

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

**Form 10-Q**

(Mark One)

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

**For the Quarterly Period Ended September 30, 2019**

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: 000-29959**

**Cassava Sciences, Inc.**

*(Exact name of registrant as specified in its charter)*

**Delaware**

**91-1911336**

*(State or other jurisdiction of  
incorporation or organization)*

*(I.R.S. Employer  
Identification Number)*

7801 N. Capital of Texas Highway, Suite 260, Austin, TX 78731  
(512) 501-2444

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

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

<b>Title of each class</b>	<b>Trading Symbol(s)</b>	<b>Name of each exchange on which registered</b>
Common Stock, \$0.001 par value	SAVA	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

Indicate the number of shares outstanding of each of the issuer's classes of common stock, as of the latest practicable date.

Common Stock, \$0.001 par value

17,219,300

Shares Outstanding as of October 24, 2019

CASSAVA SCIENCES, INC.

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**PART I. FINANCIAL INFORMATION**

**Item 1. Financial Statements**

**CASSAVA SCIENCES, INC.**  
**BALANCE SHEETS**  
(Unaudited, in thousands, except share and par value data)

	<u>September 30,</u>	<u>December 31,</u>
	<u>2019</u>	<u>2018</u>
<b>ASSETS</b>		
Current assets:		
Cash and cash equivalents	\$ 17,804	\$ 19,807
Other current assets	385	233
Total current assets	18,189	20,040
Operating lease right-of-use assets	113	—
Property and equipment, net	61	87
Other assets	12	12
Total assets	<u>\$ 18,375</u>	<u>\$ 20,139</u>
<b>LIABILITIES AND STOCKHOLDERS' EQUITY</b>		
Current liabilities:		
Accounts payable	\$ 340	\$ 294
Accrued development expense	415	156
Accrued compensation and benefits	55	61
Operating lease liabilities, current	90	—
Other current liabilities	7	—
Total current liabilities	907	511
Operating lease liabilities, non-current	23	—
Total liabilities	930	511
Commitments and contingencies		
Stockholders' equity:		
Preferred stock, \$.001 par value; 10,000,000 shares authorized, none issued and outstanding	—	—
Common stock, \$.001 par value; 120,000,000 shares authorized; 17,219,300 shares issued and outstanding at September 30, 2019 and December 31, 2018	17	17
Additional paid-in capital	184,499	183,567
Accumulated deficit	(167,071)	(163,956)
Total stockholders' equity	17,445	19,628
Total liabilities and stockholders' equity	<u>\$ 18,375</u>	<u>\$ 20,139</u>

See accompanying notes to condensed financial statements.

**CASSAVA SCIENCES, INC.**  
**STATEMENTS OF OPERATIONS**  
(Unaudited, in thousands, except per share data)

	Three months ended		Nine months ended	
	September 30,		September 30,	
	2019	2018	2019	2018
Operating expenses:				
Research and development, net of grant reimbursement	\$ (52)	\$ 436	\$ 830	\$ 2,967
General and administrative	831	848	2,553	2,945
Total operating expenses	779	1,284	3,383	5,912
Operating loss	(779)	(1,284)	(3,383)	(5,912)
Interest income	82	17	268	32
Net loss	\$ (697)	\$ (1,267)	\$ (3,115)	\$ (5,880)
Net loss per share, basic and diluted	\$ (0.04)	\$ (0.11)	\$ (0.18)	\$ (0.69)
Shares used in computing net loss per share, basic and diluted	17,162	11,959	17,162	8,498

See accompanying notes to condensed financial statements.

**CASSAVA SCIENCES, INC.**  
**STATEMENTS OF CASH FLOWS**  
(Unaudited, in thousands)

	Nine months ended	
	September 30,	
	2019	2018
<b>Cash flows from operating activities:</b>		
Net loss	\$ (3,115)	\$ (5,880)
Adjustments to reconcile net loss to net cash used in operating activities:		
Non-cash stock-based compensation	992	1,985
Depreciation and amortization	44	52
Changes in operating assets and liabilities:		
Other current assets	(152)	(92)
Accounts payable	46	125
Accrued development expense	259	(399)
Accrued compensation and benefits	(6)	(4)
Other current liabilities	7	8
Net cash used in operating activities	(1,925)	(4,205)
<b>Cash flows from investing activities:</b>		
Purchases of property and equipment	(18)	—
Net cash used in investing activities	(18)	—
<b>Cash flows from financing activities:</b>		
Issuance costs from 2018 sale of common stock and warrants	(60)	—
Proceeds from issuance of common stock and warrants, net of issuance costs	—	14,170
Net cash (used in) / provided by financing activities	(60)	14,170
Net (decrease) / increase in cash and cash equivalents	(2,003)	9,965
Cash and cash equivalents at beginning of period	19,807	10,479
Cash and cash equivalents at end of period	\$ 17,804	\$ 20,444

See accompanying notes to condensed financial statements.

Notes to Condensed Financial Statements  
(Unaudited)

**Note 1. General and Liquidity**

Cassava Sciences, Inc. (the “Company”) develops proprietary drugs that offer significant improvements to patients and healthcare professionals. The Company generally focuses its drug development efforts on disorders of the nervous system.

The accompanying unaudited condensed financial statements of the Company have been prepared in accordance with generally accepted accounting principles (“GAAP”) for interim financial information and pursuant to the instructions to the Quarterly Report on Form 10-Q and Article 10 of Regulation S-X. Accordingly, the financial statements do not include all of the information and footnotes required by GAAP for complete financial statements. In the opinion of management of the Company, all adjustments, consisting of normal recurring adjustments, considered necessary for a fair presentation have been included. Operating results for the three and nine months ended September 30, 2019 are not necessarily indicative of the results that may be expected for any other interim period or for the year 2019. For further information, refer to the consolidated financial statements and footnotes thereto included in the Company’s Annual Report on Form 10-K for the year ended December 31, 2018.

***Liquidity***

The Company has incurred significant net losses and negative cash flows since inception, and as a result has an accumulated deficit of \$167.1 million at September 30, 2019. The Company expects its cash requirements to be significant in the future. The amount and timing of the Company’s future cash requirements will depend on regulatory and market acceptance of its product candidates and the resources it devotes to researching and developing, formulating, manufacturing, commercializing and supporting its products. The Company may seek additional funding through public or private financing in the future, if such funding is available and on terms acceptable to the Company. There are no assurances that additional financing will be available on favorable terms, or at all. However, management believes that the current working capital position will be sufficient to meet the Company’s working capital needs for at least the next 12 months.

**Note 2. Significant Accounting Policies**

***Use of Estimates***

The Company makes estimates and assumptions in preparing its financial statements in conformity with U.S. GAAP. These estimates and assumptions affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amount of revenue earned and expenses incurred during the reporting period. The Company evaluates its estimates on an ongoing basis, including those estimates related to agreements, research collaborations and investments. Actual results could differ from these estimates and assumptions.

***Cash and Cash Equivalents and Concentration of Credit Risk***

The Company invests in cash and cash equivalents. The Company considers highly-liquid financial instruments with original maturities of three months or less to be cash equivalents. Highly liquid investments that are considered cash equivalents include money market funds, certificates of deposits, treasury bills and commercial paper. The carrying value of cash equivalents approximates fair value due to the short-term maturity of these securities. The Company maintains its investments at one financial institution.

### ***Fair Value Measurements***

The Company reports its cash and cash equivalents at fair value as Level 1, Level 2 or Level 3 using the following inputs:

- Level 1 includes quoted prices in active markets. The Company bases the fair value of money market funds and U.S. treasury securities on Level 1 inputs.
- Level 2 includes significant observable inputs, such as quoted prices for identical or similar investments, or other inputs that are observable and can be corroborated by observable market data for similar securities. The Company uses market pricing and other observable market inputs obtained from third-party providers. It uses the bid price to establish fair value where a bid price is available. The Company does not have any investments where the fair value is based on Level 2 inputs.
- Level 3 includes unobservable inputs that are supported by little or no market activity. The Company does not have any investments where the fair value is based on Level 3 inputs.

