Registration Number 333-

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

FORM S-1

REGISTRATION STATEMENT UNDER THE SECURITIES ACT OF 1933

ACHIEVE LIFE SCIENCES, INC.

(Exact name of Registrant as specified in its charter)

Delaware

(State or other jurisdiction of incorporation or organization)

2835

(Primary Standard Industrial Classification Code Number)

95-4343413 (I.R.S. Employer Identification Number)

1040 West Georgia Street, Suite 1030 Vancouver, British Columbia, V6E 4H1 (604) 210-2217

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

Richard Stewart
Chairman and Chief Executive Officer
Achieve Life Sciences, Inc.
1040 West Georgia Street, Suite 1030
Vancouver, British Columbia, V6E 4H1
(604) 210-2217

(Name, address, including zip code, and telephone number, including area code, of agent for service)

Copies to:
Alan Smith
Amanda Rose
Chelsea Anderson
Fenwick & West LLP
1191 2nd Ave, 10th Floor
Seattle, WA 98101
(206) 389-4510

Approximate date of commencement of proposed sale to the public: From time to time after the effectiveness of this registration statement.

f this Form is filed to register additional secur	rities for an offering pursuant to Rule 462(b) under	the Securities Act please check the following b	ox and list the Securities Act registration statement number of
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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. 🗵

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, a 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 \square
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 Securities Act. \square

CALCULATION OF REGISTRATION FEE

	Amount to be	Proposed maximum	Proposed maximum	Amount of
Title of each class of securities to be registered	registered (1)	offering price per unit (2)	aggregate offering price(2)	registration fee
Common Stock, \$0.001 par value per share	10,332,801	\$0.4275	\$4,417,789	\$573

- (1) Pursuant to Rule 416 under the Securities Act of 1933, this Registration Statement shall also cover any additional shares of common stock which become issuable by reason of any stock dividend, stock split or other similar transaction effected without the receipt of consideration that results in an increase in the number of outstanding shares of the registrant's common stock.
- (2) In accordance with Rule 457(c) under the Securities Act of 1933, the aggregate offering price of the registrant's common stock is estimated solely for the purpose of calculating the registration fees due for this filing. For the initial filing of this Registration Statement, this estimate was based on the average of the high and low sales price of the registrant's common stock reported by The Nasdaq Capital Market on June 4, 2020.

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 Securities and Exchange Commission, acting pursuant to said Section 8(a), may determine.

THE INFORMATION IN THIS PRELIMINARY PROSPECTUS IS NOT COMPLETE AND MAY BE CHANGED. THESE SECURITIES MAY NOT BE SOLD UNTIL THE REGISTRATION STATEMENT FILED WITH THE SECURITIES AND EXCHANGE COMMISSI ON IS EFFECTIVE. THIS PRELIMINARY PROSPECTUS IS NOT AN OFFER TO SELL NOR DOES IT SEEK AN OFFER TO BUY THESE SECURITIES IN ANY JURISDICTION WHERE THE OFFER OR SALE IS NOT PERMITTED.

SUBJECT TO COMPLETION DATED JUNE 5, 2020

PROSPECTUS



ACHIEVE LIFE SCIENCES, INC.

10,332,801 Shares of Common Stock

This prospectus relates to the registration for potential offer and sale from time to time of up to 10,332,801 shares of our common stock, par value \$0.001 per share (the "Shares"), by the selling stockholders identified in the "Selling Stockholders" section of this prospectus. The Shares registered hereunder consist of (i) outstanding shares held by certain of the selling stockholders and (ii) shares issuable to certain of the selling stockholders upon exercise of certain outstanding common stock purchase warrants held by such selling stockholders (the "Warrants"). For more information regarding the Shares, see "Selling Stockholders" herein.

The selling stockholders may sell the Shares directly to purchasers or through underwriters, broker-dealers or agents, who may receive compensation in the form of discounts, concessions or commissions. The selling stockholders may sell the Shares at any time at market prices prevailing at the time of sale or at privately negotiated prices. For more information regarding the selling stockholders and the sale of the Shares, see "Selling Stockholders" and "Plan of Distribution" herein.

We are not selling any securities under this prospectus and will not receive any of the proceeds from the sale of the Shares by the selling stockholders. We will pay the expenses incurred in registering the Shares, including legal and accounting fees.

Our common stock is traded on The Nasdaq Capital Market under the symbol "ACHV." On June 4, 2020, the closing price of our common stock was \$0.45 per share.

Investing in our securities involves risks. See "Risk Factors" commencing on page 3. You should carefully read this prospectus, the documents incorporated herein, and, if applicable, any prospectus supplement subsequently filed with respect to this prospectus, before making any investment decision.

Neither the Securities and Exchange Commission nor any state securities commission has approved or disapproved of these securities or passed upon the adequacy or accuracy of this prospectus. Any representation to the contrary is a criminal offense.

The date of this prospectus is June 5, 2020

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INFORMATION CONTAINED IN THIS PROSPECTUS

Neither we nor the selling stockholders have authorized any dealer, agent or other person to give any information or to make any representation other than those contained or incorporated by reference in this prospectus and, if applicable, any accompanying prospectus supplement or any free writing prospectus. Neither we nor the selling stockholders take any responsibility for, and provide no assurance as to the reliability of, any other information that others may give you. This prospectus and, if applicable, any accompanying prospectus supplement or any free writing prospectus, do not constitute an offer to sell or the solicitation of an offer to buy any securities other than the registered securities to which they relate, nor do this prospectus and, if applicable, any accompanying prospectus supplement or any free writing prospectus constitute an offer to sell or the solicitation of an offer to buy securities in any jurisdiction to any person to whom it is unlawful to make such offer or solicitation in such jurisdiction. You should not assume that the information contained in this prospectus and, if applicable, any accompanying prospectus supplement or any free writing prospectus, is accurate on any date subsequent to the date set forth on the front of the document or that any information we have incorporated by reference is correct on any date subsequent to the date of the document incorporated by reference, even though this prospectus and, if applicable, any accompanying prospectus supplement or any free writing prospectus, is delivered or securities are sold on a later date.

This prospectus may be supplemented from time to time by one or more prospectus supplements. Any such prospectus supplements may include additional information, such as additional risk factors or other special considerations applicable to us, our business or results of operations or our common stock, and may also update or change the information in this prospectus. If there is any inconsistency between the information in this prospectus supplement, you should rely on the information in the prospectus supplement.

For investors outside the United States, neither we nor the selling stockholder has 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 in the U.S. Persons who come into possession of this prospectus and any free writing prospectus related to this offering in jurisdictions outside the U.S. are required to inform themselves about and to observe any restrictions as to this offering and the distribution of this prospectus and any such free writing prospectus applicable to that jurisdiction.

PROSPECTUS SUMMARY

The following summary is qualified in its entirety by, and should be read together with, the more detailed information and financial statements and related notes thereto incorporated by reference into this prospectus. Before you decide to invest in our common stock, you should read the entire prospectus carefully, including the risk factors and the financial statements and related notes incorporated by reference into this prospectus. Unless the context requires otherwise, in this prospectus the terms "Achieve," the "Company," "we," "us" and "our" refer to Achieve Life Sciences, Inc., together with its subsidiaries, taken as a whole. This prospectus includes trademarks, service marks and trade names owned by us or other companies. All trademarks, service marks and trade names included in this prospectus are the property of their respective owners.

Company Overview

We are a clinical-stage pharmaceutical company committed to the global (excluding Central & Eastern Europe plus other territories) development and commercialization of cytisinicline for smoking cessation and nicotine addiction. Our primary focus is to address the global smoking and nicotine addiction epidemic, which is a leading cause of preventable death and is responsible for more than eight million deaths annually worldwide. We may expand our focus to address other methods of nicotine addiction such as e-cigarettes/vaping.

Our management team has significant experience in growing emerging companies focused on the development of under-utilized pharmaceutical compounds to meet unmet medical needs. We intend to use this experience to develop and ultimately commercialize cytisinicline either directly or via strategic collaborations.

We are planning a Phase 3 trial designed to evaluate the efficacy and safety of 3 mg TID of cytisinicline in smokers within the United States. Due to the COVID-19 pandemic, we are monitoring the feasibility of initiating the Phase 3 trial, and currently plan to initiate in the second half of 2020, subject to the status of the COVID-19 pandemic and the availability of capital.

Business Organization

We were incorporated in California in October 1991 and subsequently reorganized as a Delaware corporation in March 1995. Our principal executive offices are located at 1040 West Georgia Street, Suite 1030, Vancouver, B.C. V6E 4H1, and our telephone number is (604) 210-2217.

