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

FORM 10-Q

☒ **QUARTERLY REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the quarterly period ended September 30, 2020

OR

☐ **TRANSITION REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934**

For the transition period from to

Commission File Number: 001-38624

Vaccinex, Inc.

(Exact name of registrant as specified in its charter)

Delaware	**16-1603202**
(State or other jurisdiction of incorporation or organization)	**(I.R.S. Employer Identification No.)**
1895 Mount Hope Avenue	
Rochester, New York	**14620**
(Address of principal executive offices)	**(Zip Code)**

Registrant's telephone number, including area code: (585) 271-2700

Securities registered pursuant to Section 12(b) of the Securities Exchange Act of 1934:

Title of each class	Trading Symbol(s)	Name of each exchange on which registered
Common Stock, $0.0001 par value	VCNX	Nasdaq Capital Market

Indicate by check mark whether the registrant (1) has filed all reports required to be filed by Section 13 or 15(d) of the Securities Exchange Act of 1934 during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes ☒ No ☐

Indicate by check mark whether the registrant has submitted electronically every Interactive Data File required to be submitted pursuant to Rule 405 of Regulation S-T (§232.405 of this chapter) during the preceding 12 months (or for such shorter period that the registrant was required to submit such files). Yes ☒ No ☐

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	☐
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 13(a) of the Exchange Act. ☐

Indicate by check mark whether the registrant is a shell company (as defined in Rule 12b-2 of the Exchange Act). Yes ☐ No ☒

As of November 10, 2020, the registrant had 22,385,628, shares of common stock, $0.0001 par value per share, outstanding.

VACCINEX, INC.
FORM 10-Q

TABLE OF CONTENTS

PART I - FINANCIAL INFORMATION

Item 1. Financial Statements

VACCINEX, INC.

Condensed Consolidated Balance Sheets (Unaudited)
(in thousands, except share and per share data)

	As of September 30, 2020	As of December 31, 2019
ASSETS		
Current assets:		
Cash and cash equivalents	$ 17,092	$ 2,776
Accounts receivable	443	898
Prepaid expenses and other current assets	702	336
Total current assets	18,237	4,010
Property and equipment, net	488	594
TOTAL ASSETS	$ 18,725	$ 4,604
LIABILITIES AND STOCKHOLDERS' EQUITY (DEFICIT)		
Current liabilities:		
Accounts payable	2,944	3,208
Accrued expenses	2,993	3,670
Senior secured convertible debt, net	7,890	-
Total current liabilities	13,827	6,878
Long-term debt	1,134	-
TOTAL LIABILITIES	14,961	6,878
Commitments and contingencies (Note 7)		
Stockholders' equity (deficit):		
Common stock, par value of $0.0001 per share; 100,000,000 shares authorized as of September 30, 2020, and December 31, 2019; 22,380,351 and 14,887,999 shares issued as of September 30, 2020 and December 31, 2019, respectively; 22,379,499 and 14,887,147 shares outstanding as of September 30, 2020 and December 31, 2019, respectively	3	1
Additional paid-in capital	250,843	222,403
Treasury stock, at cost; 852 shares of common stock as of September 30, 2020 and December 31, 2019, respectively	(11)	(11)
Accumulated deficit	(271,034)	(248,630)
Total Vaccinex, Inc. stockholders' deficit	(20,199)	(26,237)
Noncontrolling interests	23,963	23,963
TOTAL STOCKHOLDERS' EQUITY (DEFICIT)	3,764	(2,274)
TOTAL LIABILITIES AND STOCKHOLDERS' EQUITY (DEFICIT)	$ 18,725	$ 4,604

The accompanying notes are an integral part of these condensed consolidated financial statements.

VACCINEX, INC.

Condensed Consolidated Statements of Operations and Comprehensive Loss (Unaudited)
(in thousands, except share and per share data)

	Three Months Ended September 30,		Nine Months Ended September 30,	
	2020	2019	2020	2019
Revenue	$ 50	$ 404	$ 50	$ 523
Grant revenue	575	-	575	-
Costs and expenses:				
Cost of revenue	2	8	2	199
Research and development	7,334	6,543	17,300	21,259
General and administrative	1,872	1,531	5,565	4,741
Total costs and expenses	9,208	8,082	22,867	26,199
Loss from operations	(8,583)	(7,678)	(22,242)	(25,676)
Interest expense	(148)	-	(150)	-
Other income (expense), net	(23)	36	(14)	139
Loss before provision for income taxes	(8,754)	(7,642)	(22,406)	(25,537)
Provision for income taxes	-	-	-	-
Net loss	(8,754)	(7,642)	(22,406)	(25,537)
Net loss attributable to noncontrolling interests	-	-	-	-
Net loss attributable to Vaccinex, Inc. common stockholders	$ (8,754)	$ (7,642)	$ (22,406)	$ (25,537)
Comprehensive loss	$ (8,754)	$ (7,642)	$ (22,406)	$ (25,537)
Net loss per share attributable to Vaccinex, Inc. common stockholders, basic and diluted	$ (0.44)	$ (0.56)	$ (1.27)	$ (2.09)
Weighted-average shares used in computing net loss per share attributable to Vaccinex, Inc. common stockholders, basic and diluted	20,074,726	13,759,602	17,587,219	12,246,599

The accompanying notes are an integral part of these condensed consolidated financial statements.

VACCINEX, INC.

Condensed Consolidated Statements of Stockholders' Equity (Deficit) (Unaudited)
(in thousands, except share data)

	Common Stock			Treasury Stock					
	Shares	Amount	Additional Paid-in Capital	Common Stock Shares	Amount	Accumulated Deficit	Total Vaccinex, Inc. Stockholders' Deficit	Noncontrolling Interests	Total Stockholders' Equity (Deficit)
Balance as of January 1, 2019	11,476,601	$ 1	$ 208,156	852	$ (11)	$ (216,767)	$ (8,621)	$ 23,963	$ 15,342
Stock-based compensation	-	-	60	-	-	-	60	-	60
Net loss	-	-	-	-	-	(9,067)	(9,067)	-	(9,067)
Balance as of March 31, 2019	11,476,601	1	208,216	852	(11)	(225,834)	(17,628)	23,963	6,335
Exchange of Vaccinex Products LP Units for common shares	4,455	-	-	-	-	-	-	-	-
Stock-based compensation	-	-	113	-	-	-	113	-	113
Net loss	-	-	-	-	-	(8,828)	(8,828)	-	(8,828)
Balance as of June 30, 2019	11,481,056	1	208,329	852	(11)	(234,662)	(26,343)	23,963	(2,380)
Issuance of common shares	3,382,332	-	13,800	-	-	-	13,800	-	13,800
Stock-based compensation	-	-	136	-	-	-	136	-	136
Net loss	-	-	-	-	-	(7,642)	(7,642)	-	(7,642)
Balance as of September 30, 2019	14,863,388	$ 1	$ 222,265	852	$ (11)	$ (242,304)	$ (20,049)	$ 23,963	$ 3,914

	Common Stock			Treasury Stock					
	Shares	Amount	Additional Paid-in Capital	Common Stock Shares	Amount	Accumulated Deficit	Total Vaccinex, Inc. Stockholders' Deficit	Noncontrolling Interests	Total Stockholders' Equity (Deficit)
Balance as of January 1, 2020	14,887,999	$ 1	$ 222,403	852	$ (11)	$ (248,630)	$ (26,237)	$ 23,963	$ (2,274)
Issuance of common shares	1,468,563	1	7,475	-	-	-	7,476	-	7,476
Stock-based compensation	20,000	-	204	-	-	-	204	-	204
Exercise of stock options	1,025	-	4	-	-	-	4	-	4
Net loss	-	-	-	-	-	(7,149)	(7,149)	-	(7,149)
Balance as of March 31, 2020	16,377,587	2	230,086	852	(11)	(255,779)	(25,702)	23,963	(1,739)
Issuance of common shares	642,112	-	2,350	-	-	-	2,350	-	2,350
Common shares issuance costs	-	-	(54)	-	-	-	(54)	-	(54)
Exchange of Vaccinex Products LP Units for common shares	4,125	-	-	-	-	-	-	-	-
Stock-based compensation	-	-	366	-	-	-	366	-	366
Net loss	-	-	-	-	-	(6,501)	(6,501)	-	(6,501)
Balance as of June 30, 2020	17,023,824	2	232,748	852	(11)	(262,280)	(29,541)	23,963	(5,578)
Issuance of common shares	5,339,329	1	18,648	-	-	-	18,649	-	18,649
Common shares issuance costs	-	-	(659)	-	-	-	(659)	-	(659)
Exchange of Vaccinex Products LP Units for common shares	14,440	-	-	-	-	-	-	-	-
Stock-based compensation	-	-	91	-	-	-	91	-	91
Exercise of stock options	2,758	-	15	-	-	-	15	-	15
Net loss	-	-	-	-	-	(8,754)	(8,754)	-	(8,754)
Balance as of September 30, 2020	22,380,351	$ 3	$ 250,843	852	$ (11)	$ (271,034)	$ (20,199)	$ 23,963	$ 3,764

The accompanying notes are an integral part of these condensed consolidated financial statements.

VACCINEX, INC.

Condensed Consolidated Statements of Cash Flows (Unaudited)
(in thousands)

	Nine Months Ended September 30,	
	2020	**2019**
CASH FLOWS FROM OPERATING ACTIVITIES:		
Net loss	$ (22,406)	$ (25,537)
Adjustments to reconcile net loss to net cash used in operating activities:		
Depreciation	237	181
Debt related charges included in interest expense	113	-
Net amortization of premiums and discounts on marketable securities	-	(44)
Stock-based compensation	661	309
Change in fair value of derivative liability	(65)	-
Changes in operating assets and liabilities:		
Accounts receivable	455	(449)
Prepaid expenses and other current assets	(366)	418
Accounts payable	(202)	21
Accrued expenses	(692)	189
Net cash used in operating activities	(22,265)	(24,912)
CASH FLOWS FROM INVESTING ACTIVITIES:		
Sales of marketable securities	-	14,150
Purchase of property and equipment	(291)	(77)
Net cash (used in) provided by investing activities	(291)	14,073
CASH FLOWS FROM FINANCING ACTIVITIES:		
Proceeds from private offering of common stock	11,475	13,800
Proceeds from issuance of common stock	17,000	-
Proceeds from issuance of convertible debt, net of discount	8,000	-
Redemption of convertible debt	(108)	-
Payments of convertible debt issuance costs	(50)	-
Proceeds from long-term debt	1,134	-
Payments of common stock issuance costs	(598)	-
Proceeds from exercise of stock options	19	-
Net cash provided by financing activities	36,872	13,800
NET INCREASE IN CASH AND CASH EQUIVALENTS	14,316	2,961
CASH AND CASH EQUIVALENTS–Beginning of period	2,776	5,618
CASH AND CASH EQUIVALENTS–End of period	$ 17,092	$ 8,579
SUPPLEMENTAL DISCLOSURES OF NONCASH INVESTING AND FINANCING ACTIVITIES:		
Purchase of property and equipment in accounts payable	$ (161)	$ -
Offering costs in accounts payable	$ 100	$ -
Offering costs in accrued expenses	$ 15	$ -

The accompanying notes are an integral part of these condensed consolidated financial statements.

Note 1. COMPANY AND NATURE OF BUSINESS

Vaccinex, Inc. (together with its subsidiaries, the "Company") was incorporated in Delaware in April 2001 and is headquartered in Rochester, New York. The Company is a clinical-stage biotechnology company engaged in the discovery and development of targeted biotherapeutics to treat serious diseases and conditions with unmet medical needs, including cancer, neurodegenerative diseases, and autoimmune disorders. Since its inception, the Company has devoted substantially all of its efforts toward product research, manufacturing and clinical development and raising capital.

The Company is subject to a number of risks and uncertainties common to other early-stage biotechnology companies including, but not limited to, dependency on the successful development and commercialization of its product candidates, rapid technological change and competition, dependence on key personnel and collaborative partners, uncertainty of protection of proprietary technology and patents, clinical trial uncertainty, fluctuation in operating results and financial performance, the need to obtain additional funding, compliance with governmental regulations, technological and medical risks, management of growth and effectiveness of marketing by the Company. The Company is also subject to risks related to the ongoing COVID-19 pandemic, discussed under "COVID-19 Pandemic" below. If the Company does not successfully commercialize or partner any of its product candidates, it will be unable to generate product revenue or achieve profitability.

