LAM RESEARCH CORP

Form 10-K August 14, 2018 **Table of Contents** 

**UNITED STATES** 

SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

FORM 10-K

(Mark One)

x ANNUAL REPORT PURSUANT TO SECTION 13 OR 15(d) OF THE SECURITIES EXCHANGE ACT OF 1934 For the fiscal year ended June 24, 2018

OR

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

For the transition period from

Commission file number: 0-12933 LAM RESEARCH CORPORATION

(Exact name of registrant as specified in its charter)

Delaware 94-2634797

to

(State or other jurisdiction of incorporation or organization) (I.R.S. Employer Identification No.)

4650 Cushing Parkway, Fremont, California 94538 (Address of principal executive offices) (Zip Code) Registrant's telephone number, including area code: (510) 572-0200

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

Title of each class Name of each exchange on which registered

The Nasdaq Stock Market Common Stock, Par Value \$0.001 Per Share (Nasdaq Global Select Market)

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

None

(Title of class)

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes x No "

Indicate by check mark if the registrant is not required to file reports pursuant to Section 13 or Section 15(d) of the Act. Yes " No x

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 x 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 for such shorter period that the registrant was required to submit and post such files). Yes x No "

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K (§ 229.405 of this chapter) is not contained herein, and will not be contained, to the best of registrant's knowledge, in definitive proxy or information statements incorporated by reference in Part III of this Form 10-K or any amendment to this Form 10-K. x

Indicate by check mark whether the registrant is a large accelerated filer, an accelerated filer, a non-accelerated filer, a smaller reporting company, or an emerging growth company. See the definitions of "large accelerated filer," "accelerated filer," "accelerated filer," "smaller reporting company", and "emerging growth company" in Rule 12b-2 of the Exchange Act.

Large accelerated filer x

Accelerated filer "

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

Emerging growth company "

If an emerging growth company, indicate by check mark if the registrant has elected not to use the extended transition period for complying with any new or revised financial accounting standards provided pursuant to Section 13(a) of the Act. "

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

The aggregate market value of the Registrant's Common Stock, \$0.001 par value, held by non-affiliates of the Registrant, as of December 24, 2017, the last business day of the most recently completed second fiscal quarter, was \$24,908,278,746. Common Stock held by each officer and director and by each person who owns 5% or more of the outstanding Common Stock has been excluded from this computation based on the assumption that such persons may be deemed to be affiliates. This determination of affiliate status is not necessarily a conclusive determination of such status for other purposes.

As of August 9, 2018, the Registrant had 157,579,984 outstanding shares of Common Stock.

Documents Incorporated by Reference

Parts of the Registrant's Proxy Statement for the Annual Meeting of Stockholders expected to be held on or about November 6, 2018, are incorporated by reference into Part III of this Form 10-K. Except as expressly incorporated by reference herein, the Registrant's proxy statement shall not be deemed to be part of this report.

# Table of Contents

LAM RESEARCH CORPORATION 2018 ANNUAL REPORT ON FORM 10-K TABLE OF CONTENTS

		Page
Part I.		
Item 1.	<u>Business</u>	<u>3</u>
Item 1A.	. Risk Factors	<u>15</u>
Item 1B.	. <u>Unresolved Staff Comments</u>	<u>27</u>
Item 2.	<u>Properties</u>	27 27
Item 3.	<u>Legal Proceedings</u>	<u>27</u>
Item 4.	Mine Safety Disclosures	<u>27</u>
Part II.		
Item 5.	Market for the Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of	<u>28</u>
	<u>Equity Securities</u>	
Item 6.	Selected Financial Data	<u>31</u>
	Management's Discussion and Analysis of Financial Condition and Results of Operations	<u>33</u>
Item 7A.	Quantitative and Qualitative Disclosures About Market Risk	<u>47</u>
Item 8.	Financial Statements and Supplementary Data	<u>51</u>
Item 9.	Changes in and Disagreements with Accountants on Accounting and Financial Disclosure	<u>99</u>
Item 9A.	. Controls and Procedures	<u>99</u>
Item 9B.	Other Information	<u>99</u>
Part III.		
Item 10.	Directors, Executive Officers and Corporate Governance	<u>100</u>
Item 11.	Executive Compensation	<u>100</u>
Item 12.	Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters	<u>100</u>
Item 13.	Certain Relationships and Related Transactions, and Director Independence	<u>100</u>
Item 14.	Principal Accounting Fees and Services	<u>100</u>
Part IV.		
Item 15.	Exhibits, Financial Statement Schedules	<u>101</u>
Exhibit 1	<u>Index</u>	<u>102</u>
Signatur	<u>es</u>	<u>107</u>
Continue	es on next page	
Lam Res	search Corporation 2018 10-K 2	

### **Table of Contents**

### PART I

### CAUTIONARY STATEMENT REGARDING FORWARD-LOOKING STATEMENTS

With the exception of historical facts, the statements contained in this discussion are forward-looking statements, which are subject to the safe harbor provisions created by the Private Securities Litigation Reform Act of 1995. Certain, but not all, of the forward-looking statements in this report are specifically identified as forward-looking, by use of phrases and words such as "believe," "estimated," "anticipate," "expect," "probable," "intend," "plan," "aim," "may," "s "could," "would," "will," "continue," and other future-oriented terms. The identification of certain statements as "forward-looking" does not mean that other statements not specifically identified are not forward-looking. Forward-looking statements include but are not limited to statements that relate to: trends and opportunities in the global economic environment and the semiconductor industry; the anticipated levels of, and rates of change in, future shipments, margins, market share, capital expenditures, research and development expenditures, international sales, revenue (actual and/or deferred), and operating expenses generally; management's plans and objectives for our current and future operations and business focus; volatility in our quarterly results; customer and end user requirements and our ability to satisfy those requirements; customer capital spending and their demand for our products and services, and the reliability of indicators of change in customer spending and demand; the effect of variability in our customers' business plans or demand for our equipment and services; changes in demand for our products and in our market share resulting from, among other things, increases in our customers' proportion of capital expenditure (with respect to certain technology inflections); hedging transactions; our competition; our ability to defend our market share, and to gain new market share; our ability to obtain and qualify alternative sources of supply; the impact of U.S. tax reform, our estimated annual tax rate and the factors that affect our tax rates; anticipated growth in the industry and the total market for wafer fabrication equipment and our growth relative to such growth; the success of joint development and collaboration relationships with customers, suppliers, or others; outsourced activities; the role of component suppliers in our business; our leadership and competency, and their ability to facilitate innovation; our ability to continue to, including the underlying factors that, create sustainable differentiation; the resources invested to comply with evolving standards and the impact of such efforts; legal and regulatory compliance; the estimates we make, and the accruals we record, in order to implement our critical accounting policies (including but not limited to the adequacy of prior tax payments, future tax benefits or liabilities, and the adequacy of our accruals relating to them); our investment portfolio; our access to capital markets; uses of, payments of, and impact of interest rate fluctuations on, our debt; our intention to pay quarterly dividends and the amounts thereof, if any; our ability and intention to repurchase our shares; credit risks; controls and procedures; recognition or amortization of expenses; our ability to manage and grow our cash position; and the sufficiency of our financial resources to support future business activities (including but not limited to operations, investments, debt service requirements, and capital expenditures). Such statements are based on current expectations and are subject to risks, uncertainties, and changes in condition, significance, value, and effect, including without limitation those discussed below under the heading "Risk Factors" within Item 1A and elsewhere in this report and other documents we file from time to time with the Securities and Exchange Commission ("SEC"), such as our quarterly reports on Form 10-Q and our current reports on Form 8-K. Such risks, uncertainties, and changes in condition, significance, value, and effect could cause our actual results to differ materially from those expressed in this report and in ways not readily foreseeable. Readers are cautioned not to place undue reliance on these forward-looking statements, which speak only as of the date hereof and are based on information currently and reasonably known to us. We do not undertake any obligation to release the results of any revisions to these forward-looking statements, which may be made to reflect events or circumstances that occur after the date of this report or to reflect the occurrence or effect of anticipated or unanticipated events. Item 1. Business

Incorporated in 1980, Lam Research Corporation ("Lam Research," "Lam," "we," "our," "us," or the "Company") is a Delawa corporation, headquartered in Fremont, California. We maintain a network of facilities throughout Asia, Europe, and the United States in order to meet the needs of our dynamic customer base.

Continues on next page

### **Table of Contents**

Additional information about Lam Research is available on our website at www.lamresearch.com. The content on any website referred to in this Form 10-K is not a part of or incorporated by reference in this Form 10-K unless expressly noted.

Our Annual Report on Form 10-K, Quarterly Reports on Forms 10-Q, Current Reports on Forms 8-K, Proxy Statements and all other filings we make with the SEC are available on our website, free of charge, as soon as reasonably practical after we file them with or furnish them to the SEC and are also available online at the SEC's website at www.sec.gov. Any materials we file with the SEC may also be read and copied at the SEC's Public Reference Room at 100 F Street, NE, Washington, DC 20549. To obtain information on the operation of the Public Reference Room, call the SEC at 1-800-SEC-0330.

The Lam Research logo, Lam Research, and all product and service names used in this report are either registered trademarks or trademarks of Lam Research Corporation or its subsidiaries in the United States and/or other countries. All other marks mentioned herein are the property of their respective holders.

We are a global supplier of innovative wafer fabrication equipment and services to the semiconductor industry. We have built a strong global presence with core competencies in areas like nanoscale applications enablement, chemistry, plasma and fluidics, advanced systems engineering and a broad range of operational disciplines. Our products and services are designed to help our customers build smaller, faster, and better performing devices that are used in a variety of electronic products, including mobile phones, personal computers, servers, wearables, automotive devices, storage devices, and networking equipment. Our vision is to realize full value from natural technology extensions of our Company.

Our customer base includes leading semiconductor memory, foundry, and integrated device manufacturers ("IDMs") that make products such as non-volatile memory ("NVM"), DRAM memory, and logic devices. We aim to increase our strategic relevance with our customers by contributing more to their continued success. Our core technical competency is integrating hardware, process, materials, software, and process control enabling results on the wafer. Semiconductor manufacturing, our customers' business, involves the complete fabrication of multiple dies or integrated circuits ("ICs") on a wafer. This involves the repetition of a set of core processes and can require hundreds of individual steps. Fabricating these devices requires highly sophisticated process technologies to integrate an increasing array of new materials with precise control at the atomic scale. Along with meeting technical requirements, wafer processing equipment must deliver high productivity and be cost-effective.

Demand from cloud computing (the "Cloud"), the Internet of Things ("IoT"), and other markets is driving the need for increasingly powerful and cost-efficient semiconductors. At the same time, there are growing technical challenges with traditional two-dimensional scaling. These trends are driving significant inflections in semiconductor manufacturing, such as the increasing importance of vertical scaling strategies like three-dimensional ("3D") architectures as well as multiple patterning to enable shrinks.

These demand and technology inflections have significantly expanded our addressable markets from about 26% of wafer fabrication equipment spending in calendar year 2013 to about 36% in calendar year 2017. We believe we are in a strong position with our leadership and competency in deposition, etch, and clean to facilitate some of the most significant innovations in semiconductor device manufacturing. Several factors create opportunity for sustainable differentiation for us: (i) our focus on research and development, with several on-going programs relating to sustaining engineering, product and process development, and concept and feasibility; (ii) our ability to effectively leverage cycles of learning from our broad installed base; (iii) our collaborative focus with semi-ecosystem partners; (iv) our ability to identify and invest in the breadth of our product portfolio to meet technology inflections; and (v) our focus on delivering our multi-product solutions with a goal to enhance the value of Lam's solutions to our customers. We also address processes for back-end wafer-level packaging ("WLP"), which is an alternative to traditional wire bonding and can offer a smaller form factor, increased interconnect speed and bandwidth, and lower power consumption, among other benefits. In addition, our products are well-suited for related markets that rely on semiconductor processes and require production-proven manufacturing capability, such as complementary metal-oxide-semiconductor image sensors ("CIS") and micro-electromechanical systems ("MEMS").

Continues on next page

### **Table of Contents**

Our Customer Support Business Group ("CSBG") provides products and services to maximize installed equipment performance, predictability, and operational efficiency. We offer a broad range of services to deliver value throughout the lifecycle of our equipment, including customer service, spares, upgrades, and refurbishment of our deposition, etch, and clean products. Many of the technical advances that we introduce in our newest products are also available as upgrades, which provide customers with a cost-effective strategy for extending the performance and capabilities of their existing wafer fabrication lines. Additionally, CSBG provides new and refurbished previous-generation (legacy) equipment for those applications that do not require the most advanced wafer processing capability.

Pr	٠.	A		<u></u>	-0
м	'n,	(1	ш	('1	8

Market	Process/Application	Technology	Products	
Deposition	Metal Films	Electrochemical Deposition ("ECD") (Copper &SABRE® family Other)		
		Chemical Vapor Deposition ("CVD") Atomic Layer Deposition ("ALD") (Tungsten)	ALTUS® family	
	Dielectric Films	Plasma-enhanced CVD ("PECVD") ALD Gapfill High-Density Plasma CVD ("HDP-CVD")	VECTOR® family Striker® family SPEED® family	
	Film Treatment	Ultraviolet Thermal Processing ("ULTP")	SOLA® family	
Etch	Conductor Etch	Reactive Ion Etch	Kiyo <sup>®</sup> family, Versys <sup>®</sup> Metal family	
	Dielectric Etch	Reactive Ion Etch	Flex <sup>TM</sup> family	
	Through-silicon Via ("TSV") Etch	Deep Reactive Ion Etch	Syndion® family	
Clean	Wafer Cleaning	Wet Clean	EOS®, DV-Prime®, Da Vinci®, SP Series Coronus® family Metryx® Family	
	Bevel Cleaning Deposition, Etch, Clean	Dry Plasma Clean		
Mass Metrology		Sub-milligram Mass Measurement		

Deposition Processes and Product Families

Deposition processes create layers of dielectric (insulating) and metal (conducting) materials used to build a semiconductor device. Depending on the type of material and structure being made, different techniques are employed. Electrochemical deposition creates the copper wiring (interconnect) that links devices in an integrated circuit ("IC" or "chip"). Plating of copper and other metals is also used for TSV and WLP applications. Small tungsten connectors and thin barriers are made with the precision of chemical vapor deposition and atomic layer deposition, which adds only a few layers of atoms at a time. Plasma-enhanced CVD, high-density plasma CVD, and ALD are used to form the critical insulating layers that isolate and protect all of these electrical structures. Lastly, post-deposition treatments such as ultraviolet thermal processing are used to improve dielectric film properties. ALTUS® Product Family

Tungsten deposition is used to form conductive features such as contacts, vias, and plugs on a chip. These features are small, often narrow, and use only a small amount of metal, so minimizing resistance and achieving complete fill can be difficult. At these nanoscale dimensions, even slight imperfections can impact device performance or cause a chip to fail. Our ALTUS® systems combine CVD and ALD technologies to deposit the highly conformal films needed for advanced tungsten metallization applications. The Multi-Station Sequential Deposition architecture enables nucleation layer formation and bulk CVD fill to be performed in the same chamber ("in situ"). PNL, our ALD technology, is used in the deposition of tungsten nitride films to achieve high step coverage with reduced thickness relative to conventional barrier films.

Continues on next page

### **Table of Contents**

# SABRE® Product Family

Copper deposition lays down the electrical wiring for most semiconductor devices. Even the smallest defect - say, a microscopic pinhole or dust particle - in these conductive structures can impact device performance, from loss of speed to complete failure. The SABRE® ECD product family, which helped pioneer the copper interconnect transition, offers the precision needed for copper damascene manufacturing in logic and memory. System capabilities include copper deposition directly on various liner materials, which is important for next-generation metallization schemes. For advanced WLP applications, such as forming conductive bumps and redistribution layers, and for filling TSVs, the SABRE® 3D family combines Lam's SABRE Electrofil® technology with additional innovation to deliver the high-quality films needed at high productivity. The modular architecture can be configured with multiple plating and pre/post-treatment cells, providing flexibility to address a variety of packaging applications.