In August 2017, our company, then named OncoGenex Pharmaceuticals, Inc., completed its merger, or the Arrangement, with Achieve, as contemplated by the Merger Agreement between the companies. We then changed our name to Achieve Life Sciences, Inc. As a result of the Arrangement, Achieve became our wholly owned subsidiary. Achieve was formed in 2015 as a Delaware corporation. Extab Corporation, a Delaware corporation, which was formed in 2009, is also our wholly-owned subsidiary. Achieve Pharma UK Limited, a United Kingdom company, which was formed in 2009, is our indirectly owned subsidiary. As used in this prospectus, the term "OncoGenex" refers to our business prior to August 1, 2017.

Description of the Private Placement

In April 2020, we entered into subscription agreements with certain accredited investors, pursuant to which we agreed to sell and issue, in a series of private placement transactions, up to 5,615,653 units at a purchase price of \$0.33 per unit, with each unit consisting of one share of common stock and a common stock purchase warrant to purchase 0.75 shares of common stock. The warrants issued pursuant to the subscription agreements executed on April 27, 2020 are exercisable at a price per share of common stock of \$0.362, subject to adjustment, and the warrants issued pursuant to the subscription agreements executed on April 28, 2020 are exercisable at a price per share of common stock of \$0.366, subject to adjustment. The warrants are exercisable beginning on October 27, 2020 and will expire on April 27, 2025. In connection with the private placement, we also issued a warrant to the placement agent to purchase up to 505,409 shares of common stock at an initial purchase price of \$0.3795 per share, subject to adjustment. We received approximately \$1.6 million in net proceeds from the private placements.

This prospectus is part of a registration statement that we have filed with the Securities and Exchange Commission (the "Commission") to register 10,332,801 shares of our common stock acquired in the private placements (the "Shares"). The shares of common stock registered hereunder consist of (i) outstanding shares held by the selling stockholders and (ii) shares issuable upon exercise of the warrants issued in the private placements. The Shares are being registered for resale or other disposition by the selling stockholders. We will not receive any proceeds from the sale or other disposition of the Shares registered hereunder, or interests therein.

RISK FACTORS

Investing in our common stock involves a high degree of risk. Prior to making a decision about investing in our securities, you should carefully consider the risks and uncertainties described under Item 1A. "Risk Factors" in our Quarterly Report on Form 10-Q filed with the Commission on May 14, 2020, which is incorporated by reference herein, together with all of the other information contained in this prospectus and documents incorporated by reference herein. If any of the risks described herein or therein actually occur, our business, financial condition and results of operations could suffer. Additional risks and uncertainties beyond those set forth in this prospectus or in our reports filed with the Commission and incorporated herein by reference and not presently known to us or that we currently deem immaterial may also affect our operations. The trading price of our securities could decline due to any of these risks and uncertainties, and, as a result, you may lose all or part of your investment.

FORWARD-LOOKING STATEMENTS

This prospectus contains or incorporates by reference "forward-looking statements" within the meaning of the Private Securities Litigation Reform Act of 1995. These forward-looking statements involve a number of risks and uncertainties. We caution readers that any forward-looking statement is not a guarantee of future performance and that actual results could differ materially from those contained in the forward-looking statement. These statements are based on current expectations of future events. Such statements include, but are not limited to, statements about future financial and operating results, plans, objectives, expectations and intentions, costs and expenses, interest rates, outcome of contingencies, financial condition, results of operations, liquidity, business strategies, cost savings, objectives of management and other statements that are not historical facts. You can find many of these statements by looking for words like "believes," "expects," "anticipates," "estimates," "may," "should," "will," "could," "plan," "intend," or similar expressions in this prospectus or in documents incorporated by reference into this prospectus. We intend that such forward-looking statements be subject to the safe harbors created thereby. Examples of these forward-looking statements include, but are not limited to:

- · our ability to continue as a going concern, our anticipated future capital requirements and the terms of any capital financing agreements;
- progress and preliminary and future results of any clinical trials;
- anticipated regulatory filings, requirements and future clinical trials;
- the effects of COVID-19 on our business and financial results;
- · timing and amount of future contractual payments, product revenue and operating expenses; and
- market acceptance of our products and the estimated potential size of these markets.

These forward-looking statements are based on the current beliefs and expectations of our management and are subject to significant risks and uncertainties. If underlying assumptions prove inaccurate or unknown risks or uncertainties materialize, actual results may differ materially from current expectations and projections. Factors that might cause such a difference include the risk factors identified under the caption "Risk Factors" in this prospectus, as well as those identified under Item 1A. "Risk Factors" in our Quarterly Report on Form 10-Q, filed with the Commission on May 14, 2020 and other documents we have filed with the Commission that are incorporated herein by reference.

You are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the date of this prospectus or, in the case of documents referred to or incorporated by reference, the date of those documents.

All subsequent written or oral forward-looking statements attributable to us or any person acting on our behalf are expressly qualified in their entirety by the cautionary statements contained or referred to in this section. We do not undertake any obligation to release publicly any revisions to these forward-looking statements to reflect events or circumstances after the date of this prospectus or to reflect the occurrence of unanticipated events, except as may be required under applicable U.S. securities law. If we do update one or more forward-looking statements, no inference should be drawn that we will make additional updates with respect to those or other forward-looking statements.

USE OF PROCEEDS

The proceeds from the sale of the Shares offered pursuant to this prospectus are solely for the accounts of the selling stockholders. Accordingly, we will not receive any of the proceeds from the sale of the Shares offered by this prospectus. See "Selling Stockholders" and "Plan of Distribution" below.

SELLING STOCKHOLDERS

The Shares being offered by the selling stockholders under this prospectus consist of (i) outstanding shares held by certain of the selling stockholders and (ii) shares issuable to certain of the selling stockholders upon exercise of certain outstanding common stock purchase warrants issued to such selling stockholders (the "Warrants"). We have agreements in place with the selling stockholders in which we have agreed to file a registration statement with the Commission covering the resale of shares of our capital stock, and this registration statement has been filed pursuant to those agreements.

The table below lists the selling stockholders and other information regarding their beneficial ownership (as determined under Section 13(d) of the Securities Exchange Act of 1934, as amended (the "Exchange Act"), and the rules and regulations thereunder) of our common stock as of May 14, 2020. Under Section 13(d) of the Exchange Act, beneficial ownership generally includes voting or investment power with respect to securities, including any securities that grant the holder the right to acquire shares of common stock within 60 days of the date of determination. These shares are deemed to be outstanding for the purpose of computing the percentage ownership of the person holding those securities, but they are not treated as outstanding for the purpose of computing the percentage ownership of any other person. The percentage ownership data is based on 37,515,408 shares of our common stock issued and outstanding as of May 14, 2020 (as reflected in the records of our stock transfer agent).

We have prepared the table below based on information furnished to us by or on behalf of the selling stockholders. The second column of the table lists the number of shares of common stock beneficially owned by the selling stockholders as of May 14, 2020, taking into account a 4.99% beneficial ownership limitation contained in the Warrants (the "Ownership Limitations"). The third column of the table lists the Shares being offered under this prospectus by the selling stockholders or by those persons or entities to whom they transfer, donate, devise, pledge or distribute their Shares or by other successors in interest, and does not take into account the Ownership Limitations.

Because, among other things, the exercise of the Warrants is at the option of the holders and may be limited by the Ownership Limitations, the number of shares of common stock that will actually be issued to the selling stockholders pursuant to the Warrants may be more or less than the number of Shares being offered by this prospectus. In addition, the Shares may be sold pursuant to this prospectus or in privately negotiated transactions. See "Plan of Distribution." Because the selling stockholders may sell all, some or none of their Shares in this offering and because there are currently no agreements, arrangements or undertakings with respect to the sale of any of the Shares, we cannot estimate the number of Shares the selling stockholders will sell under this prospectus. The fourth column of the table assumes the sale of all of the Shares offered by the selling stockholders pursuant to this prospectus.

The selling stockholders have not held any position or office or had any other material relationship with us or any of our predecessors or affiliates within the past three years, other than the acquisition and beneficial ownership of the Shares described in the tables below or other of our debt or equity securities.

Unless otherwise indicated in the footnotes below, we believe that the selling stockholders have sole voting and investment power with respect to all shares of our common stock beneficially owned by them. Since the date on which they provided us with the information below, the selling stockholders may have sold, transferred or otherwise disposed of some or all of their shares in transactions exempt from the registration requirements of the Securities Act.

