stock purchase agreement or subscription agreement) approved by the Parent Board of Directors, including a majority of those Directors designated by holders of Preferred Shares; **(5)** securities issued to the public in a firm commitment underwritten public offering pursuant to an effective registration statement filed under the Securities Act of 1933, as amended; **(6)** securities issued pursuant to the acquisition by the Parent of another corporation or other entity by consolidation, corporate reorganizations, or merger, or purchase of all or substantially all of the assets of such corporation or other entity as approved by the Parent Board of Directors, including a majority of those Directors designated by the holders of Series A Preferred; **(7)** securities issued in connection with equipment leasing, real estate, bank financing or similar transactions approved by the Parent Board of Directors, including a majority of those Directors designated by the holders of the Preferred Shares; and **(8)** any securities issued or issuable upon conversion, exercise or exchange of any other securities that are covered by (1)-(7).
- (C) The rights granted in Sections 7.4 and 7.5 will terminate (in addition to any earlier termination pursuant to their terms): (i) immediately before the closing of a firm commitment underwritten public offering of Parent's Ordinary Shares, (ii) upon the conversion of all shares of Preferred Shares into Ordinary Shares, or (iii) upon the closing of a sale or change of control of the Parent as described in Section 16.1(A), regardless of whether such a sale or change of control occurs through an asset sale, stock sale, merger or other combination; provided that [***], then this Section 7.7(C)(iii) shall also apply upon the closing of a sale or change of control of Parent as described in Section 16.1(B).
- (D) Parent shall furnish to Stanford, at the same time it provides such information to holders of the its Preferred Shares, Parent's annual financial statements and annual operating plan, including an annual report of the holders of Parent's capital stock and other securities, and such other information as Stanford may reasonably request from time to time for the purpose of valuing its interest in Parent.
- (E) Notwithstanding any notice provision in this Agreement to the contrary, any notice given under this Agreement that refers or relates to any of Section 7.3 through and including Section 7.6 shall be copied concurrently to pvfnotices@stanford.edu; provided, however, that delivery of the copy will not by itself constitute notice for any purpose under this Agreement.

*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

EXCLUSIVE (EQUITY) AGREEMENT AMENDMENT NO. 1

THE BOARD OF TRUSTEES OF THE LELAND STANFORD JUNIOR UNIVERSITY (“Stanford”), an institution of higher education having powers under the laws of the State of California, and Alexo Therapeutics International, (“Alexo”), a Cayman Islands exempted company, entered into the certain Exclusive (Equity) Agreement (“Agreement”) effective on the 24th day of March, 2015 (“Effective Date”).

Pursuant to Section 19.3 of the Agreement, Stanford and Alexo wish to enter into this Amendment No. 1 to the Agreement (“Amendment No. 1”) effective as of April 24, 2015 (the “Amendment Date”). Capitalized terms used in this Amendment No. 1 and not defined herein are used with the meanings ascribed to them in the Agreement.

1. **Licensed Field of Use Definition.** Section 2.9(3) of the Agreement is hereby amended to read in full as follows:

“(3) *The SIRPa Component* [***].”

2. **Nonexclusive Licensed Patents Definition.** Section 2.14 of the Agreement is hereby amended to read in full as follows:

“2.14 “Nonexclusive Licensed Patents” means Stanford’s U.S. Patent Application Serial Nos. [***]; (2) any continuation, division or continuation-in-part (to the extent such continuation-in-part relates to the Licensed Products and the Licensed Field of Use) of such patent application; (3) any reissue, reexamination or extension of such patent application; or (4) any foreign patent application or Letters Patent or supplementary protection certificates or the equivalent thereof in respect of such patent application, that would be infringed by the practice of the Licensed Patents to make, have made, use, import and sell Licensed Products for use in the Licensed Field of Use.”

3. **Scope of Non-exclusive License.** Section 3.1 of the Agreement is hereby amended to read in full as follows:

“3.1 **Grant.** Subject to the terms and conditions of this Agreement, Stanford grants Alexo (i) a exclusive, royalty-bearing, license under the Licensed Patents, including the right to make, have made, use, import, offer to sell and sell Licensed Products in the Licensed Territory in the Licensed Field of Use; and (ii) a non-exclusive, royalty-bearing license under the Nonexclusive Licensed Patents, including the right to make, have made, use, import, offer to sell and sell Licensed Products in the Licensed Territory in the Licensed Field of Use.

*For clarification, the non-exclusive license to the U.S. provisional patent application [***].”*

*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

4. **Common Stock Equity Interest.** Section 7.2 of the Agreement is hereby amended to read in full as follows:

“7.2 Equity Interest. As further consideration, Alexo will cause Alexo Therapeutics Limited, a Private Irish Company Limited by Shares that is the sole shareholder of Alexo (“Parent”), to grant to Stanford [***] Ordinary Shares of stock in Parent. When issued, those shares will represent [***]% of the stock in Parent on a Fully Diluted Basis. Alexo agrees to provide Stanford with the capitalization table upon which the above calculation is made. All shares issued pursuant to this Section 7.2 and Section 7.3 shall be issued pursuant to a Stock Issuance Agreement between Parent and the recipient of the shares containing standard representations and warranties and other provisions with respect to the shares and the recipient’s qualifications under applicable securities laws to receive the shares. At that time, such Stock Issuance Agreement will provide share valuation information as needed in order for Stanford to issue 1099s to the inventors listed below.

*Subject to compliance with applicable securities laws, Alexo will cause Parent to issue [***]% of all shares granted to Stanford pursuant to Section 0 and Section 7.3 directly to and in the name of the inventors listed below allocated as stated below:*

[***] – [***]%

[***] – [***]%

[***] – [***]%

[***] – [***]%

[***] – [***].”

5. **Patent Prosecution with respect to Split Patent Application.** Section 14.1 of the Agreement is hereby amended to add the following provision to the end of Section 14.1:

*“Notwithstanding any provision of this Agreement to the contrary, Stanford covenants and agrees that Stanford will ensure that a SIRPa Component will [***].”*

6. **Ratification.** Except to the extent expressly amended by this Amendment No. 1, all of the terms, provisions and conditions of the Agreement are hereby ratified and confirmed and shall remain in full force and effect. The term “Agreement”, as used in the Agreement, shall henceforth be deemed to be a reference to the Agreement as amended by this Amendment No. 1.

7. **General.** This Amendment No. 1 may be executed in counterparts, each of which will be deemed an original with all such counterparts together constituting one instrument

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*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

IN WITNESS WHEREOF, the parties execute this Amendment No. 1 in duplicate originals by their duly authorized officers or representatives.

THE BOARD OF TRUSTEES OF THE LELAND
STANFORD JUNIOR UNIVERSITY

Signature: /s/ Katherine Ku
Name: Katharine Ku
Title: Executive Director, Office of Technology Licensing
Date: April 24, 2015

Alexo Therapeutics International

Signature: /s/ Corey Goodman
Name: Corey Goodman
Title: Chair, Board of Directors
Date: April 24, 2015

*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

EXCLUSIVE (EQUITY) AGREEMENT AMENDMENT NO. 2

THE BOARD OF TRUSTEES OF THE LELAND STANFORD JUNIOR UNIVERSITY (“Stanford”), an institution of higher education having powers under the laws of the State of California, and Alexo Therapeutics International, (“Alexo”), a Cayman Islands exempted company, entered into the certain Exclusive (Equity) Agreement effective on the 24th day of March, 2015 (“Effective Date”), as amended by Exclusive (Equity) Agreement Amendment No. 1 effective as of April 24, 2015, (as amended, the “Agreement”).

Pursuant to Section 19.3 of the Agreement, Stanford and Alexo wish to enter into this Amendment No. 2 to the Agreement (“Amendment No. 2”) effective as of May 15, 2015 (the “Amendment Date”). Capitalized terms used in this Amendment No. 2 and not defined herein are used with the meanings ascribed to them in the Agreement.

1. **Nonexclusive Licensed Patents Definition.** Section 2.14 of the Agreement is hereby amended to read in full as follows:

“2.14 *“Nonexclusive Licensed Patents” means Stanford’s U.S. Patent Application Serial Nos. [***]; (2) any continuation, division or continuation-in-part (to the extent such continuation-in-part relates to the Licensed Products and the Licensed Field of Use) of such patent application; (3) any reissue, reexamination or extension of such patent application; or (4) any foreign patent application or Letters Patent or supplementary protection certificates or the equivalent thereof in respect of such patent application, that would be infringed by the practice of the Licensed Patents to make, have made, use, import and sell Licensed Products for use in the Licensed Field of Use.”*

2. **Ratification.** Except to the extent expressly amended by this Amendment No. 2, all of the terms, provisions and conditions of the Agreement are hereby ratified and confirmed and shall remain in full force and effect. The term “Agreement”, as used in the Agreement, shall henceforth be deemed to be a reference to the Agreement as amended by this Amendment No. 2.

3. **General.** This Amendment No. 2 may be executed in counterparts, each of which will be deemed an original with all such counterparts together constituting one instrument

[Remainder of this page intentionally left blank — signature page follows]

*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

IN WITNESS WHEREOF, the parties execute this Amendment No. 2 in duplicate originals by their duly authorized officers or representatives.

THE BOARD OF TRUSTEES OF THE LELAND
STANFORD JUNIOR UNIVERSITY

Signature: /s/ Katherine Ku
Name: Katharine Ku
Title: Director, Office of Technology Licensing
Date: May 15, 2015

Alexo Therapeutics International

Signature: /s/ Corey Goodman
Name: Corey Goodman
Title: Chair, Board of Directors
Date: May 15, 2015

*** Certain information in this agreement has been omitted and filed separately with the Securities and Exchange Commission. [***] indicates that text has been omitted and is the subject of a confidential treatment request.

LOAN AND SECURITY AGREEMENT

THIS LOAN AND SECURITY AGREEMENT (as amended, restated, modified or otherwise supplemented from time to time, this “**Agreement**”) dated as of December 20, 2019 (the “**Effective Date**”), among (a) **SILICON VALLEY BANK**, a California corporation, in its capacity as administrative agent and collateral agent (“**Agent**”), (b) **SILICON VALLEY BANK**, a California corporation, as a lender (“**SVB**”), (c) **WESTRIVER INNOVATION LENDING FUND VIII, L.P.**, a Delaware limited partnership (“**WestRiver**”), as a lender (SVB and WestRiver and each of the other “**Lenders**” from time to time a party hereto are referred to herein collectively as the “**Lenders**” and each individually as a “**Lender**”), and (d) (i) **ALEXO THERAPEUTICS INTERNATIONAL**, an exempted company incorporated under the laws of the Cayman Islands (“**Alexo**”), and (ii) **SIRPANT THERAPEUTICS**, an exempted company incorporated under the laws of the Cayman Islands (“**Sirpant**”; together with Alexo, individually and collectively, jointly and severally, the “**Borrower**”), provides the terms on which Agent and the Lenders shall lend to Borrower, and Borrower shall repay Agent and the Lenders. The parties agree as follows:

ACCOUNTING AND OTHER TERMS

Accounting terms not defined in this Agreement shall be construed following GAAP. Calculations and determinations must be made following GAAP. In addition, any obligations of a Person under a lease (whether existing now or entered into in the future) that is not (or would not be) a capital lease obligation under GAAP as in effect as of the date of this Agreement shall not be treated as a capital lease obligation solely as a result of the adoption of changes in GAAP). Capitalized terms not otherwise defined in this Agreement shall have the meanings set forth in Section 14 of this Agreement. All other terms contained in this Agreement, unless otherwise indicated, shall have the meaning provided by the Code to the extent such terms are defined therein. All references to “Dollars” or “\$” are United States Dollars, unless otherwise noted.

LOAN AND TERMS OF PAYMENT

Promise to Pay. Borrower hereby unconditionally promises to pay to Agent, for the ratable benefit of each Lender, the outstanding principal amount of all Credit Extensions advanced to Borrower by such Lender and accrued and unpaid interest thereon, together with any fees as and when due in accordance with this Agreement.

Term Loan Advances.

(a) Availability. Subject to the terms and conditions of this Agreement, upon Borrower’s request, the Lenders, severally and not jointly, shall make one (1) term loan advance to Borrower on or about the Effective Date in an original principal amount of Six Million Dollars (\$6,000,000.00) according to each Lender’s Term Loan Commitment as set forth on Schedule 1 hereto (the “**Term A Loan Advance**”). Subject to the terms and conditions of this Agreement, upon Borrower’s request, during the Draw Period, the Lenders, severally and not jointly, shall make one (1) term loan advance available to Borrower in an original principal amount of Four Million Dollars (\$4,000,000.00) according to each Lender’s Term Loan Commitment as set forth on Schedule 1 hereto (the “**Term B Loan Advance**”). The Term A Loan Advance and the Term B Loan Advance are hereinafter referred to singly as the “**Term Loan Advance**” and collectively as the “**Term Loan Advances**”. After repayment, no Term Loan Advance (or any portion thereof) may be reborrowed.

(b) Interest Period. Commencing on the first (1st) Payment Date of the month following the month in which the Funding Date of the applicable Term Loan Advance occurs and continuing on the Payment Date of each month thereafter, Borrower shall make monthly payments of interest to Agent, for the account of the Lenders, in arrears, on the principal amount of each Term Loan Advance, at the rate set forth in Section 2.3(a).

(c) Repayment of the Term Loan Advances. Commencing on the Term Loan Amortization Date, and continuing on each Payment Date thereafter, Borrower shall repay the aggregate outstanding Term Loan Advances to Agent, for the account of the Lenders, in (i) twenty-one (21) consecutive equal monthly installments of principal, plus (ii) monthly payments of accrued interest at the rate set forth in Section 2.3(a). All outstanding principal and accrued and unpaid interest with respect to the Term Loan Advances, and all other outstanding Obligations under the Term Loan Advances, are due and payable in full on the Term Loan Maturity Date.

(d) Permitted Prepayment. Borrower shall have the option to prepay all, but not less than all, of the Term Loan Advances advanced by the Lenders under this Agreement, provided Borrower (i) provides written notice to Agent of its election to prepay the Term Loan Advances at least ten (10) days prior to such prepayment, and (ii) pays to Agent, for the account of the Lenders in accordance with its respective Pro Rata Share, on the date of such prepayment (A) the outstanding principal of the Term Loan Advances plus accrued and unpaid interest thereon, (B) the Prepayment Premium, (C) the Final Payment and (D) all other sums, if any, that shall have become due and payable, including Lenders' Expenses and interest at the Default Rate with respect to any past due amounts.

(e) Mandatory Prepayment Upon an Acceleration. If the Term Loan Advances are accelerated by Agent, following the occurrence and during the continuance of an Event of Default, Borrower shall immediately pay to Agent, for the account of the Lenders in accordance with its respective Pro Rata Share, an amount equal to the sum of (i) all outstanding principal plus accrued and unpaid interest with respect to the Term Loan Advances, (ii) the Prepayment Premium, (iii) the Final Payment and (iv) all other sums, if any, that shall have become due and payable, including Lenders' Expenses and interest at the Default Rate with respect to any past due amounts.

Payment of Interest on the Credit Extensions.

(f) Interest Rate. Subject to Section 2.3(b), the principal amount outstanding under each Term Loan Advance shall accrue interest at a floating per annum rate equal to the greater of (i) seven percent (7.00%) and (ii) two percent (2.00%) above the Prime Rate, which interest, in each case, shall be payable monthly in accordance with Section 2.3(d) below.

(g) Default Rate. Immediately upon the occurrence and during the continuance of an Event of Default, Obligations shall bear interest at a rate per annum which is five percent (5.0%) above the rate that is otherwise applicable thereto (the "**Default Rate**"). Fees and expenses which are required to be paid by Borrower pursuant to the Loan Documents (including, without limitation, Lenders' Expenses) but are not paid when due shall bear interest until paid at a rate equal to the highest rate applicable to the Obligations. Payment or acceptance of the increased interest rate provided in this Section 2.3(b) is not a permitted alternative to timely payment and shall not constitute a waiver of any Event of Default or otherwise prejudice or limit any rights or remedies of Agent or any Lender.

(h) Adjustment to Interest Rate. Changes to the interest rate of any Credit Extension based on changes to the Prime Rate shall be effective on the effective date of any change to the Prime Rate and to the extent of any such change.

(i) Payment; Interest Computation. Interest is payable monthly on the Payment Date and shall be computed on the basis of a 360-day year for the actual number of days elapsed. In computing interest, (i) all payments received after 12:00 p.m. Pacific time on any day shall be deemed received at the opening of business on the next Business Day, and (ii) the date of the making of any Credit Extension shall be included and the date of payment shall be excluded; provided, however, that if any Credit Extension is repaid on the same day on which it is made, such day shall be included in computing interest on such Credit Extension.

Fees. Borrower shall pay to Agent:

(j) Final Payment. The Final Payment, when due hereunder, to be shared between the Lenders pursuant to their respective Term Loan Commitment Percentages;

(k) Prepayment Premium. The Prepayment Premium, when due hereunder, to be shared between the Lenders pursuant to their respective Term Loan Commitment Percentages; and

(l) Lenders' Expenses. All Lenders' Expenses (including reasonable and documented attorneys' fees and expenses for documentation and negotiation of this Agreement) incurred through and after the Effective Date, when due (or, if no stated due date, upon demand by Agent).

Unless otherwise provided in this Agreement or in a separate writing by Agent, Borrower shall not be entitled to any credit, rebate, or repayment of any fees earned by Agent or any Lender pursuant to this Agreement

notwithstanding any termination of this Agreement or the suspension or termination of any Lender's obligation to make loans and advances hereunder. Agent may deduct amounts owing by Borrower under the clauses of this Section 2.4 pursuant to the terms of Section 2.5(e). Agent shall provide Borrower written notice of deductions made from the Designated Deposit Account pursuant to the terms of the clauses of this Section 2.4.

Payments; Pro Rata Treatment; Application of Payments; Debit of Accounts.

(m) All payments (including prepayments) to be made by Borrower under any Loan Document shall be made to Agent for the account of Lenders, in immediately available funds in Dollars, without setoff or counterclaim, before 12:00 p.m. Pacific time on the date when due. Agent shall distribute such payments to Lenders in like funds as set forth in Section 2.6. Payments of principal and/or interest received after 12:00 p.m. Pacific time are considered received at the opening of business on the next Business Day. When a payment is due on a day that is not a Business Day, the payment shall be due the next Business Day, and additional fees or interest, as applicable, shall continue to accrue until paid.

(n) Each borrowing by Borrower from Lenders hereunder shall be made according to the respective Term Loan Commitment Percentages of the relevant Lenders.

(o) Except as otherwise provided herein, each payment (including each prepayment) by Borrower on account of principal or interest on the Term Loan Advances shall be applied according to each Lender's Pro Rata Share of the outstanding principal amount of the Term Loan Advances. The amount of each principal prepayment of the Term Loan Advances shall be applied to reduce the then remaining installments of the Term Loan Advances based upon each Pro Rata Share of Term Loan Advances.

(p) Agent has the exclusive right to determine the order and manner in which all payments with respect to the Obligations may be applied. Borrower shall have no right to specify the order or the accounts to which Agent shall allocate or apply any payments required to be made by Borrower to Agent or otherwise received by Agent or any Lender under this Agreement when any such allocation or application is not specified elsewhere in this Agreement.

(q) Agent may debit any of Borrower's deposit accounts, including the Designated Deposit Account, for principal and interest payments or any other amounts Borrower owes Agent or any Lender when due. These debits shall not constitute a set-off.

(r) Unless Agent shall have been notified in writing by Borrower prior to the date of any payment due to be made by Borrower hereunder that Borrower will not make such payment to Agent, Agent may assume that Borrower is making such payment, and Agent may, but shall not be required to, in reliance upon such assumption, make available to Lenders their respective Pro Rata Share of a corresponding payment amount. If such payment is not made to Agent by Borrower within three (3) Business Days after such due date, Agent shall be entitled to recover, on demand, from each Lender to which any amount which was made available pursuant to the preceding sentence, such amount with interest thereon at the rate per annum equal to the daily average Federal Funds Effective Rate. Nothing herein shall be deemed to limit the rights of Agent or any Lender against Borrower.

Settlement Procedures. If Agent receives any payment for the account of Lenders on or prior to 12:00 p.m. (Pacific time) on any Business Day, Agent shall pay to each applicable Lender such Lender's Pro Rata Share of such payment on such Business Day. If Agent receives any payment for the account of Lenders after 12:00 p.m. (Pacific time) on any Business Day, Agent shall pay to each applicable Lender such Lender's Pro Rata Share of such payment on the next Business Day.

Withholding. Payments received by Agent from Borrower under this Agreement will be made free and clear of and without deduction for any and all present or future taxes, levies, imposts, duties, deductions, withholdings, assessments, fees or other charges imposed by any Governmental Authority (including any interest, additions to tax or penalties applicable thereto). Specifically, however, if at any time any Governmental Authority, applicable law, regulation or international agreement requires Borrower to make any withholding or deduction from any such payment or other sum payable hereunder to Agent, Borrower hereby covenants and agrees that the amount due from Borrower

with respect to such payment or other sum payable hereunder will be increased to the extent necessary to ensure that, after the making of such required withholding or deduction, Agent receives a net sum equal to the sum which it would have received had no withholding or deduction been required, and Borrower shall pay the full amount withheld or deducted to the relevant Governmental Authority. Borrower will, upon request, furnish Agent with proof reasonably satisfactory to Agent indicating that Borrower has made such withholding payment; provided, however, that Borrower need not make any withholding payment if the amount or validity of such withholding payment is contested in good faith by appropriate and timely proceedings and as to which payment in full is bonded or reserved against by Borrower. The agreements and obligations of Borrower contained in this Section 2.7 shall survive the termination of this Agreement.

CONDITIONS OF LOANS

Conditions Precedent to Initial Credit Extension. Each Lender's obligation to make the initial Credit Extension hereunder is subject to the condition precedent that Agent shall have received, in form and substance satisfactory to Agent and the Lenders, such documents, and completion of such other matters, as Agent may reasonably deem necessary or appropriate, including, without limitation:

- (s) duly executed original signatures to the Loan Documents;
- (t) duly executed original signatures to the Warrant;
- (u) duly executed original signatures to the Debenture together with all notices required under the Debenture;
- (v) the Operating Documents of Borrower and a good standing certificate of each Borrower issued by the Registrar of Companies in the Cayman Islands as of a date no earlier than thirty (30) days prior to the Effective Date, register of directors and officers and register of mortgages and charges of each Borrower;
- (w) the Operating Documents of Guarantor;
- (x) a secretary's or director's corporate borrowing certificate of each Borrower with respect to such Borrower's Operating Documents, incumbency and director's resolutions authorizing the execution and delivery of this Agreement and the other Loan Documents;
- (y) a certificate of an officer of Guarantor with respect to articles, specimen signatures and resolutions authorizing the execution and delivery of the Guaranty, the Debenture and the other Loan Documents to which the Guarantor is a party;
- (z) duly executed original signatures to the completed Borrowing Resolutions for each Borrower;
- (aa) certified copies, dated as of a recent date, of financing statement searches, as Agent may request, accompanied by written evidence (including any UCC termination statements) that the Liens indicated in any such financing statements either constitute Permitted Liens or have been or, in connection with the initial Credit Extension, will be terminated or released;
- (bb) searches at the Companies Registration Office in Ireland and High Court Central Office in respect of Guarantor together with satisfactory explanations for any acts appearing on such searches;
- (cc) duly executed original signatures to the Collateral Assignment of License Agreement;
- (dd) a certified copy of the Register of Mortgages and Charges of Borrower updated to reflect the security interests granted over the Collateral;

- (ee) a legal opinion of Borrower's Cayman Islands counsel in respect of Borrower, in form and substance acceptable to Lenders;
- (ff) a legal opinion of SVB's Irish counsel in respect of Guarantor (authority/enforceability), in form and substance acceptable to Lenders;
- (gg) the Perfection Certificate of Borrower and Guarantor, together with the duly executed original signatures thereto; and
- (hh) payment of the fees and Lenders' Expenses then due as specified in Section 2.4 hereof.

Conditions Precedent to all Credit Extensions. Each Lender's obligation to make each Credit Extension, including the initial Credit Extension, is subject to the following conditions precedent:

(ii) timely receipt by the Lenders of (i) an executed Disbursement Letter; and (ii) an executed Payment/Advance Form and any materials and documents required by Section 3.4;

(jj) the representations and warranties in this Agreement shall be true and correct in all material respects on the date of the Disbursement Letter (and the Payment/Advance Form) and on the Funding Date of each Credit Extension; provided, however, that such materiality qualifier shall not be applicable to any representations and warranties that already are qualified or modified by materiality in the text thereof; and provided, further that those representations and warranties expressly referring to a specific date shall be true and correct in all material respects as of such date, and no Event of Default shall have occurred and be continuing or result from the Credit Extension. Each Credit Extension is Borrower's representation and warranty on that date that the representations and warranties in this Agreement remain true and correct in all material respects; provided, however, that such materiality qualifier shall not be applicable to any representations and warranties that already are qualified or modified by materiality in the text thereof; and provided, further that those representations and warranties expressly referring to a specific date shall be true and correct in all material respects as of such date; and

(kk) Agent and each Lender determine to its satisfaction that there has not been any material impairment in the general affairs, management, results of operation, financial condition or the prospect of repayment of the Obligations, or any material adverse deviation by Borrower from the most recent business plan of Borrower presented to and accepted by Agent and the Lenders.

Covenant to Deliver. Borrower agrees to deliver to Agent and each Lender each item required to be delivered to Agent and each Lender under this Agreement as a condition precedent to any Credit Extension. Borrower expressly agrees that a Credit Extension made prior to the receipt by Agent and each Lender of any such item shall not constitute a waiver by Agent or Lenders of Borrower's obligation to deliver such item, and the making of any Credit Extension in the absence of a required item shall be in each Lender's sole discretion.

Procedures for Borrowing.

(ll) Term Loan Advances. Subject to the prior satisfaction of all other applicable conditions to the making of a Credit Extension set forth in this Agreement, to obtain a Credit Extension, Borrower shall notify Agent (which notice shall be irrevocable) by electronic mail, facsimile, or telephone by 12:00 p.m. Pacific time at least five (5) Business Days before the proposed Funding Date of such Credit Extension. Together with any such electronic or facsimile notification, Borrower shall deliver to Agent by electronic mail or facsimile a completed Disbursement Letter (and Payment/Advance Form) executed by an Authorized Signer. Agent may rely on any telephone notice given by a person whom Agent believes is an Authorized Signer. On the Funding Date, Agent shall credit the Credit Extensions to the Designated Deposit Account. Agent may make Credit Extensions under this Agreement based on instructions from an Authorized Signer or without instructions if the Credit Extensions are necessary to meet Obligations which have become due.

(mm) Funding. In determining compliance with any condition hereunder to the making of a Credit Extension that, by its terms, must be fulfilled to the satisfaction of a Lender, Agent may presume that such

condition is satisfactory to such Lender unless Agent shall have received notice to the contrary from such Lender prior to the making of such Credit Extension. Unless Agent shall have been notified in writing by any Lender prior to the date of any Credit Extension, that such Lender will not make the amount that would constitute its share of such borrowing available to Agent, Agent may assume that such Lender is making such amount available to Agent, and Agent may, in reliance upon such assumption, make available to Borrower a corresponding amount. If such amount is not made available to Agent by the required time on the Funding Date therefor, such Lender shall pay to Agent, on demand, such amount with interest thereon, at a rate equal to the greater of (i) the Federal Funds Effective Rate or (ii) a rate determined by Agent in accordance with banking industry rules on interbank compensation, for the period until such Lender makes such amount immediately available to Agent. If such Lender's share of such Credit Extension is not made available to Agent by such Lender within five (5) Business Days after such Funding Date, Agent shall also be entitled to recover such amount with interest thereon at the rate per annum applicable to the Term Loan Advances, on demand, from Borrower.

CREATION OF SECURITY INTEREST

Grant of Security Interest. Borrower hereby grants Agent, for the ratable benefit of the Lenders, to secure the payment and performance in full of all of the Obligations, a continuing security interest in, and pledges to Agent, for the ratable benefit of the Lenders, the Collateral, wherever located, whether now owned or hereafter acquired or arising, and all proceeds and products thereof. For clarity, any reference to "Agent's Lien" or any granting of collateral to Agent in this Agreement or any Loan Document means the Lien granted to Agent for the ratable benefit of the Lenders.

Borrower acknowledges that it previously has entered, and/or may in the future enter, into Bank Services Agreements with SVB. Regardless of the terms of any Bank Services Agreement, Borrower agrees that any amounts Borrower owes SVB thereunder shall be deemed to be Obligations hereunder and that it is the intent of Borrower and SVB to have all such Obligations secured by the first priority perfected security interest in the Collateral granted herein, and by any and all other security agreements, mortgages or other collateral granted to Agent by Borrower and/or Guarantor as security for the Obligations, now or in the future. The Collateral may also be subject to Permitted Liens.