# SOLA® Product Family

Dielectric materials designed to meet the insulation requirements of logic chips often have attributes that make them unusually difficult to use. These films are easily damaged and vulnerable to losing some of their insulating capability, which can lead to poor device performance. To enable these applications, some films can be stabilized - and others enhanced to improve device performance - using specialized post-deposition film treatments available with Lam's SOLA® UVTP product family. SOLA® products offer process flexibility through independent control of temperature, wavelength, and intensity at each station of the wafer path, enabled by Multi-Station Sequential Processing architecture.

# SPEED® Product Family

Dielectric gapfill processes deposit critical insulation layers between conductive and/or active areas by filling openings of various aspect ratios between conducting lines and between devices. With advanced devices, the structures being filled can be very tall and narrow. As a result, high-quality dielectric films are especially important due to the ever-increasing possibility of cross-talk and device failure. Our SPEED® HDP-CVD products provide a multiple dielectric film solution for high-quality gapfill with industry-leading throughput and reliability. SPEED® products have excellent particle performance, and their design allows large batch sizes between cleans and faster cleans.

# Striker® Product Family

The latest memory, logic, and imaging devices require extremely thin, highly conformal dielectric films for continued device performance improvement and scaling. For example, such films are critical for spacer-based multiple patterning schemes where the spacers help define critical dimensions, as well as for insulating liners, which have little tolerance for even the smallest defect. The Striker® single-wafer ALD products provide solutions for these challenging requirements through application-specific process and hardware options that deliver film technology and defect performance. Reduced processing times with Striker® products are enabled by rapid ALD cycles and ALD-rated components, software, and controls.

# VECTOR® Product Family

Dielectric film deposition processes are used to form some of the most difficult-to-produce insulating layers in a semiconductor device, including those used in the latest transistors and 3D structures. In some applications, these films need to conform tightly around intricate structures. Other applications require dielectric films to be exceptionally smooth and defect free since slight imperfections are multiplied greatly in subsequent layers. Our VECTOR® PECVD products are designed to provide the performance and flexibility needed to create these enabling structures within a wide range of challenging device applications. As a result of its design, VECTOR® produces superior thin film quality, along with exceptional within-wafer and wafer-to-wafer uniformity. Reduced processing time is enabled by proprietary wafer heat-up independent of film deposition.

### **Etch Processes and Product Families**

Etch processes help create chip features by selectively removing both dielectric (insulating) and metal (conducting) materials that have been added during deposition. These processes involve fabricating increasingly small, complex, and narrow features using many types of materials. The primary technology, reactive ion etch, bombards the wafer surface with ions (charged particles) to remove material. For the smallest features, atomic-

### **Table of Contents**

layer etching ("ALE") removes a few atomic layers of material at a time. While conductor etch processes precisely shape critical electrical components like transistors, dielectric etch forms the insulating structures that protect conducting parts. Etch processes also create the tall, column-like features used, for example, in TSVs that link chips together and in MEMS.

Flex® Product Family

Dielectric etch carves patterns in insulating materials to create barriers between the electrically conductive parts of a semiconductor device. For advanced devices, these structures can be extremely tall and thin and involve complex, sensitive materials. Slight deviations from the target feature profile - even at the atomic level - can negatively affect electrical properties of the device. To precisely create these challenging structures, our Flex® product family offers differentiated technologies and application-focused capabilities for critical dielectric etch applications. Uniformity, repeatability, and tunability are enabled by a unique multi-frequency, small-volume, confined plasma design. Flex offers in situ multi-step etch and continuous plasma capability that delivers high productivity with low defectivity. Kiyo® Product Family

Conductor etch helps shape the electrically active materials used in the parts of a semiconductor device. Even a slight variation in these miniature structures can create an electrical defect that impacts device performance. In fact, these structures are so tiny that etch processes are pushing the boundaries of the basic laws of physics and chemistry. Our Kiyo® product family delivers the high-performance capabilities needed to precisely and consistently form these conductive features with high productivity. Proprietary Hydra technology in Kiyo® products improves critical dimension ("CD") uniformity by correcting for incoming pattern variability, and atomic-scale variability control with production-worthy throughput is achieved with plasma-enhanced ALE capability.

Syndion® Product Family

Plasma etch processes used to remove silicon and other materials deep into the wafer are collectively referred to as deep silicon etch. These deep trenches, TSVs, and other high aspect ratio features are created by etching through multiple materials sequentially, where each new material involves a change in the etch process. As they are often electrically isolating or connecting structures, even slight variation from target results can negatively impact device performance. The Syndion® etch product family is optimized for deep silicon etch, providing the fast process switching with depth and cross-wafer uniformity control required to achieve precision etch results. The systems support both conventional single-step etch and rapidly alternating process, which minimizes damage and delivers precise depth uniformity.

Versys® Metal Product Family

Metal etch processes play a key role in connecting the individual components that form an IC, such as forming wires and electrical connections. These processes are also used to drill through the metal hardmasks that are used to pattern features too small for conventional masks, thereby allowing continued shrinking of feature dimensions. To enable performing these critical etch steps, the Versys® Metal product family provides high-productivity capability on a flexible platform. Superior CD and profile uniformity are enabled by a symmetrical chamber design with independent process tuning features.

Clean Processes and Products

Clean techniques are used between manufacturing steps to clear away particles, contaminants, residues and other unwanted material that could later lead to defects and to prepare the wafer surface for subsequent processing. Wet processing technologies can be used for wafer cleaning and etch applications. Plasma bevel cleaning is used to enhance die yield by removing unwanted materials from the wafer's edge that could impact the device area. Coronus® Product Family

Bevel cleaning removes unwanted masks, residues, and films from the edge of a wafer between manufacturing steps. If not cleaned, these materials become defect sources. For instance, they can flake off and re-deposit on the device area during subsequent processes. Even a single particle that lands on a critical part of a device can ruin the entire chip. By inserting bevel clean processes at strategic points, these potential defect sources can be

### **Table of Contents**

eliminated and more good chips produced. By combining the precise control and flexibility of plasma with technology that protects the active die area, the Coronus® bevel clean family cleans the wafer's edge to enhance die yield. The systems provide active die area protection by using plasma processing with proprietary confinement technology. Applications include post-etch, pre- and post-deposition, pre-lithography, and metal film removal to prevent arcing during plasma etch or deposition steps.

Da Vinci<sup>®</sup>, DV-Prime<sup>®</sup>, EOS<sup>®</sup>, SP Series Product Families

Wafer cleaning is performed repeatedly during semiconductor device manufacturing and is a critical process that affects product yield and reliability. Unwanted microscopic materials - some no bigger than the tiny structures themselves - need to be cleaned effectively. At the same time, these processes must selectively remove residues that are chemically similar to the device films. For advanced WLP, the wet clean steps used between processes that form the package and external wiring have surprisingly complex requirements. These processes are called on to completely remove specific materials and leave other fragile structures undisturbed.

Based on our pioneering single-wafer spin technology, the DV-Prime® and Da Vinci® products provide the process flexibility needed with high productivity to address a wide range of wafer cleaning steps throughout the manufacturing process flow. As the latest of Lam's wet clean products, EO® delivers exceptionally low on-wafer defectivity and high throughput to address progressively demanding wafer cleaning applications, including emerging 3D structures. With a broad range of process capability, our SP Series products deliver cost-efficient, production-proven wet clean/wet etch solutions for challenging WLP applications.

# Mass Metrology Processes and Product

Mass metrology measures the change in mass following deposition, etch, and clean processes to enable monitoring and control of these often-repeated core manufacturing steps. For design components like thin film stacks, high aspect-ratio structures, and complex 3D architectures, optical techniques are limited in their ability to measure accurately the thick, deep, or otherwise visually obscured features. Measuring the change in mass for these applications provides a straightforward high-precision solution for monitoring and control of the critical features in advanced device structures, where there is often little tolerance for variation. Our line of high-precision mass metrology systems provides in-line monitoring and control of deposition, etch, and clean steps in real time - recording minute changes in mass to enable advanced detection of potential process excursions.

# Metryx® Product Families

In-line process monitoring is used to identify production wafer trends and excursions as they occur, allowing corrections to be implemented quickly to prevent further yield loss. For deposition, etch, and clean steps, measurement of the mass change of a wafer before and after a process is a simple and direct means of monitoring and controlling process results, particularly for ultra-thin films, ultra-thick films, and complex 3D geometries of newer chip designs, where traditional optical metrology techniques are ineffective. The Metryx® mass metrology systems, available as both platform-integrated modules and as stand-alone systems, deliver sub-milligram mass measurement capability for advanced process monitoring and control of three-dimensional device structures. Key applications include high aspect ratio etch (DRAM cell, 3D NAND channel hole), conformal and ALD/sidewall deposition, horizontal processing (recess etch, fill), film density monitoring, carbon mask open, and wafer cleaning/polymer removal.

# **Legacy Products**

For applications that do not require the most advanced wafer processing capability, semiconductor manufacturers can benefit from the proven performance of previous-generation products to increase their production capacity at a reduced economic investment. Purchasing through an original equipment manufacturer like us minimizes the risks of unexpected costs and unpredictable time to production that are typically associated with the legacy equipment market. To meet semiconductor manufacturers' needs for high-performance, maximum-predictability, and low-risk equipment, we provide new, refurbished, and legacy products to customers utilizing technology nodes at and above 28 nm. These products benefit from many of the technical advances from our newest systems, enabling extended lifetime and productivity. Our products also provide production-worthy, cost-effective solutions for MEMS, power semiconductor, radio frequency device, and light emitting diode markets.

### **Table of Contents**

Fiscal Periods Presented

All references to fiscal years apply to our fiscal years, which ended June 24, 2018, June 25, 2017, and June 26, 2016. Research and Development

The market for semiconductor capital equipment is characterized by rapid technological change and product innovation. Our ability to achieve and maintain our competitive advantage depends in part on our continued and timely development of new products and enhancements to existing products. Accordingly, we devote a significant portion of our personnel and financial resources to research and development ("R&D") programs and seek to maintain close and responsive relationships with our customers and suppliers.

Our R&D expenses during fiscal years 2018, 2017, and 2016 were \$1.2 billion, \$1.0 billion, and \$914 million, respectively. The majority of R&D spending over the past three years has been targeted at deposition, etch, clean, and other semiconductor manufacturing products. We believe current challenges for customers at various points in the semiconductor manufacturing process present opportunities for us.

We expect to continue to make substantial investments in R&D to meet our customers' product needs, support our growth strategy and enhance our competitive position.

Marketing, Sales, and Service

Our marketing, sales, and service efforts are focused on building long-term relationships with our customers and targeting product and service solutions designed to meet their needs. These efforts are supported by a team of product marketing and sales professionals as well as equipment and process engineers who work closely with individual customers to develop solutions for their wafer processing needs. We maintain ongoing service relationships with our customers and have an extensive network of service engineers in place throughout the United States, China, Europe, Japan, Korea, Southeast Asia, and Taiwan. We believe that comprehensive support programs and close working relationships with customers are essential to maintaining high customer satisfaction and our competitiveness in the marketplace.

We provide standard warranties for our systems. The warranty provides that systems will be free from defects in material and workmanship and will conform to agreed-upon specifications. The warranty is limited to repair of the defect or replacement with new or like-new equivalent goods and is valid when the buyer provides prompt notification within the warranty period of the claimed defect or non-conformity and also makes the items available for inspection and repair. We also offer extended warranty packages to our customers to purchase as desired.

### **Table of Contents**

#### **International Sales**

A significant portion of our sales and operations occur outside the United States and, therefore, may be subject to certain risks, including but not limited to tariffs and other barriers; difficulties in staffing and managing non-U.S. operations; adverse tax consequences; foreign currency exchange rate fluctuations; changes in currency controls; compliance with U.S. and international laws and regulations, including U.S. export restrictions; and economic and political conditions. Any of these factors may have a material adverse effect on our business, financial position, and results of operations and cash flows. For geographical reporting, revenue is attributed to the geographic location in which the customers' facilities are located. Revenue by region was as follows:

	Year Ended				
	June 24,	June 25,	June 26,		
	2018	2017	2016		
	(in thousands)				
Korea	\$3,832,798	\$2,480,329	\$1,057,331		
Japan	1,882,799	1,041,969	983,821		
China	1,784,436	1,023,195	1,039,951		
Taiwan	1,397,978	2,095,669	1,485,037		
United States	820,438	629,937	495,123		
Southeast Asia	781,360	401,877	605,236		
Europe	577,189	340,644	219,394		
Total revenue	\$11,076,998	\$8,013,620	\$5,885,893		

Long-lived Assets

Refer to Note 18 of our Consolidated Financial Statements, included in Item 8 of this report, for information concerning the geographic locations of long-lived assets.

#### Customers

Our customers include all of the world's leading semiconductor manufacturers. Customers continue to establish joint ventures, alliances, and licensing arrangements which have the potential to positively or negatively impact our competitive position and market opportunities. Customers accounting for greater than 10% of total revenues in fiscal year 2018 included Intel Corporation; Micron Technology, Inc.; Samsung Electronics Company, Ltd.; SK hynix Inc.; and Toshiba, Inc. Customers accounting for greater than 10% of total revenues in fiscal year 2017 included Micron Technology, Inc.; Samsung Electronics Company, Ltd.; SK hynix Inc.; Taiwan Semiconductor Manufacturing Company, Ltd; and Toshiba, Inc. Customers accounting for greater than 10% of total revenues in fiscal year 2016 included Micron Technology, Inc.; Samsung Electronics Company, Ltd.; SK hynix Inc.; and Taiwan Semiconductor Manufacturing Company, Ltd.

A material reduction in orders from our customers could adversely affect our results of operations and projected financial condition. Our business depends upon the expenditures of semiconductor manufacturers. Semiconductor manufacturers' businesses, in turn, depend on many factors, including their economic capability, the current and anticipated market demand for ICs, and the availability of equipment capacity to support that demand.

### **Table of Contents**

#### **Backlog**

In general, we schedule production of our systems based upon our customers' delivery requirements and forecasts. In order for a system to be included in our backlog, the following conditions must be met: (1) we have received a written customer request that has been accepted, (2) we have an agreement on prices and product specifications, and (3) there is a scheduled shipment within the next 12 months. In order for spares and services to be included in our backlog, the following conditions must be met: (1) we have received a written customer request that has been accepted and (2) delivery of products or provision of services is anticipated within the next 12 months. Where specific spare parts and customer service purchase contracts do not contain discrete delivery dates, we use volume estimates at the contract price and over the contract period, not to exceed 12 months, in calculating backlog amounts. Our policy is to revise our backlog for order cancellations and to make adjustments to reflect, among other things, changes in spares volume estimates and customer delivery date changes. As of June 24, 2018, and June 25, 2017, our backlog was \$2.0 billion and \$2.1 billion, respectively. Generally, orders for our products and services are subject to cancellation by our customers with limited penalties. Because some orders are received and shipped in the same quarter and because customers may change delivery dates and cancel orders, our backlog at any particular date is not necessarily indicative of business volumes or actual revenue levels for succeeding periods.

# Manufacturing

Our manufacturing operations mainly consist of assembling and testing components, sub-assemblies, and modules that are then integrated into finished systems prior to shipment to or at the location of our customers. The assembly and testing of our products is conducted predominately in cleanroom environments.

We have agreements with third parties to outsource certain aspects of our manufacturing, production warehousing, and logistics functions. We believe that these outsourcing contracts provide us more flexibility to scale our operations up or down in a timely and cost-effective manner, enabling us to respond quickly to any changes in our business. We believe that we have selected reputable providers and have secured their performance on terms documented in written contracts. However, it is possible that one or more of these providers could fail to perform as we expect, and such failure could have an adverse impact on our business and have a negative effect on our operating results and financial condition. Overall, we believe we have effective mechanisms to manage risks associated with our outsourcing relationships. Refer to Note 15 of our Consolidated Financial Statements, included in Item 8 of this report, for further information concerning our outsourcing commitments, reported as a component of purchase obligations. Certain components and sub-assemblies that we include in our products may only be obtained from a single supplier. We believe that, in many cases, we could obtain and qualify alternative sources to supply these products. Nevertheless, any prolonged inability to obtain these components could have an adverse effect on our operating results and could unfavorably impact our customer relationships.

