CEVA INC
Form 10-Q
November 09, 2018
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**UNITED STATES**

**SECURITIES AND EXCHANGE COMMISSION**

**WASHINGTON, DC 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, 2018**

**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: 00049842**

**CEVA, Inc.**

**(Exact Name of Registrant as Specified in Its Charter)**

| | |
|---|---|
| **Delaware** | **770556376** |
| **(State or Other Jurisdiction of Incorporation or Organization)** | **(I.R.S. Employer Identification No.)** |
| **1174 Castro Street, Suite 210, Mountain View, California** | **94040** |
| **(Address of Principal Executive Offices)** | **(Zip Code)** |

**(650) 417-7900**

**(Registrant s Telephone Number, Including Area Code)**

Indicate by check mark whether the registrant: (1) has filed all reports 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 and post 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 definition of large accelerated filer , accelerated filer , smaller reporting company and emerging growth company in Rule 12b-2 of the Exchange Act. (Check one).

| | |
|---|---|
| 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 of 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 12b2 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: 21,902,376 of common stock, $0.001 par value, as of November 2, 2018.

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## FORWARD-LOOKING STATEMENTS

## FORWARD-LOOKING STATEMENTS AND INDUSTRY DATA

This Quarterly Report contains forward-looking statements that involve risks and uncertainties, as well as assumptions that if they materialize or prove incorrect, could cause the results of CEVA to differ materially from those expressed or implied by such forward-looking statements and assumptions. All statements other than statements of historical fact are statements that could be deemed forward-looking statements. Forward-looking statements are generally written in the future tense and/or are preceded by words such as will, may, should, could, expect, suggest, believe, intend, plan, or other similar words. Forward-looking statements include the following:

Our belief that adoption of our signal processing platform and artificial intelligence processors beyond cellular baseband market continues to progress, and that our shipment data is indicative of the continued traction our non-baseband customers are gaining with our signal processing IPs;

Our belief that the growing market potential for voice assisted devices offers an additional growth segment for the company in voice-enabled devices such as smartphones, headsets, earbuds, smart speakers, smart home and automotive;

Our belief that CEVA-ClearVox, plus our proven track record in audio/voice processing, put us in a strong position to power audio and voice roadmaps across this new range of addressable end markets;

Our belief that our CEVA-PentaG state-of-the-art 5G platform for mobile broadband puts us in a strong position to power 5G modems for handsets, fixed wireless and other UE use cases;

Our belief that our CEVA-PentaG is the most advanced cellular baseband IP in the industry today;

Our belief that, together with our presence in the handset baseband market, our Bluetooth and Wi-Fi IPs allow us to expand further into IoT applications and substantially increases our overall addressable market which is expected to be 35 billion devices by 2020, as per ABI Research;

Our belief that our specialization and competitive edge in signal processing platforms for next generation long and short range wireless, and the inherent low cost, power and performance balance of our designs, put us in a strong position to simultaneously capitalize on mass market adoption of such technologies and address multiple markets and product sectors;

Our belief that our computer vision processing IPs, and neural net software are opportunities for us to expand our footprint and content in smartphones, drones, surveillance, consumer cameras, automotive ADAS and industrial IoT applications;

Per ABI Research, cameras equipped with vision processing are expected to exceed 2.7 billion units by 2018;

Our belief that the market opportunity for AI at the edge is on top of our existing product lines and represents new licensing and royalty drivers for the company in the coming years;

Our belief that royalty revenue growth in the next few years for non-handset baseband applications will be a combination of higher unit shipments of Bluetooth and other connectivity products that bear lower ASPs, along with higher ASPs driven by base station and vision products;

Our belief that our licensing business is progressing well with a solid pipeline, diverse customer base and target markets;

Our anticipation that our cash and cash equivalents, short-term bank deposits and marketable securities, along with cash from operations, will provide sufficient capital to fund our operations for at least the next 12 months; and

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- Our belief that changes in interest rates within our investment portfolio will not have a material effect on our financial position on an annual or quarterly basis.

Forward-looking statements are not guarantees of future performance and involve risks and uncertainties. The forward-looking statements contained in this report are based on information that is currently available to us and expectations and assumptions that we deem reasonable at the time the statements were made. We do not undertake any obligation to update any forward-looking statements in this report or in any of our other communications, except as required by law. All such forward-looking statements should be read as of the time the statements were made and with the recognition that these forward-looking statements may not be complete or accurate at a later date.

Many factors may cause actual results to differ materially from those expressed or implied by the forward-looking statements contained in this report. These factors include, but are not limited to, those risks set forth in Part II Item 1A Risk Factors of this Form 10Q.

This report contains market data prepared by third party research firm. Actual market results may differ from their projections.

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## PART I. FINANCIAL INFORMATION

### Item 1. FINANCIAL STATEMENTS

### INTERIM CONDENSED CONSOLIDATED BALANCE SHEETS

**U.S. dollars in thousands, except share and per share data**

| | September 30, 2018 Unaudited | December 31, 2017 Audited |
|---|---|---|
| **ASSETS** | | |
| Current assets: | | |
| Cash and cash equivalents | $ 9,212 | $ 21,739 |
| Short term bank deposits | 31,561 | 34,432 |
| Marketable securities | 78,783 | 82,664 |
| Trade receivables | 7,577 | 14,480 |
| Accrued revenues | 16,456 | 2,014 |
| Prepaid expenses and other current assets | 5,904 | 3,747 |
| Total current assets | 149,493 | 159,076 |
| Long term bank deposits | 47,450 | 44,518 |
| Severance pay fund | 9,242 | 8,910 |
| Deferred tax assets | 4,727 | 3,643 |
| Property and equipment, net | 7,979 | 6,926 |
| Goodwill | 46,612 | 46,612 |
| Intangible assets, net | 3,004 | 1,742 |
| Investments in other company | 1,806 | 1,806 |
| Other long-term assets | 4,938 | 3,579 |
| Total long-term assets | 125,758 | 117,736 |
| Total assets | $ 275,251 | $ 276,812 |
| **LIABILITIES AND STOCKHOLDERS EQUITY** | | |
| Current liabilities: | | |
| Trade payables | $ 1,000 | $ 392 |
| Deferred revenues | 3,614 | 4,399 |
| Accrued expenses and other payables | 3,920 | 3,927 |
| Accrued payroll and related benefits | 12,529 | 14,077 |
| Total current liabilities | 21,063 | 22,795 |
| Long term liabilities: | | |

| | | |
|---|---|---|
| Accrued severance pay | 9,800 | 9,347 |
| Total long-term liabilities | 9,800 | 9,347 |
| Stockholders equity: | | |
| Preferred Stock: | | |
| $0.001 par value: 5,000,000 shares authorized; none issued and outstanding | | |
| Common Stock: | | |
| $0.001 par value: 60,000,000 shares authorized; 23,595,160 shares issued at September 30, 2018 (unaudited) and December 31, 2017. 21,902,376 and 22,064,007 shares outstanding at September 30, 2018 (unaudited) and December 31, 2017, respectively | 22 | 22 |
| Additional paid in-capital | 221,248 | 217,417 |
| Treasury stock at cost (1,692,784 and 1,531,153 shares of common stock at September 30, 2018 (unaudited) and December 31, 2017, respectively) | (36,168) | (26,056) |
| Accumulated other comprehensive loss | (1,284) | (586) |
| Retained earnings | 60,570 | 53,873 |
| Total stockholders equity | 244,388 | 244,670 |
| Total liabilities and stockholders equity | $ 275,251 | $ 276,812 |

The accompanying notes are an integral part of the unaudited interim condensed consolidated financial statements.

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**INTERIM CONDENSED CONSOLIDATED STATEMENTS OF INCOME (UNAUDITED)**

**U.S. dollars in thousands, except per share data**

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | **2018** | **2017** | **2018** | **2017** |
| Revenues: | | | | |
| Licensing and related revenue | $ 29,907 | $ 33,893 | $ 9,786 | $ 14,021 |
| Royalties | 26,569 | 32,013 | 11,627 | 10,023 |
| Total revenues | 56,476 | 65,906 | 21,413 | 24,044 |
| Cost of revenues | 5,966 | 5,030 | 2,006 | 1,726 |
| Gross profit | 50,510 | 60,876 | 19,407 | 22,318 |
| Operating expenses: | | | | |
| Research and development, net | 35,756 | 30,413 | 11,897 | 10,031 |
| Sales and marketing | 9,302 | 9,422 | 2,727 | 3,057 |
| General and administrative | 8,193 | 7,388 | 2,406 | 2,711 |
| Amortization of intangible assets | 676 | 927 | 225 | 309 |
| Total operating expenses | 53,927 | 48,150 | 17,255 | 16,108 |
| Operating income (loss) | (3,417) | 12,726 | 2,152 | 6,210 |
| Financial income, net | 2,535 | 2,147 | 831 | 821 |
| Income (loss) before taxes on income | (882) | 14,873 | 2,983 | 7,031 |
| Income taxes expense | 847 | 1,008 | 440 | 1,181 |
| Net income (loss) | $ (1,729) | $ 13,865 | $ 2,543 | $ 5,850 |
| Basic net income (loss) per share | $ (0.08) | $ 0.64 | $ 0.12 | $ 0.27 |
| Diluted net income (loss) per share | $ (0.08) | $ 0.62 | $ 0.11 | $ 0.26 |
| Weighted-average shares used to compute net income (loss) per share (in thousands): | | | | |
| Basic | 22,091 | 21,687 | 21,997 | 21,946 |
| Diluted | 22,091 | 22,480 | 22,428 | 22,683 |

The accompanying notes are an integral part of the unaudited interim condensed consolidated financial statements.

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**INTERIM CONDENSED CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (UNAUDITED)**

**U.S. dollars in thousands**

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | **2018** | **2017** | **2018** | **2017** |
| Net income (loss): | $ (1,729) | $ 13,865 | $ 2,543 | $ 5,850 |
| Other comprehensive income (loss) before tax: | | | | |
| Available-for-sale securities: | | | | |
| Changes in unrealized gains (losses) | (863) | 322 | 16 | 96 |
| Reclassification adjustments for (gains) losses included in net income | 30 | 33 | 32 | (7) |
| Net change | (833) | 355 | 48 | 89 |
| Cash flow hedges: | | | | |
| Changes in unrealized gains (losses) | (259) | 180 | 21 | (2) |
| Reclassification adjustments for (gains) losses included in net income | 259 | (186) | 63 | 2 |
| Net change | | (6) | 84 | |
| Other comprehensive income (loss) before tax | (833) | 349 | 132 | 89 |
| Income tax expense (benefit) related to components of other comprehensive income (loss) | (135) | 53 | (1) | 12 |
| Other comprehensive income (loss), net of taxes | (698) | 296 | 133 | 77 |
| Comprehensive income (loss) | $ (2,427) | $ 14,161 | $ 2,676 | $ 5,927 |

The accompanying notes are an integral part of the unaudited interim condensed consolidated financial statements.

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**INTERIM CONDENSED CONSOLIDATED STATEMENTS OF CASH FLOWS (UNAUDITED)**

**U.S. dollars in thousands**

| | Nine months ended September 30, | |
|---|---|---|
| | **2018** | **2017** |
| **Cash flows from operating activities:** | | |
| Net income (loss) | $ (1,729) | $ 13,865 |
| Adjustments required to reconcile net income (loss) to net cash provided by operating activities: | | |
| Depreciation | 1,914 | 1,447 |
| Amortization of intangible assets | 938 | 927 |
| Equity-based compensation | 8,083 | 6,346 |
| Realized loss, net on sale of available-for-sale marketable securities | 30 | 33 |
| Amortization of premiums on available-for-sale marketable securities | 609 | 907 |
| Unrealized foreign exchange (gain) loss | 141 | (24) |
| Changes in operating assets and liabilities: | | |
| Trade receivables and accrued revenues | 1,658 | 2,159 |
| Prepaid expenses and other assets | (3,815) | (2,572) |
| Accrued interest on bank deposits | (643) | (3) |
| Deferred tax, net | (949) | (741) |
| Trade payables | 557 | (105) |
| Deferred revenues | (785) | (1,984) |
| Accrued expenses and other payables | (802) | 416 |
| Accrued payroll and related benefits | (1,329) | (1,532) |
| Income taxes payable | 55 | (1,501) |
| Accrued severance pay, net | 149 | 60 |
| Net cash provided by operating activities | 4,082 | 17,698 |
| **Cash flows from investing activities:** | | |
| Purchase of property and equipment | (2,913) | (3,340) |
| Purchase of intangible assets | (1,960) | |
| Investment in bank deposits | (21,596) | (30,757) |
| Proceeds from bank deposits | 22,065 | 27,050 |
| Investment in available-for-sale marketable securities | (15,516) | (36,468) |
| Proceeds from maturity of available-for-sale marketable securities | 10,122 | 8,086 |
| Proceeds from sale of available-for-sale marketable securities | 7,803 | 15,206 |
| Net cash used in investing activities | (1,995) | (20,223) |
| **Cash flows from financing activities:** | | |
| Purchase of treasury stock | (16,742) | |

| | | |
|---|---|---|
| Proceeds from exercise of stock-based awards | 2,249 | 6,898 |
| Net cash provided by (used in) financing activities | (14,493) | 6,898 |
| Effect of exchange rate changes on cash and cash equivalents | (121) | 157 |
| Increase (decrease) in cash and cash equivalents | (12,527) | 4,530 |
| Cash and cash equivalents at the beginning of the period | 21,739 | 18,401 |
| Cash and cash equivalents at the end of the period | $ 9,212 | $ 22,931 |
| **Supplemental information of cash-flow activities:** | | |
| Cash paid during the period for: | | |
| Income and withholding taxes, net of refunds | $ 3,716 | $ 3,934 |
| Non-cash transactions: | | |
| Cumulative effect of adoption of new accounting standard | $ 8,555 | $ |
| Property and equipment purchases incurred but unpaid at period end | $ 54 | $ |
| Intangible assets purchases incurred but unpaid at period end | $ 750 | $ |

The accompanying notes are an integral part of the unaudited interim condensed consolidated financial statements.

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS**

**(in thousands, except share data)**

**NOTE 1: BUSINESS**

The financial information in this quarterly report includes the results of CEVA, Inc. and its subsidiaries (the Company or CEVA ).

CEVA licenses a family of signal processing IPs, including comprehensive platforms for 5G baseband processing in handsets and base station RAN, highly integrated cellular IoT solutions (NB-IoT and Cat-M1), DSP and voice input algorithms and software for voice enabled devices, advanced imaging and computer vision, DSP platforms for any camera-enabled device, and a family of self-contained AI processors that address a wide range of applications. For short-range wireless, we offer the industry s most widely adopted IPs for Bluetooth (low energy and dual mode) and Wi-Fi (Wi-Fi 4 (802.11n), Wi-Fi 5 (802.11ac) and Wi-Fi 6 (802.11ax) up to 4x4) .

CEVA s technologies are licensed to leading semiconductor and original equipment manufacturer (OEM) companies. These companies design, manufacture, market and sell application-specific integrated circuits ( ASICs ) and application-specific standard products ( ASSPs ) based on CEVA s technology to wireless, consumer electronics and automotive companies for incorporation into a wide variety of end products.

**NOTE 2: BASIS OF PRESENTATION AND SUMMARY OF SIGNIFICANT ACCOUNTING POLICIES**

***Basis of Presentation***

The interim condensed consolidated financial statements have been prepared according to U.S Generally Accepted Accounting Principles ( U.S. GAAP ).

The accompanying unaudited interim condensed consolidated financial statements have been prepared in accordance with generally accepted accounting principles in the United States. In the opinion of management, all adjustments considered necessary for a fair presentation have been included. Operating results for the three and nine months ended September 30, 2018 are not necessarily indicative of the results that may be expected for the year ending December 31, 2018. For further information, reference is made to the consolidated financial statements and footnotes thereto included in the Company s Annual Report on Form 10K for the year ended December 31, 2017.

The significant accounting policies applied in the annual consolidated financial statements of the Company as of December 31, 2017, contained in the Company s Annual Report on Form 10K filed with the Securities and Exchange Commission on March 1, 2018, have been applied consistently in these unaudited interim condensed consolidated financial statements, except for changes associated with recent accounting standards for revenue recognition and financial instruments for the three and nine months ended September 30, 2018, as detailed below.

***Changes in accounting policies as a result of adopting Topic 606 and nature of goods***

Effective as of January 1, 2018, the Company has followed the provisions of Accounting Standards Codification ( ASC ) Topic 606, *Revenue from Contracts with Customers* ( ASC 606 ). The guidance provides a unified model to determine how revenue is recognized. See Note 3 for further details.

The following is a description of principal activities from which the Company generates revenue. Revenues are recognized when control of the promised goods or services are transferred to the customers in an amount that reflects the consideration that the Company expects to receive in exchange for those goods or services.

The Company determines revenue recognition through the following steps:

- identification of the contract with a customer;
- identification of the performance obligations in the contract;
- determination of the transaction price;

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

allocation of the transaction price to the performance obligations in the contract; and

recognition of revenue when, or as, the Company satisfies a performance obligation.

The Company enters into contracts that can include various combinations of products and services, as detailed below, which are generally capable of being distinct and accounted for as separate performance obligations.

The Company generates its revenues from (1) licensing intellectual properties, which in certain circumstances are modified for customer-specific requirements, (2) royalty revenues, and (3) other revenues, which include revenues from support, training and sale of development systems.

The Company accounts for its IP license revenues and related services, which provide the Company s customers with rights to use the Company s IP, in accordance with ASC 606. A license may be perpetual or time limited in its application. In accordance with ASC 606, the Company will continue to recognize revenue from IP license at the time of delivery when the customer accepts control of the IP, as the IP is functional without professional services, updates and technical support. The Company has concluded that its IP license is distinct as the customer can benefit from the software on its own.