Going Concern

These unaudited condensed consolidated financial statements have been prepared on a going concern basis, which implies the Company will continue to realize its assets and discharge its liabilities in the normal course of business. The Company has incurred significant losses and negative cash flows from operations since inception and expects to incur additional losses until such time that it can generate significant revenue from the commercialization of its product candidates. The Company had negative cash flow from operations of $22.3 million and $24.9 million for the nine months ended September 30, 2020 and 2019, respectively, and an accumulated deficit of $271.0 million and $248.6 million as of September 30, 2020 and December 31, 2019, respectively. The Company anticipates that cash and cash equivalents at September 30, 2020 will be sufficient to fund our planned operations into the third quarter of 2021. The Company plans to raise additional funds in the first half of 2021. The uncertainty of these conditions raise substantial doubt about the Company's ability to continue as a going concern for a period of 12 months from the date of these financial statements. The unaudited condensed consolidated financial statements do not include any adjustments relating to the recoverability and classification of recorded asset amounts or the amounts and classification of liabilities that might result from the outcome of this uncertainty.

To date, the Company has relied on public and private sales of equity and debt financing to fund its operations, in addition to capital contributions from noncontrolling interests and a limited amount of service revenue from collaboration agreements. In July 2019, January 2020, and July 2020, we completed private placements of our common stock and received gross proceeds of $13.8 million, $7.5 million, and $4.0 million, respectively and in September 2020 we received gross proceeds of $2.0 million through an award from the Alzheimer's Drug Discovery Foundation ("ADDF"), in the form of an investment in our common stock. Additionally, on March 27, 2020, we announced that we had (i) entered into an open market sale agreement (the "Open Market Sale Agreement" or "ATM") with Jefferies, LLC ("Jefferies") and filed a prospectus supplement pursuant to which we were able to issue and sell up to $11.5 million of shares of our common stock from time and (ii) entered into a purchase agreement (the "Purchase Agreement") with Keystone Capital Partners, LLC ("Keystone") pursuant to which Keystone agreed to purchase up to an aggregate of $5.0 million of shares of our common stock from time to time. During the second quarter of 2020, 317,688 shares were sold through the Open Market Sale Agreement for proceeds of $1.2 million, net of commission, and 324,424 shares were sold through the Purchase Agreement with Keystone for proceeds of $1.2 million, net of discount. In August 2020, we ceased use of the Purchase Agreement with Keystone, and in September 2020, we filed a replacement prospectus supplement related to the Open Market Sale Agreement pursuant to which we may sell up to $113 million of shares of our common stock through Jefferies. During the third quarter of 2020, 3,815,600 shares were sold through the Open Market Sale Agreement for proceeds of $12.3 million,

net of commission, and 47,319 shares were sold through the Purchase Agreement for proceeds of $300,000, net of discount. In August 2020, we entered into a Securities Purchase Agreement (the "SPA"), with 3i, LP, ("3i") as collateral agent and purchaser (the "Convertible Debt Financing"). Pursuant to the SPA, on August 3, 2020, we issued a 7% Original Issue Discount Senior Secured Convertible Debenture ("Senior Secured Convertible Debenture" or "the Debenture"), in the principal amount of $8.64 million for a purchase price of $8.0 million, which reflects an original issue discount of approximately 8%. The Debenture will mature on August 3, 2021. The Debenture accrues interest at 7% per year and is convertible into shares of our common stock at a conversion price of $9.4125 per share, subject to certain customary adjustments. In the third quarter of 2020, we raised total proceeds of approximately $26.6 million, net of commissions and discounts and before expenses, through the Open Market Sale Agreement, the Convertible Debt Financing, the July 2020 private placement transaction, the ADDF award, and the Purchase Agreement. We also received $575,000 in proceeds from our $750,000 grant from the Alzheimer's Association under its 2020 Part the Cloud Program. The remainder of this award is anticipated to be funded in 2021.

In addition, on May 8, 2020, the Company received a loan of $1.1 million from Five Star Bank (the "PPP Loan") under the Paycheck Protection Program established as a part of the Coronavirus Aid, Relief, and Economic Security Act (the "CARES Act"). The Company will need substantial additional capital to continue to support its ongoing operations. Financing strategies may include, but are not limited to, the public or private sale of equity, debt financings or funds from other capital sources, such as government funding, collaborations, strategic alliances, or licensing arrangements with third parties. There can be no assurances that the Company will be able to secure additional financing, including by its agreement with Jefferies. There can also be no assurances that if financing is available, it will be sufficient to meet its needs or on favorable terms. As a result, taking into account the current economic uncertainty associated with COVID-19, the Company has concluded that management's plans do not alleviate substantial doubt about the Company's ability to continue as a going concern.

COVID-19 Pandemic

In order to mitigate the spread of COVID-19, governments have at times imposed unprecedented restrictions on business operations, travel, and gatherings, resulting in a global economic downturn and other adverse economic and societal impacts. The Company has complied with state reopening guidance and has allowed research and development staff to begin working in the laboratory when necessary and using recommended health and safety precautions. The COVID-19 pandemic has impacted the expected timing of the Company's clinical trials, the economy, the biotechnology industry, and the Company's business. For example, the Company previously anticipated initiating a trial of pepinemab in Alzheimer's disease in mid-2020, but the initial enrollment date has been delayed until the first half of 2021. In addition, to mitigate the impacts of the COVID-19 pandemic, including impacts on the Company's ability to raise capital and to maintain its personnel, the Company applied for and received the PPP Loan. The Company may experience further disruptions as a result of the COVID-19 pandemic that could adversely impact its business, including disruption of research and clinical development activities, plans for release of data, manufacturing, supply, and interactions with regulators and other third parties, and difficulties in raising additional capital. The extent to which the COVID-19 pandemic may impact the Company's business will depend on future developments, which are highly uncertain and cannot be predicted with confidence.

Note 2. SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES

Basis of Presentation and Consolidation

These condensed consolidated financial statements reflect the accounts and operations of the Company and those of its subsidiary in which the Company has a controlling financial interest and a variable interest entity ("VIE") in which the Company is the primary beneficiary. As of September 30, 2020, and 2019, the Company's accounts include Vaccinex Products, LP, a Delaware limited partnership ("Vaccinex Products") and VX3 (DE) LP, a Delaware limited partnership ("VX3"). VX3 was established in October 2017 by a group of Canadian investors and was determined to be a VIE in which the Company is the primary beneficiary. The Company consolidates any VIE of which it is the primary beneficiary. The Company presents its noncontrolling interests as a separate component of stockholders' equity (deficit). The Company presents the net loss of VX3 equal to the percentage ownership interest retained in such entity by the respective noncontrolling party (VX3), and as a separate component within its condensed consolidated statements of operations and comprehensive loss. The financial position of Vaccinex Products was not material as of September 30, 2020 and 2019, and there were no gains or losses for

Vaccinex Products for the nine months ended September 30, 2020 and 2019. All intercompany transactions and balances have been eliminated.

These condensed consolidated financial statements have been prepared in accordance with accounting principles generally accepted in the United States of America ("U.S. GAAP") and following the requirements of the Securities and Exchange Commission (the "SEC"), for interim reporting. As permitted under those rules, certain footnotes or other financial information that are normally required by U.S. GAAP can be condensed or omitted. These condensed consolidated financial statements have been prepared on the same basis as the Company's annual consolidated financial statements and, in the opinion of management, reflect all adjustments, consisting only of normal recurring adjustments that are necessary for a fair statement of the Company's financial information. The results of operations for the interim periods presented are not necessarily indicative of the results to be expected for any subsequent quarter or for the entire year ending December 31, 2020. The year-end balance sheet data was derived from audited consolidated financial statements but does not include all disclosures required by U.S. GAAP. Certain information and note disclosures normally included in annual consolidated financial statements prepared in accordance with U.S. GAAP have been omitted under the rules and regulations of the SEC.

These condensed consolidated financial statements should be read in conjunction with the Company's audited consolidated financial statements and related notes included in the Company's Annual Report on Form 10-K for the year ended December 31, 2019, filed with the SEC on March 9, 2020.

Use of Estimates

These condensed consolidated financial statements have been prepared in conformity with U.S. GAAP. The preparation of 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 the disclosure of contingent assets and liabilities as of the date of the condensed consolidated financial statements and the reported amount of expenses during the reporting period. Such management estimates include those relating to assumptions used in the valuation of stock option awards, and valuation allowances against deferred income tax assets. Actual results could differ from those estimates.

Concentration of Credit Risk, Other Risks and Uncertainties

Financial instruments that potentially subject the Company to concentrations of credit risk consist primarily of cash and cash equivalents. Cash equivalents are deposited in interest-bearing money market accounts. Although the Company deposits its cash with multiple financial institutions, cash balances may occasionally be in excess of the amounts insured by the Federal Deposit Insurance Corporation. Management believes the financial risk associated with these balances is minimal and has not experienced any losses to date.

The Company depends on third-party manufacturers for the manufacture of drug substance and drug product for clinical trials. The Company also relies on certain third parties for its supply chain. Disputes with these third- party manufacturers or shortages in goods or services from third-party suppliers could delay the manufacturing of the Company's product candidates and adversely impact its results of operations.

Grant Revenue

From time to time, the Company receives certain grant award funding to support its continuing research and development efforts. The Company considers these grants to be operating revenue as they support the Company's primary operating activities. We recognize revenue from these contracts as we perform services under these arrangements when the funding is received. Revenues and related expenses are presented gross in the consolidated statements of operations and comprehensive loss as we have determined we control the arrangement as the primary obligor under the arrangements relative to the research and development services we perform. During the three and nine month periods ended September 30, 2020 the Company recorded grant revenue related to funds received from the ADDF of $575,000.

Deferred Offering Costs

The Company has incurred certain costs in connection with its securities offerings with Jefferies and Keystone. The Company capitalizes such deferred offering costs, which consist of direct, incremental legal, professional, accounting, and other third-party fees. The deferred offering costs will be offset against offering proceeds upon the completion of an offering. Should the offering be abandoned, the deferred offering costs will be expensed immediately as a charge to operating expenses in the Company's condensed consolidated statement of operations and comprehensive loss. Accordingly, $713,000 of offering costs associated with the ATM Facility and Keystone were charged against paid in capital in the nine months ended September 30, 2020. There were no deferred offering costs on the condensed consolidated balance sheet at September 30, 2020.

Convertible Instruments

The Company applies the accounting standards for derivatives and hedging and for distinguishing liabilities from equity when accounting for hybrid contracts that contain conversion options and other embedded features. The accounting standards require companies to bifurcate embedded features from their host instruments and account for them as free-standing derivative financial instruments according to certain criteria. The criteria include circumstances in which (i) the economic characteristics and risks of the embedded derivative instrument are not clearly and closely related to the economic characteristics and risks of the host contract, (ii) the hybrid instrument that embodies both the embedded derivative instrument and the host contract is not re-measured at fair value under otherwise applicable generally accepted accounting principles with changes in fair value reported in earnings as they occur and (iii) a separate instrument with the same terms as the embedded derivative instrument would be considered a derivative instrument.

The Company's derivative instrument related to certain features embedded within the Debenture is discussed in Note 9. The derivative is accounted for as a derivative liability and remeasured to fair value as of each balance sheet date and the related remeasurement adjustments are recognized in the Company's condensed consolidated statement of operations and comprehensive loss.

Recent Accounting Pronouncements Not Yet Adopted

In February 2016, the Financial Accounting Standards Board (the "FASB") issued Accounting Standards Update ("ASU") No. 2016-02, *Leases (Topic 842)* ("ASU 2016-02"), in order to improve comparability among organizations by recognizing lease assets and liabilities in the consolidated balance sheets for those leases previously classified as operating leases under U.S. GAAP. The update requires a lessee to recognize in its consolidated balance sheet a liability to make lease payments and also a right-of-use asset representing its right to use the underlying asset for the lease term. ASU 2016-02 is effective for the Company for annual periods beginning after December 15, 2020 and interim periods within fiscal years beginning after December 15, 2021, requiring the use of a modified retrospective transition approach applied at the beginning of the earliest comparative period presented in the financial statements. In July 2018, the FASB issued ASU No. 2018-11, *Leases, Targeted Improvements to ASC 842, Leases*, ("ASU 2018-11"), which contains certain amendments to ASU 2016-02 intended to provide relief in implementing the new standard. ASU 2018-11 provides registrants with an option to not restate comparative periods presented in the financial statements. The Company intends to elect this new transition approach using a cumulative-effect adjustment on the effective date of the standard, for which comparative periods will be presented in accordance with the previous guidance in Accounting Standards Codification ("ASC") 840, *Leases*.