### **Environmental Matters**

We are subject to a variety of governmental regulations related to the management of hazardous materials that we use in our business operations. We are currently not aware of any pending notices of violations, fines, lawsuits, or investigations arising from environmental matters that would have a material effect on our business. We believe that we are generally in compliance with these regulations and that we have obtained (or will obtain or are otherwise addressing) all necessary environmental permits to conduct our business. Nevertheless, the failure to comply with present or future regulations could result in fines being imposed on us, require us to suspend production or cease operations, or cause our customers to not accept our products. These regulations could require us to alter our current operations, to acquire significant additional equipment, or to incur substantial other expenses to comply with environmental regulations. Our failure to control the use, sale, transport, or disposal of hazardous substances could subject us to future liabilities.

### **Table of Contents**

### **Employees**

As of August 9, 2018, we had approximately 10,900 regular employees globally. Although we have employment-related agreements with a number of key employees, these agreements do not guarantee continued service. Each of our employees is required to comply with our policies relating to maintaining the confidentiality of our non-public information. As noted previously, we outsource certain aspects of our manufacturing, field service, production warehousing, and logistics functions to provide us more flexibility to scale our operations up or down in a timely and cost-effective manner, enabling us to respond quickly to any changes in our business.

In the semiconductor and semiconductor capital equipment industries, competition for highly skilled employees is intense. Our future success depends to a significant event, upon our continued shility to attract and ratio gualified.

intense. Our future success depends, to a significant extent, upon our continued ability to attract and retain qualified employees, particularly in the R&D and customer support functions.

# Competition

The semiconductor capital equipment industry is characterized by rapid change and is highly competitive throughout the world. To compete effectively, we invest significant financial resources targeted to strengthen and enhance our product and services portfolio and to maintain customer service and support locations globally. Semiconductor manufacturers evaluate capital equipment suppliers in many areas, including but not limited to process performance, productivity, defect control, customer support, and overall cost of ownership, which can be affected by many factors such as equipment design, reliability, software advancements, and similar factors. Our ability to succeed in the marketplace depends upon our ability to maintain existing products and introduce product enhancements and new products that meet customer requirements on a timely basis. In addition, semiconductor manufacturers must make a substantial investment to qualify and integrate new capital equipment into semiconductor production lines. As a result, once a semiconductor manufacturer has selected a particular supplier's equipment and qualified it for production, the manufacturer generally maintains that selection for that specific production application and technology node as long as the supplier's products demonstrate performance to specification in the installed base. Accordingly, we may experience difficulty in selling to a given customer if that customer has qualified a competitor's equipment. We must also continue to meet the expectations of our installed base of customers through the delivery of high-quality and cost-efficient spare parts in the presence of competition from third-party spare parts providers.

We face significant competition with all of our products and services. Our primary competitor in the dielectric and metals deposition market is Applied Materials, Inc. For ALD and PECVD, we also compete against ASM International and Wonik IPS. In the etch market, our primary competitors are Applied Materials, Inc.; Hitachi, Ltd.; and Tokyo Electron, Ltd., and our primary competitors in the wet clean market are Screen Holding Co., Ltd.; Semes Co., Ltd.; and Tokyo Electron, Ltd.

We face competition from a number of established and emerging companies in the industry. We expect our competitors to continue to improve the design and performance of their current products and processes, to introduce new products and processes with enhanced price/performance characteristics, and to provide more comprehensive offerings of products. If our competitors make acquisitions or enter into strategic relationships with leading semiconductor manufacturers, or other entities, covering products similar to those we sell, our ability to sell our products to those customers could be adversely affected. Strategic investments to encourage local semiconductor manufacturing and supply chain in China could increase competition from domestic equipment manufacturers in China. There can be no assurance that we will continue to compete successfully in the future.

### **Table of Contents**

#### Patents and Licenses

Our policy is to seek patents on inventions relating to new or enhanced products and processes developed as part of our ongoing research, engineering, manufacturing, and support activities. We currently hold a number of U.S. and foreign patents covering various aspects of our products and processes. Our patents, which cover material aspects of our past and present core products, have current durations ranging from approximately one to twenty years. We believe that, although the patents we own and may obtain in the future will be of value, they alone will not determine our success. Our success depends principally upon our research and development, engineering, marketing, support, and delivery skills. However, in the absence of patent protection, we may be vulnerable to competitors who attempt to imitate our products, manufacturing techniques, and processes. In addition, other companies and inventors may receive patents that contain claims applicable or similar to our products and processes. The sale of products covered by patents of others could require licenses that may not be available on terms acceptable to us, or at all. For further discussion of legal matters, see Item 3, "Legal Proceedings," of this report.

**Executive Officers of the Company** 

As of August 9, 2018, the executive officers of Lam Research were as follows:

Name Age Title

Martin B. Anstice 51 Chief Executive Officer

Timothy M. Archer 51 President and Chief Operating Officer

Douglas R. Bettinger 51 Executive Vice President, Chief Financial Officer, and Chief Accounting Officer

Richard A. Gottscho 66 Executive Vice President, Corporate Chief Technology Officer

Kevin D. Jennings 53 Senior Vice President, Global Operations

Patrick J. Lord 52 Senior Vice President and General Manager, CSBG Scott G. Meikle 56 Senior Vice President, Global Customer Operations Sarah A. O'Dowd 68 Senior Vice President, Chief Legal Officer and Secretary

Vahid Vahedi 52 Senior Vice President and General Manager, Etch Business Unit

Sesha Varadarajan 43 Senior Vice President and General Manager, Deposition Business Unit

Martin B. Anstice has been our chief executive officer since January 2012. Mr. Anstice joined us in April 2001 as senior director, operations controller, was promoted to the position of managing director and corporate controller in May 2002, and was promoted to group vice president and chief financial officer in June 2004. He was appointed executive vice president and chief operating officer in September 2008 and president in December 2010, a position he held until January 2018. Prior to joining us, he held various finance positions from 1988 to 1999 at Raychem Corporation, a global materials science company. Subsequent to the acquisition of Raychem by Tyco International, a global provider of engineered electronic components, network solutions, and wireless systems, he assumed responsibility for supporting mergers and acquisitions activities of Tyco Electronics. Mr. Anstice is an Associate member of the Institute of Chartered Management Accountants in the United Kingdom.

Timothy M. Archer has been our president and chief operating officer since January 2018. Mr. Archer joined us in June 2012 as our executive vice president, chief operating officer. Prior to joining us, he spent 18 years at Novellus Systems, Inc., ("Novellus") in various technology development and business leadership roles, including most recently as chief operating officer from January 2011 to June 2012; executive vice president of Worldwide Sales, Marketing, and Customer Satisfaction from September 2009 to January 2011; and executive vice president of the PECVD and Electrofill Business Units from November 2008 to September 2009. His tenure at Novellus also included assignments as senior director of technology for Novellus Systems Japan from 1999 to 2001 and senior director of technology for the Electrofill Business Unit from April 2001 to April 2002. He started his career in 1989 at Tektronix, where he was responsible for process development for high-speed bipolar ICs. Mr. Archer completed the Program for Management Development at the Harvard Graduate School of Business and earned a B.S. degree in applied physics from the California Institute of Technology.

Continues on next page

Lam Research Corporation 2018 10-K 13

### **Table of Contents**

Douglas R. Bettinger is our executive vice president, chief financial officer, and chief accounting officer with responsibility for Finance, Tax, Treasury, Information Technology, and Investor Relations. Prior to joining the Company in 2013, Mr. Bettinger served as senior vice president and chief financial officer of Avago Technologies from 2008 to 2013. From 2007 to 2008, he served as vice president of Finance and corporate controller at Xilinx, Inc., and from 2004 to 2007, he was chief financial officer at 24/7 Customer, a privately held company. Mr. Bettinger worked at Intel Corporation from 1993 to 2004, where he held several senior-level finance positions, including corporate planning and reporting controller and Malaysia site operations controller. Mr. Bettinger earned an M.B.A. degree in finance from the University of Michigan and a B.S. degree in economics from the University of Wisconsin in Madison.

Richard A. Gottscho is our executive vice president, corporate chief technology officer, a position he has held since May 2017. Prior to that time, he had been executive vice president, Global Products Group beginning in August 2010; and group vice president and general manager, Etch Businesses beginning in March 2007. He joined us in January 1996 and has served at various director and vice president levels in support of etch products, CVD products, and corporate research. Prior to joining us, he was a member of Bell Laboratories for 15 years, where he started his career working in plasma processing. During his tenure at Bell, he headed research departments in electronics materials, electronics packaging, and flat panel displays. He is the author of numerous papers, patents, and lectures in plasma processing and process control. He is a recipient of the American Vacuum Society's Peter Mark Memorial Award and Plasma Science and Technology Division Prize, the Gaseous Electronics Conference Foundation Lecturer, the Dry Process Symposium Nishizawa Award, and the Tegal Thinker Award. He is a fellow of the American Physical and American Vacuum Societies, has served on numerous editorial boards of refereed technical publications and program committees for major conferences in plasma science and engineering, and was vice-chair of a National Research Council study on plasma science in the 1980s. In 2016, Dr. Gottscho was elected to the U.S. National Academy of Engineering. Dr. Gottscho earned Ph.D. and B.S. degrees in physical chemistry from the Massachusetts Institute of Technology and Pennsylvania State University, respectively.

Kevin D. Jennings is our senior vice president, global operations, a position he has held since February 2018 in which he is responsible for worldwide manufacturing, supply chain, logistics, and facilities. Prior to that time, he had been group vice president, global operations beginning in June 2013; and vice president, strategic development, beginning in June 2012. Prior to our acquisition of Novellus in June 2012, he held a variety of executive roles covering engineering, business development, marketing, product line general management, and operations at Novellus. Mr. Jennings has over 30 years of experience in the semiconductor capital equipment industry that includes KLA-Tencor and began in 1986 at Applied Materials. He earned an M.B.A. from Pepperdine University and an undergraduate degree in electrical engineering technology from DeVry University.

Patrick J. Lord is our senior vice president and general manager of the Customer Support Business Group, a position he has held since December 2016. Previously, Dr. Lord held the position of group vice president and deputy general manager of the Global Products Group from September 2013 to December 2016. He served as the head of the Direct Metals, GapFill, Surface Integrity Group, and Integrated Metals ("DGSI") Business Units between June 2012 and September 2013. Prior to our acquisition of Novellus in June 2012, Dr. Lord was senior vice president and general manager of the DGSI Business Units at Novellus. Additionally, Dr. Lord held the position of senior vice president of Business Development and Strategic Planning. He joined Novellus in 2001 and held a number of other positions, including executive vice president and general manager of the CMP Business Unit, senior director of Business Development, senior director of Strategic Marketing, and acting vice president of Corporate Marketing. Before joining Novellus, Dr. Lord spent six years at KLA-Tencor Corporation ("KLA-Tencor") in various product marketing and management roles. He earned his Ph.D., M.S., and B.S. degrees in mechanical engineering from the Massachusetts Institute of Technology.

Scott G. Meikle is our senior vice president of Global Customer Operations, a position he has held since September 2017. Before joining us, he was an independent consultant for a year and director, special projects at Micron Technology, Inc. for seven months. Prior to that time, he spent over five and a half years at Inotera Memories, Inc., most recently as its president from August 2012 to December 2015. Dr. Meikle started his career in process R&D and advanced to various leadership roles in business operations across multiple geographies for Micron Technology, and

has over 25 years of experience in the memory devices sector of the semiconductor industry. He earned his Ph.D. and M. Eng. degrees in engineering physics from Shizuoka University and McMaster University, respectively, and a B.S. degree in physics from the University of Calgary.

### **Table of Contents**

Sarah A. O'Dowd is our senior vice president, chief legal officer and secretary. She joined us in September 2008 as group vice president and chief legal officer, responsible for general legal matters, intellectual property and ethics, and compliance. In addition to her Legal function, in April 2009 she was appointed vice president of Human Resources and served in this dual capacity through May 2012. Prior to joining us, she was vice president and general counsel for FibroGen, Inc., from February 2007 until September 2008. Until February 2007, Ms. O'Dowd was a shareholder in the law firm of Heller Ehrman LLP for more than 20 years, practicing in the areas of corporate securities, governance, and mergers and acquisitions for a variety of clients, principally publicly traded high-technology companies. She served in a variety of leadership and management roles at Heller Ehrman, including managing partner of the Silicon Valley and San Diego offices, member of the firm's Policy Committee, and, as head of the firm's business practice groups, a member of the firm's Executive Committee. Ms. O'Dowd earned her J.D. and M.A. degrees in communications from Stanford Law School and Stanford University, respectively, and her B.A. degree in mathematics from Immaculata College.

Vahid Vahedi is our senior vice president and general manager of the Etch Business Unit, a position he has held since February 2018. Prior to that time, he was group vice president of the Etch product group since March 2012. Previously, he served as vice president of Etch Business Product Management and Marketing, vice president of Dielectric Etch, vice president of Conductor and 3DIC Etch, and director of Conductor Etch Technology Development. He joined us in 1995. He earned his Ph.D., M.S., and B.S. degrees in electrical engineering and computer science from the University of California at Berkeley.

Sesha Varadarajan is our senior vice president and general manager of the Deposition Business Unit, a position he has held since February 2018. Prior that time, he was group vice president of the Deposition product group since September 2013. Previously, he served as the head of the PECVD/Electrofill Business Unit between June 2012 and September 2013. Prior to our acquisition of Novellus in June 2012, Mr. Varadarajan was senior vice president and general manager of Novellus' PECVD and Electrofill Business Units. He joined Novellus in 1999 as a process engineer with the Electrofill Business Unit and held various roles in that business unit before being appointed director of technology in 2004. Between 2006 and 2008, he worked in the PECVD Business Unit, initially as director of technology, until being promoted to product general manager. In 2009, he returned to the Electrofill Business Unit as vice president and general manager. In mid-2011, he was promoted to senior vice president and general manager, where he was also responsible for the PECVD Business Unit. Mr. Varadarajan earned an M.S. degree in manufacturing engineering and material science from Boston University and a B.S. degree in mechanical engineering from the University of Mysore.

### Item 1A. Risk Factors

In addition to the other information in this Annual Report on Form 10-K ("2018 Form 10-K"), the following risk factors should be carefully considered in evaluating us and our business because such factors may significantly impact our business, operating results, and financial condition. As a result of these risk factors, as well as other risks discussed in our other SEC filings, our actual results could differ materially from those projected in any forward-looking statements. No priority or significance is intended, nor should be attached, to the order in which the risk factors appear.

The Semiconductor Capital Equipment Industry Is Subject to Variability and Periods of Rapid Growth or Decline; We Therefore Face Risks Related to Our Strategic Resource Allocation Decisions

The semiconductor capital equipment industry has historically been characterized by rapid changes in demand. The industry environment has moved toward being more characterized by variability across segments and customers accentuated by consolidation within the industry. Variability in our customers' business plans may lead to changes in demand for our equipment and services, which could negatively impact our results. The variability in our customers' investments during any particular period is dependent on several factors, including but not limited to electronics demand, economic conditions (both general and in the semiconductor and electronics industries), industry supply and demand, prices for semiconductors, and our customers' ability to develop and manufacture increasingly complex and costly semiconductor devices. The changes in demand may require our management to adjust spending and other resources allocated to operating activities.

During periods of rapid 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 for training, assimilating, and managing our workforce, and in appropriately sizing our supply chain

### **Table of Contents**

infrastructure and facilities, work force, and other components of our business on a timely basis. If we do not adequately meet these challenges during periods of increasing or declining demand, our gross margins and earnings may be negatively impacted.

We continuously reassess our strategic resource allocation choices in response to the changing business environment. If we do not adequately adapt to the changing business environment, we may lack the infrastructure and resources to scale up our business to meet customer expectations and compete successfully during a period of growth, or we may expand our capacity too rapidly and/or beyond what is appropriate for the actual demand environment, resulting in excess fixed costs.

Especially during transitional periods, resource allocation decisions can have a significant impact on our future performance, particularly if we have not accurately anticipated industry changes. Our success will depend, to a significant extent, on the ability of our executive officers and other members of our senior management to identify and respond to these challenges effectively.