Most of the Company s contracts with customers contain multiple performance obligations. For these contracts, the Company accounts for individual performance obligations separately, if they are distinct. The transaction price is allocated to the separate performance obligations on a relative standalone selling price basis. Standalone selling prices of IP license are typically estimated using the residual approach. Standalone selling prices of services are typically estimated based on observable transactions when these services are sold on a standalone basis.

When contracts involve a significant financing component, the Company adjusts the promised amount of consideration for the effects of the time value of money if the timing of payments agreed to by the parties to the contract (either explicitly or implicitly) provide the customer with a significant benefit of financing, unless the financing period is under one year and only after the products or services were provided, which is a practical expediency permitted under ASC 606.

Revenues from contracts that involve significant customization of the Company s IP to customer-specific specifications are performance obligations the Company generally accounts for as performance obligations satisfied over time. The underlying deliverable is owned and controlled by the customer, and does not create an asset with an alternative use to the Company. The Company recognizes revenue on such contracts using cost based input methods, which recognize revenue and gross profit as work is performed based on a ratio between actual costs incurred compared to the total estimated costs for the contract. Provisions for estimated losses on uncompleted contracts are made during the period in which such losses are first determined, in the amount of the estimated loss on the entire contract.

Revenues that are derived from the sale of a licensee s products that incorporate the Company s IP are classified as royalty revenues. Royalty revenues are recognized during the quarter in which the sale of the product incorporating the Company s IP occurs. Royalties are calculated either as a percentage of the revenues received by the Company s licensees on sales of products incorporating the Company s IP or on a per unit basis, as specified in the agreements with the licensees. The Company receives the actual sales data from its customers after the quarter ends and accounts for it as accrued revenue. When the Company does not receive actual sales data from the customer prior to the finalization of its financial statements, royalty revenues are recognized based on the Company s estimation of the customer s sales during the quarter.

In addition to license fees, contracts with customers generally contain an agreement to provide for training and post contract support, which consists of telephone or e-mail support, correction of errors (bug fixing) and unspecified updates and upgrades. Fees for post contract support, which takes place after delivery to the customer, are specified in the contract and are generally mandatory for the first year. After the mandatory period, the customer may extend the support agreement on similar terms on an annual basis. The Company considers the post contract support performance obligation as a distinct performance obligation that is satisfied over time, and as such, it recognizes revenue for post contract support on a straight-line basis over the period for which technical support is contractually agreed to be provided to the licensee, typically 12 months. Training services are considered performance obligations satisfied over-time, and revenues from training services are recognized as the training is performed.

Revenues from the sale of development systems are recognized when control of the promised goods or services are transferred to the customers.

**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

Deferred revenues, which represent a contract liability, include unearned amounts received under license agreements, unearned technical support and amounts paid by customers not yet recognized as revenues.

The Company capitalizes sales commission as costs of obtaining a contract when they are incremental and, if they are expected to be recovered, amortized consistently with the pattern of transfer of the good or service to which the asset relates. If the expected amortization period is one year or less, the commission fee is expensed when incurred.

***Changes in accounting policies as a result of adopting ASU No. 2016-01, Financial Instruments Recognition and Measurement of Financial Assets and Financial Liabilities***

Beginning on January 1, 2018, the Company has followed the provisions of Accounting Standards Update ( ASU ) No. 2016-01, Financial Instruments Recognition and Measurement of Financial Assets and Financial Liabilities , which requires that equity investments (except those accounted for under the equity method of accounting or those that result in consolidation of the investee) are to be measured at fair value with changes in fair value recognized in net income. However, an entity may choose to measure equity investments that do not have readily determinable fair values at cost minus impairment, if any, plus or minus changes resulting from observable price changes in orderly transactions for the identical or a similar investment of the same issuer. The investment is reviewed periodically to determine if there are changes resulting from observable price changes, and adjustments are recorded as necessary. During the first nine months of 2018, no adjustments were recorded as a result of changes in the observable price.

***Reclassification***

Certain amounts in the prior years financial statements have been reclassified to conform to the current year s presentation. These amounts are associated with trade receivables and accrued revenues. Such reclassifications have no effect on stockholders equity or net income as previously reported.

***Use of Estimates***

The preparation of the interim condensed consolidated financial statements in conformity with U.S. GAAP requires management to make estimates, judgments and assumptions. The Company s management believes that the estimates, judgments and assumptions used are reasonable based upon information available at the time they are made. These estimates, judgments and assumptions can affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities as of the dates of the interim condensed consolidated financial statements, and the reported amounts of revenue and expenses during the reporting period. Actual results could differ from those estimates.

**NOTE 3: REVENUE RECOGNITION**

In May 2014, the Financial Accounting Standards Board ( FASB ) issued new guidance related to revenue recognition, which outlines a comprehensive revenue recognition model and supersedes most current revenue recognition guidance. ASC 606 requires a company to recognize revenue as control of goods or services transfers to a customer at an amount that reflects the expected consideration to be received in exchange for those goods or services. It defines a five-step approach for recognizing revenue, which may require a company to use more judgment and make more estimates than under the prior guidance. The Company adopted ASC 606 on January 1, 2018 for all open contracts at the date of initial application, and applied the standard using modified retrospective approach, with the cumulative effect of applying ASC 606 recognized as an adjustment to the opening retained earnings balance. Results for reporting periods beginning after January 1, 2018 are presented under ASC 606, while prior period amounts are not adjusted and continue to be reported under the accounting standards in effect for the prior period. The Company recorded a net increase to opening retained earnings of $8,555 as of January 1, 2018 due to the cumulative impact of adopting ASC 606. The impact to revenues for the three and nine months ended September 30, 2018 was an increase of $3,945 and $2,872, respectively, as a result of adopting ASC 606.

With respect to the Company s licensing business, under ASC 606, certain deliverables may now be considered as distinct performance obligations separate from other performance obligations, and will be measured using the relative standalone selling price basis, and recognized as revenue accordingly. Nevertheless, the adoption of ASC 606 for licensing and related revenues did not have a significant impact on the Company s financial statements. With respect to the Company s royalty business, ASC 606 did not have a significant impact. Under the accounting standards in effect during prior periods, the Company recognized sales-based royalties as revenues during the quarter, which such royalties were reported by licensees, which reflected the licensees prior quarter sales and when all other revenue recognition criteria were met. Under ASC 606, the Company is required to estimate and recognize sales-based royalties during the period which the associated sales occur. Accordingly, the Company has an increase in accrued revenues of $10,787 in the statement of financial position.

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

Under ASC 606, an entity recognizes revenue when or as it satisfies a performance obligation by transferring IP license or services to the customer, either at a point in time or over time. The Company recognizes most of its revenues at a point in time upon delivery of its IPs. The Company recognizes revenue over time on significant license customization contracts that are covered by contract accounting standards using cost inputs to measure progress toward completion of its performance obligations, which is similar to the method prior to the adoption of ASC 606.

The following table includes estimated revenue expected to be recognized in future periods related to performance obligations that are unsatisfied or partially unsatisfied at the end of the reporting period. The estimated revenues do not include amounts of royalties or unexercised contract renewals:

| | Remainder of 2018 | 2019 | 2020 | 2021 |
|---|---|---|---|---|
| License and related revenues | $ 2,256 | $ 6,730 | $ 3,000 | $ 1,500 |

In connection with the adoption of ASC 606, the Company is required to capitalize incremental costs that are related to sales during the period, consisting primarily of sales commissions earned when contracts are signed. As of January 1, 2018, the date the Company adopted ASC 606, the Company capitalized $239 in contract acquisition costs related to contracts that were not completed. For contracts that have a duration of less than one year, the Company follows ASC 606 s practical expediency, and expenses these costs when incurred; for contracts with life exceeding one year, the Company records these costs in proportion to each completed contract performance obligation. For the three and nine months ended September 30, 2018, the amount of amortization was $0 and $120, respectively, and there was no impairment loss in relation to costs capitalized.

Disaggregation of revenue:

The following table provides information about disaggregated revenue by primary geographical market, major product line and timing of revenue recognition (in thousands):

| | Nine months ended September 30, 2018 (unaudited) | | | Three months ended September 30, 2018 (unaudited) | | |
|---|---|---|---|---|---|---|
| | Licensing and related revenues | Royalties | Total | Licensing and related revenues | Royalties | Total |
| Primary geographical markets | | | | | | |
| United States | $ 4,667 | $ 1,420 | $ 6,087 | $ 1,483 | $ 776 | $ 2,259 |
| Europe and Middle East | 3,286 | 8,019 | 11,305 | 534 | 5,605 | 6,139 |
| Asia Pacific | 21,954 | 17,130 | 39,084 | 7,769 | 5,246 | 13,015 |
| Total | $ 29,907 | $ 26,569 | $ 56,476 | $ 9,786 | $ 11,627 | $ 21,413 |

| | | | | | | |
|---|---|---|---|---|---|---|
| Major product/service lines | | | | | | |
| DSP products (DSP cores and platforms) | $ 18,077 | $ 24,241 | $ 42,318 | $ 4,652 | $ 10,600 | $ 15,252 |
| Connectivity products (Bluetooth, Wi-Fi and SATA/SAS) | 11,830 | 2,328 | 14,158 | 5,134 | 1,027 | 6,161 |
| Total | $ 29,907 | $ 26,569 | $ 56,476 | $ 9,786 | $ 11,627 | $ 21,413 |
| Timing of revenue recognition | | | | | | |
| Products transferred at a point in time | $ 22,163 | $ 26,569 | $ 48,732 | $ 6,878 | $ 11,627 | $ 18,505 |
| Products and services transferred over time | 7,744 | | 7,744 | 2,908 | | 2,908 |
| Total | $ 29,907 | $ 26,569 | $ 56,476 | $ 9,786 | $ 11,627 | $ 21,413 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

Contract balances:

The following table provides information about trade receivables, contract assets and contract liabilities from contracts with customers (in thousands):

| | September 30, 2018 (unaudited) |
|---|---|
| Trade receivables | $ 7,577 |
| Accrued revenues (short-term contract assets) | 5,279 |
| Accrued revenues (royalties) | 11,177 |
| Deferred revenues (short-term contract liabilities) | 3,614 |

The Company receives payments from customers based upon contractual payment schedules; trade receivable are recorded when the right to consideration becomes unconditional, and an invoice is issued to the customer. Contract assets include amounts related to the Company s contractual right to consideration for completed performance objectives not yet invoiced. Accrued revenues associated with royalties are recorded as the Company recognizes revenues from royalties earned during the quarter, not yet invoiced, either by actual sales data received from the customers, or, when applicable, by estimation. Contract liabilities (deferred revenue) include payments received in advance of performance under the contract, and are realized with the associated revenue recognized under the contract.

During the three and nine months ended September 30, 2018, the Company recognized $253 and $3,676, respectively, that was included in deferred revenues (short-term contract liability) balance at January 1, 2018.

In accordance with ASC 606, the disclosure of the impact of adoption to the Company s condensed consolidated statements of income and balance sheets was as follows:

| | Nine months ended September 30, 2018 (unaudited) | | | Three months ended September 30, 2018 (unaudited) | | |
|---|---|---|---|---|---|---|
| | As reported | Balance without adopting ASC 606 | Effect of change higher/(lower) | As reported | Balance without adopting ASC 606 | Effect of change higher/(lower) |
| Revenues: | | | | | | |
| Licensing and related revenue | $ 29,907 | $ 28,730 | $ 1,177 | $ 9,786 | $ 10,131 | $ (345) |
| Royalties | 26,569 | 24,874 | 1,695 | 11,627 | 7,337 | 4,290 |
| Total revenues | 56,476 | 53,604 | 2,872 | 21,413 | 17,468 | 3,945 |

| | | | | | | |
|---|---|---|---|---|---|---|
| Cost of revenues | 5,966 | 5,966 | | 2,006 | 2,006 | |
| Gross profit | 50,510 | 47,638 | 2,872 | 19,407 | 15,462 | 3,945 |
| Operating expenses: | | | | | | |
| Sales and marketing | 9,302 | 9,186 | 116 | 2,727 | 2,729 | (2) |
| Other operating expenses | 44,625 | 44,625 | | 14,528 | 14,528 | |
| Total operating expenses | 53,927 | 53,811 | 116 | 17,255 | 17,257 | (2) |
| Operating income (loss) | (3,417) | (6,173) | 2,756 | 2,152 | (1,795) | 3,947 |
| Financial income, net | 2,535 | 2,535 | | 831 | 831 | |
| Income (loss) before taxes on income | (882) | (3,638) | 2,756 | 2,983 | (964) | 3,947 |
| Income taxes expenses (benefit) | 847 | 657 | 190 | 440 | (112) | 552 |
| Net income (loss) | $ (1,729) | $ (4,295) | $ 2,566 | $ 2,543 | $ (852) | $ 3,395 |
| Basic net income (loss) per share | $ (0.08) | $ (0.19) | $ 0.12 | $ 0.12 | $ (0.04) | $ 0.15 |
| Diluted net income (loss) per share | $ (0.08) | $ (0.19) | $ 0.12 | $ 0.11 | $ (0.04) | $ 0.15 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

| | September 30, 2018 (unaudited) | | |
|---|---|---|---|
| | As reported | Balance without adopting ASC 606 | Effect of change higher/(lower) |
| Assets: | | | |
| Trade receivables | $ 7,577 | $ 6,718 | $ 859 |
| Accrued revenues | $ 16,456 | $ 5,269 | $ 11,187 |
| Prepaid expenses and other current assets | $ 5,904 | $ 6,856 | $ (952) |
| Liabilities: | | | |
| Deferred revenues | $ 3,614 | $ 3,641 | $ (27) |
| Stockholders Equity: | | | |
| Retained earnings | $ 60,570 | $ 49,449 | $ 11,121 |

Practical Expediency and Exemptions:

The Company generally expenses sales commissions when incurred because the amortization period would have been less than one year. The Company records these costs within sales and marketing expenses on the Company s interim condensed consolidated statements of income.

The Company does not assess whether a contract has a significant financing component if the expectation at contract inception is such that the period between payment by the customer and the transfer of the promised goods or services to the customer will be one year or less.

**NOTE 4: MARKETABLE SECURITIES**

The following is a summary of available-for-sale marketable securities:

| | September 30, 2018 (Unaudited) | | | |
|---|---|---|---|---|
| | Amortized cost | Gross unrealized gains | Gross unrealized losses | Fair value |
| **Available-for-sale - matures within one year:** | | | | |
| Corporate bonds | $ 8,538 | $ | $ (49) | $ 8,489 |
| | 8,538 | | (49) | 8,489 |
| **Available-for-sale - matures after one year through five years:** | | | | |
| Certificate of deposits | 747 | | | 747 |
| Government bonds | 501 | | (11) | 490 |

| | | | | | | | |
|---|---|---|---|---|---|---|---|
| Corporate bonds | | 70,508 | | 1 | | (1,452) | 69,057 |
| | | 71,756 | | 1 | | (1,463) | 70,294 |
| **Total** | $ | 80,294 | $ | 1 | $ | (1,512) | $ 78,783 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

| | December 31, 2017 (Audited) | | | |
|---|---|---|---|---|
| | Amortized cost | Gross unrealized gains | Gross unrealized losses | Fair value |
| **Available-for-sale - matures within one year:** | | | | |
| Corporate bonds | $ 11,803 | $ 3 | $ (12) | $ 11,794 |
| | 11,803 | 3 | (12) | 11,794 |
| **Available-for-sale - matures after one year through five years:** | | | | |
| Certificate of deposits | 747 | | | 747 |
| Government bonds | 501 | | (6) | 495 |
| Corporate bonds | 70,291 | 14 | (677) | 69,628 |
| | 71,539 | 14 | (683) | 70,870 |
| **Total** | $ 83,342 | $ 17 | $ (695) | $ 82,664 |

The following table presents gross unrealized losses and fair values for those investments that were in an unrealized loss position as of September 30, 2018 and December 31, 2017, and the length of time that those investments have been in a continuous loss position:

| | Less than 12 months | | 12 months or greater | |
|---|---|---|---|---|
| | Fair value | Gross unrealized loss | Fair value | Gross unrealized loss |
| As of September 30, 2018 (unaudited) | $ 40,918 | $ (615) | $ 36,817 | $ (897) |
| As of December 31, 2017 | $ 49,921 | $ (411) | $ 22,960 | $ (284) |

As of September 30, 2018 and December 31, 2017, management believes the impairments are not other than temporary and therefore the impairment losses were recorded in accumulated other comprehensive income (loss).

The following table presents gross realized gains and losses from sale of available-for-sale marketable securities:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Gross realized gains from sale of available-for-sale marketable securities | $ 4 | $ 14 | $ | $ 8 |

| | | | | |
|---|---|---|---|---|
| Gross realized losses from sale of available-for-sale marketable securities | $ (34) | $ (47) | $ (32) | $ (1) |

**NOTE 5: FAIR VALUE MEASUREMENT**

FASB ASC No. 820, Fair Value Measurements and Disclosures defines fair value, establishes a framework for measuring fair value. Fair value is an exit price, representing the amount that would be received for selling an asset or paid for the transfer of a liability in an orderly transaction between market participants. As such, fair value is a market-based measurement that should be determined based on assumptions that market participants would use in pricing an asset or a liability. A three-tier fair value hierarchy is established as a basis for considering such assumptions and for inputs used in the valuation methodologies in measuring fair value:

| | |
|---|---|
| Level I | Unadjusted quoted prices in active markets that are accessible on the measurement date for identical, unrestricted assets or liabilities; |
| Level II | Quoted prices in markets that are not active, or inputs that are observable, either directly or indirectly, for substantially the full term of the asset or liability; and |
| Level III | Prices or valuation techniques that require inputs that are both significant to the fair value measurement and unobservable (supported by little or no market activity). |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

The Company measures its marketable securities at fair value. Marketable securities are classified within Level II as the valuation inputs are based on quoted prices and market observable data of similar instruments.