If this Agreement is terminated, Agent's Lien in the Collateral shall continue until the Obligations (other than inchoate indemnity obligations) are repaid in full in cash. Upon payment in full in cash of the Obligations (other than inchoate indemnity obligations) and at such time as the Lenders' obligation to make Credit Extensions has terminated, Agent shall, at the sole cost and expense of Borrower, release its Liens in the Collateral and all rights therein shall revert to Borrower. In the event (x) all Obligations (other than inchoate indemnity obligations), except for Bank Services, are satisfied in full, and (y) this Agreement is terminated, Agent shall terminate the security interest granted herein upon Borrower providing to SVB cash collateral acceptable to SVB in its good faith business judgment for Bank Services, if any. In the event such Bank Services consist of outstanding Letters of Credit, Borrower shall provide to SVB cash collateral in an amount equal to (x) if such Letters of Credit are denominated in Dollars, then at least one hundred five percent (105.0%); and (y) if such Letters of Credit are denominated in a Foreign Currency, then at least one hundred ten percent (110.0%), of the Dollar Equivalent of the face amount of all such Letters of Credit plus, in each case, all interest, fees, and costs due or to become due in connection therewith (as estimated by SVB in its business judgment), to secure all of the Obligations relating to such Letters of Credit.

Priority of Security Interest. Borrower represents, warrants, and covenants that the security interests granted herein are and shall at all times continue to be a first priority perfected security interests in the Collateral. The Collateral may also be subject to Permitted Liens. If Borrower shall acquire a commercial tort claim, Borrower shall promptly notify Agent in a writing signed by Borrower of the general details thereof and grant to Agent, for the ratable benefit of the Lenders, in such writing a security interest therein and in the proceeds thereof, all upon the terms of this Agreement, with such writing to be in form and substance reasonably satisfactory to Agent.

Authorization to File Financing Statements. Borrower hereby authorizes Agent, on behalf of the Lenders, to file financing statements, without notice to Borrower, with all appropriate jurisdictions to perfect or protect Agent's and Lenders' interest or rights hereunder, including a notice that any disposition of the Collateral, by Borrower or any other Person, shall be deemed to violate the rights of Agent under the Code. Such financing statements may indicate the Collateral as "all assets of the Debtor" or words of similar effect, or as being of an equal or lesser scope, or with greater detail, all in Agent's discretion.

REPRESENTATIONS AND WARRANTIES

Borrower represents and warrants as follows:

Due Organization, Authorization; Power and Authority. Borrower is duly existing, incorporated and in good standing in its jurisdiction of formation or incorporation and (to the extent applicable) in good standing as a Registered Organization (as applicable) in its jurisdiction of formation or incorporation and is qualified and licensed to do business and is in good standing in any jurisdiction in which the conduct of its business or its ownership of property requires that it be qualified except where the failure to do so could not reasonably be expected to have a material adverse effect on Borrower's business. In connection with this Agreement, each Borrower has delivered to Agent and each Lender a completed certificate signed by Borrower and Guarantor, entitled "Perfection Certificate" (the "**Perfection Certificate**"). Borrower represents and warrants to Agent and each Lender that (a) Borrower's exact legal name is that indicated on the Perfection Certificate and on the signature page hereof; (b) Borrower is an organization of the type and is organized or incorporated in the jurisdiction set forth in the Perfection Certificate; (c) the Perfection Certificate accurately sets forth Borrower's organizational identification or registration number or accurately states that Borrower has none; (d) the Perfection Certificate accurately sets forth Borrower's registered office (if applicable), or, if more than one, its chief executive office as well as Borrower's mailing address (if different than its chief executive office); (e) Borrower (and each of its predecessors) has not, in the past five (5) years, changed its jurisdiction of formation or incorporation, organizational structure or type, or any organizational number assigned by its jurisdiction; and (f) all other information set forth on the Perfection Certificate pertaining to Borrower and each of its Subsidiaries is accurate and complete (it being understood and agreed that Borrower may from time to time update certain information in the Perfection Certificate after the Effective Date to the extent permitted by one or more specific provisions in this Agreement and that the Perfection Certificate shall be deemed to be updated to reflect the incorporation of any information disclosed by Borrower to Agent in writing pursuant to Section 7.2 hereof). If Borrower is not now a Registered Organization but later becomes one, Borrower shall promptly notify Agent of such occurrence and provide Agent with Borrower's organizational identification or registration number.

The execution, delivery and performance by Borrower of the Loan Documents to which it is a party have been duly authorized by Borrower, and do not (i) conflict with any of Borrower's Operating Documents or organizational/constitutional documents, (ii) contravene, conflict with, constitute a default under or violate any material Requirement of Law, (iii) contravene, conflict or violate any applicable order, writ, judgment, injunction, decree, determination or award of any Governmental Authority by which Borrower or any of its Subsidiaries or any of their property or assets may be bound or affected, (iv) require any action by, filing, registration, or qualification with, or Governmental Approval from, any Governmental Authority on the part of Borrower (except such Governmental Approvals which have already been obtained and are in full force and effect, filings and registrations contemplated by this Agreement), or (v) conflict with, contravene, constitute a default or breach under, or result in or permit the termination or acceleration of, any material agreement by which Borrower is bound. Borrower is not in default under any agreement to which it is a party or by which it is bound in which the default could reasonably be expected to have a material adverse effect on Borrower's business.

Collateral. Borrower has good title to, rights in, and the power to transfer each item of the Collateral upon which it purports to grant a Lien under this Agreement and other Loan Documents, free and clear of any and all Liens except Permitted Liens. Borrower has no Collateral Accounts at or with any bank or financial institution other than SVB or SVB's Affiliates except for the Collateral Accounts described in the Perfection Certificate delivered to Agent and each Lender in connection herewith and which Borrower has given Agent notice and taken such actions as are necessary to give Agent, for the ratable benefit of the Lenders, a perfected security interest therein, pursuant to the terms of Section 6.6(b). The Accounts are bona fide, existing obligations of the Account Debtors.

The Collateral is not in the possession of any third party bailee (such as a warehouse) except as otherwise provided in the Perfection Certificate or as permitted pursuant to Section 7.2. None of the components of the Collateral shall be maintained at locations other than as provided in the Perfection Certificate or as permitted pursuant to Section 7.2.

All Inventory is in all material respects of good and marketable quality, free from material defects.

Borrower is the sole owner of the Intellectual Property which it owns or purports to own except for (a) non-exclusive licenses granted to its customers in the ordinary course of business, (b) over-the-counter software that is commercially available to the public, and (c) material Intellectual Property licensed to Borrower and noted on the Perfection Certificate. Each Patent which it owns or purports to own and which is material to Borrower's business is valid and enforceable, and no part of the Intellectual Property which Borrower owns or purports to own and which is material to Borrower's business has been judged invalid or unenforceable, in whole or in part. To of Borrower's knowledge, no claim has been made that any part of the Intellectual Property violates the rights of any third party except to the extent such claim would not reasonably be expected to have a material adverse effect on Borrower's business.

Except as noted on the Perfection Certificate, Borrower is not a party to, nor is bound by, any Restricted License.

Litigation. There are no actions or proceedings pending or, to the knowledge of any Responsible Officer, threatened in writing by or against Borrower or any of its Subsidiaries involving more than, individually or in the aggregate, Two Hundred Fifty Thousand Dollars (\$250,000.00).

Financial Statements; Financial Condition. All consolidated and consolidating financial statements for ALX Ireland and its direct and indirect Subsidiaries delivered to Agent and the Lenders fairly present in all material respects ALX Ireland's and its direct and indirect Subsidiaries' consolidated financial condition and each such entity's consolidated results of operations. There has not been any material deterioration in ALX Ireland's and its direct and indirect Subsidiaries' consolidated financial condition since the date of the most recent financial statements submitted to Agent and the Lenders.

Solvency. The fair salable value of Borrower's consolidated assets (including goodwill minus disposition costs) exceeds the fair value of Borrower's liabilities; Borrower is not left with unreasonably small capital after the transactions in this Agreement; and Borrower is able to pay its debts (including trade debts) as they mature/fall due.

Regulatory Compliance. Borrower is not an "investment company" or a company "controlled" by an "investment company" under the Investment Company Act of 1940, as amended. Borrower is not engaged as one of its important activities in extending credit for margin stock (under Regulations X, T and U of the Federal Reserve Board of Governors). Borrower (a) has complied in all material respects with all Requirements of Law, and (b) has not violated any Requirements of Law the violation of which could reasonably be expected to have a material adverse effect on its business. None of Borrower's or any of its Subsidiaries' properties or assets has been used by Borrower or any Subsidiary or, to Borrower's knowledge, by previous Persons, in disposing, producing, storing, treating, or transporting any hazardous substance other than in compliance with all applicable laws. Borrower and each of its Subsidiaries have obtained all consents, approvals and authorizations of, made all declarations or filings with, and given all notices to, all Governmental Authorities that are necessary to continue their respective businesses as currently conducted, except where the failure to do so would not reasonably be expected to have a material adverse effect on Borrower's business.

Subsidiaries; Investments. Borrower does not own any stock, partnership, or other ownership interest or other equity securities or shares except for Permitted Investments.

Tax Returns and Payments; Pension Contributions. Borrower has timely filed all required tax returns and reports, and Borrower has timely paid all national, foreign, federal, state and local taxes, assessments, deposits and contributions owed by Borrower except (a) to the extent such taxes are being contested in good faith by appropriate proceedings promptly instituted and diligently conducted, so long as such reserve or other appropriate provision, if any, as shall be required in conformity with GAAP shall have been made therefor, or (b) if such taxes, assessments, deposits and contributions do not, individually or in the aggregate, exceed Fifty Thousand Dollars (\$50,000.00).

To the extent Borrower defers payment of any contested taxes, Borrower shall (i) notify Agent in writing of the commencement of, and any material development in, the proceedings and (ii) post bonds or take any other steps required to prevent the Governmental Authority levying such contested taxes from obtaining a Lien upon any of the Collateral that is other than a "Permitted Lien." Borrower is unaware of any claims or adjustments proposed for any of Borrower's prior tax years which could result in additional taxes becoming due and payable by Borrower in excess of Fifty Thousand Dollars (\$50,000.00). Borrower has paid all amounts necessary to fund all present pension, profit

sharing and deferred compensation plans of Borrower in accordance with their terms, and Borrower has not withdrawn from participation in, and has not permitted partial or complete termination of, or permitted the occurrence of any other event with respect to, any such plan which could reasonably be expected to result in any liability of Borrower, including any liability to the Pension Benefit Guaranty Corporation or its successors or any other governmental agency.

Use of Proceeds. Borrower shall use the proceeds of the Credit Extensions as working capital and to fund its general business requirements and not for personal, family, household or agricultural purposes or for any purpose which would be prohibited under sections 82 or 239 of the Irish Companies Act 2014.

Full Disclosure. No written representation, warranty or other statement of Borrower in any certificate or written statement given to Agent or any Lender in connection with the Loan Documents, or the transactions contemplated thereby, as of the date such representation, warranty, or other statement was made, taken together with all such written certificates and written statements given to Agent or any Lender, contains any untrue statement of a material fact or omits to state a material fact necessary to make the statements contained in the certificates or statements not misleading (it being recognized by Agent and each Lender that the projections and forecasts provided by Borrower in good faith and based upon reasonable assumptions are not viewed as facts and that actual results during the period or periods covered by such projections and forecasts may differ from the projected or forecasted results).

Definition of “Knowledge.” For purposes of the Loan Documents, whenever a representation or warranty is made to Borrower’s knowledge or awareness, to the “best of” Borrower’s knowledge, or with a similar qualification, knowledge or awareness means the actual knowledge, after reasonable investigation, of any Responsible Officer.

AFFIRMATIVE COVENANTS

Borrower shall do all of the following:

Government Compliance.

(nn) Maintain its and all its Subsidiaries’ legal existence and good standing in their respective jurisdictions of formation and maintain qualification in each jurisdiction in which the failure to so qualify would reasonably be expected to have a material adverse effect on Borrower’s business or operations. Borrower shall comply, and have each Subsidiary comply, in all material respects, with all laws, ordinances and regulations to which it is subject.

(oo) Obtain all of the Governmental Approvals necessary for the performance by Borrower of its obligations under the Loan Documents to which it is a party and the grant of a security interest to Agent, for the ratable benefit of the Lenders, in the Collateral. Subject to the prior sentence hereof, Borrower shall promptly provide copies of any such obtained Governmental Approvals to Agent.

Financial Statements, Reports, Certificates. Provide Agent and each Lender with the following:

(pp) **Monthly Financial Statements.** As soon as available, but no later than thirty (30) days after the last day of each month, company prepared consolidated and consolidating balance sheet and income statement covering ALX Ireland’s and its direct and indirect Subsidiaries’ consolidated operations for such month certified by a Responsible Officer and in a form of presentation reasonably acceptable to Agent (the “**Monthly Financial Statements**”);

(qq) **Monthly Compliance Certificate.** Within thirty (30) days after the last day of each month and together with the Monthly Financial Statements, a duly completed Compliance Certificate signed by a Responsible Officer, certifying that as of the end of such month, Borrower was in full compliance with all of the terms and conditions of this Agreement, and setting forth calculations showing compliance with the financial covenants (if any) set forth in this Agreement and such other information as Agent or the Lenders may reasonably request;

(rr) Board Projections. As soon as available, at least annually, and in any event no later than the earlier to occur of (i) sixty (60) days after the end of each fiscal year of ALX Ireland and (ii) ten (10) days after Board approval, and contemporaneously with any updates or changes thereto, annual Board-approved operating budget and financial projections with respect to ALX Ireland and its direct and indirect Subsidiaries, in a form of presentation reasonably acceptable to Agent;

(ss) Annual Audited Financial Statements. As soon as available, but no later than October 31st of each year, beginning with ALX Ireland's fiscal year ending December 31, 2019, audited consolidated financial statements prepared under GAAP, consistently applied, together with an unqualified opinion (other than a qualification as to going concern typical for venture backed companies similar to ALX Ireland) on the financial statements from an independent certified public accounting firm reasonably acceptable to Agent. Notwithstanding the foregoing, if the Board determines in its reasonable discretion not to require an audit for any fiscal year of ALX Ireland, then Agent shall accept company prepared annual consolidated financial statements no later than thirty (30) days after the end of such fiscal year of ALX Ireland;

(tt) Other Statements. Within five (5) days of delivery, copies of all statements, reports and notices made available to ALX Ireland's security holders (in their capacity as such) or to any holders of Subordinated Debt (in their capacity as such);

(uu) SEC Filings. In the event that ALX Ireland becomes subject to the reporting requirements under the Exchange Act, within five (5) days of filing, copies of all periodic and other reports, proxy statements and other materials filed by ALX Ireland with the SEC, any Governmental Authority succeeding to any or all of the functions of the SEC or with any national securities exchange, or distributed to its shareholders, as the case may be. Documents required to be delivered pursuant to the terms hereof (to the extent any such documents are included in materials otherwise filed with the SEC) may be delivered electronically and if so delivered, shall be deemed to have been delivered on the date on which ALX Ireland posts such documents, or provides a link thereto, on ALX Ireland's website on the internet at ALX Ireland's website address; provided, however, Borrower shall promptly notify Agent and the Lenders in writing (which may be by electronic mail) of the posting of any such documents;

(vv) Legal Action Notice. A prompt report of any legal actions pending or threatened in writing against Borrower or any of its Subsidiaries that could reasonably be expected to result in damages or costs to Borrower or any of its Subsidiaries of, individually or in the aggregate, Two Hundred Fifty Thousand Dollars (\$250,000.00) or more;

(ww) Beneficial Ownership Information. Prompt written notice of any changes to the beneficial ownership information set out in Section 14 of the Perfection Certificate. Borrower understands and acknowledges that each Lender relies on such true, accurate and up-to-date beneficial ownership information to meet such Lender's regulatory obligations to obtain, verify and record information about the beneficial owners of its legal entity customers; and

(xx) Other Financial Information. Other financial information reasonably requested by Agent or any Lender.

Inventory; Returns. Keep all Inventory in good and marketable condition, free from material defects. Returns and allowances between Borrower and its Account Debtors shall follow Borrower's customary practices as they exist at the Effective Date. Borrower must promptly notify Agent of all returns, recoveries, disputes and claims that involve more than Two Hundred Fifty Thousand Dollars (\$250,000.00), individually or in the aggregate.

Taxes; Pensions. Timely file and require each of its Subsidiaries to timely file, all required tax returns and reports and timely pay, and require each of its Subsidiaries to timely pay, all foreign, federal, state and local taxes, assessments, deposits and contributions owed by Borrower and each of its Subsidiaries, except for deferred payment of any taxes contested pursuant to the terms of Section 5.8 hereof, and shall deliver to Agent, on demand, appropriate certificates attesting to such payments, and pay all amounts necessary to fund all present pension, profit sharing and deferred compensation plans in accordance with their terms.

Insurance.

(yy) Keep its business and the Collateral insured for risks and in amounts standard for companies in Borrower's industry and location and as Agent may reasonably request. Insurance policies shall be in a form, with financially sound and reputable insurance companies that are not Affiliates of Borrower, and in amounts that are reasonably satisfactory to Agent. All property policies shall have a lender's loss payable endorsement showing Agent as the sole lender loss payee. All liability policies shall show, or have endorsements showing, Agent as an additional insured. Agent shall be named as lender loss payee and/or additional insured with respect to any such insurance providing coverage in respect of any Collateral.

(zz) Ensure that proceeds payable under any property policy are, at Agent's option, payable to Agent for the ratable benefit of the Lenders on account of the Obligations.

(aaa) At Agent's request, Borrower shall deliver certified copies of insurance policies and evidence of all premium payments. Each provider of any such insurance required under this Section 6.5 shall agree, by endorsement upon the policy or policies issued by it or by independent instruments furnished to Agent, that it will give Agent thirty (30) days prior written notice before any such policy or policies shall be materially altered or canceled. If Borrower fails to obtain insurance as required under this Section 6.5 or to pay any amount or furnish any required proof of payment to third persons and Agent, Agent may make all or part of such payment or obtain such insurance policies required in this Section 6.5, and take any action under the policies Agent deems prudent.

Operating Accounts.

(bbb) Maintain all of its and all of its Subsidiaries' operating accounts and excess cash with SVB and SVB's Affiliates. In addition, Borrower shall conduct all of its primary banking facilities with SVB, including, without limitation, letters of credit and business credit cards.

(ccc) Provide Agent five (5) days prior written notice before establishing any Collateral Account at or with any bank or financial institution other than SVB or SVB's Affiliates. For each Collateral Account that Borrower at any time maintains, Borrower shall cause the applicable bank or financial institution (other than SVB) at or with which any Collateral Account is maintained to execute and deliver a Control Agreement or other appropriate instrument with respect to such Collateral Account to perfect Agent's Lien in such Collateral Account in accordance with the terms hereunder which Control Agreement may not be terminated without the prior written consent of the Lenders. The provisions of the previous sentence shall not apply to deposit accounts exclusively used for payroll, payroll taxes and other employee wage and benefit payments to or for the benefit of Borrower's employees and identified to Agent and the Lenders by Borrower as such.

Protection of Intellectual Property Rights.

(ddd) (i) Protect, defend and maintain the validity and enforceability of its Intellectual Property material to Borrower's business; (ii) promptly advise Agent in writing of material infringements or any other event that could reasonably be expected to materially and adversely affect the value of its Intellectual Property material to Borrower's business; and (iii) not allow any Intellectual Property material to Borrower's business to be abandoned, forfeited or dedicated to the public without Agent's written consent.

(eee) Provide written notice to Agent within ten (10) days of entering or becoming bound by any Restricted License (other than over-the-counter software that is commercially available to the public). Borrower shall take such steps as Agent reasonably requests to obtain the consent of, or waiver by, any person whose consent or waiver is necessary for (i) any Restricted License to be deemed "Collateral" and for Agent to have a security interest in it that might otherwise be restricted or prohibited by law or by the terms of any such Restricted License, whether now existing or entered into in the future, and (ii) Agent to have the ability in the event of a liquidation of any Collateral to dispose of such Collateral in accordance with Agent's and the Lenders' rights and remedies under this Agreement and the other Loan Documents.

Litigation Cooperation. From the date hereof and continuing through the termination of this Agreement, make available to Agent, without expense to Agent or any Lender, Borrower and its officers, employees and agents and Borrower's books and records, to the extent that Agent and/or the Lenders may deem them reasonably necessary to prosecute or defend any third-party suit or proceeding instituted by or against Agent and/or any Lender with respect to any Collateral or relating to Borrower.

Access to Collateral; Books and Records. Allow Agent, or its agents, at reasonable times, on one (1) Business Day's notice (provided no notice is required if an Event of Default has occurred and is continuing), to inspect the Collateral and audit and copy Borrower's Books. Such inspections or audits shall be conducted no more often than once every twelve (12) months (or more frequently as Agent in its sole but reasonable discretion determines that conditions warrant) unless an Event of Default has occurred and is continuing in which case such inspections and audits shall occur as often as Agent shall determine is necessary. The foregoing inspections and audits shall be at Borrower's expense and the charge therefor shall be One Thousand Dollars (\$1,000.00) per person per day (or such higher amount as shall represent Agent's then-current standard charge for the same), plus reasonable out-of-pocket expenses. In the event Borrower and Agent schedule an audit more than eight (8) days in advance, and Borrower cancels or seeks to reschedule the audit with less than eight (8) days written notice to Agent, then (without limiting any of Agent's or any Lender's rights or remedies) Borrower shall pay Agent a fee of Two Thousand Dollars (\$2,000.00) plus any out-of-pocket expenses incurred by Agent to compensate Agent for the anticipated costs and expenses of the cancellation or rescheduling.

Further Assurances. Execute any further instruments and take further action as Agent and the Lenders reasonably request to perfect or continue Agent's Lien in the Collateral or to effect the purposes of this Agreement, including but not limited to, updating its Register of Mortgages and Charges to reflect the security interests granted over the Collateral. Deliver to Agent and the Lenders, within five (5) days after the same are sent or received, copies of all correspondence, reports, documents and other filings with any Governmental Authority regarding compliance with or maintenance of Governmental Approvals or Requirements of Law or that could reasonably be expected to have a material effect on any of the Governmental Approvals or otherwise on the operations of Borrower or any of its Subsidiaries.

6.11 Post-Closing Conditions. Within thirty (30) days after the Effective Date, Borrower shall deliver to Agent, evidence satisfactory to Agent that the insurance policies and endorsements required by Section 6.5 hereof are in full force and effect, together with appropriate evidence showing lender loss payable and/or additional insured clauses or endorsements in favor of Agent.

NEGATIVE COVENANTS

Borrower shall not do any of the following without the prior written consent of the Lenders:

Dispositions. Convey, sell, lease, transfer, assign, or otherwise dispose of (including, without limitation, pursuant to a Division) (collectively, "Transfer"), or permit any of its Subsidiaries to Transfer, all or any part of its business or property, except for Transfers (a) of Inventory in the ordinary course of business; (b) of worn-out or obsolete Equipment that is, in the reasonable judgment of Borrower, no longer economically practicable to maintain or useful in the ordinary course of business of Borrower; (c) consisting of Permitted Liens, Permitted Investments, and transactions of the type described in and permitted under Section 7.7; (d) of non-exclusive licenses for the use of the property of Borrower or its Subsidiaries in the ordinary course of business and licenses that could not result in a legal transfer of title of the licensed property but that may be exclusive in respects other than territory and that may be exclusive as to territory only as to discreet geographical areas outside of the United States; and (e) of other personal property with an aggregate value not to exceed One Hundred Thousand Dollars (\$100,000.00) in any twelve (12) month period.

Changes in Business, Management, Control, or Business Locations. (a) Engage in or permit any of its Subsidiaries to engage in any business other than the businesses currently engaged in by Borrower and such Subsidiary, as applicable, or reasonably related thereto; (b) liquidate, wind-up or dissolve; (c) fail to provide notice to Agent and Lenders of any Key Person departing from or ceasing to be employed by Borrower within five (5) days after such Key Person's departure from Borrower; or (d) permit or suffer any Change in Control.

Borrower shall not, without at least fifteen (15) days prior written notice to Agent: (1) add any new offices or business locations, including warehouses (unless such new offices or business locations (other than clinical trial sites) contain less than Fifty Thousand Dollars (\$50,000.00) in Borrower's assets or property) or deliver any portion of the Collateral valued, individually or in the aggregate, in excess of Fifty Thousand Dollars (\$50,000.00) to a bailee at a location other than (x) to a bailee and at a location already disclosed in the Perfection Certificate or (y) to a clinical trial site, (2) change its jurisdiction of organization, (3) change its organizational structure or type, (4) change its legal name, or (5) change any organizational number (if any) assigned by its jurisdiction of organization. If Borrower intends to add any new offices or business locations, including warehouses, containing in excess of Fifty Thousand Dollars (\$50,000.00) of Borrower's assets or property, then Borrower will use commercially reasonable efforts to cause such landlord to execute and deliver a landlord consent in form and substance reasonably satisfactory to Agent. If Borrower intends to deliver any portion of the Collateral valued, individually or in the aggregate, in excess of Fifty Thousand Dollars (\$50,000.00) to a bailee (other than clinical trial sites), and Agent and such bailee are not already parties to a bailee agreement governing both the Collateral and the location to which Borrower intends to deliver the Collateral, then Borrower will use commercially reasonable efforts to cause such bailee to execute and deliver a bailee agreement in form and substance reasonably satisfactory to Agent.

Mergers or Acquisitions. Merge or consolidate, or permit any of its Subsidiaries to merge or consolidate, with any other Person, or acquire, or permit any of its Subsidiaries to acquire, all or substantially all of the capital stock or property of another Person (including, without limitation, by the formation of any Subsidiary or pursuant to a Division). A Subsidiary may merge or consolidate into another Subsidiary or into Borrower.

Indebtedness. Create, incur, assume, or be liable for any Indebtedness, or permit any Subsidiary to do so, other than Permitted Indebtedness.

Encumbrance. Create, incur, allow, or suffer any Lien on any of its property, or assign or convey any right to receive income, including the sale of any Accounts, or permit any of its Subsidiaries to do so, except for Permitted Liens and Transfers permitted by Section 7.1, permit any Collateral not to be subject to the first priority security interest granted herein (which Collateral may be subject to Permitted Liens), or enter into any agreement, document, instrument or other arrangement (except with or in favor of Agent, for the ratable benefit of the Lenders) with any Person which directly or indirectly prohibits or has the effect of prohibiting Borrower or any Subsidiary from assigning, mortgaging, pledging, granting a security interest in or upon, or encumbering any of Borrower's or any Subsidiary's Intellectual Property, except as is otherwise permitted in Section 7.1 hereof and the definition of "Permitted Liens" herein and customary restrictions on assignment, transfer and encumbrances in license agreements under which Borrower or a Subsidiary is the licensee.

Maintenance of Collateral Accounts. Maintain any Collateral Account except pursuant to the terms of Section 6.6(b) hereof.

Distributions; Investments. (a) Pay any dividends or make any distribution or payment or redeem, retire or purchase any capital stock provided that Borrower may (i) convert any of its convertible securities into other securities pursuant to the terms of such convertible securities or otherwise in exchange thereof and (ii) pay dividends solely in common stock; or (b) directly or indirectly make any Investment (including, without limitation, by the formation of any Subsidiary), or permit any of its Subsidiaries to do so, other than Permitted Investments.

Transactions with Affiliates. Directly or indirectly enter into or permit to exist any material transaction with any Affiliate of Borrower, except for (a) transactions that are in the ordinary course of Borrower's business, upon fair and reasonable terms that are no less favorable to Borrower than would be obtained in an arm's length transaction with a non-affiliated Person, (b) reasonable and customary compensation-related transactions or agreements or indemnification agreements in the ordinary course of business or otherwise approved by the Board or by Agent, and (c) transactions of the type described in and permitted under Section 7.7.

Subordinated Debt. (a) Make or permit any payment on any Subordinated Debt, except under the terms of the subordination, intercreditor, or other similar agreement to which such Subordinated Debt is subject, or (b) amend any provision in any document relating to the Subordinated Debt which would increase the amount thereof, provide for earlier or greater principal, interest, or other payments thereon, or adversely affect the subordination thereof to Obligations owed to Agent and the Lenders.

Compliance. Become an “investment company” or a company controlled by an “investment company”, under the Investment Company Act of 1940, as amended, or undertake as one of its important activities extending credit to purchase or carry margin stock (as defined in Regulation U of the Board of Governors of the Federal Reserve System), or use the proceeds of any Credit Extension for that purpose; fail to (a) meet the minimum funding requirements of ERISA, (b) prevent a Reportable Event or Prohibited Transaction, as defined in ERISA, from occurring, or (c) comply with the Federal Fair Labor Standards Act, the failure of any of the conditions described in clauses (a) through (c) which could reasonably be expected to have a material adverse effect on Borrower’s business, or permit any of its Subsidiaries to do so; or violate any other law or regulation, if the violation could reasonably be expected to have a material adverse effect on Borrower’s business; withdraw or permit any Subsidiary to withdraw from participation in, permit partial or complete termination of, or permit the occurrence of any other event with respect to, any present pension, profit sharing and deferred compensation plan which could reasonably be expected to result in any liability of Borrower, including any liability to the Pension Benefit Guaranty Corporation or its successors or any other governmental agency.