Name of Selling Stockholder	Stock Own	res of Common ed Prior to ring	Maximum Number of Shares of Common Stock to be Sold Pursuant to this Prospectus		res of Common After Offering
	Number	Percentage (%)		Number	Percentage (%)

Arnold, Paul &	292,250	*	292,250	_	*
Mary Jo(1)	·				
Bader, Lars(2)	700,000	1.9%	700,000	_	*
Bahr Family Limited	87,500	*	87,500	-	*
Partnership(3)					
Bialick, Howard A & Mary B ⁽⁴⁾	427,288	1.1%	350,000	77,288	*
Cohen, Marc(5)	175,000	*	175,000	_	*
Collegiate Tutoring(6)	36,750	*	36,750	_	*
De La Torre III, Elias(7)	612,500	1.6%	612,500	_	*
Errico, Joseph Peter(8)	350,000	*	350,000	_	*
Errico, Thomas ⁽⁹⁾	350,000	*	350,000	_	*
Frederick, Thomas(10)	350,000	*	350,000	_	*
Gheith, Ghassan(11)	157,500	*	157,500	_	*
Goldstein, Julie A(12)	996,271	2.7%	536,271	460,000	1.2%
Krytus, Martin(13)	1,750,000	4.7%	1,750,000	_	*
Lymburner, Francis ⁽¹⁴⁾	387,121	1.0%	387,121	_	*
MIS Equity Strategies, LP(15)	175,000	*	175,000	_	*
Mollick, Thomas(16)	1,200,000	3.2%	525,000	675,000	1.8%
Patel, Kinjal & Victoria Currall ⁽¹⁷⁾	87,500	*	87,500	-	*
PranaBio Investments LLC(18)	775,000	2.1%	175,000	600,000	1.6%
Rocco, David(19)	175,000	*	175,000	_	*
Shumpert, Stephen(20)	350,000	*	350,000	_	*
Topkis, Douglas(21)	542,500	1.4%	542,500	_	*
Zukowski, Donald(22)	350,000	*	350,000	_	*
Skillern, Brian(23)	175,000	*	175,000	_	*
Rotter, Edward ⁽²⁴⁾	175,000	*	175,000	_	*
Velcro, LLC(25)	350,000	*	350,000	_	*
Chitayat Holdings LLC(26)	175,000	*	175,000	_	*
Chieco, Michael(27)	125,500	*	87,500	38,000	*
Gomes, Gregory(28)	175,000	*	175,000	_	*
Moken, Merri(29)	175,000	*	175,000	_	*
Algendi, Hazem(30)	35,974	*	35,974	_	*
Clark, Christopher(31)	46,194	*	46,194	-	*

Davis, Trent(32)	8,120	*	8,120	_	*
Landstrom, Albert(33)	13,177	*	13,177	_	*
Parigian, Thomas(34)	46,194	*	46,194	_	*
Saccaro, Gary(35)	17,569	*	17,569	_	*
Setteducati, Robert(36)	46,194	*	46,194	_	*
Sexton, Mason(37)	4,500	*	4,500	_	*
Striplin, Harry(38)	2,436	*	2,436	_	*
Alexander Winks, Malcolm ⁽³⁹⁾	8,120	*	8,120	-	*
Wojnowski, Donald(40)	190,591	*	190,591	_	*
Wypych, Marta(41)	7,581	*	7,581	_	*
Paulson Investment Company, LLC(42)	78,759	*	78,759	-	*

^{*} Represents beneficial ownership of less than one percent of the outstanding shares of our common stock.

- The shares of common stock beneficially owned prior to this offering include (i) 167,000 shares of common stock and (ii) 125,250 shares of common stock issuable upon exercise of Warrants held by Paul Michael Arnold and Mary Jo Arnold.
- (2) The shares of common stock beneficially owned prior to this offering include (i) 400,000 shares of common stock and (ii) 300,000 shares of common stock issuable upon exercise of Warrants held by Lars Bader.
- (3) The shares of common stock beneficially owned prior to this offering include (i) 50,000 shares of common stock and (ii) 37,500 shares of common stock issuable upon exercise of Warrants held by Bahr Family, L.P. Robert Bahr, in his capacity as Trustee of the general partner of Bahr Family, L.P., may also be deemed to have investment discretion and voting power over the shares held by Bahr Family, L.P. The address for Bahr Family, L.P. is PO Box 392 Mirror Lake, NH 03853.
- (4) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 227,288 shares of common stock issuable upon exercise of Warrants held by Howard Bialick and Mary Bialick.
- (5) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Marc Cohen.
- (6) The shares of common stock beneficially owned prior to this offering include (i) 21,000 shares of common stock and (ii) 15,750 shares of common stock issuable upon exercise of Warrants held Collegiate Tutoring. Robert A. Ertner, in his capacity as President of Collegiate Tutoring, may also be deemed to have investment discretion and voting power over the shares held by Collegiate Tutoring. The address for Collegiate Tutoring is 19 Guynn Bridge Ct, Chico, CA 95926.
- (7) The shares of common stock beneficially owned prior to this offering include (i) 350,000 shares of common stock and (ii) 262,500 shares of common stock issuable upon exercise of Warrants held by Elias De La Torre III.
- (8) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Joseph Peter Errico.
- (9) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Thomas Joseph Errico.
- (10) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Thomas Frederick.
- (11) The shares of common stock beneficially owned prior to this offering include (i) 90,000 shares of common stock and (ii) 67,500 shares of common stock issuable upon exercise of Warrants held by Ghassan Gheith.
- (12) The shares of common stock beneficially owned prior to this offering include (i) 536,441 shares of common stock and (ii) 459,830 shares of common stock issuable upon exercise of Warrants held by Julie A. Goldstein.
- (13) The shares of common stock beneficially owned prior to this offering include (i) 1,000,000 shares of common stock and (ii) 750,000 shares of common stock issuable upon exercise of Warrants held by Martin Todd Krytus.
- (14) The shares of common stock beneficially owned prior to this offering include (i) 221,212 shares of common stock and (ii) 165,909 shares of common stock issuable upon exercise of Warrants held by Francis Lymburner.
- (15) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by MIS Equity Strategies, L.P. Tony Reed, in his capacity as Manager of the general partner of MIS Equity Strategies, L.P., may also be deemed to have investment discretion and voting power over the shares held by MIS Equity Strategies, L.P. The address for MIS Equity Strategies, L.P. is 16217 Kittridge St, Van Nuys, CA 91406.
- (16) The shares of common stock beneficially owned prior to this offering include (i) 525,000 shares of common stock and (ii) 675,000 shares of common stock issuable upon exercise of Warrants held by Thomas C. Mollick.
- (17) The shares of common stock beneficially owned prior to this offering include (i) 50,000 shares of common stock and (ii) 37,500 shares of common stock issuable upon exercise of Warrants held by Kinjal Ramesh Patel and Victoria Currall.
- (18) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 675,000 shares of common stock issuable upon exercise of Warrants held by PranaBio Investments, L.L.C. Samir Patel, in his capacity as Managing Member of PranaBio Investments, L.L.C., may also be deemed to have investment discretion and voting power over the shares held by PranaBio Investments, L.L.C. The address for PranaBio Investments, L.L.C. is 1701 Chicon St, Austin, TX 78702.
- (19) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by David Rocco.
- (20) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Stephen Shumpert.