Future Declines in the Semiconductor Industry, and the Overall World Economic Conditions on Which It Is Significantly Dependent, Could Have a Material Adverse Impact on Our Results of Operations and Financial Condition

Our business depends on the capital equipment expenditures of semiconductor manufacturers, which in turn depend on the current and anticipated market demand for integrated circuits. With the consolidation of customers within the industry, the semiconductor capital equipment market may experience rapid changes in demand driven both by changes in the market generally and the plans and requirements of particular customers. The economic, political, and business conditions occurring nationally, globally, or in any of our key sales regions, which are often unpredictable, have historically impacted customer demand for our products and normal commercial relationships with our customers, suppliers, and creditors. Additionally, in times of economic uncertainty, our customers' budgets for our products, or their ability to access credit to purchase them, could be adversely affected. This would limit their ability to purchase our products and services. As a result, changing business or economic conditions can cause material adverse changes to our results of operations and financial condition, including but not limited to:

- a decline in demand for our products or services;
- an increase in reserves on accounts receivable due to our customers' inability to pay us;
- an increase in reserves on inventory balances due to excess or obsolete inventory as a result of our inability to sell such inventory;
- valuation allowances on deferred tax assets;
- restructuring charges;
- asset impairments including the potential impairment of goodwill and other intangible assets;
- a decline in the value of our investments;
- exposure to claims from our suppliers for payment on inventory that is ordered in anticipation of customer purchases that do not come to fruition;
- a decline in the value of certain facilities we lease to less than our residual value guarantee with the lessor; and challenges maintaining reliable and uninterrupted sources of supply.

Fluctuating levels of investment by semiconductor manufacturers may materially affect our aggregate shipments, revenues, operating results, and earnings. Where appropriate, we will attempt to respond to these fluctuations with cost management programs aimed at aligning our expenditures with anticipated revenue streams, which sometimes result in restructuring charges. Even during periods of reduced revenues, we must continue to invest in R&D and maintain extensive ongoing worldwide customer service and support capabilities to remain competitive, which may temporarily harm our profitability and other financial results.

Continues on next page

Lam Research Corporation 2018 10-K 16

### **Table of Contents**

Our Quarterly Revenues and Operating Results Are Variable

Our revenues and operating results may fluctuate significantly from quarter to quarter due to a number of factors, not all of which are in our control. We manage our expense levels based in part on our expectations of future revenues. Because our operating expenses are based in part on anticipated future revenues, and a certain amount of those expenses are relatively fixed, a change in the timing of recognition of revenue and/or the level of gross profit from a small number of transactions can unfavorably affect operating results in a particular quarter. Factors that may cause our financial results to fluctuate unpredictably include but are not limited to:

economic conditions in the electronics and semiconductor industries in general and specifically the semiconductor equipment industry;

the size and timing of orders from customers;

consolidation of the customer base, which may result in the investment decisions of one customer or market having a significant effect on demand for our products or services;

procurement shortages;

the failure of our suppliers or outsource providers to perform their obligations in a manner consistent with our expectations;

manufacturing difficulties;

eustomer cancellations or delays in shipments, installations, and/or customer acceptances;

the extent that customers continue to purchase and use our products and services in their business;

our customers' reuse of existing and installed products, to the extent that such reuse decreases their need to purchase new products or services;

changes in average selling prices, customer mix, and product mix;

our ability to develop, introduce, and market new, enhanced, and competitive products in a timely manner;

our competitors' introduction of new products;

legal or technical challenges to our products and technologies;

transportation, communication, demand, information technology, or supply disruptions based on factors outside our control, such as strikes, acts of God, wars, terrorist activities, and natural or man-made disasters;

legal, tax, accounting, or regulatory changes (including but not limited to change in import/export regulations and tariffs) or changes in the interpretation or enforcement of existing requirements;

changes in our estimated effective tax rate;

foreign currency exchange rate fluctuations; and

the dilutive impact of our Convertible Notes (as defined below) and related warrants on our earnings per share.

We May Incur Impairments to Goodwill or Long-lived Assets

We review our long-lived assets, including goodwill and intangible assets identified in business combinations and other intangible assets, for impairment annually or whenever events or changes in circumstances indicate that the carrying amount of these assets may not be recoverable. Negative industry or economic trends, including reduced market prices of our Common Stock, reduced estimates of future cash flows, disruptions to our business, slower growth rates, or lack of growth in our relevant business units, could lead to impairment charges against our long-lived assets, including goodwill and other intangible assets. If, in any period, our stock price decreases to the point where our fair value, as determined by our market capitalization, is less than the book value of our assets, this could also indicate a potential impairment, and we may be required to record an impairment charge in that period, which could adversely affect our result of operations.

Our valuation methodology for assessing impairment requires management to make judgments and assumptions based on historical experience and to rely heavily on projections of future operating performance. We operate in a highly competitive environment and projections of future operating results and cash flows may vary significantly from actual results. Additionally, if our analysis indicates potential impairment to goodwill in one or more of our business units, we may be required to record additional charges to earnings in our financial statements, which could negatively affect our results of operations.

### **Table of Contents**

Our Leverage and Debt Service Obligations and Potential Note Conversion or Related Hedging Activities May Adversely Affect Our Financial Condition, Results of Operations, and Earnings per Share We have \$2.5 billion in aggregate principal amount of senior unsecured notes, convertible notes, and commercial paper instruments outstanding. Additionally, we have funding available to us under our \$1.25 billion commercial paper program and our \$1.25 billion revolving credit facility, which serves as a backstop to our commercial paper program. Our revolving credit facility also includes an option to increase the amount up to an additional \$600 million, for a potential total commitment of \$1.85 billion. We may, in the future, decide to enter into additional debt arrangements.

In addition, we have entered, and in the future may enter, into derivative instrument arrangements to hedge against the variability of cash flows due to changes in the benchmark interest rate of fixed rate debt. We could be exposed to losses in the event of nonperformance by the counterparties to our derivative instruments.

Our indebtedness could have adverse consequences, including:

risk associated with any inability to satisfy our obligations;

a portion of our cash flows that may have to be dedicated to interest and principal payments and may not be available for operations, working capital, capital expenditures, expansion, acquisitions, or general corporate or other purposes; and

•mpairing our ability to obtain additional financing in the future.

Our ability to meet our expenses and debt obligations will depend on our future performance, which will be affected by financial, business, economic, regulatory, and other factors. Furthermore, our operations may not generate sufficient cash flows, to enable us to meet our expenses and service our debt. As a result, we may need to enter into new financing arrangements to obtain the necessary funds. If we determine it is necessary to seek additional funding for any reason, we may not be able to obtain such funding or, if funding is available, obtain it on acceptable terms. If we fail to make a payment on our debt, we could be in default on such debt, and this default could cause us to be in default on our other outstanding indebtedness.

Conversion of our Convertible Notes and the exercise of the related warrants may cause dilution to our stockholders and to our earnings per share. The number of shares of our Common Stock into which the Convertible Notes are convertible and for which related warrants are exercisable for may be adjusted from time to time, including increases in such rates as a result of dividends that we pay to our stockholders. Upon conversion of any Convertible Notes, we will deliver cash in the amount of the principal amount of the Convertible Notes and, with respect to any excess conversion value greater than the principal amount of the Convertible Notes, shares of our Common Stock, which would result in dilution to our stockholders. This dilution may not be completely mitigated by the hedging transactions we entered into in connection with the sale of certain Convertible Notes or through share repurchases. Prior to the maturity of the Convertible Notes, if the price of our Common Stock exceeds the conversion price, U.S. generally accepted accounting principles require that we report an increase in diluted share count, which would result in lower reported earnings per share. The price of our Common Stock could also be affected by sales of our Common Stock by investors who view the Convertible Notes as a more attractive means of equity participation in our company and also by hedging activity that may develop involving our Common Stock by holders of the Convertible Notes. Our Credit Agreements Contain Covenant Restrictions That May Limit Our Ability to Operate Our Business We may be unable to respond to changes in business and economic conditions, engage in transactions that might otherwise be beneficial to us, or obtain additional financing because our debt agreements contain, and any of our other future similar agreements may contain, covenant restrictions that limit our ability to, among other things:

•ncur additional debt, assume obligations in connection with letters of credit, or issue guarantees; •create liens;

enter into transactions with our affiliates;

sell certain assets; and

merge or consolidate with any person.

### **Table of Contents**

Our ability to comply with these covenants is dependent on our future performance, which will be subject to many factors, some of which are beyond our control, including prevailing economic conditions. In addition, our failure to comply with these covenants could result in a default under the Senior Notes, the Convertible Notes, or our other debt, which could permit the holders to accelerate such debt. If any of our debt is accelerated, we may not have sufficient funds available to repay such debt, which could materially and negatively affect our financial condition and results of operation.

# We Have a Limited Number of Key Customers

Sales to a limited number of large customers constitute a significant portion of our overall revenue, shipments, cash flows, collections, and profitability. As a result, the actions of even one customer may subject us to variability in those areas that is difficult to predict. In addition, large customers may be able to negotiate requirements that result in decreased pricing, increased costs, and/or lower margins for us; compliance with specific environmental, social, and corporate governance standards; and limitations on our ability to share jointly developed technology with others. Similarly, significant portions of our credit risk may, at any given time, be concentrated among a limited number of customers so that the failure of even one of these key customers to pay its obligations to us could significantly impact our financial results.

We Depend on Creating New Products and Processes and Enhancing Existing 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 that enable those 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 or existing products have reliability, quality, design, or safety problems, our performance may be impacted by reduced orders, higher manufacturing costs, delays in acceptance of and payment for new products, and additional service and warranty expenses. We may be unable to develop and manufacture products successfully, or products that we introduce may fail in the marketplace. For more than 25 years, the primary driver of technology advancement in the semiconductor industry has been to shrink the lithography that prints the circuit design on semiconductor chips. That driver could be approaching its technological limit, leading semiconductor manufacturers to investigate more complex changes in multiple technologies in an effort to continue technology development. In the face of uncertainty on which technology solutions will become successful, we will need to focus our efforts on developing the technology changes that are ultimately successful in supporting our customer requirements. Our failure to develop and offer the correct technology solutions in a timely manner with productive and cost-effective products could adversely affect our business in a material way. Our failure to commercialize new products in a timely manner could result in loss of market share, unanticipated costs, and inventory obsolescence, which would adversely affect our financial results.

In order to develop new products and processes and enhance existing products and processes, we expect to continue to make significant investments in R&D, to investigate the acquisition of new products and technologies, to invest in or acquire such business or technologies, and to pursue joint development relationships with customers, suppliers, or other members of the industry. Our investments and acquisitions may not be as successful as we may expect, particularly as we seek to invest or acquire product lines and technologies that are new to us. We may find that acquisitions are not available to us, for regulatory or other reasons, and that we must therefore limit ourselves to collaboration and joint venture development activities, which do not have the same benefits as acquisitions. Pursuing development through collaboration and/or joint development activities rather than through an acquisition poses substantial challenges for management, including those related to aligning business objectives, sharing confidential information and intellectual property, sharing value with third parties, and realizing synergies that might have been available in an acquisition but are not available through a joint development project. We must manage product transitions and joint development relationships successfully, as the introduction of new products could adversely affect our sales of existing products and certain jointly developed technologies may be subject to restrictions on our ability to share that technology with other customers, which could limit our market for products incorporating those technologies. Future technologies, processes, or product developments may render our current product offerings

obsolete, leaving us with non-competitive products, obsolete inventory, or both. Moreover, customers may adopt new technologies or processes to address the complex challenges associated with next-generation devices. This shift may result in a

### **Table of Contents**

reduction in the size of our addressable markets or could increase the relative size of markets in which we either do not compete or have relatively low market share.

We Are Subject to Risks Relating to Product Concentration and Lack of Product Revenue Diversification We derive a substantial percentage of our revenues from a limited number of products. Our products are priced up to approximately \$11 million per system. As a result, the inability to recognize revenue on even a few systems can cause a significantly adverse impact on our revenues for a given quarter, and, in the longer term, the continued market acceptance of these products is critical to our future success. Our business, operating results, financial condition, and cash flows could therefore be adversely affected by:

- a decline in demand for even a limited number of our products,
- a failure to achieve continued market acceptance of our key products,
- export restrictions or other regulatory or legislative actions that could limit our ability to sell those products to key customers or customers within certain markets,
- an improved version of products being offered by a competitor in the markets in which we participate,
- increased pressure from competitors that offer broader product lines,
- technological changes that we are unable to address with our products, or
- a failure to release new or enhanced versions of our products on a timely basis.

In addition, the fact that we offer limited product lines creates the risk that our customers may view us as less important to their business than our competitors that offer additional products and/or product capabilities. This may impact our ability to maintain or expand our business with certain customers. Such product concentration may also subject us to additional risks associated with technology changes. Our business is affected by our customers' use of our products in certain steps in their wafer fabrication processes. Should technologies change so that the manufacture of semiconductors requires fewer steps using our products, this could have a larger impact on our business than it would on the business of our less concentrated competitors.

Strategic Alliances and Customer Consolidation May Have Negative Effects on Our Business

Increasingly, semiconductor manufacturing companies are entering into strategic alliances or consolidating with one another to expedite the development of processes and other manufacturing technologies and/or achieve economies of scale. The outcomes of such an alliance can be the definition of a particular tool set for a certain function and/or the standardization of a series of process steps that use a specific set of manufacturing equipment, while the outcomes of consolidation can lead to an overall reduction in the market for semiconductor manufacturing equipment as customers' operations achieve economies of scale and/or increased purchasing power based on their higher volumes. In certain instances, this could work to our disadvantage if a competitor's tools or equipment become the standard equipment for such functions or processes. Additional outcomes of such consolidation may include our customers re-evaluating their future supplier relationships to consider our competitors' products and/or gaining additional influence over the pricing of products and the control of intellectual property.

Similarly, our customers may partner with, or follow the lead of, educational or research institutions that establish processes for accomplishing various tasks or manufacturing steps. If those institutions utilize a competitor's equipment when they establish those processes, it is likely that customers will tend to use the same equipment in setting up their own manufacturing lines. Even if they select our equipment, the institutions and the customers that follow their lead could impose conditions on acceptance of that equipment, such as adherence to standards and requirements or limitations on how we license our proprietary rights, that increase our costs or require us to take on greater risk. These actions could adversely impact our market share and financial results.

We Depend on a Limited Number of Key Suppliers and Outsource Providers, and We Run the Risk That They Might Not Perform as We Expect

Outsource providers and component suppliers have played and will continue to play a key role in our manufacturing operations, field installation and support, and many of our transactional and administrative functions, such as information technology, facilities management, and certain elements of our finance organization. These providers and suppliers might suffer financial setbacks, be acquired by third parties, become

### **Table of Contents**

subject to exclusivity arrangements that preclude further business with us, or be unable to meet our requirements or expectation due to their independent business decisions or force majeure events that could interrupt or impair their continued ability to perform as we expect.

Although we attempt to select reputable providers and suppliers and we attempt to secure their performance on terms documented in written contracts, it is possible that one or more of these providers or suppliers could fail to perform as we expect, or fail to secure or protect intellectual property rights, and such failure could have an adverse impact on our business. In some cases, the requirements of our business mandate that we obtain certain components and sub-assemblies included in our products from a single supplier or a limited group of suppliers. Where practical, we endeavor to establish alternative sources to mitigate the risk that the failure of any single provider or supplier will adversely affect our business, but this is not feasible in all circumstances. There is therefore a risk that a prolonged inability to obtain certain components or secure key services could impair our ability to manage operations, ship products, and generate revenues, which could adversely affect our operating results and damage our customer relationships.

We Face Risks Related to the Disruption of Our Primary Manufacturing Facilities

Our manufacturing facilities are concentrated in a limited number of locations. These locations are subject to disruption for a variety of reasons, such as natural or man-made disasters, terrorist activities, disruptions of our information technology resources, utility interruptions, or other events beyond our control. Such disruptions may cause delays in shipping our products, which could result in the loss of business or customer trust, adversely affecting our business and operating results.

Once a Semiconductor Manufacturer Commits to Purchase a Competitor's Semiconductor Manufacturing Equipment, the Manufacturer Typically Continues to Purchase That Competitor's Equipment, Making It More Difficult for Us to Sell Our Equipment to That Customer

Semiconductor manufacturers must make a substantial investment to qualify and integrate wafer processing equipment into a semiconductor production line. We believe that once a semiconductor manufacturer selects a particular supplier's processing equipment, the manufacturer generally relies upon that equipment for that specific production line application for an extended period of time, especially for customers that are more focused on tool reuse. Accordingly, we expect it to be more difficult to sell our products to a given customer if that customer initially selects a competitor's equipment for the same product line application.

