

NANOMETRICS INC  
Form 10-Q  
November 09, 2009  
Table of Contents

**UNITED STATES**  
**SECURITIES AND EXCHANGE COMMISSION**

Washington, D. C. 20549

**FORM 10-Q**

(Mark One)

**Quarterly report pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934**  
For the quarterly period ended September 26, 2009

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 0-13470

**NANOMETRICS INCORPORATED**

(Exact name of registrant as specified in its charter)

Edgar Filing: NANOMETRICS INC - Form 10-Q

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

**94-2276314**  
(I. R. S. Employer  
Identification No.)

**1550 Buckeye Drive, Milpitas, CA**  
(Address of principal executive offices)

**95035**  
(Zip Code)

**Registrant's telephone number, including area code: (408) 545-6000**

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

Indicate by check mark whether the registrant has submitted electronically and posted on its corporate Web site, if any, every Interactive Data File required to be submitted and posted pursuant to Rule 405 of regulation S-T (§232.405 of this chapter) during the preceding 12 months (or such shorter period that the registrant was required to submit and post such file) Yes  No

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, or a non-accelerated filer. See definition of accelerated filer and large accelerated filer in Rule 12b-2 of the Exchange Act.

Large accelerated filer

Accelerated filer

Non-accelerated filer  (Do not check if a smaller reporting company)

Smaller reporting company

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

As of October 31, 2009 there were 18,637,281 shares of common stock, \$0.001 par value, issued and outstanding.

**Table of Contents**

**NANOMETRICS INCORPORATED**  
**INDEX TO QUARTERLY REPORT ON FORM 10-Q**  
**FOR QUARTER ENDED SEPTEMBER 26, 2009**

	<b>Page</b>
PART I.	<b>3</b>
<u>FINANCIAL INFORMATION</u>	<b>3</b>
Item 1. <u>Financial Statements (Unaudited)</u>	<b>3</b>
<u>Condensed Consolidated Balance Sheets at September 26, 2009 and December 27, 2008</u>	<b>3</b>
<u>Condensed Consolidated Statements of Operations for the Three and Nine Month Periods Ended September 26, 2009 and September 27, 2008</u>	<b>4</b>
<u>Condensed Consolidated Statements of Cash Flows for the Nine Month Periods Ended September 26, 2009 and September 27, 2008</u>	<b>5</b>
<u>Notes to Condensed Consolidated Financial Statements</u>	<b>6</b>
Item 2. <u>Management's Discussion and Analysis of Financial Condition and Results of Operations</u>	<b>20</b>
Item 3. <u>Quantitative and Qualitative Disclosures About Market Risk</u>	<b>30</b>
Item 4. <u>Controls and Procedures</u>	<b>30</b>
PART II.	<b>30</b>
<u>OTHER INFORMATION</u>	<b>30</b>
Item 1. <u>Legal Proceedings</u>	<b>30</b>
Item 1A. <u>Risk Factors</u>	<b>31</b>
Item 2. <u>Unregistered Sales of Equity Securities and Use of Proceeds</u>	<b>35</b>
Item 6. <u>Exhibits</u>	<b>36</b>
<u>Signatures</u>	<b>37</b>

**Table of Contents****PART I FINANCIAL INFORMATION****ITEM 1. CONDENSED CONSOLIDATED FINANCIAL STATEMENTS  
NANOMETRICS INCORPORATED****CONDENSED CONSOLIDATED BALANCE SHEETS****(Amounts in thousands except share amounts)****(Unaudited)**

	September 26, 2009	December 27, 2008
<b>ASSETS</b>		
Current assets:		
Cash and cash equivalents	\$ 17,207	\$ 23,980
Accounts receivable, net of allowances of \$311 and \$309, respectively	21,035	17,143
Inventories	31,126	31,583
Inventories- delivered systems	1,290	205
Assets held for sale	220	
Prepaid expenses and other	1,826	1,838
Deferred income tax assets	693	350
Total current assets	73,397	75,099
Property, plant and equipment, net	37,380	40,136
Intangible assets, net	7,477	6,901
Other assets	1,693	1,718
Total assets	\$ 119,947	\$ 123,854
<b>LIABILITIES AND STOCKHOLDERS EQUITY</b>		
Current liabilities:		
Revolving line of credit	\$ 3,500	\$
Accounts payable	5,713	4,824
Accrued payroll and related expenses	3,326	3,435
Deferred revenue	3,435	1,539
Other current liabilities	6,808	5,800
Income taxes payable	845	1,187
Current portion of debt obligations	347	413
Total current liabilities	23,974	17,198
Deferred revenue	436	162
Other long-term liabilities	2,629	644
Debt obligations	12,828	13,083
Total liabilities	39,867	31,087
Commitments and Contingencies (Note 18)		
Stockholders equity:		
Preferred stock, \$0.001 par value; 3,000,000 shares authorized; no shares issued or outstanding	19	18

## Edgar Filing: NANOMETRICS INC - Form 10-Q

Common stock, \$0.001 par value, 47,000,000 shares authorized; 18,629,915 and 18,413,054, respectively, issued and outstanding

Additional paid-in capital	191,765	189,927
Accumulated deficit	(112,666)	(96,643)
Accumulated other comprehensive income (loss)	962	(535)
Total stockholders' equity	80,080	92,767
Total liabilities and stockholders' equity	\$ 119,947	\$ 123,854

See Notes to Unaudited Condensed Consolidated Financial Statements

**Table of Contents****NANOMETRICS INCORPORATED****CONDENSED CONSOLIDATED STATEMENTS OF OPERATIONS**

(Amounts in thousands except per share amounts)

(Unaudited)

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
<b>Net revenues:</b>				
Products	\$ 16,303	\$ 16,311	\$ 29,140	\$ 62,744
Service	9,511	6,826	21,248	18,882
Total net revenues	25,814	23,137	50,388	81,626
<b>Costs of net revenues:</b>				
Cost of products	8,348	8,150	17,249	30,974
Cost of service	3,533	4,778	10,353	14,548
Total costs of net revenues	11,881	12,928	27,602	45,522
Gross profit	13,933	10,209	22,786	36,104
<b>Operating expenses:</b>				
Research and development	4,100	4,430	10,394	13,107
Selling	3,959	4,280	10,832	13,963
General and administrative	3,967	4,935	11,427	15,761
Amortization of intangible assets	418	600	1,124	3,215
Asset impairment		55,332	1,899	68,545
Restructuring charge		655	1,134	1,525
Total operating expenses	12,444	70,232	36,810	116,116
Income (loss) from operations	1,489	(60,023)	(14,024)	(80,012)
<b>Other income (expense)</b>				
Interest income	12	24	39	156
Interest expense	(559)	(240)	(1,106)	(343)
Other, net	546	142	(1,395)	564
Total other income (expense), net	(1)	(74)	(2,462)	377
Income (loss) before income taxes	1,488	(60,097)	(16,486)	(79,635)
Provision (benefit) for income taxes	(83)	350	(463)	450
Net income (loss)	\$ 1,571	\$ (60,447)	\$ (16,023)	\$ (80,085)
<b>Net income (loss) per share:</b>				
Basic	\$ 0.08	\$ (3.25)	\$ (0.87)	\$ (4.31)
Diluted	\$ 0.08	\$ (3.25)	\$ (0.87)	\$ (4.31)

Edgar Filing: NANOMETRICS INC - Form 10-Q

Shares used in per share calculation:

Basic	18,598	18,574	18,513	18,599
Diluted	19,398	18,574	18,513	18,599

See Notes to Unaudited Condensed Consolidated Financial Statements

**Table of Contents****NANOMETRICS INCORPORATED****CONDENSED CONSOLIDATED STATEMENTS OF CASH FLOWS**

(Amounts in thousands)

(Unaudited)

	Nine-Months Ended	
	September 26, 2009	September 27, 2008
Cash flows from operating activities:		
Net loss	\$ (16,023)	\$ (80,085)
Reconciliation of net loss to net cash provided by (used in) operating activities:		
Depreciation and amortization	4,484	6,085
Asset impairment	1,899	68,545
Stock-based compensation	1,573	3,137
Loss on disposal of fixed assets	67	
Accounts receivable reserves	430	
Deferred taxes	(263)	
Unrealized foreign exchange loss on non-permanent intercompany loans	593	
Imputed interest on fair value of deferred payments to Zygo Corporation related to acquisition	288	
Changes in assets and liabilities, net of assets acquired:		
Accounts receivable	(4,366)	13,664
Inventories, net	2,145	(380)
Inventories-delivered systems	(1,090)	610
Prepaid expenses and other	30	(60)
Other assets	100	(165)
Accounts payable, accrued and other liabilities	(1,567)	(7,155)
Deferred revenue	1,990	(1,657)
Income taxes payable	(351)	(724)
Net cash provided by (used in) operations	(10,061)	1,815
Cash flows from investing activities:		
Cash received from Tevet on escrow settlement	215	
Purchase of Tevet's net assets, net of cash received		(3,357)
Purchases of property, plant and equipment	(576)	(2,762)
Proceeds from sale of property, plant and equipment	9	
Net cash used in investing activities	(352)	(6,119)
Cash flows from financing activities:		
Proceeds from issuance of debt obligations		13,500
Borrowings from line of credit	7,000	
Repayment of line of credit	(3,500)	
Repayments of debt obligations	(236)	(136)
Proceeds from sale of shares under employee stock option plans and purchase plan	268	604
Repurchases of common stock		(1,836)
Net cash provided by financing activities	3,532	12,132
Effect of exchange rate changes on cash and cash equivalents	108	(968)
Net increase (decrease) in cash and cash equivalents	(6,773)	6,860

## Edgar Filing: NANOMETRICS INC - Form 10-Q

Cash and cash equivalents, beginning of period	23,980	14,919
Cash and cash equivalents, end of period	\$ 17,207	\$ 21,779
Supplemental disclosure of cash flow information:		
Fair value of deferred payments to Zygo Corporation related to acquisition (see Note 4)	\$ 5,092	
Cash paid for interest	\$ 783	\$ 163
Cash paid for income taxes	\$ 98	\$ 693

See Notes to Unaudited Condensed Consolidated Financial Statements.

**Table of Contents**

**NANOMETRICS INCORPORATED**

**NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS**

**(Unaudited)**

**Note 1. Basis of Presentation**

In the opinion of management, the accompanying Unaudited Condensed Consolidated Financial Statements ( financial statements ) of Nanometrics Incorporated and its wholly-owned subsidiaries (collectively, Nanometrics or the Company ) have been prepared on a consistent basis with the December 27, 2008 audited condensed consolidated financial statements and include all adjustments, consisting of only normal recurring adjustments, necessary to fairly present the information set forth therein. All significant intercompany accounts and transactions have been eliminated in consolidation.

The financial statements have been prepared in accordance with the regulations of the United States Securities and Exchange Commission ( SEC ), and, therefore, omit certain information and footnote disclosure necessary to present the statements in accordance with accounting principles generally accepted in the United States of America. The operating results for interim periods are not necessarily indicative of the operating results that may be expected for the entire year. These financial statements should be read in conjunction with the audited consolidated financial statements and notes thereto for the year ended December 27, 2008, which were included in the Company s Annual Report on Form 10-K, which was filed with the SEC on March 27, 2009.

*Subsequent Events* Subsequent events were evaluated through November 9, 2009 and no events have occurred that would require adjustment to our unaudited condensed consolidated financial statements.

*Fiscal Period* Nanometrics uses a 52/53 week fiscal year ended on the Saturday nearest to December 31. All references to the quarter refer to Nanometrics fiscal quarter. The fiscal quarters presented herein include 13 weeks.

*Reclassification* The Company reclassifies certain prior year amounts to conform to the current presentation. During the fourth quarter of 2008, the Company determined that amortization of demonstration systems, which was previously recorded on the cash flow statement as a deduction in the carrying value of its inventories, should be classified to the depreciation and amortization line item on the cash flow statement. Amortization of demonstration systems was \$0.4 million and \$0.3 million for the three month periods ended September 26, 2009 and September 27, 2008, respectively, and \$1.1 million and \$0.9 million for the nine month periods ended September 26, 2009 and September 27, 2008, respectively.

*Use of Estimates* The preparation of financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosure of contingent assets and liabilities at the date of the financial statements and the reported amounts of revenues and expenses during the reported period. Actual results could differ materially from those estimates. Estimates are used for, but not limited to, the provision for doubtful accounts, the provision for excess, obsolete, or slow moving inventories, depreciation and amortization, valuation of intangible assets and long-lived assets, warranty reserves, income taxes, valuation of stock-based compensation, and contingencies.

*Foreign Currency Translation* The assets and liabilities of foreign subsidiaries are translated from their respective local functional currencies at exchange rates in effect at the balance sheet date and income and expense accounts are translated at average exchange rates during the reporting period. Resulting translation adjustments are reflected in accumulated other comprehensive income as a component of stockholders equity. Foreign currency transaction gains and losses are reflected in Other Income in the condensed consolidated statements of operations in the quarter incurred and consist of a \$0.5 million gain and \$0.1 million loss for the three month periods ended September 26, 2009 and September 27, 2008, respectively, and a loss of \$1.4 million and a gain of \$0.6 million for the nine month periods ended September 26, 2009 and September 27, 2008, respectively. As of December 27, 2008, the Company reclassified loans with our Japanese subsidiary from permanent to non-permanent in order to repatriate cash back to the U.S to fund the Company s working capital requirements. Statements of Financial Accounting Standards (SFAS) No. 52, Foreign Currency Translation as codified by FASB Accounting Standards Codification (ASC) 830 *Foreign Currency Matters* (ASC 830) requires that when intercompany loans are no longer considered permanent, any changes in foreign currency rates for such loans are to be recorded as a period charge on the statement of operations rather than a component in equity. As a result of the loan reclassification and substantial weakening of foreign currencies versus the dollar during the nine-month period ended September 26, 2009, there was a \$1.4 million Other, net expense on the statement of operations for that period, \$0.6 million of which was non-cash expense .