- (21) The shares of common stock beneficially owned prior to this offering include (i) 310,000 shares of common stock and (ii) 232,500 shares of common stock issuable upon exercise of Warrants held by Douglas Topkis.
- (22) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Donald A. Zukowski.
- (23) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Brian Skillern.
- (24) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Edward Rotter.
- (25) The shares of common stock beneficially owned prior to this offering include (i) 200,000 shares of common stock and (ii) 150,000 shares of common stock issuable upon exercise of Warrants held by Velcro, L.L.C. Brian M. Miller, in his capacity as Manager of Velcro, L.L.C., may also be deemed to have investment discretion and voting power over the shares held by Velcro, L.L.C. The address for Velcro, L.L.C. is c/o Alliance Trust Company 100 West Liberty St., Ste 100, Reno, NV 89501.
- (26) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Chitayat Holdings, L.L.C. Jack Chitayat, in his capacity as Manager of Chitayat Holdings, L.L.C., may also be deemed to have investment discretion and voting power over the shares held by Chitayat Holdings, L.L.C. The address for Chitayat Holdings, L.L.C. is 1009 Solymar Dr, La Jolla, CA 92037.
- (27) The shares of common stock beneficially owned prior to this offering include (i) 50,000 shares of common stock and (ii) 75,500 shares of common stock issuable upon exercise of Warrants held by Michael G. Chieco.
- (28) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Gregory Gomes.
- (29) The shares of common stock beneficially owned prior to this offering include (i) 100,000 shares of common stock and (ii) 75,000 shares of common stock issuable upon exercise of Warrants held by Merri Carole Moken.
- (30) The shares of common stock beneficially owned prior to this offering include 35,974 shares of common stock issuable upon exercise of Warrants held by Hazem Algendi.
- (31) The shares of common stock beneficially owned prior to this offering include 46,194 shares of common stock issuable upon exercise of Warrants held by Christopher Clark.
- (32) The shares of common stock beneficially owned prior to this offering include 8,120 shares of common stock issuable upon exercise of Warrants held by Trent Davis.
- (33) The shares of common stock beneficially owned prior to this offering include 13,177 shares of common stock issuable upon exercise of Warrants held by Albert Landstrom.
- (34) The shares of common stock beneficially owned prior to this offering include 46,194 shares of common stock issuable upon exercise of Warrants held by Thomas Parigian.
- (35) The shares of common stock beneficially owned prior to this offering include 17,569 shares of common stock issuable upon exercise of Warrants held by Gary Saccaro.
- (36) The shares of common stock beneficially owned prior to this offering include 46,194 shares of common stock issuable upon exercise of Warrants held by Robert Setteducati.
- (37) The shares of common stock beneficially owned prior to this offering include 4,500 shares of common stock issuable upon exercise of Warrants held by Mason Sexton.
- (38) The shares of common stock beneficially owned prior to this offering include 2,436 shares of common stock issuable upon exercise of Warrants held by Harry Striplin.
- (39) The shares of common stock beneficially owned prior to this offering include 8,120 shares of common stock issuable upon exercise of Warrants held by Malcolm Alexander Winks.
- (40) The shares of common stock beneficially owned prior to this offering include 190,591 shares of common stock issuable upon exercise of Warrants held by Donald Wojnowski.
- (41) The shares of common stock beneficially owned prior to this offering include 7,581 shares of common stock issuable upon exercise of Warrants held by Marta Wypych.
- (42) The shares of common stock beneficially owned prior to this offering include 78,759 shares of common stock issuable upon exercise of Warrants held by Paulson Investment Company, L.L.C. Malcolm Alexander Winks, in his capacity as President of Paulson Investment Company, L.L.C., may also be deemed to have investment discretion and voting power over the shares held by Paulson Investment Company, L.L.C. The address for Paulson Investment Company, L.L.C. is 5335 SW Meadows Road, Suite 465, Lake Oswego, OR 97035.

DESCRIP TION OF CAPITAL STOCK

The following description of our common stock summarizes the material terms and provisions of the common stock. Because it is only a summary, it may not contain all the information that is important to you. For the complete terms of our common stock, please refer to our certificate of incorporation, as amended and restated, and our amended and restated bylaws, which have been filed as exhibits to the registration statement of which this prospectus is a part, and by the relevant provisions of the Delaware General Corporation Law ("DGCL"). See "Where You Can Find Additional Information".

Common Stock

As of May 14, 2020, our authorized capital stock included 150,000,000 shares of common stock, par value \$0.001 per share, of which there were 37,515,408 shares outstanding as of May 14, 2020 (as reflected in the records of our stock transfer agent). A description of the material terms and provisions of our certificate of incorporation, as amended and restated, and our amended and restated bylaws affecting the rights of holders of our common stock is set forth below. The description is intended as a summary only, and is qualified in its entirety by reference to our certificate of incorporation, as amended and restated, and our amended and restated bylaws that are filed as exhibits to the registration statement of which this prospectus forms a part.

Voting Rights

For all matters submitted to a vote of stockholders, each holder of our common stock is entitled to one vote for each share registered in his or her name. Except as may be required by law and in connection with some significant actions, such as mergers, consolidations, or amendments to our certificate of incorporation that affect the rights of stockholders, holders of our common stock vote together as a single class. There is no cumulative voting in the election of our directors, which means that, subject to any rights to elect directors that are granted to the holders of any class or series of preferred stock, a plurality of the votes cast at a meeting of stockholders at which a quorum is present is sufficient to elect a director.

Liquidation

In the event we are liquidated, dissolved or our affairs are wound up, after we pay or make adequate provision for all of our known debts and liabilities, each holder of our common stock will be entitled to share ratably in all assets that remain, subject to any rights that are granted to the holders of any class or series of preferred stock.

Dividends

Subject to preferential dividend rights of any other class or series of stock, the holders of shares of our common stock are entitled to receive dividends, including dividends of our stock, as and when declared by our board of directors, subject to any limitations imposed by law and to the rights of the holders, if any, of our preferred stock. We have never paid cash dividends on our common stock. We do not anticipate paying periodic cash dividends on our common stock for the foreseeable future. Any future determination about the payment of dividends will be made at the discretion of our board of directors and will depend upon our earnings, if any, capital requirements, operating and financial conditions and on such other factors as the board of directors deems relevant.

Registration Rights

Certain of the selling stockholders hold registration rights pursuant to those Registration Rights Agreements, dated April 27, 2020 and April 28, 2020, respectively.

Other Rights and Restrictions

Subject to the preferential rights of any other class or series of stock, all shares of our common stock have equal dividend, distribution, liquidation and other rights, and have no preference, appraisal or exchange rights, except for any appraisal rights provided by Delaware law. Furthermore, holders of our common stock have no conversion, sinking fund or redemption rights, or preemptive rights to subscribe for any of our securities. Our certificate of incorporation and our bylaws do not restrict the ability of a holder of our common stock to transfer his or her shares of our common stock

The rights, powers, preferences and privileges of holders of our common stock are subject to, and may be adversely affected by, the rights of holders of shares of any series of preferred stock which we may designate and issue in the future.

Preferred Stock

Pursuant to our restated certificate of incorporation, we are authorized to issue "blank check" preferred stock, which may be issued from time to time in one or more series upon authorization by our board of directors. Our board of directors, without further approval of the stockholders, is authorized to fix the designation, powers, preferences, relative, participating optional or other special rights, and any qualifications, limitations and restrictions applicable to each series of the preferred stock. The issuance of preferred stock, while providing flexibility in connection with possible acquisitions and other corporate purposes could, among other things, adversely affect the voting power or rights of the holders of our common stock and, under certain circumstances, make it more difficult for a third party to gain control of us, discourage bids for our common stock at a premium or otherwise adversely affect the market price of the common stock.

Anti-Takeover Effects of Provisions of Our Charter Documents

Our certificate of incorporation and bylaws include a number of provisions that could deter hostile takeovers or delay or prevent changes in control of our company, including the following:

- only the chairman of the board, the chief executive officer, the president or a majority of our board of directors may call special meetings of stockholders, and the business transacted at special meetings of stockholders is limited to the business stated in the notice of such meetings;
- advance notice procedures for stockholders seeking to bring business before our annual meeting of stockholders or to nominate candidates for election as
 directors at our annual meeting of stockholders, including certain requirements regarding the form and content of a stockholder's notice;
- our board of directors may designate the terms of and issue new series of preferred stock;
- unless otherwise required by our bylaws, our certificate of incorporation or by law, our board of directors may amend our bylaws without stockholder approval;
 and
- only our board of directors may fill vacancies on our board of directors.

Anti-Takeover Effects of Provisions of Delaware Law

We are subject to the provisions of Section 203 of the DGCL, or Section 203. Under Section 203, we would generally be prohibited from engaging in any business combination with any interested stockholder for a period of three years following the time that this stockholder became an interested stockholder unless:

- prior to this time, our board of directors approved either the business combination or the transaction that resulted in the stockholder becoming an interested stockholder:
- upon completion of the transaction that resulted in the stockholder becoming an interested stockholder, the interested stockholder owned at least 85% of the voting stock of the corporation outstanding at the time the transaction commenced, excluding shares owned by persons who are directors and also officers, and 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
- at or subsequent to such time, the business combination is approved by our board of directors and authorized at a special or annual stockholders meeting, and not by written consent, by the affirmative vote of at least 66 2/3% of the outstanding voting stock that is not owned by the interested stockholder.