The Company is currently evaluating the potential impact ASU 2016-02 may have on its financial position, results of operations, and related footnotes. The Company expects it will elect to utilize the available package of practical expedients permitted under the transition guidance within the new standard, which does not require the reassessment of the following: (i) whether existing or expired arrangements are or contain a lease, (ii) the lease classification of existing or expired leases, and (iii) whether previous initial direct costs would qualify for capitalization under the new lease standard. Additionally, the Company expects it will make an accounting policy election to keep leases with an initial term of 12 months or less off of its balance sheet. The Company anticipates that the impact relating to the new lease standard will result in the Company's operating lease of its corporate headquarters in Rochester, New York, being reflected on the consolidated balance sheet as an operating lease right to use asset and related lease liability.

In June 2016, the FASB issued ASU No. 2016-13, "Measurement of Credit Losses on Financial Instruments" to improve reporting requirements specific to loans, receivables, and other financial instruments. The new standard requires that credit losses on financial assets measured at amortized cost be determined using an expected loss model, instead of the current incurred loss model, and requires that credit losses related to available-for-sale debt securities be recorded through an allowance for credit losses and limited to the amount by which carrying value exceeds fair value. The new standard also requires enhanced disclosure of credit risk associated with financial assets. The standard is effective for interim and annual periods beginning after December 15, 2022 with early adoption permitted. Based on the composition of the Company's financial assets, current market conditions and historical credit loss activity, the adoption of this standard is not expected to have a material impact on the Company's condensed consolidated financial statements.

In August 2020, FASB issued ASU 2020-06, *Debt—Debt with Conversion and Other Options (Subtopic 470-20) and Derivatives and Hedging—Contracts in Entity's Own Equity (Subtopic 815-40): Accounting for Convertible Instruments and Contracts in an Entity's Own Equity*, which simplifies the accounting for convertible instruments by removing the separation models for (1) convertible debt with a cash conversion feature and (2) convertible instruments with a beneficial conversion feature and simplifies the guidance for determining whether a conversion feature is a derivative. As a result, a convertible debt instrument will be accounted for as a single liability measured at its amortized cost. These changes will reduce reported interest expense and increase reported net income for entities that have issued a convertible instrument that was bifurcated according to previously existing rules. In addition, ASU 2020-06 requires the application of the if-converted method for calculating diluted earnings per share and the treasury stock method will be no longer available. The new guidance is effective for fiscal years beginning after December 15, 2021, with early adoption permitted no earlier than fiscal years beginning after December 15, 2020. The Company is currently evaluating the impact of ASU 2020-06 on its condensed consolidated financial statements.

Note 3. BALANCE SHEET COMPONENTS

Property and Equipment

Property and equipment consist of the following (in thousands):

	As of September 30, 2020	As of December 31, 2019
Leasehold improvements	$ 3,174	$ 3,161
Research equipment	3,499	3,442
Furniture and fixtures	350	350
Computer equipment	273	214
Property and equipment, gross	7,297	7,167
Less: accumulated depreciation and amortization	(6,809)	(6,573)
Property and equipment, net	$ 488	$ 594

Depreciation expense related to property and equipment was $74,000 and $64,000 for the three months ended September 30, 2020 and 2019, respectively and $237,000 and $181,000 for the nine months ended September 30, 2020 and 2019, respectively.

Accrued Expenses

Accrued expenses consist of the following (in thousands):

	As of September 30, 2020	As of December 31, 2019
Accrued clinical trial cost	$ 2,278	$ 3,252
Accrued payroll and related benefits	420	262
Accrued consulting and legal	180	79
Accrued interest	94	-
Accrued other	21	77
Accrued expenses	$ 2,993	$ 3,670

Note 4. FAIR VALUE MEASUREMENTS OF FINANCIAL MEASUREMENTS

Assets and Liabilities Measured at Fair Value on a Nonrecurring Basis

Assets and liabilities recorded at fair value on a nonrecurring basis in the condensed consolidated balance sheets are categorized based upon the level of judgment associated with the inputs used to measure their fair values. Financial instruments consist of cash, accounts receivable, accounts payable, accrued liabilities, and long-term debt. Cash, accounts receivable, accounts payable, accrued liabilities, and debt, are stated at their carrying value, which approximates fair value due to the short time to the expected receipt or payment date of such amounts.

Assets and Liabilities Measured at Fair Value on a Recurring Basis

Fair value measurement standards also apply to certain financial assets and liabilities that are measured at fair value on a recurring basis (each reporting period). For the Company, these financial assets and liabilities include its cash equivalents deposited in money market funds and derivative instruments. The Company does not have any nonfinancial assets or liabilities that are measured at fair value on a recurring basis

The following table sets forth the fair value of the Company's financial assets by level within the fair value hierarchy (in thousands):

	As of September 30, 2020			
	Fair Value	Level 1	Level 2	Level 3
Financial Assets:				
Cash equivalents:				
Money market fund	$ 626	$ 626	$ -	$ -
Total Financial Assets	$ 626	$ 626	$ -	$ -

	As of December 31, 2019			
	Fair Value	Level 1	Level 2	Level 3
Financial Assets:				
Cash equivalents:				
Money market fund	$ 1,464	$ 1,464	$ -	$ -
Total Financial Assets	$ 1,464	$ 1,464	$ -	$ -

The Company did not transfer any assets measured at fair value on a recurring basis to or from Level 1 and Level 2 during either of the nine months ended September 30, 2020 and 2019.

The Debenture, as discussed in Note 9, contains embedded derivative features that are required to be bifurcated and remeasured each reporting period. Each quarter, the change in the fair value of the embedded derivative features, if any, is recorded in the Condensed Consolidated Statement of Operations and Comprehensive Loss. The Company uses a binomial lattice valuation model to derive the value of the embedded derivative features, which initially valued the bifurcated embedded derivative at $65,000. The fair value of the derivative liability is $0 at September 30, 2020. Key inputs into this valuation model are the Company's current stock price, risk-free interest rates, the stock dividend yield, the stock volatility, and the credit spread. The first three aforementioned inputs are based on observable market data and are considered Level 1 inputs while the last two aforementioned inputs are unobservable and thus require management's judgment and are considered Level 3 inputs. This fair value measurement is considered a Level 3 measurement within the fair value hierarchy.

Note 5. LICENSE AND SERVICES AGREEMENT

In November 2017, the Company entered into a license agreement (the "VX3 License Agreement") with VX3, which was formed by a group of Canadian investors including the Company's majority stockholder, FCMI Parent Co. ("FCMI Parent"). VX3 was created for the purpose of funding the Company's research and development activities for pepinemab, the Company's most advanced product candidate. Under the VX3 License Agreement, the Company granted VX3 the license to use, make, have made, sell, offer and import pepinemab for the treatment of Huntington's disease in the U.S. and Canada and, in return, VX3 agreed to fund research and development activities with up to an aggregate of $32.0 million in milestone payments to the Company and to share any pepinemab profits and sublicensing revenue under the agreement in an amount based on a calculation set forth in the agreement. The Company also entered into a services agreement with VX3 (the "Services Agreement"), pursuant to which the Company will carry out development activities for pepinemab for the treatment of Huntington's disease in the U.S. and Canada in exchange for services payments from VX3. The VX3 License Agreement expires upon the last to expire licensed patent and may be terminated by either party upon uncured material breach, the occurrence of certain transactions or financings, uncured failure of VX3 to make any payment due under the Services Agreement, or upon written notice after November 6, 2020. The Services Agreement may be terminated by either party upon an uncured material breach and is automatically terminated upon termination of the VX3 License Agreement. The VX3 License Agreement provides that upon termination, the Company will issue to VX3 or its designees the number of shares of the Company's common stock equal to the lesser of (1) the aggregate of all payments made to VX3 by its partners divided by $18.20 and (2) the then fair market value of VX3 divided by the then fair market value of one share of the Company's common stock.

The Company has a variable interest in VX3 through FCMI Parent, which is majority owned and controlled by the Company's chairman, and which controlled 90% of VX3's voting interest as of September 30, 2020. VX3 does not have any business operations or generate any income or expenses and is primarily a funding mechanism specifically for the benefit of the Company, as its only activities consist of the receipt of funding and the contribution of such funding to the Company. Therefore, the Company determined that it is the primary beneficiary of VX3 and that the operating results of VX3 should be incorporated into the Company's consolidated financial statements accordingly.

The Company entered into an exchange agreement on August 13, 2018 with VX3 and its partners, including FCMI Parent, that provides each VX3 partner with the right to exchange all, but not less than all, of its partnership interests in VX3 for shares of the Company's common stock. The exchange agreement also provides that FCMI Parent's exercise of its option to exchange its VX3 partnership interests for shares of Company common stock would trigger the exchange of all VX3 partnership interests for shares of Company common stock. Further, under the exchange agreement, the Company will have a right to require the exchange of all partnership interests in VX3 for shares of Company common stock in any of the following circumstances:

- the Company enters into a transaction such as a sale, merger or consolidation such that shares of Company common stock are or will be sold or exchanged for cash and/or marketable securities;
- on or after August 13, 2023; or

- either the Company or VX3 enters into a licensing, partnering or similar transaction with respect to one or more products and indications licensed to VX3 by the Company, and all amounts then due and owing to VX3 in connection with such transaction have been paid to VX3.

For the three and nine months ended September 30, 2020 and 2019, the Company did not receive any amounts from VX3 or record any related capital contributions from noncontrolling interests on the condensed financial statements. Noncontrolling equity interests do not participate in a proportionate share of the Company's net losses for the three or nine months ended September 30, 2020 or 2019 pursuant to the aforementioned partnership, license, services and exchange agreements.

Note 6. COLLABORATION AGREEMENTS

Surface Oncology, Inc.

In November 2017, the Company entered into a research collaboration and license option agreement with Surface Oncology, Inc. ("Surface") to identify and select antibodies against two target antigens, using the Company's proprietary technology as described in the agreement. The term for each research program is nine to twelve months (not exceeding twelve months unless extended by written agreement) including time necessary for any functional assessment conducted by Surface following the commencement of the research program. Surface will provide the Company material to carry out the research activities. During the research program term, the Company also grants Surface non-exclusive, worldwide, limited-purpose license for each target to use the Company's research program materials for conducting the research work pursuant to the agreement. The Company received service fee payments of $4,000 and $123,000 for the three and nine months ended September 30, 2019, respectively. There were no service fee revenues for the three and nine months ended September 30, 2020. During the three and nine months ended September 30, 2019, the Company recorded $400,000 of revenue related to its agreement with Surface, of which $300,000 was due to the exercise by Surface of its product option and $100,000 was for an exclusive product license. During the three and nine months ended September 30, 2020 the Company received $50,000 for the annual maintenance fee of the exclusive product license. This agreement will expire upon the latest of the expiration of both research programs and all evaluation and testing periods.

Under the agreement, Surface may purchase exclusive options, exercisable by providing a written notice to the Company, to obtain (i) an exclusive product license to make, use, sell and import products incorporating antibodies targeting the first antigen and (ii) an exclusive research tool license to use antibodies targeting the second antigen to perform research. Surface purchased the first option and exercised the second option and the Company entered into an exclusive research tool license agreement with Surface in the third quarter of 2019.

Note 7. COMMITMENTS AND CONTINGENCIES

Sublicense Termination Payments

In 2006, the Company licensed certain technology to EUSA Pharma SAS ("EUSA"), and in 2008, this technology was sublicensed by EUSA to Glaxo Group Limited ("GSK") for development. GSK terminated its sub-license with EUSA in March 2010 and ownership of the technology reverted back to the Company. The Company may be required to pay EUSA up to $25.5 million plus ongoing royalty payments of 1% of net sales upon the occurrence of certain events involving the previously licensed technology, including a Phase 3 clinical trial, Food and Drug Administration acceptance and approval and product sales. The Company is not planning any further commercialization efforts related to the previously licensed technology, and therefore does not anticipate any of the above described amounts will be paid.