EVENTS OF DEFAULT

Any one of the following shall constitute an event of default (an “**Event of Default**”) under this Agreement:

Payment Default. Borrower fails to (a) make any payment of principal or interest on any Credit Extension when due, or (b) pay any other Obligations within three (3) Business Days after such Obligations are due and payable (which three (3) Business Day cure period shall not apply to payments due on the Term Loan Maturity Date). During the cure period, the failure to make or pay any payment specified under clause (b) hereunder is not an Event of Default (but no Credit Extension will be made during the cure period);

Covenant Default.

(a) Borrower fails or neglects to perform any obligation in Sections 6.2, 6.4, 6.5, 6.6, 6.7(b), or 6.11, or violates any covenant in Section 7; or

(b) Borrower fails or neglects to perform, keep, or observe any other term, provision, condition, covenant or agreement contained in this Agreement or any Loan Documents, and as to any default (other than those specified in this Section 8) under such other term, provision, condition, covenant or agreement that can be cured, has failed to cure the default within ten (10) days after the occurrence thereof; provided, however, that if the default cannot by its nature be cured within the ten (10) day period or cannot after diligent attempts by Borrower be cured within such ten (10) day period, and such default is likely to be cured within a reasonable time, then Borrower shall have an additional period (which shall not in any case exceed thirty (30) days) to attempt to cure such default, and within such reasonable time period the failure to cure the default shall not be deemed an Event of Default (but no Credit Extensions shall be made during such cure period). Cure periods provided under this section shall not apply, among other things, to financial covenants or any other covenants set forth in clause (a) above;

Material Adverse Change. A Material Adverse Change occurs;

Attachment; Levy; Restraint on Business.

(a) (i) The service of process seeking to attach, by trustee or similar process, any funds of Borrower or of any entity under the control of Borrower (including a Subsidiary), or (ii) a notice of lien or levy is filed against any of Borrower’s assets by any Governmental Authority, and the same under subclauses (i) and (ii) hereof are not, within ten (10) days after the occurrence thereof, discharged or stayed (whether through the posting of a bond or otherwise); provided, however, no Credit Extensions shall be made during any ten (10) day cure period; or

(b) (i) any material portion of Borrower’s assets is attached, seized, levied on, or comes into possession of a trustee or receiver, or (ii) any court order enjoins, restrains, or prevents Borrower from conducting all or any material part of its business;

Insolvency. (a) Borrower is unable to pay its debts (including trade debts) as they become due or otherwise becomes insolvent; (b) Borrower begins an Insolvency Proceeding; or (c) an Insolvency Proceeding is begun against Borrower and is not dismissed or stayed within thirty (30) days (but no Credit Extensions shall be made while any of the conditions described in clause (a) exist and/or until any Insolvency Proceeding is dismissed);

Other Agreements. There is, under any agreement to which Borrower or any Guarantor is a party with a third party or parties, (a) any default resulting in a right by such third party or parties, whether or not exercised, to accelerate the maturity of any Indebtedness in an amount individually or in the aggregate in excess of Two Hundred Fifty Thousand Dollars (\$250,000.00); or (b) any breach or default by Borrower or Guarantor, the result of which could reasonably be expected to have a material adverse effect on Borrower's or any Guarantor's business;

Judgments; Penalties. One or more fines, penalties or final judgments, orders or decrees for the payment of money in an amount, individually or in the aggregate, of at least Fifty Thousand Dollars (\$50,000.00) (not covered by independent third-party insurance as to which liability has been accepted by such insurance carrier) shall be rendered against Borrower by any Governmental Authority, and the same are not, within ten (10) days after the entry, assessment or issuance thereof, discharged, satisfied, or paid, or after execution thereof, stayed or bonded pending appeal, or such judgments are not discharged prior to the expiration of any such stay (provided that no Credit Extensions will be made prior to the satisfaction, payment, discharge, stay, or bonding of such fine, penalty, judgment, order or decree);

Misrepresentations. Borrower or any Person acting for Borrower makes any representation, warranty, or other statement now or later in this Agreement, any Loan Document or in any writing delivered to Agent or any Lender or to induce Agent or any Lender to enter this Agreement or any Loan Document, and such representation, warranty, or other statement is incorrect in any material respect when made;

Guaranty. (a) Any guaranty of any Obligations terminates or ceases for any reason to be in full force and effect; (b) any Guarantor does not perform any obligation or covenant under any guaranty of the Obligations; (c) any circumstance described in Sections 8.3, 8.4, 8.5, 8.6, 8.7, or 8.8 of this Agreement occurs with respect to any Guarantor, (d) the liquidation, winding up, or termination of existence of any Guarantor; or (e) (i) a material impairment in the perfection or priority of Agent's, for the ratable benefit of the Lenders', Lien in the collateral provided by Guarantor or in the value of such collateral or (ii) a material adverse change in the general affairs, management, results of operation, financial condition or the prospect of repayment of the Obligations occurs with respect to any Guarantor;

Subordinated Debt. Any subordination, intercreditor, or other similar agreement evidencing the subordination of any Subordinated Debt shall for any reason be revoked or invalidated or otherwise cease to be in full force and effect, any Person shall be in breach thereof or contest in any manner the validity or enforceability thereof or deny that it has any further liability or obligation thereunder, or the Obligations shall for any reason be subordinated or shall not have the priority contemplated by this Agreement;

Governmental Approvals. Any Governmental Approval shall have been (a) revoked, rescinded, suspended, modified in an adverse manner or not renewed in the ordinary course for a full term or (b) subject to any decision by a Governmental Authority that designates a hearing with respect to any applications for renewal of any of such Governmental Approval or that could result in the Governmental Authority taking any of the actions described in clause (a) above, and such decision or such revocation, rescission, suspension, modification or non-renewal (i) cause, or could reasonably be expected to cause, a Material Adverse Change, or (ii) adversely affects the legal qualifications of Borrower or any of its Subsidiaries to hold such Governmental Approval in any applicable jurisdiction and such revocation, rescission, suspension, modification or non-renewal could reasonably be expected to adversely affect the status of or legal qualifications of Borrower or any of its Subsidiaries to hold any Governmental Approval in any other jurisdiction; or

Termination of the License Agreement. The License Agreement is terminated without the prior written consent of the Lenders.

RIGHTS AND REMEDIES

Rights and Remedies. Upon the occurrence and during the continuance of an Event of Default, Agent, in accordance with the Lender Intercreditor Agreement or, if such rights and remedies are not addressed in the Lender Intercreditor Agreement, as directed by Lenders having a majority of the Obligations, may, without notice or demand, do any or all of the following:

(fff) declare all Obligations immediately due and payable (but if an Event of Default described in Section 8.5 occurs all Obligations are immediately due and payable without any action by Agent or any Lender);

(ggg) stop advancing money or extending credit for Borrower's benefit under this Agreement or under any other agreement among Borrower, Agent, and/or any Lenders;

(hhh) demand that Borrower (i) deposit cash with SVB in an amount equal to at least (A) one hundred five percent (105.0%) of the Dollar Equivalent of the aggregate face amount of all Letters of Credit denominated in Dollars remaining undrawn, and (B) one hundred ten percent (110.0%) of the Dollar Equivalent of the aggregate face amount of all Letters of Credit denominated in a Foreign Currency remaining undrawn (plus, in each case, all interest, fees, and costs due or to become due in connection therewith (as estimated by SVB in its good faith business judgment)), to secure all of the Obligations relating to such Letters of Credit, as collateral security for the repayment of any future drawings under such Letters of Credit, and Borrower shall forthwith deposit and pay such amounts, and (ii) pay in advance all letter of credit fees scheduled to be paid or payable over the remaining term of any Letters of Credit;

(iii) terminate any FX Contracts;

(jjj) verify the amount of, demand payment of and performance under, and collect any Accounts and General Intangibles, settle or adjust disputes and claims directly with Account Debtors for amounts on terms and in any order that Agent and/or the Lenders consider advisable, and notify any Person owing Borrower money of Agent's security interest in such funds. Borrower shall collect all payments in trust for Agent, for the ratable benefit of the Lenders and, if requested by Agent, immediately deliver the payments to Agent, for the ratable benefit of the Lenders in the form received from the Account Debtor, with proper endorsements for deposit;

(kkk) make any payments and do any acts Agent or any Lender considers necessary or reasonable to protect the Collateral and/or its security interest in the Collateral. Borrower shall assemble the Collateral if Agent requests and make it available as Agent designates. Agent may enter premises where the Collateral is located, take and maintain possession of any part of the Collateral, and pay, purchase, contest, or compromise any Lien which appears to be prior or superior to its security interest or charges and pay all expenses incurred. Borrower grants Agent a license to enter and occupy any of its premises, without charge, to exercise any of Agent's rights or remedies;

(lll) apply to the Obligations (i) any balances and deposits of Borrower it holds, or (ii) any amount held by Agent owing to or for the credit or the account of Borrower;

(mmm) ship, reclaim, recover, store, finish, maintain, repair, prepare for sale, advertise for sale, and sell the Collateral. Agent, for the benefit of the Lenders is hereby granted a non-exclusive, royalty-free license or other right to use, without charge, Borrower's labels, Patents, Copyrights, mask works, rights of use of any name, trade secrets, trade names, Trademarks, and advertising matter, or any similar property as it pertains to the Collateral, in completing production of, advertising for sale, and selling any Collateral and, in connection with Agent's exercise of its rights under this Section, Borrower's rights under all licenses and all franchise agreements inure to Agent, for the ratable benefit of the Lenders;

(nnn) place a "hold" on any account maintained with Agent or Lenders and/or deliver a notice of exclusive control, any entitlement order, or other directions or instructions pursuant to any Control Agreement or similar agreements providing control of any Collateral;

(ooo) demand and receive possession of Borrower's Books; and

(ppp) exercise all rights and remedies available to Agent and the Lenders under the Loan Documents or at law or equity, including all remedies provided under the Code (including disposal of the Collateral pursuant to the terms thereof).

Power of Attorney. Borrower hereby irrevocably appoints Agent, for the benefit of the Lenders, as its lawful attorney-in-fact, exercisable upon the occurrence and during the continuance of an Event of Default, to: (a) endorse Borrower's name on any checks or other forms of payment or security; (b) sign Borrower's name on any invoice or bill of lading for any Account or drafts against Account Debtors; (c) settle and adjust disputes and claims about the Accounts directly with Account Debtors, for amounts and on terms Agent determines reasonable; (d) make, settle, and adjust all claims under Borrower's insurance policies; (e) pay, contest or settle any Lien, charge, encumbrance, security interest, and adverse claim in or to the Collateral, or any judgment based thereon, or otherwise take any action to terminate or discharge the same; and (f) transfer the Collateral into the name of Agent or a third party as the Code permits. Borrower hereby appoints Agent as its lawful attorney-in-fact to sign Borrower's name on any documents necessary to perfect or continue the perfection of Agent's security interest in the Collateral regardless of whether an Event of Default has occurred until all Obligations (other than inchoate indemnity obligations) have been satisfied in full and Lenders are under no further obligation to make Credit Extensions hereunder. Agent's foregoing appointment as Borrower's attorney in fact, and all of Agent's rights and powers, coupled with an interest, are irrevocable until all Obligations have been fully repaid and performed and each Lender's obligation to provide Credit Extensions terminates.

Protective Payments. If Borrower fails to obtain the insurance called for by Section 6.5 or fails to pay any premium thereon or fails to pay any other amount which Borrower is obligated to pay under this Agreement or any other Loan Document or which may be required to preserve the Collateral, Agent may obtain such insurance or make such payment, and all amounts so paid by Agent are Lenders' Expenses and immediately due and payable, bearing interest at the then highest rate applicable to the Obligations, and secured by the Collateral. Agent will make reasonable efforts to provide Borrower with notice of Agent obtaining such insurance at the time it is obtained or within a reasonable time thereafter. No payments by Agent are deemed an agreement to make similar payments in the future or Agent's or Lender's waiver of any Event of Default.

Application of Payments and Proceeds Upon Default. If an Event of Default has occurred and is continuing, Agent shall have the right to apply in any order any funds in its possession, whether from Borrower's account balances, payments, proceeds realized as the result of any collection of Accounts or other disposition of the Collateral, or otherwise, to the Obligations. Agent shall pay any surplus to Borrower by credit to the Designated Deposit Account or to other Persons legally entitled thereto; Borrower shall remain liable to Agent and the Lenders for any deficiency. If Agent, directly or indirectly, enters into a deferred payment or other credit transaction with any purchaser at any sale of Collateral, Agent shall have the option, exercisable at any time, of either reducing the Obligations by the principal amount of the purchase price or deferring the reduction of the Obligations until the actual receipt by Agent of cash therefor.

Liability for Collateral. So long as Agent and Lenders comply with reasonable banking practices regarding the safekeeping of the Collateral in their possession or under the control of Agent and/or Lenders, Agent and Lenders shall not be liable or responsible for: (a) the safekeeping of the Collateral; (b) any loss or damage to the Collateral; (c) any diminution in the value of the Collateral; or (d) any act or default of any carrier, warehouseman, bailee, or other Person. Borrower bears all risk of loss, damage or destruction of the Collateral.

No Waiver; Remedies Cumulative. Agent's and any Lender's failure, at any time or times, to require strict performance by Borrower of any provision of this Agreement or any other Loan Document shall not waive, affect, or diminish any right of Agent or any Lender thereafter to demand strict performance and compliance herewith or therewith. No waiver hereunder shall be effective unless signed by the party granting the waiver and then is only effective for the specific instance and purpose for which it is given. Agent's and each Lender's rights and remedies under this Agreement and the other Loan Documents are cumulative. Agent and each Lender have all rights and remedies provided under the Code, by law, or in equity. Agent's or any Lender's exercise of one right or remedy is not an election and shall not preclude Agent or any Lender from exercising any other remedy under this Agreement or any other Loan Document or other remedy available at law or in equity, and Agent's or any Lender's waiver of any Event of Default is not a continuing waiver. Agent's or any Lender's delay in exercising any remedy is not a waiver, election, or acquiescence.

Demand Waiver. Borrower waives demand, notice of default or dishonor, notice of payment and nonpayment, notice of any default, nonpayment at maturity, release, compromise, settlement, extension, or renewal of accounts, documents, instruments, chattel paper, and guarantees held by Agent on which Borrower is liable.

Borrower Liability. Each Borrower may, acting singly, request Credit Extensions hereunder. Each Borrower hereby appoints each other as agent for itself for all purposes hereunder, including with respect to requesting Credit Extensions hereunder. Each Borrower hereunder shall be jointly and severally obligated to repay all Credit Extensions made hereunder, regardless of which Borrower actually receives said Credit Extension, as if each Borrower hereunder directly received all Credit Extensions. To the extent not prohibited by applicable law, each Borrower waives (a) any suretyship defenses available to it under the Code or any other applicable law, including, without limitation, the benefit of California Civil Code Section 2815 permitting revocation as to future transactions and the benefit of California Civil Code Sections 1432, 2809, 2810, 2819, 2839, 2845, 2847, 2848, 2849, 2850, and 2899 and 3433, and (b) any right to require Agent or the Lenders to: (i) proceed against any Borrower or any other person; (ii) proceed against or exhaust any security; or (iii) pursue any other remedy. Agent and Lenders may exercise or not exercise any right or remedy it has against any Borrower or any security it holds (including the right to foreclose or realize its security by judicial or non-judicial sale) without affecting any Borrower's liability.

Notwithstanding any other provision of this Agreement or other related document, each Borrower irrevocably waives all rights that it may have at law or in equity (including, without limitation, any law subrogating Borrower to the rights of Agent or the Lenders under this Agreement) to seek contribution, indemnification or any other form of reimbursement from any other Borrower, or any other Person now or hereafter primarily or secondarily liable for any of the Obligations, for any payment made by Borrower with respect to the Obligations in connection with this Agreement or otherwise and all rights that it might have to benefit from, or to participate in, any security for the Obligations as a result of any payment made by Borrower with respect to the Obligations in connection with this Agreement or otherwise. Any agreement providing for indemnification, reimbursement or any other arrangement prohibited under this Section 9.8 shall be null and void. If any payment is made to a Borrower in contravention of this Section 9.8, such Borrower shall hold such payment in trust for Agent and such payment shall be promptly delivered to Agent for application to the Obligations, whether matured or unmatured.

Each Borrower is entering into this Agreement, and making all representations and warranties hereunder, on a joint and several basis, and all covenants, agreements and undertakings herein expressed or implied on the part of each Borrower shall be deemed to be joint and several.

AGENT

Appointment and Authority.

(qqq) Each Lender hereby irrevocably appoints SVB to act on its behalf as Agent hereunder and under the other Loan Documents and authorizes Agent to take such actions on its behalf and to exercise such powers as are delegated to Agent by the terms hereof or thereof, together with such actions and powers as are reasonably incidental thereto.

(rrr) The provisions of this Section 10 are solely for the benefit of Agent and Lenders, and Borrower shall not have rights as a third party beneficiary of any of such provisions. Notwithstanding any provision to the contrary elsewhere in this Agreement, Agent shall not have any duties or responsibilities to any Lender or any other Person, except those expressly set forth herein, or any fiduciary relationship with any Lender, and no implied covenants, functions, responsibilities, duties, obligations or liabilities shall be read into this Agreement or any other Loan Document or otherwise exist against Agent.

Delegation of Duties. Agent may perform any and all of its duties and exercise its rights and powers hereunder or under any other Loan Document by or through any one or more sub-agents appointed by Agent. Agent and any such sub-agent may perform any and all of its duties and exercise its rights and powers by or through their respective Indemnified Persons. The exculpatory provisions of this Section 10.2 shall apply to any such sub-agent and to the Indemnified Persons of Agent and any such sub-agent, and shall apply to their respective activities in connection with the syndication of the credit facilities provided for herein as well as activities as Agent.

Exculpatory Provisions. Agent shall have no duties or obligations except those expressly set forth herein and in the other Loan Documents. Without limiting the generality of the foregoing, Agent shall not:

(sss) be subject to any fiduciary, trust, agency or other similar duties, regardless of whether any Event of Default has occurred and is continuing;

(ttt) have any duty to take any discretionary action or exercise any discretionary powers, except discretionary rights and powers expressly contemplated hereby or by the other Loan Documents that Agent is required to exercise as directed in writing by the Lenders, as applicable; provided that Agent shall not be required to take any action that, in its opinion or the opinion of its counsel, may expose Agent to liability or that is contrary to any Loan Document or applicable law; and

(uuu) except as expressly set forth herein and in the other Loan Documents, have any duty to disclose, and Agent shall not be liable for the failure to disclose, any information relating to Borrower or any of its Affiliates that is communicated to or obtained by any Person serving as Agent or any of its Affiliates in any capacity.

Agent shall not be liable for any action taken or not taken by it (i) with the consent or at the request of the Lenders (or as Agent shall believe in good faith shall be necessary, under the circumstances as provided in Section 13.7) or (ii) in the absence of its own gross negligence or willful misconduct.

Agent shall not be responsible for or have any duty to ascertain or inquire into (i) any statement, warranty or representation made in or in connection with this Agreement or any other Loan Document, (ii) the contents of any certificate, report or other document delivered hereunder or thereunder or in connection herewith or therewith, (iii) the performance or observance of any of the covenants, agreements or other terms or conditions set forth herein or therein or the occurrence of any Event of Default, (iv) the validity, enforceability, effectiveness or genuineness of this Agreement, any other Loan Document or any other agreement, instrument or document or (v) the satisfaction of any condition set forth in Section 3 or elsewhere herein, other than to confirm receipt of items expressly required to be delivered to Agent.

Reliance by Agent. Agent shall be entitled to rely upon, and shall not incur any liability for relying upon, any notice, request, certificate, consent, statement, instrument, document or other writing (including any electronic message, internet or intranet website posting or other distribution) believed by it to be genuine and to have been signed, sent or otherwise authenticated by the proper Person. Agent also may rely upon any statement made to it orally or by telephone and believed by it to have been made by the proper Person, and shall not incur any liability for relying thereon. Agent may consult with legal counsel (who may be counsel for Borrower), independent accountants and other experts selected by it, and shall not be liable for any action taken or not taken by it in accordance with the advice of any such counsel, accountants or experts. In determining compliance with any condition hereunder to the making of a Credit Extension that, by its terms, must be fulfilled to the satisfaction of a Lender, Agent may presume that such condition is satisfactory to such Lender unless Agent shall have received notice to the contrary from such Lender prior to the making of such Credit Extension. Agent shall in all cases be fully protected in acting, or in refraining from acting, under this Agreement and the other Loan Documents in accordance with a request of the Lenders, and such request and any action taken or failure to act pursuant thereto shall be binding upon Lenders and all future holders of the Credit Extensions.

Notice of Default. Agent shall not be deemed to have knowledge or notice of the occurrence of any Event of Default (except with respect to defaults in the payment of principal, interest or fees required to be paid to Agent for the account of Lenders), unless Agent has received notice from a Lender or Borrower referring to this Agreement, describing such Event of Default and stating that such notice is a "notice of default". In the event that Agent receives such a notice, Agent shall give notice thereof to Lenders. Agent shall take such action with respect to such Event of Default as shall be reasonably directed by the Lenders.

Non-Reliance on Agent and Other Lenders. Each Lender expressly acknowledges that neither Agent nor any of its officers, directors, employees, agents, attorneys in fact or affiliates has made any representations or warranties to it and that no act by Agent hereafter taken, including any review of the affairs of a Group Member or any Affiliate of a Group Member, shall be deemed to constitute any representation or warranty by Agent to any Lender. Each Lender represents to Agent that it has, independently and without reliance upon Agent or any other Lender, and

based on such documents and information as it has deemed appropriate, made its own appraisal of, and investigation into, the business, operations, property, financial and other condition and creditworthiness of the Group Members and their Affiliates and made its own decision to make its Credit Extensions hereunder and enter into this Agreement. Each Lender also represents that it will, independently and without reliance upon Agent or any other Lender, and based on such documents and information as it shall deem appropriate at the time, continue to make its own credit analysis, appraisals and decisions in taking or not taking action under this Agreement and the other Loan Documents, and to make such investigation as it deems necessary to inform itself as to the business, operations, property, financial and other condition and creditworthiness of the Group Members and their Affiliates. Except for notices, reports and other documents expressly required to be furnished to Lenders by Agent hereunder, Agent shall have no duty or responsibility to provide any Lender with any credit or other information concerning the business, operations, property, condition (financial or otherwise), prospects or creditworthiness of any Group Member or any Affiliate of a Group Member that may come into the possession of Agent or any of its officers, directors, employees, agents, attorneys in fact or Affiliates.

Indemnification. Each Lender agrees to indemnify Agent in its capacity as such (to the extent not reimbursed by Borrower and without limiting the obligation of Borrower to do so in accordance with the terms hereof, according to its Term Loan Commitment Percentage in effect on the date on which indemnification is sought under this Section 10.7 (or, if indemnification is sought after the date upon which the Commitments shall have terminated and the Obligations shall have been paid in full, in accordance with its Term Loan Commitment Percentage immediately prior to such date), from and against any and all liabilities, obligations, losses, damages, penalties, actions, judgments, suits, costs, expenses or disbursements of any kind whatsoever that may at any time (whether before or after the payment of the Credit Extensions) be imposed on, incurred by or asserted against Agent in any way relating to or arising out of, the Commitments, this Agreement, any of the other Loan Documents or any documents contemplated by or referred to herein or therein or the transactions contemplated hereby or thereby or any action taken or omitted by Agent under or in connection with any of the foregoing; provided that no Lender shall be liable for the payment of any portion of such liabilities, obligations, losses, damages, penalties, actions, judgments, suits, costs, expenses or disbursements that are found by a final and nonappealable decision of a court of competent jurisdiction to have resulted primarily from Agent's gross negligence or willful misconduct. The agreements in this Section shall survive the payment of the Credit Extensions and all other amounts payable hereunder.

Agent in Its Individual Capacity. The Person serving as Agent hereunder shall have the same rights and powers in its capacity as a Lender as any other Lender and may exercise the same as though it were not Agent and the term "Lender" or "Lenders" shall, unless otherwise expressly indicated or unless the context otherwise requires, include each such Person serving as Agent hereunder in its individual capacity. Such Person and its Affiliates may accept deposits from, lend money to, act as the financial advisor or in any other advisory capacity for and generally engage in any kind of business with Borrower, any Guarantor or any Subsidiary or other Affiliate thereof as if such Person were not Agent hereunder and without any duty to account therefor to Lenders.

Successor Agent. Agent may at any time give notice of its resignation to Lenders and Borrower, which resignation shall not be effective until the time at which the majority of the Lenders have delivered to Agent their written consent to such resignation. Upon receipt of any such notice of resignation, the Lenders shall have the right, in consultation with Borrower, to appoint a successor, which shall be a financial institution with an office in the State of California, or an Affiliate of any such bank with an office in the State of California. If no such successor shall have been so appointed by the Lenders and shall have accepted such appointment within thirty (30) days after the retiring Agent has received the written consent of the majority of the Lenders to such resignation, then the retiring Agent may on behalf of Lenders, appoint a successor Agent meeting the qualifications set forth above; provided that in no event shall any such successor Agent be a Defaulting Lender and provided further that if the retiring Agent shall notify Borrower and Lenders that no qualifying Person has accepted such appointment, then such resignation shall nonetheless become effective in accordance with such notice and (1) the retiring Agent shall be discharged from its duties and obligations hereunder and under the other Loan Documents (except that in the case of any collateral security held by Agent on behalf of the Lenders under any of the Loan Documents, the retiring Agent shall continue to hold such collateral security until such time as a successor Agent is appointed and such collateral security is assigned to such successor Agent) and (2) all payments, communications and determinations provided to be made by, to or through Agent shall instead be made by or to each Lender directly, until such time as the Lenders appoint a successor Agent as provided for above in this Section 10.9. Upon the acceptance of a successor's appointment as Agent hereunder, such successor shall succeed to and become vested with all of the rights, powers, privileges and duties of the retiring

(or retired) Agent, and the retiring Agent shall be discharged from all of its duties and obligations hereunder or under the other Loan Documents (if not already discharged therefrom as provided above in this Section 10.9). The fees payable by Borrower to a successor Agent shall be the same as those payable to its predecessor unless otherwise agreed between Borrower and such successor. After the retiring Agent's resignation hereunder and under the other Loan Documents, the provisions of this Section 10 shall continue in effect for the benefit of such retiring Agent, its sub-agents and their respective Indemnified Persons in respect of any actions taken or omitted to be taken by any of them while the retiring Agent was acting as Agent.

Defaulting Lender.

(vvv) Defaulting Lender Adjustments. Notwithstanding anything to the contrary contained in this Agreement, if any Lender becomes a Defaulting Lender, then, until such time as such Lender is no longer a Defaulting Lender, to the extent permitted by applicable law:

(i) Waivers and Amendments. Such Defaulting Lender's right to approve or disapprove any amendment, waiver or consent with respect to this Agreement shall be restricted as long as said Lender is a Defaulting Lender.

(ii) Defaulting Lender Waterfall. Any payment of principal, interest, fees or other amounts received by the Agent for the account of such Defaulting Lender (whether voluntary or mandatory, at maturity, pursuant to Section 8 or otherwise, and including any amounts made available to the Agent by such Defaulting Lender pursuant to Section 13.10), shall be applied at such time or times as may be determined by the Agent as follows: first, to the payment of any amounts owing by such Defaulting Lender to the Agent hereunder; second, as Borrower may request (so long as no Event of Default exists), to the funding of any Term Loan Advance in respect of which such Defaulting Lender has failed to fund its portion thereof as required by this Agreement, as determined by the Agent; third, if so determined by the Agent and Borrower, to be held in a Deposit Account and released pro rata to satisfy such Defaulting Lender's potential future funding obligations with respect to Term Loan Advances under this Agreement; fourth, so long as no Event of Default has occurred and is continuing, to the payment of any amounts owing to Borrower as a result of any judgment of a court of competent jurisdiction obtained by Borrower against such Defaulting Lender as a result of such Defaulting Lender's breach of its obligations under this Agreement; and fifth, to such Defaulting Lender or as otherwise directed by a court of competent jurisdiction; provided that if (A) such payment is a payment of the principal amount of any Term Loan Advances in respect of which such Defaulting Lender has not fully funded its appropriate share and (B) such Term Loan Advances were made at a time when the conditions set forth in Section 3.1 were satisfied or waived, such payment shall be applied solely to pay the Term Loan Advances of all non-Defaulting Lenders on a *pro rata* basis prior to being applied to the payment of any Term Loan Advances of such Defaulting Lender until such time as all Term Loan Advances are held by the Lenders pro rata in accordance with the Term Loan Commitments under this Agreement. Any payments, prepayments or other amounts paid or payable to a Defaulting Lender that are applied (or held) to pay amounts owed by a Defaulting Lender pursuant to this Section 10.10(a)(ii) shall be deemed paid to and redirected by such Defaulting Lender, and each Lender irrevocably consents hereto.

(iii) Certain Fees. No Defaulting Lender shall be entitled to receive any fee pursuant to Section 2.4(a) or Section 2.4(b) for any period during which such Lender is a Defaulting Lender (and Borrower shall not be required to pay any such fee that otherwise would have been required to have been paid to such Defaulting Lender).