Under Section 203, a "business combination" includes:

- any merger or consolidation involving the corporation and the interested stockholder;
- any sale, transfer, pledge or other disposition of 10% or more of the assets of the corporation involving the interested stockholder;
- any transaction that results in the issuance or transfer by the corporation of any stock of the corporation to the interested stockholder, subject to limited exceptions:
- any transaction involving the corporation that has the effect of increasing the proportionate share of the stock of any class or series of the corporation beneficially owned by the interested stockholder; or
- the receipt by the interested stockholder of the benefit of any loans, advances, guarantees, pledges or other financial benefits provided by or through the corporation.

In general, Section 203 defines an interested stockholder as an entity or person beneficially owning 15% or more of the outstanding voting stock of the corporation and any entity or person affiliated with or controlling or controlled by such entity or person.

Exchange Listing

Our common stock is listed on The Nasdaq Capital Market under the symbol "ACHV."

Transfer Agent and Registrar

The transfer agent and registrar for our common stock is American Stock Transfer and Trust Company, LLC.

PLAN OF DISTRIBUTION

We are registering the Shares offered hereby to permit the resale of these Shares by the holders thereof from time to time after the date of this prospectus. We will not receive any of the proceeds from the sale by the selling stockholders of the Shares offered hereby. We will bear all fees and expenses incident to our obligation to register these Shares.

The selling stockholders may sell all or a portion of the Shares held by them and offered hereby from time to time directly or through one or more underwriters, broker-dealers or agents. If the Shares are sold through underwriters or broker-dealers, the selling stockholders will be responsible for underwriting discounts or commissions or agent's commissions. The Shares may be sold in one or more transactions at fixed prices, at prevailing market prices at the time of the sale, at varying prices determined at the time of sale or at negotiated prices. These sales may be effected in transactions, which may involve crosses or block transactions, pursuant to one or more of the following methods:

- · on any national securities exchange or quotation service on which the shares may be listed or quoted at the time of sale;
- in the over-the-counter market;
- in transactions otherwise than on these exchanges or systems or in the over-the-counter market;
 - through the writing or settlement of options, whether such options are listed on an options exchange or otherwise;
- ordinary brokerage transactions and transactions in which the broker-dealer solicits purchasers;
- block trades in which the broker-dealer will attempt to sell the shares as agent but may position and resell a portion of the block as principal to facilitate the transaction;
- purchases by a broker-dealer as principal and resale by the broker-dealer for its account;
- an exchange distribution in accordance with the rules of the applicable exchange;
- privately negotiated transactions;
- short sales made after the date the Registration Statement is declared effective by the Commission;
- broker-dealers may agree with a selling stockholder to sell a specified number of such shares at a stipulated price per share;
- a combination of any such methods of sale; and
- any other method permitted pursuant to applicable law.

The selling stockholders may also sell Shares under Rule 144 promulgated under the Securities Act, if available, rather than under this prospectus. In addition, the selling stockholders may transfer the Shares by other means not described in this prospectus. If the selling stockholders effect such transactions by selling Shares to or through underwriters, broker-dealers or agents, such underwriters, broker-dealers or agents may receive commissions in the form of discounts, concessions or commissions from the selling stockholders or commissions from purchasers of the Shares for whom they may act as agent or to whom they may sell as principal (which discounts, concessions or commissions as to particular underwriters, broker-dealers or agents may be in excess of those customary in the types of transactions involved). In connection with sales of the Shares or otherwise, the selling stockholders may enter into hedging transactions with broker-dealers, which may in turn engage in short sales of the Shares in the course of hedging in positions they assume. The selling stockholders may also sell shares of common stock short and deliver Shares covered by this prospectus to close out short positions and to return borrowed shares in connection with such short sales. The selling stockholders may also loan or pledge Shares to broker-dealers that in turn may sell such Shares.

The selling stockholders may pledge or grant a security interest in some or all of the Shares owned by them and, if they default in the performance of their secured obligations, the pledgees or secured parties may offer and sell the Shares from time to time pursuant to this prospectus or any amendment to this prospectus under Rule 424(b)(3) or other applicable provision of the Securities Act amending, if necessary, the list of selling stockholders to include the pledgee, transferee or other successors in interest as selling stockholders under this prospectus. The selling stockholders also may transfer and donate the Shares in other circumstances in which case the transferees, donees, pledgees or other successors in interest will be the selling beneficial owners for purposes of this prospectus.

To the extent required by the Securities Act and the rules and regulations thereunder, the selling stockholders and any broker-dealer participating in the distribution of Shares may be deemed to be "underwriters" within the meaning of the Securities Act, and any commission paid, or any discounts or concessions allowed to, any such broker-dealer may be deemed to be underwriting commissions or discounts under the Securities Act. At the time a particular offering of the Shares, a prospectus supplement, if required, will be distributed, which will set forth the aggregate amount of Shares being offered and the terms of the offering, including the name or names of any broker-dealers or agents, any discounts, commissions and other terms constituting compensation from the selling stockholders and any discounts, commissions or concessions allowed or re-allowed or paid to broker-dealers.

Under the securities laws of some states, Shares may be sold in such states only through registered or licensed brokers or dealers. In addition, in some states Shares offered hereby may not be sold unless such Shares have been registered or qualified for sale in such state or an exemption from registration or qualification is available and is complied with

There can be no assurance that any selling stockholder will sell any or all of the Shares registered pursuant to the registration statement of which this prospectus forms a part.

The selling stockholders and any other person participating in such distribution will be subject to applicable provisions of the Exchange Act and the rules and regulations thereunder, including, without limitation, to the extent applicable, Regulation M of the Exchange Act ("Regulation M"), which may limit the timing of purchases and sales of any Shares by the selling stockholders and any other participating person. To the extent applicable, Regulation M may also restrict the ability of any person engaged in the distribution of the Shares to engage in market-making activities with respect to the Shares. All of the foregoing may affect the marketability of the Shares and the ability of any person or entity to engage in market-making activities with respect to the Shares.

Once sold under the registration statement of which this prospectus forms a part, the Shares offered hereby will be freely tradable in the hands of persons other than our affiliates.

LEGAL MATTERS

The validity of the issuance of Shares offered hereby will be passed upon for us by Fenwick & West LLP, Seattle, Washington.

EXPERTS

The financial statements incorporated in this prospectus by reference to the Annual Report on Form 10-K for the year ended December 31, 2019 have been so incorporated in reliance on the report of PricewaterhouseCoopers LLP, an independent registered public accounting firm, given on the authority of said firm as experts in auditing and accounting.

WHERE YOU CAN FIND MORE INFORMATION

We are subject to the filing requirements of the Securities Exchange Act of 1934 (the "Exchange Act"). Therefore, we file annual, quarterly and other periodic reports, proxy statements and other information with the Securities and Exchange Commission. You can read our Securities and Exchange Commission filings, including this registration statement, over the Internet at the Securities and Exchange Commission's website at www.sec.gov.

Our Internet address is www.achievelifesciences.com. There we make available free of charge, on or through the investor relations section of our website, annual reports on Form 10-K, quarterly reports on Form 10-Q, current reports on Form 8-K and amendments to those reports filed pursuant to Section 13(a) or 15(d) of the Exchange Act as soon as reasonably practicable after we electronically file such material with the Securities and Exchange Commission. The information found on our website is not part of this prospectus and investors should not rely on any such information in deciding whether to invest.

INCORPORATION OF CERTAIN INFORMATION BY REFERENCE

We have elected to incorporate the following documents into this prospectus, together with all exhibits filed therewith or incorporated therein by reference, to the extent not otherwise amended or superseded by the contents of this prospectus:

- our Annual Report on Form 10-K for the year ended December 31, 2019, as filed with the Commission on March 13, 2020;
- our Quarterly Report on Form 10-Q for the quarter ended March 31, 2020, as filed with the Commission on May 14, 2020;
- our Current Reports on Form 8-K filed with the Commission on January 24, 2020, April 30, 2020 and May 14, 2020 (solely with respect to Item 5.07);
- our Definitive Proxy Statement on Schedule 14A filed with the Commission on April 2, 2020; and
- the description of our common stock contained in our registration statement on Form 8-A filed with the Commission on September 27, 1995 under Section 12 of the Exchange Act, including any amendment or report filed for the purpose of updating such description.

In addition, we incorporate by reference in this prospectus any future filings we make with the Commission under Sections 13(a), 13(c), 14, or 15(d) of the Exchange Act (excluding any information furnished and not filed with the Commission) after the date on which the registration statement that includes this prospectus was initially filed with the Commission (including all such documents we may file with the Commission after the date of the initial registration statement) until all offerings under this prospectus are terminated.