**Table of Contents**

**NANOMETRICS INCORPORATED**

**NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Unaudited)**

**Note 2. Summary of Significant Accounting Policies**

***Recent Accounting Pronouncements***

In September 2009, the FASB ratified Accounting Standards Update (ASU) 2009-13 (ASU 2009-13) previously Emerging Issues Task Force (EITF) Issue No. 08-1, *Revenue Arrangements with Multiple Deliverables* (ASC 605-25) which provides principles and application guidance on whether multiple deliverables exist, how the arrangement should be separated, and how the consideration should be allocated. It also requires an entity to allocate revenue in an arrangement using estimated selling prices of deliverables if a vendor does not have vendor-specific objective evidence or third-party evidence of the selling price. The guidance eliminates the use of the residual method, requires entities to allocate revenue using relative pricing and significantly expands the disclosure requirements for multiple-deliverable revenue arrangements.

Also in September 2009, the FASB ratified ASU 2009-14 (previously EITF Issue No. 09-3, *Certain Revenue Arrangement That Include Software Elements*). ASU 2009-14 modifies the scope of Software Revenue Recognition remove tangible products from the scope of the software revenue guidance if the products contain both software and non-software components that function together to deliver a product's essential functionality, and provides guidance on determining whether software deliverables in an arrangement that includes a tangible product are within the scope of the software revenue guidance.

Both ASU 2009-13 and ASU 2009-14 have the same disclosure requirements, effective date, and transition methods. They are effective on a prospective basis for revenue arrangements entered into or materially modified in fiscal years beginning on or after June 15, 2010. Alternatively, an entity can elect to adopt on a retrospective basis. Early application is permitted; however, entities must adopt both ASU 2009-13 and ASU 2009-14 in the same period using the same transition method. In the initial year of application, companies are required to make qualitative and quantitative disclosures about the impact of the changes. The Company is currently evaluating the potential impact, if any, of these two standards and whether it will adopt the standards early.

In June 2009, the FASB issued SFAS No. 168, *The FASB Accounting Standards Codification and the Hierarchy of Generally Accepted Accounting Principles – a replacement of FASB Statement 162* (SFAS 168), as codified by ASC 105 *Generally Accepted Accounting Principles* (ASC 105). In this standard, the FASB Accounting Standards Codification was established as the single source of authoritative accounting principles to be applied to financial statements of nongovernmental entities in conformity with U.S. General Accepted Accounting Principles. This standard is effective for financial statements issued for interim and annual periods ended after September 15, 2009. The provisions of this code are reflected in this Form 10-Q for the period ended September 26, 2009.

In April 2009, the FASB issued FSP FAS 157-4, *Determining Fair Value When the Volume and Level of Activity for the Asset or Liability Have Significantly Decreased and Identifying Transactions That Are Not Orderly* (FSP 157-4), which amends SFAS No. 157, *Fair Value Measurements* (SFAS 157), as codified by ASC 820 *Fair Value Measurement* (ASC 820). This standard provides additional guidance on estimating fair value when the volume and level of activity for an asset or liability have significantly decreased and is effective for interim and annual reporting periods ended after June 15, 2009. The Company's adoption of this standard did not affect the Company's consolidated results of operations or financial condition.

In April 2009, the FASB issued FSP SFAS No. 141(R)-1, *Accounting for Assets Acquired and Liabilities Assumed in a Business Combination That Arise from Contingencies*, as codified by ASC 805 *Business Combination* (ASC 805). This standard amends the provisions related to the initial recognition and measurement, subsequent measurement and disclosure of assets and liabilities arising from acquired contingencies in a business combination, thereby requiring that such contingencies be recognized at fair value on the acquisition date if fair value can be reasonably estimated during the allocation period. Otherwise, entities would typically account for the acquired contingencies in accordance with SFAS No. 5, *Accounting for Contingencies*, as codified by ASC 450 *Contingencies*. This standard applies prospectively to business combinations for which the acquisition date is on or after the beginning of the first annual reporting period beginning on or after December 15, 2008, or the first quarter of 2009. On June 17, 2009, the Company completed a business combination with Zygo Corporation as discussed in Note 4, which is accounted for in accordance with ASC 805.



**Table of Contents**

**NANOMETRICS INCORPORATED**

**NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)**

**(Unaudited)**

In June 2008, the FASB issued FASB Staff Position EITF 03-6-1, *Accounting for Determining Whether Instruments Granted in Share-Based Payment Transactions Are Participating Securities*, as codified by ASC 260 *Determining Whether Instruments Granted in Share-Based Payment Transactions Are Participating Securities* (ASC 260). This standard addresses whether participating share based payment awards, that contain non-forfeitable rights to dividends or dividend equivalents (paid or unpaid) prior to vesting, should be included in the computation of earnings per share under the two-class method. This standard is effective for financial statements issued for fiscal years beginning after December 15, 2008. The Company's adoption of this standard did not affect the Company's consolidated results of operations or financial condition.

In December 2007, the FASB issued SFAS 141 (R), *Business Combinations* (SFAS 141(R)), as codified by ASC 805 *Business Combinations* (ASC 805). In this standard, an acquiring entity will be required to recognize all the assets acquired and liabilities assumed in a transaction at the acquisition-date fair value with limited exceptions. The accounting treatment for certain specific items will change: acquisition costs will generally be expensed as incurred, non-controlling interests will be valued at fair value at the acquisition date, acquired contingent liabilities will be recorded at fair value at the acquisition date and subsequently measured at either the higher of such amount or the amount determined under existing guidance for non-acquired contingencies, in-process research and development will be recorded at fair value as an indefinite-lived intangible asset at the acquisition date, restructuring costs associated with a business combination will be generally expensed subsequent to the acquisition date, and changes in the deferred tax asset valuation allowances and income tax uncertainties after the acquisition date generally will affect income tax expense. This standard also includes a substantial number of new disclosure requirements. The standard applies prospectively to business combinations for which the acquisition date is on or after the beginning of the first annual reporting period beginning on or after December 15, 2008, or the first quarter of 2009. Earlier adoption is prohibited. On June 17, 2009 the Company completed a business combination with Zygo Corporation as discussed in Note 4, which is accounted for in accordance with ASC 805.

**Note 3. Fair Value Measurements and Disclosures**

SFAS 157, *Fair Value Measurement*, as codified by ASC 820 *Fair Value Measurements and Disclosures* (ASC 820) defines fair value as the price that would be received to sell an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. The standard assumes that the transaction to sell the asset or transfer the liability occurs in the principal or most advantageous market for the asset or liability and establishes that the fair value of an asset or liability shall be determined based on the assumptions that market participants would use in pricing the asset or liability.

***Fair Value Hierarchy***

The Company determines the fair values of its financial instruments based on the fair value hierarchy established in ASC 820, which requires an entity to maximize the use of observable inputs and minimize the use of unobservable inputs when measuring fair value. The classification of a financial asset or liability within the hierarchy is based upon the lowest level input that is significant to the fair value measurement. The fair value hierarchy prioritizes the inputs into three levels that may be used to measure fair value:

*Level 1* Quoted prices in active markets for identical assets or liabilities.

*Level 2* Inputs other than Level 1 that are observable, either directly or indirectly, such as quoted prices for similar assets and liabilities in active markets or inputs that are observable for the asset or liability, either directly or indirectly through market corroboration, for substantially the full term of the financial instrument.

*Level 3* Unobservable inputs that are supported by little or no market activity and are significant to the fair value of the assets or liabilities. Such unobservable inputs include an estimated discount rate used in our discounted present value analysis of future cash flows, which reflects our estimate of debt with similar terms in the current credit markets. As there is currently minimal activity in such markets, the actual rate could be materially different.

## Edgar Filing: NANOMETRICS INC - Form 10-Q

The Company adopted this standard for financial assets and liabilities at the beginning of its fiscal year 2008 on December 30, 2007, and for non-financial assets and liabilities at the beginning of its fiscal year 2009 on December 28, 2008.

As of September 26, 2009, the Company has a liability of \$5.4 million resulting from the acquisition of certain assets from Zygo Corporation ( Zygo ) which is measured at fair value on a recurring basis. Of that amount, \$3.2 million is included in other current liabilities and \$2.2 million is included in other long-term liabilities on the Company s condensed consolidated balance sheet. The fair value of this liability was determined using level 3 inputs.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

Other financial instruments include cash and cash equivalents, accounts receivable, accounts payable and debt obligations. Cash equivalents are stated at fair market value based on quoted market prices. The carrying values of accounts receivable and accounts payable approximate their fair values because of the short term maturity of these financial instruments. The carrying value of long-term debt obligations approximates their fair value because the interest rate is fixed with a reset provision after five years.

**Note 4. Acquisitions*****Zygo acquisition***

On June 17, 2009 ( acquisition date ), Nanometrics announced that it had purchased inventory and certain other assets of Zygo Corporation and that the two companies had entered into a supply agreement. The terms of the agreement is an exclusive OEM arrangement in which Zygo Corporation will provide interferometer sensors to Nanometrics for incorporation into the Unifire line of products as well as Nanometrics family of automated metrology systems. The arrangement is structured as an asset transfer and exclusive OEM supply agreement aimed at wafer-based markets. Nanometrics will assume all inventory and customer sales and support responsibilities and Zygo will provide measurement sensors for integration by Nanometrics. By completing this acquisition, Nanometrics anticipates expanding its served markets to include the high end of dimensional control metrology for the rapidly-growing back-end-of-line packaging market, while also enhancing our product offerings to front-end-of-line metrology customers. In addition to the applications currently addressed by Nanometrics and Zygo products, the business partnership allows for the joint development of additional technology solutions targeted at the semiconductor and related industries. This transaction met the conditions of a business combination as defined in SFAS ASC 805, and as such is accounted for under ASC 805. The results from the Unifire line of business were included in the Company's condensed consolidated statements of operations from the acquisition date.

The following table summarizes the fair value of consideration recorded and the fair value of acquired assets:

Fair value of purchase consideration transferred \$5,092 (in thousands):

	<b>Amounts</b>
<b>Assets acquired:</b>	
Inventories raw materials	\$ 2,014
Property, plant and equipment machinery and equipment	1,378
 Total assets acquired:	 3,392
<b>Other intangible assets:</b>	
Developed technology	1 362
Customer relationships	338
 Total other intangible assets:	 1,700
 <b>Net assets acquired</b>	 <b>\$ 5,092</b>

The fair value of the purchase consideration at the time of the acquisition for the assets acquired was \$5.1 million, which consisted of deferred payments to Zygo for inventory and fixed assets, as well as future royalty and sustaining engineering support fees. The future royalty and sustaining engineering support fees are considered contingent consideration. The acquisition did not involve any cash payments to Zygo. On the acquisition date, the fair value of purchase consideration transferred including contingent consideration was recorded as a liability on the Company's condensed consolidated balance sheet, with \$3.1 million current and \$2.0 million long-term. The fair value of the purchase

## Edgar Filing: NANOMETRICS INC - Form 10-Q

contingent consideration is evaluated each reporting period with an appropriate adjustment to the recorded liability if required. As of September 26, 2009, the Company increased the fair value of the purchase contingent consideration by \$0.3 million. The increase in fair value of the liabilities was due entirely from accrued interest charges. There were no payments made for the liabilities during the third quarter.

The Company will be required to make payments to Zygo after each sale of the Company's product which incorporates inventory acquired from Zygo. If the Company has not sold sufficient products which incorporate the acquired inventory from Zygo, within one year from the date of the acquisition, the Company must remit the remaining unpaid portion relating to inventory and fixed assets at that time.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

The fair value of the purchase consideration relating to the inventory and fixed assets was determined using an analysis based on management's expected revenue from products which incorporate the acquired inventory from Zygo, discounted by 20 percent to arrive at the present value.

The fair value of the future royalty and sustaining engineering support fees was determined using a relief from royalty method based on the following: (a) amount of the acquired assets that business will generate, (b) a discount rate of 20 percent was utilized to adjust the purchase price payments to the present, based on the consideration of both a weighted average cost of capital calculation and venture capital rates. The Company will pay Zygo a royalty based on net revenues of approved products and the expected sustaining engineering payments based on volumes of heads purchased from Zygo starting in 2010 and over a 10 year period. The range of the undiscounted amounts Nanometrics could pay under the contingent consideration discussed here ranges from \$3.4 million to \$10.2 million.

The fair value of inventory acquired is \$2.0 million consisting of raw materials. Recent purchases of raw material were considered a reasonable proxy for fair value. The fair value of demonstration equipment is \$1.4 million as determined by considering the purchase date and recent usage of the products. Fair value of developed technology of \$1.4 million and customer relationships of \$0.3 million were determined by similar methodology used above for the contingent consideration, with the following assumptions of (a) royalty rate of 3 percent, and (b) discount rate of 30 percent, and have definite lives amortizable over a period of 10 years on a straight-line basis and accelerated basis amortized over a two-year period, respectively. The amortization expense of \$0.1 million was recorded for the acquired intangible assets from the Zygo transaction for the quarter ended September 26, 2009.

A total of \$0.2 million of legal expenses were incurred related to the net asset purchase and supply agreement of Zygo. These acquisition-related expenses are included in general and administrative expense of the condensed consolidated statement of operations. Such acquisition-related costs are treated as goodwill for tax purposes and are expected to be deductible for tax purposes.