(www) Defaulting Lender Cure. If Borrower and Agent agree in writing that a Lender is no longer a Defaulting Lender, Agent will so notify the parties hereto, whereupon as of the effective date specified in such notice and subject to any conditions set forth therein, such Lender will, to the extent applicable, purchase at par that portion of outstanding Term Loan Advances of the other Lenders or take such other actions as Agent may determine to be

necessary to cause the Term Loan Advances to be held on a *pro rata* basis by the Lenders in accordance with their respective Term Loan Commitment Percentages, whereupon such Lender will cease to be a Defaulting Lender; provided that no adjustments will be made retroactively with respect to fees accrued or payments made by or on behalf of Borrower while such Lender was a Defaulting Lender; and provided further that, except to the extent otherwise expressly agreed by the affected parties, no change hereunder from Defaulting Lender to Lender will constitute a waiver or release of any claim of any party hereunder arising from such Lender having been a Defaulting Lender.

(xxx) Termination of Defaulting Lender. Borrower may terminate the unused amount of the Term Loan Commitment of any Lender that is a Defaulting Lender upon not less than ten (10) Business Days' prior notice to Agent (which shall promptly notify the Lenders thereof), and in such event the provisions of Section 10.10(a)(ii) will apply to all amounts thereafter paid by Borrower for the account of such Defaulting Lender under this Agreement (whether on account of principal, interest, fees, indemnity or other amounts); provided that (i) no Event of Default shall have occurred and be continuing, and (ii) such termination shall not be deemed to be a waiver or release of any claim Borrower, Agent or any Lender may have against such Defaulting Lender.

(yyy) If the Person serving as Agent is a Defaulting Lender pursuant to clause (d) of the definition thereof, the non-Defaulting Lenders may, to the extent permitted by applicable law, by notice in writing to Borrower and such Person, remove such Person as Agent and, in consultation with Borrower, appoint a successor. If no such successor shall have been so appointed by the non-Defaulting Lenders and shall have accepted such appointment within thirty (30) days (or such earlier day as shall be agreed by the non-Defaulting Lenders) (the "**Removal Effective Date**"), then such removal shall nonetheless become effective in accordance with such notice on the Removal Effective Date.

NOTICES

All notices, consents, requests, approvals, demands, or other communication by any party to this Agreement or any other Loan Document must be in writing and shall be deemed to have been validly served, given, or delivered: (a) upon the earlier of actual receipt and three (3) Business Days after deposit in the U.S. mail, first class, registered or certified mail return receipt requested, with proper postage prepaid; (b) upon transmission, when sent by electronic mail or facsimile transmission; (c) one (1) Business Day after deposit with a reputable overnight courier with all charges prepaid; or (d) when delivered, if hand-delivered by messenger, all of which shall be addressed to the party to be notified and sent to the address, facsimile number, or email address indicated below. Agent or Borrower may change its mailing or electronic mail address or facsimile number by giving the other party written notice thereof in accordance with the terms of this Section 11.

| | |
|---------------------|---|
| If to Borrower: | Alexo Therapeutics International Sirpant Therapeutics 866 Malcolm Road, Suite 100 Burlingame, CA 94010 Attn: Finance Department |
| If to Agent or SVB: | Silicon Valley Bank 505 Howard Street, 3 rd Floor San Francisco, California 94105 |
| with a copy to: | Morrison & Foerster LLP 200 Clarendon Street, 20 th Floor Boston, Massachusetts 02116 |
| If to WestRiver: | WestRiver Innovation Lending Fund VIII, L.P. c/o WestRiver Management, LLC 920 5th Avenue, Suite 3450 Seattle, WA 98104 |

CHOICE OF LAW, VENUE, JURY TRIAL WAIVER, AND JUDICIAL REFERENCE

Except as otherwise expressly provided in any of the Loan Documents, California law governs the Loan Documents without regard to principles of conflicts of law. Borrower, Agent, and Lenders each submit to the exclusive jurisdiction of the State and Federal courts in Santa Clara County, California; provided, however, that nothing in this Agreement shall be deemed to operate to preclude Agent or Lenders from bringing suit or taking other legal action in any other jurisdiction to realize on the Collateral or any other security for the Obligations, or to enforce a judgment or other court order in favor of Agent or any Lender. Borrower expressly submits and consents in advance to such jurisdiction in any action or suit commenced in any such court, and Borrower hereby waives to the extent permitted by applicable law any objection that it may have based upon lack of personal jurisdiction, improper venue, or forum non conveniens and hereby consents to the granting of such legal or equitable relief as is deemed appropriate by such court. Borrower hereby waives to the extent permitted by applicable law personal service of the summons, complaints, and other process issued in such action or suit and agrees that service of such summons, complaints, and other process may be made by registered or certified mail addressed to Borrower at the address set forth in, or subsequently provided by Borrower in accordance with, Section 11 of this Agreement and that service so made shall be deemed completed upon the earlier to occur of Borrower's actual receipt thereof or three (3) days after deposit in the U.S. mails, proper postage prepaid.

TO THE FULLEST EXTENT PERMITTED BY APPLICABLE LAW, BORROWER, AGENT AND EACH LENDER EACH WAIVE THEIR RIGHT TO A JURY TRIAL OF ANY CLAIM OR CAUSE OF ACTION ARISING OUT OF OR BASED UPON THIS AGREEMENT, THE LOAN DOCUMENTS OR ANY CONTEMPLATED TRANSACTION, INCLUDING CONTRACT, TORT, BREACH OF DUTY AND ALL OTHER CLAIMS. THIS WAIVER IS A MATERIAL INDUCEMENT FOR ALL PARTIES TO ENTER INTO THIS AGREEMENT. EACH PARTY HAS REVIEWED THIS WAIVER WITH ITS COUNSEL.

WITHOUT INTENDING IN ANY WAY TO LIMIT THE PARTIES' AGREEMENT TO WAIVE THEIR RESPECTIVE RIGHT TO A TRIAL BY JURY, if the above waiver of the right to a trial by jury is not enforceable, the parties hereto agree that any and all disputes or controversies of any nature between them arising at any time shall be decided by a reference to a private judge, mutually selected by the parties (or, if they cannot agree, by the Presiding Judge of the Santa Clara County, California Superior Court) appointed in accordance with California Code of Civil Procedure Section 638 (or pursuant to comparable provisions of federal law if the dispute falls within the exclusive jurisdiction of the federal courts), sitting without a jury, in Santa Clara County, California; and the parties hereby submit to the jurisdiction of such court. The reference proceedings shall be conducted pursuant to and in accordance with the provisions of California Code of Civil Procedure §§ 638 through 645.1, inclusive. The private judge shall have the power, among others, to grant provisional relief, including without limitation, entering temporary restraining orders, issuing preliminary and permanent injunctions and appointing receivers. All such proceedings shall be closed to the public and confidential and all records relating thereto shall be permanently sealed. If during the course of any dispute, a party desires to seek provisional relief, but a judge has not been appointed at that point pursuant to the judicial reference procedures, then such party may apply to the Santa Clara County, California Superior Court for such relief. The proceeding before the private judge shall be conducted in the same manner as it would be before a court under the rules of evidence applicable to judicial proceedings. The parties shall be entitled to discovery which shall be conducted in the same manner as it would be before a court under the rules of discovery applicable to judicial proceedings. The private judge shall oversee discovery and may enforce all discovery rules and orders applicable to judicial proceedings in the same manner as a trial court judge. The parties agree that the selected or appointed private judge shall have the power to decide all issues in the action or proceeding, whether of fact or of law, and shall report a statement of decision thereon pursuant to California Code of Civil Procedure § 644(a). Nothing in this paragraph shall limit the right of any party at any time to exercise self-help remedies, foreclose against collateral, or obtain provisional remedies. The private judge shall also determine all issues relating to the applicability, interpretation, and enforceability of this paragraph.

This Section 12 shall survive the termination of this Agreement.

GENERAL PROVISIONS

Termination Prior to Term Loan Maturity Date; Survival. All covenants, representations and warranties made in this Agreement continue in full force until this Agreement has terminated pursuant to its terms and all

Obligations (other than inchoate indemnity obligations) have been satisfied. So long as Borrower has satisfied the Obligations (other than inchoate indemnity obligations, any other obligations which, by their terms, are to survive the termination of this Agreement, and any Obligations under Bank Services Agreements that are cash collateralized in accordance with Section 4.1 of this Agreement), this Agreement, including any unused Term Loan Commitments, may be terminated prior to the Term Loan Maturity Date by Borrower, effective three (3) Business Days after written notice of termination is given to Agent. Those obligations that are expressly specified in this Agreement as surviving this Agreement's termination shall continue to survive notwithstanding this Agreement's termination. No termination of this Agreement shall in any way affect or impair any right or remedy of Agent or any Lender, nor shall any such termination relieve Borrower of any Obligation to any Lender, until all of the Obligations (other than inchoate indemnity obligations) have been paid and performed in full. Those Obligations that are expressly specified in this Agreement as surviving this Agreement's termination shall continue to survive notwithstanding this Agreement's termination and payment in full of the Obligations then outstanding.

Successors and Assigns. This Agreement binds and is for the benefit of the successors and permitted assigns of each party. Borrower may not assign this Agreement or any rights or obligations under it without Agent and Lenders' prior written consent (which may be granted or withheld in Agent's and Lenders' sole discretion). Agent and each Lender has the right, without the consent of or notice to Borrower, to sell, transfer, assign, negotiate, or grant participation in all or any part of, or any interest in, such Lender's obligations, rights, and benefits under this Agreement and the other Loan Documents (other than the Warrant, as to which assignment, transfer and other such actions are governed by the terms thereof).

Indemnification. Borrower agrees to indemnify, defend and hold Agent, each Lender and their respective directors, officers, employees, agents, attorneys, or any other Person affiliated with or representing Agent or any Lender (each, an "**Indemnified Person**") harmless against: (i) all obligations, demands, claims, and liabilities (collectively, "**Claims**") claimed or asserted by any other party in connection with the transactions contemplated by the Loan Documents; and (ii) all losses or expenses (including Lenders' Expenses) in any way suffered, incurred, or paid by such Indemnified Person as a result of, following from, consequential to, or arising from transactions between Agent, Lenders and Borrower contemplated by the Loan Documents (including reasonable attorneys' fees and expenses), except for Claims and/or losses directly caused by such Indemnified Person's gross negligence or willful misconduct.

This Section 13.3 shall survive until all statutes of limitation with respect to the Claims, losses, and expenses for which indemnity is given shall have run.

Time of Essence. Time is of the essence for the performance of all Obligations in this Agreement.

Severability of Provisions. Each provision of this Agreement is severable from every other provision in determining the enforceability of any provision.

Correction of Loan Documents. Agent may correct patent errors and fill in any blanks in the Loan Documents consistent with the agreement of the parties.

Amendments in Writing; Waiver; Integration. No purported amendment or modification of any Loan Document, or waiver, discharge or termination of any obligation under any Loan Document, or release, or subordinate Lenders' security interest in, or consent to the transfer of, any Collateral shall be enforceable or admissible unless, and only to the extent, expressly set forth in a writing signed by Agent, with the consent of the Lenders in accordance with the Lender Intercreditor Agreement or, if such item is not addressed in the Lender Intercreditor Agreement, as consented to by a majority of the Lenders, and Borrower. Without limiting the generality of the foregoing, no oral promise or statement, nor any action, inaction, delay, failure to require performance or course of conduct shall operate as, or evidence, an amendment, supplement or waiver or have any other effect on any Loan Document. Any waiver granted shall be limited to the specific circumstance expressly described in it, and shall not apply to any subsequent or other circumstance, whether similar or dissimilar, or give rise to, or evidence, any obligation or commitment to grant any further waiver. The Loan Documents represent the entire agreement about this subject matter and supersede prior negotiations or agreements. All prior agreements, understandings, representations, warranties, and negotiations between the parties about the subject matter of the Loan Documents merge into the Loan Documents. In the event any provision of any other Loan Document is inconsistent with the provisions of this Agreement, the provisions of this Agreement shall exclusively control.

Counterparts. This Agreement may be executed in any number of counterparts and by different parties on separate counterparts, each of which, when executed and delivered, is an original, and all taken together, constitute one Agreement.

Confidentiality. Agent and each Lender agrees to maintain the confidentiality of Information (as defined below), except that Information may be disclosed (a) to Agent and/or any Lender's subsidiaries or Affiliates, and their respective employees, directors, investors, potential investors, agents, attorneys, accountants and other professional advisors (collectively, "**Representatives**" and, together with Agent and the Lenders, collectively, "**Lender Entities**"); (b) to prospective transferees, assignees, credit providers or purchasers of any of Agent's or Lenders' interests under or in connection with this Agreement and their Representatives (provided, however, that any such prospective transferee, assignee, credit provider, or purchaser or their Representatives shall have entered into an agreement containing provisions substantially the same as those in this Section 13.9); (c) as required by law, regulation, subpoena, or other order; (d) to Agent's or any Lender's regulators or as otherwise required in connection with Agent's or any Lender's examination or audit; (e) as Agent or any Lender considers appropriate in exercising remedies under the Loan Documents; and (f) to third-party service providers of Agent and/or any Lender so long as such service providers have executed a confidentiality agreement with Agent or the Lenders, as applicable, with terms no less restrictive than those contained herein. The term "**Information**" means all information received from Borrower or Guarantor regarding such entity's business, in each case other than information that is either: (i) in the public domain or in Agent's or any Lender's possession when disclosed to Agent or such Lender, or becomes part of the public domain (other than as a result of its disclosure by Agent or a Lender in violation of this Agreement) after disclosure to Agent and/or the Lenders; or (ii) disclosed to Agent and/or a Lender by a third party, if Agent or such Lender, as applicable, does not know that the third party is prohibited from disclosing the information.

Lender Entities may use anonymous forms of confidential information for aggregate datasets, for analyses or reporting, and for any other uses not expressly prohibited in writing by Borrower. The provisions of the immediately preceding sentence shall survive the termination of this Agreement.

Right of Setoff. Borrower hereby grants to Agent, for the ratable benefit of the Lenders, a Lien, security interest, and a right of setoff as security for all Obligations to Agent and the Lenders, whether now existing or hereafter arising upon and against all deposits, credits, collateral and property, now or hereafter in the possession, custody, safekeeping or control of Agent or any entity under the control of Agent (including a subsidiary of Agent) in transit to any of them. At any time after the occurrence and during the continuance of an Event of Default, without demand or notice, Agent or any Lender may setoff the same or any part thereof and apply the same to any liability or Obligation of Borrower even though unmaturing and regardless of the adequacy of any other collateral securing the Obligations. ANY AND ALL RIGHTS TO REQUIRE AGENT OR ANY LENDER TO EXERCISE ITS RIGHTS OR REMEDIES WITH RESPECT TO ANY OTHER COLLATERAL WHICH SECURES THE OBLIGATIONS, PRIOR TO EXERCISING ITS RIGHT OF SETOFF WITH RESPECT TO SUCH DEPOSITS, CREDITS OR OTHER PROPERTY OF BORROWER, ARE HEREBY KNOWINGLY, VOLUNTARILY AND IRREVOCABLY WAIVED.

Attorneys' Fees, Costs and Expenses. In any action or proceeding between Borrower and Agent or the Lenders arising out of or relating to the Loan Documents, the prevailing party shall be entitled to recover its reasonable and documented attorneys' fees and other costs and expenses incurred, in addition to any other relief to which it may be entitled.

Electronic Execution of Documents. The words "execution," "signed," "signature" and words of like import in any Loan Document shall be deemed to include electronic signatures or the keeping of records in electronic form, each of which shall be of the same legal effect, validity and enforceability as a manually executed signature or the use of a paper-based recordkeeping systems, as the case may be, to the extent and as provided for in any applicable law, including, without limitation, any state law based on the Uniform Electronic Transactions Act.

Captions. The headings used in this Agreement are for convenience only and shall not affect the interpretation of this Agreement.

Construction of Agreement. The parties mutually acknowledge that they and their attorneys have participated in the preparation and negotiation of this Agreement. In cases of uncertainty this Agreement shall be construed without regard to which of the parties caused the uncertainty to exist.

Relationship. The relationship of the parties to this Agreement is determined solely by the provisions of this Agreement. The parties do not intend to create any agency, partnership, joint venture, trust, fiduciary or other relationship with duties or incidents different from those of parties to an arm's-length contract.

Third Parties. Nothing in this Agreement, whether express or implied, is intended to: (a) confer any benefits, rights or remedies under or by reason of this Agreement on any persons other than the express parties to it and their respective permitted successors and assigns; (b) relieve or discharge the obligation or liability of any person not an express party to this Agreement; or (c) give any person not an express party to this Agreement any right of subrogation or action against any party to this Agreement.

Patriot Act. Each Lender hereby notifies Borrower that pursuant to the requirements of the USA PATRIOT Act, it is required to obtain, verify and record information that identifies Borrower and each of its Subsidiaries, which information includes the names and addresses of each Borrower and each of its Subsidiaries and other information that will allow Lender, as applicable, to identify Borrower and each of its Subsidiaries in accordance with the USA PATRIOT Act.

DEFINITIONS

Definitions. As used in the Loan Documents, the word "shall" is mandatory, the word "may" is permissive, the word "or" is not exclusive, the words "includes" and "including" are not limiting, the singular includes the plural, and numbers denoting amounts that are set off in brackets are negative. As used in this Agreement, the following capitalized terms have the following meanings:

"Account" is any **"account"** as defined in the Code with such additions to such term as may hereafter be made, and includes, without limitation, all accounts receivable and other sums owing to Borrower.

"Account Debtor" is any **"account debtor"** as defined in the Code with such additions to such term as may hereafter be made.

"Affiliate" is, with respect to any Person, each other Person that owns or controls directly or indirectly the Person, any Person that controls or is controlled by or is under common control with the Person, and each of that Person's senior executive officers, directors, partners and, for any Person that is a limited liability company, that Person's managers and members.

"Agent" is defined in the preamble hereof.

"Agreement" is defined in the preamble hereof.

"ALX Ireland" is ALX Oncology Limited, a private company limited by shares incorporated under the laws of Ireland.

"ALX U.S." is ALX Oncology Inc., a Delaware corporation.

"Alexo" is defined in the preamble hereof.

"Authorized Signer" is any individual listed in Borrower's Borrowing Resolution who is authorized to execute the Loan Documents, including making (and executing if applicable) any Credit Extension request, on behalf of Borrower.

"Bank Services" are any products, credit services, and/or financial accommodations previously, now, or hereafter provided to Borrower or any of its Subsidiaries by SVB or any SVB Affiliate, including, without limitation,

any letters of credit, cash management services (including, without limitation, merchant services, direct deposit of payroll, business credit cards, and check cashing services), interest rate swap arrangements, and foreign exchange services as any such products or services may be identified in SVB's various agreements related thereto (each, a **"Bank Services Agreement"**).

"Bank Services Agreement" is defined in the definition of Bank Services.

"Board" means Borrower's board of directors or ALX Ireland's board of directors, as applicable.

"Borrower" is defined in the preamble hereof.

"Borrower's Books" are all Borrower's books and records including ledgers, federal and state tax returns, records regarding Borrower's assets or liabilities, the Collateral, business operations or financial condition, and all computer programs or storage or any equipment containing such information.

"Borrowing Resolutions" are, with respect to any Person, those resolutions adopted by such Person's board of directors (and, if required under the terms of such Person's Operating Documents, stockholders or shareholders) and delivered by such Person to Agent approving the Loan Documents to which such Person is a party and the transactions contemplated thereby, together with a certificate executed by its secretary (or other appropriate representative) on behalf of such Person certifying (a) such Person has the authority to execute, deliver, and perform its obligations under each of the Loan Documents to which it is a party, (b) that set forth as a part of or attached as an exhibit to such certificate is a true, correct, and complete copy of the resolutions then in full force and effect authorizing and ratifying the execution, delivery, and performance by such Person of the Loan Documents to which it is a party, (c) the name(s) of the Person(s) authorized to execute the Loan Documents, including making (and executing if applicable) any Credit Extension request, on behalf of such Person, together with a sample of the true signature(s) of such Person(s), and (d) that Agent and the Lenders may conclusively rely on such certificate unless and until such Person shall have delivered to Agent and the Lenders a further certificate canceling or amending such prior certificate.

"Business Day" is any day that is not a Saturday, Sunday or a day on which Agent is closed.

"Cash Equivalents" means (a) marketable direct obligations issued or unconditionally guaranteed by the United States or any agency or any State thereof having maturities of not more than one (1) year from the date of acquisition; (b) commercial paper maturing no more than one (1) year after its creation and having the highest rating from either Standard & Poor's Ratings Group or Moody's Investors Service, Inc.; (c) SVB's certificates of deposit issued maturing no more than one (1) year after issue; and (d) money market funds at least ninety-five percent (95.0%) of the assets of which constitute Cash Equivalents of the kinds described in clauses (a) through (c) of this definition.

"Change in Control" means (a) at any time, any "person" or "group" (as such terms are used in Sections 13(d) and 14(d) of the Exchange Act), shall become, or obtain rights (whether by means of warrants, options or otherwise) to become, the "beneficial owner" (as defined in Rules 13(d)-3 and 13(d)-5 under the Exchange Act), directly or indirectly, of twenty-five percent (25.0%) or more of the ordinary voting power for the election of directors of Borrower (determined on a fully diluted basis) other than by the sale of Borrower's equity securities or shares in a public offering or to venture capital or private equity investors so long as Borrower identifies to the Agent and the Lenders the venture capital or private equity investors at least seven (7) Business Days prior to the closing of the transaction and provides to Agent and the Lenders a description of the material terms of the transaction; (b) during any period of twelve (12) consecutive months, a majority of the members of the board of directors or other equivalent governing body of Borrower cease to be composed of individuals (i) who were members of that board or equivalent governing body on the first day of such period, (ii) whose election or nomination to that board or equivalent governing body was approved by individuals referred to in clause (i) above constituting at the time of such election or nomination at least a majority of that board or equivalent governing body or (iii) whose election or nomination to that board or other equivalent governing body was approved by individuals referred to in clauses (i) and (ii) above constituting at the time of such election or nomination at least a majority of that board or equivalent governing body; or (c) at any time, Borrower shall cease to own and control, of record and beneficially, directly or indirectly, one hundred percent (100.0%) of each class of outstanding capital stock of each Subsidiary of Borrower free and clear of all Liens (except Liens created by this Agreement).

“**Claims**” is defined in Section 13.3.

“**Code**” is the Uniform Commercial Code, as the same may, from time to time, be enacted and in effect in the State of California; provided, that, to the extent that the Code is used to define any term herein or in any Loan Document and such term is defined differently in different Articles or Divisions of the Code, the definition of such term contained in Article or Division 9 shall govern; provided further, that in the event that, by reason of mandatory provisions of law, any or all of the attachment, perfection, or priority of, or remedies with respect to, Agent’s Lien on any Collateral is governed by the Uniform Commercial Code in effect in a jurisdiction other than the State of California, the term “Code” shall mean the Uniform Commercial Code as enacted and in effect in such other jurisdiction solely for purposes of the provisions thereof relating to such attachment, perfection, priority, or remedies and for purposes of definitions relating to such provisions.

“**Collateral**” is any and all properties, rights and assets of Borrower described on Exhibit A.

“**Collateral Account**” is any Deposit Account, Securities Account, or Commodity Account.

“**Collateral Assignment of License Agreement**” is that certain Collateral Assignment of License Agreement dated as of the Effective Date executed by and among Borrower, Agent, the Lenders, and ALX U.S.

“**Commitment**” and “**Commitments**” means the Term Loan Commitment(s).

“**Commodity Account**” is any “commodity account” as defined in the Code with such additions to such term as may hereafter be made.

“**Compliance Certificate**” is that certain certificate in the form attached hereto as Exhibit B.

“**Contingent Obligation**” is, for any Person, any direct or indirect liability, contingent or not, of that Person for (a) any indebtedness, lease, dividend, letter of credit or other obligation of another such as an obligation, in each case, directly or indirectly guaranteed, endorsed, co-made, discounted or sold with recourse by that Person, or for which that Person is directly or indirectly liable; (b) any obligations for undrawn letters of credit for the account of that Person; and (c) all obligations from any interest rate, currency or commodity swap agreement, interest rate cap or collar agreement, or other agreement or arrangement designated to protect a Person against fluctuation in interest rates, currency exchange rates or commodity prices; but “Contingent Obligation” does not include endorsements in the ordinary course of business. The amount of a Contingent Obligation is the stated or determined amount of the primary obligation for which the Contingent Obligation is made or, if not determinable, the maximum reasonably anticipated liability for it determined by the Person in good faith; but the amount may not exceed the maximum of the obligations under any guarantee or other support arrangement.

“**Control Agreement**” is any control agreement entered into among the depository institution at which Borrower maintains a Deposit Account or the securities intermediary or commodity intermediary at which Borrower maintains a Securities Account or a Commodity Account, Borrower, and Agent pursuant to which Agent obtains control (within the meaning of the Code) for the benefit of the Lenders over such Deposit Account, Securities Account, or Commodity Account.

“**Copyrights**” are any and all copyright rights, copyright applications, copyright registrations and like protections in each work of authorship and derivative work thereof, whether published or unpublished and whether or not the same also constitutes a trade secret.

“**Credit Extension**” is any Term Loan Advance, or any other extension of credit by any Lender for Borrower’s benefit under any Loan Document.

“**Debenture**” means the Irish law debenture dated on or about the Effective Date between ALX Ireland and Agent.

“**Default Rate**” is defined in Section 2.3(b).

“Defaulting Lender” is, subject to Section 10.10(b), any Lender that (a) has failed to (i) fund all or any portion of its Term Loan Advances within two (2) Business Days of the date such Term Loan Advances were required to be funded hereunder unless such Lender notifies Agent and Borrower in writing that such failure is the result of such Lender’s reasonable determination that one or more conditions precedent to funding (each of which conditions precedent, together with any applicable default, shall be specifically identified in such writing) has not been satisfied, or (ii) pay to Agent or any other Lender any other amount required to be paid by it hereunder within two (2) Business Days of the date when due, (b) has notified Borrower or Agent in writing that it does not intend to comply with its funding obligations hereunder, or has made a public statement to that effect (unless such writing or public statement relates to such Lender’s obligation to fund a Term Loan Advance hereunder and states that such position is based on such Lender’s reasonable determination that a condition precedent to funding (which condition precedent, together with any applicable default, shall be specifically identified in such writing or public statement) cannot be satisfied), (c) has failed, within three (3) Business Days after written request by Agent or Borrower, to confirm in writing to Agent and Borrower that it will comply with its prospective funding obligations hereunder (provided that such Lender shall cease to be a Defaulting Lender pursuant to this clause (c) upon receipt of such written confirmation by Agent and Borrower), or (d) has, or has a direct or indirect parent company that has, (i) become the subject of an Insolvency Proceeding, or (ii) had appointed for it a receiver, custodian, conservator, trustee, administrator, assignee for the benefit of creditors or similar Person charged with reorganization or liquidation of its business or assets, including the Federal Deposit Insurance Corporation or any other state or federal regulatory authority acting in such a capacity; provided that a Lender shall not be a Defaulting Lender solely by virtue of the ownership or acquisition of any equity interest in that Lender or any direct or indirect parent company thereof by a Governmental Authority so long as such ownership interest does not result in or provide such Lender with immunity from the jurisdiction of courts within the United States or from the enforcement of judgments or writs of attachment on its assets or permit such Lender (or such Governmental Authority) to reject, repudiate, disavow or disaffirm any contracts or agreements made with such Lender. Any determination by Agent that a Lender is a Defaulting Lender under any one or more of clauses (a) through (d) above shall be conclusive and binding absent manifest error, and such Lender shall be deemed to be a Defaulting Lender (subject to Section 10.10(b)) upon delivery of written notice of such determination to Borrower and each Lender.

“Deposit Account” is any **“deposit account”** as defined in the Code with such additions to such term as may hereafter be made.

“Designated Deposit Account” is, collectively (i) the account number ending 956 (last three digits) maintained by Alexo with SVB, and (ii) the account number ending 906 (last three digits) maintained by Sirpant with SVB (provided, however, if no such account number is included, then the Designated Deposit Account shall be any deposit account of Borrower maintained with SVB as chosen by the Lenders).

“Disbursement Letter” is that certain form attached hereto as Exhibit D.

“Division” means, in reference to any Person which is an entity, the division of such Person into two (2) or more separate Persons, with the dividing Person either continuing or terminating its existence as part of such division, including, without limitation, as contemplated under Section 18 217 of the Delaware Limited Liability Company Act for limited liability companies formed under Delaware law, or any analogous action taken pursuant to any other applicable law with respect to any corporation, limited liability company, partnership or other entity.

“Dollars,” “dollars” or use of the sign “\$” means only lawful money of the United States and not any other currency, regardless of whether that currency uses the “\$” sign to denote its currency or may be readily converted into lawful money of the United States.