Any statement contained in a document incorporated by reference herein shall be deemed to be modified or superseded for all purposes to the extent that a statement contained in this prospectus or in any other subsequently filed document which is also incorporated or deemed to be incorporated by reference, modifies or supersedes such statement. Any statement so modified or superseded shall not be deemed, except as so modified or superseded, to constitute a part of this prospectus. You may request a copy of these filings (other than an exhibit to a filing unless that exhibit is specifically incorporated by reference into that filing) at no cost by writing, telephoning or e-mailing us at the following address, telephone number or e-mail address:

Achieve Life Sciences, Inc. 1040 West Georgia Street, Suite 1030 Vancouver, BC V6E 4H1 Tel: (604) 210-2217 Attn: Sandra Thomson

Copies of these filings are also available through the "Investors" section of our website at www.achievelifesciences.com as soon as reasonably practicable after they are filed with or furnished to the Commission. The information contained in or accessible through our website or contained on other websites is not a part of, and is not incorporated into, this prospectus.



ACHIEVE LIFE SCIENCES, INC.

10,332,801 Shares of Common Stock

June 5, 2020

PART II

INFORMATION NOT REQUIRED IN PROSPECTUS

ITEM 13. OTHER EXPENSES OF ISSUANCE AND DISTRIBUTION

The following table sets forth the fees and expenses, other than placement agent fees and expenses, payable in connection with the registration of the common stock hereunder. All amounts shown are estimates except for the Commission registration fee:

Item	Amount paid	
Commission registration fee	\$	573
Legal fees and expenses		30,000
Accounting fees and expenses		7,500
Transfer agent fees and expenses		
Miscellaneous expenses		_
Total	\$	38,073

ITEM 14. INDEMNIFICATION OF DIRECTORS AND OFFICERS

Our Second Amended and Restated Certificate of Incorporation, as amended and as may be further amended and in effect from time to time, which we refer to as the certificate of incorporation, provides that our directors shall not be personally liable to us or our stockholders for monetary damages for any breach of fiduciary duty as a director, except for liability for breach of the director's duty of loyalty to us or our stockholders, for acts or omissions not in good faith or involving intentional misconduct or a knowing violation of law, for payment of dividends or approval of stock purchases or redemptions that are prohibited by the General Corporation Law of the State of Delaware, as amended, which we refer to as the DGCL, or for any transaction from which the director derived an improper personal benefit. Under the DGCL, our directors have a fiduciary duty to us that is not eliminated by this provision of the restated certificate of incorporation and, in appropriate circumstances, equitable remedies such as injunctive or other forms of non-monetary relief will remain available. This provision also does not affect our directors' responsibilities under any other laws, such as federal securities laws or state or federal environmental laws

Section 145 of the DGCL empowers a corporation to indemnify its directors and officers against expenses (including attorneys' fees), judgments, fines and amounts paid in settlements actually and reasonably incurred by them in connection with any action, suit or proceeding brought by third parties by reason of the fact that they were or are directors or officers of the corporation, if they acted in good faith, in a manner they reasonably believed to be in or not opposed to the best interests of the corporation and, with respect to any criminal action or proceeding, had no reasonable cause to believe that their conduct was unlawful. The DGCL provides further 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 restated certificate of incorporation provides that, to the fullest extent permitted by Section 145 of the DGCL, we shall indemnify any person who is or was a director or officer of us, or is or was serving at our request as a director, officer or trustee of another corporation, partnership, joint venture, trust, employee benefit plan or other enterprise, against the expenses, liabilities or other matters referred to in or covered by Section 145 of the DGCL. Our amended and restated bylaws provide that we will indemnify any person who was or is a party or threatened to be made a party to any proceeding by reason of the fact that such person is or was a director or officer of us or is or was serving at our request as a director, officer or trustee of another corporation, partnership, joint venture, trust, employee benefit plan or other enterprise to the fullest extent permitted by the DGCL. In addition, we have entered into agreements with each of our directors and officers under which, among other things, we have agreed to indemnify the director or officer against expenses incurred in any proceeding, including any action by us,

required or permitted, and we are not aware of any threatened litigation or proceeding that may result in a claim for such indemnification.

Section 145 of the DGCL also empowers a corporation to purchase insurance for its officers and directors for such liabilities. We maintain liability insurance for our officers and directors.

ITEM 15. RECENT SALES OF UNREGISTERED SECURITIES

On October 1, 2018, we issued warrants to purchase an aggregate of 894,626 shares of common stock at an exercise price of \$3.1445 per share to purchasers participating in a concurrent registered direct offering. The warrants were offered and issued to the purchasers in reliance upon the exemption provided by Section 4(a)(2) of the Securities Act of 1933, as amended, or the Securities Act.

On May 30, 2019, we issued a warrant to purchase an aggregate of 1,200,000 shares of common stock at an exercise price of \$4.50 per share to Armistice Capital Master Fund, Ltd. (the "Holder"), as an inducement for the Holder to exercise certain outstanding warrants. The warrant was offered and issued to the Holder in reliance upon the exemption provided by Rule 506 of Regulation D and Section 4(a)(2) of the Securities Act.

On April 27, 2020 and April 28, 2020, we issued 5,615,653 shares of common stock, warrants to purchase an aggregate of 3,649,239 shares of common stock at an exercise price of \$0.362 per share and warrants to purchase an aggregate of 562,500 shares of common stock at an exercise price of \$0.366 per share to purchasers participating in private placement transactions. We also issued a warrant to purchase 505,409 shares of common stock at an exercise price of \$0.3795 per share to the placement agent in the private placement transactions. The shares of common stock and warrants were offered and issued to the purchasers in reliance upon the exemption provided by Section 4(a)(2) of the Securities Act and Regulation D promulgated thereunder.

ITEM 16. EXHIBITS

(a) Exhibits

Exhibit Number	Description		Filed/ Furnished Herewith					
		Form	File No.	Exhibit	Filing Date			
2.1†	Agreement and Plan of Merger and Reorganization, dated as of January 5, 2017, by and among OncoGenex Pharmaceuticals, Inc., Ash Acquisition Sub, Inc., Ash Acquisition Sub 2, Inc. and Achieve Life Science, Inc.	8-K	033-80623	2.1	January 5, 2017			
2.2	Amendment No. 2 to Agreement and Plan of Merger and Reorganization, dated July 19, 2017, by and among Achieve Life Sciences, Inc., Ash Acquisition Sub, Inc., Ash Acquisition Sub 2, Inc., and Achieve Life Science, Inc.	8-K	033-80623	10.1	July 19, 2017			
3.1	Second Amended and Restated Certificate of Incorporation filed on May 24, 2013	8-K	033-80623	3.1	May 29, 2013			
3.2	Certificate of Amendment to Amended and Restated Certificate of Incorporation filed on May 21, 2015	8-K	033-80623	3.1	May 22, 2015			
	П-2							

3.3	Certificate of Amendment (Reverse Stock Split) to Second Amended and Restated Certificate of Incorporation filed on August 1, 2017	8-K	033-80623	3.1	August 2, 2017
3.4	Certificate of Amendment (Name Change) to Second Amended and Restated Certificate of Incorporation filed on August 1, 2017	8-K	033-80623	3.2	August 2, 2017
3.5	Certificate of Amendment (Elimination of Cumulative Voting) to Second Amended and Restated Certificate of Incorporation filed on October 31, 2017	8-K	033-80623	3.1	November 1, 2017
3.6	Certificate of Amendment (Reverse Stock Split) to the Second Amended and Restated Certificate of Incorporation filed on May 22, 2018	8-K	033-80623	3.1	May 23, 2018
3.7	Certificate of Amendment (Increase in Authorized Shares) to the Second Amended and Restated Certificate of Incorporation filed on May 22, 2018	8-K	033-80623	3.2	May 23, 2018
3.8	Certificate of Designation of Preferences, Rights and Limitations, with respect to the Series B Convertible Preferred Stock, filed	8-K	033-80623	3.1	December 20, 2019
3.9	Sixth Amended and Restated Bylaws	8-K	033-80623	3.1	January 5, 2017
3.10	Amendment to Sixth Amended and Restated Bylaws	10-Q	033-80623	3.1	November 7, 2018
4.1	Specimen Certificate of Common Stock	10-Q	000-21243	4.1	November 10, 2008
4.2	Form of Series A Warrant	8-K	033-80623	4.1	June 27, 2014
4.3	Form of Series A-1 Warrant	8-K	033-80623	4.1	April 30, 2015
4.4	Form of Pre-Funded Series B Warrant	8-K	033-80623	4.2	June 27, 2014
4.5	Form of Series B Warrant	8-K	033-80623	4.3	June 27, 2014
4.6	Form of Warrant (LPC)	8-K	033-80623	4.1	September 14, 2017
4.7	Form of Common Stock Purchase Warrant (June 2018 Offering)	8-K	033-80623	4.1	June 20, 2018
4.8	Form of Preferred Stock Certificate	8-K	033-80623	4.2	June 20, 2018
4.9	Form of Common Stock Purchase Warrant (October 2018 Private Placement)	8-K	033-80623	4.1	October 1, 2018
4.10	Form of Warrant (May 2019)	8-K	033-80623	4.1	June 3, 2019
		II-3			