The acquired Zygo business contributed no revenues and a net loss of \$0.9 million to the consolidated results of operations for the period from June 17, 2009 to September 26, 2009. The following unaudited pro forma summary presents consolidated information of Nanometrics as if the business combination had occurred at the beginning of the respective periods (in thousands):

	Pro Forma Three-Months Ended		Pro Forma Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
Net revenues	\$ 25,814	\$ 23,159	\$ 52,545	\$ 84,607
Net income (loss)	1,571	(62,743)	(19,751)	(86,446)
Net loss per share:				
Basic	\$ 0.08	\$ (3.38)	\$ (1.07)	\$ (4.65)
Diluted	\$ 0.08	\$ (3.38)	\$ (1.07)	\$ (4.65)

***Tevet acquisition***

On May 19, 2008, Nanometrics announced that it had acquired Tevet Process Control Technologies, Ltd., (Tevet) an Israel-based privately held corporation. The acquisition of Tevet, an integrated metrology company serving the worldwide semiconductor and solar manufacturing industry, is expected to further Nanometrics' strategy to offer a breadth of process control metrology solutions that address both advanced technology as well as cost of ownership. Under the terms of the asset purchase agreement, which was an all-cash transaction, the total consideration to purchase all assets and assume specified liabilities of Tevet was \$3.6 million, including \$0.2 million in transaction fees, which include legal, valuation and accounting fees. Under the purchase method of accounting, the total estimated purchase price is allocated to the net tangible and identifiable intangible assets of Tevet acquired in connection with the transaction, based on their respective estimated fair values. The results of operations of Tevet were included in the Company's consolidated statements of operations from the date of the acquisition. The final allocation of the Tevet purchase price is summarized below (in thousands):



**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

	<b>Amounts</b>
<b>Assets acquired:</b>	
Cash	\$ 448
Accounts receivable	12
Inventories	467
Other assets	24
Property, plant and equipment	62
<b>Total assets acquired:</b>	<b>1,013</b>
<b>Liabilities assumed:</b>	
Accounts payable	129
Deferred revenue	250
Other accrued liabilities	393
<b>Total liabilities assumed</b>	<b>772</b>
<b>Net assets acquired</b>	<b>241</b>
<b>Goodwill and other intangible assets:</b>	
Goodwill	1,848
Developed technology	1,269
Backlog	230
<b>Total goodwill and other intangible assets:</b>	<b>3,347</b>
<b>Net purchase price</b>	<b>\$ 3,588</b>

The purchase price of \$3.6 million was finalized on the escrow close date of April 7, 2009. A settlement of \$0.2 million was received from Tevet by the Company at the escrow close date. The developed technology and backlog are being amortized over their estimated useful lives of seven years and one year, respectively. In the third quarter of 2008, \$1.8 million in goodwill arising from the Tevet acquisition was written off.

If the Company had acquired Tevet at the beginning of the periods presented, the Company's unaudited pro forma net revenues, net income (loss) and net income (loss) per share from operations would have been as follows (in thousands, except per share amounts):

	<b>Pro Forma</b>	
	<b>Three Months Ended</b>	<b>Nine Months Ended</b>
	<b>September 27,</b>	<b>September 27,</b>
	<b>2008</b>	<b>2008</b>
Net revenues	\$ 23,137	\$ 82,447
Net loss	(60,447)	(80,545)
<b>Net loss per share:</b>		
Basic	\$ (3.25)	\$ (4.33)
Diluted	\$ (3.25)	\$ (4.33)

**Note 5. Asset Held for Sale**

## Edgar Filing: NANOMETRICS INC - Form 10-Q

In May 2009, the management of Nanometrics decided to close the Pyeongtek, Korea manufacturing facility due to the prevailing industry and economic conditions facing the semiconductor industry. The premises have effectively been vacated prior to the end of the second quarter 2009 with the Company actively pursuing the sale of the facility and related manufacturing assets as of this date. The facility in Korea met all the requirements as long-lived assets that is held for sale on September 26, 2009, and the Company ceased recording depreciation on the facility at that time. The fair value of the Korea manufacturing facility was determined using a cost approach and a sale comparison approach. The cost approach uses the characteristics of the facility to determine the cost of replacement if the facility were new, adjusted for depreciation to date considering the age of the facility. The sale comparison approach considers market comparable sales activity. An average of the two approaches was used to determine the facility fair value of approximately \$0.2 million, which included an estimate for selling costs at 10% of the building fair value. An impairment loss of \$1.9 million was recorded on the Korea facility for the second quarter of 2009. There were no changes in the third quarter of 2009 to the recorded value as the Company actively continues to market the Korea facility for sale.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)****Note 6. Restructuring Charge**

In the first and second quarters of 2009, the Company reduced the global workforce by 51 and 25 employees, respectively, and recorded a restructuring charge of \$0.7 million and \$0.4 million in each respective quarter. Twelve (12) of the employees terminated in the second quarter of 2009 were in connection with the Korea manufacturing facility closure. The Company did not record a restructuring charge in the third quarter of 2009 (in thousands):

		Other Charges	Severance and Other Benefits	Total
Restructuring charges	First Quarter of 2008	\$ 84	\$ 786	\$ 870
Restructuring charges	Third Quarter of 2008		655	655
Cash paid		(84)	(1,361)	(1,445)
Reserve balance at December 27, 2008			80	80
Restructuring charges	First Quarter of 2009		689	689
Cash paid			(769)	(769)
Reserve balance at March 28, 2009				
Restructuring charges	Second Quarter of 2009		445	445
Cash paid			(445)	(445)
Reserve balance at June 27, 2009				
Restructuring charges	Third Quarter of 2009			
Cash paid				
Reserve balance at September 26, 2009		\$	\$	\$

**Note 7. Accounts Receivable**

The Company maintains arrangements under which eligible accounts and notes receivable are sold without recourse to unrelated third-party financial institutions. These receivables were not included in the consolidated balance sheets as the criteria for sale treatment established by SFAS No. 140, *Accounting for Transfers and Servicing of Financial Assets and Extinguishments of Liabilities*, ( SFAS 140 ), as codified by ASC 860 had been met. In this standard, after a transfer of financial assets, an entity stops recognizing the financial assets when the control has been surrendered. The Company's sale of accounts receivable met the criteria of a true sale of these assets since the acquiring party retained the title to these receivables and had assumed the risk that the receivables will be collectible. The Company pays administrative fees as well as interest at rates ranging from 1.48 % to 1.74% based on the anticipated length of time between the date the sale is consummated and the expected collection date of the receivables sold. The Company sold \$0.8 million and \$5.3 million of receivables, respectively, during the three and nine months periods ended September 26, 2009 and sold \$5.9 million and \$16.4 million of receivables, respectively, during the three month and nine months ended September 27, 2008. There were no material gains or losses on the sale of such receivables. There were no amounts due from the financial institutions at September 26, 2009 and December 27, 2008.

**Note 8. Inventories**

Inventories are stated at the lower of standard cost (which approximates actual cost on a first-in, first-out basis), or market and consist of the following (in thousands):

Edgar Filing: NANOMETRICS INC - Form 10-Q

	<b>September 26, 2009</b>	<b>December 27, 2008</b>
Raw materials and sub-assemblies	\$ 20,189	\$ 19,113
Work in process	2,854	3,662
Finished goods	8,083	8,808
 Total inventories	 \$ 31,126	 \$ 31,583

We reflect the cost of systems that were invoiced upon shipment but deferred for revenue recognition purposes separate from our inventory held for sale as Inventories delivered systems.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)****Note 9. Property, Plant and Equipment**

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

	September 26, 2009	December 27, 2008
Land	\$ 15,582	\$ 15,577
Building and improvements	18,578	20,973
Machinery and equipment	13,507	15,427
Furniture and fixtures	2,298	2,142
Capital in progress	3,086	2,940
Total property, plant and equipment, gross	53,051	57,059
Accumulated depreciation and amortization	(15,671)	(16,923)
Total property, plant and equipment, net	\$ 37,380	\$ 40,136

During the second quarter of fiscal year 2009, the Company closed its manufacturing facility in Korea and moved certain inventories and machinery and equipments to its headquarters in Milpitas, California. The Company is actively seeking buyers for the manufacturing facility in Korea. As a result of the closure, a \$1.9 million impairment of building and improvements and machinery and equipment was recorded for the quarter ended June 27, 2009. Based on management's estimate, the net realizable fair value of the building and improvements is \$0.2 million, net of selling costs, and is classified as asset held for sale in the Condensed Consolidated Balance Sheet as of September 26, 2009.

**Note 10. Intangible Assets**

On June 17, 2009, Nanometrics announced that it had purchased inventory and certain other assets of Zygo Corporation and that the two companies have entered into a supply agreement, as a result, the Company recorded \$1.4 million of developed technology and \$0.3 million of customer relationships, during second quarter period of 2009. The Company will amortize the developed technology on a straight line basis over a period of ten years and the customer relationships on an accelerated basis over a period of two years from the date of acquisition.

Finite-lived intangible assets are recorded at cost, less accumulated amortization. Finite-lived intangible assets as of September 26, 2009 consist of the following (in thousands):

	Original amount	Impairment and tax adjustment during 2008	Adjusted basis as of December 27, 2008	Additions during 2009	Accumulated amortization during 2009	Net carrying amount as of September 27, 2009
Developed technology	\$ 11,069	\$ (3,750)	\$ 7,319	\$ 1,362	\$ (3,719)	\$ 4,962
Customer relationships	15,700	(7,517)	8,183	338	(6,767)	1,754
Brand names	3,600	(1,673)	1,927		(1,196)	731
Patented technology	1,790		1,790		(1,790)	
Trademark	400	(320)	80		(50)	30

Edgar Filing: NANOMETRICS INC - Form 10-Q

Backlog	3,361		3,361		(3,361)
Non-compete agreement	50		50		(50)
Other	250		250		(250)
<b>Total</b>	<b>\$ 36,220</b>	<b>\$ (13,260)</b>	<b>\$ 22,960</b>	<b>\$ 1,700</b>	<b>\$ (17,183)</b>
					<b>\$ 7,477</b>

The amortization of finite-lived intangibles is computed using the straight-line method except for customer relationships which is computed using an accelerated method. Estimated lives of finite-lived intangibles range from five to ten years, except for the non-compete agreement and backlog which were amortized over one year. Total amortization expense for the three month periods ended September 26, 2009 and September 27, 2008 was \$0.4 million and \$0.6 million, respectively, and for the nine month periods ended September 26, 2009 and September 27, 2008 was \$1.1 million and \$3.2 million, respectively.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

The estimated future amortization expense as of September 26, 2009 is as follows (in thousands):

<b>Fiscal Years</b>	
2009 (remaining three months)	\$ 379
2010	1,557
2011	1,319
2012	1,112
2013	951
2014	809
Thereafter	1,350
<b>Total amortization</b>	<b>\$ 7,477</b>

**Note 11. Other Current Liabilities**

Other current liabilities consist of the following (in thousands):

	<b>September 26, 2009</b>	<b>December 27, 2008</b>
Accrued warranty	\$ 1,258	\$ 2,075
Accrued professional services	1,076	883
Fair value of deferred payments to Zygo Corporation related to acquisition (Note 4)	3,233	
Other	1,241	2,842
<b>Total other current liabilities</b>	<b>\$ 6,808</b>	<b>\$ 5,800</b>

**Note 12. Line of Credit and Debt Obligations**

Debt obligations consist of the following (in thousands):

	<b>September 26, 2009</b>	<b>December 27 2008</b>
<b>Line of Credit</b>		
Borrowing from Line of Credit	\$ 3,500	\$
<b>Debt Obligations</b>		
Milpitas building mortgage	13,168	13,400
Equipment financing	7	96
<b>Total debt obligations</b>	<b>13,175</b>	<b>13,496</b>
Current portion of debt obligations	(347)	(413)

## Edgar Filing: NANOMETRICS INC - Form 10-Q

Long-term debt obligations	\$ 12,828	\$ 13,083
----------------------------	-----------	-----------

At the end of the third quarter of 2009, the Company borrowed \$3.5 million against our outstanding \$15.0 million line of credit. The effective interest rate on borrowings as of September 26, 2009 is 6.11%, which is the bank's prime rate of 3.36%, plus 2.75%. The minimum borrowing interest rate is 5.75 % per annum. The maximum borrowing allowed on the line of credit is \$15.0 million. Borrowing is limited to the lesser of (a) \$7.5 million plus the Borrowing Base or (b) \$15.0 million. The Borrowing Base is calculated based on eligible receivables (determined by a formula considering specific customers, concentration of receivables, letters of credit, and the other factors) and was \$15.5 million as of September 26, 2009. Since \$3.5 million had been borrowed, as a result \$11.5 million was available for borrowing as of September 26, 2009.