Operating Lease

The Company leases its facilities from 1895 Management, Ltd., a New York corporation controlled by an entity affiliated with a director of the Company, under non-cancellable operating leases. The lease agreement requires monthly rental payments of $14,000 through October 31, 2020. The Company entered into a lease extension in August 2020, which requires monthly rental payments of $14,511 commencing November 2020 continuing through October 2022. The Company is responsible for all maintenance, utilities, insurance and taxes related to the facility.

As of September 30, 2020, the future minimum payments for the operating lease are $43,022 in 2020, $174,132 in 2021, and $145,110 in 2022.

Rent expense incurred under the operating lease was $42,000 and $126,000 for each of the three and nine months ended September 30, 2020 and 2019, respectively.

Contingencies

The Company is subject to claims and assessments from time to time in the ordinary course of business. The Company records a provision for a liability when it believes that it is both probable that a liability has been incurred and the amount can be reasonably estimated. Significant judgment is required to determine both probability and the estimated amount.

In the normal course of business, the Company may become involved in legal proceedings. The Company will accrue a liability for such matters when it is probable that a liability has been incurred and the amount can be reasonably estimated. When only a range of possible loss can be established, the most probable amount in the range is accrued. If no amount within this range is a better estimate than any other amount within the range, the minimum amount in the range is accrued. The accrual for a litigation loss contingency might include, for example, estimates of potential damages, outside legal fees and other directly related costs expected to be incurred. As of September 30, 2020, and December 31, 2019, the Company was not involved in any material legal proceedings.

Note 8. LONG-TERM DEBT

On May 8, 2020, the Company received the PPP Loan in the amount of $1,133,600. The PPP Loan matures on May 8, 2022, with no principal payments required prior to the maturity date, and bears interest at an annual rate of 1.0%, with interest payments commencing on November 8, 2020, less the amount of any potential forgiveness. The PPP Loan may be repaid at any time prior to maturity without incurring prepayment penalties. Pursuant to the CARES Act, all or a portion of the PPP Loan may be forgiven if the PPP Loan is used for qualifying expenses as described in the CARES Act, subject to certain conditions. The Company intends to seek forgiveness for this loan, but until such forgiveness is granted the loan has been recorded as long-term debt and related interest has been accrued accordingly. As of September 30, 2020, the Company has reflected accrued interest and interest expense of $5,000 within its condensed consolidated balance sheet and condensed statement of operations and comprehensive loss, respectively.

Note 9. CONVERTIBLE DEBENTURE

The senior secured convertible debt comprises the following (in thousands):

	As of September 30, 2020	As of December 31, 2019
Senior secured convertible debenture	$ 8,531	$ -
Unamortized original issuance discount and debt issuance costs	(641)	-
Total convertible debt	$ 7,890	$ -

On July 30, 2020, the Company consummated the Convertible Debt Financing pursuant to which the Company issued the Debenture in the principal amount of $8,640,000 for a purchase price of $8,000,000, which reflects an original issue discount of approximately 8%. The closing of the sale of the Debenture occurred on August 3, 2020.

The Debenture will mature on the August 3, 2021. The Debenture accrues interest at 7% per year and is convertible into shares of common stock at the holder's option, at a conversion price of $9.4125 per share, subject to certain customary adjustments ("Optional Conversion"). Should a holder elect to convert prior to maturity, the holder is entitled to a cash payment for interest that would have been earned by the holder through the original maturity of the Debenture (the "Interest Make-Whole").

Subject to the satisfaction of certain conditions, at any time, the Company may elect to redeem all or any portion of the Debenture for an amount equal to 115% of the outstanding principal balance being redeemed plus all accrued unpaid interest on the amount being redeemed and an amount due under the Interest Make-Whole (the "Optional Redemption").

The Debenture also provides that in connection with future capital raising transactions (subject to certain exceptions), the Company must offer to use 20% of the funds raised to redeem amounts outstanding under the Debenture ("Mandatory Redemption"). Any redemption in this circumstance will be at the election of the holder. Consistent with the Optional Conversion or Optional Redemption provisions, the Mandatory Redemption is subject to the Interest Make-Whole. During the three and nine month periods ended September 30, 2020, the Company made payments under the Mandatory Redemption provision totaling $116,329 consisting of $108,719 for principal repayments and $7,610 for accrued and make-whole interest.

The Debenture contains customary representations and warranties and affirmative and restrictive covenants, including limitations on indebtedness, liens, dispositions of assets, organizational document amendments, change of control transactions, stock repurchases, indebtedness repayments, dividends, affiliate transactions and certain other matters. The Company's obligations under the Debenture can be accelerated upon the occurrence of certain customary events of default and are secured under a security agreement by a lien on substantially all of the Company's assets, subject to certain exceptions. In the event of default and acceleration of the Company's obligations, the Company would be required to pay the outstanding principal balance of the Debenture plus all accrued unpaid interest and amounts due under the Interest Make-Whole, subject to alternate payment in the event that the event of default prevents the holder from converting the Debenture or disposing of the shares issuable thereunder, and all other amounts due in respect of the Debenture.

If the Company, at any time while this Debenture is outstanding: (i) pays a stock dividend or otherwise makes a distribution or distributions payable in shares of common stock on shares of common stock or any common stock equivalents, (ii) subdivides outstanding shares of common stock into a larger number of shares, (iii) combines (including by way of a reverse stock split) outstanding shares of common stock into a smaller number of shares or (iv) issues, in the event of a reclassification of shares of the common stock, any shares of capital stock of the Company, then the conversion price will be multiplied by a fraction, the numerator of which will be the number of shares of common stock outstanding immediately before such event, and the denominator of which will be the number of shares of common stock outstanding immediately after such event.

In addition to the adjustments above, if the Company grants, issues, or sells any common stock equivalents or rights to purchase stock, warrants, securities, or other property pro rata to the holders of any class of shares of common stock (the "Purchase Rights"), then upon subsequent conversion of the Debenture, the holder will be entitled to acquire the aggregate Purchase Rights which the holder could have acquired if the holder had held the number of shares of common stock acquirable upon complete conversion of the Debenture immediately before such grant, issuance or sale of Purchase Rights.

The Company evaluated the Debenture and determined that the Interest Make-Whole feature and Optional Redemption meet the definition of an embedded derivative liability measured at fair value. On the issuance date, August 3, 2020, the fair value of the bifurcated embedded derivative liability was $65,000.

The Company incurred $50,000 in fees paid to 3i in connection with the issuance of the Debenture. These costs were primarily allocated to the debt component and recognized as additional debt discount. The Company amortizes the debt discount, including the initial value of the derivative liability of $65,000, allocated fees of $50,000 and the original issuance discount of $640,000, over the term of the Debenture using the effective interest method. The annual effective interest rate is 16.54%. Total interest expense under the Senior Secured Convertible Debenture for the three and nine months ended September 30, 2020 was $210,923, prior to impact of change in fair value of derivative liability.

The fair value of the derivative liability as of September 30, 2020 was $0. The Company recorded the change in the fair value of $65,000 as a reduction to interest expense in its condensed consolidated statement of operations and comprehensive loss.

Note 10. COMMON STOCK RESERVED FOR ISSUANCE

Common stock has been reserved for the following potential future issuances:

	As of September 30, 2020	As of December 31, 2019
Shares underlying outstanding stock options	891,748	579,731
Shares available for future stock option grants	208,395	230,952
Exchange of Vaccinex Products, LP units	1,154,935	1,173,500
Conversion of VX3 units	1,318,797	1,318,797
Total shares of common stock reserved	3,573,875	3,302,980

During the nine months ended September 30, 2020 and 2019, 18,565 and 4,455 units, respectively, of Vaccinex Products, LP were exchanged for shares of the Company's common stock at par value of $0.0001 per share.

Note 11. STOCK-BASED COMPENSATION

2011 Employee Equity Plan

In connection with the adoption of the Company's 2018 Omnibus Incentive Plan (the "2018 Plan") in August 2018, the Company ceased granting stock options under the Company's 2011 Employee Equity Plan (the "2011 Plan"). However, the 2011 Plan will continue to govern the terms and conditions of the outstanding stock options previously granted thereunder. Any shares of stock related to awards outstanding under the 2011 Plan that terminate by expiration, forfeiture, cancellation, or otherwise without the issuances of such shares will become available for grant under the 2018 Plan. Stock options granted under the 2011 Plan expire in five or ten years from the date of grant.

2018 Omnibus Incentive Plan

In August 2018, the Company's board of directors adopted, and its stockholders approved, the 2018 Plan, which allows for the granting of stock, stock options, and stock appreciation rights awards to employees, advisors and consultants. Stock options granted under the 2018 Plan may be either incentive stock options or non-statutory stock options. Incentive stock options may be granted to employees, advisors and consultants at exercise prices of no less than the fair value of the common stock on the grant date. If at the time of grant, the optionee owns stock representing more than 10% of the voting power of all classes of stock of the Company, the exercise price must be at least 110% of the fair value of the common stock on the grant date as determined by the board of directors. Non-statutory stock options may be granted to employees, advisors and consultants at exercise prices of less than the fair market value of a share of common stock on the date the non-statutory stock option is granted but shall under no circumstances be less than adequate consideration as determined by the board of directors for such a share. The vesting period of stock option grants is determined by the board of directors, ranging from zero to eight years. Stock options granted under the 2018 Plan expire in five or ten years from the date of grant.

The Company initially reserved 425,000 shares of common stock for issuance, subject to certain adjustments, pursuant to awards under the 2018 Plan. Any shares of common stock related to awards outstanding under the 2011 Plan as of the effective date of the 2018 Plan, which thereafter terminate by expiration, forfeiture, cancellation or otherwise without the issuance of such shares, will be added to, and included in, the number of shares of common stock available for grant under the 2018 Plan. In addition, effective January 1, 2020 and continuing until the expiration of the 2018 Plan, the number of shares of common stock available for issuance under the 2018 Plan will automatically increase annually by 2% of the total number of issued and outstanding shares of the Company's common stock as of December 31st of the immediately preceding year or such lesser number as the Company's board of directors may decide, which may be zero. Accordingly, on January 1, 2020, 297,743 additional shares of common stock became available for issuance under the 2018 Plan.

A summary of the Company's stock option activity and related information is as follows:

	Stock Options	Weighted-Average Exercise Price	Weighted-Average Remaining Contractual Life (Years)	Aggregate Intrinsic Value (in thousands)
Balance as of December 31, 2019	579,731	$ 8.04	7.0	$ 120
Granted	324,300	4.50		
Exercised	(3,783)	5.11		$ 3
Canceled	(8,500)	8.10		
Balance as of September 30, 2020	891,748	$ 6.77	7.3	$ -
Exercisable as of September 30, 2020	569,724	$ 7.75	6.5	$ -

The weighted-average grant date fair value of stock options granted to employees and directors for the nine months ended September 30, 2020 and 2019 was $2.73 per share and $3.35 per share, respectively. The aggregate grant date fair value of stock options that vested during the nine months ended September 30, 2020 and 2019 was $719,632 and $105,061, respectively.

The intrinsic value of stock options vested and exercisable and expected to vest and become exercisable is calculated based on the difference between the exercise price and the fair value of the Company's common stock as of September 30, 2020 and December 31, 2019. The intrinsic value of exercised stock options is the difference between the fair value of the underlying common stock and the exercise price as of the exercise date.

As of September 30, 2020 and December 31, 2019, total unrecognized compensation cost related to stock options granted to employees was $926,591 and $627,129, respectively, which is expected to be recognized over a weighted-average period of 2.96 and 2.39 years, respectively.

The grant date fair value of employee stock options was estimated using a Black-Scholes option-pricing model with the following weighted-average assumptions:

	Nine Months Ended September 30,	
	2020	2019
Expected term (in years)	6.3	6.0
Expected volatility	75%	75%
Risk-free interest rate	0.9%	2.5%
Expected dividend yield	-%	-%

In March 2020, the Company issued 20,000 shares of common stock as compensation for administrative fees incurred in connection with entering into a purchase agreement with Keystone. Pursuant to the terms of the Purchase Agreement, Keystone has agreed to purchase up to $5,000,000 of shares of the Company's common stock. At the time of issuance, the fair market value of the shares was $4.00, and, as a result, $80,000 was included in general and administrative expenses for the nine months ended September 30, 2020.