“Dollar Equivalent” is, at any time, (a) with respect to any amount denominated in Dollars, such amount, and (b) with respect to any amount denominated in a Foreign Currency, the equivalent amount therefor in Dollars as determined by Agent at such time on the basis of the then-prevailing rate of exchange in San Francisco, California, for sales of the Foreign Currency for transfer to the country issuing such Foreign Currency.

“Draw Period” is the period of time commencing upon the occurrence of the Term Sheet Event and continuing through the earlier to occur of (a) March 31, 2020, and (b) an Event of Default.

“**Effective Date**” is defined in the preamble hereof.

“**Equipment**” is all “**equipment**” as defined in the Code with such additions to such term as may hereafter be made, and includes without limitation all machinery, fixtures, goods, vehicles (including motor vehicles and trailers), and any interest in any of the foregoing.

“**Equity Event**” means Borrower has provided Agent and the Lenders with evidence, satisfactory to Agent and each Lender in Agent’s and each Lender’s sole and absolute discretion, that ALX Ireland has received, after the Effective Date, unrestricted and unencumbered net cash proceeds in an amount of at least Fifty Million Dollars (\$50,000,000.00) from the issuance and sale by ALX Ireland of its equity securities to investors (which amount shall be inclusive of any funds received by ALX Ireland with respect to the Interest Only Extension Event).

“**ERISA**” is the Employee Retirement Income Security Act of 1974, and its regulations.

“**Event of Default**” is defined in Section 8.

“**Exchange Act**” is the Securities Exchange Act of 1934, as amended.

“**Federal Funds Effective Rate**” means, for any day, the weighted average of the rates on overnight federal funds transactions with members of the Federal Reserve System arranged by federal funds brokers, as published on the next succeeding Business Day by the Federal Reserve Bank of New York, or, if such rate is not so published for any day that is a Business Day, the average of the quotations for the day of such transactions received by SVB from three federal funds brokers of recognized standing selected by it.

“**Final Payment**” is a payment (in addition to and not in substitution for the regular monthly payments of principal plus accrued interest) equal to the original principal amount of each Term Loan Advance extended by the Lenders to Borrower hereunder multiplied by six percent (6.0%) due on the earliest to occur of (a) the Term Loan Maturity Date, (b) the payment in full of the Term Loan Advances, (c) as required by Section 2.2(d) or 2.2(e), or (d) the termination of this Agreement.

“**Foreign Currency**” means lawful money of a country other than the United States.

“**Funding Date**” is any date on which a Credit Extension is made to or for the account of Borrower which shall be a Business Day.

“**FX Contract**” is any foreign exchange contract by and between Borrower and SVB under which Borrower commits to purchase from or sell to SVB a specific amount of Foreign Currency on a specified date.

“**GAAP**” is generally accepted accounting principles set forth in the opinions and pronouncements of the Accounting Principles Board of the American Institute of Certified Public Accountants and statements and pronouncements of the Financial Accounting Standards Board or in such other statements by such other Person as may be approved by a significant segment of the accounting profession, which are applicable to the circumstances as of the date of determination.

“**General Intangibles**” is all “general intangibles” as defined in the Code in effect on the date hereof with such additions to such term as may hereafter be made, and includes without limitation, all Intellectual Property, claims, income and other tax refunds, security and other deposits, payment intangibles, contract rights, options to purchase or sell real or personal property, rights in all litigation presently or hereafter pending (whether in contract, tort or otherwise), insurance policies (including without limitation key man, property damage, and business interruption insurance), payments of insurance and rights to payment of any kind.

“**Governmental Approval**” is any consent, authorization, approval, order, license, franchise, permit, certificate, accreditation, registration, filing or notice, of, issued by, from or to, or other act by or in respect of, any Governmental Authority.

“Governmental Authority” is any nation or government, any state or other political subdivision thereof, any agency, authority, instrumentality, regulatory body, court, central bank or other entity exercising executive, legislative, judicial, taxing, regulatory or administrative functions of or pertaining to government, any securities exchange and any self-regulatory organization.

“Guarantor” is (a) ALX Ireland, and (b) after the Effective Date, ALX Ireland and any other Person providing a Guaranty in favor of Agent and the Lenders.

“Guaranty” is (a) that certain Unconditional Guaranty dated as of the Effective Date executed by ALX Ireland in favor of Agent and the Lenders, as may be amended, modified, supplemented, or restated from time to time and (b) any guarantee of all or any part of the Obligations, as the same may from time to time be amended, restated, modified or otherwise supplemented.

“Group Member” means Borrower and its Subsidiaries.

“Indebtedness” is (a) indebtedness for borrowed money or the deferred price of property or services, such as reimbursement and other obligations for surety bonds and letters of credit, (b) obligations evidenced by notes, bonds, debentures or similar instruments, (c) capital lease obligations, and (d) Contingent Obligations.

“Indemnified Person” is defined in Section 13.3.

“Information” is defined in Section 13.9.

“Insolvency Proceeding” is any proceeding by or against any Person under the United States Bankruptcy Code, or any other bankruptcy or insolvency law, including assignments for the benefit of creditors, compositions, extensions generally with its creditors, or proceedings seeking reorganization, liquidation, provisional liquidation, winding up, administration, examinership or dissolution, arrangement, or other relief or the appointment of a liquidator, provisional liquidator, receiver, examiner, administrative receiver, administrator, compulsory manager or other similar officer in respect of any Person or its assets.

“Intellectual Property” means, with respect to any Person, all of such Person’s right, title, and interest in and to the following:

- (a) its Copyrights, Trademarks and Patents;
- (b) any and all trade secrets and trade secret rights, including, without limitation, any rights to unpatented inventions, know-how and operating manuals;
- (c) any and all source code;
- (d) any and all design rights which may be available to such Person;
- (e) any and all claims for damages by way of past, present and future infringement of any of the foregoing, with the right, but not the obligation, to sue for and collect such damages for said use or infringement of the Intellectual Property rights identified above; and
- (f) all amendments, renewals and extensions of any of the Copyrights, Trademarks or Patents.

“Interest Only Extension Event” means Borrower has provided Agent and the Lenders with evidence, satisfactory to Agent and each Lender in Agent’s and each Lender’s sole and absolute discretion, on or prior to March 31, 2020, that ALX Ireland has received, after the Effective Date, but on or prior to March 31, 2020, unrestricted and unencumbered net cash proceeds in an amount of at least Forty Million Dollars (\$40,000,000.00) from either (a) the issuance and sale by ALX Ireland of its equity securities to investors or (b) a partnership, joint-venture or strategic alliance.

“Inventory” is all **“inventory”** as defined in the Code in effect on the date hereof with such additions to such term as may hereafter be made, and includes without limitation all merchandise, raw materials, parts, supplies, packing and shipping materials, work in process and finished products, including without limitation such inventory as is temporarily out of Borrower’s custody or possession or in transit and including any returned goods and any documents of title representing any of the above.

“Investment” is any beneficial ownership interest in any Person (including stock, partnership interest or other securities), and any loan, advance or capital contribution to any Person.

“Key Person” is Borrower’s Director, who is Jaume Pons as of the Effective Date.

“Lender” and **“Lenders”** is defined in the preamble.

“Lender Entities” is defined in Section 13.9.

“Lender Intercreditor Agreement” is, collectively, any and all intercreditor agreement, master arrangement agreement or similar agreement by and between WestRiver and SVB, as each may be amended from time to time in accordance with the provisions thereof.

“Lenders’ Expenses” are all of Agent’s and the Lenders’ audit fees and expenses, costs, and expenses (including reasonable attorneys’ fees and expenses) for preparing, amending, negotiating, administering, defending and enforcing the Loan Documents (including, without limitation, those incurred in connection with appeals or Insolvency Proceedings) or otherwise incurred with respect to Borrower or any Guarantor.

“Letter of Credit” is a standby or commercial letter of credit issued by SVB upon request of Borrower based upon an application, guarantee, indemnity, or similar agreement.

“License Agreement” means that certain Agreement dated as of May 25, 2016 by and between Alexo and ALX U.S, as such may be amended, modified, restated, replaced or supplemented and in effect from time to time.

“Lien” is a claim, mortgage, deed of trust, levy, charge, pledge, security interest or other encumbrance of any kind, whether voluntarily incurred or arising by operation of law or otherwise against any property.

“Loan Documents” are, collectively, this Agreement and any schedules, exhibits, certificates, notices, and any other documents related to this Agreement, the Perfection Certificate, the Lender Intercreditor Agreement, each Disbursement Letter, the Debenture, the Guaranty, the Warrant, the Collateral Assignment of License Agreement, any Bank Services Agreement, any Control Agreement, any subordination agreement, any note, or notes or guaranties executed by Borrower or any Guarantor, and any other present or future agreement by Borrower and/or any Guarantor with or for the benefit of Agent and the Lenders in connection with this Agreement or Bank Services, all as amended, restated, or otherwise modified.

“Material Adverse Change” is (a) a material impairment in the perfection or priority of Agent’s, for the ratable benefit of the Lenders, Lien in the Collateral or in the value of such Collateral; (b) a material adverse change in the business, operations, financial condition of Borrower or ALX Ireland; or (c) a material impairment of the prospect of repayment of any portion of the Obligations.

“Monthly Financial Statements” is defined in Section 6.2(a).

“Obligations” are Borrower’s obligations to pay when due any debts, principal, interest, fees, Lenders’ Expenses, the Final Payment, the Prepayment Premium and other amounts Borrower owes Agent or any Lender now or later, whether under this Agreement, the other Loan Documents (other than the Warrant), or otherwise, including, without limitation, all obligations relating to Bank Services, if any, and including any interest accruing after Insolvency Proceedings begin and debts, liabilities, or obligations of Borrower assigned to Agent and/or the Lenders, and to perform Borrower’s duties under the Loan Documents (other than the Warrant).

“Operating Documents” are, for any Person, such Person’s formation documents, as certified by the Secretary of State (or equivalent agency to the extent applicable) of such Person’s jurisdiction of organization on a date that is no earlier than thirty (30) days prior to the Effective Date, and, (a) if such Person is a corporation or exempted company, its bylaws/constitution in current form, certificate of incorporation, memorandum and articles of association, (b) if such Person is a limited liability company, its limited liability company agreement (or similar agreement), and (c) if such Person is a partnership, its partnership agreement (or similar agreement), each of the foregoing with all current amendments or modifications thereto.

“Patents” means all patents, patent applications and like protections including without limitation improvements, divisions, continuations, renewals, reissues, extensions and continuations-in-part of the same.

“Payment/Advance Form” is that certain form attached hereto as Exhibit C.

“Payment Date” is the first (1st) calendar day of each month.

“Perfection Certificate” is defined in Section 5.1.

“Permitted Indebtedness” is:

- (a) Borrower’s Indebtedness to Agent and the Lenders under this Agreement and the other Loan Documents;
- (b) Indebtedness existing on the Effective Date which is shown on the Perfection Certificate;
- (c) Subordinated Debt;
- (d) unsecured Indebtedness to trade creditors incurred in the ordinary course of business;
- (e) Indebtedness incurred as a result of endorsing negotiable instruments received in the ordinary course of business;
- (f) Indebtedness secured by Liens permitted under clauses (a) and (c) of the definition of “Permitted Liens” hereunder;
- (g) unsecured intercompany Indebtedness with respect to cost-plus or transfer pricing arrangement for the purchase of products or services in the ordinary course of business pursuant to the terms of the R&D Agreement;
- (h) other unsecured Indebtedness not otherwise permitted by Section 7.4 not exceeding One Hundred Thousand Dollars (\$100,000.00) in the aggregate outstanding at any time; and
- (i) extensions, refinancings, modifications, amendments and restatements of any items of Permitted Indebtedness (a) through (h) above, provided that the principal amount thereof is not increased or the terms thereof are not modified to impose more burdensome terms upon Borrower or its Subsidiary, as the case may be.

“Permitted Investments” are:

- (a) Investments (including, without limitation, Subsidiaries) existing on the Effective Date which are shown on the Perfection Certificate;
- (b) Investments consisting of Cash Equivalents;
- (c) Investments by Borrower in ALX U.S. in amounts necessary to fund the ordinary, necessary and current operating expenses of ALX U.S. pursuant to the terms of the R&D Agreement, including amounts necessary to fund clinical trial programs being run through ALX U.S., for the three (3) month period following the date on which such Investment is made (taking into account their revenue from other sources), so long

as (i) an Event of Default does not exist at the time of any such Investment and would not exist after giving effect to any such Investment and (ii) the maximum cash balance maintained with ALX U.S. shall not exceed the Threshold Amount at any time;

(d) Investments consisting of the endorsement of negotiable instruments for deposit or collection or similar transactions in the ordinary course of Borrower's business;

(e) Investments consisting of (i) travel advances and employee relocation loans and other employee loans and advances in the ordinary course of business, and (ii) loans to employees, officers or directors relating to the purchase of equity securities of Borrower or its Subsidiaries pursuant to employee stock purchase plans or agreements approved by the Board;

(f) Investments (including debt obligations) received in connection with the bankruptcy or reorganization of customers or suppliers and in settlement of delinquent obligations of, and other disputes with, customers or suppliers arising in the ordinary course of Borrower's business;

(g) Investments consisting of notes receivable of, or prepaid royalties and other credit extensions, to customers and suppliers who are not Affiliates, in the ordinary course of business; provided that this paragraph (g) shall not apply to Investments of Borrower in any Subsidiary;

(h) Investments by any Borrower in any other Borrower or by any Subsidiary in any Borrower; and

(i) other Investments not otherwise permitted by Section 7.7 not exceed One Hundred Thousand Dollars in the aggregate outstanding at any time.

"Permitted Liens" are:

(a) Liens existing on the Effective Date which are shown on the Perfection Certificate or arising under this Agreement and the other Loan Documents;

(b) Liens for taxes, fees, assessments or other government charges or levies, either (i) not due and payable or (ii) being contested in good faith and for which Borrower maintains adequate reserves on its Books, provided that no notice of any such Lien has been filed or recorded under the Internal Revenue Code of 1986, as amended, and the Treasury Regulations adopted thereunder;

(c) purchase money Liens or capital leases (i) on Equipment acquired or held by Borrower incurred for financing the acquisition of the Equipment securing no more than Two Hundred Fifty Thousand Dollars (\$250,000.00) in the aggregate amount outstanding, or (ii) existing on Equipment when acquired, if the Lien is confined to the property and improvements and the proceeds of the Equipment;

(d) Liens incurred in the extension, renewal or refinancing of the indebtedness secured by Liens described in (a) through (c), but any extension, renewal or replacement Lien must be limited to the property encumbered by the existing Lien and the principal amount of the indebtedness may not increase;

(e) Liens of carriers, warehousemen, suppliers, or other Persons that are possessory in nature arising in the ordinary course of business so long as such Liens attach only to Inventory, securing liabilities in the aggregate amount not to exceed Fifty Thousand Dollars (\$50,000.00) and which are not delinquent or remain payable without penalty or which are being contested in good faith and by appropriate proceedings which proceedings have the effect of preventing the forfeiture or sale of the property subject thereto;

(f) Liens to secure payment of workers' compensation, employment insurance, old-age pensions, social security and other like obligations incurred in the ordinary course of business (other than Liens imposed by ERISA);

(g) leases or subleases of real property granted in the ordinary course of Borrower's business (or, if referring to another Person, in the ordinary course of such Person's business), and leases, subleases, non-exclusive licenses or sublicenses of personal property (other than Intellectual Property) granted in the ordinary course of Borrower's business (or, if referring to another Person, in the ordinary course of such Person's business), if the leases, subleases, licenses and sublicenses do not prohibit granting Agent, for the ratable benefit of the Lenders, a security interest therein;

(h) non-exclusive license of Intellectual Property granted to third parties in the ordinary course of business, and licenses of Intellectual Property that could not result in a legal transfer of title of the licensed property that may be exclusive in respects other than territory and that may be exclusive as to territory only as to discreet geographical areas outside of the United States;

(i) Liens arising from attachments or judgments, orders, or decrees in circumstances not constituting an Event of Default under Sections 8.4 and 8.7;

(j) Liens in favor of other financial institutions arising in connection with Borrower's deposit and/or securities accounts held at such institutions, provided that (i) Agent and the Lenders have a first priority perfected security interest in the amounts held in such deposit and/or securities accounts to the extent required by Section 6.6 of this Agreement and (ii) such accounts are permitted to be maintained pursuant to Section 6.6 of this Agreement; and

(k) deposits to secure the performance of bids, trade contracts, leases, statutory obligations, surety and appeal bonds, performance bonds and other obligations of a like nature, in each case in the ordinary course of business.

"Person" is any individual, sole proprietorship, partnership, exempted company, exempted limited partnership, limited liability company, joint venture, company, trust, unincorporated organization, association, corporation, institution, public benefit corporation, firm, joint stock company, estate, entity or government agency.

"Prepayment Premium" shall be an additional fee, payable to Agent, for the ratable benefit of the Lenders based on their Pro Rata Share, with respect to the Term Loan Advances, in an amount equal to:

(a) for a prepayment of the Term Loan Advances made on or prior to the first (1st) anniversary of the Effective Date, three percent (3.0%) of the then outstanding principal amount of the Term Loan Advances immediately prior to the date of such prepayment;

(b) for a prepayment of the Term Loan Advances made after the first (1st) anniversary of the Effective Date, but on or prior to the second (2nd) anniversary of the Effective Date, two percent (2.0%) of the then outstanding principal amount of the Term Loan Advances immediately prior to the date of such prepayment; and

(c) for a prepayment of the Term Loan Advances made after the second (2nd) anniversary of the Effective Date, but prior to the Term Loan Maturity Date, one percent (1.0%) of the then outstanding principal amount of the Term Loan Advances immediately prior to the date of such prepayment.

"Prime Rate" is the rate of interest per annum from time to time published in the money rates section of The Wall Street Journal or any successor publication thereto as the "prime rate" then in effect; provided that, in the event such rate of interest is less than zero, such rate shall be deemed to be zero for purposes of this Agreement; and provided further that if such rate of interest, as set forth from time to time in the money rates section of The Wall Street Journal, becomes unavailable for any reason as determined by Agent, the "Prime Rate" shall mean the rate of interest per annum announced by SVB as its prime rate in effect at its principal office in the State of California (such SVB announced Prime Rate not being intended to be the lowest rate of interest charged by SVB in connection with extensions of credit to debtors); provided that, in the event such rate of interest is less than zero, such rate shall be deemed to be zero for purposes of this Agreement.

"Pro Rata Share" is, as of any date of determination, with respect to each Lender, a percentage (expressed as a decimal, rounded to the ninth decimal place) determined by *dividing* the outstanding principal amount of Term Loan Advances held by such Lender *by* the aggregate outstanding principal amount of all Term Loan Advances.

"R&D Agreement" means that certain Amended and Restated Research and Development Services Agreement by and between Alexo and ALX U.S. dated as of May 8, 2015, as amended by that certain Amendment No. 1 to Amended and Restated Research and Development Services Agreement by and between Alexo and ALX U.S. dated as of May 25, 2016, and as further amended by that certain Amendment No. 2 to Amended and Restated Research and Development Services Agreement by and between Alexo and ALX U.S. dated as of January 1, 2016.

"Registered Organization" is any "registered organization" as defined in the Code with such additions to such term as may hereafter be made.

“Register of Mortgages and Charges” means the register of mortgages and charges of any Borrower formed or incorporated in the Cayman Islands maintained by such Borrower in accordance with section 54 of the Companies Law of the Cayman Islands.

“Removal Effective Date” is defined in Section 10.10(d).

“Representative” is defined in Section 13.9.

“Requirement of Law” is as to any Person, the organizational or governing documents of such Person, and any law (statutory or common), treaty, rule or regulation or determination of an arbitrator or a court or other Governmental Authority, in each case applicable to or binding upon such Person or any of its property or to which such Person or any of its property is subject.

“Responsible Officer” is any director or any of the Chief Executive Officer, President and Chief Financial Officer of Borrower.

“Restricted License” is any material license or other material agreement with respect to which Borrower is the licensee (a) that prohibits Borrower from granting a security interest in Borrower’s interest in such license or agreement or any other property, or (b) for which a default under or termination of could reasonably be expected to interfere with the Agent’s right to sell any Collateral.

“SEC” shall mean the Securities and Exchange Commission, any successor thereto, and any analogous Governmental Authority.

“Securities Account” is any **“securities account”** as defined in the Code with such additions to such term as may hereafter be made.

“Subordinated Debt” is indebtedness incurred by Borrower subordinated to all of Borrower’s now or hereafter indebtedness to Agent and the Lenders (pursuant to a subordination, intercreditor, or other similar agreement in form and substance satisfactory to Agent and the Lenders entered into between Agent, the Lenders and the other creditor), on terms acceptable to Agent and the Lenders.

“Subsidiary” is, as to any Person, a corporation, partnership, exempted company, exempted limited partnership, limited liability company or other entity of which shares of stock or other ownership interests having ordinary voting power (other than stock or such other ownership interests having such power only by reason of the happening of a contingency) to elect a majority of the board of directors or other managers of such corporation, partnership or other entity are at the time owned, or the management of which is otherwise controlled, directly or indirectly through one or more intermediaries, or both, by such Person. Unless the context otherwise requires, each reference to a Subsidiary herein shall be a reference to a Subsidiary of Borrower or ALX Ireland.

“SVB” is defined in the preamble hereof.

“Term A Loan Advance” is defined in Section 2.2(a).

“Term B Loan Advance” is defined in Section 2.2(a).

“Term Loan Advance” and **“Term Loan Advances”** are each defined in Section 2.2(a).

“Term Loan Amortization Date” is April 1, 2020 (which shall be extended until January 1, 2021 upon the occurrence of the Interest Only Extension Event).

“Term Loan Commitment” means, for any Lender, the obligation of such Lender to make a Term Loan Advance as and when available, up to the principal amount shown on Schedule 1. **“Term Loan Commitments”** means the aggregate amount of such commitments of all Lenders.

“Term Loan Commitment Percentage” means, as to any Lender at any time, the percentage (carried out to the fourth decimal place) of the Term Loan Commitments represented by such Lender’s Term Loan Commitment at such time. The initial Term Loan Commitment Percentage of each Lender is set forth opposite the name of such Lender on Schedule 1.

“Term Loan Maturity Date” is December 1, 2021 (which shall be extended until September 1, 2022 upon the occurrence of the Interest Only Extension Event).

“Term Sheet” is defined in the definition of Term Sheet Event.

“Term Sheet Event” means confirmation by Agent, on or prior to March 31, 2020, that Borrower has delivered to Agent, a signed, binding, and unconditional term sheet (**“Term Sheet”**) from one or more parties, satisfactory to Agent and each Lender, in Agent’s and each Lender’s sole but reasonable discretion, in favor of, and accepted by Borrower or ALX Ireland, evidencing such party’s or parties’ commitment to either (i) purchase equity securities of Borrower or ALX Ireland or enter into a partnership, joint venture, or strategic alliance (on terms satisfactory to Agent and each Lender in Agent’s and each Lender’s sole but reasonable discretion), which would result in the receipt by Borrower or ALX Ireland of unrestricted and unencumbered net cash proceeds in an amount of at least Thirty Million Dollars (\$30,000,000.00) or (ii) merge or consolidate with another Person, which merger or consolidation agreement shall provide for an up-front cash payment to Borrower or ALX Ireland in an amount of at least One Hundred Million Dollars (\$100,000,000.00); provided that, in the case of either (i) or (ii) herein, such proposed transaction is consummated and Borrower or ALX Ireland has received such funds after the Effective Date, but no later than ninety (90) days after the execution of such Term Sheet.

“Threshold Amount” means a maximum aggregate amount of up Three Million Dollars (\$3,000,000.00); which shall be increased to Five Million Dollars (\$5,000,000.00) in the aggregate, upon the occurrence of the Equity Event.

“Trademarks” means any trademark and servicemark rights, whether registered or not, applications to register and registrations of the same and like protections, and the entire goodwill of the business of Borrower connected with and symbolized by such trademarks.

“Transfer” is defined in Section 7.1.

“Warrant” means, collectively, (a) that certain warrant instrument and warrant certificate to purchase stock dated as of the Effective Date between ALX Ireland and SVB and (b) that certain warrant instrument and warrant certificate to purchase stock dated as of the Effective Date between ALX Ireland and WestRiver, in each case, as may be amended, modified, supplemented and/or restated from time to time.

“WestRiver” is defined in the preamble hereof.

[Signature Page Follows.]

IN WITNESS WHEREOF, the parties hereto have caused this Agreement to be executed as of the Effective Date.

BORROWER:

EXECUTED AS A DEED BY:
ALEXO THERAPEUTICS INTERNATIONAL

By /s/ Jaume Pons
Name: Jaume Pons
Title: Director

In the presence of: /s/ Melissa Aquino
Name: /s/ Melissa Aquino

EXECUTED AS A DEED BY:
SIRPANT THERAPEUTICS

By /s/ Jaume Pons
Name: Jaume Pons
Title: Director

In the presence of: /s/ Melissa Aquino
Name: /s/ Melissa Aquino

AGENT:

SILICON VALLEY BANK, as Agent

By /s/ Peter Sletteland
Name: Peter Sletteland
Title: Vice President

LENDERS:

SILICON VALLEY BANK

By /s/ Peter Sletteland
Name: Peter Sletteland
Title: Vice President

WESTRIVER INNOVATION LENDING FUND VIII, L.P.

By /s/ Trent Dawson
Name: Trent Dawson
Title: CFO

[Signature Page to Loan and Security Agreement]

SCHEDULE 1
LENDERS AND COMMITMENTS
TERM LOAN COMMITMENTS

| <u>Lender</u> | <u>Term Loan Commitment</u> | <u>Term Loan Commitment Percentage</u> |
|--|-----------------------------|--|
| Silicon Valley Bank | \$ 5,000,000.00 | 50.0% |
| WestRiver Innovation Lending Fund VIII, L.P. | \$ 5,000,000.00 | 50.0% |
| TOTAL | \$ 10,000,000.00 | 100.0000% |

EXHIBIT A - COLLATERAL DESCRIPTION

The Collateral consists of all of Borrower's right, title and interest in and to the following personal property:

All goods, Accounts (including health-care receivables), Equipment, Inventory, contract rights or rights to payment of money, leases, license agreements (including, without limitation, the License Agreement), franchise agreements, General Intangibles (except as provided below), commercial tort claims, documents, instruments (including any promissory notes), chattel paper (whether tangible or electronic), cash, deposit accounts, certificates of deposit, fixtures, letters of credit rights (whether or not the letter of credit is evidenced by a writing), securities, and all other investment property, supporting obligations, and financial assets, whether now owned or hereafter acquired, wherever located; and

all Borrower's Books relating to the foregoing, and any and all claims, rights and interests in any of the above and all substitutions for, additions, attachments, accessories, accessions and improvements to and replacements, products, proceeds and insurance proceeds of any or all of the foregoing.

Notwithstanding the foregoing, the Collateral does not include (a) rights held under a license that are not assignable by their terms without the consent of the licensor thereof (but only to the extent such restriction on assignment is enforceable under applicable law); (b) any interest of Borrower as a lessee or sublessee under a real property lease; (c) any interest of Borrower as a lessee under an Equipment lease if Borrower is prohibited by the terms of such lease from granting a security interest in such lease or under which such an assignment or Lien would cause a default to occur under such lease; *provided, however*, that upon termination of such prohibition, such interest shall immediately become Collateral without any action by Borrower or Agent; (d) Equipment that is subject to a Lien that is otherwise permitted pursuant to subsection (c) of the definition of "Permitted Liens" if the holder of such Lien has expressly prohibited Borrower in writing from granting Liens on such property in favor of third parties; provided that immediately upon the ineffectiveness, lapse, or termination of any such provision, the term "Collateral" shall include, and Borrower shall be deemed to have granted a security interest in, all of its rights, title and interests in and to such property as if such provision had never been in effect; or (e) any Intellectual Property; provided, however, the Collateral shall include all Accounts and all proceeds of Intellectual Property. If a judicial authority (including a U.S. Bankruptcy Court) would hold that a security interest in the underlying Intellectual Property is necessary to have a security interest in such Accounts and such property that are proceeds of Intellectual Property, then the Collateral shall automatically, and effective as of the Effective Date, include the Intellectual Property to the extent necessary to permit perfection of Agent's, for the ratable benefit of the Lenders, security interest in such Accounts and such other property of Borrower that are proceeds of the Intellectual Property.

Pursuant to the terms of a certain negative pledge arrangement with Agent and the Lenders, Borrower has agreed not to encumber any of its Intellectual Property without Agent's and the Lenders' prior written consent.