If a financial instrument uses inputs that fall in different levels of the hierarchy, the instrument will be categorized based upon the lowest level of input that is significant to the fair value calculation. The fair value of all cash and cash equivalents was based on Level 1 inputs at September 30, 2019 and December 31, 2018.

### ***Awards of and Proceeds from Grants***

During the three months ended September 30, 2019, the Company was awarded a National Institutes of Health (“NIH”) grant totaling up to \$1.9 million to support the Company’s product development. During the nine months ended September 30, 2019, the Company was awarded NIH grants totaling up to \$3.4 million to support the Company’s product development.

During the three months ended September 30, 2019 and 2018, the Company received reimbursements totaling \$1.5 million and \$1.1 million pursuant to previously announced NIH research grants, respectively. During the nine months ended September 30, 2019 and 2018, the Company received reimbursements totaling \$3.8 million and \$1.9 million pursuant to NIH research grants, respectively. The Company records the proceeds from these grants as reductions to its research and development expenses.

### ***Non-cash Stock-based Compensation***

The Company recognizes non-cash expense for the fair value of all stock options and other share-based awards. The Company uses the Black-Scholes option valuation model (“Black-Scholes”) to calculate the fair value of stock options, using the single-option award approach and straight-line attribution method. The Company adopted ASU No. 2018-07, *Compensation—Stock Compensation (Topic 718), Improvements to Nonemployee Share-Based Payment Accounting*, on January 1, 2019. Accordingly, for all options granted, it recognizes the resulting fair value as expense on a straight-line basis over the vesting period of each respective stock option, generally four years.

The Company has granted share-based awards that vest upon achievement of certain performance criteria (“Performance Awards”). The Company multiplies the number of Performance Awards by the fair market value of its common stock on the date of grant to calculate the fair value of each award. It estimates an implicit service period for achieving performance criteria for each award. The Company recognizes the resulting fair value as expense over the implicit service period when it concludes that achieving the performance criteria is probable. It periodically reviews and updates as appropriate its estimates of implicit service periods and conclusions on achieving the performance criteria. Performance Awards vest and common stock is issued upon achievement of the performance criteria.

### ***Net Loss per Share***

The Company computes basic net loss per share on the basis of the weighted-average number of common shares outstanding for the reporting period. Diluted net loss per share is computed on the basis of the weighted-average number of common shares outstanding plus potential dilutive common shares outstanding using the treasury-stock

method. Potential dilutive common shares consist of outstanding common stock options and warrants. There is no difference between the Company's net loss and comprehensive loss.

The Company included the following in the calculation of basic and diluted net loss per share (in thousands, except per share data):

	Three months ended		Nine months ended	
	September 30,		September 30,	
	2019	2018	2019	2018
<b>Numerator:</b>				
Net loss	\$ (697)	\$ (1,267)	\$ (3,115)	\$ (5,880)
<b>Denominator:</b>				
Shares used in computing net loss per share, basic and diluted	17,162	11,959	17,162	8,498
Net loss per share, basic and diluted	\$ (0.04)	\$ (0.11)	\$ (0.18)	\$ (0.69)
Dilutive common shares excluded from net loss per share, diluted	2,894	2,784	2,939	2,459
Common stock warrants excluded from net loss per share, diluted	9,127	9,127	9,127	9,127

The Company excluded common stock options and warrants outstanding from the calculation of net loss per share, diluted, because the effect of including options and warrants outstanding would have been anti-dilutive.

#### ***Fair Value of Financial Instruments***

Financial instruments include cash and cash equivalents, accounts payable and accrued liabilities. The estimated fair value of certain financial instruments may be determined using available market information or other appropriate valuation methodologies. However, considerable judgment is required in interpreting market data to develop estimates of fair value; therefore, the estimates are not necessarily indicative of the amounts that could be realized or would be paid in a current market exchange. The effect of using different market assumptions and/or estimation methodologies may be material to the estimated fair value amounts. The carrying amounts of cash and cash equivalents, accounts payable and accrued liabilities are at cost, which approximates fair value due to the short maturity of those instruments.

#### ***Income Taxes***

The Company makes estimates and judgments in determining the need for a provision for income taxes, including the estimation of its taxable income or loss for each full fiscal year.

The Company has accumulated significant deferred tax assets that reflect the tax effects of net operating loss and tax credit carryovers and temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes. Realization of certain deferred tax assets is dependent upon future earnings. The Company is uncertain about the timing and amount of any future earnings. Accordingly, it offsets these deferred tax assets with a valuation allowance.

The Company may in the future determine that certain deferred tax assets will likely be realized, in which case it will reduce its valuation allowance in the period in which such determination is made. If the valuation allowance is reduced, the Company may recognize a benefit from income taxes in its statement of operations in that period.

The Company classifies interest recognized pursuant to its deferred tax assets as interest expense, when appropriate.



### **Recently Adopted Accounting Pronouncements**

The Company has a single non-cancelable operating lease for approximately 6,000 square feet of office space in Austin, Texas that expires on December 31, 2020, which is used for the development of novel drugs. Prior to January 1, 2019, the Company accounted for leases in accordance with the provisions of ASC Topic 840. Under the previous leasing guidance, the Company expensed lease payments over the term of the lease and did not give recognition to any lease related assets or liabilities on its balance sheet.

On January 1, 2019, the Company adopted ASU No. 2016-02, *Leases (ASC 842)* which, as permitted by ASC Topic 842, is the date of initial application. The core principle of ASC Topic 842 is that a lessee should recognize the assets and liabilities that arise from leases. For operating leases, a lessee is required to recognize a right-of-use asset and a lease liability, initially measured at the present value of the lease payments, in the statement of financial position. The Company recognized a right-of-use asset and operating lease liability upon the adoption of ASU 2016-02 which increased total assets and total liabilities relative to such amounts prior to adoption. The Company utilized a discount rate of 5.5% to determine the present value of the future lease payments which represents the Company's incremental borrowing rate.

The impact of adopting ASC 842 on assets and liabilities recorded as of January 1, 2019 were as follows (in thousands):

#### **Assets**

Operating lease right-of-use asset	\$	180
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#### **Liabilities**

Operating lease liabilities, current		90
Operating lease liabilities, non-current	\$	90

The Company recorded a reduction of the non-current portion of the lease liability and an offsetting reduction in the right-of-use assets of \$22,500 and \$67,500 during the three and nine months ended September 30, 2019, respectively. There was no change to the statement of operations during the three and nine months ended September 30, 2019 or statement of cash flows during the nine months ended September 30, 2019 as a result of the adoption of ASC Topic 842. See additional information regarding leases in Note 5 – Commitments.