The Company is not in breach of any restrictive covenants in connection with its line of credit and all debt obligations.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

At September 26, 2009, future annual maturities of all debt obligations were as follows (in thousands):

2009 (remaining three months)	\$ 92
2010	343
2011	3,868
2012	396
2013	426
2014	458
Thereafter	11,092
<b>Total</b>	<b>\$ 16,675</b>

**Note 13. Stockholders' Equity**

**Net Income (Loss) Per Share** Basic net income (loss) per share is computed by dividing net income (loss) by the weighted average common shares outstanding for the period. Diluted net income per shares gives effect to all potentially dilutive common shares outstanding during the period, including contingently issuable shares and certain stock options, calculated using the treasury stock method. A reconciliation of the share denominator of the basic and diluted net income (loss) per share computations is as follows (in thousands):

	<b>Three Months Ended</b>		<b>Nine Months Ended</b>	
	<b>September 26, 2009</b>	<b>September 27, 2008</b>	<b>September 26, 2009</b>	<b>September 27, 2008</b>
Weighted average common shares outstanding used in basic net loss per share calculation	18,598	18,574	18,513	18,599
Potential dilutive common stock equivalents, using treasury stock method	800			
<b>Shares used in diluted net income (loss) per share computation</b>	<b>19,398</b>	<b>18,574</b>	<b>18,513</b>	<b>18,599</b>

For the three month period ended September 26, 2009 and September 27, 2008, the Company had securities outstanding which could potentially dilute basic earnings per share in the future, which were excluded from the computation of diluted net loss per share in the periods presented as their impact would have been anti-dilutive. Weighted average common share equivalents, consisting of stock options excluded from the calculation of diluted net loss per share were 2.3 million and 2.5 million in the three and nine month periods ended September 26, 2009 and 3.0 million and 2.8 million for three and nine month periods ended September 27, 2008.

During the third fiscal quarter of 2007, the Company's Board of Directors authorized a stock repurchase program pursuant to which the Company may repurchase up to \$4.0 million of its common stock. During the fiscal year 2009, the Company did not repurchase common shares in the open market. For three and nine month periods ended September 27, 2008, the Company repurchased 385,507 and 461,057 common shares, at an average price of \$3.37 and \$3.98 per share, respectively. At September 26, 2009, \$1.3 million remained available for the future purchase of shares of common stock.

**Note 14. Stock-Based Compensation**

## Edgar Filing: NANOMETRICS INC - Form 10-Q

Stock-based compensation expense for all share-based payment awards made to the Company's employees and directors pursuant to the employee stock option and employee stock purchase plans are as follows (in thousands):

	Three Months Ended		Nine Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
Cost of products	\$ 78	\$ 115	\$ 30	\$ 251
Cost of service	30	116	136	301
Research and development	218	216	330	527
Selling	142	186	421	592
General and administrative	384	505	656	1466
 Total stock-based compensation expense	 \$ 852	 \$ 1,138	 \$ 1,573	 \$ 3,137

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

The fair value of each option award is estimated on the date of grant using the Black-Scholes valuation model and the assumptions noted in the following table. The expected term of options granted was calculated using the simplified method. The risk-free rate is based on the U.S. Treasury rates in effect during the corresponding period of grant. The expected volatility is based on the historical volatility of Nanometrics stock price. The dividend yield reflects that the Company has not paid any cash dividends since inception and does not intend to pay any cash dividends in the foreseeable future. The assumptions in the following table do not include the assumptions used in the Option Exchange Program.

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
<b>Stock Options</b>				
Expected life	3.68 years	3.94 years	3.92 years	4.20 years
Volatility	70.20%	55.18%	65.49%	54.42%
Risk free interest rate	1.74%	2.97%	1.91%	2.97%
<b>Dividends</b>				
<b>Employee Stock Purchase Plan</b>				
Expected life	0.5 years	0.5 years	0.5 years	0.5 years
Volatility	89.56%	72.93%	89.56%	72.93%
Risk free interest rate	0.94%	1.64%	0.94%	1.64%
Dividends				

The weighted average fair value per share of the stock options awarded in the three and nine month periods ended September 26, 2009 was \$1.80 and \$1.11, respectively, based on the fair market value of the Company's common stock on the grant dates.

A summary of activity under the Company's stock option plans during the quarter ended September 26, 2009 is as follows:

	Shares Available for Grant (Options and RSUs )	Number of Shares Outstanding (Options)	Weighted Average Exercise Price	Weighted Average Remaining Contractual Term (Years)	Aggregate Intrinsic Value (in Thousands)
<b>Options</b>					
Outstanding at December 27, 2008	1,665,043	3,562,437	\$ 7.29	5.1	\$ 176
Exercised		(29,535)			
Granted	(554,338)	554,338			
Restricted Stock Units Allocation	(26,000)				
Cancelled	848,195	(876,157)			
<b>Outstanding at September 26, 2009</b>	<b>1,932,900</b>	<b>3,211,083</b>	<b>\$ 5.71</b>	<b>5.2</b>	<b>\$ 6,076</b>
<b>Exercisable at September 26, 2009</b>		<b>1,705,513</b>	<b>\$ 7.64</b>	<b>4.4</b>	<b>\$ 1,296</b>

## Edgar Filing: NANOMETRICS INC - Form 10-Q

During the third quarter of 2009, the Company did not grant Restricted Stock Units ( RSUs ). As of September 26, 2009, there were 49,331 Restricted Stock Units outstanding. The Company's Restricted Stock Units vest pursuant to the following schedule; one-third of the grant vests on the one year anniversary of the Vesting Commencement date and an additional one-third of the Restricted Stock Units vest on each annual anniversary thereafter for a total vesting period of three years.

Prior to December 2008, the majority for options granted by the Compensation Committee vested at a rate of  $33\frac{1}{3}$  percent over the first three years of the seven-year option term on each of the first, second and third anniversary of such grants. Starting in December 2008, the majority of the options granted for employees employed for less than one year vest one-third ( $1/3^{\text{rd}}$ ) of the shares subject to the option on the first anniversary of the grant date, and vest one thirty sixth ( $1/36^{\text{th}}$ ) each month for the following two years, for a total three year vesting period with a seven-year option term. Starting in November 2008, the majority of the options granted for employees employed for more than one year vest one thirty-sixth ( $1/36^{\text{th}}$ ) of the shares subject to the options in equal monthly installments starting on the monthly anniversary of the date of grant with a seven-year option term.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

The aggregate intrinsic value in the preceding table represents the total pretax intrinsic value, based on the Company's closing stock price of \$6.40 as of September 26, 2009, which would have been received by the option holders had all option holders exercised their options as of that date. The total intrinsic value of options exercised during the three and nine month periods ended September 26, 2009 was \$0.1 million and \$0.1 million respectively, and for the three and nine month periods ended September 27, 2008 was \$0.1 million. The fair value of options vested for the three and nine month period ended September 26, 2009 was \$0.7 million and \$2.9 million, respectively, and for the three and nine month periods ended September 27, 2008 was \$1.7 million and \$3.4 million, respectively.

In September 2009, the Company completed an offer to exchange certain employee stock options under Nanometrics' Option Exchange Program (the Option Exchange Program). Under the Option Exchange Program, certain previously granted options were exchanged by eligible option holders for new options with a lower exercise price using the following exchange ratios: a) 2 replacement options were provided for every 3 options surrendered with an original exercise price less than or equal to \$10.00, and b) 1 replacement option was provided for every 2 options surrendered with an original exercise price greater than \$10.00.

As a result of the Option Exchange Program, a total of 448,945 options to purchase shares of common stock were tendered for exchange, and 237,838 options to purchase shares of common stock were issued. A total of 103 employees participated in the Option Exchange Program. Options granted pursuant to the Option Exchange Program have an exercise price of \$7.50 based on the NASDAQ closing price of the Company's common stock on September 3, 2009. For options granted pursuant to the Option Exchange Program, one third vested immediately on the re-grant date, and the remaining two thirds will vest on a monthly basis beginning on the 13th month anniversary through the 36th month anniversary provided that the individual remains employed by the Company during that period. The incremental stock based compensation from the Option Exchange Program was \$0.2 million which will be recorded ratably over the requisite service period of three years.

**Note 15. Comprehensive Income (Loss)**

The Company's comprehensive income (loss) was as follows (in thousands):

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
Net income (loss)	\$ 1,571	\$ (60,447)	\$ (16,023)	\$ (80,085)
Foreign currency translation adjustments, net of tax	(196)	(1,551)	1,497	(1,873)
Total comprehensive income (loss)	\$ 1,375	\$ (61,998)	\$ (14,526)	\$ (81,958)

Substantially all of the accumulated other comprehensive income reflected as a separate component of stockholders' equity consists of accumulated foreign currency translation adjustment for all periods presented.

**Note 16. Warranties**

*Product Warranty* The Company sells the majority of its products with a 12-month repair or replacement warranty from the date of acceptance which generally represents the date of shipment. The Company provides an accrual for estimated future warranty costs based upon the historical relationship of warranty costs to the cost of products sold. The estimated future warranty obligations related to product sales are recorded in the period in which the related revenue is recognized. The estimated future warranty obligations are affected by the warranty periods, sales volumes, product failure rates, material usage, and labor and replacement costs incurred in correcting a product failure. If actual product failure rates, material usage, labor or replacement costs differ from the Company's estimates, revisions to the estimated warranty obligations would be required. For new product introductions where limited or no historical information exists, the Company may use warranty information from

## Edgar Filing: NANOMETRICS INC - Form 10-Q

other previous product introductions to guide it in estimating its warranty accrual. The warranty accrual represents the best estimate of the amount necessary to settle future and existing claims on products sold as of the balance sheet date. The Company periodically assesses the adequacy of its reported warranty reserve and adjusts the amounts in accordance with changes in these factors. Components of the warranty accrual, which was included in the accompanying consolidated balance sheets with other current liabilities, were as follows (in thousands):

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)**

	<b>Nine Months Ended</b>	
	<b>September 26, 2009</b>	<b>September 27, 2008</b>
Balance as of beginning of period	\$ 2,075	\$ 4,545
Actual warranty costs	(1,882)	(4,226)
Provision for warranty	1,065	2,249
Balance as of end of period	\$ 1,258	\$ 2,568

**Intellectual Property Indemnification Obligations** In addition to product warranties, the Company will, from time to time, in the normal course of business, agree to indemnify certain customers with whom it enters into contractual relationships. The Company has agreed to hold these customers harmless against third party claims that Nanometrics products, when used for their intended purpose(s), infringe the intellectual property rights of such third parties or other claims made against the customer. It is not possible to determine the maximum potential amount of liability under these indemnification obligations due to the limited history of prior indemnification claims and the unique facts and circumstances that are likely to be involved in each particular claim. Historically, the Company has not made payments under these obligations and believes that the estimated fair value of these agreements is minimal. Accordingly, no liabilities have been recorded for these obligations in the accompanying unaudited consolidated balance sheets as of September 26, 2009 and December 27, 2008.

**Note 17. Income Taxes**

For the three month period ended September 26, 2009 the income tax benefit of \$83,000 was the result of foreign tax benefit of \$24,000 and state tax benefit of \$61,000 offset by \$2,000 in United States federal tax expense. For the nine-month period ended September 26, 2009, the income tax benefit of \$463,000 was the result of foreign tax benefit of \$445,000 and state tax expense of \$20,000 offset by \$2,000 United States federal tax expense.

For the three month period ended September 27, 2008 the income taxes provision of \$0.4 million was the result of aggregate charges for potential tax exposure in certain foreign tax jurisdictions of \$0.2 million and \$0.1 million associated with the consolidation of duplicate foreign entities. For the nine-month period ended September 27, 2008 the income taxes provision of \$0.5 million was the result of the aggregate charges for potential tax exposure in certain foreign jurisdictions of \$0.6 million and \$0.1 million associated with the consolidation of duplicate foreign entities, which charge was partially offset by a tax benefit in a certain foreign jurisdiction where sufficient deferred tax liabilities exist to allow for benefiting the operating loss of \$0.2 million, and reduction of a tax contingency of \$0.1 million due to the expiration of local statutes.

**Note 18. Contingencies**

In August 2005, KLA-Tencor Corporation ( KLA ) filed a complaint against the Company in the United States District Court for the Northern District of California. The complaint alleges that certain of the Company's products infringe two of KLA's patents. On January 30, 2006, KLA added a third patent to its complaint. The complaint seeks a preliminary and permanent injunction against the sale of these products as well as the recovery of monetary damages and attorneys' fees. As part of its defense, the Company has filed requests for re-examinations of the allegedly infringed KLA patents with the U.S. Patent & Trademark Office ( PTO ). In March 2006, the Company filed a motion for, and was granted, a stay in the patent litigation case until such re-examinations are completed. On November 4, 2008, the PTO issued a Certificate of Reexamination on one of the three patents-in-suit. On September 3, 2009, the PTO issued a Notice of Intent to Issue a Re-examination Certificate for another of the KLA patents-in-suit. The reexamination of the final KLA patent-in-suit remains pending and on September 21, 2009 the Company filed an additional request for re-examination relating to this patent. In all three of the reexamination proceedings, the PTO has issued Office Actions rejecting numerous claims and KLA has amended the claims in response.

**Table of Contents****NANOMETRICS INCORPORATED****NOTES TO CONDENSED CONSOLIDATED FINANCIAL STATEMENTS (Continued)****(Unaudited)****Note 19. Geographic and Significant Customer Information**

The Company has one operating segment, the Company's operating segment is the sale, design, manufacture, marketing and support of thin film, optical critical dimension and overlay dimension metrology systems. The following table summarizes total net revenues and long-lived assets (excluding intangible assets) attributed to significant countries (in thousands):

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
<b>Total net revenues:</b>				
United States	\$ 6,311	\$ 7,851	\$ 15,196	\$ 23,769
Japan	1,900	6,966	8,803	24,880
South Korea	13,853	3,048	17,970	13,043
Taiwan	1,257	2,498	2,107	5,307
China	1,491	132	2,313	7,115
Europe	414	2,142	2,917	3,799
All other	588	500	1,082	3,713
<b>Total net revenues*</b>	<b>\$ 25,814</b>	<b>\$ 23,137</b>	<b>\$ 50,388</b>	<b>\$ 81,626</b>

\* Net revenues are attributed to countries based on the deployment and service locations of systems.