The table below sets forth the Company s assets measured at fair value by level within the fair value hierarchy. Assets are classified in their entirety based on the lowest level of input that is significant to the fair value measurement.

| Description | September 30, 2018 (unaudited) | Level I (unaudited) | Level II (unaudited) | Level III (unaudited) |
|---|---|---|---|---|
| Assets: | | | | |
| Marketable securities: | | | | |
| Certificate of deposits | $ 747 | $ | $ 747 | $ |
| Government bonds | 490 | | 490 | |
| Corporate bonds | 77,546 | | 77,546 | |

| Description | December 31, 2017 | Level I | Level II | Level III |
|---|---|---|---|---|
| **Assets:** | | | | |
| Marketable securities: | | | | |
| Certificate of deposits | $ 747 | $ | $ 747 | $ |
| Government bonds | 495 | | 495 | |
| Corporate bonds | 81,422 | | 81,422 | |

**NOTE 6: INTANGIBLE ASSETS, NET**

| | | Nine months ended September 30, 2018 | | | Year ended December 31, 2017 | | |
|---|---|---|---|---|---|---|---|
| | Weighted Average Amortization Period (Years) | Gross Carrying Amount | Accumulated Amortization | Net | Gross Carrying Amount | Accumulated Amortization | Net |
| Intangible assets amortizable: | | | | | | | |
| Customer relationships | 4.5 | $ 272 | $ 257 | $ 15 | $ 272 | $ 211 | $ 61 |
| Customer backlog | 1.5 | 93 | 93 | | 93 | 93 | |
| Core technologies | 5.1 | 5,796 | 4,745 | 1,051 | 5,796 | 4,115 | 1,681 |
| NB-IoT technologies (*) | 7.0 | 2,200 | 262 | 1,938 | | | |
| Total intangible assets | | $ 8,361 | $ 5,357 | $ 3,004 | $ 6,161 | $ 4,419 | $ 1,742 |

(*) During the first quarter of 2018, the Company entered into an agreement to acquire certain NB-IoT technologies in the amount of $2,800, of which $600 has not been received. Of the $2,200, $750 has not resulted in cash outflows as of September 30, 2018. The Company recorded the amortization cost of the NB-IoT technologies in cost of revenues on the Company s interim condensed consolidated statements of income.

Future estimated annual amortization charges are as follows:

| | |
|---|---|
| 2018 | 304 |
| 2019 | 1,155 |
| 2020 | 314 |
| 2021 | 314 |
| 2022 | 314 |
| 2023 | 314 |
| 2024 | 289 |
| | $ 3,004 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

## NOTE 7: GEOGRAPHIC INFORMATION AND MAJOR CUSTOMER DATA

a. Summary information about geographic areas:

The Company manages its business on the basis of one reportable segment: the licensing of intellectual property to semiconductor companies and electronic equipment manufacturers (see Note 1 for a brief description of the Company s business). The following is a summary of revenues within geographic areas:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Revenues based on customer location: | | | | |
| United States | $ 6,087 | $ 6,162 | $ 2,259 | $ 1,237 |
| Europe and Middle East (1) | 11,305 | 7,451 | 6,139 | 1,267 |
| Asia Pacific (2) (3) (4) | 39,084 | 52,293 | 13,015 | 21,540 |
| | $ 56,476 | $ 65,906 | $ 21,413 | $ 24,044 |
| (1) Germany | $ 8,582 | *) | $ 5,600 | *) |
| (2) China | $ 23,127 | $ 31,008 | $ 10,192 | $ 15,188 |
| (3) S. Korea | $ 7,152 | $ 13,852 | *) | $ 5,076 |
| (4) Japan | $ 6,116 | *) | *) | *) |

*) Less than 10%

b. Major customer data as a percentage of total revenues:

The following table sets forth the customers that represented 10% or more of the Company s total revenues in each of the periods set forth below.

| | Nine months ended September 30 | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Customer A | 16% | 22% | 16% | 20% |
| Customer B | 12% | 17% | *) | 18% |
| Customer C | 16% | *) | 26% | *) |

| | | | | |
|---|---|---|---|---|
| Customer D | *) | *) | *) | 12% |
| Customer E | *) | *) | *) | 21% |

*) Less than 10%

**NOTE 8: NET INCOME (LOSS) PER SHARE OF COMMON STOCK**

Basic net income (loss) per share is computed based on the weighted average number of shares of common stock outstanding during each period. Diluted net income (loss) per share is computed based on the weighted average number of shares of common stock outstanding during each period, plus dilutive potential shares of common stock considered outstanding during the period, in accordance with FASB ASC No. 260, Earnings Per Share.

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| **Numerator:** | | | | |
| Net income (loss) | $ (1,729) | $ 13,865 | $ 2,543 | $ 5,850 |
| **Denominator (in thousands):** | | | | |
| Basic weighted-average common stock outstanding | 22,091 | 21,687 | 21,997 | 21,946 |
| Effect of stock -based awards | | 793 | 431 | 737 |
| Diluted weighted average common stock outstanding | 22,091 | 22,480 | 22,428 | 22,683 |
| Basic net income (loss) per share | $ (0.08) | $ 0.64 | $ 0.12 | $ 0.27 |
| Diluted net income (loss) per share | $ (0.08 | $ 0.62 | $ 0.11 | $ 0.26 |

The weighted average number of shares related to outstanding equity-based awards excluded from the calculation of diluted net income per share, since their effect was anti-dilutive, was 136,113 shares for the three months ended September 30, 2018. The total number of shares related to the outstanding equity-based awards excluded from the calculation of diluted net loss per share was 1,273,610 for the nine months ended September 30, 2018. The weighted average number of shares related to outstanding equity-based awards excluded from the calculation of diluted net income per share, since their effect was anti-dilutive, was 0 and 39,856 shares for the three and nine months ended September 30, 2017, respectively.

**NOTE 9: COMMON STOCK AND STOCK-BASED COMPENSATION PLANS**

The Company grants stock options and stock appreciation rights ( SARs ) capped with a ceiling to employees and stock options to non-employee directors of the Company and its subsidiaries and provides the right to purchase common stock pursuant to the Company s 2002 employee stock purchase plan to employees of the Company and its subsidiaries. The SAR unit confers the holder the right to stock appreciation over a preset price of the Company s common stock during a specified period of time. When the unit is exercised, the appreciation amount is paid through the issuance of shares of the Company s common stock. The ceiling limits the maximum income for each SAR unit. SARs are considered an equity instrument as it is a net share settled award capped with a ceiling (400% for SAR grants). The options and SARs granted under the Company s stock incentive plans have been granted at the fair market value of the Company s common stock on the grant date. Options and SARs granted to employees under stock incentive plans vest at a rate of 25% of the shares underlying the option after one year and the remaining shares vest in equal portions over the following 36 months, such that all shares are vested after four years. Options granted to non-employee directors vest 25% of the shares underlying the option on each anniversary of the option grant. A summary of the Company s stock option and SARs activities and related information for the nine months ended September 30, 2018, are as follows:

| | Number of options and SAR units (1) | Weighted average exercise price | Weighted average remaining contractual term | Aggregate intrinsic-value |
|---|---|---|---|---|
| Outstanding as of December 31, 2017 | 729,017 | $ 19.77 | 5.2 | $ 19,229 |
| Granted | | | | |
| Exercised | (19,474) | 16.22 | | |
| Forfeited or expired | (2,128) | 20.50 | | |
| Outstanding as of September 30, 2018 (2) | 707,415 | $ 19.87 | 4.5 | $ 6,447 |
| Exercisable as of September 30, 2018 (3) | 610,731 | $ 18.96 | 4.2 | $ 6,089 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

(1) The SAR units are convertible for a maximum number of shares of the Company s common stock equal to 75% of the SAR units subject to the grant.

(2) Due to the ceiling imposed on the SAR grants, the outstanding amount equals a maximum of 645,874 shares of the Company s common stock issuable upon exercise.

(3) Due to the ceiling imposed on the SAR grants, the exercisable amount equals a maximum of 553,861 shares of the Company s common stock issuable upon exercise.

As of September 30, 2018, there was $224 of unrecognized compensation expense related to unvested stock options and SARs. This amount is expected to be recognized over a weighted-average period of 1.2 years.

Starting in the second quarter of 2015, the Company granted to employees, including executive officers, and non-employee directors, restricted stock units ( RSUs ) under the Company s 2011 Stock Incentive Plan. A RSU award is an agreement to issue shares of the Company s common stock at the time the award or a portion thereof vests. RSUs granted to employees generally vest in three equal annual installments starting on the first anniversary of the grant date. Until the end of 2017, RSUs granted to non-employee directors would generally vest in full on the first anniversary of the grant date. Starting in 2018, RSUs granted to non-employee directors would generally vest in two equal annual installments starting on the first anniversary of the grant date. The fair value of each RSU is the market value as determined by the closing price of the common stock on the day of grant. The Company recognizes compensation expenses for the value of its RSU awards, based on the straight-line method over the requisite service period of each of the awards. A summary of the Company s RSU activities and related information for the nine months ended September 30, 2018, are as follows:

| | Number of RSUs | Weighted Average Grant-Date Fair Value |
|---|---|---|
| Unvested as of December 31, 2017 | 560,616 | $ 29.31 |
| Granted | 304,496 | 34.83 |
| Vested | (268,052) | 27.73 |
| Forfeited or expired | (30,865) | 35.46 |
| Unvested as of September 30, 2018 | 566,195 | $ 32.70 |

As of September 30, 2018, there was $13,278 of unrecognized compensation expense related to unvested RSUs. This amount is expected to be recognized over a weighted-average period of 1.5 years.

The following table shows the total equity-based compensation expense included in the interim condensed consolidated statements of income:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 | 2017 | 2018 | 2017 |
| | (unaudited) | (unaudited) | (unaudited) | (unaudited) |
| Cost of revenue | $ 480 | $ 330 | $ 155 | $ 125 |
| Research and development, net | 3,874 | 2,834 | 1,246 | 991 |
| Sales and marketing | 1,246 | 1,040 | 369 | 381 |
| General and administrative | 2,483 | 2,142 | 697 | 722 |
| Total equity-based compensation expense | $ 8,083 | $ 6,346 | $ 2,467 | $ 2,219 |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

The fair value for rights to purchase shares of common stock under the Company s employee stock purchase plan was estimated on the date of grant using the following assumptions:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Expected dividend yield | 0% | 0% | 0% | 0% |
| Expected volatility | 35%-42% | 28%-46% | 38% | 28%-43% |
| Risk-free interest rate | 0.7%-2.2% | 0.5%-1.1% | 2.2% | 0.6%-1.1% |
| Contractual term of up to | 24 months | 24 months | 24 months | 24 months |

**NOTE 10: DERIVATIVES AND HEDGING ACTIVITIES**

The Company follows the requirements of FASB ASC No. 815, Derivatives and Hedging which requires companies to recognize all of their derivative instruments as either assets or liabilities in the statement of financial position at fair value. The accounting for changes in fair value (i.e., gains or losses) of a derivative instrument depends on whether it has been designated and qualifies as part of a hedging transaction and further, on the type of hedging transaction. For those derivative instruments that are designated and qualify as hedging instruments, a company must designate the hedging instrument, based upon the exposure being hedged, as a fair value hedge, cash flow hedge, or a hedge of a net investment in a foreign operation. Due to the Company s global operations, it is exposed to foreign currency exchange rate fluctuations in the normal course of its business. The Company s treasury policy allows it to offset the risks associated with the effects of certain foreign currency exposures through the purchase of foreign exchange forward or option contracts ( Hedging Contracts ). The policy, however, prohibits the Company from speculating on such Hedging Contracts for profit. To protect against the increase in value of forecasted foreign currency cash flow resulting from salaries paid in currencies other than the U.S. dollar during the year, the Company instituted a foreign currency cash flow hedging program. The Company hedges portions of the anticipated payroll of its non-U.S. employees denominated in the currencies other than the U.S. dollar for a period of one to twelve months with Hedging Contracts. Accordingly, when the dollar strengthens against the foreign currencies, the decline in present value of future foreign currency expenses is offset by losses in the fair value of the Hedging Contracts. Conversely, when the dollar weakens, the increase in the present value of future foreign currency expenses is offset by gains in the fair value of the Hedging Contracts. These Hedging Contracts are designated as cash flow hedges.

For derivative instruments that are designated and qualify as a cash flow hedge (i.e., hedging the exposure to variability in expected future cash flows that is attributable to a particular risk), the effective portion of the gain or loss on the derivative instrument is reported as a component of other comprehensive income (loss) and reclassified into earnings in the same period or periods during which the hedged transaction affects earnings. Any gain or loss on a derivative instrument in excess of the cumulative change in the present value of future cash flows of the hedged item is recognized in current earnings during the period of change. As of September 30, 2018 and December 31, 2017, the notional principal amount of the Hedging Contracts to sell U.S. dollars held by the Company was $4,250 and $0, respectively.

The fair value of the Company s outstanding derivative instruments is as follows:

| | September 30, 2018 (Unaudited) | | December 31, 2017 (Audited) | |
|---|---|---|---|---|
| **Derivative assets:** | | | | |
| Derivatives designated as cash flow hedging instruments: | | | | |
| Foreign exchange forward contracts | $ | 11 | $ | |
| Total | $ | 11 | $ | |
| **Derivative liabilities:** | | | | |
| Derivatives designated as cash flow hedging instruments: | | | | |
| Foreign exchange option contracts | $ | 11 | $ | |
| Total | $ | 11 | $ | |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

The increase (decrease) in unrealized gains (losses) recognized in accumulated other comprehensive loss on derivatives, before tax effect, is as follows:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Derivatives designated as cash flow hedging instruments: | | | | |
| Foreign exchange option contracts | $ (128) | $ 88 | $ (2) | $ 1 |
| Foreign exchange forward contracts | (131) | 92 | 23 | (3) |
| | $ (259) | $ 180 | $ 21 | $ (2) |

The net (gains) losses reclassified from accumulated other comprehensive loss into income are as follows:

| | Nine months ended September 30, | | Three months ended September 30, | |
|---|---|---|---|---|
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) |
| Derivatives designated as cash flow hedging instruments: | | | | |
| Foreign exchange option contracts | $ 117 | $ (88) | $ 20 | $ (1) |
| Foreign exchange forward contracts | 142 | (98) | 43 | 3 |
| | $ 259 | $ (186) | $ 63 | $ 2 |

The Company recorded in cost of revenues and operating expenses a net loss of $63 and $259 during the three and nine months ended September 30, 2018, respectively, and a net loss of $2 and a net gain of $186 for the comparable periods of 2017, related to its Hedging Contracts.

**NOTE 11: ACCUMULATED OTHER COMPREHENSIVE INCOME (LOSS)**

The following tables summarize the changes in accumulated balances of other comprehensive income (loss), net of taxes:

| | Nine months ended September 30, 2018 (unaudited) | | | Three months ended September 30, 2018 (unaudited) | | |
|---|---|---|---|---|---|---|
| | Unrealized gains (losses) on available-for-sale marketable securities | Unrealized gains (losses) on cash flow hedges | Total | Unrealized gains (losses) on available-for-sale marketable securities | Unrealized gains (losses) on cash flow hedges | Total |
| Beginning balance | $ (586) | $ | $ (586) | $ (1,342) | $ (75) | $ (1,417) |
| Other comprehensive income (loss) before reclassifications | (726) | (232) | (958) | 28 | 18 | 46 |
| Amounts reclassified from accumulated other comprehensive income (loss) | 28 | 232 | 260 | 30 | 57 | 87 |
| Net current period other comprehensive income (loss) | (698) | | (698) | 58 | 75 | 133 |
| Ending balance | $ (1,284) | $ | $ (1,284) | $ (1,284) | $ | $ (1,284) |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

| | Nine months ended September 30, 2017 (unaudited) | | | Three months ended September 30, 2017 (unaudited) | | |
|---|---|---|---|---|---|---|
| | Unrealized gains (losses) on available-for-sale marketable securities | Unrealized gains (losses) on cash flow hedges | Total | Unrealized gains (losses) on available-for-sale marketable securities | Unrealized gains (losses) on cash flow hedges | Total |
| Beginning balance | $ (502) | $ 5 | $ (497) | $ (278) | $ | $ (278) |
| Other comprehensive income (loss) before reclassifications | 277 | 161 | 438 | 82 | (3) | 79 |
| Amounts reclassified from accumulated other comprehensive income (loss) | 24 | (166) | (142) | (5) | 3 | (2) |
| Net current period other comprehensive income (loss) | 301 | (5) | 296 | 77 | | 77 |
| Ending balance | $ (201) | $ | $ (201) | $ (201) | $ | $ (201) |

The following table provides details about reclassifications out of accumulated other comprehensive income (loss):

| Details about Accumulated Other Comprehensive Income (Loss) Components | Amount Reclassified from Accumulated Other Comprehensive Income (Loss) | | | | Affected Line Item in the Statements of Income |
|---|---|---|---|---|---|
| | Nine months ended September 30, | | Three months ended September 30, | | |
| | 2018 (unaudited) | 2017 (unaudited) | 2018 (unaudited) | 2017 (unaudited) | |
| Unrealized gains (losses) on cash flow hedges | $ (5) | $ 4 | $ (1) | $ | Cost of revenues |
| | (225) | 160 | (55) | (2) | Research and development |
| | (10) | 10 | (3) | | Sales and marketing |
| | (19) | 12 | (4) | | General and administrative |
| | (259) | 186 | (63) | (2) | Total, before income taxes |

| | | | | | |
|---|---|---|---|---|---|
| | (27) | 20 | (6) | 1 | Income tax expense (benefit) |
| | (232) | 166 | (57) | (3) | Total, net of income taxes |
| Unrealized gains (losses) on available-for-sale marketable securities | (30) | (33) | (32) | 7 | Financial income (loss), net |
| | (2) | (9) | (2) | 2 | Income tax benefit |
| | (28) | (24) | (30) | 5 | Total, net of income taxes |
| | $ (260) | $ 142 | $ (87) | $ 2 | Total, net of income taxes |

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**NOTES TO THE INTERIM CONDENSED CONSOLIDATED FINANCIAL STATEMENTS - CONTINUED**

**(in thousands, except share data)**

**NOTE 12: SHARE REPURCHASE PROGRAM**

In May 2018, the Company s Board of Directors authorized the repurchase by the Company of an additional 700,000 shares of common stock pursuant to Rule 10b-18 of the Exchange Act.