### Note 3. Stockholders' Equity and Stock-Based Compensation Expense

*Stockholders' Equity Activity during the Nine Months Ended September 30, 2019 and 2018*

During the nine months ended September 30, 2019 and 2018, the Company's common stock outstanding and stockholders' equity changed as follows:

	Common Stock	Stockholders' equity (in thousands)
Balance at December 31, 2017	6,595,509	\$ 9,699
Non-cash stock-based compensation for:		
Stock options for employees	—	789
Stock options for non-employees	—	13
Issuance of common stock, net of issuance costs	300,000	1,959
Net loss	—	(2,160)
Balance at March 31, 2018	<u>6,895,509</u>	<u>\$ 10,300</u>
Non-cash stock-based compensation for:		
Stock options for employees	—	679
Stock options for non-employees	—	19
Net loss	—	(2,452)
Balance at June 30, 2018	<u>6,895,509</u>	<u>\$ 8,546</u>
Non-cash stock-based compensation for:		
Stock options for employees	—	482
Stock options for non-employees	—	2
Issuance of common stock and warrants, net of issuance costs	10,323,791	12,211
Net loss	—	(1,267)
Balance at September 30, 2018	<u>17,219,300</u>	<u>\$ 19,974</u>
Balance at December 31, 2018	17,219,300	\$ 19,628
Non-cash stock-based compensation for:		
Stock options for employees	—	342
Stock options for non-employees	—	2
Issuance costs from sale 2018 sale of common stock and warrants	—	(60)
Net loss	—	(1,359)
Balance at March 31, 2019	<u>17,219,300</u>	<u>\$ 18,553</u>
Non-cash stock-based compensation for:		
Stock options for employees	—	328
Stock options for non-employees	—	1
Net loss	—	(1,059)
Balance at June 30, 2019	<u>17,219,300</u>	<u>\$ 17,823</u>
Non-cash stock-based compensation for:		
Stock options for employees	—	318
Stock options for non-employees	—	1
Net loss	—	(697)
Balance at September 30, 2019	<u>17,219,300</u>	<u>\$ 17,445</u>

### *At-the-Market Common Stock Issuance*

On February 8, 2018, the Company entered into a Capital on Demand™ Sales Agreement (the “ATM Agreement”) with JonesTrading. In accordance with the terms of the ATM Agreement, the Company was able to offer and sell shares of its common stock, from time to time in one or more public offerings of its common stock, with JonesTrading acting as agent, in transactions pursuant to a shelf registration statement that was declared effective by the U.S. Securities and Exchange Commission (the “SEC”) on July 31, 2017. On August 16, 2018, the Company suspended sales of its common stock under its ATM Agreement.

There were no common stock sales under the ATM Agreement during the three and nine months ended September 30, 2019.

During the three months ended September 30, 2018, the Company sold a total of 1,463,013 share of its common stock under the ATM Agreement in the open market for net proceeds of \$2.0 million. During the three months ended September 30, 2018, the Company recorded \$0.1 million of offering costs against addition paid-in capital in addition to trading commissions.

During the nine months ended September 30, 2018, the Company sold a total of 1,763,013 shares of its common stock under the ATM Agreement in the open market for net proceeds of \$3.9 million. During the nine months ended September 30, 2018, the Company recorded \$0.1 million of offering costs against addition paid-in capital in addition to trading commissions.

### *Stock Option and Performance Award Activity in 2019*

During the nine months ended September 30, 2019, stock options and unvested Performance Awards outstanding under the Company’s 2018 Plan (defined below) changed as follows:

	<b>Stock Options</b>	<b>Performance Awards</b>
Outstanding as of December 31, 2018	2,964,973	138,055
Options granted	50,000	—
Options exercised	—	—
Options forfeited/canceled	(173,372)	—
Outstanding as of September 30, 2019	<u>2,841,601</u>	<u>138,055</u>

The weighted average exercise price of options outstanding at September 30, 2019 was \$13.66. As outstanding options vest over the current remaining vesting period of 2.3 years, the Company expects to recognize non-cash expense of \$1.8 million. If and when outstanding Performance Awards vest, the Company would recognize non-cash expense of \$2.3 million over the implicit service period.

### *Stock-based Compensation Expense in 2019*

During the three and nine months ended September 30, 2019 and 2018, the Company’s non-cash stock-based compensation expenses were as follows (in thousands):

	<b>Three months ended</b>		<b>Nine months ended</b>	
	<b>September 30,</b>		<b>September 30,</b>	
	<b>2019</b>	<b>2018</b>	<b>2019</b>	<b>2018</b>
Research and development	\$ 139	\$ 217	\$ 411	\$ 885
General and administrative	180	267	581	1,100
Total non-cash stock-based compensation expense	<u>\$ 319</u>	<u>\$ 484</u>	<u>\$ 992</u>	<u>\$ 1,985</u>

### **2018 Equity Incentive Plan**

On January 31, 2018, the Company's Board of Directors approved the Company's 2018 Omnibus Incentive Plan (the "2018 Plan"). The Company's Board of Directors or a designated committee of the Board of Directors is responsible for administration of the 2018 Plan and determines the terms and conditions of each option granted, consistent with the terms of the 2018 Plan. The Company's employees, directors, and consultants are eligible to receive awards under the 2018 Plan, including grants of stock options and performance awards. Share-based awards generally expire ten years from the date of grant. The 2018 Plan provides for issuance of up to 1,000,000 shares of common stock, par value \$0.001 per share under the 2018 Plan, subject to adjustment as provided in the 2018 Plan.

When stock options or performance awards are exercised net of the exercise price and taxes, the number of shares of stock issued is reduced by the number of shares equal to the amount of taxes owed by the award recipient and that number of shares are cancelled. The Company then uses its cash to pay tax authorities the amount of statutory taxes owed by and on behalf of the award recipient.

### **Note 4. Income Taxes**

The Company did not provide for income taxes during the nine months ended September 30, 2019, because it has projected a net loss for the full year 2019. There was also no provision for income taxes for the nine months ended September 30, 2018.

### **Note 5. Commitments**

The Company conducts its product research and development programs through a combination of internal and collaborative programs that include, among others, arrangements with universities, contract research organizations and clinical research sites. The Company has contractual arrangements with these organizations that are cancelable. The Company's obligations under these contracts are largely based on services performed.

The Company has a non-cancelable operating lease for approximately 6,000 square feet of office space in Austin, Texas that expires on December 31, 2020. Minimum lease payments as of September 30, 2019 were as follows (in thousands):

<b>For the year ending December 31,</b>	
2019	\$ 24
2020	99
Total future minimum lease payments	\$ 123
Lease: imputed interest	(10)
Total	<u>\$ 113</u>

Building rent expense for the three months ended September 30, 2019 and 2018 totaled \$24,000 and \$22,000, respectively. Building rent expense for the nine months ended September 30, 2019 and 2018 totaled \$72,000 and \$67,000, respectively. These amounts were equal to the Company's operating cash outflow from operating leases.

### **Note 6. Collaboration Agreements**

The Company had formerly entered into a Development and License Agreement (the "License Agreement") with Durect Corporation around certain controlled-release technology. On March 20, 2019, the Company gave notice of termination for such License Agreement. This and other actions effectively ended the Company's development of any product candidates related to such technology.

## Note 7. Recently Issued Accounting Pronouncements

In August 2018, the FASB issued ASU No. 2018-13, *Fair Value Measurement (Topic 820) - Disclosure Framework - Changes to the Disclosure Requirements for Fair Value Measurement* ("ASU 2018-13"), which is designed to improve the effectiveness of disclosures by removing, modifying and adding disclosures related to fair value measurements. ASU 2018-13 is effective for fiscal years beginning after December 15, 2019, including interim periods within those fiscal years. The Company is currently evaluating the impact of ASU 2018-13 on its consolidated financial statements.

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

This discussion and analysis should be read in conjunction with Cassava Sciences, Inc.'s (the "Company," "we," "us," or "our") financial statements and accompanying notes included elsewhere in this Quarterly Report on Form 10-Q. Operating results are not necessarily indicative of results that may occur in future periods.

This Quarterly Report on Form 10-Q contains certain statements that are considered forward-looking statements within the meaning of the Private Securities Reform Act of 1995. We intend that such statements be protected by the safe harbor created thereby. Forward-looking statements relate to expectations, beliefs, projections, future plans and strategies, anticipated events or trends and similar expressions concerning matters that are not historical facts. In some cases, you can identify forward-looking statements by terms such as "anticipate," "believe," "could," "estimate," "expect," "intend," "may," "plan," "potential," "should," "will" and "would" or the negatives of these terms or other comparable terminology.