	September 26, 2009	December 27, 2008
<b>Long lived assets</b>		
United States	\$ 35,689	\$ 35,322
Japan	903	1,138
South Korea	1,258	3,853
Taiwan	71	102
Europe	959	1,152
China	13	17
All Other	180	270
<b>Total long lived assets**</b>	<b>\$ 39,073</b>	<b>\$ 41,854</b>

\*\* Long-lived assets include tangible assets only.

The following customers accounted for 10% or more of total accounts receivable:

Edgar Filing: NANOMETRICS INC - Form 10-Q

	September 26, 2009	September 27, 2008
Hynix Semiconductor, Inc	10.0%	***
Intel Corporation	16.0%	***
Samsung Semiconductor, Inc	49.0%	***
Toshiba Corporation	***	18.9%

\*\*\* The customer accounted for less than 10% of total accounts receivable during the period.  
The following customers accounted for 10% or more of total revenue:

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
Samsung Electronics Co. Ltd.	48.5%	***	31.7%	14.2%
Intel Corporation	14.8%	***	***	***
Toshiba Corporation	***	22.1%	***	12.0%
Hynix Semiconductor, Inc.	***	***	10.7%	***

\*\*\* The customer accounted for less than 10% of revenue during the period.

---

**Table of Contents**

**ITEM 2. MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS**

This Quarterly Report on Form 10-Q contains forward-looking statements that involve risks and uncertainties. The statements contained in this document that are not purely historical are forward-looking statements within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the Securities Exchange Act of 1934, including, without limitation, statements regarding our expectations, beliefs, intentions or strategies regarding our business in future periods. We may identify these statements by the use of words such as anticipate, believe, continue, could, estimate, expect, intend, may, might, plan, potential, predict, project, should, will, would and other similar expressions. All forward-looking statements included in this document are based on information available to us on the date hereof, and we assume no obligation to update any such forward-looking statements, except as may otherwise be required by law.

Our actual results could differ materially from those anticipated in these forward-looking statements as a result of certain risk factors, including those set forth in Part II Item 1A Risk Factors and elsewhere in this document. In evaluating our business, investors should carefully consider these factors in addition to the other information set forth in this document. The occurrence of the events described in the risk factors and elsewhere in this report as well as other risks and uncertainties could materially and adversely affect our business, operating results and financial condition. While management believes that the discussion and analysis in this report is adequate for a fair presentation of the information presented, we recommend that you read this discussion and analysis in conjunction with the (i) audited consolidated financial statements and notes thereto for the year December 27, 2008 which were included in our 2008 Annual Report on Form 10-K filed with the Securities Exchange Commission on March 27, 2009 and (ii) our other filings with the Securities and Exchange Commission.

**Overview**

The semiconductor industry is cyclical in nature and has historically experienced periodic downturns and upturns. Today's leading indicators of changes in customer investment patterns may not be any more reliable than in prior years. Demand for our equipment can vary significantly from period to period as a result of various factors, requirements, and our ability to develop, acquire, and market competitive products. For these and other reasons, our current results of operations may not necessarily be indicative of future operating results.

We are an innovator in the field of metrology systems for the semiconductor manufacturing and other industries. Our systems are designed to precisely monitor film thickness and critical dimensions that are necessary to control the manufacturing process and provide increased production yields and performance.

Capital expenditures by manufacturers of semiconductors, especially in Asia, are critical to our success. Purchases of our systems by these manufacturers are driven by the expected market demand for their new products and new applications. The increasing complexity of the manufacturing processes for semiconductors is an important factor in the demand for our innovative metrology systems, as are the adoption of optical critical dimension (OCD) metrology across fabrication processes, adoption of immersion lithography and double patterning, adoption of new types of thin film materials and the need for improved process control to drive process efficiencies. Our strategy is to continue to innovate organically as well to evaluate strategic acquisitions in order to address business challenges and opportunities. Nanometrics product revenues are made up of the following:

- 1) Our standalone systems are made up of manual, semi-automated and fully automated metrology systems which are employed in high-volume and low-volume production environments. The automated systems incorporate automated material handling interface options for a variety of fabrication automation environments and implement multiple measurement technologies (including film measurement, overlay and OCD) for a broad range of substrate sizes.
- 2) Our integrated metrology systems are installed inside wafer processing equipment to provide near real-time measurements for improving process control and increasing throughput. Our integrated systems offer DUV spectroscopic reflectometry and/or critical dimension measurement technologies. Our integrated metrology systems are sold directly to customers and through our OEM channels.
- 3) Our material characterization systems include manual and semi-automated thin film thickness, critical dimension, defect inspection and composition measurement systems. Each of these measurement systems uses non-destructive, optical techniques to analyze and measure films. These products also include systems that are used to monitor the physical, optical, electrical and material characteristics of compound semiconductor, strained silicon and silicon-on-insulator (SOI) devices, including composition, crystal structure, layer thickness, dopant concentration, contamination and electron mobility.

## **Table of Contents**

Our revenues are primarily derived from product sales but are also derived from customer service and system upgrades for the installed base of our products. In 2008, we derived 74.0% of our total net revenues from product sales and 26.0% of our total net revenues from services.

### ***Important Themes and Significant Trends***

The semiconductor industry is characterized by cyclical growth. Changing trends in the semiconductor industry continue to drive the need for metrology as a major component of manufacturing systems. These trends include;

**Adoption of Advanced Packaging Processes.** Our customers use photolithographic, etching, metallization, and wafer thinning to enable next generation advanced packaging solutions for semiconductor devices. The new packages lead to increased functionality in smaller, less expensive form factors. The advanced packages can be broken down into high density flip chip or bump packages that increase pin density allowing for more complex I/O on advanced CPU parts. Additionally, similar or different devices can be stacked at the wafer level using a Through Silicon Via, or TSV process. The TSV process enables high density small form factor parts, being primarily driven by mobile consumer products (i.e. cellular telephones with integrated CMOS camera sensors). Increasingly advanced packaging technologies are being adopted by our customers.

**Adoption of Optical Critical Dimension Metrology Across Fabrication Processes.** Our customers use photolithographic processes to create patterns on wafers. Critical dimensions must be carefully controlled during this process. In advanced node device definition, additional monitoring of thickness and profile dimensions on these patterned structures at CMP, Etch, and Thin Film processing is driving broader Optical Critical Dimension, or OCD, adoption. Our proprietary OCD systems can provide the critical process control of these circuit dimensions that is necessary for successful manufacturing of these state of the art devices.

**Adoption of Immersion Lithography and Development of Double Patterning for Critical Photolithographic Layers.** In an effort to reduce costs and increase device performance, semiconductor manufacturers are decreasing both the die size and feature size. Both immersion processing and double patterning techniques are being implemented to achieve the requisite device linear dimension and density. The additional rigors of these technologies increase the burden on overlay and registration capability as well as critical dimension monitoring and control. These techniques are shrinking total available process windows faster than the scaling predicted by Moore's Law, resulting in the need for additional metrology and process control for both overlay and OCD systems.

**Adoption of New Types of Thin Film Materials.** The need for ever increasing device circuit speed coupled with lower power consumption has pushed semiconductor device manufacturers to begin the replacement of the traditional aluminum etch back interconnect flows as well as conventional gate dielectric materials, all which drive a broader adoption of thin film and OCD metrology systems. To achieve greater semiconductor device speed, manufacturers have adopted copper in Logic/IDM and it is now proliferating in next generation DRAM and Flash nodes. Additionally, to achieve improved transistor performance in logic devices and higher cell densities in memory devices, new materials including high dielectric constant (or high-k) gate materials are increasingly being substituted for traditional silicon-oxide gate dielectric materials. High-k materials are comprised of complex thin films including layers of hafnium oxide and a bi-layer of thin film metals. Our advanced metrology solutions are required for thickness control of these layers, which is critical to enable the device performance improvements that these new materials allow.

**Need for Improved Process Control to Drive Process Efficiencies.** Competitive forces influencing semiconductor device manufacturers, such as price-cutting and shorter product life cycles, place pressure on manufacturers to rapidly achieve production efficiency. Device manufacturers are using our integrated and standalone metrology systems throughout the fabrication process to ensure that manufacturing processes scale rapidly, are accurate and can be repeated on a consistent basis.

**Reduced Number of Customers.** Because of the escalating cost of 300mm manufacturing facilities, fewer semiconductor manufacturers can afford the significant investment in these next generation facilities. Therefore, fewer opportunities for semiconductors equipment companies exist. Given that the available number of potential customers is decreasing, pre-existing customer relationships, product positioning and critical mass take on greater importance.



---

**Table of Contents****Critical Accounting Policies**

The preparation of our financial statements conforms to accounting principles generally accepted in the United States of America, which requires management to make estimates and judgments in applying our accounting policies that have an important impact on our reported amounts of assets, liabilities, revenue, expenses and related disclosures at the date of our financial statements. On an on-going basis, management evaluates its estimates including, without limitation, those related to bad debts, inventory valuations, warranty obligations and income taxes. Management bases its estimates and judgments on historical experience and on various other factors that are believed to be reasonable under the circumstances, the results of which form the basis for making judgments about the carrying values of assets and liabilities that are not readily apparent from other sources. Actual results may differ from management's estimates. We believe that the application of the following accounting policies requires significant judgments and estimates on the part of management.

**Revenue Recognition** We recognize revenue when persuasive evidence of an arrangement exists, delivery has occurred or services have been rendered, the seller's price is fixed or determinable, and collectability is reasonably assured. Product revenue includes hardware and also software that is incidental to the products as defined pursuant to AICPA Statement of Position ( SOP ) No. 97-2, *Software Revenue Recognition*, as codified by ASC 985-605 *Software Revenue Recognition* (ASC 985-605). We derive revenue from three sources: sales of process control metrology systems, spare part sales and, in certain arrangements, separately stated service contracts. Service revenue includes product upgrades. Our arrangements for sales of our systems often include customer-specified objective acceptance criteria. Our systems include hardware and software that is incidental to the system. We periodically review the software element of our equipment systems in accordance with ASC 985-605 and EITF Issue No. 03-05, *Applicability of SOP 97-22*, also as codified by ASC 985-605, to ascertain that the software continues to be incidental.

For product sales to existing customers, revenue recognition occurs at the time title and risk of loss transfer, which usually occurs upon delivery, if we have reliably demonstrated that the product has successfully met the defined customer specified criteria, and all other recognition criteria has been met. This occurs at the time of shipment, as our terms are FOB shipping point. For initial sales of product where we have not previously met the defined customer acceptance criteria, product revenues are recognized upon the earlier of receipt of written customer acceptance or expiration of the contractual acceptance period. In Japan, where our contractual terms with the customer specify risk of loss and title transfers upon customer acceptance, revenue is recognized upon receipt of written customer acceptance, provided that all other recognition criteria have been met.

All of our products are assembled prior to shipment to our customers. We often perform installation for our customers; however such installation is inconsequential and perfunctory as it may also be performed by third parties and is not considered essential to the functionality of the equipment. Revenue related to spare parts sales is recognized upon shipment and is included as part of service revenue. Service revenue also includes service contracts, and non-warranty and billable repairs of systems, and product upgrades. Whereas service revenue related to service contracts is recognized ratably over the period under contract, service revenue related to billable repairs of systems is recognized as services are performed and service parts are delivered. On occasion, customers request a warranty period longer than our standard 12 month warranty. In those instances where extended warranty services are separately quoted to the customer, we follow the guidance of Financial Accounting Standards Board Technical Bulletin 90-1, *Accounting for Separately Priced Extended Warranty and Product Maintenance Contracts*, as codified by ASC 605 *Revenue Recognition* (ASC 605), and associated revenue is deferred and recognized to income ratably over the term of the contract. Unearned maintenance and service contract revenue is included in deferred revenue. Furthermore, we generally do not provide our customers with any return rights.

The guidance in EITF No. 00-21, *Revenue Arrangements with Multiple Deliverables*, as codified by ASC 605 is considered in cases where certain elements of a sales arrangement are not delivered and accepted at the same time. In such cases, we defer the relative fair value of the undelivered element until that element is delivered and accepted by the customer. In order to recognize revenue associated with delivered elements, the following criteria must be met: (a) the delivered item(s) has value to the customer on a standalone basis; (b) there is objective and reliable evidence of the fair value of the undelivered item(s); and (c) delivery or performance of the undelivered item(s) is considered probable and substantially in our control. If the arrangement does not meet all the above criteria, the entire amount of the sales contract is deferred until the criteria have been met or all elements have been delivered to the customer. Objective and reliable evidence of the fair value is based on the amounts for which we sell equivalent products or services on a standalone basis. Upon recognition of product revenue, a liability is recorded for anticipated warranty costs. Service contracts may be purchased by the customer during or after the warranty period.

**Allowance for Doubtful Accounts** We maintain allowances for estimated losses resulting from the inability of our customers to make required payments. Credit limits are established through a process of reviewing the financial history and stability of our customers. Where appropriate and available, we obtain credit rating reports and financial statements of customers when determining or modifying their credit limits. We regularly evaluate the collectability of our trade receivable balances based on a combination of



---

## **Table of Contents**

factors such as the length of time the receivables are past due, customary payment practices in the respective geographies and our historical collection experience with customers. We believe that our allowance for doubtful accounts reflects our risk associated with smaller rather than larger customers and that our reported allowances are adequate. If however, the financial conditions of customers were to deteriorate, resulting in their inability to make payments, we would assess the necessity to record additional allowances which would result in additional general and administrative expenses being recorded for the period in which such determination was made.