During the third quarter of 2018, the Company repurchased 216,156 shares of common stock at an average purchase price of $29.18 per share for an aggregate purchase price of $6,308. During the first nine months ended September 30, 2018, the Company repurchased 527,212 shares of common stock at an average purchase price of $31.76 per share for an aggregate purchase price of $16,742. The Company did not repurchase any shares of its common stock during the third quarter and first nine months of 2017. As of September 30, 2018, 483,844 shares of common stock remained available for repurchase pursuant to the Company s share repurchase program.

The repurchases of common stock are accounted for as treasury stock, and result in a reduction of stockholders equity. When treasury shares are reissued, the Company accounts for the reissuance in accordance with FASB ASC No. 505-30, Treasury Stock and charges the excess of the repurchase cost over issuance price using the weighted average method to retained earnings. The purchase cost is calculated based on the specific identified method. In the case where the repurchase cost over issuance price using the weighted average method is lower than the issuance price, the Company credits the difference to additional paid-in capital.

**NOTE 13: IMPACT OF RECENTLY ISSUED ACCOUNTING STANDARDS NOT YET ADOPTED**

In January 2016, the FASB issued ASU 2016-13, Financial Instruments Credit Losses on Financial Instruments, which requires that expected credit losses relating to financial assets measured on an amortized cost basis and available-for-sale debt securities be recorded through an allowance for credit losses. ASU 2016-13 limits the amount of credit losses to be recognized for available-for-sale debt securities to the amount by which carrying value exceeds fair value and also requires the reversal of previously recognized credit losses if fair value increases. The new standard will be effective for interim and annual periods beginning after January 1, 2020, and early adoption is permitted. The Company is currently evaluating whether to early adopt this standard and the potential effect of such adoption on its consolidated financial statements.

In February 2016, the FASB issued ASU 2016-02, Leases (Topic 842), which will replace the existing guidance in ASC 840, Leases. The updated standard aims to increase transparency and comparability among organizations by requiring lessees to recognize lease assets and lease liabilities on the balance sheet and requiring disclosure of key information about leasing arrangements. This ASU is effective for annual periods beginning after December 15, 2018, and interim periods within those annual periods. The provisions of ASU 2016-02 are to be applied using a modified retrospective approach. In July 2018, the FASB issued ASU No. 2018-11, Targeted Improvements Leases (Topic 842). This update provides an optional transition method that allows entities to elect to apply the standard prospectively at its effective date, versus recasting the prior periods presented. If elected, an entity would recognize a cumulative-effect adjustment to the opening balance of retained earnings in the period of adoption. The Company is in the process of evaluating this guidance to determine the impact the adoption will have on its financial statements and related disclosures.

In August 2017, the FASB issued ASU 2017-12, Derivatives and Hedging (Topic 815) Targeted Improvements to Accounting for Hedging Activities ( ASU 2017-12 ), which improves the financial reporting of hedging relationships to better portray the economic results of an entity s risk management activities in its financial statements and makes certain targeted improvements to simplify the qualification and application of the hedge accounting compared to current GAAP. This update is effective for fiscal years beginning after December 15, 2018, with early adoption permitted. The Company is currently evaluating the impact of the adoption of ASU 2017-12 on its consolidated financial statements.

In January 2018, the FASB released guidance on the accounting for tax on the global intangible low-taxed income ( GILTI ) provisions of the Tax Cuts and Jobs Act ( TCJA ). The GILTI provisions impose a tax on foreign income in excess of a deemed return on tangible assets of foreign corporations. The guidance indicates that either (i) accounting for deferred taxes related to GILTI inclusions, or (ii) treating any taxes on GILTI inclusions as period cost, are both acceptable methods subject to an accounting policy election. In accordance with SEC Staff Accounting Bulletin No. 118, and as the Company is not yet able to reasonably estimate the effect of the GILTI tax, as described in note 12 of the Company s 2017 consolidated financial statements included in the Annual Report on Form 10-K for fiscal year 2017, the Company has not yet adopted an accounting policy with respect to the GILTI tax.

Effective no later than January 1, 2019, the Company will adopt the accounting standards update that allows for reclassification from accumulated other comprehensive income to retained earnings for stranded tax effects resulting from the TCJA. The update, which permits early adoption, is effective for annual reporting periods beginning after December 15, 2018, including interim periods within those annual periods. The Company continues to evaluate the requirements and does not expect the adoption to have a material effect on its condensed consolidated statements of financial position, operations and cash flows and on the disclosures contained in the notes to condensed consolidated financial statements.

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## Item 2. MANAGEMENT S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

*You should read the following discussion together with the unaudited financial statements and related notes appearing elsewhere in this quarterly report. This discussion contains forward-looking statements that involve risks and uncertainties. Any or all of our forward-looking statements in this quarterly report may turn out to be wrong. These forward-looking statements can be affected by inaccurate assumptions we might make or by known or unknown risks and uncertainties. We undertake no obligation to publicly update any forward-looking statements, whether as a result of new information, future events or otherwise. Factors which could cause actual results to differ materially include those set forth under in Part II Item 1A Risk Factors, as well as those discussed elsewhere in this quarterly report. See Forward-Looking Statements.*

### BUSINESS OVERVIEW

The financial information presented in this quarterly report includes the results of CEVA, Inc. and its subsidiaries.

Headquartered in Mountain View, California, CEVA is a leading licensor of signal processing platforms and a primary player in artificial intelligence (AI) processors for a smarter, connected world. We partner with semiconductor companies and OEMs worldwide to create power-efficient, intelligent and connected devices for a range of end markets, including mobile, consumer, automotive, industrial and Internet of Things (IoT).

Our ultra-low-power hardware and software IPs address many of the most complex technologies for imaging and computer vision, neural networks, sound and long- and short-range wireless. Our portfolio includes comprehensive platforms for 5G baseband processing in handsets and base station RAN, highly integrated cellular IoT solutions, DSP and voice input algorithms and software for voice-enabled devices, advanced imaging and computer vision DSP platforms for any camera-enabled device, and a family of self-contained AI processors that address a wide range of applications. For short-range wireless, we offer the industry s most widely adopted IPs for Bluetooth (low energy and dual mode) and Wi-Fi (Wi-Fi 4 (802.11n), Wi-Fi 5 (802.11ac) and Wi-Fi 6 (802.11ax) up to 4x4).

Our technologies are licensed to leading semiconductor and original equipment manufacturer (OEM) companies throughout the world. These companies incorporate our IP into application-specific integrated circuits ( ASICs ) and application-specific standard products ( ASSPs ) that they manufacture, market and sell to wireless, consumer, automotive and IoT companies. We believe that our licensing business is progressing well with strong interest, diverse customer base and a myriad of target markets. Our state-of-the-art technology has shipped in more than 9 billion chips to date for a wide range of diverse end markets. One in three to four handsets sold worldwide is powered by CEVA.

Our signal processing platforms power many of the world s leading handset OEMs, including a tier-one U.S. brand, ASUS, Coolpad, HTC, Intex, Jio, Karbonn, Lava, Lenovo, LG, Meitu, Meizu, Micromax, OPPO, Samsung, Vivo, Xiaomi and hundreds of local handset manufacturers in China and India.

Moreover, we believe the adoption of our signal processing platforms and AI processors beyond cellular baseband market continues to progress. As a testament to this trend, during the third quarter of 2018, we concluded 13 licensing deals, all of which are for non-cellular baseband applications, nine of which are for our short range wireless IPs targeting the vast IoT market. Moreover, based on shipment data or our best estimates of the shipment data for the third quarter of 2018, shipments of CEVA-powered non-cellular baseband products reached an all-time quarterly record of 98 million units. This is indicative of the continued traction our non-baseband customers are gaining with our signal processing IPs.

We believe the following key elements represent significant growth drivers for the company:

CEVA is firmly established in the largest space in the semiconductor industry baseband for mobile handsets. In particular, in LTE smartphone markets, we continue to maintain a strong presence and during the third quarter of 2018, our customers shipped approximately 79 million LTE units, up 25% sequentially. This growth was primarily driven by the wide adoption of our advanced DSPs at the world s most successful smartphone OEM in its new flagship models.

The royalty we derive from high end smartphones is higher on average than that of mid and low tier smartphones due to more DSP content in high end premier smartphones that bear a higher royalty ASP. As a result, in the third quarter of 2018, we benefitted from an ASP uplift in LTE-based modems due to the wide adoption of our technology in a series of high end flagship smartphones that were launched. Looking ahead, our CEVA-PentaG state-of-the-art 5G platform for mobile broadband puts us in a strong position to power 5G modems for handsets, fixed wireless and other UE use cases. Incorporating a range of DSPs and processors, including an AI processor dedicated to improving 5G processing efficiency, we believe our CEVA-PentaG is the most advanced cellular baseband IP in the industry today.

Our specialization and competitive edge in signal processing platforms for next generation long and short range wireless such as 5G, NB-IoT, Wi-Fi 5 (802.11ac) and Wi-Fi 6 (802.11ax) technologies, and the inherent low cost, power and performance balance of our designs, put us in a strong position to simultaneously capitalize on mass market adoption of such technologies and address multiple markets and product sectors, including handsets, fixed wireless access, macro base stations, remote radio heads, cellular backhaul, small cells, Wi-Fi routers and a variety of machine type communications such as connected cars, smart cities and industrial markets.

Together with our presence in the handset baseband market, our Bluetooth and Wi-Fi IPs allow us to expand further into IoT applications and substantially increase our overall addressable market. Our addressable market size is expected to be 35 billion devices by 2020, per data from ABI Research. Already, shipments of products incorporating our Bluetooth IP are sizeable, with more than 212 million CEVA-powered Bluetooth chips shipped in the first nine months of 2018, more than the amount that was shipped for the full year 2017.

The growing market potential for voice assisted devices, as voice is becoming a primary user interface for IoT applications, including mobile, automotive and consumer devices, offers an additional growth segment for the company in voice-enabled devices such as smartphones, headsets, earbuds, smart speakers, smart home and automotive. To better address this market, we recently introduced CEVA-ClearVox, a new voice input software and algorithm, that is offered in conjunction with our audio/voice DSPs. CEVA-ClearVox, plus our proven track record in audio/voice processing with more than 6 billion audio chips shipped to date, put us in a strong position to power audio and voice roadmaps across this new range of addressable end markets.

Our CEVA-XM4 and CEVA-XM6 imaging and vision platforms and deep learning capabilities provide highly compelling offerings for any camera-enabled device such as smartphones, tablets, automotive safety (ADAS), autonomous driving (AD), drones, robotics, security and surveillance, augmented reality (AR) and virtual reality (VR), drones, and signage. Per ABI Research, camera shipments are expected to exceed 2.7 billion units by 2018. We have already signed more than 50 licensing agreements for our imaging and vision DSPs across those markets, where our customers can add camera-related enhancements such as smarter autofocus, better picture using super resolution algorithms, and better image capture in low-light environments. Other customers can add video analytics support to enable new services like augmented reality, gesture recognition and advanced safety capabilities in cars. This transformation in vision processing and neural net software are opportunities for us to expand our footprint and content in smartphones, drones, consumer cameras, surveillance, automotive ADAS and industrial IoT applications.

Beyond vision, neural networks are increasingly being deployed for a wide range of markets in order to make devices smarter. These markets include IoT, smartphones, surveillance, automotive, robotics, medical and industrial. To address this significant and lucrative opportunity, we recently announced CEVA-NeuPro a family of AI processors for deep learning at the edge. These self-contained AI processors are the first non-DSP processors ever developed by CEVA and bring the power of deep learning to the device, without relying on connectivity to the cloud. We believe this market opportunity for AI at the edge is on top of our existing product lines and represents new licensing and royalty drivers for the company in the coming years. During the first nine months of 2018, we signed three leading customers for our CEVA-NeuPro AI processors targeting the ADAS, surveillance, and consumer camera markets.

As a result of our diversification strategy beyond baseband for handsets and our progress in addressing those new markets under the IoT umbrella, we expect significant growth in royalty revenues derived from non-handset baseband applications over the next few years due to a combination of higher unit shipments of Bluetooth and other connectivity products that bear lower ASPs, along with higher ASPs driven by base station and vision products.

Notwithstanding the various growth opportunities we have outlined above, our business operates in a highly competitive and cyclical environment. The maintenance of our competitive position and our future growth are dependent on our ability to adapt to ever-changing technologies, short product life cycles, evolving industry standards, changing customer needs and the trend towards IoT, handset baseband, connectivity, and voice, audio and video convergence in the markets that we operate. Also, our business relies significantly on revenues derived from a limited number of customers. The discontinuation of product lines or market sectors that incorporate our technology by our significant customers or a change in direction of their business and our inability to adapt our technology to their new business needs could have material negative implications for our future royalty revenues. Moreover, competition has historically increased pricing pressures for our products and decreased our average selling prices. Royalty payments under our existing license agreements also could be lower than currently anticipated for a variety of reasons, including decreased royalty rates triggered by larger volume shipments, lower royalty rates negotiated with customers due to competitive pressure or consolidation among our customers. Some of our competitors have reduced their licensing and royalty fees to attract customers and expand their market share. In order to penetrate new markets and maintain our market share with our existing products, we may need to offer our products in the future at lower prices which may result in lower profits. In addition, our future growth is dependent not only on the continued success of our existing products but also the successful introduction of new products, which requires the dedication of resources into research and development which in turn may increase our operating expenses. Furthermore, since our products are incorporated into end products of our OEM and semiconductor customers, our business is very dependent on their ability to achieve market acceptance of their end products in the handset and consumer electronic markets, which are similarly very competitive. In addition, macroeconomic trends may significantly affect our operating results. For example, consolidation among our customers may negatively affect our revenue source, increase our existing customers negotiation leverage and make us more dependent on a limited number of customers. Also, since we continue to derive a significant portion of our revenues from the handset baseband market, any negative trends in that market would adversely affect our financial results.

Moreover, the semiconductor and consumer electronics industries remain volatile, which makes it extremely difficult for our customers and us to accurately forecast financial results and plan for future business activities. Our license arrangements have not historically provided for substantial ongoing license payments so revenue recognized from licensing arrangements vary significantly from period to period, depending on the number and size of deals closed during a quarter, and is difficult to predict. Moreover, our royalty revenues are based on the sales of products incorporating semiconductor or other products of our customers, and as a result we do not have direct access to information that will help us anticipate the timing and amount of future royalties. We have very little visibility into the timetable of product shipments incorporating our technology by our customers. As a result, our past operating results should not be relied upon as an indication of future results.

**RESULTS OF OPERATIONS**

*Total Revenues*

Total revenues were $21.4 and $56.5 million for the third quarter and first nine months of 2018, respectively, representing a decrease of 11% and 14%, respectively, as compared to the corresponding periods in 2017. For the third quarter of 2018, the decrease is due to lower licensing and related revenue in comparison to unusually high revenue levels reached in the third quarter of 2017. For the first nine months of 2018, the decrease is due to the reasons explained below for decreases in both licensing and related revenue and royalty revenue.

Five largest customers accounted for 64% and 53% of our total revenues for the third quarter and first nine months of 2018, respectively, as compared to 75% and 59% for the comparable periods in 2017. Two customers accounted for 26% and 16% of our total revenues for the third quarter of 2018, as compared to four customers that accounted for 21%, 20%, 18% and 12% of our total revenues for the third quarter of 2017. Three customers accounted for 16%, 16% and 12% of our total revenues for the first nine months of 2018, as compared to two customers that accounted for 22% and 17% of our total revenues for the first nine months of 2017. Sales to Spreadtrum represented 16% of our total revenues for both the third quarter and first nine months of 2018, as compared to 20% and 22% for the comparable period in 2017. Generally, the identity of our other customers representing 10% or more of our total revenues varies from period to period, especially with respect to our licensing customers as we generate licensing revenues generally from new customers on a quarterly basis. With respect to our royalty revenues, three royalty paying customers each represented 10% or more of our total royalty revenues for both the third quarter and first nine months of 2018, and collectively represented 80% and 77% of our total royalty revenues for the third quarter and first nine months of 2018, respectively. Two royalty paying customers each represented 10% or more of our total royalty revenues for both the third quarter and first nine months of 2017, and collectively represented 68% and 74% of our total royalty revenues for the third quarter and first nine months of 2017, respectively. We expect that a significant portion of our future revenues will continue to be generated by a limited number of customers. The concentration of our customers is explainable in part by consolidation in the semiconductor industry.

The following table sets forth the products and services as percentages of our total revenues for each of the periods set forth below:

| | Nine months 2018 | Nine months 2017 | Third Quarter 2018 | Third Quarter 2017 |
|---|---|---|---|---|
| DSP products (DSP cores and platforms): | | | | |
| Baseband for handset and other devices | 58% | 63% | 62% | 73% |
| Other non-baseband (AI, audio/sound, imaging and vision) | 17% | 24% | 9% | 16% |
| Connectivity products (Bluetooth, WiFi and SATA/SAS) | 25% | 13% | 29% | 11% |

We expect to continue to generate a significant portion of our revenues for 2018 from the above products and services.