EXHIBIT B
COMPLIANCE CERTIFICATE

TO: SILICON VALLEY BANK, as Agent, SVB, and WESTRIVER
FROM: ALEXO THERAPEUTICS INTERNATIONAL (“Alexo”)

Date:

SIRPANT THERAPEUTICS (“Sirpant”)

The undersigned authorized officer of Alexo and Sirpant (individually and collectively, “**Borrower**”) certifies that under the terms and conditions of the Loan and Security Agreement among Borrower, SVB, and WestRiver (as amended, the “**Loan Agreement**”):

(1) Borrower is in complete compliance for the period ending _____ with all required covenants except as noted below, (2) there are no Events of Default, (3) all representations and warranties in the Agreement are true and correct in all material respects on this date except as noted below; provided, however, that such materiality qualifier shall not be applicable to any representations and warranties that already are qualified or modified by materiality in the text thereof; and provided, further that those representations and warranties expressly referring to a specific date shall be true and correct in all material respects as of such date, (4) Borrower, and each of its Subsidiaries, has timely filed all required tax returns and reports, and Borrower has timely paid all foreign, federal, state and local taxes, assessments, deposits and contributions owed by Borrower except as otherwise permitted pursuant to the terms of Section 5.8 of the Agreement, and (5) no Liens have been levied or claims made against Borrower or any of its Subsidiaries relating to unpaid employee payroll or benefits of which Borrower has not previously provided written notification to Agent.

Attached are the required documents supporting the certification. The undersigned certifies that these are prepared in accordance with GAAP consistently applied from one period to the next except as explained in an accompanying letter or footnotes. The undersigned acknowledges that no borrowings may be requested at any time or date of determination that Borrower is not in compliance with any of the terms of the Agreement, and that compliance is determined not just at the date this certificate is delivered. Capitalized terms used but not otherwise defined herein shall have the meanings given them in the Agreement.

Please indicate compliance status by circling Yes/No under “Complies” column.

| <u>Reporting Covenants</u> | <u>Required</u> | <u>Complies</u> | |
|--|--|-----------------|----|
| Monthly Financial Statements with Compliance Certificate | Monthly within 30 days | Yes | No |
| Annual financial statement (CPA Audited) | By October 31; if the Board determines in its reasonable discretion not to require an audit for any fiscal year of Borrower, then 30 days after such FYE | Yes | No |
| 10-Q, 10-K and 8-K | Within 5 days after filing with SEC | Yes | No |
| Board-Approved Projections | Within the earlier to occur of (a) 60 days after FYE and (b) 10 days after Board approval, and contemporaneously with changes | Yes | No |

Cash maintained at ALX U.S. \$ _____ as of _____

Other Matters

Have there been any amendments of or other changes to the capitalization table of Borrower and to the Operating Documents of Borrower or any of its Subsidiaries? If yes, provide copies of any such amendments or changes with this Compliance Certificate. Yes No

The following are the exceptions with respect to the certification above: (If no exceptions exist, state "No exceptions to note.")

ALEXO THERAPEUTICS INTERNATIONAL

By _____

Name: _____

Title: _____

SIRPANT THERAPEUTICS

By _____

Name: _____

Title: _____

ALX ONCOLOGY LIMITED

By _____

Name: _____

Title: _____

AGENT USE ONLY

Received by: _____
AUTHORIZED SIGNER

Date: _____

Verified: _____
AUTHORIZED SIGNER

Date: _____

Compliance Status: Yes No

EXHIBIT C

LOAN PAYMENT/ADVANCE REQUEST FORM

DEADLINE FOR SAME DAY PROCESSING IS NOON PACIFIC TIME

Fax To:

Date: _____

LOAN PAYMENT: ALEXO THERAPEUTICS INTERNATIONAL AND SIRPANT THERAPEUTICS

From Account # _____ To Account # _____
(Deposit Account #) (Loan Account #)

Principal \$ _____ and/or Interest \$ _____

Authorized Signature: _____ Phone Number: _____
Print Name/Title: _____

LOAN ADVANCE:

Complete Outgoing Wire Request section below if all or a portion of the funds from this loan advance are for an outgoing wire.

From Account # _____ To Account # _____
(Loan Account #) (Deposit Account #)

Amount of Term Loan Advance \$ _____

All Borrower's representations and warranties in the Loan and Security Agreement are true, correct and complete on the date of the request for an advance

Authorized Signature: _____ Phone Number: _____
Print Name/Title: _____

OUTGOING WIRE REQUEST:

Complete only if all or a portion of funds from the loan advance above is to be wired.

Deadline for same day processing is noon, Pacific Time

Beneficiary Name: _____ Amount of Wire: \$ _____
Beneficiary Bank: _____ Account Number: _____
City and State: _____

Beneficiary Bank Transit (ABA) #: _____ Beneficiary Bank Code (Swift, Sort, Chip, etc.): _____
(For International Wire Only)

Intermediary Bank: _____ Transit (ABA) #: _____

For Further Credit to: _____

Special Instruction: _____

By signing below, I (we) acknowledge and agree that my (our) funds transfer request shall be processed in accordance with and subject to the terms and conditions set forth in the agreements(s) covering funds transfer service(s), which agreements(s) were previously received and executed by me (us).

Authorized Signature: _____ 2nd Signature (if required): _____
Print Name/Title: _____ Print Name/Title: _____
Telephone #: _____ Telephone #: _____

EXHIBIT D

DISBURSEMENT LETTER

[DATE]

The undersigned, being the duly elected and acting _____ of (i) **ALEXO THERAPEUTICS INTERNATIONAL**, an exempted company incorporated under the laws of the Cayman Islands ("**Alexo**"), and (ii) **SIRPANT THERAPEUTICS**, an exempted company incorporated under the laws of the Cayman Islands ("**Sirpant**"; together with Alexo, individually and collectively, jointly and severally, the "**Borrower**"), does hereby certify to (a) **SILICON VALLEY BANK**, a California corporation ("**SVB**"), in its capacity as administrative agent and collateral agent ("**Agent**"), (b) **SILICON VALLEY BANK**, a California corporation, as a lender, (c) **WESTRIVER INNOVATION LENDING FUND VIII, L.P.**, a Delaware limited partnership ("**WestRiver**"), as a lender (SVB and WestRiver and each of the other "Lenders" from time to time a party hereto are referred to herein collectively as the "**Lenders**" and each individually as a "**Lender**") in connection with that certain Loan and Security Agreement dated as of [_____], by and among Borrower, Agent and the Lenders from time to time party thereto (the "**Loan Agreement**"; with other capitalized terms used below having the meanings ascribed thereto in the Loan Agreement) that:

1. The representations and warranties made by Borrower in Section 5 of the Loan Agreement and in the other Loan Documents are true and correct in all material respects as of the date hereof.
2. No event or condition has occurred that would constitute an Event of Default under the Loan Agreement or any other Loan Document.
3. Borrower is in compliance with the covenants and requirements contained in Sections 4, 6 and 7 of the Loan Agreement.
4. All conditions referred to in Section 3 of the Loan Agreement to the making of a Credit Extension to be made on or about the date hereof have been satisfied or waived by Agent.
5. No Material Adverse Change has occurred.
6. The undersigned is an Authorized Signer.

[Balance of Page Intentionally Left Blank]

7A. The proceeds of the Term Loan Advance shall be disbursed as follows:

| | |
|---|-----------|
| Disbursement from SVB: | |
| Loan Amount | \$ |
| Plus: | |
| —Deposit Received | \$ |
| Less: | |
| —[Interim Interest] | (\$) |
| —Lender’s Legal Fees | (\$)* |
| Net Proceeds due from SVB: | \$ |
| Disbursement from WestRiver: | |
| Loan Amount | \$ |
| Plus: | |
| —Deposit Received | \$ |
| Less: | |
| —[Interim Interest] | (\$) |
| Net Proceeds due from WestRiver: | \$ |
| Disbursement from Agent (cumulative and not duplicative of the amounts set forth above): | |
| Loan Amount | |
| Plus: | \$ |
| —Deposit Received | \$ |
| Less: | |
| —[Interim Interest] | (\$) |
| —Lender’s Legal Fees | (\$)* |
| Net Proceeds due from Agent: | \$ |
| TOTAL TERM LOAN ADVANCE NET PROCEEDS FROM LENDERS | \$ |

7B. Funds from [] (“**Borrower**”) Designated Deposit Account shall be disbursed as follows:

SVB:

* Legal fees and costs are through the Effective Date. Post-closing legal fees and costs, payable after the Effective Date, to be invoiced and paid post-closing.

| | |
|---------------------|----|
| Term Loan Fees | \$ |
| Lender's Legal Fees | \$ |

WestRiver: Designated Deposit Account:

| | |
|--|----|
| Term Loan Fees | \$ |
| Total Funds due from [] ("Borrower") | \$ |

8A. The aggregate net proceeds of the Term Loan Advance shall be transferred to the Designated Deposit Account as follows:

Account Name: _____
 Bank Name: Silicon Valley Bank
 Bank Address: 3003 Tasman Drive
 Santa Clara, California 95054
 Account Number: _____
 ABA Number: _____

8B. Borrower authorized SVB to debit the Total Funds from the Designated Deposit Account set forth below:

Account Name: _____
 Bank Name: Silicon Valley Bank
 Bank Address: 3003 Tasman Drive
 Santa Clara, California 95054
 Account Number: _____
 ABA Number: _____

[Balance of Page Intentionally Left Blank]

Dated as of the date first set forth above.

BORROWER:

ALEXO THERAPEUTICS INTERNATIONAL

By _____

Name: _____

Title: _____

SIRPANT THERAPEUTICS

By _____

Name: _____

Title: _____

LENDER:

SILICON VALLEY BANK

By _____

Name: _____

Title: _____

LENDER:

WESTRIVER INNOVATION LENDING FUND VIII, L.P.

By _____

Name: _____

Title: _____

**JOINDER AND FIRST AMENDMENT
TO
LOAN AND SECURITY AGREEMENT**

This Joinder and First Amendment to Loan and Security Agreement (this "**Amendment**") is entered into this 21st day of May, 2020, by and among (a) **SILICON VALLEY BANK**, a California corporation ("**SVB**"), in its capacity as administrative agent and collateral agent ("**Agent**"), (b) **SILICON VALLEY BANK**, a California corporation, as a lender, (c) **WESTRIVER INNOVATION LENDING FUND VIII, L.P.**, a Delaware limited partnership ("**WestRiver**"), as a lender (SVB and WestRiver and each of the other "Lenders" from time to time a party hereto are referred to herein collectively as the "**Lenders**" and each individually as a "**Lender**"), (d) (i) **ALEXO THERAPEUTICS INTERNATIONAL**, an exempted company incorporated under the laws of the Cayman Islands ("**Alexo**"), and (ii) **SIRPANT THERAPEUTICS**, an exempted company incorporated under the laws of the Cayman Islands ("**Sirpant**"; together with Alexo, individually and collectively, jointly and severally, the "**Existing Borrower**"), and (e) **ALX ONCOLOGY HOLDINGS INC.**, a Delaware corporation, whose address is 866 Malcolm Road, Suite 100, Burlingame, CA 94010 ("**New Borrower**"; and together with Existing Borrower, jointly and severally, individually and collectively, the "**Borrower**").

RECITALS

- A.** Existing Borrower, Agent and the Lenders have entered into that certain Loan and Security Agreement dated as of December 20, 2019 (as the same may from time to time be amended, modified, supplemented or restated, the "**Loan Agreement**").
- B.** The Lenders have extended credit to Existing Borrower for the purposes permitted in the Loan Agreement.
- C.** Existing Borrower has requested that Agent and the Lenders amend the Loan Agreement to (i) add New Borrower to the Loan Agreement, and (ii) make certain other revisions to the Loan Agreement as more fully set forth herein.
- D.** Agent and the Lenders have agreed to so amend certain provisions of the Loan Agreement, but only to the extent, in accordance with the terms, subject to the conditions and in reliance upon the representations and warranties set forth below.

AGREEMENT

NOW, THEREFORE, in consideration of the foregoing recitals and other good and valuable consideration, the receipt and adequacy of which is hereby acknowledged, and intending to be legally bound, the parties hereto agree as follows:

- 1. Definitions.** Capitalized terms used but not defined in this Amendment shall have the meanings given to them in the Loan Agreement.
- 2. Joinder to Loan Agreement.** The undersigned, New Borrower, hereby joins the Loan Agreement and each of the Loan Agreement and Loan Documents, as if it were originally named a "Borrower" therein. Without limiting the generality of the preceding sentence, New

Borrower agrees that it will be jointly and severally liable, together with Existing Borrower, for the payment and performance of all obligations and liabilities of Borrower under the Loan Agreement, including, without limitation, the Obligations. Each Borrower hereby appoints the other as agent for the other for all purposes hereunder. Each Borrower hereunder shall be obligated to repay all Credit Extensions made pursuant to the Loan Agreement, regardless of which Borrower actually receives said Credit Extension, as if each Borrower hereunder directly received all Credit Extensions.

3. Subrogation and Similar Rights. Each Borrower waives any suretyship defenses available to it under the Code or any other applicable law. Each Borrower waives any right to require Agent or the Lenders to: (i) proceed against either Borrower or any other person; (ii) proceed against or exhaust any security; or (iii) pursue any other remedy. Agent and the Lenders may exercise or not exercise any right or remedy it has against either Borrower or any security it holds (including the right to foreclose by judicial or non-judicial sale) without affecting any Borrower's liability. Notwithstanding any other provision of this Amendment, the Loan Agreement or other Loan Documents, each Borrower agrees not to exercise any rights that it may have at law or in equity (including, without limitation, any law subrogating Borrower to the rights of Agent and the Lenders under the Loan Agreement) to seek contribution, indemnification or any other form of reimbursement from the other Borrower, or any other Person now or hereafter primarily or secondarily liable for any of the Obligations, for any payment made by Borrower with respect to the Obligations in connection with the Loan Agreement or otherwise and all rights that it might have to benefit from, or to participate in, any security for the Obligations as a result of any payment made by either Borrower with respect to the Obligations in connection with the Loan Agreement or otherwise until the Obligations (other than inchoate indemnity obligations) have been paid and performed in full. Any agreement providing for indemnification, reimbursement or any other arrangement prohibited under this Section shall be null and void. If any payment is made to a Borrower in contravention of this Section, such Borrower shall hold such payment in trust for Agent and such payment shall be promptly delivered to Agent for application to the Obligations, whether matured or unmatured

4. Grant of Security Interest. To secure the prompt payment and performance of all the Obligations, New Borrower hereby grants to Agent, for the ratable benefit of the Lenders, a continuing lien upon and security interest in all of New Borrower's now existing or hereafter arising rights and interest in the Collateral, whether now owned or existing or hereafter created, acquired or arising, and wherever located, including, without limitation, all of New Borrower's assets, and all New Borrower's books relating to the foregoing and any and all claims, rights and interest in any of the above and all substitutions for, additions, attachments, accessories, accessions and improvements to and replacements, products, proceeds and insurance proceeds of any or all of the foregoing. New Borrower further covenants and agrees that by its execution hereof it shall provide all such information, complete all such forms, and take all such actions, and enter into all such agreements, in form and substance reasonably satisfactory to Agent and the Lenders that are reasonably deemed necessary by Agent and the Lenders in order to grant a valid, perfected first priority security interest to Agent, for the ratable benefit of the Lenders, in the Collateral. New Borrower hereby authorizes Agent to file financing statements, without notice to Borrower, with all appropriate jurisdictions in order to perfect or protect Agent's, for the ratable benefit of the Lenders', interest or rights hereunder, including a notice that any disposition of the Collateral, by either Borrower or any other Person, shall be deemed to violate the rights of the Agent or the

Lenders under the Code. Such financing statements may indicate the Collateral as “all assets of the Debtor” or words of similar effect, or as being of an equal or lesser scope, or with greater detail, all in Agent’s discretion.

5. Representations and Warranties. New Borrower hereby represents and warrants to Agent that all representations and warranties in the Loan Documents made on the part of Existing Borrower are true and correct on the date hereof with respect to New Borrower, with the same force and effect as if New Borrower were named as “Borrower” in the Loan Documents in addition to Existing Borrower.

6. Delivery of Documents. New Borrower hereby agrees that the following documents shall be delivered to Agent prior to or contemporaneously with delivery of this Amendment, each in form and substance satisfactory to Agent:

- A. a duly executed secretary’s corporate borrowing certificate for New Borrower, together with the duly executed signatures thereto;
- B. the Operating Documents and long-form good standing certificate of New Borrower certified by the Secretary of State of Delaware, each as of a date no earlier than thirty (30) days prior to the date hereof;
- C. duly executed signatures to the completed Borrowing Resolutions for New Borrower;
- D. certified copies, dated as of a recent date, of financing statement searches, as Agent may request, accompanied by written evidence (including any UCC termination statements) that the Liens indicated in any such financing statements either constitute Permitted Liens or have been or, in connection with the initial Credit Extension, will be terminated or released;
- E. the Perfection Certificate of New Borrower, together with the duly executed signatures thereto; and
- F. such other documents as Agent may reasonably request.

7. Amendments to Loan Agreement.

7.1 Preamble. The preamble is amended in its entirety and replaced with the following:

“ **THIS LOAN AND SECURITY AGREEMENT** (as amended, restated, modified or otherwise supplemented from time to time, this “**Agreement**”) dated as of December 20, 2019 (the “**Effective Date**”), among (a) **SILICON VALLEY BANK**, a California corporation, in its capacity as administrative agent and collateral agent (“**Agent**”), (b) **SILICON VALLEY BANK**, a California corporation, as a lender (“**SVB**”), (c) **WESTRIVER INNOVATION LENDING FUND VIII, L.P.**, a Delaware limited partnership (“**WestRiver**”), as a lender (SVB and WestRiver and each of the other “**Lenders**” from time to time a party

hereto are referred to herein collectively as the “**Lenders**” and each individually as a “**Lender**”), and (d) (i) **ALEXO THERAPEUTICS INTERNATIONAL**, an exempted company incorporated under the laws of the Cayman Islands (“**Alexo**”), (ii) **SIRPANT THERAPEUTICS**, an exempted company incorporated under the laws of the Cayman Islands (“**Sirpant**”) and (iii) **ALX ONCOLOGY HOLDINGS INC.**, a Delaware corporation (“**Parent**”; together with Sirpant and Alexo, individually and collectively, jointly and severally, the “**Borrower**”), provides the terms on which Agent and the Lenders shall lend to Borrower, and Borrower shall repay Agent and the Lenders. The parties agree as follows:”

7.2 Section 2.7 (Withholding). Section 2.7 is amended in its entirety and replaced with the following:

“ **2.7 Withholding.**

(a) Payments made by Borrower under this Agreement will be made free and clear of and without deduction for any and all present or future taxes, levies, imposts, duties, deductions, withholdings, assessments, fees or other charges imposed by any Governmental Authority (including any interest, additions to tax or penalties applicable thereto) (“**Taxes**”), except as required by applicable law. Specifically, however, if at any time any Governmental Authority, applicable law, regulation or international agreement requires Borrower to make any withholding or deduction of Taxes from any such payment or other sum payable hereunder, Borrower hereby covenants and agrees that the amount due from Borrower with respect to such payment or other sum payable hereunder will be increased to the extent necessary to ensure that, after the making of such required withholding or deduction, the applicable recipient receives a net sum equal to the sum which it would have received had no withholding or deduction been required, and Borrower shall pay the full amount withheld or deducted to the relevant Governmental Authority, provided, however, that no such additional amounts will be paid in respect of any amounts required to be withheld (x) under FATCA or (y) under U.S. backup withholding rules. Borrower will, upon request, furnish Agent with proof reasonably satisfactory to Agent indicating that Borrower has made such withholding payment; provided, however, that Borrower need not make any withholding payment if the amount or validity of such withholding payment is contested in good faith by appropriate and timely proceedings and as to which payment in full is bonded or reserved against by Borrower. The agreements and obligations of Borrower contained in this Section 2.7 shall survive the termination of this Agreement.

(b) Each U.S. Lender shall, upon becoming party to this Agreement, deliver to any U.S. Borrower a complete and properly executed IRS Form W-9.

(c) Each Non-U.S. Lender shall, upon becoming party to this Agreement, to the extent that such Non-U.S. Lender is entitled to an exemption from U.S. withholding tax on payments under this Agreement, deliver to any U.S. Borrower a complete and properly executed IRS Form W-8BEN, W-8BEN-E, W-

8ECI or W-8IMY, as appropriate, or any successor form prescribed by the IRS, establishing that such Non-U.S. Lender is entitled to such exemption from U.S. withholding tax on interest. Notwithstanding Section 2.7(a) above, a U.S. Borrower shall not be required to pay any additional amount to any Lender under Section 2.7(a) if such Lender fails or is unable to deliver the forms, certificates or other evidence described in Section 2.7(b) or the preceding sentence, as applicable. Each Lender agrees that if any form it previously delivered expires or becomes obsolete or inaccurate in any respect, it shall update such form or certification or promptly notify the U.S. Borrower in writing of its legal inability to do so.”

7.3 Section 5.4 (Financial Statements; Financial Condition). Section 5.4 is amended in its entirety and replaced with the following:

“ **5.4 Financial Statements; Financial Condition.** All consolidated and consolidating financial statements for Parent and its direct and indirect Subsidiaries delivered to Agent and the Lenders fairly present in all material respects Parent’s and its direct and indirect Subsidiaries’ consolidated financial condition and each such entity’s consolidated results of operations. There has not been any material deterioration in Parent’s and its direct and indirect Subsidiaries’ consolidated financial condition since the date of the most recent financial statements submitted to Agent and the Lenders.”

7.4 Section 6.2 (Financial Statements, Reports, Certificates). Section 6.2 is amending subsections (a), (c), (d), (e), and (f) in their entirety and replacing them with the following:

“ (a) Monthly Financial Statements. As soon as available, but no later than thirty (30) days after the last day of each month, company prepared consolidated and consolidating balance sheet and income statement covering (i) at all times prior to the month ended April 30, 2020, ALX Ireland’s and its direct and indirect Subsidiaries’ consolidated operations for such month, and (ii) commencing with the month ended April 30, 2020, Parent’s and its direct and indirect Subsidiaries’ consolidated operations for such month, in each case, certified by a Responsible Officer and in a form of presentation reasonably acceptable to Agent (the “**Monthly Financial Statements**”);”

“ (c) Board Projections. As soon as available, at least annually, and in any event no later than the earlier to occur of (i) sixty (60) days after the end of each fiscal year of Parent and (ii) ten (10) days after Board approval, and contemporaneously with any updates or changes thereto, annual Board-approved operating budget and financial projections with respect to Parent and its direct and indirect Subsidiaries, in a form of presentation reasonably acceptable to Agent;”

“ (d) Annual Audited Financial Statements. As soon as available, but no later than October 31st of each year, beginning with ALX Ireland’s fiscal year ended December 31, 2019 and for each fiscal year of Parent thereafter, audited

consolidated financial statements prepared under GAAP, consistently applied, together with an unqualified opinion (other than a qualification as to going concern typical for venture backed companies similar to Parent) on the financial statements from an independent certified public accounting firm reasonably acceptable to Agent. Notwithstanding the foregoing, if the Board determines in its reasonable discretion not to require an audit for any fiscal year of Parent, then Agent shall accept company prepared annual consolidated financial statements no later than thirty (30) days after the end of such fiscal year of Parent;"

" (e) Other Statements. Within five (5) days of delivery, copies of all statements, reports and notices made available to Parent's security holders (in their capacity as such) or to any holders of Subordinated Debt (in their capacity as such);"

" (f) SEC Filings. In the event that Parent becomes subject to the reporting requirements under the Exchange Act, within five (5) days of filing, copies of all periodic and other reports, proxy statements and other materials filed by Parent with the SEC, any Governmental Authority succeeding to any or all of the functions of the SEC or with any national securities exchange, or distributed to its shareholders, as the case may be. Documents required to be delivered pursuant to the terms hereof (to the extent any such documents are included in materials otherwise filed with the SEC) may be delivered electronically and if so delivered, shall be deemed to have been delivered on the date on which Parent posts such documents, or provides a link thereto, on Parent's website on the internet at Parent's website address; provided, however, Borrower shall promptly notify Agent and the Lenders in writing (which may be by electronic mail) of the posting of any such documents;"

7.5 Section 13.2 (Successors and Assigns). Section 13.2 is amended in its entirety and replaced with the following:

" **13.2 Successors and Assigns.**

(a) This Agreement binds and is for the benefit of the successors and permitted assigns of each party. Borrower may not assign this Agreement or any rights or obligations under it without Agent and Lenders' prior written consent (which may be granted or withheld in Agent's and Lenders' sole discretion). Agent and each Lender has the right, without the consent of or notice to Borrower, to sell, transfer, assign, negotiate, or grant participation in all or any part of, or any interest in, such Agent or Lender's obligations, rights, and benefits under this Agreement and the other Loan Documents (other than the Warrant, as to which assignment, transfer and other such actions are governed by the terms thereof).

(b) Agent, acting solely for this purpose as a non-fiduciary agent of the Borrower, shall maintain a copy of each assignment delivered to it and register for the recordation of the names and addresses of the Lenders, including the principal amount of (and stated interest on) the portion of the Term Loan Advance owing to

each Lender pursuant to the terms hereof from time to time (the “**Register**”). No assignment shall become effective unless and until such assignment is recorded in the Register pursuant to this Section 13.2. The entries in the Register shall be conclusive absent manifest error, and the Borrower, the Agent and the Lenders shall treat each Person whose name is recorded in the Register pursuant to the terms hereof as a Lender hereunder for all purposes of this Agreement. The Register shall be available for inspection by the Borrower and any Lender, at any reasonable time and from time to time upon reasonable prior notice.

(c) To the extent any Lender sells a participation, it shall, acting solely for this purpose as a non-fiduciary agent of Borrower, maintain a register on which it enters the name and address of each participant and the principal amounts (and stated interest) of each participant’s interest in the Term Loan Advance or other obligations under the Loan Documents (the “**Participant Register**”); provided that the Lenders shall not have any obligation to disclose all or any portion of the Participant Register (including the identity of any participant or any information relating to a participant’s interest in a Term Loan Advance or any commitments or other obligations under any Loan Document) to any person except to the extent that such disclosure is necessary to establish that such Term Loan Advance or any commitment or other obligation is in registered form under Section 5f.103-1(c) of the United States Treasury Regulations. The entries in the Participant Register shall be conclusive absent manifest error, and the Lenders shall treat each person whose name is recorded in the Participant Register as the owner of such participation for all purposes of this Agreement notwithstanding any notice to the contrary. For the avoidance of doubt, the Agent (in its capacity as Agent) shall have no responsibility for maintaining a Participant Register.”

7.6 Section 13.12 (Electronic Execution of Documents). Section 13.12 is amended in its entirety and replaced with the following:

“ **13.12 Electronic Execution of Documents.** The words “execution,” “signed,” “signature” and words of like import in any Loan Document shall be deemed to include electronic signatures, including any Electronic Signature as defined in the Electronic Transactions Law (2003 Revision) of the Cayman Islands (the “**Cayman Islands Electronic Signature Law**”), or the keeping of records in electronic form, including any Electronic Record, as defined in Cayman Islands Electronic Signature Law, each of which shall be of the same legal effect, validity and enforceability as a manually executed signature or the use of a paper-based recordkeeping systems, as the case may be, to the extent and as provided for in any applicable law, including, without limitation, any state law based on the Uniform Electronic Transactions Act or the Cayman Islands Electronic Signature Law; provided, however that sections 8 and 19(3) of the Cayman Islands Electronic Signature Law shall not apply to this Agreement or the execution or delivery thereof.”

7.7 Section 14.1 (Definitions). The following new terms and their respective definitions are hereby inserted to appear alphabetically in Section 14.1 of the Loan Agreement:

“ **“Cayman Islands Electronic Signature Law”** is defined in Section 13.12.”

“ **“FATCA”** means Sections 1471 through 1474 of the Internal Revenue Code as of the date of this Agreement (or any amended or successor version that is substantially comparable and not materially more onerous to comply with), any current or future regulations or official interpretations thereof, any agreements entered into pursuant to Section 1471(b)(1) of the Internal Revenue Code and any fiscal or regulatory legislation, rules, or practices adopted pursuant to any intergovernmental agreement, treaty or convention among governmental authorities and implementing such Sections of the Internal Revenue Code.”

“ **“First Amendment Effective Date”** is May 21, 2020.”

“ **“Internal Revenue Code”** means the U.S. Internal Revenue Code of 1986, as amended.”

“ **“Non-U.S. Lender”** means, in the case of a Borrower that is a U.S. Person, any Lender or Agent (including any assignee thereof under Section 13.2 of this Agreement) that is not a U.S. Person.”

“ **“Parent”** is defined in the preamble hereof.”

“ **“Participant Register”** is defined in Section 13.2(c).”

“ **“Register”** is defined in Section 13.2(c).”

“ **“Taxes”** is defined in Section 2.7(a).”

“ **“U.S. Borrower”** means any Borrower that is a U.S. Person.”

“ **“U.S. Lender”** means, in the case of a Borrower that is a U.S. Person, any Lender or Agent (including any assignee thereof under Section 13.2 of this Agreement) that is a U.S. Person.”

“ **“U.S. Person”** means any Person that is a “United States Person” as defined in Section 7701(a)(30) of the Code.”

7.8 Section 14.1 (Definitions). The following terms and their respective definitions appearing in Section 14.1 of the Loan Agreement are amended in their entirety and replaced with the following:

“ **“Board”** means Borrower’s board of directors, as applicable.”