Total stock-based compensation expense recognized in the condensed consolidated statements of operations and comprehensive loss is as follows (in thousands):

	Three Months Ended September 30,		Nine Months Ended September 30,	
	2020	2019	2020	2019
Research and development	$ 37	$ 26	$ 96	$ 72
General and administrative	54	111	565	237
Total stock-based compensation expense	$ 91	$ 137	$ 661	$ 309

Note 12.INCOME TAXES

No provision for income taxes was recorded in either of the three months ended September 30, 2020 and 2019. The Company remains in a cumulative loss position with a full valuation allowance recorded against its net deferred income tax assets as of September 30, 2020.

The Company evaluates tax positions for recognition using a more-likely-than-not recognition threshold, and those tax positions eligible for recognition are measured as the largest amount of tax benefit that is greater than 50% likely of being realized upon the effective settlement with a taxing authority that has full knowledge of all relevant information. As of September 30, 2020 and December 31, 2019, the Company had no unrecognized income tax benefits that would affect the Company's effective tax rate if recognized.

In response to the COVID-19 pandemic, federal, state and local governments at various times enacted relief measures to provide aid and economic stimulus. These measures included deferring the due dates of tax payments or other changes to income and non-income-based tax laws. For the three and nine months ended September 30, 2020, there were no material tax impacts to the Company's condensed consolidated financial statements as it relates to COVID-19 measures. The Company continues to monitor for additional developments and for guidance issued by the U.S. Treasury Department, the Internal Revenue Service and other governmental bodies.

Note 13. NET LOSS PER SHARE ATTRIBUTABLE TO COMMON STOCKHOLDERS

The following weighted-average common stock equivalents were excluded from the calculation of diluted net loss per share for the periods presented as they had an anti-dilutive effect:

	Three Months Ended September 30,		Nine Months Ended September 30,	
	2020	2019	2020	2019
Options to purchase common stock	850,716	604,599	742,797	527,573
Contingently issuable common stock upon exchange of Vaccinex Products, LP units	1,163,141	1,198,111	1,170,047	1,199,906
Contingently issuable common stock upon exchange of VX3 units	1,318,797	1,318,797	1,318,797	1,318,797

Note 14. SEGMENT AND GEOGRAPHIC INFORMATION

The Company's chief operating decision maker, its Chief Executive Officer, reviews its operating results on an aggregate basis for purposes of allocating resources and evaluating financial performance. The Company has one business activity, the discovery and development of targeted biotherapeutics to treat serious diseases and conditions with unmet medical needs, and there are no segment managers who are held accountable for operations or operating results. Accordingly, the Company operates in one reportable segment. As of September 30, 2020 and December 31, 2019, all long-lived assets are located in the United States.

Note 15. RELATED PARTY TRANSACTIONS

As discussed in Note 7, the Company leases its facility from 1895 Management, Ltd., a New York corporation controlled by an entity affiliated with the Company's chairman and major stockholder of the Company. Rent expense incurred under this operating lease was $42,000 and $126,000 for the three and nine months ended September 30, 2020 and 2019.

As discussed in Note 6, in November 2017, the Company entered into a research collaboration and license option agreement with Surface to identify and select antibodies against two target antigens, using the Company's proprietary technology as described in the agreement. J. Jeffrey Goater, a member of the Company's board of directors, served as the Chief Business Officer of Surface at that time, and currently serves as the Chief Executive Officer and a director of Surface. The Company received $4,000 and $123,000 in service fee payments for work conducted under the agreement for the three and nine months ended September 30, 2019, respectively. There were no service fee payments for work conducted under the agreement for the three and nine month periods ended September 30, 2020. During the three and nine months ended September 30, 2019, the Company recorded $400,000 of revenue related to its agreement with Surface, of which $300,000 was due to the exercise by Surface of its product option and $100,000 was for an exclusive product license. During the three and nine months ended September 30, 2020 the Company received $50,000 as an annual maintenance fee for the exclusive product license. This agreement will expire upon the latest of the expiration of both research programs and all evaluation and testing periods.

On January 21, 2020, the Company entered into a stock purchase agreement pursuant to which the Company issued and sold to certain investors 1,468,563 shares of its common stock at a purchase price of $5.09 per share for aggregate gross proceeds of $7.5 million ("the January 2020 Private Placement"). FCMI Parent Co., the Company's majority stockholder, which is controlled by Albert D. Friedberg, the chairman of the Company's board of directors, Vaccinex (Rochester) L.L.C., which is majority owned and controlled by Dr. Maurice Zauderer, the Company's President, Chief Executive Officer, and a member of its board of directors, and Jacob Frieberg, a member of the Company's board of directors, purchased 982,318, 98,231, and 39,292 shares of our common stock for aggregate purchase prices of $4,999,999, $499,996, and $199,996, respectively, in the January 2020 Private Placement. In connection with the January 2020 Private Placement, on January 23, 2020, the Company entered into a registration rights agreement with the investors pursuant to which the Company filed a registration statement on Form S-3 (File No. 333-236417), declared effective on March 11, 2020, to register the resale of the shares acquired by the investors in the January 2020 Private Placement.

On July 9, 2020, the Company entered into a stock purchase agreement (the "July 2020 Stock Purchase Agreement") with Friedberg Global-Macro Hedge Fund, Ltd. (the "Investor"), pursuant to which the Company issued and sold to the Investor 1,126,760 shares (the "Shares") of the Company's common stock, at a purchase price of $3.55 per Share (the "Private Placement"), for gross proceeds of $4.0 million. Albert D. Friedberg, the Company's chairman and beneficial owner of a majority of the Company's outstanding common stock, controls Friedberg Mercantile Group, the investment manager of the Investor, which exercises voting and dispositive power over shares held directly by the Investor. The closing of the Private Placement occurred on July 10, 2020. The Company intends to use the net proceeds from the Private Placement to fund the ongoing development of pepinemab, the Company's lead product candidate, and for working capital and general corporate purposes. Also, on July 10, 2020, the Company entered into a registration rights agreement with the Investor that affords the Investor certain resale registration rights with respect to the Shares.

Item 2. Management's Discussion and Analysis of Financial Condition and Results of Operations

References in this Quarterly Report on Form 10-Q, or this Report, to the "Company," "we," "our," or "us" mean Vaccinex, Inc. and its subsidiaries except where the context otherwise requires You should read the following discussion and analysis of financial condition and results of operations together with our condensed consolidated financial statements and related notes included elsewhere in this Report, as well as the audited financial statements, related notes and Management's Discussion and Analysis of Financial Condition and Results of Operations and other disclosures included in our Annual Report on Form 10-K for the fiscal year ended December 31, 2019, or the Annual Report.

Cautionary Note Regarding Forward-Looking Statements

The following discussion and other parts of this Report contain forward-looking statements that involve risk and uncertainties, such as statements of our plans, objectives, expectations and intentions. In some cases, you can identify forward-looking statements by terminology such as "may," "will," "should," "expects," "plans," "anticipates," "believes," "estimates," "predicts," "potential," "intends" or "continue," or the negative of these terms or other comparable terminology. Forward-looking statements include, but are not limited to, statements about:

- our ability to continue as a going concern;
- the impacts of the COVID-19 pandemic on the expected timing and progress of our clinical trials, as well as other impacts of the COVID-19 pandemic on the economy, our industry, and our business, financial condition and results of operations, including our ability to raise capital;
- the sufficiency of the financing arrangements we have entered into, that is intended to fund our payroll and certain other operations for a limited period of time and our ability to service our outstanding debt obligations;
- our estimates regarding our expenses, future revenues, anticipated capital requirements and our needs for additional financing;
- the implementation of our business model and strategic plans for our business and technology;
- the timing and success of the commencement, progress and receipt of data from any of our preclinical and clinical trials;
- our expectations regarding the potential safety, efficacy or clinical utility of our product candidates;
- the expected results of any clinical trial and the impact on the likelihood or timing of any regulatory approval;
- the difficulties in obtaining and maintaining regulatory approval of our product candidates;
- the rate and degree of market acceptance of any of our product candidates;
- the success of competing therapies and products that are or become available;
- regulatory developments in the United States and foreign countries;
- current and future legislation regarding the healthcare system;
- the scope of protection we establish and maintain for intellectual property rights covering our technology;
- developments relating to our competitors and our industry;
- our failure to recruit or retain key scientific or management personnel or to retain our executive officers;
- the performance of third parties, including collaborators, contract research organizations and third-party manufacturers;

- the development of our commercialization capabilities, including the need to develop or obtain additional capabilities; and
- our use of the proceeds from the offerings of our common stock.

Although we believe that the expectations reflected in the forward-looking statements contained herein are reasonable, we cannot guarantee future results, levels of activity, performance, or achievements. These statements are only current predictions and are subject to known and unknown risks, uncertainties and other factors that may cause our or our industry's actual results, levels of activity, performance or achievements to be materially different from those anticipated by the forward-looking statements. Factors that could cause or contribute to such differences include, but are not limited to, those discussed in the risk factors identified in the "Risk Factors" section of this Report, and in Part II, Item 1A of the Annual Report, as well as in our other filings with the Securities and Exchange Commission, or SEC. The forward-looking statements speak only as of the date they were made. Except as required by law, after the date of this Report, we are under no duty to update or revise any of the forward-looking statements, whether as a result of new information, future events or otherwise. We qualify all of our forward-looking statements by the foregoing cautionary statements.

Company Overview

We are a clinical-stage biotechnology company engaged in the discovery and development of targeted biotherapeutics to treat serious diseases and conditions with unmet medical needs, including cancer, neurodegenerative diseases, and autoimmune disorders. We believe we are the leader in the field of semaphorin 4D, or SEMA4D, biology and that we are the only company targeting SEMA4D as a potential treatment for cancer, neurodegenerative diseases, or autoimmune disorders. SEMA4D is an extracellular signaling molecule that regulates the migration of immune and inflammatory cells to sites of injury, cancer, or infection. We are leveraging our SEMA4D antibody platform and our extensive knowledge of SEMA4D biology to develop our lead product candidate, pepinemab, an antibody that we believe utilizes novel mechanisms of action. We are focused on developing pepinemab for the treatment of non-small cell lung cancer, or NSCLC, Huntington's disease, and Alzheimer's disease. Additionally, third party investigators are studying pepinemab in clinical trials in osteosarcoma and melanoma as well as in "window of opportunity" studies in other indications. We have developed multiple proprietary platform technologies and are developing product candidates to address serious diseases or conditions that have a substantial impact on day-to-day functioning and for which treatment is not addressed adequately by available therapies. We employ our proprietary platform technologies, including through our work with our academic collaborators, to identify potential product candidates for sustained expansion of our internal product pipeline and to facilitate strategic development and commercial partnerships.

Our lead platform technologies include our SEMA4D antibody platform and our ActivMAb antibody discovery platform. In addition, we and our academic collaborators are using our Natural Killer T, or NKT, vaccine platform to discover product candidates that target and extend the activity of NKT cells. Our lead product candidate, pepinemab, is currently in clinical development for the treatment of NSCLC, osteosarcoma, and Huntington's disease, through our efforts or through investigator-sponsored trials, or ISTs. Our additional product candidates VX5 and VX25 are in earlier stages of development and were selected using our ActivMAb and NKT vaccine platforms, respectively. We believe our multiple platform technologies position us well for continued pipeline expansion and partnership opportunities going forward.

We have generated a limited amount of service revenue from collaboration agreements but have not generated any revenue from product sales to date. We continue to incur significant development and other expenses related to our ongoing operations. As a result, we are not and have never been profitable and have incurred losses in each period since our inception. We reported a net loss of $8.8 million and $7.6 million for the three months ended September 30, 2020 and 2019, respectively, and a net loss of $22.4 and $25.5 million for the nine months ended September 30, 2020 and 2019, respectively. As of September 30, 2020, and December 31, 2019, we had cash and cash equivalents of $17.1 million and $2.8 million, respectively. We expect to continue to incur significant losses for the foreseeable future, and we expect these losses to increase as we continue our research and development of, and seek regulatory approvals for, our product candidates. We may also encounter unforeseen expenses, difficulties, complications, delays and other unknown factors, including as a result of the COVID-19 pandemic, that may adversely affect our business. 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 revenues, if any.