*Inventories* Inventories are stated at the lower of standard cost (which approximates actual cost on a first-in, first-out basis), or market. We are exposed to a number of economic and industry factors that could result in portions of our inventory becoming either obsolete or in excess of anticipated usage, or saleable only for amounts that are less than their carrying amounts. These factors include, but are not limited to, technological changes in our market, our ability to meet changing customer requirements, competitive pressures in products and prices, and the availability of key components from our suppliers. We have established inventory reserves when conditions exist that suggest that our inventory may be in excess of anticipated demand or is obsolete based upon our assumptions about future demand for our products and market conditions. We regularly evaluate our ability to realize the value of our inventory based on a combination of factors including the following: historical usage rates, forecasted sales of usage, product end-of-life dates, estimated current and future market values and new product introductions. For demonstration inventory, we also consider the age of the inventory and potential cost to refurbish the inventory prior to sale. Demonstration inventory is amortized over its useful life and the amortization expense is included in total depreciation and amortization on our cash flow statement. When recorded, our reserves are intended to reduce the carrying value of our inventory to its net realizable value. If actual demand for our products deteriorates, or market conditions are less favorable than those that we project, additional reserves may be required.

*Inventories delivered systems* We reflect the cost of systems that were invoiced upon shipment but deferred for revenue recognition purposes separate from our inventory held for sale as *Inventories delivered systems* .

*Product Warranties* We sell the majority of our products with a twelve-month repair or replacement warranty from the date of acceptance which generally represents the date of shipment. We provide an accrual for estimated future warranty costs based upon the historical relationship of warranty costs to the cost of products sold. The estimated future warranty obligations related to product sales are reported in the period in which the related revenue is recognized. The estimated future warranty obligations are affected by the warranty periods, sales volumes, product failure rates, material usage and labor and replacement costs incurred in correcting a product failure. If actual product failure rates, material usage, labor or replacement costs differ from our estimates, revisions to the estimated warranty obligations would be required. For new product introductions where limited or no historical information exists, we may use warranty information from other previous product introductions to guide us in estimating our warranty accrual. The warranty accrual represents the best estimate of the amount necessary to settle future and existing claims on products sold as of the balance sheet date. We periodically assess the adequacy of our recorded warranty reserve and adjust the amounts in accordance with changes in these factors.

*Goodwill and Intangible Assets* Goodwill is initially recorded when the purchase price paid for an acquisition exceeds the estimated fair value of the net identified tangible and intangible assets acquired. Under Statement of Financial Accounting Standards ( SFAS ) No. 142, as codified by ASC 350 *Intangibles Goodwill and Others*, intangible assets with finite lives are amortized over their useful lives while goodwill and indefinite lived assets are not amortized but tested annually for impairment. Our impairment review process is completed as of the last day of November of each year or whenever events or circumstances occur which indicate that an impairment might have occurred. The standard provides for a two-step approach to determining whether and how much goodwill has been impaired. The first step requires a comparison of the fair value of Nanometrics reporting units (product and service) to its net book value. If the fair value is greater, then no impairment is deemed to have occurred. If the fair value is less, then the second step must be performed to determine the amount, if any, of actual impairment.

The process of evaluating the potential impairment of goodwill is highly subjective and requires significant judgment. In estimating the fair value of Nanometrics, we make estimates and judgments about future revenues and cash flows for each reporting unit. To determine the fair value, our review process includes the income method and is based on a discounted future cash flow approach that uses estimates including the following for each reporting unit: revenue, based on assumed market growth rates and our assumed market share; estimated costs; and appropriate discount rates based on the particular business weighted average cost of capital. Our estimates of market segment growth, our market segment share and costs are based on historical data, various internal estimates and certain external sources, and are based on assumptions that are consistent with the plans and estimates we are using to manage the underlying businesses. Our business consists of both established and emerging technologies and our forecasts for emerging technologies are based upon internal estimates and external sources rather than historical information. We also consider our market capitalization on the dates of our impairment tests in determining the fair value of the respective businesses. As part of the second step in determining the amount of goodwill impairment, if any, we allocate the fair value of the reporting units to all of its assets and liabilities as if the reporting units had been acquired in a business combination and the fair value of the reporting units was

---

**Table of Contents**

the price paid to acquire the reporting unit. The excess of the fair value of each reporting unit over the amount assigned to its assets and liabilities is the implied fair value of goodwill. When impairment is deemed to have occurred, we will recognize an impairment charge to reduce the carrying amount of our goodwill to its implied fair value.

*Income Tax Assets and Liabilities* We account for income taxes based on SFAS 109, *Accounting for Income Taxes*, codified by ASC 740 *Income Taxes* (ASC 740) whereby deferred tax assets and liabilities must be recognized using enacted tax rates for the effect of temporary differences between the book and tax accounting for assets and liabilities. Also, deferred tax assets must be reduced by a valuation allowance if it is more likely than not that a portion of the deferred tax asset will not be realized in the future. We evaluate the deferred tax assets on a quarterly basis to determine whether or not a valuation allowance is appropriate. Factors used in this determination include future expected income and the underlying asset or liability which generated the temporary tax difference. Our income tax provision is primarily impacted by federal statutory rates, state and foreign income taxes and changes in our valuation allowance.

*Stock-Based Compensation* In accordance with ASC 718, *Compensation - Stock Compensation* (ASC 718) *Share Based Payment*, we estimate the value of employee stock options on the date of grant using the Black-Scholes model. The determination of fair value of share-based payment awards on the date of grant using an option-pricing model is affected by our stock price as well as assumptions regarding a number of highly complex and subjective variables. These variables include, but are not limited to the expected stock price volatility over the term of the awards, and actual and projected employee stock option exercise behaviors. The expected term of options granted is calculated based on the simplified method allowed by Staff Accounting Bulletin 107, as codified by ASC 718 and extended by Staff Accounting Bulletin 110, also as codified by ASC 718. The expected volatility is based on the historical volatility of our stock price.

*Restructuring Charge* During the first nine months of 2009 and also during 2008 and 2007, we implemented a restructuring program based on our business strategy and recorded significant accruals in connection with the restructuring program. In connection with the plan we have recorded estimated expenses for severance and other costs. In accordance with SFAS 146 *Accounting for Costs Associated with Exit or Disposal Activities*, as codified by ASC 420 *Exit or Disposal Cost Obligations*, generally costs associated with restructuring activities have been recognized when they are incurred rather than the date of a commitment to an exit or disposal plan. In addition, post-employment benefits accrued for workforce reductions related to restructuring activities are accounted for under SFAS 112, *Employer's Accounting Post-Employment Benefits*, as codified by ASC 712 *Compensation - Nonretirement Postemployment Benefits*. A liability for post-employment benefits is recorded when payment is probable, the amount is reasonably estimable, and the obligation relates to rights that have vested or accumulated. Given the significance and complexity of restructuring activities, and the timing of the execution of such activities, the restructuring process involves periodic reassessments of the estimates made at the time the original decisions were made, including evaluating market conditions for expected disposals of assets and vacancy of space. Although we believe that these estimates accurately reflect the costs of the restructuring programs, actual results may vary or differ, thereby requiring us to record additional provisions or reverse a portion of such provisions.

**Recent Accounting Pronouncements**

See Note 2 of the Unaudited Condensed Consolidated Financial Statements for a description of recent accounting pronouncements, including the respective dates of adoption and effects on results of operations and financial condition.

**Table of Contents****Results of Operations****Periods ended September 26, 2009 and September 27, 2008**

**Total net revenues.** Our net revenues were comprised of the following categories (in thousands):

	Three Months Ended				Nine-Months Ended			
	September 26, 2009	September 27, 2008	Changes In Amount	%	September 26, 2009	September 27, 2008	Changes In Amount	%
Automated Metrology	\$ 13,509	\$ 6,349	\$ 7,160	112.8%	\$ 20,234	\$ 26,161	\$ (5,927)	(22.7)%
Integrated Systems	1,214	7,148	(5,934)	(83.0)%	2,276	15,090	(12,814)	(84.9)%
Material Characterization	1,580	2,814	(1,234)	(43.9)%	6,630	21,493	(14,863)	(69.2)%
Total Product Revenue- (1)	16,303	16,311	(8)	0.0%	29,140	62,744	(33,604)	(53.6)%
Service	9,511	6,826	2,685	39.3%	21,248	18,882	2,366	12.5%
Total Net Revenues	\$ 25,814	\$ 23,137	\$ 2,677	11.6%	\$ 50,388	\$ 81,626	\$ (31,238)	(38.3)%

(1) Please refer to overview, page 20 for full description of product revenues.

For the three and nine month periods ended September 26, 2009, net revenues from automated metrology increased by \$7.2 million and decreased by \$5.9 million from the comparable periods of 2008. The increase in Automated Metrology was largely driven by multi-system orders and technology upgrades from leading worldwide semiconductor companies in both the memory and logic sections, and strong sales of our thin-film and OCD systems, increasing traction with our Caliper overlay product and Lynx platform, and further penetration into high-growth segments such as high-brightness LEDs. Net revenues from our integrated systems decreased by \$5.9 million and \$12.8 million from the comparable periods of 2008, net revenues from our material characterization decreased by \$1.2 million and \$14.9 million from comparable periods of 2008, due mainly to reduced market demand. Sales of our Integrated Systems and our Material Characterization systems are highly dependent on, and driven by, manufacturing companies expanding their capacity. Given the world economic conditions in general these companies have not been expanding their capacity; therefore, sales of our systems into these companies have declined. Product revenues were flat for the three month period ended September 26, 2009 from the comparable period of 2008, and decreased by \$33.6 million for the nine month period ended September 26, 2009 over the comparable period of 2008 which is reflective of global reductions in capital spending by semiconductor manufacturers.

Service revenues increased by \$2.7 million for the three month period ended September 26, 2009 from the comparable period of 2008 due to higher in-the-field tool upgrades, and increased by \$2.4 million for the nine month period ended September 26, 2009 over the comparable period of 2008, which also was due to higher in-the-field tool upgrades.

**Gross margins.** Our gross margin breakdown was as follows (in percent):

	Three-Months Ended		Nine-Months Ended	
	September 26, 2009	September 27, 2008	September 26, 2009	September 27, 2008
Products	48.8%	50.0%	40.8%	50.6%
Services	62.9%	30.0%	51.3%	23.0%

The product gross margin for the three and nine month periods ended September 26, 2009 of 48.8% and 40.8%, respectively, decreased from 50.0% and 50.6% from the comparable periods of 2008. This was the result of lower revenues and also changes in product mix.

**Table of Contents**

The gross margin for our services business increased to 62.9% and 51.3% for the three and nine month periods ended September 26, 2009 as compared to gross margins of 30.0% and 23.0% for the comparable periods of 2008. Two factors contributing to this increase are: (a) a significant increase in the service upgrades revenues, which upgrade revenues have a higher gross margin relative to our core service revenues and (b) continued cost reductions in our core service area. Upgrade services revenue has increased from \$1.5 million and \$3.1 million in the three and nine month periods ended September 27, 2008, respectively to \$4.6 million and \$8.1 million in the three and nine month periods ended September 26, 2009 respectively. In addition, the departmental costs for our core services in the periods of 2009 declined by \$1.0 million and \$2.0 million for the three and nine month periods ended September 26, 2009, from the comparable periods of 2008, as we continue to operate our core service department in a more efficient manner, including, without limitation, scheduling jobs more dynamically.

**Operating expenses.** Our operating expenses were comprised of the following (in thousands):

	Three-Months Ended				Nine-Months Ended			
	September 26 2009	September 27, 2008	Changes in Amount	%	September 26 2009	September 27, 2008	Changes in Amount	%
Research and development	\$ 4,100	\$ 4,430	\$ (330)	(7.4)%	\$ 10,394	\$ 13,107	\$ (2,713)	(20.7)%
Selling	3,959	4,280	(321)	(7.5)%	10,832	13,963	(3,131)	(22.4)%
General and administrative	3,967	4,935	(968)	(19.6)%	11,427	15,761	(4,334)	(27.5)%
Amortization of intangible assets	418	600	(182)	(30.3)%	1,124	3,215	(2,091)	(65.0)%
Asset impairment		55,332	(55,332)		1,899	68,545	(66,646)	(97.2)%
Restructuring charge		655	(655)		1,134	1,525	(391)	(25.6)%
<b>Total operating expenses</b>	<b>\$ 12,444</b>	<b>\$ 70,232</b>	<b>\$ (57,788)</b>	<b>(82.3)%</b>	<b>\$ 36,810</b>	<b>\$ 116,116</b>	<b>\$ (79,306)</b>	<b>(68.3)%</b>

**Research and development.** Research and development expenses decreased by \$0.3 million for the three month period ended September 26, 2009 over the comparable period in 2008 primarily due to lower labor cost as a result of less headcount and reduced travel costs.

Research and development expenses decreased by \$2.7 million for the nine month period ended September 26, 2009 over the corresponding period of 2008 primarily due to lower labor costs of \$2.2 million as a result of a headcount reduction in 2009 and balance predominately from reduced travel costs.

**Selling.** Selling expenses decreased by \$0.3 million for the three month period ended September 26, 2009 as compared to the corresponding period of 2008 primarily due to combination of lower labor costs as a result of less headcount and lower trade show expenses.

Selling expenses decreased by \$3.1 million for the nine month period ended September 26, 2009 over the corresponding period of 2008 primarily due to lower labor costs of \$1.7 million, which resulted from our headcount reduction in 2009, reduced travel costs of \$0.7 million, lower trade show expenses of \$0.3 million, and lower recruiting fees of \$0.2 million.

**General and administrative.** General and administrative expenses decreased by \$1.0 million for the three month period ended September 26, 2009 compared to the corresponding period in 2008 primarily due to lower labor costs of \$1.1 million, which resulted from our headcount reduction in 2009, and offset by increased professional services, including legal and consulting fees of \$0.3 million, which fees primarily related to the Option Exchange Program and ongoing litigation.