“ **“Equity Event”** means Borrower has provided Agent and the Lenders with evidence, satisfactory to Agent and each Lender in Agent’s and each Lender’s sole and absolute discretion, that ALX Ireland has received, after the Effective Date, unrestricted and unencumbered net cash proceeds in an amount of

at least Fifty Million Dollars (\$50,000,000.00) from the issuance and sale by ALX Ireland of its equity securities to investors (which amount shall be inclusive of any funds received by ALX Ireland with respect to the Interest Only Extension Event). Agent and each Lender acknowledge and agree that the Equity Event has occurred.”

“ **“Interest Only Extension Event”** means Borrower has provided Agent and the Lenders with evidence, satisfactory to Agent and each Lender in Agent’s and each Lender’s sole and absolute discretion, on or prior to March 31, 2020, that ALX Ireland has received, after the Effective Date, but on or prior to March 31, 2020, unrestricted and unencumbered net cash proceeds in an amount of at least Forty Million Dollars (\$40,000,000.00) from either (a) the issuance and sale by ALX Ireland of its equity securities to investors or (b) a partnership, joint-venture or strategic alliance. Agent and each Lender acknowledge and agree that the Interest Only Extension Event has occurred.”

“ **“Material Adverse Change”** is (a) a material impairment in the perfection or priority of Agent’s, for the ratable benefit of the Lenders, Lien in the Collateral or in the value of such Collateral; (b) a material adverse change in the business, operations, financial condition of Borrower; or (c) a material impairment of the prospect of repayment of any portion of the Obligations.”

“ **“Subsidiary”** is, as to any Person, a corporation, partnership, exempted company, exempted limited partnership, limited liability company or other entity of which shares of stock or other ownership interests having ordinary voting power (other than stock or such other ownership interests having such power only by reason of the happening of a contingency) to elect a majority of the board of directors or other managers of such corporation, partnership or other entity are at the time owned, or the management of which is otherwise controlled, directly or indirectly through one or more intermediaries, or both, by such Person. Unless the context otherwise requires, each reference to a Subsidiary herein shall be a reference to a Subsidiary of Borrower.”

“ **“Term Sheet Event”** means confirmation by Agent, on or prior to March 31, 2020, that Borrower has delivered to Agent, a signed, binding, and unconditional term sheet (“**Term Sheet**”) from one or more parties, satisfactory to Agent and each Lender, in Agent’s and each Lender’s sole but reasonable discretion, in favor of, and accepted by Borrower or ALX Ireland, evidencing such party’s or parties’ commitment to either (i) purchase equity securities of Borrower or ALX Ireland or enter into a partnership, joint venture, or strategic alliance (on terms satisfactory to Agent and each Lender in Agent’s and each Lender’s sole but reasonable discretion), which would result in the receipt by Borrower or ALX Ireland of unrestricted and unencumbered net cash proceeds in an amount of at least Thirty Million Dollars (\$30,000,000.00) or (ii) merge or consolidate with another Person, which merger or consolidation agreement shall provide for an up-front cash payment to Borrower or ALX Ireland in an amount

of at least One Hundred Million Dollars (\$100,000,000.00); provided that, in the case of either (i) or (ii) herein, such proposed transaction is consummated and Borrower or ALX Ireland has received such funds after the Effective Date, but no later than ninety (90) days after the execution of such Term Sheet. Agent and each Lender acknowledge and agree that the Term Sheet Event has occurred.”

“ **“Warrant”** means, collectively, (a) that certain amended and restated warrant to purchase stock dated as of the First Amendment Effective Date between Parent and SVB Financial Group and (b) that certain amended and restated warrant to purchase stock dated as of the First Amendment Effective Date between Parent and WestRiver, in each case, as may be amended, modified, supplemented and/or restated from time to time.”

7.9 Exhibit B (Compliance Certificate). The Compliance Certificate appearing as **Exhibit B** to the Loan Agreement is deleted in its entirety and replaced with the Compliance Certificate attached as **Schedule 3** attached hereto.

7.10 Exhibit C (Loan Payment/Advance Request Form). The Loan Payment/Advance Request Form appearing as **Exhibit C** to the Loan Agreement is deleted in its entirety and replaced with the Loan Payment/Advance Request Form attached as **Schedule 4** attached hereto.

7.11 Exhibit D (Disbursement Letter). The Disbursement Letter appearing as **Exhibit D** to the Loan Agreement is deleted in its entirety and replaced with the Disbursement Letter attached as **Schedule 5** attached hereto.

8. Limitation of Amendments.

8.1 The amendments set forth in Section 7, above, are effective for the purposes set forth herein and shall be limited precisely as written and shall not be deemed to (a) be a consent to any amendment, waiver or modification of any other term or condition of any Loan Document, or (b) otherwise prejudice any right or remedy which Agent or the Lenders may now have or may have in the future under or in connection with any Loan Document.

8.2 This Amendment shall be construed in connection with and as part of the Loan Documents and all terms, conditions, representations, warranties, covenants and agreements set forth in the Loan Documents, except as herein amended, are hereby ratified and confirmed and shall remain in full force and effect.

9. Representations and Warranties. To induce Agent and the Lenders to enter into this Amendment, Borrower hereby represents and warrants to Agent and the Lenders as follows:

9.1 Immediately after giving effect to this Amendment (a) the representations and warranties contained in the Loan Documents are true and correct in all material respects as of the date hereof (except to the extent such representations and warranties relate to an earlier date, in which case they are true and correct as of such date), and (b) no Event of Default has occurred and is continuing;

9.2 Borrower has the power and authority to execute and deliver this Amendment and to perform its obligations under the Loan Agreement, as amended by this Amendment;

9.3 The organizational documents of Existing Borrower delivered to Agent on the Effective Date remain true, accurate and complete and have not been amended, supplemented or restated and are and continue to be in full force and effect;

9.4 The execution and delivery by Borrower of this Amendment and the performance by Borrower of its obligations under the Loan Agreement, as amended by this Amendment, have been duly authorized;

9.5 The execution and delivery by Borrower of this Amendment and the performance by Borrower of its obligations under the Loan Agreement, as amended by this Amendment, do not and will not contravene (a) any material Requirement of Law, (b) any material agreement with a Person binding on Borrower, (c) any applicable material order, judgment or decree of any court or other governmental or public body or authority, or subdivision thereof, binding on Borrower, or (d) the organizational documents of Borrower;

9.6 The execution and delivery by Borrower of this Amendment and the performance by Borrower of its obligations under the Loan Agreement, as amended by this Amendment, do not require any order, consent, approval, license, authorization or validation of, or filing, recording or registration with, or exemption by any governmental or public body or authority, or subdivision thereof, binding on Borrower, except as already has been obtained or made; and

9.7 This Amendment has been duly executed and delivered by Borrower and is the binding obligation of Borrower, enforceable against Borrower in accordance with its terms, except as such enforceability may be limited by bankruptcy, insolvency, reorganization, liquidation, moratorium or other similar laws of general application and equitable principles relating to or affecting creditors' rights.

10. Perfection Certificates. Existing Borrower hereby ratifies, confirms and reaffirms, all and singular, the terms and disclosures contained in a certain Perfection Certificate dated as of December 20, 2019 (the "**Existing Borrower Perfection Certificate**"), and acknowledges, confirms and agrees that the disclosures and information Borrower provided to Agent in the Existing Borrower Perfection Certificate have not changed, as of the date hereof, except as set forth on Schedule 2 hereto. New Borrower has delivered a Perfection Certificate in connection with this Amendment dated as of the date hereof (the "**New Borrower Perfection Certificate**"). Each Borrower hereby agrees that all references in the Loan Agreement to the "Perfection Certificate" shall hereinafter be deemed to be references to the Existing Borrower Perfection Certificate and the New Borrower Perfection Certificate, as applicable.

11. Post-Closing Condition. Within thirty (30) days of the First Amendment Effective Date, Borrower shall deliver to Agent (a) evidence satisfactory to Agent that the insurance policies and endorsements required by Section 6.5 of the Loan Agreement are in full force and effect, together with appropriate evidence showing lender loss payable and/or additional insured clauses or endorsements in favor of Agent and (b) a certificate of good standing for Parent as a foreign corporation from the State of California, in form and substance satisfactory to Agent.

12. Integration. This Amendment and the Loan Documents represent the entire agreement about this subject matter and supersede prior negotiations or agreements. All prior agreements, understandings, representations, warranties, and negotiations between the parties about the subject matter of this Amendment and the Loan Documents merge into this Amendment and the Loan Documents.

13. Counterparts. This Amendment may be executed in any number of counterparts and all of such counterparts taken together shall be deemed to constitute one and the same instrument.

14. Effectiveness. This Amendment shall be deemed effective upon (a) the due execution and delivery to Agent of this Amendment by each party hereto; (b) Bank's receipt of the Acknowledgement of Amendment and Reaffirmation of Guaranty in the form attached hereto as Schedule 1, duly executed and delivered by Guarantor, and (c) Borrower's payment to Agent of Agent's and the Lenders' legal fees and expenses incurred in connection with this Amendment.

[Signature page follows.]

IN WITNESS WHEREOF, the parties hereto have caused this Amendment to be duly executed and delivered as of the date first written above.

BORROWER:

EXECUTED AS A DEED BY:
ALEXO THERAPEUTICS INTERNATIONAL

By /s/ Jaume Pons
Name: Jaume Pons
Title: Director

In the presence of: /s/ Christine Bee
Name: Christine Bee

EXECUTED AS A DEED BY:
SIRPANT THERAPEUTICS

By /s/ Jaume Pons
Name: Jaume Pons
Title: Director

In the presence of: /s/ Christine Bee
Name: Christine Bee

ALX ONCOLOGY HOLDINGS INC.

By /s/ Jaume Pons
Name: Jaume Pons
Title: Director and CEO

AGENT:

SILICON VALLEY BANK, as Agent

By /s/ Peter Sletteland
Name: Peter Sletteland
Title: Vice President

LENDERS:

SILICON VALLEY BANK

By /s/ Peter Sletteland
Name: Peter Sletteland
Title: Vice President

WESTRIVER INNOVATION LENDING FUND VIII, L.P.

By /s/ Trent Dawson
Name: Trent Dawson
Title: CFO

Schedule 1

**ACKNOWLEDGMENT OF AMENDMENT
AND REAFFIRMATION OF GUARANTY**

Section 1. Guarantor hereby acknowledges and confirms that it has reviewed and approved the terms and conditions of the Joinder and First Amendment to Loan and Security Agreement dated as of even date herewith (“the “Amendment”).

Section 2. Guarantor hereby consents to the Amendment and agrees that the Guaranty relating to the Obligations of Borrower under the Loan Agreement shall continue in full force and effect, shall be valid and enforceable and shall not be impaired or otherwise affected by the execution of the Amendment or any other document or instruction delivered in connection herewith.

Section 3. Guarantor represents and warrants that, after giving effect to the Amendment, all representations and warranties contained in the Guaranty are true, accurate and complete as if made the date hereof.

Dated as of May 21, 2020

SIGNED AND DELIVERED as a deed

for and on behalf of **ALX ONCOLOGY LIMITED**

by its lawfully appointed attorney

Jaume Pons in the presence of:

/s/ Jaume Pons
(Signature)

/s/ Christine Bee
(Signature of Witness)

Christine Bee
(Name of Witness)

(Address of Witness)

(Occupation of Witness)

Schedule 2

N/A

Schedule 3

EXHIBIT B
COMPLIANCE CERTIFICATE

TO: SILICON VALLEY BANK, as Agent, SVB, and WESTRIVER
FROM: ALEXO THERAPEUTICS INTERNATIONAL (“Alexo”)
SIRPANT THERAPEUTICS (“Sirpant”)
ALX ONCOLOGY HOLDINGS INC. (“Parent”)

Date:

The undersigned authorized officer of Alexo, Sirpant, and Parent (individually and collectively, “**Borrower**”) certifies that under the terms and conditions of the Loan and Security Agreement among Borrower, SVB, and WestRiver (as amended, the “**Loan Agreement**”):

(1) Borrower is in complete compliance for the period ending _____ with all required covenants except as noted below, (2) there are no Events of Default, (3) all representations and warranties in the Agreement are true and correct in all material respects on this date except as noted below; provided, however, that such materiality qualifier shall not be applicable to any representations and warranties that already are qualified or modified by materiality in the text thereof; and provided, further that those representations and warranties expressly referring to a specific date shall be true and correct in all material respects as of such date, (4) Borrower, and each of its Subsidiaries, has timely filed all required tax returns and reports, and Borrower has timely paid all foreign, federal, state and local taxes, assessments, deposits and contributions owed by Borrower except as otherwise permitted pursuant to the terms of Section 5.8 of the Agreement, and (5) no Liens have been levied or claims made against Borrower or any of its Subsidiaries relating to unpaid employee payroll or benefits of which Borrower has not previously provided written notification to Agent.

Attached are the required documents supporting the certification. The undersigned certifies that these are prepared in accordance with GAAP consistently applied from one period to the next except as explained in an accompanying letter or footnotes. The undersigned acknowledges that no borrowings may be requested at any time or date of determination that Borrower is not in compliance with any of the terms of the Agreement, and that compliance is determined not just at the date this certificate is delivered. Capitalized terms used but not otherwise defined herein shall have the meanings given them in the Agreement.

Please indicate compliance status by circling Yes/No under “Complies” column.

| <u>Reporting Covenants</u> | <u>Required</u> | <u>Complies</u> | |
|--|--|-----------------|----|
| Monthly Financial Statements with Compliance Certificate | Monthly within 30 days | Yes | No |
| Annual financial statement (CPA Audited) | By October 31; if the Board determines in its reasonable discretion not to require an audit for any fiscal year of Borrower, then 30 days after such FYE | Yes | No |
| 10-Q, 10-K and 8-K | Within 5 days after filing with SEC | Yes | No |
| Board-Approved Projections | Within the earlier to occur of (a) 60 days after FYE and (b) 10 days after Board approval, and contemporaneously with changes | Yes | No |
| Cash maintained at ALX U.S. \$ _____ as of _____ | | | |

Other Matters

Have there been any amendments of or other changes to the capitalization table of Borrower and to the Operating Documents of Borrower or any of its Subsidiaries? If yes, provide copies of any such amendments or changes with this Compliance Certificate.

Yes

No

The following are the exceptions with respect to the certification above: (If no exceptions exist, state "No exceptions to note.")

ALEXO THERAPEUTICS INTERNATIONAL

By _____

Name: _____

Title: _____

SIRPANT THERAPEUTICS

By _____

Name: _____

Title: _____

ALX ONCOLOGY HOLDINGS INC.

By _____

Name: _____

Title: _____

AGENT USE ONLY

Received by: _____
AUTHORIZED SIGNER

Date: _____

Verified: _____
AUTHORIZED SIGNER

Date: _____

Compliance Status: Yes No

Schedule 4

EXHIBIT C

LOAN PAYMENT/ADVANCE REQUEST FORM

DEADLINE FOR SAME DAY PROCESSING IS NOON PACIFIC TIME

Fax To: _____

Date: _____

LOAN PAYMENT: ALX ONCOLOGY HOLDINGS INC., ALEXO THERAPEUTICS INTERNATIONAL, AND SIRPANT THERAPEUTICS

From Account # _____ To Account # _____
(Deposit Account #) (Loan Account #)

Principal \$ _____ and/or Interest \$ _____

Authorized Signature: _____ Phone Number: _____

Print Name/Title: _____

LOAN ADVANCE:

Complete *Outgoing Wire Request* section below if all or a portion of the funds from this loan advance are for an outgoing wire.

From Account # _____ To Account # _____
(Loan Account #) (Deposit Account #)

Amount of Term Loan Advance \$ _____

All Borrower's representations and warranties in the Loan and Security Agreement are true, correct and complete on the date of the request for an advance

Authorized Signature: _____ Phone Number: _____

Print Name/Title: _____

OUTGOING WIRE REQUEST:

Complete only if all or a portion of funds from the loan advance above is to be wired.

Deadline for same day processing is noon, Pacific Time

Beneficiary Name: _____ Amount of Wire: \$ _____

Beneficiary Bank: _____ Account Number: _____

City and State: _____

Beneficiary Bank Transit (ABA) #: _____ Beneficiary Bank Code (Swift, Sort, Chip, etc.): _____

(For International Wire Only)

Intermediary Bank: _____

Transit (ABA) #: _____

For Further Credit to: _____

Special Instruction: _____

By signing below, I (we) acknowledge and agree that my (our) funds transfer request shall be processed in accordance with and subject to the terms and conditions set forth in the agreements(s) covering funds transfer service(s), which agreements(s) were previously received and executed by me (us).

Authorized Signature: _____ 2nd Signature (if required): _____

Print Name/Title: _____ Print Name/Title: _____

Telephone #: _____ Telephone #: _____

Schedule 5

EXHIBIT D

DISBURSEMENT LETTER

[DATE]

The undersigned, being the duly elected and acting _____ of (i) **ALEXO THERAPEUTICS INTERNATIONAL**, an exempted company incorporated under the laws of the Cayman Islands ("**Alexo**"), (ii) **SIRPANT THERAPEUTICS**, an exempted company incorporated under the laws of the Cayman Islands ("**Sirpant**"), and (iii) **ALX ONCOLOGY HOLDINGS INC.**, a Delaware corporation ("**ALX**"; together with Sirpant and Alexo, individually and collectively, jointly and severally, the "**Borrower**"), does hereby certify to (a) **SILICON VALLEY BANK**, a California corporation ("**SVB**"), in its capacity as administrative agent and collateral agent ("**Agent**"), (b) **SILICON VALLEY BANK**, a California corporation, as a lender, (c) **WESTRIVER INNOVATION LENDING FUND VIII, L.P.**, a Delaware limited partnership ("**WestRiver**"), as a lender (SVB and WestRiver and each of the other "Lenders" from time to time a party hereto are referred to herein collectively as the "**Lenders**" and each individually as a "**Lender**") in connection with that certain Loan and Security Agreement dated as of December 20, 2019, by and among Borrower, Agent and the Lenders from time to time party thereto (the "**Loan Agreement**"; with other capitalized terms used below having the meanings ascribed thereto in the Loan Agreement) that:

1. The representations and warranties made by Borrower in Section 5 of the Loan Agreement and in the other Loan Documents are true and correct in all material respects as of the date hereof.
2. No event or condition has occurred that would constitute an Event of Default under the Loan Agreement or any other Loan Document.
3. Borrower is in compliance with the covenants and requirements contained in Sections 4, 6 and 7 of the Loan Agreement.
4. All conditions referred to in Section 3 of the Loan Agreement to the making of a Credit Extension to be made on or about the date hereof have been satisfied or waived by Agent.
5. No Material Adverse Change has occurred.
6. The undersigned is an Authorized Signer.

[Balance of Page Intentionally Left Blank]

7A. The proceeds of the Term Loan Advance shall be disbursed as follows:

| | | |
|---|--|-----------|
| Disbursement from SVB: | | |
| Loan Amount | | \$ |
| Plus: | | |
| —Deposit Received | | \$ |
| Less: | | |
| —[Interim Interest] | | (\$) |
| —Lender’s Legal Fees | | (\$)* |
| Net Proceeds due from SVB: | | \$ |
| Disbursement from WestRiver: | | |
| Loan Amount | | \$ |
| Plus: | | |
| —Deposit Received | | \$ |
| Less: | | |
| —[Interim Interest] | | (\$) |
| Net Proceeds due from WestRiver: | | \$ |
| Disbursement from Agent (cumulative and not duplicative of the amounts set forth above): | | |
| Loan Amount | | |
| Plus: | | \$ |
| —Deposit Received | | \$ |
| Less: | | |
| —[Interim Interest] | | (\$) |
| —Lender’s Legal Fees | | (\$)* |
| Net Proceeds due from Agent: | | \$ |
| TOTAL TERM LOAN ADVANCE NET PROCEEDS FROM LENDERS | | \$ |

7B. Funds from [] (“**Borrower**”) Designated Deposit Account shall be disbursed as follows:

SVB:

| | | |
|--|--|----|
| Term Loan Fees | | \$ |
| Lender’s Legal Fees | | \$ |
| WestRiver: Designated Deposit Account: | | |
| Term Loan Fees | | \$ |
| Total Funds due from [] (“ Borrower ”) | | \$ |

* Legal fees and costs are through the Effective Date. Post-closing legal fees and costs, payable after the Effective Date, to be invoiced and paid post-closing.

8A. The aggregate net proceeds of the Term Loan Advance shall be transferred to the Designated Deposit Account as follows:

Account Name: _____
Bank Name: Silicon Valley Bank
Bank Address: 3003 Tasman Drive
Santa Clara, California 95054
Account Number: _____
ABA Number: _____

8B. Borrower authorized SVB to debit the Total Funds from the Designated Deposit Account set forth below:

Account Name: _____
Bank Name: Silicon Valley Bank
Bank Address: 3003 Tasman Drive
Santa Clara, California 95054
Account Number: _____
ABA Number: _____

[Balance of Page Intentionally Left Blank]

Dated as of the date first set forth above.

BORROWER:

ALEXO THERAPEUTICS INTERNATIONAL

By _____
Name: _____
Title: _____

SIRPANT THERAPEUTICS

By _____
Name: _____
Title: _____

ALX ONCOLOGY HOLDINGS INC.

By _____
Name: _____
Title: _____

LENDER:

SILICON VALLEY BANK

By _____
Name: _____
Title: _____

LENDER:

WESTRIVER INNOVATION LENDING FUND VIII, L.P.

By _____
Name: _____
Title: _____

**AMENDED AND RESTATED RESEARCH AND DEVELOPMENT SERVICES
AGREEMENT**

dated as of June 18, 2018

by and among

ALX ONCOLOGY INC.

and

TOLLNINE, INC.

**AMENDED AND RESTATED RESEARCH AND DEVELOPMENT SERVICES
AGREEMENT**

This research and development services agreement (the “**Agreement**”) is entered into as of June 18, 2018, (the “**Effective Date**”) by and between Tollnine, Inc., a Delaware corporation (“**Tollnine**”) having an address at 1700 Owens Street, Suite 595, San Francisco, CA 94158, and ALX Oncology Inc., a Delaware corporation (“**ATI**”, formerly Alexo Therapeutics Inc.) having an address at 866 Malcolm Road, Suite 100, Burlingame, CA 94010. Tollnine and ATI are sometimes referred to herein individually as a “**Party**” and collectively as the “**Parties**”.

WHEREAS, Tollnine is a biotechnology company engaged in the business of developing protein based therapeutics for the treatment of oncology conditions in humans;

WHEREAS, ATI has capabilities in the area of providing research and development services, and possesses suitable facilities for and employs professional personnel knowledgeable about and experienced in such work;

WHEREAS, Tollnine desires that ATI perform research and development services set out in **Attachment 1** and other services mutually agreed upon by the Parties on behalf of Tollnine; and

WHEREAS, ATI is willing, from time to time, to provide, directly or indirectly, such services to be specified from time-to-time in accordance with Section 2.1, on the terms and conditions set out in this Agreement on behalf of Tollnine.

NOW THEREFORE, in consideration of the mutual covenants and conditions set forth herein, and for other good and valuable consideration the receipt and sufficiency of which are hereby acknowledged, the Parties hereby agree as follows:

1. DEFINITIONS

1.1 Definition. Capitalized terms used in this Agreement and not otherwise defined herein shall have the meaning set forth below.

“**Affiliate**” means with respect to either Party, any Person that, directly or indirectly, is controlled by, controls or is under common control with such Party. For purposes of this Agreement, “**control**” means, with respect to any Person, the direct or indirect ownership of more than fifty percent (50%) of the voting or economic interest in such Person or the possession otherwise, directly or indirectly, of the power to direct the management or policies of such Person.

“**Applicable Rate**” means the lesser of two percent (2%) per annum or the maximum rate of interest permitted by law, but in no case less than the applicable federal rate for short-term obligations under Section 1274(d) of the Internal Revenue Code of 1986, as amended, for the period for which the Applicable Rate is being applied.

“**ATI Background Technology**” means technology, know-how, inventions and trade secrets that are or were (a) invented by officers, employees or agents of, or consultants to, ATI or any of its Affiliates, alone or jointly with third parties, at any time outside of the Services or (b) acquired by purchase, license, assignment or other means from third parties by ATI or any of its Affiliates, alone or jointly with third parties, at any time outside of the Services.

“Business Day(s)” means any day other than a Saturday or Sunday that is not a national holiday in the United States.

“Intellectual Property Rights” means all inventions, know-how, trade secrets, inventions, discoveries, modifications, improvements, materials, compositions of matter, techniques, methods, processes, products, works of authorship, designs and data (whether or not protectable under patent, copyright, trade secrecy or similar laws) and all Patents, patent applications, copyrights, copyright registrations, trademarks, service marks, registrations and applications for trademarks and service marks, trade names, logos, designs, brand names and trade dress, including but not limited to Existing Technology and New Technology (as defined in Section 4.1) and all rights and forms of protection as may subsist anywhere in the world and having equivalent or similar effect to any of the foregoing.

“Patent” means any and all (a) patents issued by any government authority, including without limitation re-examinations, reissues, renewals, extensions, supplementary protection certificates, and term restorations, and (b) pending applications for patents filed with any government authority, including without limitation continuations, continuations-in-part, divisionals, substitute applications and inventor’s certificates.

“Person” means any individual, corporation, association, partnership (general or limited), joint venture, trust, estate, limited liability company, limited liability partnership, unincorporated organization, government (or any agency or political subdivision thereof) or other legal entity or organization.

“Regulatory Authority” means any national, supra-national, regional, state or local regulatory agency, department, bureau, commission, council or other governmental entity, including, without limitation, the FDA.

“Results” means all results, inventions, data, reports and other Intellectual Property Rights made by ATI arising from the Services.

“Service(s)” means, subject to the terms and conditions in this Agreement, research and development support service(s) described in **Attachment 1**, and, going forward, any related services as may be agreed by the Parties.

“Services Work Product” means all work product that arises by the performance by ATI of the Services, provided that “Services Work Product” excludes ATI Background Technology and improvements to ATI Background Technology that arise during performance of the Services.

1.2 Other Defined Terms. Each of the following terms has the meaning ascribed to it in the section set forth opposite such term:

| | |
|-----------------------------------|----------------|
| “Act” | Section 2.5(a) |
| “Affected Party” | Section 7.12 |
| “Agreement” | Recitals |
| “ATI” | Recitals |
| “Confidential Information” | Section 4.2(a) |
| “Compensation” | Section 3.1 |

| | |
|----------------------------|---------------------|
| “Confidential Information” | Section 4.2 |
| “Disadvantaged Party” | Section 7.12 |
| “Effective Date” | Recitals |
| “Existing Technology” | Section 4.1(a) |
| “FDA” | Section 2.5(a) |
| “Force Majeure” | Section 7.12 |
| “New Technology” | Section 4.1(b) |
| “Party” | Recitals |
| “Parties” | Recitals |
| “Service Fee” | <u>Attachment 2</u> |
| “Supplier(s)” | Section 2.3 |
| “Term” | Section 6.1 |
| “Tollnine” | Recitals |

2. SERVICES

2.1 Development Services. During the Term, ATI shall, at the request of Tollnine, provide to Tollnine the Services. ATI shall also be responsible for preparing a detailed budget for the Services when requested by Tollnine. If required, each budget will be updated on a quarterly basis by ATI and submitted to Tollnine for approval.

2.2 Changes in Services or Budgeted Amounts. Tollnine may propose changes in the Services as reasonably required based upon the Results. ATI may also propose changes in the Services and adjustments to the corresponding budgeted amount based upon the Results with the consent of Tollnine.

2.3 Use of Third Parties. ATI may subcontract to one or more qualified third party suppliers (“**Supplier(s)**”) for those portions of the Services that require the use of special personnel or equipment, provided that the subcontracting of such Services shall not limit or affect ATI’s liabilities, responsibilities, obligations or duties under this Agreement, including but not limited to the obligations under Section 2.5 and Article 4 of this Agreement. ATI shall provide Tollnine with notice of those third party Suppliers to which it subcontracts portions of the Services.

2.4 Tollnine Assistance. Tollnine shall provide ATI with certain assistance in connection with the Services, as ATI reasonably requests in connection with delivery of the Services.

2.5 Diligence; Standards of Conduct.

(a) In performing the Services, ATI shall comply with the instructions of Tollnine and standard operating procedures mutually approved by Tollnine and ATI. ATI shall perform the Services, when appropriate, in a manner consistent with “Good Laboratory/Clinical Practices”, all relevant professional standards and applicable laws, rules and regulations, including, but not limited to, the U.S. Food, Drug and Cosmetic Act of 1934 (the “**Act**”) and regulations promulgated thereunder by the U.S. Food and Drug Administration (the “**FDA**”) and, as applicable, regulations issued by other applicable Regulatory Authorities.

(b) Tollnine will comply with all applicable laws and regulations pertaining to performance by Tollnine of its obligations under this Agreement, including, but not limited to, all relevant tax laws and regulations. ATI will comply with all applicable laws and regulations pertaining to performance by ATI of its obligations under this Agreement, including, but not limited to, all relevant tax laws and regulations. Neither Party shall be required to perform or omit to perform any act required or permitted under this Agreement if such performance or omission would violate the provisions of any such law or regulation.