We Face a Challenging and Complex Competitive Environment

We face significant competition from multiple competitors, and with increased consolidation efforts in our industry, we may face increasing competitive pressures. Other companies continue to develop systems and/or acquire businesses and products that are competitive to ours and may introduce new products and product capabilities that may affect our ability to sell and support 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 must devote significant financial resources to offer products that meet our customers' needs, to maintain customer service and support centers worldwide, and to invest in product and process R&D. Certain of our competitors, including those that are created and financially backed by foreign governments, have substantially greater financial resources and more extensive engineering, manufacturing, marketing, and customer service and support resources than we do and therefore have the potential to offer customers a more comprehensive array of products and/or product capabilities and to therefore achieve additional relative success in the semiconductor equipment industry. These competitors may deeply discount or give away 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. We also face competition from our own customers, who in some instances have established affiliated entities that manufacture equipment similar to ours. In addition, we face competition from companies that exist in a more favorable legal or regulatory environment than we do, allowing the freedom of action in ways that we may be unable to match. In many cases speed to solution is necessary for customer satisfaction and our competitors may be better positioned to achieve these objectives. For these reasons, we may fail to continue to compete successfully worldwide.

### **Table of Contents**

In addition, our competitors may be able to develop products comparable or superior to those we offer or may adapt more quickly to new technologies or evolving customer requirements. In particular, while we continue to develop product enhancements that we believe will address future customer requirements, we may fail in a timely manner to complete the development or introduction of these additional product enhancements successfully, or these product enhancements may not achieve market acceptance or be competitive. Accordingly, competition may intensify, and we may be unable to continue to compete successfully in our markets, which could have a material adverse effect on our revenues, operating results, financial condition, and/or cash flows.

Our Future Success Depends Heavily on International Sales and the Management of Global Operations Non-U.S. sales, as reflected in Part 1 Item 1. Business of this 2018 Form 10-K, accounted for approximately 93%, 92%, and 92% of total revenue in fiscal years 2018, 2017, and 2016, respectively. We expect that international sales will continue to account for a substantial majority of our total revenue in future years.

We are subject to various challenges related to international sales and the management of global operations including, but not limited to:

trade balance issues;

tariffs and other barriers;

developing customers and/or suppliers, whom may have limited access to capital resources.

global or national economic and political conditions;

changes in currency controls;

differences in the enforcement of intellectual property and contract rights in varying jurisdictions;

our ability to respond to customer and foreign government demands for locally sourced systems, spare parts, and services and develop the necessary relationships with local suppliers;

compliance with U.S. and international laws and regulations affecting foreign operations, including U.S. and international trade restrictions and sanctions, anti-bribery, anti-corruption, environmental, tax, and labor laws;

fluctuations in interest and foreign currency exchange rates;

the need for technical support resources in different locations; and

our ability to secure and retain qualified people, and effectively manage people, in all necessary locations for the successful operation of our business.

There is inherent risk, based on the complex relationships among China, Japan, Korea, Taiwan, and the United States, that political and diplomatic influences might lead to trade disruptions. This would adversely affect our business with China, Japan, Korea, and/or Taiwan and perhaps the entire Asia Pacific region. A significant trade disruption in any area where we do business could have a materially adverse impact on our future revenue and profits. Tariffs, additional taxes or trade barriers may increase our manufacturing costs, decrease margins, reduce the competitiveness of our products, or inhibit our ability to sell products or purchase necessary equipment and supplies, which could have a material adverse effect on our business, results of operations, or financial conditions. In addition, there are risks that foreign governments may, among other things, insist on the use of local suppliers; compel companies to partner with local companies to design and supply equipment on a local basis, requiring the transfer of intellectual property rights and/or local manufacturing; and provide special incentives to government-backed local customers to buy from local competitors, even if their products are inferior to ours; all of which could adversely impact our revenues and margins. Certain international sales depend on our ability to obtain export licenses from the U.S. government. Our failure or inability to obtain such licenses could potentially limit our markets and impact our revenues. Many of the challenges noted above are applicable in China, which is a fast-developing market for the semiconductor equipment industry and therefore an area of anticipated growth for our business.

We are exposed to potentially adverse movements in foreign currency exchange rates. The majority of our sales and expenses are denominated in U.S. dollars. However, we are exposed to foreign currency exchange rate fluctuations primarily related to revenues denominated in Japanese yen and expenses denominated in euro and Korean won. Currently, we hedge certain anticipated foreign currency cash flows, primarily anticipated revenues denominated in Japanese yen and expenses dominated in euro and Korean won. In addition, we enter into foreign currency hedge contracts to minimize the short-term impact of the foreign currency exchange rate fluctuations on certain foreign

currency denominated monetary assets and liabilities, primarily third-party accounts receivables, accounts payables, and intercompany receivables and payables. We believe these are our

### **Table of Contents**

primary exposures to currency rate fluctuation. We expect to continue to enter into hedging transactions, for the purposes outlined, for the foreseeable future. However, these hedging transactions may not achieve their desired effect because differences between the actual timing of the underlying exposures and our forecasts of those exposures may leave us either over or under hedged on any given transaction. Moreover, by hedging these foreign currency denominated revenues, expenses, monetary assets, and liabilities, we may miss favorable currency trends that would have been advantageous to us but for the hedges. Additionally, we are exposed to short-term foreign currency exchange rate fluctuations on non-U.S. dollar-denominated monetary assets and liabilities (other than those currency exposures previously discussed), and currently we do not enter into foreign currency hedge contracts against these exposures. Therefore, we are subject to potential unfavorable foreign currency exchange rate fluctuations to the extent that we transact business (including intercompany transactions) in these currencies.

The magnitude of our overseas business also affects where our cash is generated. Certain uses of cash, such as share repurchases, payment of dividends, or the repayment of our notes, can usually only be made with onshore cash balances. Since the majority of our cash is generated outside of the United States, this may impact certain business decisions and outcomes.

Our Ability to Attract, Retain, and Motivate Key Employees Is Critical to Our Success

Our ability to compete successfully depends in large part on our ability to attract, retain, and motivate key employees with the appropriate skills, experiences and competencies. This is an ongoing challenge due to intense competition for top talent, fluctuations in industry or business economic conditions, as well as increasing geographic expansion that may require cycles of hiring activity and workforce reductions. Our success in hiring depends on a variety of factors, including the attractiveness of our compensation and benefit programs, global economic or political and industry conditions, our organizational structure, global competition for talent and the availability of qualified employees, the availability of career development opportunities, the ability to obtain necessary authorizations for workers to provide services outside their home countries, and our ability to offer a challenging and rewarding work environment. We periodically evaluate our overall compensation and benefit programs and make adjustments, as appropriate, to maintain or enhance their competitiveness. If we are not able to successfully attract, retain, and motivate key employees, we may be unable to capitalize on market opportunities and our operating results may be materially and adversely affected.

Certain Critical Information Systems, That We Rely on for the Operation of Our Business, and Products That We Sell Are Susceptible to Cybersecurity and Other Threats or Incidents

We maintain and rely upon certain critical information systems for the effective operation of our business. These information systems include but are not limited to, telecommunications, the Internet, our corporate intranet, various computer hardware and software applications, (some of which may be integrated into the products that we sell or be required in order to provide the services that we offer), network communications, and email. These information systems may be owned and maintained by us, our outsourced providers, or third parties such as vendors, contractors, and Cloud providers. In addition, we make use of Software-As-A-Service (SAAS) products for certain important business functions that are provided by third parties and hosted on their own networks and servers, or third party networks and servers, all of which rely on networks, email and/or the Internet for their function. All of these information systems are subject to disruption, breach or failure from various sources, including those using techniques that change frequently or may be disguised or difficult to detect, or designed to remain dormant until a triggering event, or that may continue undetected for an extended period of time. Those sources may include mistakes or unauthorized actions by our employees or contractors; phishing schemes and other third-party attacks, and degradation or loss of service or access to our data due to viruses, malware, denial of service attacks, destructive or inadequate code, power failures, and physical damage to computers, hard drives, communication lines, and networking equipment.

We have experienced cyber threats and incidents in the past. Although past threats and incidents have not resulted in a material adverse effect, we may incur material losses related to cyber threats or incidents in the future. If we were subject to a cyber incident, it could have a material adverse effect on our business. Such adverse effects might include: Loss of (or inability to access, e.g. through ransomware) confidential and/or sensitive information including intellectual property stored on these critical information systems or transmitted to or from those systems;

### **Table of Contents**

The disruption of the proper function of our products, services and/or operations;

The failure of our or our customers' manufacturing processes;

Errors in the output of our work or our customers' work;

The loss or public exposure of the personal information of our employees or customers;

The public release of customer orders, financial and business plans, and operational results;

Exposure to claims from third parties who are adversely impacted by such incidents;

Misappropriation or theft of Company, customer, supplier, or other's assets or resources, and costs associated therewith;

Diminution in the value of Lam's investment in research, development and engineering; or

Our failure to meet, or violation of, regulatory or other legal obligations, such as the timely publication or filing of financial statements, tax information and other required communications.

While we have implemented ISO 27001 compliant security procedures and virus protection software, intrusion prevention systems, identity and access control, and emergency recovery processes, and we carefully select our third party providers of information systems, to mitigate risks to the information systems that we rely on, those mitigation and protection systems cannot be guaranteed to be fail-safe and we may still suffer cyber-related incidents.

Our Financial Results May Be Adversely Impacted by Higher than Expected Tax Rates or Exposure to Additional Tax Liabilities

As a global company, our effective tax rate is highly dependent upon the geographic composition of worldwide earnings and tax regulations governing each region. We are subject to income taxes in the United States and various foreign jurisdictions, and significant judgment is required to determine worldwide tax liabilities. Our effective tax rate could be adversely affected by changes in the split of earnings between countries with differing statutory tax rates, in the valuation allowance of deferred tax assets, in tax laws, by material audit assessments, or changes in or expirations of agreements with tax authorities. These factors could affect our profitability. In particular, the carrying value of deferred tax assets, which are predominantly in the United States, is dependent on our ability to generate future taxable income in the United States. In addition, the amount of income taxes we pay is subject to ongoing audits in various jurisdictions, and a material assessment by a governing tax authority could affect our profitability. A Failure to Comply with Environmental Regulations May Adversely Affect Our Operating Results

We are subject to a variety of domestic and international governmental regulations related to the handling, discharge, and disposal of toxic, volatile, or otherwise hazardous chemicals. Failure to comply with present or future environmental regulations could result in fines being imposed on us, require us to suspend production, and/or cease operations, or cause our customers to not accept our products. These regulations could require us to alter our current operations, acquire significant additional equipment, incur substantial other expenses to comply with environmental regulations, or take other actions. Any failure to comply with regulations governing the use, handling, sale, transport, or disposal of hazardous substances could subject us to future liabilities that may adversely affect our operating results, financial condition, and ability to operate our business.

If We Choose to Acquire or Dispose of Businesses, Product Lines, and Technologies, We May Encounter Unforeseen Costs and Difficulties That Could Impair Our Financial Performance

An important element of our management strategy is to review acquisition prospects that would complement our existing products, augment our market coverage and distribution ability, or enhance our technological capabilities. As a result, we may seek to make acquisitions of complementary companies, products, or technologies, or we may reduce or dispose of certain product lines or technologies that no longer fit our long-term strategies. For regulatory or other reasons, we may not be successful in our attempts to acquire or dispose of businesses, products, or technologies, resulting in significant financial costs, reduced or lost opportunities, and diversion of management's attention. Managing an acquired business, disposing of product technologies, or reducing personnel entails numerous operational and financial risks, including difficulties in assimilating acquired operations and new personnel or separating existing business or product groups, diversion of management's attention away from other business concerns, amortization of acquired intangible assets, adverse customer reaction to our decision to cease support for a product, and potential loss of key employees or customers of acquired or disposed operations. There can be no

assurance that we will be able to achieve and manage

### **Table of Contents**

successfully any such integration of potential acquisitions, disposition of product lines or technologies, or reduction in personnel or that our management, personnel, or systems will be adequate to support continued operations. Any such inabilities or inadequacies could have a material adverse effect on our business, operating results, financial condition, and/or cash flows.

In addition, any acquisition could result in changes such as potentially dilutive issuances of equity securities, the incurrence of debt and contingent liabilities, the amortization of related intangible assets, and goodwill impairment charges, any of which could materially adversely affect our business, financial condition, results of operations, cash flows, and/or the price of our Common Stock.

The Market for Our Common Stock Is Volatile, Which May Affect Our Ability to Raise Capital or Make Acquisitions or May Subject Our Business to Additional Costs

The market price for our Common Stock is volatile and has fluctuated significantly over the past years. The trading price of our Common Stock could continue to be highly volatile and fluctuate widely in response to a variety of factors, many of which are not within our control or influence. These factors include but are not limited to the following:

general market, semiconductor, or semiconductor equipment industry conditions;

economic or political events, trends, and unexpected developments occurring nationally, globally, or in any of our key sales regions;

- variations in our quarterly operating results and financial condition, including our liquidity;
- variations in our revenues, earnings, or other business and financial metrics from forecasts by us or securities analysts or from those experienced by other companies in our industry;
- announcements of restructurings, reductions in force, departure of key employees, and/or consolidations of operations;
- government regulations;
- developments in, or claims relating to, patent or other proprietary rights;
- technological innovations and the introduction of new products by us or our competitors;
- commercial success or failure of our new and existing products;
- disruptions of relationships with key customers or suppliers; or
- dilutive impacts of our Convertible Notes and related warrants.

In addition, the stock market experiences significant price and volume fluctuations. Historically, we have witnessed significant volatility in the price of our Common Stock due in part to the price of and markets for semiconductors. These and other factors have and may again adversely affect the price of our Common Stock, regardless of our actual operating performance. In the past, following volatile periods in the price of their stock, many companies became the object of securities class action litigation. If we are sued in a securities class action, we could incur substantial costs, and it could divert management's attention and resources and have an unfavorable impact on our financial performance and the price for our Common Stock.

Continues on next page

### **Table of Contents**

Intellectual Property, Indemnity, and Other Claims Against Us Can Be Costly and We Could Lose Significant Rights That Are Necessary to Our Continued Business and Profitability

Third parties may assert infringement, unfair competition, product liability, breach of contract, or other claims against us. From time to time, other persons send us notices alleging that our products infringe their patent or other intellectual property rights. In addition, law enforcement authorities may seek criminal charges relating to intellectual property or other issues. We also face risks of claims arising from commercial and other relationships. In addition, our bylaws and other indemnity obligations provide that we will indemnify officers and members of our Board of Directors against losses that they may incur in legal proceedings resulting from their service to us. From time to time, in the normal course of business, we indemnify third parties with whom we enter into contractual relationships, including customers and suppliers, with respect to certain matters. We have agreed, under certain conditions, to hold these third parties harmless against specified losses, such as those arising from a breach of representations or covenants, other third-party claims that our products when used for their intended purposes infringe the intellectual property rights of such other third parties, or other claims made against certain parties. In such cases, it is our policy either to defend the claims or to negotiate licenses or other settlements on commercially reasonable terms. However, we may be unable in the future to negotiate necessary licenses or reach agreement on other settlements on commercially reasonable terms, or at all, and any litigation resulting from these claims by other parties may materially adversely affect our business and financial results, and we may be subject to substantial damage awards and penalties. Moreover, although we have insurance to protect us from certain claims and cover certain losses to our property, such insurance may not cover us for the full amount of any losses, or at all, and may be subject to substantial exclusions and deductibles.

We May Fail to Protect Our Critical Proprietary Technology Rights, Which Could Affect Our Business Our success depends in part on our proprietary technology and our ability to protect key components of that technology through patents, copyrights, and trade secret protection. Protecting our key proprietary technology helps us to achieve our goals of developing technological expertise and new products and systems that give us a competitive advantage; increasing market penetration and growth of our installed base; and providing comprehensive support and service to our customers. As part of our strategy to protect our technology, we currently hold a number of U.S. and foreign patents and pending patent applications, and we keep certain information, processes, and techniques as trade secrets. However, other parties may challenge or attempt to invalidate or circumvent any patents the U.S. or foreign governments issue to us; these governments may fail to issue patents for pending applications; or we may lose trade secret protection over valuable information due to the intentional or unintentional actions or omissions of third parties, of ours, or even of our own employees. Additionally, intellectual property litigation can be expensive and time-consuming and even when patents are issued or trade secret processes are followed, the legal systems in certain of the countries in which we do business do not enforce patents and other intellectual property rights as rigorously as the United States. The rights granted or anticipated under any of our patents, pending patent applications, or trade secrets may be narrower than we expect or, in fact, provide no competitive advantages, Moreover, because we determine the jurisdictions in which to file patents at the time of filing, we may not have adequate protection in the future based on such previous decisions. Any of these circumstances could have a material adverse impact on our business.