*Licensing and Related Revenues*

Licensing and related revenues were $9.8 million and $29.9 million for the third quarter and first nine months of 2018, respectively, representing a decrease of 30% and 12%, respectively, as compared to the corresponding periods in 2017, primarily resulting from a decrease in the base station related licensing deals due to the timing and introduction of newer industry standards, as well as a decrease in our vision portfolio licensing deals. The decrease was offset by higher licensing and related revenue we generated for our short range connectivity and cellular technologies with more adoption of the newer BT5 standard, especially revenues associated within the IoT market for both periods, as well as higher revenues from our traditional handset baseband market for the first nine months of 2018.

Licensing and related revenues accounted for 46% and 53% of our total revenues for the third quarter and first nine months of 2018, respectively, as compared to 58% and 51% for the comparable periods of 2017. Overall, we perceive a healthy demand for our products in the third quarter and first nine months of 2018. During the third quarter of 2018, we concluded thirteen new licensing deals. Four of the agreements were for CEVA DSP cores and platforms, and nine were for CEVA connectivity IPs. All of the agreements were for non-handset baseband applications and four were with first-time customers of CEVA. Customers target markets for the licenses include ADAS, consumer and industrial IoT connectivity, and wireless audio. Geographically, nine of the deals signed were in China, one was in the U.S. and three were in the APAC region, including Japan. Our licensing business is progressing well with a solid pipeline, diverse customer base and target markets.

*Royalty Revenues*

Royalty revenues were $11.6 million and $26.6 million for the third quarter and first nine months of 2018, respectively, representing an increase of 16% and a decrease of 17%, respectively, as compared to the corresponding periods in 2017. Royalty revenues accounted for 54% and 47% of our total revenues for the third quarter and first nine months of 2018, respectively, as compared to 42% and 49% for the comparable periods of 2017. Our third quarter 2018 royalty revenue came in significantly higher than the first two quarters of the year. The decrease in royalty revenue for the first nine months of 2018 compared to 2017 is mainly due to weakness of one of our large Chinese handset baseband customer in the lower tier smartphone segment partially offset by higher non-handset baseband royalty revenue growth. The wide deployment of our advanced DSP technologies within the latest generation of the world s most successful smartphone, and the continued growth of shipments from our non-handset baseband customers were the main catalysts for the 56% sequential royalty revenue growth. Under ASC Topic 606, *Revenue from Contracts with Customers*, our royalty revenue represents actual or best estimates of customer shipments during the third quarter and first nine months of 2018. Revenues for the third quarter and first nine months of 2017 were reported under ASC Topic 605, the old revenue recognition standard, where royalty revenue was reported one quarter in arrears. Under ASC Topic 605, our third quarter and first nine months of 2018 royalty revenue was $7.3 million and $24.9 million, respectively, representing a decrease of 27% and 22%, respectively, as compared to the corresponding periods in 2017. The decrease in royalty revenues as determined under ASC 605 for the comparable periods was mainly due to greater than anticipated weakness of one of our large Chinese handset baseband customer in the lower tier smartphone segment.

Our customers reported sales of 263 million and 681 million chipsets incorporating our technologies for the third quarter and first nine months of 2018, respectively, a decrease of 8% and 15%, respectively, from the corresponding periods in 2017 for actual shipments reported. The decrease for both the third quarter and first nine months of 2018 is mainly due to a stronger than anticipated weakness of one of our large Chinese handset baseband customer in the lower tier smartphone segment, partially offset by the adoption of our technologies in the latest generation of the world s most successful smartphone, and from continued growth in shipments and revenue from our non-handset baseband customers, increasing 22% over third quarter 2017 actual shipments and reaching a new all-time record high of 98 million devices.

The five largest royalty-paying customers accounted for 91% and 87% of our total royalty revenues for the third quarter and first nine months of 2018, respectively, as compared to 87% and 89% for the comparable periods of 2017.

*Geographic Revenue Analysis*

| | Nine months 2018 | | Nine months 2017 | | Third Quarter 2018 | | Third Quarter 2017 | |
|---|---|---|---|---|---|---|---|---|
| | (in millions, except percentages) | | | | | | | |
| United States | $ 6.1 | 11% | $ 6.1 | 10% | $ 2.3 | 10% | $ 1.2 | 5% |
| Europe and Middle East (1) | $ 11.3 | 20% | $ 7.5 | 11% | $ 6.1 | 29% | $ 1.3 | 5% |
| Asia Pacific (2) (3) (4) | $ 39.1 | 69% | $ 52.3 | 79% | $ 13.0 | 61% | $ 21.5 | 90% |
| (1) Germany | $ 8.6 | 15% | *) | *) | $ 5.6 | 26% | *) | *) |
| (2) China | $ 23.1 | 41% | $ 31.0 | 47% | $ 10.2 | 48% | $ 15.2 | 63% |
| (3) S. Korea | $ 7.2 | 13% | $ 13.9 | 21% | *) | *) | $ 5.1 | 21% |
| (4) Japan | $ 6.1 | 11% | *) | *) | *) | *) | *) | *) |

*) Less than 10%.

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Due to the nature of our license agreements and the associated potential large individual contract amounts, the geographic split of revenues both in absolute dollars and percentage terms generally varies from quarter to quarter.

*Cost of Revenues*

Cost of revenues was $2.0 million and $6.0 million for the third quarter and first nine months of 2018, respectively, as compared to $1.7 million and $5.0 million for the comparable periods of 2017. Cost of revenues accounted for 9% and 11% of our total revenues for the third quarter and first nine months of 2018, respectively, as compared to 7% and 8% for the comparable periods of 2017. The increase for the third quarter of 2018 principally reflected higher salary and related costs, and third party IP costs (associated with the NB-IoT product line), partially offset by lower payments to the Israeli Innovation Authority of the Ministry of Economy and Industry in Israel (the IIA ). The increase for the first nine months of 2018 principally reflected higher salary and related costs, higher third party IP costs (associated with the NB-IoT product line) and the amortization of intangible assets related to the purchase of a license of NB-IoT technologies in the first quarter of 2018, partially offset by lower payments to the IIA. Included in cost of revenues for the third quarter and first nine months of 2018 was a non-cash equity-based compensation expense of $155,000 and $480,000, respectively, as compared to $125,000 and $330,000 for the comparable periods of 2017.

*Gross Margin*

Gross margin for the third quarter and first nine months of 2018 was 91% and 89%, respectively, as compared to 93% and 92% for the comparable periods of 2017. The decrease for both the third quarter and first nine months of 2018 mainly reflected lower revenues.

*Operating Expenses*

Total operating expenses were $17.3 million and $53.9 million for the third quarter and first nine months of 2018, respectively, as compared to $16.1 million and $48.2 million for the comparable periods of 2017. The net increase in total operating expenses for the third quarter of 2018 principally reflected lower research grants received from the IIA. The net increase in total operating expenses for the first nine months of 2018 principally reflected higher salary and employee related costs, mainly due to higher headcount and non-cash equity-based compensation expenses.

*Research and Development Expenses, Net*

Our research and development expenses, net, were $11.9 million and $35.8 million for the third quarter and first nine months of 2018, respectively, as compared to $10.0 million and $30.4 million for the comparable periods of 2017. The net increase for the third quarter of 2018 principally reflected lower research grants received from the IIA. The net increase for the first nine months of 2018 principally reflected higher salary and employee related costs, mainly due to higher headcount and non-cash equity-based compensation expenses. Included in research and development expenses for the third quarter and first nine months of 2018 were non-cash equity-based compensation expenses of $1,246,000 and $3,874,000, respectively, as compared to $991,000 and $2,834,000 for the comparable periods of 2017. Research and development expenses as a percentage of our total revenues were 56% and 63% for the third quarter and first nine months of 2018, as compared to 42% and 46% for the comparable periods of 2017. The percentage increase for the comparable periods in 2018 as compared to 2017 is due to the same reasons as set forth above for the increase in research and development expenses in absolute dollars for the comparable periods of 2018 and 2017, and due to lower total revenues for the comparable periods in 2018 as compared to 2017.

The number of research and development personnel was 240 at September 30, 2018, compared to 224 at September 30, 2017.

*Sales and Marketing Expenses*

Our sales and marketing expenses were $2.7 million and $9.3 million for the third quarter and first nine months of 2018, respectively, as compared to $3.1 million and $9.4 million for the comparable periods of 2017. The decrease for the third quarter of 2018 primarily reflected lower salary and employee related costs. The decrease for the first nine months of 2018 primarily reflected lower salary and employee related costs, partially offset by higher non-cash equity-based compensation expenses. Included in sales and marketing expenses for the third quarter and first nine months of 2018 were non-cash equity-based compensation expenses of $369,000 and $1,246,000, respectively, as compared to $381,000 and $1,040,000 for the comparable periods of 2017. Sales and marketing expenses as a percentage of our total revenues were 13% and 16% for the third quarter and first nine months of 2018, respectively, as compared to 13% and 14% for the comparable periods of 2017. The percentage increase for the first nine months of 2018 mainly reflected lower total revenues.

The total number of sales and marketing personnel was 33 at September 30, 2018, as compared to 34 at September 30, 2017.

*General and Administrative Expenses*

Our general and administrative expenses were $2.4 million and $8.2 million for the third quarter and first nine months of 2018, respectively, as compared to $2.7 million and $7.4 million for the comparable periods of 2017. The decrease for the third quarter of 2018 primarily reflected lower professional service fees. The increase for the first nine months of 2018 principally reflected higher salary and related employee costs, mainly due to salary raise, and higher non-cash equity-based compensation expenses, partially offset by lower professional service fees. Included in general and administrative expenses for the third quarter and first nine months of 2018 were non-cash equity-based compensation expenses of $697,000 and $2,483,000, respectively, as compared to $722,000 and $2,142,000 for the comparable periods of 2017. General and administrative expenses as a percentage of our total revenues were 11% and 15% for the third quarter and first nine months of 2018, respectively, as compared to 11% for both comparable periods of 2017. The percentage increase for the first nine months of 2018 is due to the same reasons as set forth above for the increase in general and administrative expenses in absolute dollars, and due to lower total revenues for the comparable period in 2018 as compared to 2017.

The number of general and administrative personnel was 30 at September 30, 2018, as compared to 26 at September 30, 2017.

*Amortization of intangible assets*

Our amortization charges were $0.2 million and $0.7 million for the third quarter and first nine months of 2018, respectively, as compared to $0.3 million and $0.9 million for the comparable periods of 2017. The charges were incurred in connection with the amortization of intangible assets associated with the acquisition of RivieraWaves in July 2014. As of September 30, 2018, the net amount of intangible assets related to the acquisition of RivieraWaves was $1.0 million.

*Financial Income, Net (in millions)*

| | Nine months 2018 | Nine months 2017 | Third Quarter 2018 | Third Quarter 2017 |
|---|---|---|---|---|
| **Financial income, net** | $ 2.53 | $ 2.15 | $ 0.83 | $ 0.82 |
| *of which:* | | | | |
| Interest income and gains and losses from marketable securities, net | $ 2.73 | $ 2.20 | $ 0.92 | $ 0.79 |
| Foreign exchange income (loss) | $ (0.20) | $ (0.05) | $ (0.09) | $ 0.03 |

Financial income, net, consists of interest earned on investments, gains and losses from sale of marketable securities, accretion (amortization) of discounts (premiums) on marketable securities and foreign exchange movements.

The increase in interest income and gains and losses from marketable securities, net, during the third quarter of 2018 principally reflected higher yields, offset by lower combined cash, bank deposits and marketable securities balances held. The increase in interest income and gains, and losses from marketable securities, net, during the first nine months of 2018 principally reflected higher combined cash, bank deposits and marketable securities balances held and higher yields.

We review our monthly expected major non-U.S. dollar denominated expenditures and look to hold equivalent non-U.S. dollar cash balances to mitigate currency fluctuations. This has resulted in a foreign exchange loss of

$0.09 million and $0.20 million for the third quarter and first nine months of 2018, respectively, as compared to foreign exchange gain of $0.03 million and a foreign exchange loss of $0.05 million for the comparable periods of 2017.

*Provision for Income Taxes*

Our income tax expenses were $0.4 million and $0.8 million for the third quarter and first nine months of 2018, respectively, as compared to $1.2 million and $1.0 million for the comparable periods of 2017. The decrease for the third quarter of 2018 primarily reflected lower income before taxes on income. The decrease for the first nine months of 2018 primarily reflected lower income before taxes on income, offset by a tax benefit of $1.8 million recorded in the first nine months of 2017 due to the release of a tax provision as a result of the completion of a tax audit in a certain foreign tax jurisdiction. Currently, our Israeli and Irish subsidiaries are taxed at rates substantially lower than U.S. tax rates.

Our Irish subsidiary qualified for a 12.5% tax rate on its trade. Interest income generated by our Irish subsidiary is taxed at a rate of 25%. Our French subsidiary qualified for a 33.3% tax rate on its profits.

Our Israeli subsidiary is entitled to various tax benefits by virtue of the Approved Enterprise and/or Benefited Enterprise status granted to its eight investment programs, as defined by the Israeli Investment Law. In accordance with the Investment Law, our Israeli subsidiary s first seven investment programs were subject to corporate tax rate of 23% for the first nine months of 2018, and our Israeli subsidiary s eighth investment program was subject to corporate tax rate of 10% for the first nine months of 2018. However, our Israeli subsidiary is eligible for the erosion of tax basis with respect to its first seven investment programs, and this resulted in an increase in the taxable income attributable to the eighth investment program, which was subject to a reduced tax rate of 10% for the first nine months of 2018. The tax benefits under our Israeli subsidiary s active investment programs are scheduled to gradually expire starting in 2020.

To maintain our Israeli subsidiary s eligibility for the above tax benefits, it must continue to meet certain conditions under the Investment Law. Should our Israeli subsidiary fail to meet such conditions in the future, these benefits would be cancelled and it would be subject to corporate tax in Israel at the standard corporate rate and could be required to refund tax benefits already received, with interest and adjustments for inflation based on the Israeli consumer price index.

On December 22, 2017, the U.S. President signed into law federal tax legislation commonly referred to as the Tax Cuts and Jobs Act (the Tax Act ). The Tax Act provides for significant and wide-ranging changes to the U.S. Internal Revenue Code. Broadly, the implications most relevant to the company include: a) a reduction in the U.S. federal corporate income tax rate from 35% to 21%, with various base erosion rules that may effectively limit the tax deductibility of certain payments made by our U.S. entities to our non-U.S. affiliates and additional limitations on deductions attributable to interest expense; and b) adopting elements of a territorial tax system. To transition into the territorial tax system, the Tax Act included a one-time tax on cumulative retained earnings of U.S.-owned foreign subsidiaries, at a rate of 15.5% for earnings represented by cash or cash equivalents and 8.0% for the balance of such earnings. In connection with our initial analysis of the impact of the Tax Act, and after utilization of existing tax loss carryforwards, we do not expect to have any tax payment.

In January 2018, the Financial Accounting Standards Board released guidance on the accounting for tax on the global intangible low-taxed income ( GILTI ) provisions of the Tax Act. The GILTI provisions impose a tax on foreign income in excess of a deemed return on tangible assets of foreign corporations. The guidance indicates that either (i) accounting for deferred taxes related to GILTI inclusions, or (ii) treating any taxes on GILTI inclusions as period cost, are both acceptable methods subject to an accounting policy election. In accordance with SEC Staff Accounting Bulletin No. 118, and as we are not yet able to reasonably estimate the effect of the GILTI tax, we have yet to adopt an accounting policy with respect to the GILTI tax.

*Critical Accounting Policies and Estimates*

Our consolidated financial statements are prepared in accordance with generally accepted accounting principles in the United States. The preparation of these consolidated financial statements requires us to make estimates and assumptions that affect the reported amounts of assets, liabilities, revenues, 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.

We believe that the assumptions and estimates associated with revenue recognition, fair value of financial instruments, equity-based compensation and income taxes have the greatest potential impact on our consolidated financial statements. Therefore, we consider these to be our critical accounting policies and estimates.

See our Annual Report on Form 10-K for the year ended December 31, 2017, filed with the SEC on March 1, 2018, for a discussion of additional critical accounting policies and estimates. Except for policy changes in accounting for revenues associated with our adoption of Topic 606 (see Note 2 Revenue Recognition in the Notes to Condensed Consolidated Financial Statements in Item 1), there have been no changes in our critical accounting policies as compared to what was previously disclosed in the Form 10-K for the year ended December 31, 2017.

## LIQUIDITY AND CAPITAL RESOURCES

As of September 30, 2018, we had approximately $9.2 million in cash and cash equivalents, $31.6 million in short term bank deposits, $78.8 million in marketable securities, and $47.4 million in long term bank deposits, totaling

$167.0 million, as compared to $183.3 million at December 31, 2017. The decrease for the first nine months of 2018 principally reflected a repurchase of 527,212 shares of common stock for an aggregate consideration of approximately $16.7 million.

Out of total cash, cash equivalents, bank deposits and marketable securities of $167.0 million, $133.5 million was held by our foreign subsidiaries. Our intent is to permanently reinvest earnings of our foreign subsidiaries and our current operating plans do not demonstrate a need to repatriate foreign earnings to fund our U.S. operations. However, if these funds were needed for our operations in the United States, we would be required to accrue and pay taxes to repatriate these funds. The determination of the amount of additional taxes related to the repatriation of these earnings is not practicable, as it may vary based on various factors such as the location of the cash and the effect of regulation in the various jurisdictions from which the cash would be repatriated.

During the first nine months of 2018, we invested $37.1 million of cash in bank deposits and marketable securities with maturities up to 54 months from the balance sheet date. In addition, during the same period, bank deposits and marketable securities were sold or redeemed for cash amounting to $40.0 million. All of our marketable securities are classified as available-for-sale. The purchase and sale or redemption of available-for-sale marketable securities are considered part of investing cash flow. Available-for-sale marketable securities are stated at fair value, with unrealized gains and losses reported in accumulated other comprehensive income (loss), a separate component of stockholders equity, net of taxes. Realized gains and losses on sales of investments, as determined on a specific identification basis, are included in the interim condensed consolidated statements of income. We did not recognize any other-than-temporarily-impaired charges on marketable securities during the first nine months of 2018. For more information about our marketable securities, see Notes 4 to the attached Notes to the Interim Condensed Consolidated Financial Statements for the three and nine months ended September 30, 2018.