The forward-looking statements are based on our beliefs, assumptions and expectations of our future performance, taking into account all information currently available to us. Forward-looking statements involve risks and uncertainties and our actual results and the timing of events may differ significantly from the results discussed in the forward-looking statements. Examples of such forward-looking statements include, but are not limited to statements about:

- Our ability to initiate, conduct or complete clinical studies with PTI-125 or PTI-125Dx, our product candidates targeted at Alzheimer's disease and other neurodegenerative diseases, including our anticipated timeline for the completion of a Phase 2b study with PTI-125;
- any potential benefits of our product candidates, such as PTI-125 or PTI-125Dx, including the potential ability of PTI-125 to treat Alzheimer's disease or PTI-125Dx to diagnose Alzheimer's disease;
- discussions with potential strategic partners for the development and commercialization of our product candidates
- the utility of protection, or the sufficiency, of our intellectual property;
- potential competitors or competitive products;
- expected future sources of revenue and capital and increasing cash needs;
- market acceptance of our potential product candidates;
- expectations regarding trade secrets, technological innovations, licensing agreements and outsourcing of certain business functions;
- expenses increasing or fluctuations in our financial or operating results;
- operating losses and anticipated operating and capital expenditures;
- expectations regarding the issuance of shares of common stock to employees pursuant to equity compensation awards, net of employment taxes;
- our ability to maintain compliance with the ongoing listing requirements for the Nasdaq Capital Market;
- anticipated hiring and development of our internal systems and infrastructure;
- the sufficiency of our current resources to fund our operations over the next 12 months; and

- assumptions and estimates used for our disclosures regarding stock-based compensation.

Such forward-looking statements and our business involve risks and uncertainties, including, but not limited to the following:

- We are in the early stages of clinical drug development and have a limited operating history in our business targeting Alzheimer's disease and no products approved for commercial sale.
- We have incurred significant net losses in each period since our inception and anticipate that we will continue to incur net losses for the foreseeable future.
- Research and development of biopharmaceutical products is a highly uncertain undertaking and involves a substantial degree of risk and our business is heavily dependent on the successful development of our product candidates
- We will need to obtain substantial additional financing to complete the development and any commercialization of our product candidates.
- We may not be successful in our efforts to continue to develop product candidates or commercially successful products.
- We may not be successful in our efforts to expand indications for product candidates.
- We are concentrating a substantial portion of our research and development efforts on the diagnosis and treatment of Alzheimer's disease, an area of research that has recorded many clinical failures.
- We may encounter substantial delays in our clinical trials or may not be able to conduct or complete our clinical trials on the timelines we expect, if at all.
- Our clinical trials may fail to demonstrate evidence of the safety and efficacy of our product candidates, which would prevent, delay, or limit the scope of regulatory approval and the commercialization of our product candidates.
- We may be unable to protect our intellectual property rights or trade secrets
- We may be subject to third-party claims of intellectual property infringement
- We may not succeed in our maintenance or pursuit of licensing rights or third-party intellectual property necessary for the development of our product candidates.
- Enacted or future legislation or regulatory actions may adversely affect our product pricing, or limit the reimbursement we may receive for our products.
- A significant breakdown, security breach or interruption affecting our internal computer systems, or those used by our third-party research collaborators, may compromise the confidentiality of our financial or proprietary information, result in material disruptions of our products and operations and adversely affect our reputation.
- We may be unsuccessful at hiring and retaining qualified personnel
- We may not be successful in transitioning our business operations from our prior focus on analgesic drug development to a new focus on neurodegeneration drug development, including for drugs targeting Alzheimer's disease.

Please also refer to the section entitled "Risk Factors" in our Annual Report on Form 10-K for the fiscal year ended December 31, 2018, as such risk factors may be amended, updated or modified periodically in our reports filed with the SEC for further information on these and other risks affecting us.

We caution you not to place undue reliance on forward-looking statements because our future results may differ materially from those expressed or implied by them. We do not intend to update any forward-looking statement, whether written or oral, relating to the matters discussed in this prospectus, except as required by law.

## Overview

Cassava Sciences, Inc. is a clinical-stage drug development company. Our expertise is to develop new product candidates and guide such candidates through various regulatory and development pathways in preparation for their potential commercialization. Since our inception, we have generally focused our drug development efforts on disorders of the central nervous system. We are currently conducting a Phase 2 clinical program to treat patients with Alzheimer's disease. By necessity, the conduct of drug development is complex, lengthy, expensive and risky. The U.S. Food and Drug Administration (the "FDA") has not yet established the safety or efficacy of our product candidates.

Our overall strategy is to leverage our unique scientific/clinical platform to develop a first-in-class program for treating neurodegenerative diseases. Our goal is to address Alzheimer's disease and other neurodegenerative diseases, particularly those with a strong neuroinflammation component. PTI-125 is our drug product candidate to treat Alzheimer's disease, and PTI-125Dx is our diagnostic product candidate to detect Alzheimer's disease.

We seek to develop and gain regulatory approval for PTI-125 for the treatment of Alzheimer's disease and PTI-125Dx for the diagnosis of Alzheimer's disease. The following is a summary of our clinical-stage biopharmaceutical assets:

**PTI-125** – PTI-125 is the name of our product candidate for the treatment of Alzheimer's disease. This proprietary small molecule drug represents an entirely new approach to treat Alzheimer's disease. PTI-125 benefits from a strong scientific rationale, publications in prestigious peer-reviewed journals and multiple peer-reviewed research grant awards from the National Institutes of Health ("NIH"), the primary agency of the U.S. government for biomedical research. *The content of this Form 10-Q is solely our responsibility and does not necessarily represent the official views of NIH.*

PTI-125 was discovered and designed in-house and was characterized by our academic collaborators during research activities that were conducted from approximately 2008 to date. We own exclusive, worldwide rights to PTI-125, without royalty obligations to any third party. Our on-going Phase 2 clinical program with PTI-125 is substantially funded by research grant awards from NIH.

### **Phase 2 Clinical Trial**

In 2018, we initiated a Phase 2 clinical program for patients with Alzheimer's disease using PTI-125, with funding provided by NIH. On April 15, 2019, we announced completion of patient enrollment for a Phase 2a study for PTI-125. On September 9, 2019, we reported positive Phase 2a clinical results in Alzheimer's patients. In this study, all evaluable patients showed a biomarker response to PTI-125. The drug was well tolerated, with no observable drug-related adverse events.

A key objective of this first-in-patient study was to measure drug effects on biomarkers in the brain (i.e. cerebrospinal fluid, or ("CSF")) before and after 28 days of treatment with PTI-125.

Key results include:

- Total tau (T-tau) decreased 20% ( $p < 0.001$ )
- Phosphorylated tau (P-tau) decreased 34% ( $p < 0.0001$ )
- Neurofilament light chain (NfL), a marker for neurodegeneration, decreased 22% ( $p < 0.0001$ )
- Neurogranin, a marker for cognitive decline, decreased 32% ( $p < 0.0001$ )
- Neuroinflammatory marker YKL-40, an indicator of microglial activation, decreased 9% ( $p < 0.0001$ )
- Proinflammatory Interleukin 6 (IL-6) decreased 14% ( $p < 0.0001$ )
- Proinflammatory Interleukin 1 beta (IL-1 $\beta$ ) decreased 11% ( $p < 0.0001$ )
- Proinflammatory tumor necrosis factor alpha (TNF $\alpha$ ) decreased 5% ( $p = 0.001$ )
- The ratio of CSF P-tau to A $\beta_{42}$ , a widely accepted biochemical value of Alzheimer's disease, improved in all evaluable patients ( $p < 0.001$ ).

Cognition was not assessed in this first-in-patient study; however, published studies show that elevated levels of CSF biomarkers P-tau and total tau/A $\beta$ <sub>42</sub> ratio correlate with deficiencies on a range of memory and sustained attention assessments.