General and administrative expenses decreased by \$4.3 million for the nine month period ended September 26, 2009 over the comparable period in 2008 primarily due to lower labor costs of \$3.5 million which results from our headcount reduction in 2009, lower recruiting fees of \$0.3 million, and reduced travel costs of \$0.3 million.

**Amortization of intangible assets.** Amortization of intangible assets decreased by \$0.2 million and \$2.1 million for the three and nine month periods ended September 26, 2009 versus the comparable periods of 2008. The decreases are the result of an impairment of intangible assets of \$13.1 million, which impairment was recorded at the end of 2008.

**Table of Contents**

**Assets impairment.** During the three month period ended September 27, 2008, we recognized an impairment of \$55.3 million, representing a write off entire amount of our previously recorded goodwill of \$54.0 million and certain brand name and developed technology intangible assets of \$1.3 million. During the nine months ended September 27, 2008, we recognized an impairment charge of \$54.0 million, representing a write-off the entire amount of our previously recorded goodwill, and an impairment charge \$13.2 million was recorded to reflect certain brand names and developed technology intangible assets at their fair value. We also recorded an impairment charge of \$1.5 million to account for machine shop related assets at its fair value.

**Restructuring charge.** During the third quarter of 2009, the Company had no restructuring charge. For the nine month period ended September 26, 2009 the Company recorded a total of \$1.1 million in restructuring charges, as compared to \$1.5 million in restructuring charges over the comparable period in 2008.

**Other income (expense).** Our net other income (expense) consisted of the following categories (in thousands):

	Three-Months Ended				Nine-Months Ended			
	September 26, 2009	September 27, 2008	Changes in		September 26, 2009	September 27, 2008	Changes in	
			Amount	%			Amount	%
Interest income	\$ 12	\$ 24	\$ (12)	(50.0)%	\$ 39	\$ 156	\$ (117)	(75.0)%
Interest expense	(559)	(240)	(319)	132.9%	(1,106)	(343)	(763)	222.4%
Other, net	546	142	404	284.5%	(1,395)	564	(1,959)	347.3%
Total operating income (expense)	\$ (1)	\$ (74)	\$ 73	(98.6)%	\$ (2,462)	\$ 377	\$ (2,839)	

For the three and nine month periods ended September 26, 2009 compared to the comparable periods of 2008, we incurred higher interest expenses due to the Company's borrowing of \$13.5 million in connection with a mortgage against our headquarter premises entered into during July 2008 and the imputed interest of \$0.3 million on fair value of deferred payments to Zygo Corporation related to our acquisition. For the three and nine month periods ended September 26, 2009, we incurred foreign exchange gain of \$0.5 million and loss of \$1.3 million, respectively, due to exchange rate fluctuations associated with our intercompany balances among our various global entities, which represent a significant increase over the comparable periods of 2008. Foreign exchange losses for the nine month period ended September 26, 2009 of \$1.3 million was \$1.8 million decrease over the comparable period in 2008 and is due mainly to reclassification of our loans between the Company and our Japan subsidiary as Non Permanent as of the last day of fiscal year 2008. During the nine month period ended September 26, 2009, we recorded \$1.0 million of loss on foreign exchange in the Yen on these intercompany loans.

**Provision for income taxes.**

For the three month period ended September 26, 2009 the income tax benefit of \$83,000 was the result of foreign tax benefit of \$24,000 and state tax benefit of \$61,000 offset by \$2,000 in United States federal tax expense. For the nine month period ended September 26, 2009, the income tax benefit of \$463,000 was the result of foreign tax benefit of \$445,000 and state tax benefit of \$20,000 offset by \$2,000 in United States federal tax expense.

For the three month period ended September 27, 2008 the income taxes provision of \$0.4 million was the result of aggregate charges for potential tax exposure in certain foreign tax jurisdictions of \$0.2 million and \$0.1 million associated with the consolidation of duplicate foreign entities. For the nine month period ended September 27, 2008 the income taxes provision of \$0.5 million was the result of the aggregate charges for potential tax exposure in certain foreign jurisdictions of \$0.6 million and \$0.1 million associated with the consolidation of duplicate foreign entities, which charge was partially offset by a tax benefit in a certain foreign jurisdiction where sufficient deferred tax liabilities exist to allow for benefiting the operating loss of \$0.2 million, and reduction of a tax contingency of \$0.1 million due to the expiration of local statutes.

---

**Table of Contents**

**Liquidity and Capital Resources**

At September 26, 2009, the Company's cash and cash equivalents totaled \$17.2 million compared to \$24.0 million as of December 27, 2008. At September 26, 2009, the Company had working capital of \$49.4 million compared to \$57.9 million at December 27, 2008.

Operating activities used cash of \$10.1 million for the nine-month period ended September 26, 2009 as a result primarily from our net loss for the nine-month period of \$16.0 million, decrease in net working capital of \$3.1 million, decrease in deferred tax provision of \$0.3 million offset by certain non-cash charges including \$4.5 million of depreciation and amortization, \$1.9 million of asset impairment, \$1.6 million of stock-based compensation, unrealized loss on foreign exchange \$0.6 million, and a \$0.3 million provision made on imputed interest on the fair value of deferred payments to Zygo Corporation related to the acquisition of certain assets and liabilities of Zygo. Operating activities provided cash of \$1.8 million for the nine-month period ended September 27, 2008, resulting from certain non-cash charges including \$68.5 million of impairment charges for long-lived assets, \$6.1 million associated with amortization and depreciation, \$3.1 million in stock-based compensation, and increases in net working capital of \$4.5 million, which charges were partially offset by our net loss of \$80.1 million.

Investing activities for the nine-month period ended September 26, 2009 used cash of \$0.4 million related to cash outlays of \$0.6 million in capital equipment offset by net cash received from the release of funds held in escrow in connection with the Tevet acquisition, in the net amount of \$0.2 million. Investing activities for the nine-month period ended September 27, 2008 used cash of \$6.1 million related to cash outlays of \$3.3 million of our acquisition of Tevet and capital equipment acquisitions of \$2.8 million.

For the nine month period ended September 26, 2009, financing activities provided cash of \$3.5 million for borrowings against our line of credit in the amount of \$7.0 million, of which \$3.5 million was repaid, combined with \$0.2 million of proceeds from the sale of Company shares to employees through the Company's stock purchase plans, and offset by \$0.2 million for repayment of debt obligation. For the nine month period ended September 27, 2008, financing activities provided cash of \$12.1 million. Proceeds from the issuance of \$13.5 million of debt, and sale of stock from employee stock purchase plans of \$0.6 million were offset by \$1.8 million used for the repurchase of our common stock and \$0.1 million for debt repayments.

In February 2007, we entered into a two year agreement for a revolving line of credit facility with a maximum principal amount of up to \$15.0 million. On April 30, 2009, Nanometrics renegotiated its revolving line of credit facility and extended the term for an additional two years, to April 30, 2011. The instrument governing the facility includes certain financial covenants regarding minimum liquidity ratio and net tangible worth. All borrowings under this credit line bear interest, at our election, at a per annum rate equal to the bank's prime referenced rate plus 2.75%. The revolving line of credit agreement includes a provision for the issuance of commercial or standby letters of credit by the bank on our behalf. The value of all letters of credit outstanding reduces the total line of credit available. We had no outstanding letters of credit against this line as of September 26, 2009. The revolving line of credit is collateralized by a blanket lien on all of our domestic assets excluding intellectual property and real estate. We may use the proceeds of any future borrowing under this credit facility for general corporate purposes. On June 15, 2009, we amended the financial covenants governing the credit facility to reduce the net tangible worth requirements, effective as of June 27, 2009.

We borrowed \$3.5 million during the end of the third quarter, fiscal year 2009. This borrowing was prompted by our desire to decrease the days-sales outstanding on our payables to compensate for the large purchases made late in the quarter to support higher demand of our products. The loan was subsequently paid in full on October 6, 2009.

In July 2008, we entered into a loan agreement pursuant to which we borrowed \$13.5 million. The loan initially bears interest at the rate of 7.18% per annum, which rate will be reset after five years to 3.03% over the weekly average yield of five-year U.S Dollar Interest Rate Swaps as published by the Federal Reserve. Monthly principal and interest payments are based on a twenty year amortization for the first sixty months and fifteen- year amortization thereafter. The remaining principal balance of the loan and any accrued but unpaid interest will be due on August 1, 2018. The loan is secured, in part, by a lien on and security interest in the building and land comprising our principal offices in Milpitas, California.

**Table of Contents**

On June 17, 2009, we announced a strategic business partnership with Zygo Corporation whereby Nanometrics has purchased inventory and certain other assets relating to Zygo Corporation business and the two companies have entered into a supply agreement. The Company will make payments to Zygo Corporation (with a present value of \$5.4 million as of September 26, 2009) over a period of time as acquired inventory is sold and other aspects of the supply agreement are executed.

We have evaluated and will continue to evaluate the acquisitions of products, technologies or business that are complementary to our business. These activities may result in product and business investments, which may affect our cash position and working capital balances. Some of these activities might require significant cash outlays. For example in the third quarter of 2007, our Board of Directors authorized a \$4.0 million stock repurchase program, of which there remains \$1.3 million available for future purchases. We believe our working capital will be sufficient to meet our needs through the next twelve months.

## **Table of Contents**

### **ITEM 3. QUANTITATIVE AND QUALITATIVE DISCLOSURES ABOUT MARKET RISK**

Our exposure to market risk does not differ materially from that discussed in our Annual Report on Form 10-K for the fiscal year ended December 27, 2008 filed with the SEC on March 27, 2009. However, we cannot give any assurance as to the effect that future changes in interest rates or foreign currency rates will have on our consolidated financial position, results of operations or cash flows.

### **ITEM 4. CONTROLS AND PROCEDURES**

#### **Evaluation of Disclosure Controls and Procedures**

Our management evaluated, with the participation of our Chief Executive Officer, Timothy J. Stultz, and our Chief Financial Officer, James P. Moniz, the effectiveness of our disclosure controls and procedures as of the end of the period covered by this Quarterly Report on Form 10-Q. As of September 26, 2009 our management, with the participation of our Chief Executive Officer and our Chief Financial Officer, concluded that our disclosure controls and procedures were effective to ensure that information that we are required to disclose in reports that we file or submit under the Securities Exchange Act of 1934 were recorded, processed, summarized and reported within the time periods specified in Securities and Exchange Commission rules and forms.

#### **Changes in Internal Control over Financial Reporting**

There were no changes in our internal control over financial reporting during the three-month period ended September 26, 2009 that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

## **PART II OTHER INFORMATION**

### **ITEM 1. LEGAL PROCEEDINGS**

In August 2005, KLA-Tencor Corporation ( KLA ) filed a complaint against the Company in the United States District Court for the Northern District of California. The complaint alleges that certain of the Company's products infringe two of KLA's patents. On January 30, 2006, KLA added a third patent to their claim. The complaint seeks a preliminary and permanent injunction against the sale of these products as well as the recovery of monetary damages and attorneys' fees. As part of its defense, the Company has filed a request for re-examination of two of the allegedly infringed KLA patents with the U.S. Patent & Trademark Office ( PTO ). In March 2006, the Company filed a motion for and was granted a stay in the patent litigation case until such re-examination is completed. On July 28, 2008, the PTO issued a Notice of Intent to issue a Reexamination Certificate for one of the KLA patents, and subsequently on June 23, 2009 issued an additional Notice of Intent to issue a Reexamination Certificate on the second of three patents. The last patent reexaminations remain pending. In all three of the reexamination proceedings, the PTO has issued Office Actions rejecting numerous claims and KLA has amended the claims in response.

---

**Table of Contents**

**ITEM 1A. RISK FACTORS**

*Investing in our securities involves a high degree of risk. You should carefully consider the following risk factors, and other information included in or incorporated by reference into this report, including our financial statements and the related notes thereto. You also should carefully review and consider all of the risk factors set forth in Part I, Item 1A. Risk Factors in our Annual Report on Form 10-K for the fiscal year ended December 27, 2008, filed with the Securities and Exchange Commission on March 27, 2009. We have updated the following risk factors to reflect changes during the quarter ended September 26, 2009 that we believe to be material to the risk factors set forth in our Annual Report on Form 10-K for the fiscal year ended December 27, 2008. The risks described below and in our Form 10-K are not the only ones we face. Additional risks and uncertainties that are not presently known to us or that we currently believe are immaterial may also impair our business operations. Our business, operating results and financial conditions could be harmed by any of these risks. The trading price of our common stock could decline due to any of these risks and investors may lose all or part of their investment.*

***The current severe slowing in the general economy and in the semiconductor industry have caused us recent losses and reductions in available cash, and may continue to negatively impact our financial performance.***

The current recession in the global economy and the current downturn in the semiconductor industry have severely impacted and could further impact customer demand for our products and our financial performance. The degree of this impact will depend on a number of factors, including whether the U.S. economy and the global economy continue a prolonged recession. Demand for semiconductor equipment depends on consumer spending. Economic uncertainty may lead to a decrease in consumer spending and may cause certain customers to cancel or delay placing orders.

We may also experience supplier or customer issues as a result of current adverse macroeconomic conditions. If our customers have difficulties in obtaining capital or financing, this could result in lower sales. Customers with liquidity issues could also result in an increase in bad debt expense. These conditions could also affect our key suppliers, which could affect their ability to supply parts and result in delays of our customer shipments. These conditions make it difficult for us to accurately predict our business.

Because of the negative effects of the current recession, we may have to take further actions to reduce costs, which could reduce our ability to significantly invest in research and development at levels we believe are necessary. If we are unable to effectively align our cost structure with prevailing market conditions, we will experience additional losses and additional reductions in our cash and equivalents.