Our recurring net losses and negative cash flows from operations raised substantial doubt regarding our ability to continue as a going concern within one year after the issuance of our consolidated financial statements for the year ended December 31, 2019. Until we can generate sufficient revenue from the commercialization of our product candidates, we expect to finance our operations through the public or private sale of equity, debt financings or other capital sources, such as government funding, collaborations, strategic alliances or licensing arrangements with third parties. For example, during the nine months ended September 30, 2020 we closed three private placements of shares of our common stock for aggregate gross proceeds of approximately $13.5 million, including $7.5 million and $4.0 million through a January 2020 private placement and a July 2020 private placement, respectively, and $2.0 million in September 2020 through an award from the Alzheimer's Drug Discovery Foundation, or ADDF, in the form of an investment in our common stock. On March 27, 2020, we announced that we had (i) entered into an Open Market Sale Agreement with Jefferies LLC, or Jefferies, and filed a related prospectus supplement pursuant to which we were able to issue and sell up to $11.5 million of shares of our common stock from time to time through Jefferies as sales agent and (ii) entered into a Purchase Agreement with Keystone Capital Partners, LLC, or Keystone, pursuant to which Keystone agreed to purchase up to an aggregate of $5.0 million of shares of our common stock at our direction from time to time. In August 2020, we ceased use of the Purchase Agreement with Keystone, and in September 2020, we filed a replacement prospectus supplement related to the Open Market Sale Agreement pursuant to which we may sell up to $113 million of shares of our common stock through Jefferies. During the third quarter of 2020, 3,815,600 shares were sold through the Open Market Sale Agreement for proceeds of $12.3 million, net of commission, and 47,319 shares were sold through the Purchase Agreement with Keystone for proceeds of $300,000, net of discount. Through September 30, 2020, we received total proceeds, net of underwriting discounts and commissions, before expenses of approximately $15.0 million through the Open Market Sale Agreement and the Purchase Agreement with Keystone. On August 3, 2020, we closed the sale of our 7% Original Issue Discount Senior Secured Convertible Debenture due August 3, 2021, or the Debenture, for a purchase price of $8.0 million, or the Convertible Debt Financing. In addition, on May 8, 2020, we received a loan of approximately $1.1 million, or the PPP Loan, under the Paycheck Protection Program established as part of the Coronavirus Aid, Relief, and Economic Security Act, or the CARES Act, to provide loans to qualifying businesses to enable them to continue operations and keep their employees on payroll during the COVID-19 pandemic. For more information on the terms of the PPP Loan, see Note 8 to our unaudited condensed consolidated financial statements. In the third quarter, we raised total proceeds of approximately $26.6 million, net of commissions and discounts before expenses, through five financing transactions: our Open Market Sale Agreement with Jefferies, the Convertible Debt Financing, private placement transaction, the ADDF award, and our Purchase Agreement with Keystone. We also received $575,000 in proceeds from our $750,000 grant from the Alzheimer's Association under its 2020 Part the Cloud Program and expect to receive the remainder of the amounts due under the grant by third quarter of 2021. Our cash and cash equivalents were $17.1 million and total current assets were $18.2 million at September 30, 2020, which the Company anticipates will be sufficient to fund our planned operations through the third quarter 2021. The Company plans to raise additional funds in the first half of 2021. There can be no assurances that we will be able to secure additional financing when needed, or if available, that it will be sufficient to meet our needs or on favorable terms.

In order to mitigate the spread of COVID-19, governments have imposed unprecedented restrictions on business operations, travel, and gatherings, resulting in a global economic downturn and other adverse economic and societal impacts, which has had an adverse impact on our strategic plans, certain of our clinical trial operations, and our ability to raise additional capital necessary to continue as a going concern. We had previously anticipated initiating a trial of pepinemab in Alzheimer's disease in mid-2020, but the initial enrollment date is now delayed until the first half of 2021. In addition, as discussed above, to mitigate the impacts of the COVID-19 pandemic, including impacts on the Company's ability to raise capital and to maintain its personnel, the Company applied for and received the PPP Loan. We may experience further disruptions as a result of the COVID-19 pandemic that could adversely impact our business, including disruption of research and clinical development activities, plans for release of data, manufacturing, supply, and interactions with regulators and other third parties, and further difficulties in raising additional capital. The extent to which the COVID-19 pandemic may impact our business will depend on future developments, which are highly uncertain and cannot be predicted with confidence.

Financial Overview

Revenue

To date, we have not generated any revenue from product sales. During the nine months ended September 30, 2020 and 2019, we generated a limited amount of service revenue from our collaboration agreements, including with Surface Oncology, Inc. and Merck Sharp & Dohme Corp.

Our ability to generate revenue and become profitable depends on our ability to successfully obtain marketing approval of and commercialize our product candidates. We do not expect to generate product revenue in the foreseeable future as we continue our development of, and seek regulatory approvals for, our product candidates, and potentially commercialize approved products, if any.

Operating Expenses

Research and Development. Research and development expenses consist primarily of costs for our clinical trials and activities related to regulatory filings, employee compensation-related costs, supply expenses, equipment depreciation and amortization, consulting and other miscellaneous costs. The following table sets forth the components of our research and development expenses and the amount as a percentage of total research and development expenses for the periods indicated.

	Three Months Ended September 30,				Nine Months Ended September 30,			
	2020		2019		2020		2019	
	(in thousands)	%	(in thousands)	%	(in thousands)	%	(in thousands)	%
Clinical trial costs	$ 5,215	71%	$ 4,840	74%	$ 11,175	65%	$ 16,138	75%
Wages, benefits, and related costs	1,118	15%	970	15%	3,319	19%	2,887	14%
Preclinical supplies and equipment depreciation	489	7%	479	7%	1,415	8%	1,435	7%
Consulting, non-clinical trial services, and other	512	7%	254	4%	1,391	8%	799	4%
Total research and development expenses	$ 7,334		$ 6,543		$ 17,300		$ 21,259	

We expense research and development costs as incurred. We record costs for certain development activities, such as clinical trials, based on an evaluation of the progress to completion of specific tasks using data such as patient enrollment. We do not allocate employee related costs, depreciation, rental and other indirect costs to specific research and development programs because these costs are deployed across multiple of our product programs under research and development.

Our current research and development activities primarily relate to clinical development in the following indications:

- **Head & Neck Squamous Cell Carcinoma (HNSCC).** We are planning to evaluate pepinemab in combination with pembrolizumab in HNSCC in a Phase 1b/2 clinical trial. We recently completed a phase 2 study in NSCLC with pepinemab in combination with avelumab, and we announced near topline data for this trial at the virtual American Society of Clinical Oncology conference in late May 2020. This data suggested that immunotherapy naïve and PD-L1 negative or low patients achieved higher response rates with the combination than with the avelumab checkpoint inhibitor alone. This could provide a potentially important expansion of the opportunity for immunotherapy in cancer. HNSCC is a particularly attractive application of combination immunotherapy with pepinemab because of high levels of expression of SEMA4D that have been shown to induce myeloid suppressor cells in this indication. The combined benefit of increased infiltration and activity of cytotoxic CD8+ T cells and reduced immunosuppression may provide significantly enhanced benefit to patients.

- **Huntington's Disease (HD).** We are evaluating pepinemab for the treatment of HD in our Phase 2 SIGNAL trial. Enrollment in this trial, consisting of 265 subjects, was completed in December 2018 and topline data was reported in late September 2020. Although the study did not meet its prespecified primary endpoints, it provided important new information that is likely to influence the design of further studies. Trial data continues to be analyzed to determine a path forward in Huntington's and other neurodegenerative disease indications. The Company is evaluating its development strategy in terms of business opportunity and near-term focus on Huntington's or Alzheimer's disease in the event that resources are limiting.
- **Alzheimer's Disease.** Given the current escalation in the COVID-19 pandemic, we are delaying plans to initiate a clinical trial of pepinemab in Alzheimer's disease until 2021 with a study design that is based, in part, on knowledge gained from the SIGNAL trial in Huntington's disease.

Results of Operations

The following table set forth our results of operations for the periods presented (in thousands):

	Three Months Ended September 30,		Nine Months Ended September 30,	
	2020	2019	2020	2019
Revenue	$ 50	$ 404	$ 50	$ 523
Grant revenue	575	-	575	-
Costs and expenses:				
Cost of revenue	2	8	2	199
Research and development	7,334	6,543	17,300	21,259
General and administrative	1,872	1,531	5,565	4,741
Total costs and expenses	9,208	8,082	22,867	26,199
Loss from operations	(8,583)	(7,678)	(22,242)	(25,676)
Interest expense	(148)	-	(150)	-
Other expense, net	(23)	36	(14)	139
Loss before provision for income taxes	(8,754)	(7,642)	(22,406)	(25,537)
Provision for income taxes	-	-	-	-
Net loss	(8,754)	(7,642)	(22,406)	(25,537)
Net loss attributable to noncontrolling interests	-	-	-	-
Net loss attributable to Vaccinex, Inc.	$ (8,754)	$ (7,642)	$ (22,406)	$ (25,537)

Comparison of the Three Months Ended September 30, 2020 and 2019

Operating Expenses

	Three Months Ended September 30,			
	2020	2019	$ Change	% Change
	(in thousands)			
Research and development	$ 7,334	$ 6,543	$ 791	12%
General and administrative	1,872	1,531	341	22%
Total operating expenses	$ 9,206	$ 8,074	$ 1,132	14%

Research and Development. Research and development expenses in the three months ended September 30, 2020 increased by $0.8 million, or 12%, compared to the three months ended September 30, 2019. This increase was primarily attributable to increased analytical costs incurred in conjunction with the closeout of the SIGNAL trial partially offset by decreased costs for the CLASSICAL-Lung study.

General and Administrative. General and administrative expenses in the three months ended September 30, 2020 increased by $0.3 million, or 22%, compared to the three months ended September 30, 2019. The increase was due to increased stock-based compensation as a result of new option awards to employees and board members, as well as increased directors and officers insurance costs.

Comparison of the Nine Months Ended September 30, 2020 and 2019

Operating Expenses

	Nine Months Ended September 30,			
	2020	2019	$ Change	% Change
	(in thousands)			
Research and development	$ 17,300	$ 21,259	$ (3,959)	(19)%
General and administrative	5,565	4,741	824	17%
Total operating expenses	$ 22,865	$ 26,000	$ (3,135)	(12)%

Research and Development. Research and development expenses in the nine months ended September 30, 2020 decreased by $4.0 million, or 19%, compared to the nine months ended September 30, 2019. This decrease was primarily attributable to decreases in expenses in the CLASSICAL-Lung and SIGNAL studies, as patients have come off study.

General and Administrative. General and administrative expenses in the nine months ended September 30, 2020 increased by $0.8 million, or 17%, compared to the nine months ended September 30, 2019. The increase was due to increased stock-based compensation as a result of new option awards to employees and board members, as well as increased directors and officers insurance costs.

Liquidity and Capital Resources

To date, we have not generated any revenue from product sales. Since our inception in 2001, we have relied on public and private sales of equity and debt financing to fund our operations, in addition to capital contributions from noncontrolling interests and limited service revenue from collaboration agreements.

In July 2019, January 2020, and July 2020, we completed private placements of our common stock and received gross proceeds of $13.8 million, $7.5 million, and $4.0 million, respectively and in September 2020 we received gross proceeds of $2.0 million through an award from ADDF, in the form of an investment in our common stock. Additionally, on March 27, 2020, we announced that we had (i) entered into an Open Market Sale Agreement with Jefferies and filed a prospectus supplement pursuant to which we were able to issue and sell up to $11.5 million of shares of our common stock from time and (ii) entered into a Purchase Agreement with Keystone pursuant to which Keystone agreed to purchase up to an aggregate of $5.0 million of shares of our common stock from time to time. In August 2020, we ceased use of the Purchase Agreement with Keystone, and in September 2020, we filed a replacement prospectus supplement related to the Open Market Sale Agreement pursuant to which we may sell up to $113 million of shares of our common stock through Jefferies. During the third quarter of 2020, 3,815,600 shares were sold through the Open Market Sale Agreement for proceeds of $12.3 million, net of commission, and 47,319 shares were sold through the Purchase Agreement with Keystone for proceeds of $300,000, net of discount. On August 3, 2020, we closed the Convertible Debt Financing discussed below for gross proceeds of $8.0 million. In addition, on May 8, 2020, we received the PPP Loan in the amount of $1.1 million. In the third quarter, we raised total proceeds of approximately $26.6 million, net of commissions and discounts and before expenses, through our Open Market Sale Agreement with Jefferies, the Convertible Debt Financing, the July 2020 private placement transaction, the ADDF award, and our Purchase Agreement with Keystone. We also received $575,000 in proceeds from our $750,000 grant from the Alzheimer's Association under its 2020 Part the Cloud Program.