We Are Exposed to Various Risks from Our Regulatory Environment

We are subject to various risks related to (1) new, different, inconsistent, or even conflicting laws, rules, and regulations that may be enacted by legislative bodies and/or regulatory agencies in the countries that we operate; (2) disagreements or disputes between national or regional regulatory agencies related to international trade; and (3) the interpretation and application of laws, rules, and regulations. As a public company with global operations, we are subject to the laws of multiple jurisdictions and the rules and regulations of various governing bodies, including those related to financial and other disclosures, corporate governance, privacy, anti-corruption, such as the Foreign Corrupt Practices Act and other local laws prohibiting corrupt payments to governmental officials, conflict minerals or other social responsibility legislation, immigration or travel regulations, and antitrust regulations, among others. Each of these laws, rules, and regulations imposes costs on our business, including financial costs and potential diversion of our management's attention associated with compliance, and may present risks to our business, including potential

fines, restrictions on our actions, and reputational damage if we are unable to fully comply. To maintain high standards of corporate governance and public disclosure, we intend to invest all reasonably necessary resources to comply with all evolving standards. Changes in or ambiguous interpretations of laws,

### **Table of Contents**

regulations, and standards may create uncertainty regarding compliance matters. Efforts to comply with new and changing regulations have resulted in, and are likely to continue to result in, increased selling, general, and administrative expenses and a diversion of management's time and attention from revenue-generating activities to compliance activities. If we are found by a court or regulatory agency not to be in compliance with the laws and regulations, our business, financial condition, and/or results of operations could be adversely affected.

There Can Be No Assurance That We Will Continue to Declare Cash Dividends or Repurchase Our Shares at All or in Any Particular Amounts

Our Board of Directors has declared quarterly dividends since April 2014. Our intent to continue to pay quarterly dividends and to repurchase our shares is subject to capital availability and periodic determinations by our Board of Directors that cash dividends and share repurchases are in the best interest of our stockholders and are in compliance with all laws and agreements applicable to the declaration and payment of cash dividends by us. Future dividends and share repurchases may also be affected by, among other factors, our views on potential future capital requirements for investments in acquisitions and the funding of our research and development; legal risks; changes in federal, state, and international income tax laws or corporate laws; contractual restrictions, such as financial or operating covenants in our debt arrangements; availability of onshore cash flow; and changes to our business model. Our dividend payments and share repurchases may change from time to time, and we cannot provide assurance that we will continue to declare dividends or repurchase shares at all or in any particular amounts. A reduction or suspension in our dividend payments or share repurchases could have a negative effect on the price of our Common Stock.

Item 1B. Unresolved Staff Comments

None.

Item 2. Properties

Our executive offices and principal operating and R&D facilities are located in Fremont and Livermore, California; Tualatin, Oregon; and Villach, Austria. The majority of the Fremont and Livermore facilities are held under operating leases expiring in 2020 and 2021. The Villach facilities are held under capital leases expiring in calendar year 2021. Our Fremont, Livermore, and Villach leases include options to renew or purchase the facilities. In addition, we lease or own properties for our service, technical support, and sales personnel throughout the United States, China, Europe, Japan, Korea, Southeast Asia, and Taiwan and lease or own manufacturing facilities located in Ohio and Korea. The Company owns two properties in Fremont, as well as the majority of the Tualatin facilities. Our facilities lease obligations are subject to periodic increases. We believe that our existing facilities are well-maintained and in good operating condition.

Item 3. Legal Proceedings

While we are not currently party to any legal proceedings that we believe are material, we are either a defendant or plaintiff in various actions that have arisen from time to time in the normal course of business, including intellectual property claims. We accrue for a liability when it is both probable that a liability has been incurred and the amount of the loss can be reasonably estimated. Significant judgment is required in both the determination of probability and the determination as to whether a loss is reasonably estimable. These accruals are reviewed at least quarterly and adjusted to reflect the effects of negotiations, settlements, rulings, advice of legal counsel, and other information and events pertaining to a particular matter. To the extent there is a reasonable possibility that the losses could exceed the amounts already accrued, we believe that the amount of any such additional loss would be immaterial to our business, financial condition, and results of operations.

Item 4. Mine Safety Disclosures

Not applicable.

Continues on next page

### **Table of Contents**

#### **PART II**

Item 5. Market for the Registrant's Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities

**Stock Information** 

Our Common Stock is traded on the Nasdaq Global Select Market<sup>SM</sup> under the symbol "LRCX." As of August 9, 2018, we had 418 stockholders of record. We increased our quarterly dividend throughout the 2018 fiscal year from \$0.45 per share to \$1.10 per share. The table below sets forth the quarterly dividend declared as well as the high and low prices of our Common Stock as reported by the Nasdaq Stock Market, for the period indicated:

2018

Divide Stdock Price
Declared igh Low

First quarter \$0.45 \$178.18 \$139.24 Second quarter \$0.50 \$219.70 \$167.52 Third quarter \$0.50 \$234.88 \$156.83 Fourth quarter \$1.10 \$219.46 \$170.51

2017

Divide Stdock Price
Declare Ligh Lo

First quarter \$0.30 \$95.77 \$79.15 Second quarter \$0.45 \$108.60 \$90.56 Third quarter \$0.45 \$129.35 \$105.30 Fourth quarter \$0.45 \$167.05 \$124.91

Repurchase of Company Shares

In March 2018, the board of directors authorized us to repurchase up to an additional \$2.0 billion of Common Stock. The new authorization increases the share repurchase authorization granted in November 2017 to an aggregate of up to \$4.0 billion of Common Stock, and supplements the remaining balances for any prior authorizations. These repurchases can be conducted on the open market or as private purchases and may include the use of derivative contracts with large financial institutions, in all cases subject to compliance with applicable law. Repurchases will be funded using our cash and available credit facilities. This repurchase program has no termination date and may be suspended or discontinued at any time. As part of our share repurchase program, we may from time to time enter into structured share repurchase arrangements with financial institutions using general corporate funds.

Accelerated Share Repurchase Agreements Settled in the 2018 Fiscal Year

On May 9, 2018, we entered into two separate accelerated share repurchase agreements (collectively, the "May 2018 ASR") with two financial institutions to repurchase a total of \$1.0 billion of Common Stock. We took an initial delivery of approximately 3,505,000 shares, which represented 70% of the prepayment amount divided by our closing stock price on May 9, 2018. The total number of shares received under the May 2018 ASR was based upon the average daily volume weighted average price of our Common Stock during the repurchase period, less an agreed upon discount. Final settlement of these two transactions occurred on June 8, 2018 and June 11, 2018, respectively. Approximately 1,640,000 additional shares were received at final settlement, which resulted in a weighted-average price of approximately \$194.35 for the transaction period.

On November 20, 2017, we entered into four separate accelerated share repurchase agreements (collectively, the "November 2017 ASR") with two financial institutions to repurchase a total of \$1.0 billion of Common Stock. We took an initial delivery of 3,254,300 shares, which represented 70% of the prepayment amount divided by our closing stock price on November 20, 2017. The total number of shares received under the November 2017 ASR was based upon the average daily volume weighted average price of our Common Stock during the repurchase period, less an agreed upon discount. Final settlement of two of the transactions occurred on February 1, 2018

Continues on next page

### **Table of Contents**

and February 2, 2018, respectively. Approximately 1,019,000 additional shares were received at the February 2018 final settlement, which resulted in a weighted-average share price of approximately \$189.03 for the transaction period. Final settlement for the remaining transactions occurred on April 24, 2018 and May 23, 2018, respectively. Approximately 984,000 additional shares were received at final settlement, which resulted in a weighted-average share price of approximately \$191.55 for the transaction period.

On April 19, 2017, we entered into two separate accelerated share repurchase agreements (collectively, the "April 2017 ASR") with two financial institutions to repurchase a total of \$500 million of Common Stock. We took an initial delivery of approximately 2,570,000 shares, which represented 70% of the prepayment amount divided by our closing stock price on April 19, 2017. The total number of shares received under the April 2017 ASR was based upon the average daily volume weighted average price of our Common Stock during the repurchase period, less an agreed upon discount. The April 2017 ASR settled on June 30, 2017. Approximately 780,000 shares were received at final settlement, which resulted in a weighted-average share price of approximately \$149.16 for the transaction period. Share repurchases, including those under the repurchase program, were as follows:

Period		Price Paid es per Share <sup>(2)</sup> hased <sup>(1)</sup>	or Programs	Amount Available Under Repurchase Program
	(in thou	ısands, excep	ot per share data)	
Available balance as of June 25, 2017				\$282,141
Quarter ended September 24, 2017	1,790	\$ 158.40	1,779	124,203
Board authorization, \$2.0 billion increase, November 2017				2,124,203
Quarter ended December 24, 2017	3,806	\$ 194.99	3,709	1,034,459
Board authorization, \$2.0 billion increase, March 2018				3,034,459
Quarter ended March 25, 2018	1,470	\$ 180.03	1,019	3,034,459
March 26, 2018 - April 22, 2018	1,151	\$ 193.37	1,144	3,003,614
April 23, 2018 - May 20, 2018	4,923	\$ 190.88	4,917	1,733,638
May 21, 2018 - June 24, 2018	1,646	\$ 184.37	1,641	1,733,638
Total	14,786	\$ 181.16	14,209	\$1,733,638

In addition to shares repurchased under the Board-authorized repurchase program, we acquired 577 thousand shares at a total cost of \$104.9 million which we withheld through net share settlements to cover minimum tax

<sup>(1)</sup> withholding obligations upon the vesting of restricted stock unit awards granted under our equity compensation plans. The shares retained through these net share settlements are not a part of the Board-authorized repurchase program, but instead are authorized under our equity compensation plans.

Average price paid per share excludes effect of accelerated share repurchases, see additional disclosure above regarding our accelerated share repurchase activity during the fiscal year.

### **Table of Contents**

### Cumulative Five-Year Return

The graph below compares Lam Research Corporation's cumulative five-year total shareholder return on Common Stock with the cumulative total returns of the Nasdaq Composite index, the Standard & Poor's ("S&P") 500 index, and the Philadelphia Semiconductor Sector Index. The graph tracks the performance of a \$100 investment in our Common Stock and in each of the indices (with the reinvestment of all dividends) from June 30, 2013, to June 30, 2018.

### **COMPARISON OF**

FIVE-YEAR CUMULATIVE

**TOTAL RETURN\*** 

Among Lam

Research

Corporation,

the Nasdaq

Composite

Index, the S&P

500 Index, and

the

Philadelphia

Semiconductor

Index

Continues on next page

<sup>\*\$100</sup> invested on 6/30/2013 in stock or index, including reinvestment of dividends. Fiscal years ending June 30. Copyright © 2018 Standard & Poor's, a division of S&P Global. All rights reserved.

## **Table of Contents**

	6/13	6/14	6/15	6/16	6/17	6/18
Lam Research Corporation	100.00	152.83	185.93	195.17	333.05	412.46
Nasdaq Composite Index	100.00	132.45	151.00	148.88	189.66	233.12
S&P 500 Index	100.00	124.61	133.86	139.20	164.11	187.70
Philadelphia Semiconductor Sector Index	100.00	134.53	138.83	150.22	208.31	271.06
Item 6. Selected Financial Data						

	Year Ended June 24, 2018	June 25, 2017	June 26, 2016	June 28, 2015	June 29, 2014
	(in thousands	s, except per	share data)		
OPERATIONS:					
Revenue	\$11,076,998	\$8,013,620	\$5,885,893	\$5,259,312	\$4,607,309
Gross margin	5,165,032	3,603,359	2,618,922	2,284,336	2,007,481
Goodwill impairment (1)			_	79,444	_
Operating income	3,213,299	1,902,132	1,074,256	788,039	677,669
Net income	2,380,681	1,697,763	914,049	655,577	632,289
Net income per share:					
Basic	\$14.73	\$10.47	\$5.75	\$4.11	\$3.84
Diluted	\$13.17	\$9.24	\$5.22	\$3.70	\$3.62
Cash dividends declared per common share	\$2.55	\$1.65	\$1.20	\$0.84	\$0.18
BALANCE SHEET:					
Working capital	\$5,999,603	\$6,192,383	\$6,795,109	\$3,639,488	\$3,201,661
Total assets	12,479,478	12,122,765	12,264,315 (2)	9,358,904 (2)	7,986,998 (2)
Long-term obligations, less current portion	2,749,127	2,185,338	3,744,205 (2)	1,386,536 (2)	1,191,913 (2)
Current portion of long-term debt and capital leases	610,030	908,439	947,733 (2)	1,355,705 (2)	518,267

Goodwill impairment analysis during fiscal year 2015 resulted in a non-cash impairment charge to our Clean reporting unit, extinguishing the goodwill ascribed to the reporting unit.

Continues on next page

<sup>(2)</sup> Adjusted for effects of retrospective implementation of ASU 2015-3 in the first quarter of fiscal 2017.

### **Table of Contents**

	Three Months Ended (1)				
	June 24, 2018	March 25 2018	Decembe ' 24, 2017	r	September 24, 2017
	unaudited				
	(in thousand	ls, except per	share data)		
QUARTERLY FISCAL YEAR 2018:					
Revenue	\$3,125,928		15 \$2,580,83		\$2,478,140
Gross margin	1,479,408	1,330,714		7	1,149,343
Operating income	955,195	827,511	737,371		693,222
Net income (loss)	1,021,146	<sup>(2)</sup> 778,800	(9,955	$)^{(2)}$	590,690
Net income (loss) per share					
Basic	\$6.35	\$4.80	\$(0.06	,	\$3.64
Diluted	\$5.82	\$4.33	\$(0.06	$)^{(2)}$	\$3.21
Number of shares used in per share calculations:					
Basic	160,916	162,378	161,135		162,141
Diluted	175,432	179,779	161,135		183,880
	Three Months Ended (1)				
	Three Mont	hs Ended (1)			
	Three Mont June 25, 2017	hs Ended (1) March 26, 2017	December 25, 2016	25,	ember
	June 25,	March 26,			
	June 25, 2017 unaudited	March 26,	25, 2016	25,	
QUARTERLY FISCAL YEAR 2017:	June 25, 2017 unaudited	March 26, 2017	25, 2016	25,	
QUARTERLY FISCAL YEAR 2017: Revenue	June 25, 2017 unaudited (in thousand	March 26, 2017	25, 2016 share data)	25, 2016	
	June 25, 2017 unaudited (in thousand	March 26, 2017 ds, except per	25, 2016 share data)	25, 2016	32,419
Revenue Gross margin Operating income	June 25, 2017 unaudited (in thousand \$2,344,907	March 26, 2017  ds, except per \$2,153,995	25, 2016 share data) \$1,882,299	25, 2016 \$1,63	32,419 197
Revenue Gross margin	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961	March 26, 2017  ds, except per \$2,153,995 971,404	25, 2016 (share data) \$1,882,299 846,797	25, 2016 \$1,63 716,1	32,419 197 947
Revenue Gross margin Operating income Net income Net income per share	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961 607,939 526,424	March 26, 2017  ds, except per \$2,153,995 971,404 538,418 574,713	25, 2016 share data) \$1,882,299 846,797 439,828 332,791	25, 2016 \$1,6,7 315,9 263,8	32,419 197 947 335
Revenue Gross margin Operating income Net income Net income per share Basic	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961 607,939 526,424 \$3.25	March 26, 2017  ds, except per \$2,153,995 971,404 538,418 574,713 \$3.52	25, 2016 share data) \$1,882,299 846,797 439,828 332,791 \$2.05	25, 2016 \$1,6, 716, 315,9 263,8 \$1.64	32,419 197 947 835
Revenue Gross margin Operating income Net income Net income per share Basic Diluted	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961 607,939 526,424	March 26, 2017  ds, except per \$2,153,995 971,404 538,418 574,713	25, 2016 share data) \$1,882,299 846,797 439,828 332,791	25, 2016 \$1,6,7 315,9 263,8	32,419 197 947 835
Revenue Gross margin Operating income Net income Net income per share Basic Diluted Number of shares used in per share calculations:	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961 607,939 526,424 \$3.25 \$2.82	March 26, 2017  ds, except per \$2,153,995 971,404 538,418 574,713  \$3.52 \$3.10	25, 2016 share data) \$1,882,299 846,797 439,828 332,791 \$2.05 \$1.81	25, 2016 \$1,6, 716, 315,9 263,8 \$1.4	32,419 197 947 835 4
Revenue Gross margin Operating income Net income Net income per share Basic Diluted	June 25, 2017 unaudited (in thousand \$2,344,907 1,068,961 607,939 526,424 \$3.25	March 26, 2017  ds, except per \$2,153,995 971,404 538,418 574,713 \$3.52	25, 2016 share data) \$1,882,299 846,797 439,828 332,791 \$2.05	25, 2016 \$1,6, 716, 315,9 263,8 \$1.64	32,419 197 947 335 4 7

<sup>(1)</sup> Our reporting period is a 52/53-week fiscal year. The fiscal years ended June 24, 2018, and June 25, 2017, included 52 weeks. All quarters presented above included 13 weeks.