Bank deposits are classified as short-term bank deposits and long-term bank deposits. Short-term bank deposits are deposits with maturities of more than three months but no longer than one year from the balance sheet date, whereas long-term bank deposits are deposits with maturities of more than one year as of the balance sheet date. Bank deposits are presented at their cost, including accrued interest, and purchases and sales are considered part of cash flows from investing activities.

*Operating Activities*

Cash provided by operating activities for the first nine months of 2018 was $4.1 million and consisted of net loss of $1.7 million, adjustments for non-cash items of $11.7 million, and changes in operating assets and liabilities of $5.9 million. Adjustments for non-cash items primarily consisted of $2.9 million of depreciation and amortization of intangible assets, $8.0 million of equity-based compensation expenses and $0.6 million of amortization of premiums on available-for-sale marketable securities. The decrease in operating assets and liabilities primarily consisted of an increase in prepaid expenses and other assets of $3.8 million (mainly as a result of an increase in French research tax credits which is generally refunded every three years, and an increase in withholding tax assets which can be utilized in the fourth quarter of 2018 and in future years), an increase in accrued interest on bank deposits of $0.6 million, an increase in deferred taxes, net of $0.9 million, a decrease in deferred revenues of $0.8 million, a decrease in accrued expenses and other payables of $0.8 million, and a decrease in accrued payroll and related benefits of $1.3 million, partially offset by a decrease in trade receivables and accrued revenues of $1.7 million and an increase in trade payables of $0.6 million.

Cash provided by operating activities for the first nine months of 2017 was $17.7 million and consisted of net income of $13.9 million, adjustments for non-cash items of $9.6 million, and changes in operating assets and liabilities of $5.8 million. Adjustments for non-cash items primarily consisted of $2.4 million of depreciation and amortization of intangible assets, $6.3 million of equity-based compensation expenses and $0.9 million of amortization of premiums on available-for-sale marketable securities. The decrease in cash from changes in operating assets and liabilities primarily consisted of an increase in prepaid expenses and other assets of $2.6 million (mainly as a result of an increase in French research tax credits which is generally refunded every three years), an increase in deferred tax assets, net, of $0.7 million, a decrease of deferred revenues of $2.0 million, a decrease in accrued payroll and related benefits of $1.5 million and a decrease in income taxes payable of $1.5 million (mainly due to a release of a tax provision as a result of the completion of a tax audit in a certain foreign tax jurisdiction), partially offset by a decrease in trade receivables of $2.2 million and an increase in accrued expenses and other payables of $0.4 million.

Cash flows from operating activities may vary significantly from quarter to quarter depending on the timing of our receipts and payments. Our ongoing cash outflows from operating activities principally relate to payroll-related costs and obligations under our property leases and design tool licenses. Our primary sources of cash inflows are receipts from our accounts receivable, to some extent, funding from R&D government grants and French research tax credits, and interest earned from our cash, deposits and marketable securities. The timing of receipts of accounts receivable from customers is based upon the completion of agreed milestones or agreed dates as set out in the contracts.

*Investing Activities*

Net cash used in investing activities for the first nine months of 2018 was $2.0 million, compared to $20.2 million of net cash used in investing activities for the comparable period of 2017. We had a cash outflow of $15.5 million and a cash inflow of $17.9 million with respect to investments in marketable securities during the first nine months of 2018, as compared to a cash outflow of $36.5 million and a cash inflow of $23.3 million with respect to investments in marketable securities during the first nine months of 2017. For the first nine months of 2018, we had net proceeds of $0.5 million from bank deposits, as compared to net investment of $3.7 million in bank deposits for the comparable period of 2017. We had a cash outflow of $2.9 million and $3.3 million during the first nine months of 2018 and 2017, respectively, from purchase of property and equipment. For the first nine months of 2018, we had a cash outflow of $2.0 million from the purchase of a license of NB-IoT technologies.

*Financing Activities*

Net cash used in financing activities for the first nine months of 2018 was $14.5 million, as compared to $6.9 million of net cash provided by financing activities for the comparable period of 2017. The decrease is due to the use of cash for share repurchases and less proceeds received from the exercise of stock-based awards, both as set forth below.

In August 2008, we announced that our board of directors approved a share repurchase program for up to one million shares of common stock which was further extended collectively by an additional five million shares in 2010, 2013 and 2014. In May 2018, our board of directors authorized the repurchase of an additional 700,000 shares of common stock pursuant to Rule 10b-18 of the Exchange Act. During the first nine months of 2018, we repurchased 527,212 shares of common stock pursuant to our share repurchase program, at an average purchase price of $31.76 per share, for an aggregate purchase price of $16.7 million. We did not repurchase any shares of common stock during the first nine months of 2017. As of September 30, 2018, we have 483,844 shares available for repurchase.

During the first nine months of 2018, we received $2.2 million from the exercise of stock-based awards, as compared to $6.9 million received for the comparable period of 2017.

We believe that our cash and cash equivalents, short-term bank deposits and marketable securities, along with cash from operations, will provide sufficient capital to fund our operations for at least the next 12 months. We cannot provide assurances, however, that the underlying assumed levels of revenues and expenses will prove to be accurate.

In addition, as part of our business strategy, we occasionally evaluate potential acquisitions of businesses, products and technologies and minority equity investments. Accordingly, a portion of our available cash may be used at any time for the acquisition of complementary products or businesses or minority equity investments. Such potential transactions may require substantial capital resources, which may require us to seek additional debt or equity financing. We cannot assure you that we will be able to successfully identify suitable acquisition or investment candidates, complete acquisitions or investments, integrate acquired businesses into our current operations, or expand into new markets. Furthermore, we cannot provide assurances that additional financing will be available to us in any required time frame and on commercially reasonable terms, if at all. See Risk Factors We may seek to expand our business in ways that could result in diversion of resources and extra expenses. for more detailed information.

**Item 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK**

A majority of our revenues and a portion of our expenses are transacted in U.S. dollars and our assets and liabilities together with our cash holdings are predominately denominated in U.S. dollars. However, the majority of our expenses are denominated in currencies other than the U.S. dollar, principally the NIS and the Euro. Increases in volatility of the exchange rates of currencies other than the U.S. dollar versus the U.S. dollar could have an adverse effect on the expenses and liabilities that we incur when remeasured into U.S. dollars. We review our monthly expected non-U.S. dollar denominated expenditures and look to hold equivalent non-U.S. dollar cash balances to mitigate currency fluctuations. This has resulted in a foreign exchange loss of $88,000 and $199,000 for the third quarter and first nine months of 2018, respectively, and a foreign exchange gain of $32,000 and a foreign exchange loss of $53,000 for the comparable periods of 2017.

As a result of currency fluctuations and the remeasurement of non-U.S. dollar denominated expenditures to U.S. dollars for financial reporting purposes, we may experience fluctuations in our operating results on an annual and quarterly basis. To protect against the increase in value of forecasted foreign currency cash flow resulting from salaries paid in currencies other than the U.S. dollar during the year, we follow a foreign currency cash flow hedging program. We hedge portions of the anticipated payroll for our non-U.S. employees denominated in currencies other than the U.S. dollar for a period of one to twelve months with forward and option contracts. During the third quarter and first nine months of 2018, we recorded accumulated other comprehensive gain of $75,000 and $0, respectively, from our forward and option contracts, net of taxes, with respect to anticipated payroll expenses for our non-U.S. employees. During the third quarter and first nine months of 2017, we recorded accumulated other comprehensive loss of $0 and $5,000, respectively, from our forward and option contracts, net of taxes, with respect to anticipated payroll expenses for our non-U.S. employees. As of September 30, 2018, we had no other comprehensive gain/ (loss) from our forward and option contracts. We recognized a net loss of $63,000 and $259,000 for the third quarter and first nine months of 2018, respectively, and a net loss of $2,000 and a net gain of $186,000 for the comparable periods of 2017, related to forward and options contracts. We note that hedging transactions may not successfully mitigate losses caused by currency fluctuations. We expect to continue to experience the effect of exchange rate and currency fluctuations on an annual and quarterly basis.

The majority of our cash and cash equivalents are invested in high grade certificates of deposits with major U.S., European and Israeli banks. Generally, cash and cash equivalents and bank deposits may be redeemed and therefore minimal credit risk exists with respect to them. Nonetheless, deposits with these banks exceed the Federal Deposit Insurance Corporation ( FDIC ) insurance limits or similar limits in foreign jurisdictions, to the extent such deposits are even insured in such foreign jurisdictions. While we monitor on a systematic basis the cash and cash equivalent balances in the operating accounts and adjust the balances as appropriate, these balances could be impacted if one or more of the financial institutions with which we deposit our funds fails or is subject to other adverse conditions in the financial or credit markets. To date, we have experienced no loss of principal or lack of access to our invested cash or cash equivalents; however, we can provide no assurance that access to our invested cash and cash equivalents will not be affected if the financial institutions that we hold our cash and cash equivalents fail.

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We hold an investment portfolio consisting principally of corporate bonds. We have the ability to hold such investments until recovery of temporary declines in market value or maturity. Accordingly, as of September 30, 2018, we believe the losses associated with our investments are temporary and no impairment loss was recognized during the first nine months of 2018. However, we can provide no assurance that we will recover present declines in the market value of our investments.

Interest income and gains and losses from marketable securities, net, were $0.92 million and $2.73 million for the third quarter and first nine months of 2018, respectively, as compared to $0.79 million and $2.20 million for the comparable periods of 2017. The increase in interest income and gains and losses from marketable securities, net, during the third quarter of 2018 principally reflected higher yields, offset by lower combined cash, bank deposits and marketable securities balances held. The increase in interest income and gains, and losses from marketable securities, net, during the first nine months of 2018 principally reflected higher combined cash, bank deposits and marketable securities balances held and higher yields.

We are exposed primarily to fluctuations in the level of U.S. interest rates. To the extent that interest rates rise, fixed interest investments may be adversely impacted, whereas a decline in interest rates may decrease the anticipated interest income for variable rate investments. We typically do not attempt to reduce or eliminate our market exposures on our investment securities because the majority of our investments are short-term. We currently do not have any derivative instruments but may put them in place in the future. Fluctuations in interest rates within our investment portfolio have not had, and we do not currently anticipate such fluctuations will have, a material effect on our financial position on an annual or quarterly basis.

## Item 4. CONTROLS AND PROCEDURES

As of the end of the period covered by this report, we carried out an evaluation, under the supervision and with the participation of our Chief Executive Officer and Chief Financial Officer, of the effectiveness of the design and operation of our disclosure controls and procedures. Based on this evaluation, our Chief Executive Officer and Chief Financial Officer concluded that our disclosure controls and procedures were effective as of September 30, 2018.

There has been no change in our internal control over financial reporting that occurred during our most recent fiscal quarter that has materially affected or is reasonably likely to materially affect our internal control over financial reporting.

# PART II. OTHER INFORMATION

## Item 1. LEGAL PROCEEDINGS

We are not a party to any litigation or other legal proceedings that we believe could reasonably be expected to have a material effect on our business, results of operations and financial condition.

## Item 1A. RISK FACTORS

*This Form 10Q contains forward-looking statements concerning our future products, expenses, revenue, liquidity and cash needs as well as our plans and strategies. These forward-looking statements are based on current expectations and we assume no obligation to update this information. Numerous factors could cause our actual results to differ significantly from the results described in these forward-looking statements, including the following risk factors.*

There are no material changes to the Risk Factors described under the title Factors That May Affect Future Performance in our Annual Report on Form 10K for the fiscal year ended December 31, 2017 other than (1) changes to the Risk Factor below entitled: Our quarterly operating results fluctuate from quarter to quarter due to a variety of factors, including our lengthy sales cycle, and may not be a meaningful indicator of future performance ; (2) changes to the Risk Factor below entitled: We rely significantly on revenues derived from a limited number of customers who contribute to our royalty and license revenues; (3) changes to the Risk Factor below entitled Royalty rates could decrease for existing and future license agreements, which could materially adversely affect our operating results; (4) changes to the Risk Factor below entitled We generate a significant amount of our total revenues from the handset baseband market (for mobile handsets and for other modem connected devices) and our business and operating results may be materially adversely affected if we do not continue to succeed in these highly competitive markets; (5) changes to the Risk Factor below entitled Because we have significant international operations, we may be subject to political, economic and other conditions relating to our international operations that could increase our operating expenses and disrupt our revenues and business; (6) changes to the Risk Factor below entitled Our research and development expenses may increase if the grants we currently receive from the Israeli government and European Union are reduced or withheld; (7) changes to the Risk Factor below entitled: The Israeli tax benefits that we currently receive and the government programs in which we participate require us to meet certain conditions and may be terminated or reduced in the future, which could increase our tax expenses; and (8) changes to the Risk Factor below entitled Our product development efforts are time-consuming and expensive and may not generate an acceptable return, if any. In addition, we added a new Risk Factor below entitled: New tariffs and other trade measures could adversely affect our consolidated results of operations, financial position and cash flows.

**The markets in which we operate are highly competitive, and as a result we could experience a loss of sales, lower prices and lower revenues.**

The markets for the products in which our technology is incorporated are highly competitive. Aggressive competition could result in substantial declines in the prices that we are able to charge for our intellectual property or lose design wins to competitors. Many of our competitors are striving to increase their share of the growing signal processing IP markets and are reducing their licensing and royalty fees to attract customers. The following industry players and factors may have a significant impact on our competitiveness:

- we compete directly in the signal processing cores space with Verisilicon, Cadence and Synopsys;
- we compete with CPU IP or configurable CPU IP (offering DSP configured CPU and/or DSP acceleration and/or connectivity capabilities to their IP) providers, such as Arm Limited (acquired by SoftbBank), Imagination Technologies (acquired by Canyon Bridge), Synopsys and Cadence;
- we compete with internal engineering teams at companies such as Mediatek, Qualcomm, Samsung, Huawei and NXP that may design programmable DSP core products and signal processing cores in-house and therefore not license our technologies;
- we compete in the short range wireless markets with Arm Limited, Mindtree, Imagination Technologies and STMicroelectronics;
- we compete in embedded imaging and vision market with Cadence, Synopsys, Videantis, Verislicon, Arm Limited (NEON technology) and GPU IP providers such as Arm Limited, Imagination Technologies and Verisilicon;
- we compete in AI processor marketing with AI processor and accelerator providers, including AImotive, Arm Limited, Cadence, Cambricon, Digital Media Professionals (DMP), Graphcore, Imagination Technologies, Nvidia open source NVDLA and Verisilicon; and
- we compete in the audio and voice applications market with Arm Limited, Cadence, Synopsys, and Verisilicon.

In addition, we may face increased competition from smaller, niche semiconductor design companies in the future. Some of our customers also may decide to satisfy their needs through in-house design. We compete on the basis of signal processing IP performance, overall chip cost, power consumption, flexibility, reliability, communication and multimedia software availability, design cycle time, tool chain, customer support, name recognition, reputation and financial strength. Our inability to compete effectively on these bases could have a material adverse effect on our business, results of operations and financial condition.

**Our quarterly operating results fluctuate from quarter to quarter due to a variety of factors, including our lengthy sales cycle, and may not be a meaningful indicator of future performance.**

In some quarters our operating results could be below the expectations of securities analysts and investors, which could cause our stock price to fall. Factors that may affect our quarterly results of operations in the future include, among other things:

- the gain or loss of significant licensees, partly due to our dependence on a limited number of customers generating a significant amount of quarterly revenues;
- any delay in execution of any anticipated licensing arrangement during a particular quarter;
- delays in revenue recognition for some license agreements based on percentage of completion of customized work or other accounting reasons;
- the timing and volume of orders and production by our customers, as well as fluctuations in royalty revenues resulting from fluctuations in unit shipments by our licensees;
- royalty pricing pressures and reduction in royalty rates due to an increase in volume shipments by customers, end-product price erosion and competitive pressures;
- earnings or other financial announcements by our major customers that include shipment data or other information that implicates expectations for our future royalty revenues;
- the mix of revenues among licensing and related revenues, and royalty revenues;
- the timing of the introduction of new or enhanced technologies by us and our competitors, as well as the market acceptance of such technologies;
- the discontinuation, or public announcement thereof, of product lines or market sectors that incorporate our technology by our significant customers;

our lengthy sales cycle and specifically in the third quarter of any fiscal year during which summer vacations slow down decision-making processes of our customers in executing contracts;

delays in the commercialization of end products that incorporate our technology;

currency fluctuations, mainly the EURO and the NIS versus the U.S. dollar;

fluctuations in operating expenses and gross margins associated with the introduction of, and research and development investments in, new or enhanced technologies and adjustments to operating expenses resulting from restructurings;

the approvals, amounts and timing of Israeli R&D government grants from the Israeli Innovation Authority of the Ministry of Economy and Industry in Israel (the IIA ), EU grants and French research tax credits;

the impact of new accounting pronouncements, including the new revenue recognition rules;

the timing of our payment of royalties to the IIA, which is impacted by the timing and magnitude of license agreements and royalty revenues derived from technologies that were funded by grant programs of the IIA;

statutory changes associated with research tax benefits applicable to French technology companies;

our ability to scale our operations in response to changes in demand for our technologies;

entry into new end markets that utilize our signal processing IPs, software and platforms;

changes in our pricing policies and those of our competitors;

restructuring, asset and goodwill impairment and related charges, as well as other accounting changes or adjustments;

general political conditions, including global trade wars resulting from tariffs and business restrictions and bans imposed by government entities, including the well publicized ban associated with ZTE, as well as other regulatory actions and changes that may adversely affect the business environment; and general economic conditions, including the current economic conditions, and its effect on the semiconductor industry and sales of consumer products into which our technologies are incorporated.