In August 2020, we entered into a Securities Purchase Agreement, or the SPA, with 3i, LP, as collateral agent and purchaser, or 3i, or the Convertible Debt Financing. Pursuant to the SPA, on August 3, 2020, we issued our 7% Original Issue Discount Senior Secured Convertible Debenture, or the Debenture, in the principal amount of $8.64 million for a purchase price of $8.0 million, which reflects an original issue discount of approximately 8%. The Debenture will mature on August 3, 2021. The Debenture accrues interest at 7% per year and is convertible into shares of our common stock at a conversion price of $9.4125 per share, subject to certain customary adjustments. Subject to the satisfaction of certain conditions, at any time, we may elect to redeem all or any portion of the Debenture for an amount equal to 115% of the outstanding principal balance being redeemed plus all accrued and unpaid interest on the amount being redeemed that would have accrued if the Debenture were held through the maturity date. Our obligations under the Debenture can be accelerated upon the occurrence of certain customary events of default and are secured under a Security Agreement by a lien on substantially all of our assets, subject to certain exceptions.

The Debenture contains customary representations and warranties and affirmative and restrictive covenants, including limitations on indebtedness, liens, dispositions of assets, organizational document amendments, change of control transactions, stock repurchases, indebtedness repayments, dividends, affiliate transactions and certain other matters. The Debenture also provides that in connection with future capital raising transactions, subject to certain exceptions, at the election of the holder we must use 20% of the funds raised to redeem amounts outstanding under the Debenture.

Operating Capital Requirements

Our primary uses of capital are, and we expect will continue to be, compensation and related expenses, third-party research services and amounts due to vendors for research supplies. As of September 30, 2020 and December 31, 2019, our principal source of liquidity was cash and cash equivalents in the amount of $17.1 million and $2.8 million, respectively.

Since our inception in 2001, we have incurred significant net losses and negative cash flows from operations. For the three months ended September 30, 2020 and 2019, we reported a net loss of $8.8 million and $7.6 million, respectively, and $22.4 and $25.5 million for the nine months ended September 30, 2020 and 2019, respectively. As of September 30, 2020 and December 31, 2019, we had an accumulated deficit of $271.0 million and $248.6 million, respectively. We anticipate that we will continue to generate losses for the foreseeable future, and we expect the losses to increase as we continue the development of, and seek regulatory approvals for, our product candidates. We are subject to risks associated with the development of new biopharmaceutical products, and we may encounter unforeseen expenses, difficulties, complications, delays and other unknown factors, including as a result of the COVID-19 pandemic, that may adversely affect our business.

Until we can generate a sufficient amount of revenue from the commercialization of our product candidates, we expect to finance our operations through the public or private sale of equity, debt financings, or other capital sources, such as government funding, collaborations, strategic alliances or licensing arrangements with third parties. We intend to use the net proceeds from our recent private placement, the agreements with Jefferies and Keystone, the Convertible Debt Financing, and the funding we received and expect to receive in 2020 from the Alzheimer's Association and the ADDF to fund the ongoing development of pepinemab and for working capital and general corporate purposes. We have used the funds from the PPP Loan as required for loan forgiveness-eligible purposes under the CARES Act, including payroll, benefits, rent and utilities.

Financing strategies we may pursue include, but are not limited to, the public or private sale of equity, debt financings or funds from other capital sources, such as government funding, collaborations, strategic alliances or licensing arrangements with third parties. There can be no assurances additional capital will be available to secure additional financing, or if available, that it will be sufficient to meet our needs on favorable terms. If we are unable to raise additional capital in sufficient amounts or on terms acceptable to us, we may have to significantly delay, scale back or discontinue the development of one or more of our product candidates. In addition, the Debenture also provides that in connection with future capital raising transactions (subject to certain exceptions), at the election of the holder we must use 20% of the funds raised to redeem amounts outstanding under the Debenture. If we raise additional funds through the public or private sale of equity or debt financings, it could result in dilution to our existing stockholders or increased fixed payment obligations and these securities may have rights senior to those of

our common stock and could contain covenants that would restrict our operations and potentially impair our competitiveness, such as limitations on our ability to incur additional debt, limitations on our ability to acquire, sell or license our intellectual property rights and other operating restrictions that could adversely impact our ability to conduct our business. Any of these events could significantly harm our business, financial condition and prospects.

Cash Flows

The following table summarizes our cash flows for the periods presented:

	Nine Months Ended September 30,	
	2020	2019
	(in thousands)	
Cash used in operating activities	$ (22,265)	$ (24,912)
Cash provided by (used in) investing activities	(291)	14,073
Cash provided by financing activities	36,872	13,800

Operating Activities. We have historically experienced negative cash flows as we have developed our product candidates and continued to expand our business. Our net cash used in operating activities primarily results from our net loss adjusted for non-cash expenses and changes in working capital components as we have continued our research and development, and is influenced by the timing of cash payments for research related expenses. Our primary uses of cash from operating activities are compensation and related-expenses, employee-related expenditures, third-party research services and amounts due to vendors for research supplies. Our cash flows from operating activities will continue to be affected principally by the extent to which we increase spending on personnel, research and development and other operating activities as our business grows.

During the nine months ended September 30, 2020, operating activities used $22.7 million in cash, primarily as a result of our net loss of $22.4 million.

During the nine months ended September 30, 2019, operating activities used $24.9 million in cash, primarily as a result of our net loss of $25.5 million.

Investing Activities. Cash used in investing activities during the nine months ended September 30, 2020 resulted from purchases of property and equipment. Cash provided by investing activities during the nine months ended September 30, 2019 resulted from sales and maturities of marketable securities.

Financing Activities. During the nine months ended September 30, 2020, financing activities provided $37.3 million, of which $11.4 million was attributable to the private placement of common stock, $17.0 million, net of underwriting commissions and discounts was due to the issuance of the Company's common stock pursuant to the Open Market Sale Agreement and Purchase Agreement with Keystone, $7.8 million due to the issuance of Convertible Debt, and $1.1 million was from long-term debt. During the nine months ended September 30, 2019, financing activities provided $13.8 million attributable to the private placement of common stock.

Off-Balance Sheet Arrangements

We did not have any off-balance sheet arrangements as defined in the rules and regulations of the SEC.

JOBS Act Accounting Election

We are an "emerging growth company" within the meaning of the Jumpstart Our Business Startups Act or the JOBS Act. Section 107(b) of the JOBS Act provides that an emerging growth company can leverage the extended transition period, provided in Section 102(b) of the JOBS Act, for complying with new or revised accounting standards. Thus, an emerging growth company can delay the adoption of new or revised accounting standards that have different effective dates for public and private companies until those standards apply to private companies. We have elected to use this extended transition period and, as a result, our condensed consolidated financial statements may not be comparable to companies that comply with public company effective dates of such accounting standards.

Critical Accounting Policies and Estimates

Our unaudited condensed consolidated financial statements are prepared in accordance with accounting principles generally accepted in the United States of America. The preparation of these condensed consolidated financial statements requires us to make estimates and assumptions that affect the reported amounts of assets, liabilities, expenses and related disclosures. We evaluate our estimates and assumptions on an ongoing basis. Our estimates are based on historical experience and various other assumptions that we believe to be reasonable under the circumstances. Our actual results could differ from these estimates.

There have been no material changes to our critical accounting policies and significant judgments as compared to the critical accounting policies and estimates disclosed in our Annual Report on Form 10-K for the year ended December 31, 2019.

Impact of Recent Accounting Pronouncements

For a discussion on the impact of recent accounting pronouncements on our business, see Note 2 to our unaudited condensed consolidated financial statements.

Item 3. Quantitative and Qualitative Disclosures about Market Risk

As a smaller reporting company, we are not required to provide the information required by this item.

Item 4. Controls and Procedures

Evaluation of disclosure controls and procedures

Our management, with the participation of our Chief Executive Officer (our principal executive officer) and Chief Financial Officer (our principal financial officer), evaluated the effectiveness of the design and operation of our disclosure controls and procedures as defined in Rules 13a-15(e) and 15d-15(e) under the Securities Exchange Act of 1934, as amended, or the Exchange Act, as of September 30, 2020, the end of the period covered by this Form 10-Q. Based on that evaluation, our Chief Executive Officer and Chief Financial Officer concluded that, as of September 30, 2020, our disclosure controls and procedures were effective.

Changes in internal control over financial reporting

There were no changes in our internal control over financial reporting identified in connection with the evaluation required by Rules 13a-15(d) and 15d-15(d) of the Exchange Act that occurred during the quarter ended September 30, 2020 that materially affected, or are reasonably likely to materially affect, our internal control over financial reporting. Most of our employees are working remotely due to the COVID-19 pandemic. However, we have not experienced any changes to our internal control arising from the COVID-19 pandemic that have materially affected or that are reasonably likely to materially affect our internal control over financial reporting. We are continually monitoring and assessing the COVID-19 pandemic and the impact it may have on our operations, including our internal control.

Part II - OTHER INFORMATION

Item 1A. Risk Factors

An investment in our stock involves a high degree of risk. You should carefully consider the risks set forth in this section, and in Part I, Item 1A of the Annual Report, and all of the other information set forth in this Report, the Annual Report, and in the other reports we file with the SEC. If any of the risks contained in those reports actually occur, our business, results of operation, financial condition, and liquidity could be harmed, the value of our securities could decline and you could lose all or part of your investment. Other than the addition of the text below, there have been no material changes from risk factors disclosed in the Annual Report. See the discussion of the Company's risk factors under Part I, Item 1A. of the Annual Report.

We will require additional capital to finance our operations to continue as a going concern, which may not be available to us on acceptable terms, if at all. As a result, we may not complete the development and commercialization of our product candidates or develop new product candidates and have identified conditions that raise substantial doubt about our ability to continue as a going concern.

Our recurring net losses and negative cash flows from operations raise substantial doubt about our ability to continue as a going concern within one year after the issuance of our consolidated financial statements as of and for the year ended December 31, 2019, as discussed in Note 1 to our consolidated financial statements as of and for the year ended December 31, 2019 included in our Annual Report. Our independent registered public accounting firm also noted this in their report issued on our consolidated financial statements for the years ended December 31, 2019, and 2018. Our cash and cash equivalents were $17.1 million and total current assets were $18.2 million at September 30, 2020, which we anticipate will be sufficient to fund our planned operations through the third quarter of 2021. Our ability to continue as a going concern is dependent upon our ability to obtain additional equity or debt financing, attain further operating efficiencies, reduce expenditures, and, ultimately, to generate revenue. For the foreseeable future, we will have to raise additional working capital to fund our operations. However, no assurance can be given that additional financing will be available, or, if available, will be on terms acceptable to us. Our financial statements do not include any adjustments that might result from the outcome of this uncertainty.

Our operations have consumed substantial amounts of cash since our inception. We expect to continue to spend substantial amounts to advance the clinical development of our product candidates. Given our projected operating requirements and our existing cash and cash equivalents and marketable securities, we obtained approximately $26.6 million, net of commissions and discounts and before expenses, in total proceeds through several financing transactions described elsewhere in this Report. We also received $575,000 in proceeds from our $750,000 grant from the Alzheimer's Association under its 2020 Part the Cloud Program.

Even with the arrangements described above, we will need to complete additional financing transactions in order to continue operations. These arrangements may also not be sufficient in the near-term. Given, among other things, the current economic uncertainty associated with the COVID-19 pandemic, and our recent stock price performance, our arrangement with Jefferies and other financing strategies we may pursue may not be sufficient to fund our operations in the near term. There can be no assurances that we will be able to secure additional financing, or if available, that it will be sufficient to meet our needs or on favorable terms.

On May 8, 2020, we received the PPP Loan for approximately $1.1 million under the Paycheck Protection Program. However, the PPP Loan was only sufficient to fund our payroll and other eligible expenses for a limited period of time.

Circumstances may also cause us to consume capital even more rapidly than we currently anticipate. For example, as we move our lead product candidate through clinical trials and submit Investigational New Drug applications for new indications or other product candidates, we may have adverse results requiring us to find new product candidates or our development plans and anticipated clinical trial design may need to be altered.