4.11	Form of Common Stock Purchase Warrant (December 2019 Offering)	8-K	033-80623	4.1	December 20, 2019	
4.12	Form of Common Stock Purchase Warrant (April 2020 Offering)	8-K	033-80623	4.1	April 30, 2020	
5.1	Opinion of Fenwick & West LLP					X
10.3	OncoGenex Technologies Inc. Amended and Restated Stock Option Plan	F-1	333-139293	10.1	December 13, 2006	
10.4	Form of OncoGenex Pharmaceuticals, Inc. 2010 Stock Option Agreement	8-K	033-80623	10.1	June 14, 2010	
10.5	Form of OncoGenex Pharmaceuticals, Inc. 2010 Restricted Stock Unit Agreement	10-Q	033-80623	10.2	November 3, 2011	
10.6	OncoGenex Pharmaceuticals, Inc. 2010 Performance Incentive Plan, as amended and restated	DEF 14A	033-80623	Appendix A	April 16, 2015	
10.7a	Achieve Life Sciences 2017 Equity Incentive Plan	DEF 14A	033-80623	Appendix A	September 21, 2017	
10.7b	Form of Achieve Life Sciences Stock Option	10-Q	033-80623	10.7b	March 1, 2018	
10.7c	Agreement Form of Achieve Life Sciences Restricted Stock Unit Agreement	10-Q	033-80623	10.7c	March 1, 2018	
10.8	Achieve Life Sciences 2017 Employee Stock Purchase Plan	DEF 14A	033-80623	Appendix B	September 21, 2017	
10.9	Achieve Life Sciences 2018 Equity Incentive Plan, and forms of award agreements thereunder	10-Q	033-80623	10.1	November 7, 2018	
10.10	Form of Indemnification Agreement for Officers and Directors of the Company (p)	S-1	33-96112	10.19	September 25, 1995	
10.11	Form of Indemnification Agreement between OncoGenex Technologies Inc. and Cindy Jacobs	F-1	333-139293	10.7	December 13, 2006	
10.12	Employment Agreement between the Company and Cindy Jacobs dated as of November 3, 2009	10-Q	033-80623	10.27	November 5, 2009	
10.13	Employment Agreement between OncoGenex Pharmaceuticals, Inc. and John Bencich	10-Q	033-80623	10.1	November 10, 2016	
10.14	Employment Agreement between the Company and Richard Stewart, executed May 22, 2018	8-K	033-80623	10.1	May 23, 2018	
10.15	Employment Agreement between the Company and Anthony Clarke, executed May 22, 2018	8-K	033-80623	10.2	May 23, 2018	
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10.16#	Exclusive License Agreement, by and between Sopharma Joint Stock Company and Extab Corporation, dated May 26, 2009	S-4/A	333-216961	10.21	May 3, 2017
10.17#	Variation of Contract, by and between Sopharma AD and Extab Corporation, dated May 14, 2015	S-4/A	333-216961	10.22	May 3, 2017
10.18#	Commercial Agreement on Supply of Pharmaceutical Products, by and between Sopharma AD and Extab Corporation, dated February 1, 2010	S-4/A	333-216961	10.23	May 3, 2017
10.19#	Variation of Contract, by and between Sopharma AD and Extab Corporation, dated May 14, 2015	S-4/A	333-216961	10.24	May 3, 2017
10.20#	Technical and Quality Agreement, by and between Sopharma AD and Extab Corporation, dated May 14, 2015	S-4/A	333-216961	10.25	May 3, 2017
10.21#	License of Technology, by and between University of Bristol and Achieve Life Science, Inc., dated July 13, 2016	S-4/A	333-216961	10.27	May 3, 2017
10.22##	Amendment to University of Bristol License Agreement, dated January 22, 2018, by and between Achieve Life Science, Inc., and the University of Bristol	10-Q/A	033-80623	10.1	May 23, 2018
10.24	<u>Lease by and between 520 Pike Street, Inc. and Achieve</u> <u>Life Sciences, Inc., dated December 11, 2018</u>	10-Q	033-80623	10.20	March 1, 2018
10.25	Office Lease by and between 0846869 B.C. Ltd. and Achieve Life Sciences Technologies Inc., commencing February 1, 2019.	10-K	033-80623	10.25	March 14, 2019
10.26	Purchase Agreement, by and between Achieve Life Sciences, Inc. and Lincoln Park Capital Fund, LLC. dated as of September 14, 2017	8-K	033-80623	10.1	September 14, 2017
10.27	Amendment No. 1 to Purchase Agreement, by and between Achieve Life Sciences, Inc. and Lincoln Park Capital Fund, LLC. dated as of September 14, 2017	10-K	033-80623	10.27	March 13, 2020
10.28##	Amended and Restated Supply Agreement, dated July 28, 2017, by and between Achieve Life Science, Inc., and Sopharma AD	10-Q	033-80623	10.1	November 9, 2017

10.29	Warrant Exercise Agreement by and between Achieve Life Sciences, Inc. and Armistice Capital Master Fund, Ltd., dated May 30, 2019	8-K	033-80623	10.1	June 3, 2019	
10.30	At The Market Offering Agreement by and between H.C. Wainwright & Co., LLC and Achieve Life Sciences, Inc. dated June 7, 2019	8-K	033-80623	1.1	June 7, 2019	
10.31	Placement Agent Agreement by and between Paulson Investment Company, LLC and Achieve Life Sciences, Inc dated April 19, 2020	8-K	033-80623	10.1	April 30, 2020	
10.32	Form of Subscription Agreement	8-K	033-80623	10.2	April 30, 2020	
10.33	Form of Registration Rights Agreement	8-K	033-80623	10.3	April 30, 2020	
21.1	Subsidiaries of the Registrant	10-K	033-80623	21.1	March 13, 2020	
23.1	Consent of PricewaterhouseCoopers LLP					X
24.1	Power of Attorney (included on the signature page hereto)					X

[†] Schedules and similar attachments to the Merger Agreement have been omitted pursuant to Item 601(b)(2) of Regulation S-K. The Company will furnish supplementally a copy of any omitted schedule or similar attachment to the Commission upon request.

(b) Financial statement schedules

Schedules not listed above 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.

[#] Confidential portions of this exhibit have been omitted and filed separately with the Commission pursuant to a Confidential Treatment Order granted under Rule 406 promulgated under the Securities Act of 1933, as amended.

^{##} Confidential portions of this exhibit have been omitted and filed separately with the Commission pursuant to a Confidential Treatment Order granted under Rule 24b-2 promulgated under the Securities Exchange Act of 1934, as amended.

ITEM 17. UNDERTAKINGS

- (a) The undersigned registrant hereby undertakes:
 - (1) To file, during any period in which offers or sales are being made, a post-effective amendment to this registration statement:
 - (i) To include any prospectus required by Section 10(a)(3) of the Securities Act of 1933, as amended;
- (ii) To reflect in the prospectus any facts or events arising after the effective date of the registration statement (or the most recent post-effective amendment thereof) which, individually or in the aggregate, represent a fundamental change in the information set forth in the registration statement. Notwithstanding the foregoing, any increase or decrease in volume of securities offered (if the total dollar value of securities offered would not exceed that which was registered) and any deviation from the low or high end of the estimated maximum offering range may be reflected in the form of prospectus filed with the Commission pursuant to Rule 424(b) if, in the aggregate, the changes in volume and price represent no more than a 20 percent change in the maximum aggregate offering price set forth in the "Calculation of Registration Fee" table in the effective registration statement;
- (iii) To include any material information with respect to the plan of distribution not previously disclosed in the registration statement or any material change to such information in the registration statement.