#### Phase 2a Study Design

Phase 2a was a first-in-patient, open-label, multi-center, safety, pharmacokinetic and biomarker study of PTI-125 in the U.S. Thirteen patients with mild-to-moderate Alzheimer's disease, age 50-85, received 100 mg oral PTI-125 twice daily for 28 days. A diagnosis of Alzheimer's disease was confirmed with Mini-Mental State Examination (MMSE)  $\geq 16$  and  $\leq 24$  and a CSF T-tau/A $\beta$ <sub>42</sub> ratio  $\geq 0.30$ . Safety was assessed by ECGs, clinical labs, adverse event monitoring and physical examinations. CSF was drawn from patients before dosing started and again after 28 continuous days of dosing with PTI-125. CSF samples were then analyzed for biomarkers of Alzheimer's pathology (T-tau, P-tau, A $\beta$ <sub>42</sub>); neurodegeneration (NfL, neurogranin); and neuroinflammation (YKL-40, IL-6, IL-1 $\beta$  and TNF $\alpha$ ). A consulting biostatistician conducted an independent analysis of the data set.

Cassava Sciences is scheduled to present data from this Phase 2a study on December 5, 2019 at the 12<sup>th</sup> *International Conference on Clinical Trials on Alzheimer's Disease* (CTAD), a conference for the medical and scientific community being held in San Diego, CA. CTAD has selected our Phase 2a data as a "Late Breaking Oral Communication" at CTAD 2019.

#### Phase 2b Clinical Study

On September 16, 2019, we announced initiation of a Phase 2b clinical study in Alzheimer's patients with funding provided by NIH. This Phase 2b clinical study is designed to evaluate safety, tolerability and drug effects of PTI-125 on validated biomarkers of Alzheimer's disease. This is a blinded, randomized, placebo-controlled, multi-center, multi-dose research study in approximately 60 patients with mild-to-moderate Alzheimer's disease. Patients will be dosed with PTI-125 100 mg, 50 mg, or matching placebo, twice daily for 28 continuous days. The primary endpoint is improvement in biomarkers of Alzheimer's disease from baseline to Day 28. Patient enrollment may take up to 12 months.

**PTI-125Dx** – We are developing PTI-125Dx as a blood-based biomarker/diagnostic to detect Alzheimer's disease. The goal of PTI-125Dx is to make the detection of Alzheimer's disease as simple as getting a blood test. This clinical-stage program is substantially funded by research grant awards from NIH. PTI-125Dx was discovered and designed in-house and was characterized by our academic collaborators during research activities that were conducted from approximately 2008 to date. We own exclusive, worldwide rights to PTI-125Dx, without royalty obligations to any third party.

#### **Our Scientific Approach is Different.**

For over 100 years, scientists have ascribed various neurodegenerative diseases to pathological proteins that misfold. Misfolded proteins are also altered or they aggregate, such as amyloid and tau in the case of Alzheimer's disease. Destruction of neuronal synapses, accelerated nerve cell death, and dysfunction of the brain support cells, are all widely believed to be a direct consequence of misfolded proteins.

Historically, the drug industry has attempted to treat Alzheimer's disease by developing drugs that block the synthesis of, or remove or dis-aggregate, beta amyloid and, more recently, tau. Essentially, the prevailing doctrine said that amyloid must be cleared out of the brain. This scientific approach – known as the amyloid hypothesis - has been repeatedly tested by our competitors in late stage clinical trials using a variety of antibody backbones, epitopes, target conformations, biomarkers and in various stages of disease. Such studies have all failed to yield therapeutic benefit for patients with Alzheimer's disease. More recently, experimental efforts have been proposed to ramp up the brain's immune system in people with Alzheimer's disease to remove amyloid or tau, an approach known as immunotherapy. Current attempts to use immunotherapy to treat Alzheimer's disease may yet work, but for over 20 years this approach has also consistently failed due to lack of efficacy and/or for safety reasons. For example, older adults who receive active immunotherapy treatment often show reduced responsiveness of the immune system, and patients who do improve sometimes develop a life-threatening brain inflammation called aseptic meningitis. More generally, even when active or passive immunization against amyloid beta has reduced the brain's amyloid load, such effects resulted in no therapeutic benefit to patients with Alzheimer's disease.



Since drug innovation is a trial-and-error process, clinical failures present important learning opportunities. In the case of Alzheimer's disease, we believe the biopharmaceutical industry's track record of persistent failure reflects a need to consider more recent and innovative approaches regarding the neurobiology of Alzheimer's disease. We believe such scientific approaches may broaden the range of possible treatment approaches.

Over the last ten years, we have developed a new and promising scientific approach for the treatment and diagnosis of neurodegeneration, particularly Alzheimer's disease.

Importantly, we do not seek to clear amyloid out of the brain. Our approach is to stabilize a critical protein in the brain.

"Proteopathy" refers to a disease in which a protein becomes structurally abnormal, assembles and aggregates, and therefore loses its normal function and disrupts or injures the function of surrounding cells, tissues and organs. Through years of basic research, we have identified a structurally altered protein in the brain. We believe our experimental evidence demonstrates that this proteopathy plays a critical role in the development of neurodegenerative diseases, including the neurodegeneration observed in Alzheimer's disease. Using scientific insight and advanced tools in biochemistry, bioinformatics and imaging, we have elucidated this protein dysfunction. We have engineered a family of high-affinity small molecules to target the structurally altered protein and restore the protein to its normal shape and function. This family of small molecules, including PTI-125, was designed in-house and characterized by our academic collaborators.

The target of PTI-125 is an altered form of a scaffolding protein called filamin A ("FLNA"). Altered FLNA causes a cascade of toxic effects in the brain. Altered FLNA is a proteopathy, which means that this protein is no longer capable of executing a stable, beneficial and protective role and instead becomes harmful and destructive to the brain. By reversing the alteration of FLNA, its pathology ceases to adversely affect surrounding cells in the brain. In animal models of disease, restoring normal FLNA resulted in a multitude of therapeutic effects, including normalizing neurotransmission, decreasing neuroinflammation and restoring memory and cognition. By restoring function to multiple receptors and exerting powerful anti-inflammatory effects, we believe our approach has potential to slow the progression of neurodegeneration in humans. Thus, we have designed product candidates, such as PTI-125, with the goal of slowing or, potentially, even reversing the deterioration of brain cells. We believe the ability to simultaneously improve many vital functions in the brain represents a new, different and crucial approach to address neurodegeneration.

Importantly, since PTI-125 has a unique mechanism of action, we believe its potential therapeutic effects may be additive or synergistic with that of other therapeutic candidates aimed at the treatment of neurodegeneration.

#### **Our Mission is to Detect and Treat Alzheimer's Disease.**

Our lead therapeutic product candidate, called PTI-125, is initially aimed at Alzheimer's disease. PTI-125 is a small molecule drug with a novel mechanism of action. This drug candidate has demonstrated both cognitive improvement and slowing of disease progression in animal models of disease. PTI-125 is in Phase 2 clinical stage of development, with substantial support from the *National Institute on Aging* ("NIA"), a division of NIH.

The target of PTI-125 is an altered form of filamin A ("FLNA"). FLNA is a scaffold protein that is widely found throughout the body. The function of a scaffold protein is to bring multiple other proteins together for them to interact. However, an altered, and highly toxic, form of FLNA is found in the Alzheimer's brain. Altered FLNA contributes to Alzheimer's disease by disrupting the normal function of neurons, leading to neurodegeneration and brain inflammation. Our product candidate, PTI-125, is aimed at countering the altered and toxic form of FLNA in the brain, thus restoring the normal function of this critical protein.

PTI-125 binds to altered FLNA with very high affinity. In doing so, PTI-125 restores the normal shape of FLNA and the normal function of three brain receptors: the alpha-7 nicotinic acetylcholine receptor; the N-methyl-D-aspartate ("NMDA") receptor; and the insulin receptor. These receptors have pivotal roles in brain cell survival, cognition and memory. In animal models, treatment with PTI-125 resulted in dramatic improvements in brain health, such as reduced amyloid and tau deposits, improved insulin receptor signaling and improved learning and memory. In addition, PTI-125 has another beneficial treatment effect of significantly reducing inflammatory cytokines in the brain.