The comparability of our quarter ended December 24, 2017 was affected by a \$757 million provisional charge (2) associated with the December 2017 U.S. tax reform. During the quarter ended June 24, 2018, \$116 million of this provisional charge was reversed.

Item 7. Management's Discussion and Analysis of Financial Condition and Results of Operations
The following discussion of our financial condition and results of operations contains forward-looking statements, which are subject to risks, uncertainties, and changes in condition, significance, value, and effect. Our actual results could differ materially from those anticipated in the forward-looking statements as a result of certain factors, including but not limited to those discussed in "Risk Factors" and elsewhere in this 2018 Form 10-K and other documents we file from time to time with the Securities and Exchange Commission. (See "Cautionary Statement Regarding Forward-Looking Statements" in Part I of this 2018 Form 10-K.)

Management's Discussion and Analysis of Financial Condition and Results of Operations ("MD&A") provides a description of our results of operations and should be read in conjunction with our Consolidated Financial Statements and accompanying Notes to Consolidated Financial Statements included in Part II, Item 8 of this 2018 Form 10-K. MD&A consists of the following sections:

Executive Summary provides a summary of the key highlights of our results of operations and our management's assessment of material trends and uncertainties relevant to our business.

### **Table of Contents**

Results of Operations provides an analysis of operating results.

Critical Accounting Policies and Estimates discusses accounting policies that reflect the more significant judgments and estimates used in the preparation of our Consolidated Financial Statements.

Liquidity and Capital Resources provides an analysis of cash flows, contractual obligations, and financial position. Executive Summary

Lam Research is a global supplier of innovative wafer fabrication equipment and services to the semiconductor industry. We have built a strong global presence with core competencies in areas like nanoscale applications enablement, chemistry, plasma and fluidics, advanced systems engineering and a broad range of operational disciplines. Our products and services are designed to help our customers build smaller, faster, and better performing devices that are used in a variety of electronic products, including mobile phones, personal computers, servers, wearables, automotive devices, storage devices, and networking equipment. Our vision is to realize full value from natural technology extensions of our company.

Our customer base includes leading semiconductor memory, foundry, and integrated device manufacturers that make products such as NVM, DRAM memory, and logic devices. We aim to increase our strategic relevance with our customers by contributing more to their continued success. Our core technical competency is integrating hardware, process, materials, software, and process control enabling results on the wafer.

Semiconductor manufacturing, our customers' business, involves the complete fabrication of multiple dies or integrated circuits on a wafer. This involves the repetition of a set of core processes and can require hundreds of individual steps. Fabricating these devices requires highly sophisticated process technologies to integrate an increasing array of new materials with precise control at the atomic scale. Along with meeting technical requirements, wafer processing equipment must deliver high productivity and be cost-effective.

Demand from the Cloud, IoT, and other markets is driving the need for increasingly powerful and cost-efficient semiconductors. At the same time, there are growing technical challenges with traditional scaling. These trends are driving significant inflections in semiconductor manufacturing, such as the increasing importance of vertical 3D scaling strategies as well as multiple patterning to enable shrinks.

We believe we are in a strong position with our leadership and competency in deposition, etch, and clean to facilitate some of the most significant innovations in semiconductor device manufacturing. Several factors create opportunity for sustainable differentiation for us: (i) our focus on research and development, with several on-going programs relating to sustaining engineering, product and process development, and concept and feasibility; (ii) our ability to effectively leverage cycles of learning from our broad installed base; (iii) our collaborative focus with ecosystem partners; and (iv) focus on delivering our multi-product solutions with a goal to enhance the value of Lam's solutions to our customers.

During the most recent fiscal year, demand for our products improved as semiconductor device manufacturers made technology and capacity investments. Over the longer term, we believe that our technology inflections in our industry, including 3D device scaling, multiple patterning process flow, and advanced packaging/chip integration will lead to an increase in our served addressable market for our products and services in deposition, etch, and clean. While there could be variability in the near-term, we believe that demand for our products and services will increase faster than overall spending on wafer fabrication equipment, as the proportion of customers' capital expenditures rises in these technology inflection areas, and we target to gain market share.

We acquired the outstanding shares of Coventor, Inc. ("Coventor"), a privately-held company, on August 28, 2017, as further discussed in Note 19 of our Consolidated Financial Statements contained in Part II, Item 8 of this 2018 Form 10-K. The results of the acquired business are included in our Consolidated Financial Statements.

### **Table of Contents**

The following summarizes certain key financial information for the periods indicated below:

	Year Ended					Change			
	June 24, 2018		June 25, 2017	June 26, 2016	FY18 vs. FY17		FY17 vs. FY	Y16	
	(in thousands	s, e	except per shar	e data and perc	entages)				
Revenue	\$11,076,998		\$8,013,620	\$5,885,893	\$3,063,378	38.2%	\$2,127,727	36.1%	
Gross margin	\$5,165,032		\$3,603,359	\$2,618,922	\$1,561,673	43.3%	\$984,437	37.6%	
Gross margin as a percent of total revenue	46.6	%	45.0 %	44.5 %	1.6%		0.5%		
Total operating expenses	\$1,951,733		\$1,701,227	\$1,544,666	\$250,506	14.7%	\$156,561	10.1%	
Net income	\$2,380,681		\$1,697,763	\$914,049	\$682,918	40.2%	\$783,714	85.7%	
Net income per diluted share	\$13.17		\$9.24	\$5.22	\$3.93	42.5%	\$4.02	77.0%	

Revenues in fiscal year 2018 increased 38% compared to fiscal year 2017, and revenues in fiscal year 2017 increased 36% compared to fiscal year 2016, reflecting an increase in technology and capacity investments by our customers. The increase in gross margin as a percentage of revenue for fiscal year 2018 compared to fiscal year 2017 was primarily due to favorable margin mix and higher revenue.

Fiscal year 2017 gross margin as a percentage of revenue compared to fiscal year 2016 improved primarily due to higher revenue and improved factory utilization resulting from higher production volume.

Operating expenses in fiscal year 2018 increased as compared to fiscal years 2017 and 2016 primarily as a result of higher employee headcount and increased investment in research and development.

Our cash and cash equivalents, investments, and restricted cash and investments balances totaled approximately \$5.2 billion as of June 24, 2018, compared to \$6.3 billion as of June 25, 2017. Cash flow provided from operating activities was \$2.7 billion for fiscal year 2018 compared to \$2.0 billion for fiscal year 2017. Cash flow provided from operating activities in fiscal 2018 was primarily used for \$2.7 billion in treasury stock purchases, \$396 million in net principal payments on debt, \$308 million in dividends paid to our stockholders, and \$273 million of capital expenditures and are partially offset by \$85 million of treasury stock reissuance and Common Stock issuance resulting from our employee equity-based compensation programs.

**Results of Operations** 

Shipments and Backlog

Shipments for fiscal year 2018 were approximately \$11.2 billion, an increase of 30% compared to fiscal year 2017. Shipments for fiscal year 2017 were approximately \$8.6 billion, an increase of 46% compared to fiscal year 2016. The increase in shipments during the fiscal year 2018 as compared to the last two fiscal years is related to stronger customer demand.

Continues on next page

### **Table of Contents**

Year Ended								
	June 24	,	June 2	5,	June 26,			
	2018		2017		2016			
Shipments (in millions)	\$11,176	<b>ó</b>	\$8,586	5	\$5,901			
Korea	33	%	32	%	17	%		
Japan	19	%	15	%	16	%		
China	16	%	13	%	20	%		
Taiwan	13	%	24	%	25	%		
United States	7	%	8	%	8	%		
Southeast Asia	7	%	4	%	11	%		
Europe	5	%	4	%	3	%		

The percentage of total Lam semiconductor processing system shipments to each of the markets we serve were as follows for fiscal years 2018, 2017, and 2016.

	Year Ended			
	June	June	June	
	24,	25,	26,	
	2018	2017	2016	
Memory	78%	67%	68%	
Foundry	14%	27%	23%	
Logic/integrated device manufacturing	8 %	6 %	9 %	

Our shipments to memory customers during the fiscal year 2018 increased primarily due to higher levels of investments from our DRAM and NAND customers. Our shipments to foundry customers decreased during the fiscal year 2018 primarily due to decreased investments in leading and trailing edge technology applications from our foundry customers.

Unshipped orders in backlog as of June 24, 2018, were approximately \$2.0 billion, a slight decrease from approximately \$2.1 billion as of June 25, 2017. Our unshipped orders backlog includes orders for systems, spares, and services. Please refer to "Backlog" in Part I, Item 1, "Business" of this 2018 Form 10-K for a description of our policies for adding to and adjusting backlog.

### Revenue

Year Ended								
	June 24,		June 25,		June 26,			
	2018		2017		2016			
Revenue (in millions)	\$11,077		\$8,014		\$5,886	)		
Korea	35	%	31	%	18	%		
Japan	17	%	13	%	17	%		
China	16	%	13	%	18	%		
Taiwan	13	%	26	%	25	%		
United States	7	%	8	%	8	%		
Southeast Asia	7	%	5	%	10	%		
Europe	5	%	4	%	4	%		

The revenue increases in fiscal year 2018 compared to the last two fiscal years and in fiscal year 2017 compared to fiscal year 2016, reflect an increase in technology and capacity investments by our customers. Our revenue levels are generally correlated to the amount of shipments and our installation and acceptance timelines. The overall Asia region continued to account for a majority of our revenues as a substantial amount of the worldwide capacity additions for semiconductor manufacturing continued to occur in this region.

Continues on next page

### **Table of Contents**

Our deferred revenue balance was \$994 million as of June 24, 2018, compared to \$966 million as of June 25, 2017. As noted in Note 3 to our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K, the adoption of accounting standard update 2014-09 is expected to result in a net decrease, estimated between \$100 million and \$200 million, to our total current liabilities balance, affecting our deferred revenue, deferred costs and resulting deferred profit recognition. Our deferred revenue balance does not include shipments to Japanese customers, to whom title does not transfer until customer acceptance. Shipments to Japanese customers are classified as inventory at cost until the time of customer acceptance. The anticipated future revenue value from shipments to Japanese customers was approximately \$607 million as of June 24, 2018, compared to \$397 million as of June 25, 2017.

Gross Margin

 Year Ended
 Change

 June 24,
 June 25,
 June 26,

 2018
 2017
 2016

 FY18 vs. FY17
 FY17 vs. FY16

(in thousands, except percentages)

Gross margin \$5,165,032 \$3,603,359 \$2,618,922 \$1,561,673 43.3% \$984,437 37.6% Percent of revenue 46.6 % 45.0 % 44.5 % 1.6% 0.5%

The increase in gross margin as a percentage of revenue for fiscal year 2018 compared to fiscal year 2017 was primarily due to favorable margin mix and higher revenue.

The increase in gross margin as a percentage of revenue for fiscal year 2017 compared to fiscal year 2016 was primarily due to higher revenue and improved factory utilization resulting from higher production volume. Research and Development

Year Ended
June 24, June 25, June 26, 2017

Change
FY18 vs. FY17 vs. FY16

(in thousands, except percentages)

Research & development \$1,189,514 \$1,033,742 \$913,712 \$155,772 15.1% \$120,030 13.1% Percent of revenue 10.7 % 12.9 % 15.5 % (2.2)% (2.6)%

We continued to make significant R&D investments focused on leading-edge deposition, etch, clean, and other semiconductor manufacturing requirements. The increase in R&D expense during fiscal year 2018 compared to fiscal year 2017 was primarily due to an \$88 million increase in employee compensation and benefits related to increased headcount, a \$24 million increase in supplies, and a \$23 million increase in outside services and miscellaneous expenses.

The increase in R&D expense during fiscal year 2017 compared to fiscal year 2016 was primarily due to an \$80 million increase in employee compensation and benefits related to increased headcount, a \$20 million increase in depreciation and lab maintenance, a \$9 million increase in outside services, and a \$7 million increase in supplies.

Continues on next page

### **Table of Contents**

Selling, General, and Administrative

Year Ended Change
June 24, June 25, June 26,
2018 2017 2016 FY18 vs. FY17 FY16

(in thousands, except percentages)

Selling, general, and administrative \$762,219 \$667,485 \$630,954 \$94,734 14.2% \$36,531 5.8% Percent of revenue 6.9 % 8.3 % 10.7 % (1.4)% (2.4)%

The increase in selling, general, and administrative ("SG&A") expense during fiscal year 2018 compared to fiscal year 2017 was primarily due to a \$44 million increase in employee compensation and benefits from increased headcount, a \$28 million increase in outside services, and a \$15 million increase in rent, utilities and repairs.

The increase in SG&A expense during fiscal year 2017 compared to fiscal year 2016 was primarily due to a \$36 million increase in employee compensation and benefits from increased headcount, a \$15 million gain from sale of assets in fiscal year 2016, and a \$14 million increase in outside services, offset by a \$41 million decrease in acquisition-related costs associated with the terminated agreement with KLA-Tencor.

Other Expense, Net

Other expense, net, consisted of the following:

	Year Ended			Change			
	June 24, 2018	June 25, 2017	June 26, 2016	FY18 vs. FY17	FY17 vs. FY16		
	(in thousa	,					
Interest income	\$85,813	\$57,858	\$29,512	\$27,955 48.3 %	\$28,346 96.0 %		
Interest expense	(97,387)	(117,734)	(134,773)	\$20,347 (17.3)%	\$17,039 (12.7 )%		
Gains (losses) on deferred compensation plan related assets, net	14,692	17,880	(3,995)	) \$(3,188 ) (17.8 )%	\$21,875 (547.6)%		
Loss on impairment of investments	(42,456)			\$(42,456) 100.0 %	\$—		
Gains (losses) on extinguishment of debt, net	542	(36,252)	_	\$36,794 (101.5)%	\$(36,252) (100.0)%		
Foreign exchange (losses) gains, net	(3,382)	(569)	308	\$(2,813) 494.4 %	\$(877) (284.7)%		
Other, net	(19,332)	(11,642)	(5,191)	\$ (7,690 ) 66.1 %	\$(6,451 ) 125.7 %		
	\$(61,510)	\$(90,459)	\$(114,139)	) \$28,949 (32.0 )%	\$23,680 (20.7)%		

Interest income increased in fiscal year 2018 compared to fiscal years 2017 and 2016 primarily as a result of higher yield.

The decrease in interest expense during fiscal year 2018 compared to fiscal year 2017 was primarily due to the conversions of 2018 and 2041 Convertible Notes as well as the retirement of the 2018 Convertible Notes in May 2018. The decrease in interest expense during fiscal year 2017 compared to fiscal year 2016 was primarily due to the retirement of the 2016 Convertible Notes.

The gain on deferred compensation plan related assets, in fiscal years 2018 and 2017, compared to a loss in fiscal year 2016 was driven by an improvement in the fair market value of the underlying funds.

Continues on next page

### **Table of Contents**

The loss on impairment of investments during fiscal year 2018 is the result of a decision to sell selected investments held in foreign jurisdictions in connection with our cash repatriation strategy following the December 2017 U.S. tax reform.