Provided, however, that the undertakings set forth in paragraphs (a)(1)(i), (a)(1)(ii) and (a)(1)(iii) of this section do not apply if the information required to be included in a post-effective amendment by those paragraphs is contained in reports filed with or furnished to the Commission by the registrant pursuant to Section 13 or Section 15(d) of the Securities Exchange Act of 1934 that are incorporated by reference in the registration statement or is contained in a form of prospectus filed pursuant to Rule 424(b) that is a part of the registration statement.

- (2) That, for the purpose of determining any liability under the Securities Act of 1933, as amended, each such post-effective amendment 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.
 - (3) To remove from registration by means of a post-effective amendment any of the securities being registered which remain unsold at the termination of the offering.
- (4) That, for the purpose of determining liability under the Securities Act of 1933, as amended, to any purchaser, each prospectus filed pursuant to Rule 424(b) as part of a registration statement relating to an offering, other than registration statements relying on Rule 430B or other than prospectuses filed in reliance on Rule 430A, shall be deemed to be part of and included in the registration statement as of the date it is first used after effectiveness. *Provided, however*, that no statement made in a registration statement or prospectus that is part of the registration statement or made in a document incorporated or deemed incorporated by reference into the registration statement or prospectus that is part of the registration statement will, as to a purchaser with a time of contract of sale prior to such first use, supersede or modify any statement that was made in the registration statement or prospectus that was part of the registration statement or made in any such document immediately prior to such date of first use.
- (b) The undersigned registrant hereby undertakes that, for purposes of determining any liability under the Securities Act of 1933, each filing of the registrant's annual report pursuant to Section 13(a) or 15(d) of the Securities Exchange Act of 1934 (and, where applicable, each filing of an employee benefit plan's annual report pursuant to Section 15(d) of the Securities Exchange Act of 1934) that is incorporated by reference in the registration statement 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.
- (c) 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 of 1933 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 of 1933 and will be governed by the final adjudication of such issue.

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 Vancouver, British Columbia, Canada, on June 5, 2020.

ACHIEVE LIFE SCIENCES, INC.

By: /s/ Richard Stewart

Richard Stewart Chief Executive Officer and Chairman

SIGNATURES AND POWER OF ATTORNEY

Each person whose signature appears below constitutes and appoints Richard Stewart and John Bencich, and each of them severally, as his true and lawful attorney-in-fact and agent, each acting alone with full power of substitution and resubstitution, for him and in his name, place and stead, in any and all capacities, to sign this Registration Statement on Form S-1 to be filed in connection with the offering of securities of Achieve Life Sciences, Inc., and any and all amendments (including post-effective amendments) to this registration statement, and any subsequent registration statement filed pursuant to Rule 462 under the Securities Act of 1933, as amended, and to file the same with exhibits thereto, and the other documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorney-in-fact and agent, each acting alone, full power and authority to do and perform each and every act and thing requisite and necessary to be done in connection therewith, as fully to all intents and purposes as they might or could do in person, hereby ratifying and confirming all that said attorney-in-fact or his substitutes, each acting alone, may lawfully do or cause to be done by virtue thereof.

IN WITNESS WHEREOF, each of the undersigned has executed this Power of Attorney as of the date indicated. Pursuant to the requirements of the Securities Act of 1933, this registration statement has been signed by the following persons in the capacities and as of the dates indicated.

Signature	Title	Date
/s/ Richard Stewart Richard Stewart	Chief Executive Officer, Chairman and Director (Principal Executive Officer)	June 5, 2020
/s/ John Bencich John Bencich	Chief Financial Officer (Principal Financial Officer and Principal Accounting Officer)	June 5, 2020
/s/ Scott Cormack Scott Cormack	Director	June 5, 2020
/s/ Anthony Clarke Anthony Clarke	Director	June 5, 2020
/s/ Martin Mattingly Martin Mattingly	Director	June 5, 2020
/s/ H. Stewart Parker H. Stewart Parker	Director	June 5, 2020
/s/ Jay Moyes Jay Moyes	Director	June 5, 2020
/s/ Donald Joseph Donald Joseph	Director	June 5, 2020

1191 SECOND AVENUE, 10TH FLOOR SEATTLE, WA 98101
TEL: 206.389.4510 FAX: 206.389.4511 WWW.FENWICK.COM

June 5, 2020

Achieve Life Sciences, Inc. 1040 West Georgia Street, Suite 1030 Vancouver, B.C. V6E 4H1

Ladies and Gentlemen:

At your request, we have examined the Registration Statement on Form S-1 filed by Achieve Life Sciences, Inc., a Delaware corporation (the "Company"), with the Securities and Exchange Commission (the "Commission") on June 5, 2020 (the "Registration Statement"), in connection with the registration under the Securities Act of 1933, as amended (the "Securities Act"), of an aggregate of 10,332,801 shares (the "Shares") of the Company's common stock, \$0.001 par value per share (the "Common Stock"), which Shares consist of (i) 5,615,653 shares of Common Stock held by certain selling stockholders of the Company (collectively, the "Selling Stockholders") and (ii) 4,717,148 shares of Common Stock issuable by the Company to the Selling Stockholders upon the exercise of currently outstanding common stock purchase warrants issued by the Company to the Selling Stockholders in a private placement (the "Warrants"). The Shares may be sold from time to time by the Selling Stockholders as set forth in the Registration Statement and the prospectus contained within the Registration Statement (the "Prospectus").

In connection with our opinion expressed below we have examined originals or copies of the Company's Amended and Restated Certificate of Incorporation, as amended (the "Certificate"), the Company's Bylaws, as amended (the "Bylaws"), the Warrants, certain corporate proceedings of the Company's board of directors (the 'Board') and stockholders relating to the Registration Statement, the Certificate and Bylaws, and such other agreements, documents, certificates and statements of the Company, its transfer agent and public or government officials, as we have deemed advisable, and have examined such questions of law as we have considered necessary. We have assumed the authenticity of all documents submitted to us as originals, the genuineness of all signatures on documents submitted to us, the conformity to originals of all documents submitted to us as copies, and the absence of any undisclosed termination, waiver or amendment to any document reviewed by us. In giving our opinion, we have also relied upon a good standing certificate issued by the Delaware Secretary of State and representations made to us by the Company, including representations that the Company has available a sufficient number of authorized shares of Common Stock that are not currently outstanding or reserved for issuance under other outstanding securities or equity plans of the Company, to enable the Company to issue and deliver all of the shares of Common Stock issuable upon exercise of the Warrants as of the date of this opinion.

We render this opinion only with respect to, and express no opinion herein concerning the application or effect of the laws of any jurisdiction other than, the existing laws of the Delaware General Corporation Law.

Based upon the foregoing, we are of the opinion that, the Shares that may be sold by the Selling Stockholders pursuant to the Registration Statement will, when delivered in the manner and for the consideration stated in the Registration Statement and the Prospectus, and when issued in accordance with the terms and conditions of the applicable Warrant, be validly issued, fully paid and nonassessable.

We consent to the use of this opinion as an exhibit to the Registration Statement and further consent to all references to us, if any, in the Registration Statement, the Prospectus constituting a part thereof and any amendments thereto. We do not thereby admit that we are within the category of persons whose consent is required under Section 7 of the Securities Act or the rules and regulations of the Commission thereunder. This opinion is intended solely for use in connection with sale of the Shares to be sold by the Selling Stockholders pursuant to the Registration Statement and is not to be relied upon for any other purpose. In providing this letter, we are opining only as to the specific legal issues expressly set forth above, and no opinion shall be inferred as to any other matter or matters. This opinion is rendered on, and speaks only as of, the date of this letter first written above, and does not address any potential change in facts of law that may occur after the date of this opinion letter. We assume no obligation to advise you of any fact, circumstance, event or change in the law or the facts that may hereafter be brought to our attention, whether or not such occurrence would affect or modify any of the opinions expressed herein.

Very truly yours,

/s/ Fenwick & West LLP

FENWICK & WEST LLP

CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

We hereby consent to the incorporation by reference in this registration statement on Form S-1 of Achieve Life Sciences, Inc. of our report dated March 13, 2020 relating to the consolidated financial statements of Achieve Life Sciences, Inc., which appears in Achieve Life Sciences, Inc.'s Annual Report on Form 10-K for the year ended December 31, 2019. We also consent to the reference to us under the heading "Experts" in such registration statement.

/s/ PricewaterhouseCoopers LLP

Chartered Professional Accountants Vancouver, Canada June 5, 2020