In animal models of disease, treatment with PTI-125 abolished IL-6 production and suppressed TNF-alpha and IL-1beta levels by 86% and 80%, respectively, illustrating a powerful anti-neuroinflammatory effect.

Our science is published in peer-reviewed academic journals. In addition, our research has been supported by NIH under multiple research grant awards. Each grant was awarded following an in-depth, competitive, peer-reviewed evaluation of our approach for scientific and technical merit by a panel of outside experts in the field. Strong, long-term support from NIH has allowed us to advance our two product candidates for neurodegeneration, PTI-125 and PTI-125Dx, into clinical development.

*Our science is based on stabilizing a critical protein in the brain.*

Our scientific approach is to treat neurodegeneration by targeting an altered form of a scaffolding protein called filamin A (“FLNA”). Scaffolding proteins are essential for cell function because they participate in virtually every process within the cell. If their function is impaired, the consequences can be devastating. Technological advances in medicine and improvements in lifestyle are making our lives longer. But with age, genetic mutations and other factors conspire against healthy cells, resulting in altered proteins. Sometimes a cell can rid itself of altered proteins. However, when disease changes the shape and function of critical proteins, multiple downstream processes are impaired. There are many clinical conditions in which proteins become structurally altered and impair the normal function of cells, tissues and organs, leading to disease. Conversely, restoring altered proteins back to health – which is called proteostasis – is a well-accepted therapeutic strategy in clinical medicine.

Accumulation of altered proteins is common in age-related brain disorders. The most common is Alzheimer’s disease. Altered proteins observed in the aging brain include hyperphosphorylated tau and beta amyloid, both hallmarks of Alzheimer’s disease. Our scientists and outside collaborators have demonstrated that an altered, and highly toxic, form of the scaffolding protein FLNA exists in the Alzheimer’s brain. Critically, altered FLNA enables the toxicity of both beta amyloid and tau proteins. This toxic cascade impairs brain health, leading to worsening symptoms of Alzheimer’s disease over time. In addition to impairing brain cell function, altered FLNA enables persistent inflammation in the Alzheimer’s brain. We have shown that altered FLNA also promotes neuroinflammation via toll-like receptor 4 (“TLR4”), an immune receptor that causes release of pro-inflammatory cytokines. Our therapeutic approach is designed to counteract these brain pathologies by restoring altered FLNA protein back to its normal, non-diseased conformation with PTI-125. Treatment with PTI-125 has been shown to restore the normal function of three brain receptors critical to brain cell survival, cognition and memory, i.e., the alpha-7 nicotinic acetylcholine receptor; the NMDA receptor; and the insulin receptor. Treatment with PTI-125 has also been shown to dramatically reduce inflammatory cytokine levels in brains of mice with Alzheimer’s disease mutations, thus reducing the neuroinflammation that also characterizes Alzheimer’s disease.

#### **Financial Overview**

We have yet to generate any revenues from product sales. We have an accumulated deficit of \$167.1 million at September 30, 2019. These losses have resulted principally from costs incurred in connection with research and development activities, salaries and other personnel-related costs and general corporate expenses. Research and development activities include costs of preclinical and clinical trials as well as clinical supplies associated with our drug candidates. Salaries and other personnel-related costs include non-cash stock-based compensation associated with stock options and other equity awards granted to employees and non-employees. Our operating results may fluctuate substantially from period to period as a result of the timing of preclinical activities, enrollment rates of clinical trials for our drug candidates and our need for clinical supplies.

We expect to continue to use significant cash resources in our operations for the next several years. Our cash requirements for operating activities and capital expenditures may increase substantially in the future as we:

- conduct preclinical and clinical trials for our drug candidates;
- seek regulatory approvals for our drug candidates;
- develop, formulate, manufacture and commercialize our drug candidates;
- implement additional internal systems and develop new infrastructure;
- acquire or in-license additional products or technologies, or expand the use of our technology;
- maintain, defend and expand the scope of our intellectual property; and
- hire additional personnel.

Product revenue will depend on our ability to receive regulatory approvals for, and successfully market, our product candidates. If our development efforts result in regulatory approval and successful commercialization of our product candidates, we will generate revenue from direct sales of our products and/or, if we license our products to future collaborators, from the receipt of license fees and royalties from sales of licensed products. We conduct our research and development programs through a combination of internal and collaborative programs. We rely on arrangements with universities, our collaborators, contract research organizations and clinical research sites for a significant portion of our product development efforts.

We focus substantially all of our research and development efforts in the area of neurology. The following table summarizes expenses which have been reduced for reimbursements received for NIH grants (in thousands):

	Three months ended		Nine months ended	
	September 30,		September 30,	
	2019	2018	2019	2018
Research and development expenses - gross	\$ 1,486	\$ 1,533	\$ 4,605	\$ 4,874
Less: Reimbursement from NIH grants	1,538	1,097	3,775	1,907
Research and development expenses - net	\$ (52)	\$ 436	\$ 830	\$ 2,967

Research and development expenses include compensation, contractor fees and supplies as well as allocated common costs. Contractor fees and supplies generally include expenses for preclinical studies and clinical trials and costs for formulation and manufacturing activities. Other common costs include the allocation of common costs such as facilities. During the three months ended September 30, 2019 and 2018, we received \$1.5 million and \$1.1 million from NIH research grants, respectively. During the nine months ended September 30, 2019 and 2018, we received \$3.8 million and \$1.9 million from NIH research grants, respectively. These reimbursements were recorded as a reduction to our research and development expenses.

Our technology has been applied across certain of our drug candidates. Data, know-how, personnel, clinical results, research results and other matters related to the research and development of any one of our drug candidates also relate to, and further the development of, our other drug candidates. As a result, costs allocated to a specific drug candidate may not necessarily reflect the actual costs surrounding research and development of that drug candidate due to cross application of the foregoing.

Estimating the dates of completion of clinical development, and the costs to complete development, of our drug candidates would be highly speculative, subjective and potentially misleading. Pharmaceutical products take a significant amount of time to research, develop and commercialize. The clinical trial portion of the development of a new drug alone usually spans several years. We expect to reassess our future research and development plans based on our review of data we receive from our current research and development activities. The cost and pace of our future research and development activities are linked and subject to change.

## Critical Accounting Policies

The preparation of our financial statements in accordance with U.S. GAAP requires us to make estimates and assumptions that affect the reported amounts of assets, liabilities, revenues, expenses and interest income in our financial statements and accompanying notes. We evaluate our estimates on an ongoing basis, including those estimates related to agreements, research collaborations and investments. We base our estimates on historical experience and various other assumptions that we believe to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from these estimates under different assumptions or conditions. The following items in our financial statements require significant estimates and judgments:

- *Stock-based compensation.* We recognize non-cash expense for the fair value of all stock options and other share-based awards. We use the Black-Scholes option valuation model to calculate the fair value of stock options, using the single-option award approach and straight-line attribution method. The Company adopted ASU No. 2018-07, *Compensation—Stock Compensation (Topic 718), Improvements to Nonemployee Share-Based Payment Accounting*, on January 1, 2019. Accordingly, for all options granted, we recognize the resulting fair value as expense on a straight-line basis over the vesting period of each respective stock option, generally four years.

We have granted share-based awards that vest upon achievement of certain performance criteria, or Performance Awards. We multiply the number of Performance Awards by the fair market value of our common stock on the date of grant to calculate the fair value of each award. We estimate an implicit service period for achieving performance criteria for each award. We recognize the resulting fair value as expense over the implicit service period when we conclude that achieving the performance criteria is probable. We periodically review and update as appropriate our estimates of implicit service periods and conclusions on achieving the performance criteria. Performance Awards vest and common stock is issued upon achievement of the performance criteria.