Each of the above factors is difficult to forecast and could harm our business, financial condition and results of operations. Also, we license our technology to OEMs and semiconductor companies for incorporation into their end products for consumer markets, including handsets and consumer electronics products. The royalties we generate are reported by our customers. Our royalty revenues are affected by seasonal buying patterns of consumer products sold by our OEM customers that incorporate our technology and the market acceptance of such end products supplied by our OEM customers. In accordance with the new revenue recognition rules, effective as of January 1, 2018, the royalties we generate is based on royalty reports of units shipped during the quarter as estimated by our customers, not a quarter in arrears that we previously reported. The first quarter in any given year therefore will be a sequentially down quarter for us in relation to royalty revenues as this period represents lower post-Christmas fourth quarter consumer product shipments. However, the magnitude of this first quarter decrease varies annually and has been impacted by global economic conditions, market share changes, exiting or refocusing of market sectors by our customers and the timing of introduction of new and existing handset devices powered by CEVA technology sold in any given quarter compared to the prior quarter.

Moreover, the semiconductor and consumer electronics industries remain volatile, which makes it extremely difficult for our customers and us to accurately forecast financial results and plan for future business activities. As a result, our past operating results should not be relied upon as an indication of future performance.

**We rely significantly on revenues derived from a limited number of customers who contribute to our royalty and license revenues.**

We derive a significant amount of revenues from a limited number of customers. One customer, Spreadtrum, accounted for 16% and 22% of our total revenues for the first nine months of 2018 and 2017, respectively. With respect to our royalty revenues, three royalty paying customers each represented 10% or more of our total royalty revenues for the first nine months of 2018, and collectively represented 77% of our total royalty revenues for the first nine months of 2018. Two royalty paying customers each represented 10% or more of our total royalty revenues for the first nine months of 2017, and collectively represented 74% of our total royalty revenues for the first nine months of 2017. We expect that a significant portion of our future revenues will continue to be generated by a limited number of customers. The loss of any significant royalty paying customer could adversely affect our near-term future operating results. Furthermore, consolidation among our customers may negatively affect our revenue source, increase our existing customers negotiation leverage and make us further dependent on a limited number of customers. Moreover, the discontinuation of product lines or market sectors that incorporate our technology by our significant customers or a change in direction of their business and our inability to adapt our technology to their new business needs could have material negative implications for our future royalty revenues.

**Our business is dependent on licensing revenues which may vary period to period.**

License agreements for our signal processing IP cores and platforms have not historically provided for substantial ongoing license payments so past licensing revenues may not be indicative of the amount of such revenues in any future period. We believe that there is a similar risk with RivieraWaves operations associated with Bluetooth and Wi-Fi connectivity technologies. Significant portions of our anticipated future revenues, therefore, will likely depend upon our success in attracting new customers or expanding our relationships with existing customers. However, revenues recognized from licensing arrangements vary significantly from period to period, depending on the number and size of deals closed during a quarter, and is difficult to predict. In addition, as we expand our business into the non-handset baseband markets, our licensing deals may be smaller but greater in volume which may further fluctuate our licensing revenues quarter to quarter. Our ability to succeed in our licensing efforts will depend on a variety of factors, including the performance, quality, breadth and depth of our current and future products, including our newly announced AI processor cores as well as our sales and marketing skills. In addition, some of our licensees may in the future decide to satisfy their needs through in-house design and production. Our failure to obtain future licensing customers would impede our future revenue growth and could materially harm our business.

**Royalty rates could decrease for existing and future license agreements, which could materially adversely affect our operating results.**

Royalty payments to us under existing and future license agreements could be lower than currently anticipated for a variety of reasons. Average selling prices for semiconductor products generally decrease over time during the lifespan of a product. In addition, there is increasing downward pricing pressures in the semiconductor industry on end products incorporating our technology, especially end products for the handsets and consumer electronics markets. As a result, notwithstanding the existence of a license agreement, our customers may demand that royalty rates for our products be lower than our historic royalty rates. We have in the past and may be pressured in the future to renegotiate existing license agreements with our customers. In addition, certain of our license agreements provide that royalty rates may decrease in connection with the sale of larger quantities of products incorporating our technology. Furthermore, our competitors may lower the royalty rates for their comparable products to win market share which may force us to lower our royalty rates as well. As a consequence of the above referenced factors, as well as unforeseen factors in the future, the royalty rates we receive for use of our technology could decrease, thereby decreasing future anticipated revenues and cash flow. Royalty revenues were approximately 54% and 47% of our total revenues for the third quarter and first nine months of 2018, respectively. Therefore, a significant decrease in our royalty revenues could materially adversely affect our operating results.

Moreover, royalty rates may be negatively affected by macroeconomic trends or changes in products mix. Furthermore, consolidation among our customers may increase the leverage of our existing customers to extract concessions from us in royalty rates. Moreover, changes in products mix such as an increase in lower royalty bearing products shipped in high volume like low-cost feature phones and Bluetooth-based products in lieu of higher royalty bearing products like LTE phones could lower our royalty revenues.

**We generate a significant amount of our total revenues from the handset baseband market (for mobile handsets and for other modem connected devices) and our business and operating results may be materially adversely affected if we do not continue to succeed in these highly competitive markets.**

Our total revenues derived solely from baseband for handset and for other devices represented 62% and 58% of our total revenues for the third quarter and first nine months of 2018, respectively. Any adverse change in our ability to compete and maintain our competitive position in the handset baseband market, including through the introduction by competitors of enhanced technologies that attract OEM customers that target those markets, would harm our business, financial condition and results of operations. Moreover, the handset baseband market is extremely competitive and is facing intense pricing pressures, and we expect that competition and pricing pressures will only increase. Furthermore, it can be very volatile with regards to volume shipments of different phones, standards and connected devices due to inventory build out or consumer demand changes or geographical macroeconomics, pricing changes, product discontinuations due to technical issues and timing of introduction of new phones and products. Our existing OEM customers also may fail to introduce new handset devices that attract consumers, or encounter significant delays in developing, manufacturing or shipping new or enhanced products in those markets or find alternative technological solutions and suppliers. The inability of our OEM customers to compete would result in lower shipments of products powered by our technologies which in turn would have a material adverse effect on our business, financial condition and results of operations. Since a significant portion of our revenues are derived from the handset baseband market, adverse conditions in this market would have a material adverse effect on our business, financial condition and results of operations.

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**Because our IP solutions are components of end products, if semiconductor companies and electronic equipment manufacturers do not incorporate our solutions into their end products or if the end products of our customers do not achieve market acceptance, we may not be able to generate adequate sales of our products.**

We do not sell our IP solutions directly to end-users; we license our technology primarily to semiconductor companies and electronic equipment manufacturers, who then incorporate our technology into the products they sell. As a result, we rely on our customers to incorporate our technology into their end products at the design stage. Once a company incorporates a competitor s technology into its end product, it becomes significantly more difficult for us to sell our technology to that company because changing suppliers involves significant cost, time, effort and risk for the company. As a result, we may incur significant expenditures on the development of a new technology without any assurance that our existing or potential customers will select our technology for incorporation into their own product and without this design win, it becomes significantly difficult to sell our IP solutions. Moreover, even after a customer agrees to incorporate our technology into its end products, the design cycle is long and may be delayed due to factors beyond our control, which may result in the end product incorporating our technology not reaching the market until long after the initial design win with such customer. From initial product design-in to volume production, many factors could impact the timing and/or amount of sales actually realized from the design-in. These factors include, but are not limited to, changes in the competitive position of our technology, our customers financial stability, and our customers ability to ship products according to our customers schedule. Moreover, current economic conditions may further prolong a customer s decision-making process and design cycle.

Further, because we do not control the business practices of our customers, we do not influence the degree to which they promote our technology or set the prices at which they sell products incorporating our technology. We cannot assure you that our customers will devote satisfactory efforts to promote their end products which incorporate our IP solutions.

In addition, our royalties from licenses and therefore the growth of our business, are dependent upon the success of our customers in introducing products incorporating our technology and the success of those products in the marketplace. The primary customers for our products are semiconductor design and manufacturing companies, system OEMs and electronic equipment manufacturers, particularly in the telecommunications field. All of the industries we license into are highly competitive, cyclical and have been subject to significant economic downturns at various times. These downturns are characterized by production overcapacity and reduced revenues, which at times may encourage semiconductor companies or electronic product manufacturers to reduce their expenditure on our technology. If we do not retain our current customers and continue to attract new customers, our business may be harmed.

**We depend on market acceptance of third-party semiconductor intellectual property.**

The semiconductor intellectual property (SIP) industry is a relatively small and emerging industry. Our future growth will depend on the level of market acceptance of our third-party licensable intellectual property model, the variety of intellectual property offerings available on the market, and a shift in customer preference away from in-house development of proprietary signal processing IP towards licensing open signal processing IP cores and platforms. Furthermore, the third-party licensable intellectual property model is highly dependent on the market adoption of new services and products, such as low cost smartphones in emerging markets, LTE-based smartphones, mobile broadband, small cell base stations and the increased use of advanced audio, voice, computational photography and embedded vision in mobile, automotive and consumer products, as well as in IoT and connectivity applications. Such market adoption is important because the increased cost associated with ownership and maintenance of the more complex architectures needed for the advanced services and products may motivate companies to license third-party intellectual property rather than design them in-house.

The trends that would enable our growth are largely beyond our control. Semiconductor customers also may choose to adopt a multi-chip, off-the-shelf chip solution versus licensing or using highly-integrated chipsets that embed our technologies. If the above referenced market shifts do not materialize or third-party SIP does not achieve market acceptance, our business, results of operations and financial condition could be materially harmed.

**Because we have significant international operations, we may be subject to political, economic and other conditions relating to our international operations that could increase our operating expenses and disrupt our revenues and business.**

Approximately 89% of our total revenues for the first nine months of 2018 were derived from customers located outside of the United States. We expect that international customers will continue to account for a significant portion of our revenues for the foreseeable future. As a result, the occurrence of any negative international political, economic or geographic events could result in significant revenue shortfalls. These shortfalls could cause our business, financial condition and results of operations to be harmed. Some of the risks of doing business internationally include:

unexpected changes in regulatory requirements;

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- fluctuations in the exchange rate for the U.S. dollar;
- imposition of tariffs and other barriers and restrictions;
- potential negative international community s reaction to the U.S. Tax Cuts and Jobs Act;
- burdens of complying with a variety of foreign laws, treaties and technical standards;
- uncertainty of laws and enforcement in certain countries relating to the protection of intellectual property;
- multiple and possibly overlapping tax structures and potentially adverse tax consequences;
- political and economic instability, including terrorist attacks and protectionist polices; and
- changes in diplomatic and trade relationships.

Revenues from customers located in the Asia Pacific region account for a substantial portion of our total revenues. We expect that revenue from international sales generally, and sales to the Asia Pacific region specifically, will continue to be a material part of our total revenues. Therefore, any financial crisis, trade negotiations or disputes or other major event causing business disruption in international jurisdictions generally, and China and the Asia Pacific region in particular, could negatively affect our future revenues and results of operations. For example, the U.S. Department of Commerce s Bureau of Industry and Security s initial ban on exports of U.S. products to Chinese telecommunications OEM ZTE disrupted ZTE s operations which caused a number of delays with our engagements with ZTE that we anticipate will reduce our revenues received from this customer in 2018. Actions of any nature with respect to such customers may reduce our revenues from them and adversely affect our business and financial results.

**New tariffs and other trade measures could adversely affect our consolidated results of operations, financial position and cash flows.**

General trade tensions between the U.S. and China have been escalating in 2018. While tariffs and other retaliatory trade measures imposed by other countries on U.S. goods have not yet had a significant impact on our business or results of operations, we cannot predict further developments, and such existing or future tariffs could have a material adverse effect on our consolidated results of operations, financial position and cash flows.

**We depend on a limited number of key personnel who would be difficult to replace.**

Our success depends to a significant extent upon certain of our key employees and senior management, the loss of which could materially harm our business. Competition for skilled employees in our field is intense. We cannot assure you that in the future we will be successful in attracting and retaining the required personnel.

**The sales cycle for our IP solutions is lengthy, which makes forecasting of our customer orders and revenues difficult.**

The sales cycle for our IP solutions is lengthy, often lasting three to nine months. Our customers generally conduct significant technical evaluations, including customer trials, of our technology as well as competing technologies prior to making a purchasing decision. In addition, purchasing decisions also may be delayed because of a customer s internal budget approval process. Furthermore, given the current market conditions, we have less ability to predict the timing of our customers purchasing cycle and potential unexpected delays in such a cycle. Because of the lengthy sales cycle and potential delays, our dependence on a limited number of customers to generate a significant amount of revenues for a particular period and the size of customer orders, if orders forecasted for a specific customer for a particular period do not occur in that period, our revenues and operating results for that particular quarter could suffer. Moreover, a portion of our expenses related to an anticipated order is fixed and difficult to reduce or change, which may further impact our operating results for a particular period.

**Because our IP solutions are complex, the detection of errors in our products may be delayed, and if we deliver products with defects, our credibility will be harmed, the sales and market acceptance of our products may decrease and product liability claims may be made against us.**

Our IP solutions are complex and may contain errors, defects and bugs when introduced. If we deliver products with errors, defects or bugs, our credibility and the market acceptance and sales of our products could be significantly harmed. Furthermore, the nature of our products may also delay the detection of any such error or defect. If our products contain errors, defects and bugs, then we may be required to expend significant capital and resources to alleviate these problems. This could result in the diversion of technical and other resources from our other development efforts. Any actual or perceived problems or delays may also adversely affect our ability to attract or retain customers. Furthermore, the existence of any defects, errors or failure in our products could lead to product liability claims or lawsuits against us or against our customers. A successful product liability claim could result in substantial cost and divert management s attention and resources, which would have a negative impact on our financial condition and results of operations.

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**Our success will depend on our ability to successfully manage our geographically dispersed operations.**

Most of our employees are located in Israel. We also added French employees after the RivieraWaves acquisition in 2014. Accordingly, our ability to compete successfully will depend in part on the ability of a limited number of key executives located in geographically dispersed offices to integrate management, address the needs of our customers and respond to changes in our markets. If we are unable to effectively manage and integrate our remote operations, our business may be materially harmed.

**Our operations in Israel may be adversely affected by instability in the Middle East region.**

One of our principal research and development facilities is located in Israel, and most of our executive officers and some of our directors are residents of Israel. Although substantially all of our sales currently are being made to customers outside Israel, we are nonetheless directly influenced by the political, economic and military conditions affecting Israel. Any major hostilities involving Israel could significantly harm our business, operating results and financial condition.

In addition, certain of our employees are currently obligated to perform annual reserve duty in the Israel Defense Forces and are subject to being called to active military duty at any time. Although we have operated effectively under these requirements since our inception, we cannot predict the effect of these obligations on the company in the future. Our operations could be disrupted by the absence, for a significant period, of one or more of our key employees due to military service.

**Terrorist attacks, acts of war or military actions and/or other civil unrest may adversely affect the territories in which we operate, and our business, financial condition and operating results.**

Terrorist attacks such as those that have occurred in France, where we have our wireless connectivity operations as a result of our acquisition of RivieraWaves, and attempted terrorist attacks, military responses to terrorist attacks, other military actions, or governmental action in response to or in anticipation of a terrorist attack, or civil unrest, may adversely affect prevailing economic conditions, resulting in work stoppages, reduced consumer spending or reduced demand for end products that incorporate our technologies. These developments subject our worldwide operations to increased risks and, depending on their magnitude, could reduce net sales and therefore could have a material adverse effect on our business, financial condition and operating results.

**Our research and development expenses may increase if the grants we currently receive from the Israeli government are reduced or withheld.**

We currently receive research grants mainly from programs of the IIA. We recorded an aggregate of $1,829,000 for the first nine months of 2018. To be eligible for these grants, we must meet certain development conditions and comply with periodic reporting obligations. Although we have met such conditions in the past, should we fail to meet such conditions in the future our research grants may be repayable, reduced or withheld. The repayment or reduction of such research grants may increase our research and development expenses which in turn may reduce our operating income. Also, the timing of such payments from the IIA may vary from year to year and quarter to quarter, and we have no control on the timing of such payment. For example, in both 2018 and 2017, the amount of grants approved by the IIA was substantially lower than prior years due to different allocation and methodology that IIA has implemented. As a result, our research and developments costs increased in 2017 as compared to prior years and may increase in 2018 as well.

**Recently enacted tax legislation in the United States may impact our business.**

We are subject to taxation in the United States, as well as a number of foreign jurisdictions. On December 22, 2017, the U.S. President signed into law federal tax legislation commonly referred to as the Tax Cuts and Jobs Act (the Tax Act ). The Tax Act provides for significant and wide-ranging changes to the U.S. Internal Revenue Code. The reforms are complex, and it will take some time to assess the implications thoroughly. Broadly, the implications most relevant to the company include: a) a reduction in the U.S. federal corporate income tax rate from 35% to 21%, with various base erosion rules that may effectively limit the tax deductibility of certain payments made by U.S. entities to non-U.S. affiliates and additional limitations on deductions attributable to interest expense; and b) adopting elements of a territorial tax system. To transition into the territorial tax system, the Tax Cuts and Jobs Act includes a one-time tax on cumulative retained earnings of U.S.-owned foreign subsidiaries, at a rate of 15.5% for earnings represented by cash or cash equivalents and 8.0% for the balance of such earnings. Taxpayers may make an election to pay this tax over eight years. These tax reforms will give rise to significant consequences, both immediately in terms of one-off impacts relating to the transition tax and the measurement of deferred tax assets and liabilities and going forward in terms of the company s taxation expense. An initial review and estimate has been undertaken by us, which will be updated over the coming weeks and months as we work through these complex changes with our advisors. The Tax Act could be subject to potential amendments and technical corrections, any of which could lessen or increase adverse impacts of the law. The final transitional impact of the Tax Act may differ from the estimates we previously provided due to, among other things, changes in interpretations of the Tax Act, any legislative action to address questions that arise because of the Tax Act, any changes in accounting standards for income taxes or related interpretations in response to the Tax Act, or any updates or changes to estimates we utilized to calculate the transitional impacts, including impacts related to changes to current year earnings estimates and the amount of the repatriation tax. Given the unpredictability of these and other tax laws and related regulations, and their potential interdependency, it is difficult to currently assess the overall effect of such changes. Nonetheless, any material negative effect of such changes to our earnings and cash flow could adversely impact our financial results.