Additional fundraising efforts may divert our management from our day-to-day activities, which may adversely affect our ability to develop and commercialize future product candidates. We cannot guarantee that future financing will be available in sufficient amounts or on terms acceptable to us, if at all. If we are unable to raise additional capital in sufficient amounts or on terms acceptable to us we may have to significantly delay, scale back or discontinue our operations and the development or commercialization of one or more of our product candidates or the range of indications for which they are developed. If we raise additional funds through the issuance of additional debt or equity securities, it could result in dilution to our existing stockholders, and/or increased fixed payment obligations. Furthermore, these securities may have rights senior to those of our common stock and could contain covenants that would restrict our operations and potentially impair our competitiveness, such as limitations on our ability to incur additional debt, limitations on our ability to acquire, sell or license intellectual property rights and other operating restrictions that could adversely impact our ability to conduct our business. Any of these events could significantly harm our business, financial condition and prospects.

Our future capital requirements will depend on many factors, including, among others:

- the scope, rate of progress, results and costs of our clinical trials, preclinical studies and other research and development activities;
- the timing of, and the costs involved in, obtaining regulatory approvals for any of our current or future product candidates we may develop or in-license;
- the number and characteristics of product candidates that we develop or in-license, if any;
- the cost of filing, prosecuting, defending and enforcing any patent claims and other intellectual property rights;
- the effect of competing technological efforts and market developments;
- our ability to establish collaborative arrangements to the extent necessary;
- the economic and other terms, timing and success of any collaboration, licensing, distribution or other arrangements into which we may enter in the future;
- revenues received from any product candidates that are approved; and
- payments received under any current or future strategic partnerships.

If a lack of available capital prevents us from expanding our operations or otherwise capitalizing on our business opportunities, our business, financial condition and results of operations could be materially adversely affected. If we are unable to raise additional capital in sufficient amounts or on terms acceptable to us, we may have to significantly delay, scale back or discontinue our operations and the development of one or more of our product candidates or cease operations.

We may not continue to pursue our clinical trial evaluating pepinemab for the treatment of Huntington's Disease.

In late September 2020, we received topline data from our Phase 2 SIGNAL trial evaluating pepinemab for the treatment of Huntington's Disease. Th trial did not meet its prespecified primary endpoints. Although the study results did provide clear and useful information for how to modify the study design for potential future success, the Company needs to evaluate the business opportunity and resources required in relation to other opportunities in Alzheimer' disease and cancer. The Phase 2 SIGNAL trial evaluating pepinemab for the treatment of Huntington's Disease was our most advanced clinical trial and based on the Phase 2 results we may not continue to pursue clinical development for this indication. If we cease to pursue the Huntington's Disease indication, we may pursue clinical development of our other indications for pepinemab, which require significant additional development resources. Pursuing these other indications will take a significant amount of time and capital to pursue and may not ultimately be successful. This may require that we seek an early partnership or license selected assets to advance our business and continue as a going concern.

We may not be able to pay our indebtedness at maturity.

On May 8, 2020, we received the PPP Loan for approximately $1.1 million under the Paycheck Protection Program. On August 3, 2020, we issued the Debenture, which has a principal amount of $8.64 million, an interest rate of 7% per annum and matures on August 3, 2021. Our ability to make payments on our indebtedness depends on our future performance and capital raising activities, which are subject to economic, financial, competitive and other factors beyond our control.

While all or a portion of the PPP Loan may be forgiven if the PPP Loan is used for qualifying expenses as described in the CARES Act, if we seek forgiveness there is no assurance that we will be able to obtain forgiveness, notwithstanding that we believe we have used the PPP Loan for qualifying expenses. The U.S. Department of the Treasury, Small Business Administration and members of Congress have indicated an intention to provide strong oversight of loans granted under the Paycheck Protection Program. If we are audited or reviewed or our records are subpoenaed by the government as a result of entering into the PPP Loan, it could divert management's time and attention and we could incur legal and reputational costs, and an adverse finding could lead to the requirement to return the PPP Loan, which could reduce our liquidity, or could subject us to fines and penalties.

While the holder of the Debenture may seek to convert the Debenture into shares of our common stock, there is no assurance that the holder will seek to do so, including because the conversion price for the Debenture is currently $9.4125 per share, and our stock price is currently trading below that level. Furthermore, the Debenture s secured under a Security Agreement by a lien on substantially all of the Company's assets, subject to certain exceptions, and if we default, the holder will have rights to those assets. In addition, the Debenture also provides that in connection with future capital raising transactions (subject to certain exceptions), at the election of the holder we must use 20% of the funds raised to redeem amounts outstanding under the Debenture, which will further limit the use of proceeds we may obtain from future capital raising transactions.

Our business is not expected to generate cash flow from operations in the future sufficient to pay our debt at maturity. Accordingly, we expect to have to raise additional capital in the future, either through restructuring debt, or obtaining additional equity capital, or pursuing other alternatives, such as selling assets, restructuring debt or obtaining additional equity capital on terms that may be onerous or highly dilutive. Our ability to refinance our indebtedness will depend on the capital markets and our financial condition at such time. We may not be able to engage in any of these activities or engage in these activities on desirable terms, which could result in a default on our debt obligations. Furthermore, the existence of our indebtedness, and the terms associated with it, particularly our recently issued Debenture, could more generally make it difficult for us to raise additional capital.

The COVID-19 pandemic has adversely impacted and will continue to adversely impact our business, including our clinical development plans and our ability to raise capital.

Since December 2019, the COVID-19 pandemic has spread to multiple countries, including the United States, and has caused significant disruptions around the world. In order to mitigate the spread of COVID-19, governments have imposed unprecedented restrictions on business operations, travel, and gatherings, resulting in a global economic downturn and other adverse economic and societal impacts, which has had an adverse impact our strategic plans, certain of our clinical trial operations, and our ability to raise additional capital necessary to continue as a going concern. We had previously anticipated beginning enrollment in mid-2020 in our study of pepinemab in Alzheimer's Disease, but the initial enrollment date is now delayed until the first half of 2021. In addition, to mitigate the impact of the COVID-19 pandemic including impacts on the Company's ability to raise capital and to maintain its personnel, the Company applied for and received the PPP Loan.

We may experience further disruptions as a result of the COVID-19 pandemic that could severely impact our business, including:

- interruption of key manufacturing, research and clinical development activities due to limitations on work and travel imposed or recommended by federal or state governments, employers and others;
- delays or difficulties in clinical trial site operations, including difficulties in recruiting clinical site investigators and clinical site staff and difficulties in enrolling patients or meeting protocol-specified procedures, including difficulties in adhering to protocol-mandated visits, treating patients, and testing in active trials;
- interruption of key business activities due to illness and/or quarantine of key individuals and delays associated with recruiting, hiring and training new temporary or permanent replacements for such key individuals, both internally and at our third-party service providers;
- delays in research and clinical trial sites receiving the supplies and materials needed to conduct preclinical studies and clinical trials, due to work stoppages, travel and shipping interruptions or restrictions or other reasons;
- further difficulties in raising additional capital needed to avoid furloughs and layoffs and pursue the development of our programs due to the slowing of our economy and near term and/or long-term negative effects of the pandemic on the financial, banking and capital markets, including as a result of ongoing impacts on our stock price;
- changes in local regulations as part of a response to the COVID-19 pandemic that may require us to change the ways in which research, including clinical development, is conducted, which may result in unexpected costs; and
- delays in necessary interactions with regulators, ethics committees and other important agencies and contractors due to limitations in employee resources, travel restrictions or forced furlough of government employees.

The COVID-19 pandemic and its impacts continue to rapidly evolve. The extent to which the COVID-19 pandemic will further impact our business will depend on future developments, which are highly uncertain and cannot be predicted with confidence, 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 virus and resolve its impacts.

Item 6. Exhibits

INDEX TO EXHIBITS

Exhibit No.	Description
4.1	7% Original Issue Discount Senior Convertible Debenture due August 3, 2021 (incorporated by reference herein from Exhibit 4.1 to the Company's Quarterly Report on Form 10-Q for the quarterly period ended June 30, 2020).
10.1	Stock Purchase Agreement by and between the Company and Friedberg Global-Macro Hedge Fund, Ltd., dated as of July 9, 2020 (incorporated by reference herein from Exhibit 10.1 to the Company's Current Report on Form 8-K filed with the SEC on July 10, 2020).
10.2	Registration Rights Agreement by and between the Company and Friedberg Global-Macro Hedge Fund, Ltd., dated as of July 10, 2020 (incorporated by reference herein from Exhibit 10.2 to the Company's Current Report on Form 8-K filed with the SEC on July 10, 2020).
10.3	Securities Purchase Agreement, dated July 30, 2020, by and among the Company and the Purchaser (incorporated by reference herein from Exhibit 10.1 to the Company's Current Report on Form 8-K filed with the SEC on July 31, 2020).
10.4	Registration Rights Agreement, dated August 3, 2020, by and among the Company and 3i, LP (incorporated by reference herein from Exhibit 10.5 to the Company's Quarterly Report on Form 10-Q for the quarterly period ended June 30, 2020).
10.5	Security Agreement, dated July 31, 2020, by and between the Company and 3i, LP, as Collateral Agent (incorporated by reference herein from Exhibit 10.6 to the Company's Quarterly Report on Form 10-Q for the quarterly period ended June 30, 2020).
31.1*	Certification of Chief Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
31.2*	Certification of Chief Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
32.1*	Certification of Chief Executive Officer and Chief Financial Officer pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, 18 U.S.C. Section 1350
101*	The following items from this Quarterly Report on Form 10-Q formatted in Extensible Business Reporting Language: (i) Condensed Consolidated Balance Sheets (Unaudited), (ii) Condensed Consolidated Statements of Operations (Unaudited), (iii) Consolidated Statements of Stockholders' Deficit (Unaudited), (iv) Condensed Consolidated Statements of Cash Flows (Unaudited), and (v) Notes to Condensed Consolidated Financial Statements (Unaudited)

* Filed or furnished herewith, as applicable.

SIGNATURES

Pursuant to the requirements of the Securities Exchange Act of 1934, the registrant has duly caused this report to be signed on its behalf by the undersigned thereunto duly authorized.

Vaccinex, Inc.
(Registrant)

November 13, 2020 By: /s/ Maurice Zauderer
Maurice Zauderer, Ph.D.
President & Chief Executive Officer
(Principal Executive Officer)

November 13, 2020 By: /s/ Scott E. Royer
Scott E. Royer, CFA, MBA
Chief Financial Officer
(Principal Financial Officer)

Exhibit 31.1

Certification of Chief Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002

I, Maurice Zauderer, certify that:

1. I have reviewed this quarterly report on Form 10-Q for the three months ended September 30, 2020 of Vaccinex, Inc.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;

4. The registrant's other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:

   a. Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

   b. Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

   c. Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

   d. Disclosed in this report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and

5. The registrant's other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):

   a. All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and

   b. Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal control over financial reporting.

Dated: November 13, 2020

By: /s/ Maurice Zauderer

Maurice Zauderer, Ph.D.
President and Chief Executive Officer
(Principal Executive Officer)

Exhibit 31.2

Certification of Chief Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002

I, Scott E. Royer, certify that:

1. I have reviewed this quarterly report on Form 10-Q for the three months ended September 30, 2020 of Vaccinex, Inc.;

2. Based on my knowledge, this report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this report;

3. Based on my knowledge, the financial statements, and other financial information included in this report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this report;

4. The registrant's other certifying officer(s) and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:

   a. Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this report is being prepared;

   b. Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;

   c. Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this report based on such evaluation; and

   d. Disclosed in this report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of an annual report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and

5. The registrant's other certifying officer(s) and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):

   a. All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and

   b. Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal control over financial reporting.

Dated: November 13, 2020

By: /s/ Scott E. Royer

Scott E. Royer
Chief Financial Officer
(Principal Financial Officer)

Exhibit 32.1

Certification of Chief Executive Officer and Chief Financial Officer pursuant to 18 U.S.C. Section 1350 as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002

In connection with the quarterly report of Vaccinex, Inc., (the "Company") on Form 10-Q for the three months ended September 30, 2020 (the "Report"), I, Maurice Zauderer, Ph.D., President and Chief Executive Officer of the Company and Scott E. Royer, Chief Financial Officer of the Company, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that:

1. The Report fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934, as amended; and

2. The information contained in the Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Dated: November 13, 2020

By: /s/ Maurice Zauderer

Maurice Zauderer, Ph.D.
President and Chief Executive Officer

Dated: November 13, 2020

By: /s/ Scott E. Royer

Scott E. Royer
Chief Financial Officer