- *Income Taxes.* We make estimates and judgments in determining the need for a provision for income taxes, including the estimation of our taxable income or loss for each full fiscal year. We have accumulated significant deferred tax assets that reflect the tax effects of net operating loss and tax credit carryovers and temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes. Realization of deferred tax assets is dependent upon future earnings, if any. We are uncertain as to the timing and amount of any future earnings. Accordingly, we offset these deferred tax assets with a valuation allowance. We may in the future determine that our deferred tax assets will likely be realized, in which case we will reduce our valuation allowance in the quarter in which such determination is made. If the valuation allowance is reduced, we may recognize a benefit from income taxes in our statement of operations in that period. We classify interest recognized in connection with our tax positions as interest expense, when appropriate.

## Results of Operations – Three and Nine Months Ended September 30, 2019 and 2018

### *Research and Development Expense*

Research and development expenses consist primarily of costs of drug development work associated with our product candidates, including:

- Pre-clinical testing,
- clinical trials,
- clinical supplies and related formulation and design costs, and
- compensation and other personnel-related expenses.

Research and development expenses were a negative \$0.1 million and \$0.4 million during the three months ended September 30, 2019 and 2018, respectively. The 112% decrease was due primarily to an increase in grant funding received from NIH compared to the prior year period as well as a decrease in non-cash stock-based compensation expenses. Receipts from NIH grants are recorded as a reduction in research and development expenses. During the

three months ended September 30, 2019 and 2018, we received \$1.5 million and \$1.1 million from research grants from NIH, respectively. Research and development expenses included non-cash stock-based compensation expenses were \$0.1 million and \$0.2 million during the three months ended September 30, 2019 and 2018, respectively.

Research and development expenses were \$0.8 million and \$3.0 million during the nine months ended September 30, 2019 and 2018, respectively. The 72% decrease was due primarily to an increase in grant funding received from NIH as well as a decrease in non-cash stock-based compensation expenses. Receipts from NIH grants are recorded as a reduction in research and development expenses. During the nine months ended September 30, 2019 and 2018, we received \$3.8 million and \$1.9 million from research grants from NIH, respectively. Research and development expenses included non-cash stock-based compensation expenses were \$0.4 million and \$0.9 million during the nine months ended September 30, 2019 and 2018, respectively.

Our research and development expenses may fluctuate from period to period due to the timing and scope of our development activities, the timing and amount of any reimbursement from NIH, and the results of clinical trials and pre-clinical studies.

#### *General and Administrative Expense*

General and administrative expenses consist of personnel costs, allocated expenses and other expenses for outside professional services, including legal, human resources, audit and accounting services. Personnel costs consist of salaries, bonus, benefits and stock-based compensation. Allocated expenses consist primarily of facility costs. We incur expenses associated with operating as a public company, including expenses related to compliance with the rules and regulations of the U.S. Securities and Exchange Commission (the "SEC") and Nasdaq Stock Market LLC ("Nasdaq"), additional insurance expenses, additional audit expenses, investor relations activities, Sarbanes-Oxley compliance expenses and other administrative expenses and professional services.

General and administrative expenses were \$0.8 million during both the three months ended September 30, 2019 and 2018 due primarily to a decrease in non-cash stock-based compensation related expense offsetting an increase in compensation costs from the hiring of a chief financial officer in October 2018. General and administrative expenses included non-cash stock-based compensation expenses of \$0.2 million and \$0.3 million during the three months ended September 30, 2019 and 2018, respectively.

General and administrative expenses were \$2.6 million and \$2.9 million during the nine months ended September 30, 2019 and 2018, respectively. The 13% decrease was due primarily to a decrease in non-cash stock-based compensation related expense partially offset by an increase in compensation costs from the hiring of a chief financial officer in October 2018. General and administrative expenses included non-cash stock-based compensation expenses of \$0.6 million and \$1.1 million during the nine months ended September 30, 2019 and 2018, respectively.

We expect our general and administrative expenses during the remainder of 2019 to be consistent with 2018 expenses.

#### *Interest Income*

Interest and other income, net, was \$82,000 and \$17,000 during the three months ended September 30, 2019 and 2018, respectively. Interest and other income, net, was \$268,000 and \$32,000 during the nine months ended September 30, 2019 and 2018, respectively. The increase was due primarily to higher cash balances from our August 2018 stock offering as well as an increase in interest rates. We expect interest income to increase in 2019 compared to 2018 due to our higher cash and cash equivalent balances as well as a higher interest rate environment.

#### *Liquidity and Capital Resources*

Since inception, we have financed our operations primarily through public and private stock offerings, payments received under collaboration agreements and interest earned on our investments. We intend to continue to use our capital resources to fund research and development activities, capital expenditures, working capital requirements and other general corporate purposes. As of September 30, 2019, cash and cash equivalents were \$17.8 million.

### *At-the-Market Common Stock Issuance*

On February 8, 2018, we entered into a Capital on Demand™ Sales Agreement (the “ATM Agreement”) with JonesTrading. In accordance with the terms of the ATM Agreement, we were able to offer and sell shares of our common stock, from time to time in one or more public offerings of our common stock, with JonesTrading acting as agent, in transactions pursuant to a shelf registration statement that was declared effective by the SEC on July 31, 2017. On August 16, 2018, we suspended sales of our common stock under our ATM Agreement.

There were no common stock sales under the ATM Agreement during the nine months ended September 30, 2019. During the nine months ended September 30, 2018, we sold a total of 1,763,013 shares of our common stock under the ATM Agreement in the open market for net proceeds of \$3.9 million. During the nine months ended September 30, 2018, we recorded \$0.1 million of offering costs against addition paid-in capital in addition to trading commissions.

Net cash used in operating activities was \$1.9 million for the nine months ended September 30, 2019, resulting primarily from the net loss reported of \$3.1 million partially offset by non-cash stock-based compensation expense of \$1.0 million and changes in operating assets and liabilities of \$0.2 million.

Net cash used in operating activities was \$4.2 million for the nine months ended September 30, 2018, resulting primarily from the net loss reported of \$5.9 million partially offset by non-cash stock-based compensation expense of \$2.0 million and changes in accrued development expenses of \$0.4 million.

Net cash used in investing activities was \$18,000 for the nine months ended September 30, 2019, resulting primarily from the purchase of equipment. There was no cash from investing activities during the nine months ended September 30, 2018.

Net cash used in financing activities during the nine months ended September 30, 2019 was \$0.1 million, resulting primarily from the issuance costs incurred during the period.

Net cash provided by financing activities during the nine months ended September 30, 2018 was \$14.2 million. Cash provided in 2018 was related to sale of common stock and issuance of warrants, net of issuance costs, of \$10.3 million from our August 2018 Registered Direct Offering as well as net sales of common stock of \$3.9 million under our ATM.

Realization of our other deferred tax assets is dependent on future earnings, if any. We are uncertain about the timing and amount of any future earnings. Accordingly, we offset these net deferred tax assets with a full valuation allowance. Section 382 of the Internal Revenue Code of 1986, as amended, as well as similar state provisions may restrict our ability to use our net operating loss credit carryforwards due to ownership change limitations occurring in the past or that could occur in the future. These ownership changes may also limit the amount of net operating loss credit carryforwards that can be utilized annually to offset future taxable income and tax, respectively. Any limitation may result in the expiration of a portion of the net operating loss carryforwards before utilization and any net operating loss carryforwards that expire prior to utilization as a result of such limitations will be removed from deferred tax assets with a corresponding reduction of the Company’s valuation allowance. Due to the existence of a valuation allowance, it is not expected that such limitations, if any, will have an impact on the Company’s results of operations or financial position.

We have a non-cancelable operating lease for approximately 6,000 square feet of office space in Austin, Texas that expires on December 31, 2020. Future minimum lease payments total \$24,000 for the three months ending December 31, 2019 and \$99,000 for the full year ending December 31, 2020.