**The nature of our business requires the application of complex revenue recognition rules. Significant changes in U.S. generally accepted accounting principles, or GAAP, including the adoption of the new revenue recognition rules, could materially affect our financial position and results of operations.**

We prepare our financial statements in accordance with GAAP, which is subject to interpretation or changes by the Financial Accounting Standards Board, or FASB, the SEC, and other various bodies formed to promulgate and interpret appropriate accounting principles. New accounting pronouncements and changes in accounting principles have occurred in the past and are expected to occur in the future, which may have a significant effect on our financial results. For example, pursuant to the new revenue recognition rules, effective as of January 1, 2018, an entity recognizes sales- and usage-based royalties as revenue only when the later of the following events occurs: (1) the subsequent sale or usage occurs or (2) the performance obligation to which some or all of the sales-based or usage-based royalty allocated has been satisfied (or partially satisfied). Recognizing royalty revenue on a lag time basis is not permitted. As a result, the royalties we generate from customers is based on royalty of units shipped during the quarter as estimated by our customers, not a quarter in arrears that we previously report. Adoption of this standard and any difficulties in implementation of changes in accounting principles, including uncertainty associated with royalty revenues for the quarter based on estimates provided by our customer, could cause us to fail to meet our financial reporting obligations, which could result in regulatory discipline and harm investors confidence in us.

**The Israeli tax benefits that we currently receive and the government programs in which we participate require us to meet certain conditions and may be terminated or reduced in the future, which could increase our tax expenses.**

We enjoy certain tax benefits in Israel, particularly as a result of the Approved Enterprise and the Benefited Enterprise status of our facilities and programs. To maintain our eligibility for these tax benefits, we must continue to meet certain conditions, relating principally to adherence to the investment program filed with the Investment Center of the Israeli Ministry of Industry and Trade and to periodic reporting obligations. Should we fail to meet such conditions in the future, these benefits would be cancelled and we would be subject to corporate tax in Israel at the standard corporate rate (23% in 2018) and could be required to refund tax benefits already received. In addition, we cannot assure you that these tax benefits will be continued in the future at their current levels or otherwise. The tax benefits under our active investment programs are scheduled to gradually expire starting in 2020. The termination or reduction of certain programs and tax benefits (particularly benefits available to us as a result of the Approved Enterprise and the Benefited Enterprise status of our facilities and programs) or a requirement to refund tax benefits already received may seriously harm our business, operating results and financial condition.

**Our failure to maintain certain research tax benefits applicable to French technology companies may adversely affect the results of operations of our RivieraWaves operations.**

Pursuant to our acquisition of the RivieraWaves operations, we will benefit from certain research tax credits applicable to French technology companies, including, for example, the Crédit Impôt Recherche ( CIR ). The CIR is a French tax credit aimed at stimulating research activities. The CIR can be offset against French corporate income tax due and the portion in excess (if any) may be refunded every three years. The French Parliament can decide to eliminate, or reduce the scope or the rate of, the CIR benefit, at any time or challenge our eligibility or calculations for such tax credits, all of which may have an adverse impact on our results of operations and future cash flows.

**We are exposed to fluctuations in currency exchange rates.**

A significant portion of our business is conducted outside the United States. Although most of our revenues are transacted in U.S. dollars, we may be exposed to currency exchange fluctuations in the future as business practices evolve and we are forced to transact business in local currencies. Moreover, the majority of our expenses are denominated in foreign currencies, mainly New Israeli Shekel (NIS) and the EURO, which subjects us to the risks of foreign currency fluctuations. Our primary expenses paid in currencies other than the U.S. dollar are employee salaries. Increases in the volatility of the exchange rates of currencies other than the U.S. dollar versus the U.S. dollar could have an adverse effect on the expenses and liabilities that we incur in currencies other than the U.S. dollar when remeasured into U.S. dollars for financial reporting purposes. We have instituted a foreign cash flow hedging program to minimize the effects of currency fluctuations. However, hedging transactions may not successfully mitigate losses caused by currency fluctuations, and our hedging positions may be partial or may not exist at all in the future. We also review our monthly expected non-U.S. dollar denominated expenditure and look to hold equivalent non-U.S. dollar cash balances to mitigate currency fluctuations. However, in some cases, we expect to continue to experience the effect of exchange rate currency fluctuations on an annual and quarterly basis. For example, our EURO cash balances increase significantly on a quarterly basis beyond our EURO liabilities from the CIR, which is generally refunded every three years.

**We are exposed to the credit risk of our customers, which could result in material losses.**

As we diversify and expand our addressable market, we will enter into licensing arrangements with first time customers with whom we don t have full visible of their creditworthiness. Furthermore, we have increased business activities in the Asia Pacific region. As a result, our future credit risk exposure may increase. Although we monitor and attempt to mitigate credit risks, there can be no assurance that our efforts will be effective. Although any losses to date relating to credit exposure of our customers have not been material, future losses, if incurred, could harm our business and have a material adverse effect on our operating results and financial condition.

**Our product development efforts are time-consuming and expensive and may not generate an acceptable return, if any.**

Our product development efforts require us to incur substantial research and development expense. Our research and development expenses were approximately $35.8 million for the first nine months of 2018. We may not be able to achieve an acceptable return, if any, on our research and development efforts.

The development of our products is highly complex. We occasionally have experienced delays in completing the development and introduction of new products and product enhancements, and we could experience delays in the future. Unanticipated problems in developing products could also divert substantial engineering resources, which may impair our ability to develop new products and enhancements and could substantially increase our costs. Furthermore, we may expend significant amounts on research and development programs that may not ultimately result in commercially successful products. Our research and development expense levels have increased steadily in the past few years. As a result of these and other factors, we may be unable to develop and introduce new products successfully and in a cost-effective and timely manner, and any new products we develop and offer may never achieve market acceptance. Any failure to successfully develop future products would have a material adverse effect on our business, financial condition and results of operations.

**If we are unable to meet the changing needs of our end-users or address evolving market demands, our business may be harmed.**

The markets for signal processing IPs are characterized by rapidly changing technology, emerging markets and new and developing end-user needs, and requiring significant expenditure for research and development. We cannot assure you that we will be able to introduce systems and solutions that reflect prevailing industry standards, on a timely basis, meet the specific technical requirements of our end-users or avoid significant losses due to rapid decreases in market prices of our products, and our failure to do so may seriously harm our business.

**We may seek to expand our business in ways that could result in diversion of resources and extra expenses.**

We may in the future pursue acquisitions of businesses, products and technologies, establish joint venture arrangements, make minority equity investments or enhance our existing CEVAnet partner eco-system to expand our business. We are unable to predict whether or when any prospective acquisition, equity investment or joint venture will be completed. The process of negotiating potential acquisitions, joint ventures or equity investments, as well as the integration of acquired or jointly developed businesses, technologies or products may be prolonged due to unforeseen difficulties and may require a disproportionate amount of our resources and management s attention. We cannot assure you that we will be able to successfully identify suitable acquisition or investment candidates, complete acquisitions or investments, or integrate acquired businesses or joint ventures with our operations. If we were to make any acquisition or investment or enter into a joint venture, we may not receive the intended benefits of the acquisition, investment or joint venture or such an acquisition, investment or joint venture may not achieve comparable levels of revenues, profitability or productivity as our existing business or otherwise perform as expected. The expansion of our CEVAnet partner eco-system also may not achieve the anticipated benefits. The occurrence of any of these events could harm our business, financial condition or results of operations. Future acquisitions, investments or joint ventures may require substantial capital resources, which may require us to seek additional debt or equity financing.

Future acquisitions, joint ventures or minority equity investments by us could result in the following, any of which could seriously harm our results of operations or the price of our stock:

- issuance of equity securities that would dilute our current stockholders percentages of ownership;
- large one-time write-offs or equity investment impairment write-offs;
- incurrence of debt and contingent liabilities;

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difficulties in the assimilation and integration of operations, personnel, technologies, products and information systems of the acquired companies;

inability to realize cost efficiencies or synergies, thereby incurring higher operating expenditures as a result of the acquisition;

diversion of management s attention from other business concerns;

contractual disputes;

risks of entering geographic and business markets in which we have no or only limited prior experience; and

potential loss of key employees of acquired organizations.

**We may not be able to adequately protect our intellectual property.**

Our success and ability to compete depend in large part upon the protection of our proprietary technologies. We rely on a combination of patent, copyright, trademark, trade secret, mask work and other intellectual property rights, confidentiality procedures and licensing arrangements to establish and protect our proprietary rights. These agreements and measures may not be sufficient to protect our technology from third-party infringement or protect us from the claims of others. As a result, we face risks associated with our patent position, including the potential need to engage in significant legal proceedings to enforce our patents, the possibility that the validity or enforceability of our patents may be denied, the possibility that third parties will be able to compete against us without infringing our patents and the possibility that our products may infringe patent rights of third parties.

Our trade names or trademarks may be registered or utilized by third parties in countries other than those in which we have registered them, impairing our ability to enter and compete in those markets. If we were forced to change any of our brand names, we could lose a significant amount of our brand identity.

**Our business will suffer if we are sued for infringement of the intellectual property rights of third parties or if we cannot obtain licenses to these rights on commercially acceptable terms.**

We are subject to the risk of adverse claims and litigation alleging infringement of the intellectual property rights of others. There are a large number of patents held by others, including our competitors, pertaining to the broad areas in which we are active. We have not, and cannot reasonably, investigate all such patents. From time to time, we have become aware of patents in our technology areas and have sought legal counsel regarding the validity of such patents and their impact on how we operate our business, and we will continue to seek such counsel when appropriate in the future. In addition, patent infringement claims are increasingly being asserted by patent holding companies (so-called patent trolls ), which do not use technology and whose sole business is to enforce patents against companies, such as us, for monetary gain. Because such patent holding companies do not provide services or use technology, the assertion of our own patents by way of counter-claim may be ineffective. Infringement claims may require us to enter into license arrangements or result in protracted and costly litigation, regardless of the merits of these claims. Any necessary licenses may not be available or, if available, may not be obtainable on commercially reasonable terms. If we cannot obtain necessary licenses on commercially reasonable terms, we may be forced to stop licensing our technology, and our business would be seriously harmed.

**The future growth of our business depends in part on our ability to license to system OEMs and small-to-medium-sized semiconductor companies directly and to expand our sales geographically.**

Historically, a substantial portion of our licensing revenues has been derived in any given period from a relatively small number of licensees. Because of the substantial license fees we charge, our customers tend to be large semiconductor companies or vertically integrated system OEMs. Part of our current growth strategy is to broaden the adoption of our products by small and mid-size companies by offering different versions of our products targeted at these companies. If we are unable to develop and market effectively our intellectual property through these models, our revenues will continue to be dependent on a smaller number of licensees and a less geographically dispersed pattern of licensees, which could materially harm our business and results of operations.

**Our operating results are affected by the highly cyclical nature of the semiconductor industry.**

We operate within the semiconductor industry which experiences significant fluctuations in sales and profitability. Downturns in the semiconductor industry are characterized by diminished product demand, excess customer inventories, accelerated erosion of prices and excess production capacity. These factors could cause substantial fluctuations in our revenues and in our results of operations.

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**We may dispose of or discontinue existing product lines and technology developments, which may adversely impact our future results.**

On an ongoing basis, we evaluate our various product offerings and technology developments in order to determine whether any should be discontinued or, to the extent possible, divested. We cannot guarantee that we have correctly forecasted, or will correctly forecast in the future, the right product lines and technology developments to dispose or discontinue or that our decision to dispose of or discontinue various investments, products lines and technology developments is prudent if market conditions change. In addition, there are no assurances that the discontinuance of various product lines will reduce our operating expenses or will not cause us to incur material charges associated with such decision. Furthermore, the discontinuance of existing product lines entails various risks, including the risk that we will not be able to find a purchaser for a product line or the purchase price obtained will not be equal to at least the book value of the net assets for the product line. Other risks include managing the expectations of, and maintaining good relations with, our customers who previously purchased products from our disposed or discontinued product lines, which could prevent us from selling other products to them in the future. We may also incur other significant liabilities and costs associated with our disposal or discontinuance of product lines, including employee severance costs and excess facilities costs.

**Cybersecurity threats or other security breaches could compromise sensitive information belonging to us or our customers and could harm our business and our reputation.**

We store sensitive data, including intellectual property, proprietary business information and our customer and employee information. Despite our security measures, our information technology and infrastructure may be vulnerable to attacks by hackers or breached due to employee error, malfeasance or other disruptions that could result in unauthorized disclosure or loss of sensitive data. Because the techniques used to obtain unauthorized access to networks, or to sabotage systems, change frequently and generally are not recognized until launched against a target, we may be unable to anticipate these techniques or to implement adequate preventative measures. Furthermore, in the operation of our business we also use third-party vendors that store certain sensitive data. Any security breach of our own or a third-party vendor s systems could cause us to be non-compliant with applicable laws or regulations, subject us to legal claims or proceedings, disrupt our operations, damage our reputation, and cause a loss of confidence in our products and services, any of which could adversely affect our business.

**Our corporate tax rate may increase, which could adversely impact our cash flow, financial condition and results of operations.**

We have significant operations in Israel, as well operations in the Republic of Ireland and France. A substantial portion of our taxable income historically has been generated in Israel. Currently, our Israeli and Irish subsidiaries are taxed at rates lower than the U.S. tax rates. If our Israeli and Irish subsidiaries were no longer to qualify for these lower tax rates or if the applicable tax laws were rescinded or changed, our operating results could be materially adversely affected. Moreover, if U.S. or other authorities were to change applicable tax laws or successfully challenge the manner in which our subsidiaries profits are currently recognized, our overall tax expenses could increase, and our business, cash flow, financial condition and results of operations could be materially adversely affected. Also our taxes on the Irish interest income may be double taxed both in Ireland and in the U.S. due to U.S. tax regulations and Irish tax restrictions on NOLs to off-set interest income. In addition, our Israeli interest income also may be taxed both in Israel and the U.S due to different Controlled Foreign Corporation rules.

**Our stock price may be volatile so you may not be able to resell your shares of our common stock at or above the price you paid for them.**

Announcements of developments related to our business, announcements by competitors, quarterly fluctuations in our financial results, changes in the general conditions of the highly dynamic industry in which we compete or the national economies in which we do business, and other factors could cause the price of our common stock to fluctuate, perhaps substantially. In addition, in recent years, the stock market has experienced extreme price fluctuations, which have often been unrelated to the operating performance of affected companies. These factors and fluctuations could have a material adverse effect on the market price of our common stock.

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**Item 2. UNREGISTERED SALES OF EQUITY SECURITIES AND USE OF PROCEEDS**

The table below sets forth the information with respect to repurchases of our common stock during the three months ended September 30, 2018.

| Period | (a) Total Number of Shares Purchased | (b) Average Price Paid per Share | (c) Total Number of Shares Purchased as Part of Publicly Announced Plans or Programs | (d) Maximum Number of Shares that May Yet Be Purchased Under the Plans or Programs (1) |
|---|---|---|---|---|
| Month #1 (July 1, 2018 to July 31, 2018) | | | | 700, 000 |
| Month #2 (August 1, 2018 to August 31, 2018) | 148,719 | $ 29.10 | 148,719 | 551, 281 |
| Month #3 (September 1, 2018 to September 30, 2018) | 67,437 | $ 29.35 | 67,437 | 483,844 |
| TOTAL | 216,156 | $ 29.18 | 216,156 | 483,844 (2) |

(1) In August 2008, we announced that our board of directors approved a share repurchase program for up to one million shares of common stock which was further extended collectively by an additional five million shares in 2010, 2013 and 2014. In May 2018, our board of directors authorized the repurchase of an additional 700,000 shares of common stock pursuant to Rule 10b-18 of the Exchange Act.

(2) The number represents the number of shares of our common stock that remain available for repurchase pursuant to our share repurchase program.

**Item 3. DEFAULTS UPON SENIOR SECURITIES**

Not applicable.

**Item 4. MINE SAFETY DISCLOSURES**

Not applicable.

**Item 5. OTHER INFORMATION**

Not applicable.

**Item 6. EXHIBITS**

| Exhibit No. | Description |
|---|---|
| 31.1 | Rule 13a14(a)/15d14(a) Certification of Chief Executive Officer |
| 31.2 | Rule 13a14(a)/15d14(a) Certification of Chief Financial Officer |
| 32 | Section 1350 Certification of Chief Executive Officer and Chief Financial Officer |
| 101.INS | XBRL Instance Document |
| 101.SCH | XBRL Taxonomy Extension Schema Document |
| 101.CAL | XBRL Taxonomy Extension Calculation Linkbase Document |
| 101.DEF | XBRL Taxonomy Extension Definition Linkbase Document |
| 101.LAB | XBRL Taxonomy Extension Labels Linkbase Document |
| 101.PRE | XBRL Taxonomy Extension Presentation Linkbase Document |

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## SIGNATURES

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

| | |
|---|---|
| | CEVA, INC. |
| Date: November 9, 2018 | By: /s/ GIDEON WERTHEIZER<br>Gideon Wertheizer<br>Chief Executive Officer<br>(principal executive officer) |
| Date: November 9, 2018 | By: /s/ YANIV ARIELI<br>Yaniv Arieli<br>Chief Financial Officer<br>(principal financial officer and principal accounting officer) |