***We obtain some of the components and subassemblies included in our systems from a single source or a limited group of suppliers, and the partial or complete loss of one of these suppliers could cause production delays and significant loss of revenue.***

We rely on outside vendors to manufacture many components and subassemblies. Certain components, subassemblies and services necessary for the manufacture of our systems are obtained from a sole supplier or limited group of suppliers. We do not maintain any long-term supply agreements with any of our suppliers. We have entered into arrangements with J.A. Woolam Co., Inc. for the purchase of the spectroscopic ellipsometer component incorporated in our advanced measurement systems. We also have supply agreements with MPA and Spectral Systems, and subcontract manufacturing agreements with Fox Semiconductor, IFAT and Toho Technologies. In June 2009, we signed a supply agreement with Zygo Corporation to supply OEM interferometer sensors for incorporation into the Unifire line of products as well as Nanometrics family of automated metrology systems. Our reliance on a sole or a limited group of suppliers involves several risks, including the following:

we may be unable to obtain an adequate supply of required components;

we have reduced control over pricing and the timely delivery of components and subassemblies; and

our suppliers may be unable to develop technologically advanced products to support our growth and development of new systems.

---

**Table of Contents**

Some of our suppliers have relatively limited financial and other resources. Because the manufacturing of certain of these components and subassemblies involves extremely complex processes and requires long lead times, we may experience delays or shortages caused by our suppliers. If we were forced to seek alternative sources of supply or to manufacture such components or subassemblies internally, we could be forced to redesign our systems, which could cause production delays and prevent us from shipping our systems to customers on a timely basis. Any inability to obtain adequate deliveries from our suppliers, or any other circumstance that would restrict our ability to ship our products, could damage relationships with current and prospective customers, harm our business and result in significant loss of revenue.

***Restructuring of our operations may disrupt our business and adversely affect our financial condition and operating results.***

Since 2007, we have taken steps, including reductions in force, facility closures, and internal reorganizations to reduce the size and cost of our operations and to better match our resources with our market opportunities. We may take similar steps in the future to improve efficiency and match our resources with market opportunities, and as a result of such actions, we may incur restructuring expenses. In the first and third quarters of 2008, we undertook a restructuring that involved a reduction of our global workforce by approximately 30 and 34 employees, respectively, which action caused us to record restructuring and reorganization charges of \$0.9 million and \$0.7 million, respectively. In the first and second quarters of 2009, we reduced the global workforce further by 51 and 25 employees, respectively, and recorded restructuring charges of \$0.4 million and \$1.1 million, respectively.

Several factors could cause a restructuring to adversely affect our business, financial condition and results of operations. These include potential disruption of our operations, the development of our technology, our supply chain and other aspects of our business. Employee morale and productivity could also suffer and result in unintended employee attrition. Loss of sales, service and engineering talent, in particular, could damage our business. Any restructuring would require substantial management time and attention and may divert management from other important work. If we undertake further employee reductions or other restructuring activities, we will likely record restructuring and related expenses and accounting charges. Accounting charges may include inventory and technology-related write-offs, workforce reduction costs and charges relating to consolidation of excess facilities, and if we are required to take a substantial charge related to any future restructuring activities, our results of operations would be adversely affected in the period in which we take such a charge. Moreover, we could encounter delays in executing any restructuring plans, which could cause further disruption and additional unanticipated expense.

***Failure to achieve and maintain effective internal controls in accordance with Section 404 of the Sarbanes-Oxley Act of 2002 could have a material effect on our business.***

As a publicly traded company, we are subject to rules adopted by the SEC pursuant to Section 404 of the Sarbanes-Oxley Act of 2002. Section 404 requires us to include an internal control report from management in our Annual Report on Form 10-K. The internal control report must include the following: (1) a statement of management's responsibility for establishing and maintaining adequate internal control over financial reporting, (2) a statement identifying the framework used by management to conduct the required evaluation of the effectiveness of our internal control over financial reporting and (3) management's assessment of the effectiveness of our internal control over financial reporting as of the end of each fiscal year, including a statement as to whether or not internal control over financial reporting is effective. A statement that our independent registered public accounting firm has issued an attestation report on management's internal control over financial reporting was not required for 2009 as we are not an accelerated filer. The Company will be required to obtain such an attestation report for the 2010 fiscal year.

Our assessment as of December 29, 2007 identified a material weakness in our internal controls over financial reporting, which also adversely impacted our disclosure controls and procedures. A material weakness is a deficiency, or a combination of deficiencies, in internal controls over financial reporting, such that there is a reasonable possibility that a material misstatement of the Company's annual or interim financial statements will not be prevented or detected on a timely basis. The material weakness identified in 2007 was regarding our internal controls for the provision of income taxes in foreign jurisdictions. Since discovery of the material weakness in 2007, we performed extensive additional work and implemented several procedures to obtain reasonable assurance regarding the reliability of our financial statements. Based on our testing of these enhanced procedures, in the quarter ended December 27, 2008, management determined that as of December 27, 2008, we have remediated the material weakness in internal controls over financial reporting and the controls are now operating effectively. Even with this remediation complete, however, we could have material weaknesses in the future.

---

**Table of Contents**

*If we choose to acquire new and complementary businesses, products or technologies instead of developing them ourselves, we may be unable to complete these acquisitions or may not be able to successfully integrate an acquired business in a cost-effective and non-disruptive manner.*

Our success depends on our ability to continually enhance and broaden our product offerings in response to changing technologies, customer demands and competitive pressures. To achieve this, from time to time we have acquired complementary businesses, products, or technologies instead of developing them ourselves and may choose to do so in the future. On June 17, 2009, we entered into a strategic partnership with Zygo under an exclusive OEM supply agreement to provide interferometer sensors to Nanometrics for incorporation into the Unifire line of products as well as Nanometrics family of automated metrology systems. In May 2008, we acquired Tevet Process Control Technologies, Ltd., an integrated metrology company serving the worldwide semiconductor and solar manufacturing industry. We do not know if we will be able to complete any additional acquisitions, or whether we will be able to successfully integrate any acquired business, operate them profitably or retain their key employees. Integrating any business, product or technology that we acquire could be expensive and time consuming, disrupt our ongoing business and distract our management. In addition, in order to finance any acquisitions, we may be required to raise additional funds through public or private equity or debt financings. In that event, we could be forced to obtain financing on terms that are not favorable to us and, in the case of equity or convertible debt financing, which may result in dilution to our stockholders. If we are unable to integrate any acquired entities, products or technologies effectively, our business will suffer.

*We depend on new products and processes for our success. Consequently, we are subject to risks associated with rapid technological change.*

Rapid technological changes in semiconductor manufacturing processes subject us to increased pressure to develop technological advances enabling such processes. We believe that our future success depends in part upon our ability to develop and offer new products with improved capabilities and to continue to enhance our existing products. If new products have reliability or quality problems, our performance impacted by reduced orders, higher manufacturing costs, delays in acceptance and payment for new products, and additional service and warranty expenses. We might not be able to develop and manufacture new products successfully, or new products that we introduce may fail in the marketplace. Our failure to complete commercialization of these new products in a timely manner could result in unanticipated costs and inventory obsolescence, which would adversely affect our financial results.

In order to develop new products and processes, we expect to continue to make significant investments in R&D and to pursue joint development relationships with customers, suppliers or other members of the industry. We must manage product transitions and joint development relationships successfully, as introduction of new products could adversely affect our sale of existing products. Moreover, future technologies, processes or product developments may render our current product offerings obsolete, leaving us with non-competitive products, or obsolete inventory, or both.

*We are subject to risks associated with our competitors strategic relationships and their introduction of new products and we may lack the financial resources or technological capabilities of certain of our competitors needed to capture increased market share.*

We expect to face significant competition from multiple current and future competitors. We believe that other companies are developing systems and products that are competitive to our products and are planning to introduce new products, which may affect our ability to sell our existing products. We face a greater risk if our competitors enter into strategic relationships with leading semiconductor manufacturers covering products similar to those we sell or may develop, as this could adversely affect our ability to sell products to those manufacturers.

We believe that to remain competitive we will require significant financial resources to offer a broad range of products, to maintain customer service and support center worldwide, and to invest in product and process R&D. Certain of our competitors have substantially greater financial resources and more extensive engineering, manufacturing, marketing and customer service and support resources that we do and therefore have the potential to increasingly dominate the semiconductor equipment industry. These competitors may deeply discount products similar to those that we sell, challenging or even exceeding our ability to make similar accommodations and threatening our ability to sell those products. For these reasons, we may fail to continue to compete successfully worldwide.

In addition, our competitors may provide innovative technology that may have performance advantages over systems we currently expect to offer. They maybe able to develop products comparable or superior to those that we offer or may adapt more quickly to new technologies or evolving customer requirements. In particular, while we currently are developing additional product enhancements that we believe will address future customer requirements, we may fail in a timely manner to complete the

**Table of Contents**

development or introduction of these additional product enhancements successfully, or these product enhancements may not achieve market acceptance or be competitive. Accordingly, we maybe unable to continue to compete in our markets and competition may intensify, or future competition operating results, financial condition, and/or cash flows could suffer.

*If we are unable to adjust the scale of our business in response to rapid changes in demand in the semiconductor equipment industry, our operating results and our ability to compete successfully may be impaired.*

The business cycle in the semiconductor equipment industry has historically been characterized by frequent periods of rapid change in demand that challenge our management to adjust spending and resources allocated to operating activities. During periods of growth or decline in demand for our products and services, we face significant challenges in maintaining adequate financial and business controls, management processes, information systems and procedures and in training, managing, and appropriately sizing our supply chain, our work force, and other components of our business on a timely basis. Our success will depend, to a significant extent, on the ability our executive officers and other members our senior management to identify and respond to these challenges, our gross margins and earnings may be impaired during periods of demand decline, and we may lack the infrastructure and resources to scale up our business to meet customer expectations and compete successfully during periods of demand growth.

**Table of Contents**

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

We did not purchase any shares of our common stock during the three and nine months periods ended September 26, 2009.

On July 26, 2007, our Board of Directors approved the repurchase of up to \$4.0 million of our common stock. Share repurchases under this program may be made through open market and privately negotiated transactions, at times and in such amounts as management deems appropriate. The timing and actual number of shares repurchased will depend on a variety of factors including price, corporate and regulatory requirements and other market conditions. The stock repurchase program may be limited or terminated at any time without prior notice. As of September 26, 2009 there remained \$1.3 million available for the future purchase of shares of our common stock.

---

**Table of Contents**

**ITEM 6. EXHIBITS**

The following exhibits are filed or incorporated by reference with this Quarterly Report on Form 10-Q:

<b>Exhibit No.</b>	<b>Description</b>
<b>3(i)</b>	<b>Certificate of Incorporation</b>
3.1(1)	Certificate of Incorporation of the Registrant
<b>3(ii)</b>	<b>Bylaws</b>
3.2(1)	Bylaws of the Registrant
<b>31</b>	<b>Rule 13a-14(a)/15d-14(a) Certifications</b>
31.1(2)	Certification of Timothy J. Stultz, principal executive officer of the Registrant, pursuant to rule 13a-14(a) or rule 15a-14(a) of the Securities Exchange Act of 1934, as amended, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
31.2(2)	Certification of James P. Moniz, principal financial officer of the Registrant, pursuant to rule 13a-14(a) or rule 15a-14(a) of the Securities Exchange Act of 1934, as amended, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
<b>32</b>	<b>Section 1350 Certifications</b>
32.1(3)	Certification of Timothy J. Stultz, principal executive officer of the Registrant, and James P. Moniz, principal financial officer of the Registrant, pursuant to rule 13a-14(b) of the Securities Exchange Act of 1934, as amended, and U.S.C. Section 1350 as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002

- (1) Incorporated by reference to exhibits filed with the Registrant's Current Report on Form 8-K filed on October 5, 2006.
- (2) Filed herewith.
- (3) Furnished herewith.

**Table of Contents**

**SIGNATURES**

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

**NANOMETRICS INCORPORATED**  
(Registrant)

By: */s/* JAMES P. MONIZ  
**James P. Moniz**  
**Chief Financial Officer**

Dated: November 9, 2009

---

**Table of Contents**

**EXHIBIT INDEX**

**Exhibit**

<b>No.</b>	<b>Description</b>
<b>3(i)</b>	<b>Certificate of Incorporation</b>
3.1(1)	Certificate of Incorporation of the Registrant
<b>3(ii)</b>	<b>Bylaws</b>
3.2(1)	Bylaws of the Registrant
<b>31</b>	<b>Rule 13a-14(a)/15d-14(a) Certifications</b>
31.1(2)	Certification of Timothy J. Stultz, principal executive officer of the Registrant, pursuant to rule 13a-14(a) or rule 15a-14(a) of the Securities Exchange Act of 1934, as amended, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
31.2(2)	Certification of James P. Moniz, principal financial officer of the Registrant, pursuant to rule 13a-14(a) or rule 15a-14(a) of the Securities Exchange Act of 1934, as amended, as adopted pursuant to Section 302 of the Sarbanes-Oxley Act of 2002
<b>32</b>	<b>Section 1350 Certifications</b>
32.1(3)	Certification of Timothy J. Stultz, principal executive officer of the Registrant, and James P. Moniz, principal financial officer of the Registrant, pursuant to rule 13a-14(b) of the Securities Exchange Act of 1934, as amended, and U.S.C. Section 1350 as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002

- (1) Incorporated by reference to exhibits filed with the Registrant's Current Report on Form 8-K filed on October 5, 2006.
- (2) Filed herewith.
- (3) Furnished herewith.