We have an accumulated deficit of \$167.1 million as of September 30, 2019. We expect our cash requirements to be significant in the future. The amount and timing of our future cash requirements will depend on regulatory and market acceptance of our drug candidates, the resources we devote to researching and developing, formulating, manufacturing, commercializing and supporting our products and other corporate needs. We believe that our current resources will be sufficient to fund our operations for at least the next 12 months. We may seek additional future funding through public or private financing in the future, if such funding is available and on terms acceptable to us. However, there are no assurances that additional financing will be available on favorable terms, or at all.

## **Off-balance Sheet Arrangements**

As of September 30, 2019, we did not have any relationships with unconsolidated entities or financial partnerships, such as entities often referred to as structured finance or special purpose entities, which would have been established for the purpose of facilitating off-balance sheet arrangements or other contractually narrow or limited purposes. In addition, we do not engage in trading activities involving non-exchange traded contracts. Therefore, we are not materially exposed to financing, liquidity, market or credit risk that could arise if we had engaged in these relationships. We do not have relationships or transactions with persons or entities that derive benefits from their non-independent relationship with us or our related parties.

### **Item 3. *Quantitative and Qualitative Disclosures About Market Risk***

Per Item 305(e) of Regulation S-K, the information called for by this Item 3 is not required.

### **Item 4. *Controls and Procedures***

*Evaluation of disclosure controls and procedures.* Our management, with the participation of our Chief Executive Officer and our Chief Financial Officer, evaluated the effectiveness of our disclosure controls and procedures as of the end of the period covered by this Quarterly Report on Form 10-Q. Based on this evaluation, our Chief Executive Officer (as Principal Executive Officer) and our Chief Financial Officer (as Principal Financial Officer) have concluded that our disclosure controls and procedures are effective to ensure that information we are required to disclose in reports that we file or submit under the Securities Exchange Act of 1934, as amended (the “Exchange Act”), is recorded, processed, summarized and reported within the time periods specified in the SEC’s rules and forms and that such information is accumulated and communicated to management as appropriate to allow timely decisions regarding required disclosures.

Management recognizes that any controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving their objectives, and management necessarily applies its judgment in evaluating the cost-benefit relationship of possible controls and procedures. Based on the evaluation of our disclosure controls and procedures as of September 30, 2019, our Chief Executive Officer and Chief Financial Officer concluded that, as of such date, our disclosure controls and procedures were effective at the reasonable assurance level.

*Changes in internal control over financial reporting.* There has been no change in our internal control over financial reporting (as defined in Rule 13a-15(f) under the Exchange Act) identified during the nine months ended September 30, 2019 that has materially affected, or is reasonable likely to materially affect, our internal control over financial reporting.

## **PART II – OTHER INFORMATION**

### **Item 1. *Legal Proceedings***

None.

### **Item 1A. *Risk Factors***

*There have been no material changes to our risk factors from those disclosed under “Risk Factors” in Part I, Item 1A of our 2018 Annual Report on Form 10-K. The risks and uncertainties described in our 2018 Annual Report on Form 10-K are not the only ones we face. Additional risks and uncertainties not presently known to us or that we currently deem immaterial may also materially adversely affect our business, financial condition or results of operations.*

### **Item 2. *Unregistered Sales of Equity Securities and Use of Proceeds***

None.

**Item 3. Defaults Upon Senior Securities**

None.

**Item 4. Mine Safety Disclosures**

Not applicable.

**Item 5. Other Information**

None.



**Item 6. Exhibits**

The following exhibits have been filed with this report:

Exhibit No.	Description	Incorporated by Reference			Filed Herewith
		Form	Filing Date	Exhibit No.	
<a href="#">3.1</a>	<a href="#">Amended and Restated Certificate of Incorporation.</a>	10-Q	7/29/2005	3.1	
<a href="#">3.2</a>	<a href="#">Certificate of Amendment of Restated Certificate of Incorporation.</a>	8-K	5/8/2017	3.1	
<a href="#">3.3</a>	<a href="#">Certificate of Amendment of Restated Certificate of Incorporation.</a>	10-K	3/29/2019	3.3	
<a href="#">3.4</a>	<a href="#">Amended and Restated Bylaws of Cassava Sciences, Inc.</a>	10-K	3/29/2019	3.4	
<a href="#">4.1</a>	<a href="#">Specimen Common Stock Certificate.</a>	10-Q	8/12/2019	4.1	
<a href="#">10.1</a>	<a href="#">Termination Notice to Durect Corporation dated March 20, 2019 to Development and License Agreement dated December 19, 2002 between Registrant and Durect Corporation.</a>	8-K	3/22/2019	10.1	
<a href="#">31.1</a>	<a href="#">Certification of Principal Executive Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.</a>				X
<a href="#">31.2</a>	<a href="#">Certification of Principal Financial Officer pursuant to Section 302 of the Sarbanes-Oxley Act of 2002.</a>				X
<a href="#">32.1</a>	<a href="#">Certification of the Chief Executive Officer and the Chief Financial Officer pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.</a>				X
101.INS	XBRL Instance Document.				X
101.SCH	XBRL Taxonomy Extension Schema Document.				X
101.CAL	XBRL Taxonomy Extension Calculation Linkbase Document.				X
101.DEF	XBRL Taxonomy Extension Definition Linkbase Document.				X
101.LAB	XBRL Taxonomy Extension Labels Linkbase Document.				X
101.PRE	XBRL Taxonomy Extension Presentation Linkbase Document.				X

## 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.

Cassava Sciences, Inc.  
\_\_\_\_\_  
(Registrant)

/s/ REMI BARBIER  
\_\_\_\_\_  
Remi Barbier,  
Chairman of the Board of Directors,  
President and Chief Executive Officer

Date: October 29, 2019

/s/ ERIC J. SCHOEN  
\_\_\_\_\_  
Eric J. Schoen,  
Chief Financial Officer

Date: October 29, 2019

CERTIFICATION OF THE PRINCIPAL EXECUTIVE OFFICER PURSUANT TO  
SECTION 302 OF THE SARBANES-OXLEY ACT OF 2002

I, Remi Barbier, certify that:

1. I have reviewed this Quarterly Report on Form 10-Q of Cassava Sciences, 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 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 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.

/s/ REMI BARBIER

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Remi Barbier,  
Chairman of the Board of Directors,  
President and Chief Executive Officer  
(Principal Executive Officer)

Date: October 29, 2019

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CERTIFICATION OF THE PRINCIPAL FINANCIAL OFFICER PURSUANT TO  
SECTION 302 OF THE SARBANES-OXLEY ACT OF 2002

I, Eric J. Schoen, certify that:

1. I have reviewed this Quarterly Report on Form 10-Q of Cassava Sciences, 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 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 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.

/s/ ERIC J. SCHOEN

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Eric J. Schoen,  
Chief Financial Officer  
(Principal Financial Officer)

Date: October 29, 2019

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CERTIFICATION OF THE CHIEF EXECUTIVE OFFICER AND CHIEF FINANCIAL  
OFFICER PURSUANT TO  
SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002  
(18 U.S.C. Section 1350)

Pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, each of the undersigned officers of Cassava Sciences, Inc. (the "Company"), hereby certifies that to the best of such officer's knowledge:

1. The Company's Quarterly Report on Form 10-Q for the period ended September 30, 2019, and to which this certification is attached as Exhibit 32.1 (the "Periodic Report"), fully complies with the requirements of Section 13-(a) or 15-(d) of the Securities Exchange Act of 1934, and
2. The information contained in the Periodic Report fairly presents, in all material respects, the financial condition and results of operations of the Company.

Date: October 29, 2019

/s/ REMI BARBIER

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Remi Barbier,  
Chairman of the Board of Directors,  
President and Chief Executive Officer

/s/ ERIC J. SCHOEN

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Eric J. Schoen,  
Chief Financial Officer

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