(c) ATI shall have and maintain in full force and effect any and all licenses, permits, authorizations, registrations and qualifications from all governmental agencies, to the extent necessary or appropriate to perform its obligations under this Agreement. ATI shall provide Tollnine with prompt written notice of any changes in any applicable law, rule, regulation or governmental order, which comes to ATI's attention that may affect either Party's performance of its obligations hereunder.

2.6 Records; Reports(a) . (a) ATI shall maintain clear, accurate and complete records in respect of all Services, including, without limitation, detailed laboratory notebooks setting out experimental procedures and the resulting data, experimental reports, quality control records, analytical test results, progress reports, memoranda and correspondence.

(b) Upon the written request of Tollnine during the Term, ATI shall provide status reports in a form to be agreed upon between the Parties. Such status reports shall specify the progress that has been made with respect to any and all Services then ongoing.

3. PRICING; PAYMENT

3.1 Pricing. Tollnine shall pay ATI a fee for providing the Services (the "**Compensation**") calculated as the sum of: (a) an amount to be determined in accordance with **Attachment 2**; plus (b) reimbursement for such other costs and expenses as may be agreed from time to time by the Parties.

3.2 Taxes and Withholding. If Tollnine is required by applicable law to make a payment to ATI subject to a deduction of tax or withholding tax, the sum payable by Tollnine (in respect of which such deduction or withholding is required to be made) shall be made to ATI after deduction of the amount required to be so deducted or withheld by the applicable tax authorities, which deducted or withheld amount shall be remitted to the applicable tax authorities in accordance with applicable law. Any such withholding taxes required to be paid or withheld shall be an expense of, and borne solely by, Tollnine.

3.3 Payment.

(a) ATI shall invoice Tollnine for the Compensation on a calendar quarterly basis or as otherwise mutually agreed by the Parties. Each invoice shall include, in reasonable detail, a description of the Services provided to Tollnine during the time period to which such invoice relates.

(b) Tollnine shall pay for Services within thirty (30) days following its receipt of ATI's invoice.

(c) Payment of the Compensation shall be made directly to ATI or to a bank designated by ATI by notice to Tollnine from time to time, and shall be made in United States Dollars.

(d) If Tollnine fails to make any undisputed payment when due, such payment shall bear interest at the Applicable Rate until paid in full.

3.4 Records. During the Term and for a period of three (3) years after any termination or expiration of the Term, ATI will maintain complete and accurate accounting books and records, prepared in accordance with U.S. GAAP, of all transactions relating to the subject matter of this Agreement in sufficient detail to permit Tollnine to confirm the accuracy of all costs and expenses incurred by ATI in discharging its obligations under this Agreement and the compensation due to ATI for each year. At the written request of Tollnine and at Tollnine's expense, ATI shall allow an independent accounting firm selected by Tollnine, to examine the accounting books and records maintained hereunder during ATI's regular business hours at ATI's place of business. In the event that such examination concludes that there has been an overpayment the excess shall be credited to Tollnine against future payments under this Agreement.

4. PROPRIETARY RIGHTS; CONFIDENTIALITY

4.1 Proprietary Rights.

(a) ATI acknowledges that it shall have no claim to any right, title, and interest in and to any Intellectual Property Rights owned or controlled by Tollnine prior to the Effective Date (collectively, the "**Existing Technology**").

(b) ATI further acknowledges that, except for improvements to ATI Background Technology, all right, title, and interest in and to: (i) any Services Work Product and/or any Intellectual Property Rights directly resulting from or conceived or reduced to practice during or after the Term by ATI or its Suppliers in performance of the Services (collectively, the "**New Technology**"); and/or (ii) any improvements or enhancements to Existing Technology or New Technology conceived or reduced to practice during or after the Term shall be the property of Tollnine. ATI shall not have the right to use or otherwise exploit any Existing Technology, New Technology or any improvements or enhancements to Existing Technology or New Technology except as required for the performance of the Services in accordance with this Agreement.

(c) Before retaining the services of any employee, consultant or Supplier, whether directly or indirectly, ATI shall cause such employee, consultant or Supplier and all affiliated personnel performing any work in connection with the Services to enter into a written contract with ATI pursuant to the terms of which every such person or entity agrees (i) to assign to ATI ownership of all rights (or where not assignable, a waiver of all non-assignable rights) such person or entity may have with respect to all such Existing Technology (and any improvements or enhancements thereto) and New Technology (and any improvements or enhancements thereto) and (ii) to take all actions necessary or useful to cause all such Existing Technology (and any improvements or enhancements thereto) and all New Technology (and any improvements or enhancements thereto) to be assigned to ATI.

(d) As between ATI and Tollnine, ATI shall retain ownership of all ATI Background Technology and improvements thereto that arise during the performance of the Services. ATI hereby assigns and agrees to assign to Tollnine all right, title, and interest in and to all Service Work Product and New Technology (except All Background Technology and improvements thereto), including without limitation any Intellectual Property Rights embodied in such Service Work Product and New Technology (whether or not protectable under patent, copyright, trade secret or similar laws). At the request of Tollnine, ATI shall undertake to do all things and to execute all documents necessary to give effect to the provisions of this Section 4.1.

(e) ATI shall promptly disclose to Tollnine any (i) New Technology (and any improvements or enhancements thereto), and/or (ii) any improvements or enhancements to Existing Technology that it becomes aware of that might, under applicable law, be patentable or otherwise protectable.

(f) Tollnine shall have control over the filing, prosecution, maintenance, interference and every and all other aspects of the management of any and all patent, trademark and copyright applications for both Existing Technology (and any improvements or enhancements thereto) and New Technology (and any improvements or enhancements thereto).

(g) In the event that ATI reasonably believes that a third party is or may be infringing, encroaching or violating any Intellectual Property Right owned or controlled by Tollnine, then ATI shall promptly notify Tollnine in writing of such alleged infringement, encroachment or violation, and Tollnine shall have the sole right, in its sole discretion, to take or not take whatever action it believes is appropriate, without the obligation to do so, and shall have the sole right to control any resulting litigation.

4.2 Confidentiality.

(a) “**Confidential Information**” means all information disclosed by one Party (the “**Disclosing Party**”) to the other Party (the “**Receiving Party**”) hereunder and relating to this Agreement, a whether or not in writing or verbally, and whether or not marked or otherwise identified as confidential; including, without limitation, all technical and non-technical information conveyed from Disclosing Party to the Receiving Party in any form, including but not limited to Existing Technology, New Technology and ATI Background Technology. Notwithstanding any other provisions herein, Confidential Information does not include information which, to the extent the Receiving Party can prove by competent evidence,

(i) at the time of its disclosure is publicly known;

(ii) after its disclosure hereunder, becomes publicly known by publication or otherwise, except in breach of this agreement;

(iii) the Receiving Party can conclusively establish with contemporaneous records was in its or its Affiliates’ possession at the time of disclosure hereunder or was subsequently and independently developed by its or its Affiliates’ employees who had no knowledge of Information disclosed hereunder; or

(iv) the Receiving Party or its Affiliates receives from a third party not under obligation or duty of confidentiality, directly or indirectly, to the other Party hereto.

Tollnine and ATI acknowledge and agree that Existing Technology and New Technology shall be deemed the Confidential Information of Tollnine and shall be held in trust by ATIOh for the benefit of Tollnine, and that ATI Background Technology shall be deemed the Confidential Information of ATI and shall be held in trust by Tollnine for the benefit of ATI.

(b) Confidential Information disclosed by a Disclosing Party to a Receiving Party hereunder remains the sole property of the Disclosing Party.

(c) During the Term and for a period of ten (10) years thereafter, the Receiving Party shall:

(i) take all reasonable steps to hold in trust and confidence Confidential Information of the Disclosing Party and not use such Confidential Information except for the limited purposes set forth in this Agreement;

(ii) not disclose the Confidential Information of the Disclosing Party, except to those of its employees, consultants, contractors, subcontractors and agents who (A) require access to such Confidential Information for purposes of the Receiving Party performing its obligations hereunder and (B) have been informed of the limitations on use and disclosure of such Confidential Information created by this Agreement; and

(iii) take all reasonable steps to prevent unauthorized disclosure or use of Confidential Information of the Disclosing Party;

provided, however, that with respect to any of Confidential Information that is a trade secret, such obligations shall survive and continue for so long as such information qualifies as a trade secret under applicable law.

(d) No provision of this Agreement shall be construed to preclude such disclosure of Confidential Information if the Receiving Party (or its Affiliates, employees, consultants, contractors, subcontractors and agents) is required to disclose Confidential Information by order or requirement of a court, administrative agency, or other governmental body, provided the Receiving Party (or its employees, consultants, contractors, subcontractors and agents) shall provide the Disclosing Party prompt notice thereof to enable the Disclosing Party to seek a protective order or otherwise prevent such disclosure

(e) Each Party acknowledges and agrees that, disclosure of Confidential Information contrary to the terms of this Agreement may cause significant harm and injury to Disclosing Party and agrees that the Disclosing Party shall have the right, in addition to any other rights available under applicable law, to seek from any tribunal of competent jurisdiction (i) injunctive relief to enjoin any breach or violation or (ii) specific performance of the provisions of this Agreement to specifically enforce, any covenant or obligation of such Party under such provisions, without the necessity of posting any bond or security.

(f) It is understood and agreed by the Parties that Confidential Information shall not include any portion of such information or data that: (i) is disclosed to the Receiving Party by a third person who is under no obligation of confidentiality to the Disclosing Party with respect to such information and who otherwise has a right to make such disclosure; or (ii) is or becomes generally known in the trade through no fault of the Receiving Party.

4.3 Return of Confidential Information. On the termination of this Agreement, or upon the Disclosing Party's earlier request, the Receiving Party shall return or destroy any Confidential Information of the Disclosing Party in its possession; provided that the Receiving Party: (i) may retain one complete set to ensure compliance with its obligations under this Agreement, for its corporate governance and secretarial purposes, and for compliance by it with the applicable rules of professional bodies; (ii) shall not be required to destroy back-up computer files created in the ordinary course of business; and (iii) may, in its discretion, destroy any of its own work product containing Confidential Information of the Disclosing Party that it is not entitled to retain under (i) or (ii) above. The Receiving Party shall confirm in writing that it has complied with the obligations set forth in this Section 4.3.

5. REPRESENTATIONS AND WARRANTIES

5.1 Authorization. Each of Tollnine and ATI represents and warrants to the other that: (a) it is duly organized, validly existing and in good standing under the laws of its organizing jurisdiction; (b) it has all requisite power and authority, corporate and otherwise, to execute and deliver this Agreement and to perform its obligations hereunder; (c) it is (by all necessary corporate action) duly authorized to execute and deliver this Agreement and to perform its obligations hereunder and consummate the transactions contemplated hereby.

5.2 Binding Obligation.

(a) This Agreement is the valid and legally binding obligation of ATI in accordance with its terms, subject to bankruptcy, reorganization, insolvency, moratorium and similar laws and to general principles of equity which are within the discretion of courts of applicable jurisdiction.

(b) This Agreement is the valid and legally binding obligation of Tollnine in accordance with its terms, subject to bankruptcy, reorganization, insolvency, moratorium and similar laws and to general principles of equity which are within the discretion of courts of applicable jurisdiction.

5.3 Independent Contractor. ATI shall perform its obligations under this Agreement as an independent contractor and shall be solely responsible for its own financial obligations. Nothing in this Agreement shall be construed to imply a joint venture or principal and agent relationship between the Parties, and neither Party shall, by virtue of this Agreement, have any right, power or authority to direct and control the day-to-day activities of the other or create any obligation, express or implied, on behalf of the other.

5.4 ATI Authorization with Respect to Third Parties. ATI shall at all times hold itself out to third parties as an independent contractor and shall not make any representations to any third party that it has the right under this Agreement to assume or create any obligation of any kind, either express or implied, on behalf of Tollnine. ATI shall not take any action that would legally bind Tollnine.

5.5 Limitation of Liability.

(a) NEITHER PARTY SHALL BE LIABLE FOR ANY INDIRECT, CONSEQUENTIAL, SPECIAL OR PUNITIVE DAMAGES, INCLUDING WITHOUT LIMITATION LOSS OF BUSINESS OR LOSS OF USE, ARISING OUT OF THE BREACH BY A PARTY OF ITS OBLIGATIONS SET FORTH IN THIS AGREEMENT, WHETHER OR NOT FORESEEABLE AND WHETHER OR NOT A PARTY IS ADVISED OF THE POSSIBILITY OF SUCH DAMAGES; PROVIDED, HOWEVER, THAT THE FOREGOING LIMITATION OF LIABILITY SHALL NOT APPLY WITH RESPECT TO ANY BREACH OF SECTION 4.2 (CONFIDENTIALITY) OR DAMAGES ARISING FROM FRAUD, GROSS NEGLIGENCE OR WILLFUL MISCONDUCT. IN NO EVENT SHALL ATI BE LIABLE TO TOLLNINE FOR ANY LOSS ARISING UNDER OR IN CONNECTION WITH THIS AGREEMENT IN RESPECT OF ANY LOSS OF PROFIT, OPPORTUNITY, BUSINESS, SAVING OR GOODWILL (IN EACH CASE WHETHER DIRECT OR INDIRECT), AND EACH TYPE OF LOSS ARISING UNDER THIS SECTION 5.5(a) SHALL BE SEVERABLE IN ACCORDANCE WITH SECTION 7.7.

(b) In the event of a material error by ATI that prevents the proper performance of the Services or which renders the Services unacceptable to a regulatory authority to which Tollnine intends to submit the Results, ATI's sole obligation to Tollnine shall be for ATI, in agreement with Tollnine to either: (a) repeat the defective part of the Services at ATI's own cost, or (b) refund to Tollnine the amounts paid for the defective part of the Services.

(c) Each Party's total liability to the other Party, whether in contract, tort (including negligence) or otherwise under this Agreement shall in no circumstances exceed two (2) times the total amount of fees paid by Tollnine for the applicable Services.

(d) ATI shall not be liable for any failure, error or delay in performing the Services if such failure, error or delay is caused by Tollnine or is a result of an express instruction from Tollnine or a change in Tollnine information.

5.6 Disclaimer. EXCEPT FOR THE WARRANTIES PROVIDED IN THIS ARTICLE 5 AND SUBJECT TO ANY RULES OF APPLICABLE LAW THAT MAY NOT BE WAIVED, ANY AND ALL WARRANTIES AS TO THE SERVICES, THE NEW TECHNOLOGY AND THE EXISTING TECHNOLOGY, INCLUDING IMPLIED WARRANTIES OF MERCHANTABILITY AND FITNESS FOR A PARTICULAR PURPOSE OR USE, AND NON-INFRINGEMENT ARE SPECIFICALLY DISCLAIMED, EXCLUDED, WAIVED AND NEGATED.

6. TERM AND TERMINATION

6.1 Term. This Agreement shall take effect as the Effective Date and shall remain in effect for an initial period of three (3) years, unless sooner terminated in accordance with Section 6.2 (the "**Term**"). At the end of the fixed term, this Agreement shall renew automatically for additional one (1) year

terms (subject to earlier termination under the provisions of this Article 6), unless, prior to the date of any automatic renewal, one Party provides thirty (30) days' advance written notice of non-renewal to the other Party.

6.2 Termination of Agreement for Cause. Either Party may terminate this Agreement at any time upon sixty (60) days' notice to the other Party in the event that the other Party shall have breached any of its material obligations under this Agreement and shall not have cured such default prior to the expiration of the 60-day period. Termination of this Agreement shall not result in termination any Services then being delivered on an active basis, which shall remain in force until completed or terminated as provided in Section 6.3. If either Party desires to terminate this Agreement and all Services, it shall so state in its notice of termination.

6.3 Termination of Service(s) for Cause. Either Party may terminate any Service(s) at any time upon sixty (60) days' notice to the other Party in the event that the other Party shall have breached any of its material obligations under this Agreement and shall not have cured such default prior to the expiration of the 60-day period. Termination of any Service(s) shall not result in termination of this Agreement or any other Service(s) then being delivered on an active basis, which shall remain in force until completed or terminated as provided in Sections 6.2 and 6.3. If either Party desires to terminate this Agreement and all Services, it shall so state in its notice of termination. If termination of multiple Services is elected pursuant to this Section 6.3, the opportunity to cure shall be available for each Service and termination shall only apply to those Service(s) with respect to which the default is not cured.

6.4 Termination for Convenience.

(a) The Parties may terminate this Agreement at any time upon mutual written agreement of the Parties.

(b) This Agreement may be terminated by Tollnine, for convenience, at any time, by giving ATI written notice of the termination thirty (30) days in advance.

(c) If a Force Majeure condition has prevented performance by one Party for more than forty five (45) consecutive days or an aggregate ninety (90) days in any 1212-month period, the Disadvantaged Party shall have the right to terminate this Agreement upon fifteen (15) days' notice.

6.5 Termination for Insolvency. This Agreement shall terminate immediately without notice: (i) upon the institution by or against ATI or Tollnine of insolvency, receivership or bankruptcy proceedings or any other proceedings for the settlement of ATI's or Tollnine's debts; (ii) upon ATI's or Tollnine's making an assignment for the benefit of creditors; or (iii) upon ATI's or Tollnine's dissolution or liquidation.

6.6 Effect of Termination.

(a) Upon termination (including expiration) of this Agreement for any reason: (i) Tollnine and ATI will terminate all tasks (if any) in an orderly manner, as soon as practical and in accordance with a

schedule agreed to by the Parties; and (ii) ATI will discontinue any and all use of any Existing Technology or New Technology, except as necessary to fulfill its obligations to Tollnine in accordance with this Section 6.6.

(b) Upon any termination (including expiration) the Receiving Party shall promptly: (i) cease the use of all Disclosing Party Confidential Information (except as otherwise provided under Section 6.6(a)) and return to the Disclosing Party any and all papers, material and property in its possession or control that contain or embody any Confidential Information of the Disclosing Party, without making or retaining copies thereof, in accordance with Section 4.3.

(c) Tollnine shall pay all reasonable costs incurred by ATI that are necessary or reasonably required in connection with the orderly cessation of the Services in accordance with the plan described in Section 6.6(a), provided that ATI shall use commercially reasonable efforts to minimize costs associated with the cessation of the Services and Tollnine shall not be responsible for such mitigated costs. ATI shall promptly issue to Tollnine a final invoice or credit note, as the case may be, with respect to all outstanding amounts due under this Agreement.

(d) Termination of this Agreement shall not affect rights and obligations of either Party that may have accrued prior to the effective date of termination or any obligation specifically stated to survive termination. The provisions of Article 1, Section 2.6, Sections 3.2-3.4, Article 4, Article 5, Section 6.6, and Article 7 shall survive any expiration or termination of this Agreement.

7. GENERAL PROVISIONS.

7.1 Assignment. Neither Party may assign this Agreement, without the other Party's prior written consent, except to an Affiliate of such Party or to a successor or acquirer of such Party, as the case may be, in connection with a merger or acquisition, or the sale of all or substantially all of the assigning Party's assets or the sale of that portion of the assigning Party's business to which this Agreement relates. Any purported assignment in violation of this Section 7.1 will be null and void without the prior written approval of the assignment by the non-assigning Party.

7.2 Governing Law. This Agreement shall be governed and construed in accordance with the internal, substantive laws of New York, United States of America, to the exclusion of any choice or conflict of laws rule or provision that would result in the application of the substantive law of any other jurisdiction. The United Nations Convention on Contracts for the International Sale of Goods shall not apply to the transactions contemplated by this Agreement.

7.3 Amendment and Waiver. No provision of or right under this Agreement shall be deemed to have been waived by any act or acquiescence on the part of either Party, its agents or employees, but only by an instrument in writing signed by an authorized officer of each Party. No waiver by either Party of any breach of this Agreement by the other Party shall be effective as to any other breach, whether of the same or any other term or condition and whether occurring before or after the date of such waiver.

7.4 Successors and Assigns. This Agreement shall be binding upon and inure to the benefit of the Parties and their respective successors and permitted assigns.

7.5 Notices. Unless otherwise provided herein, any notice, report, payment or document to be given by one Party to the other shall be in writing and shall be deemed given when delivered personally or mailed by certified or registered mail, postage prepaid (such mailed notice to be effective on the date which is three (3) Business Days after the date of mailing), or sent by internationally recognized overnight courier (such notice sent by courier to be effective one Business Day after it is deposited with such courier), or sent by telefax (such notice sent by telefax to be effective when sent, if confirmed by certified or registered mail or overnight courier as aforesaid) to the address set forth on the signature page to this Agreement or to such other place as either Party may designate as to itself by written notice to the other Party.

7.6 Entire Agreement. The terms and provisions contained in this Agreement (including the Attachments) constitute the entire understanding of the Parties with respect to the transactions and matters contemplated hereby and supersede all previous communications, representations, agreements and understandings relating to the subject matter hereof. No representations, inducements, promises or agreements, whether oral or otherwise, between the Parties not contained in this Agreement shall be of any force or effect. No agreement or understanding extending this Agreement or varying its terms (including any inconsistent terms in any purchase order, acknowledgment or similar form) shall be binding upon either Party unless it is in a writing specifically referring to this Agreement and signed by a duly authorized representative of the applicable Party. This Agreement is made in the English language and the English version of this Agreement shall control; in the event that any translation of this Agreement is made such translation shall be for informational purposes only and such translation shall not form part of this Agreement and only the English text shall be valid and legal.

7.7 Severability. In the event any provision of this Agreement shall for any reason be held to be invalid, illegal or unenforceable in any respect, such invalidity, illegality or unenforceability shall not affect any other term or provision hereof. The Parties agree that they will negotiate in good faith or will permit a court to replace any provision hereof so held invalid, illegal or unenforceable with a valid provision that is as similar as possible in substance to the invalid, illegal or unenforceable provision.

7.8 Captions. Captions of the sections and subsections of this Agreement are for reference and convenience purposes only and do not constitute terms or conditions of this Agreement and shall not limit or affect the meaning or construction of the terms and conditions hereof.

7.9 Word Meanings. Words such as *herein*, *hereinafter*, *hereof* and *hereunder* refer to this Agreement as a whole and not merely to a section or paragraph in which such words appear, unless the context otherwise requires. The singular shall include the plural, and each masculine, feminine and neuter reference shall include and refer also to the others, unless the context otherwise requires.

7.10 Conflict or Inconsistency. In the event of any conflict or inconsistency between the terms and conditions of this Agreement and any terms or conditions set forth in any purchase order or other document relating to the transactions contemplated by this Agreement, the terms and conditions set forth in this Agreement shall prevail.

7.11 Counterparts. This Agreement may be executed in multiple counterparts, each of which shall be deemed an original, but all of which together shall constitute one and the same instrument.

7.12 Force Majeure. “*Force Majeure*” means acts of God, wars (declared or undeclared and including the continuance, expansion or new outbreak of any war or conflict now in existence), revolution, civil commotion, acts of public enemy, labor strikes (other than employees of the Affected Party, as defined herein), terrorism, embargo or acts of government in its sovereign capacity. Except as otherwise provided in this Agreement, in the event that a delay or failure of a Party (the “*Affected Party*”) to comply with any obligation created by this Agreement is caused by Force Majeure, the Affected Party will, after giving prompt notice to the other Party (the “*Disadvantaged Party*”), be excused from such performance on a day-to-day basis during the continuance of such prevention, restriction, or interference (and the Disadvantaged Party will likewise be excused from performance of its obligations on a day-to-day basis during the same period), provided, however, that the Affected Party will use its best efforts to avoid or remove the causes of nonperformance and both Parties will proceed immediately with the performance of their obligations under this Agreement whenever the causes are removed or cease. If Force Majeure conditions continue for more than 45 consecutive days or an aggregate 90 days in any 12-month period, then the Disadvantaged Party may terminate this Agreement in accordance with Section 6.4(c).

7.13 Further Assurances. Each Party covenants and agrees that, subsequent to the execution and delivery of this Agreement and without any additional consideration, it will execute and deliver any further legal instruments and perform any acts that are or may become reasonably necessary to effectuate the purposes of this Agreement.

7.14 Dispute Resolution.

(a) Any disputes arising under this Agreement or connected herewith that the Parties are unable to resolve amicably within thirty (30) days after written notice thereof from one Party to the other shall be settled, solely and exclusively, by an arbitration to be conducted by one arbitrator in accordance with the Rules of Conciliation and Arbitration of the International Chamber of Commerce then in effect, excepting those disputes requiring injunctive relief, which shall be governed by Section 7.14(b). If the Parties are unable to agree on a single arbitrator, then such binding arbitration shall be conducted before a panel of three (3) arbitrators that shall be comprised of one (1) arbitrator designated by each Party and a third arbitrator designated by the two (2) arbitrators separately designated by the Parties. Unless the Parties agree otherwise, the arbitration proceedings shall take place in San Francisco, CA and, the arbitrator(s) shall apply the laws of the State of New York and the United States without reference to conflicts of law rules that would result in the application of the laws of another jurisdiction, to all issues in dispute. All arbitration proceedings shall be conducted in English. The findings of the arbitrator(s) shall be final and binding on the Parties. Judgment may be entered in any court of appropriate jurisdiction, or application may be made to that court for a judicial acceptance of the award and an order of enforcement, as the Party seeking to enforce that award may elect.

(b) In the event of any breach by either Party of any of the provisions of this Agreement that would cause immediate and irreparable injury to the other Party, the non-breaching Party shall be entitled to seek injunctive relief and any or all other remedies applicable at law or in equity in any court of applicable jurisdiction.

7.15 Attorneys' Fees. If any arbitral or other proceeding is initiated by either of the Parties, the prevailing Party shall be entitled to recover from the other Party reasonable attorneys' fees and arbitration or proceedings costs in addition to any other relief that may be awarded.

7.16 Remedies. All remedies set forth in this Agreement are cumulative and are in addition to any and all other remedies provided to either Party at law or in equity. The failure of a Party to enforce, at any time, or for any period of time, any of the provisions of this Agreement, or of any breach hereof, shall not be construed as a waiver of such provision or subsequent breach of the same or any other provision or of the rights of such Party thereafter to enforce such provision, nor shall either Party's continued dealing with the other Party following a breach of any provision hereof be deemed to be a waiver of such or any other breach.

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IN WITNESS WHEREOF the Parties have caused this Agreement to be executed on their behalf by their duly authorized representatives intending it to take effect as an instrument under seal as of the Effective Date.

ALX ONCOLOGY INC.

By: /s/ Jaume Pons

Name: Jaume Pons

Title: President

Notice Address

ALX Oncology Inc.
866 Malcolm Road, Suite 100
Burlingame, CA 94010
USA
Attn: Chief Executive Officer

TOLLNINE, INC.

By: /s/ Jaume Pons

Name: Jaume Pons

Title: CEO

Notice Addresses:

Tollnine, Inc.
1700 Owens Street, Suite 595
San Francisco, CA 94158
USA
Attn: Chief Executive Officer

Attachments

Attachment 1: Description of Services

Attachment 2 Compensation

Attachment 1

Services to be provided to Tollnine by ATI

The Services to be performed by ATI, initially, shall include the following as specified from time to time pursuant to Section 2.1:

- Propose research and development programs and related budgets and submit same to Tollnine for consideration and approval.
- Carry out agreed basic and developmental research work in accordance with the agreed upon Services and the agreed upon budgeted amount.
- Hire, train and supervise appropriately skilled and qualified research staff.
- Prepare related progress reports on research for Tollnine.
- Carry out the design of preclinical and clinical trial protocols and oversee all clinical development, including preparation and submission of regulatory filings, interactions with regulatory authorities and drug safety monitoring.
- Manage clinical trials through the hiring of Clinical Research Organizations (“CROs”), overseeing the performance of such CROs and conducting analysis and interpretation of data.
- Negotiate agreements with other Suppliers, as needed.
- Supervise and interface with Suppliers.
- Prepare regulatory documents and filings on a timely basis.
- Assist Tollnine with intellectual property protection matters and prosecute patent applications within the New Patents.
- Assist Tollnine, on an as agreed basis, with other matters related to its development program, such as selection of, negotiations with and supervision of GMP manufacturing sources.

Attachment 2

Compensation

As full consideration for the provision of Services by ATI hereunder, Tollnine shall pay to ATI a fee (the “**Service Fee**”) equal to the sum of the amounts described in paragraphs (a) and (d) for such period.

(a) An amount equal to the costs incurred by ATI with respect to the provision of the Services, plus a mark-up equal to 10% of such costs.

(b) For greater clarity, the costs reasonably attributable to the provision of the Services shall include, but are not limited to, salaries and related costs, and other costs or expenses incurred in rendering the Services.

(c) The Parties shall review the provisions for determining Compensation hereunder annually in order to ensure that they continue to reflect an arm’s-length basis of compensation consistent with the requirements of § 482 of the Internal Revenue Code of 1986, as amended, and the regulations promulgated thereunder (“**§ 482**”). The Service Fee may also be adjusted, retrospectively or prospectively, if the Parties mutually agree in writing that an adjustment is required to comply with the arm’s length standard under § 482.

(d) An amount equal to the costs incurred by ATI with respect to the services of subcontractors or Suppliers in connection with the provision of the Services, plus, as periodically agreed between the Parties, a mark-up equal to mutually agreed percentage of such costs. ATI will invoice Tollnine for such costs in United States Dollars.