Loss on extinguishment of debt during fiscal year 2017 related to the special mandatory redemption of certain senior notes issued, as well as the termination of the Amended and Restated Term Loan Agreement following the termination of the Agreement and Plan of Merger and Reorganization with KLA-Tencor.

Income Tax Expense

As discussed in Note 6, "Income Taxes," to our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K, the "Tax Cuts & Jobs Act" (hereafter referred to as "U.S. tax reform") was signed into law on December 22, 2017 and was effective starting in our quarter ended December 24, 2017. U.S. tax reform reduces the U.S. federal statutory tax rate from 35% to 21%, mandates payment of a one-time transition tax on earnings of certain foreign subsidiaries that were previously tax deferred, and creates new taxes on certain foreign sourced earnings. The impact on income taxes due to a change in legislation is required under the authoritative guidance of Accounting Standards Codification ("ASC") 740, Income Taxes, to be recognized in the period in which the law is enacted. In conjunction, the SEC issued Staff Accounting Bulletin ("SAB") 118, which allows for the recording of provisional amounts related to U.S. tax reform and subsequent adjustments related to U.S. tax reform during an up to one-year measurement period that is similar to the measurement period used when accounting for business combinations. As such, there is significant activity in the fiscal year ended June 24, 2018, which reflects the change in legislation. Most of that activity has provisionally been recorded in our Consolidated Financial Statements in the period ended June 24, 2018, as we have not yet completed all of the accounting for the tax effects of enactment. We recorded what we believe to be a reasonable estimate and the provisional activity is subject to further adjustments under SAB 118, with the exception of revaluation of our deferred tax balances to reflect the new U.S. federal statutory tax rate, which is considered final and complete under SAB 118. In addition, for significant items for which we could not make a reasonable estimate, no provisional activity was recorded. We will continue to refine the provisional balances and adjustments may be made under SAB 118 during the measurement period as a result of future changes in interpretation, information available, assumptions made by the Company and/or issuance of additional guidance; these adjustments could be material. The below discussion around the provision for income taxes and effective tax rate are significantly impacted by U.S. tax reform.

Our provision for income taxes and effective tax rate for the periods indicated were as follows:

Year Ended				Change			
	June 24, 2018	June 25, 2017	June 26, 2016	FY18 vs. FY17	FY17 vs. FY16		
	(in thousand	ds, except per	rcentages)				
Income tax expense	\$771,108	\$113,910	\$46,068	\$657,198 576.9%	\$67,842 147.3%		
Effective tax rate	24.5 %	6.3 %	4.8 %	18.2%	1.5%		

The increase in the effective tax rate in fiscal year 2018 as compared to fiscal year 2017 was primarily due to the impact of U.S. tax reform and its mandated one-time transition tax on accumulated unrepatriated foreign earnings.

The increase in the effective tax rate in fiscal year 2017 as compared to fiscal year 2016 was primarily due to the change in the mix of income offset by the recognition of previously unrecognized tax benefits.

In July 2015, the U.S. Tax Court issued an opinion favorable to Altera Corporation ("Altera") with respect to Altera's litigation with the Internal Revenue Service ("IRS"). The litigation related to the treatment of stock-based compensation expense in an intercompany cost-sharing arrangement with Altera's foreign subsidiary. In its opinion, the U.S. Tax Court accepted Altera's position of excluding stock-based compensation from its intercompany cost-sharing arrangement. In July 2018, the U.S. Court of Appeals for the Ninth Circuit reversed the 2015 decision of the U.S. Tax Court. In August 2018, the opinion made by the U.S. Court of Appeals for the Ninth Circuit was withdrawn to allow

time for a reconstituted panel to confer on the appeal. We are currently

### **Table of Contents**

evaluating the impact, if any, of these subsequent events on our fiscal year 2019 Consolidated Financial Statements. We are unable to estimate the impact at this time.

International revenues account for a significant portion of our total revenues, such that a material portion of our pre-tax income is earned and taxed outside the United States at rates that are generally lower than in the United States. Additionally, the impact of U.S. tax reform is being evaluated for how it will affect future years' tax expense due to tax reform provisions that we will be subject to beginning in fiscal year 2019. Tax reform provisions being evaluated impacting future years include "Global Intangible Low-Taxed Income" ("GILTI") and other provisions. Please refer to Note 6 of our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K.

#### **Deferred Income Taxes**

Deferred income taxes reflect the net tax effect of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, as well as the tax effect of carryforwards. Our gross deferred tax assets were \$437 million and \$546 million at the end of fiscal years 2018 and 2017, respectively. These gross deferred tax assets were offset by gross deferred tax liabilities of \$169 million and \$585 million at the end of fiscal years 2018 and 2017, respectively, and a valuation allowance of \$200 million and \$114 million at the end of fiscal years 2018 and 2017, respectively. The change in the gross deferred tax assets, gross deferred tax liabilities, and valuation allowance between fiscal year 2018 and 2017 is primarily due to deferred revaluation to reflect the new U.S. statutory tax rate and decreases related to allowances and reserves, prepaid cost sharing, and unremitted earnings of foreign subsidiaries.

As of our fiscal year ended June 24, 2018, we continue to record a valuation allowance to offset the entire California deferred tax asset balance due to the single sales factor apportionment election resulting in lower taxable income in California. The valuation allowances were \$200 million and \$114 million at the end of fiscal years 2018 and 2017, respectively.

We evaluate if the deferred tax assets are realizable on a quarterly basis and will continue to assess the need for changes in valuation allowances, if any.

## **Uncertain Tax Positions**

We re-evaluate uncertain tax positions on a quarterly basis. This evaluation is based on factors including, but not limited to, changes in facts or circumstances, changes in tax law, effectively settled issues under audit, and new audit activity. Any change in recognition or measurement would result in the recognition of a tax benefit or an additional charge to the tax provision.

## Critical Accounting Policies and Estimates

A critical accounting policy is defined as one that has both a material impact on our financial condition and results of operations and requires us to make difficult, complex and/or subjective judgments, often as a result of the need to make estimates about matters that are inherently uncertain. The preparation of financial statements in conformity with U.S. generally accepted accounting principles ("GAAP") requires management to make certain judgments, estimates and assumptions that could affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenue and expenses during the reporting period. We base our estimates and assumptions on historical experience and on various other assumptions we believe to be applicable and evaluate them on an ongoing basis to ensure they remain reasonable under current conditions. Actual results could differ significantly from those estimates, which could have a material impact on our business, results of operations, and financial condition. Our critical accounting estimates include:

the recognition and valuation of revenue from multiple-element arrangements, which impacts revenue;

the valuation of inventory, which impacts gross margin;

the valuation of warranty reserves, which impacts gross margin;

the valuation of equity-based compensation expense, including forfeiture estimates, which impacts both gross margin and operating expenses;

60

the recognition and measurement of current and deferred income taxes, including the measurement of uncertain tax positions, which impact our provision for income tax expenses; and

### **Table of Contents**

the valuation and recoverability of long-lived assets, which impacts gross margin and operating expenses when we record asset impairments or accelerate their depreciation or amortization.

We believe that the following critical accounting policies reflect the more significant judgments and estimates used in the preparation of our consolidated financial statements regarding the critical accounting estimates indicated above. See Note 2, "Summary of Significant Accounting Policies," of our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K for additional information regarding our accounting policies.

Revenue Recognition: We recognize revenue when persuasive evidence of an arrangement exists, delivery has occurred and title has passed or services have been rendered, the selling price is fixed or determinable, collection of the receivable is reasonably assured, and we have received customer acceptance or are otherwise released from our customer acceptance obligations. If terms of the sale provide for a lapsing customer acceptance period, we recognize revenue upon the expiration of the lapsing acceptance period or customer acceptance, whichever occurs first. If the practices of a customer do not provide for a written acceptance or the terms of sale do not include a lapsing acceptance provision, we recognize revenue when it can be reliably demonstrated that the delivered system meets all of the agreed-to customer specifications. In situations with multiple deliverables, we recognize revenue upon the delivery of the separate elements to the customer and when we receive customer acceptance or are otherwise released from our customer acceptance obligations. We allocate revenue from multiple-element arrangements among the separate elements using their relative selling prices, based on our best estimate of selling price. Our sales arrangements do not include a general right of return. The maximum revenue recognized on a delivered element is limited to the amount that is not contingent upon the delivery of additional items. We generally recognize revenue related to sales of spare parts and system upgrade kits upon shipment. We generally recognize revenue related to services upon completion of the services requested by a customer order. We recognize revenue for extended maintenance service contracts with a fixed payment amount on a straight-line basis over the term of the contract. When goods or services have been delivered to the customer, but all conditions for revenue recognition have not been met, deferred revenue and deferred costs are recorded in deferred profit on our Consolidated Balance Sheet.

Inventory Valuation: Our policy is to assess the valuation of all inventories including manufacturing raw materials, work-in-process, finished goods, and spare parts in each reporting period. Obsolete inventory or inventory in excess of management's estimated usage requirement is written down to its estimated net realizable value if less than cost. Estimates of market value include but are not limited to management's forecasts related to our future manufacturing schedules, customer demand, technological and/or market obsolescence, general semiconductor market conditions, and possible alternative uses. If future customer demand or market conditions are less favorable than our projections, additional inventory write-downs may be required and would be reflected in cost of goods sold in the period in which we make the revision.

Warranty: We record a provision for estimated warranty expenses to cost of sales for each system when we recognize revenue. We periodically monitor the performance and cost of warranty activities, if actual costs incurred are different than our estimates, we may recognize adjustments to provisions in the period in which those differences arise or are identified. We do not maintain general or unspecified reserves; all warranty reserves are related to specific systems. Equity-based Compensation: Employee Stock Plans: We determine the fair value of our restricted stock units ("RSUs"), excluding market-based performance RSUs, based upon the fair market value of our Common Stock at the date of grant, discounted for dividends. We estimate the fair value of our market-based performance RSUs using a Monte Carlo simulation model at the date of the grant. We amortize the fair value of equity-based awards over the vesting periods of the award and we have elected to use the straight-line method of amortization. We estimate expected equity award forfeitures based on historical forfeiture rate activity and expected future employee turnover. We recognize the effect of adjustments made to the forfeiture rate, if any in the period that we change the forfeiture estimate. Income Taxes: Deferred income taxes reflect the net tax effect of temporary differences between the carrying amount of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, as well as the tax effect of carryforwards. We record a valuation allowance to reduce our deferred tax assets to the amount that is more likely than not to be realized. Realization of our net deferred tax assets is dependent on future taxable income. We believe it is more likely than not that such assets will be realized; however, ultimate

### **Table of Contents**

realization could be negatively impacted by market conditions and other variables not known or anticipated at this time. In the event that we determined that we will not be able to realize all or part of our net deferred tax assets, an adjustment will be charged to earnings in the period such determination was made. Likewise, if we later determined that it is more likely than not that the deferred tax assets will be realized, then the previously provided valuation allowance would be reversed.

We recognize the benefit from a tax position only if it is more likely than not that the position will be sustained upon audit based solely on the technical merits of the tax position. Our policy is to include interest and penalties related to unrecognized tax benefits as a component of income tax expense.

Long-lived Assets: We review goodwill at least annually for impairment. If certain events or indicators of impairment occur between annual impairment tests, we will perform an impairment test at that date. In testing for a potential impairment of goodwill, we: (1) allocate goodwill to the reporting units to which the acquired goodwill relates; (2) estimate the fair value of our reporting units; and (3) determine the carrying value (book value) of those reporting units. Prior to this allocation of the assets to the reporting units, we assess long-lived assets for impairment. Furthermore, if the estimated fair value of a reporting unit is less than the carrying value, we must estimate the fair value of all identifiable assets and liabilities of that reporting unit, in a manner similar to a purchase price allocation for an acquired business. This can require independent valuations of certain internally generated and unrecognized intangible assets such as in-process R&D and developed technology. Only after this process is completed can the amount of goodwill impairment, if any, be determined. In our goodwill impairment process we first assess qualitative factors to determine whether it is necessary to perform a quantitative analysis. We do not calculate the fair value of a reporting unit unless we determine, based on a qualitative assessment, that it is more likely than not that the reporting unit's fair value is less than its carrying amount.

The process of evaluating the potential impairment of goodwill is subjective and requires significant judgment at many points during the analysis. We determine the fair value of our reporting units by using an income approach. Under the income approach, we determine fair value based on estimated future cash flows of each reporting unit, discounted by an estimated weighted-average cost of capital, which reflects the overall level of inherent risk of a reporting unit and the rate of return an outside investor would expect to earn.

In estimating the fair value of a reporting unit, we make estimates and judgments about the future cash flows of our reporting units, including estimated growth rates and assumptions about the economic environment. Although our cash flow forecasts are based on assumptions that are consistent with the plans and estimates we are using to manage the underlying businesses, there is significant judgment involved in determining the cash flows attributable to a reporting unit. In addition, we make certain judgments about allocating shared assets to the estimated balance sheets of our reporting units. Changes in judgment on these assumptions and estimates could result in a goodwill impairment charge.

As a result, several factors could result in an impairment of a material amount of our goodwill balance in future periods, including but not limited to: (1) weakening of the global economy, weakness in the semiconductor equipment industry, or our failure to reach internal forecasts, which could impact our ability to achieve our forecasted levels of cash flows and reduce the estimated discounted cash flow value of our reporting units; and (2) a decline in our Common Stock price and resulting market capitalization, to the extent we determine that the decline is sustained and indicates a reduction in the fair value of our reporting units below their carrying value. Further, the value assigned to intangible assets, other than goodwill, is based on estimates and judgments regarding expectations such as the success and lifecycle of products and technology acquired. If actual product acceptance differs significantly from the estimates, we may be required to record an impairment charge to write down the asset to its realizable value.

For other long-lived assets, we routinely consider whether indicators of impairment are present. If such indicators are present, we determine whether the sum of the estimated undiscounted cash flows attributable to the assets is less than their carrying value. If the sum is less, we recognize an impairment loss based on the excess of the carrying amount of the assets over their respective fair values. Fair value is determined by discounted future cash flows, appraisals or other methods. We recognize an impairment charge to the extent the present value of anticipated net cash flows attributable to the asset are less than the asset's carrying value. The fair value of the asset then becomes the asset's new

carrying value, which we depreciate over the remaining estimated useful life of the asset. Assets to be disposed of are reported at the lower of the carrying amount or fair value.

### **Table of Contents**

### **Recent Accounting Pronouncements**

For a description of recent accounting pronouncements, including the expected dates of adoption and estimated effects, if any, on our consolidated financial statements, see Note 3, "Recent Accounting Pronouncements," of our Consolidated Financial Statements, included in Part II, Item 8 of this 2018 Form 10-K.

Liquidity and Capital Resources

Total gross cash, cash equivalents, investments, and restricted cash and investments balances were \$5.2 billion at the end of fiscal year 2018 compared to \$6.3 billion at the end of fiscal year 2017. This decrease was primarily due to Common Stock repurchases in connection with our stock repurchase program. Approximately \$4.1 billion and \$4.8 billion of our total cash and investments as of June 24, 2018, and June 25, 2017, respectively, was held outside the United States in our foreign subsidiaries, the majority of which was held in U.S. dollars. U.S. taxes have already been provided for due to U.S. tax reform as discussed in Note 6 of our Consolidated Financial Statements, included in Part II, Item 8 of this 2018 Form 10-K.

## Cash Flow from Operating Activities

Net cash provided by operating activities of \$2.7 billion during fiscal year 2018 consisted of (in millions):

Net income	\$2,381	
Non-cash charges:		
Depreciation and amortization	326	
Equity-based compensation expense	172	
Deferred income taxes	3	
Impairment of investments	42	
Amortization of note discounts and issuance costs	14	
Changes in operating asset and liability accounts	(317)	
Other	35	
	\$2,656	

Significant changes in operating asset and liability accounts, net of foreign exchange impact, included the following uses of cash: increases in inventories of \$701 million, accounts receivable of \$502 million, and prepaid expenses and other assets of \$14 million, partially offset by the following sources of cash: increases in accrued expenses and other liabilities of \$752 million, deferred profit of \$112 million, and accounts payable of \$36 million.

### Cash Flow from Investing Activities

Net cash provided by investing activities during fiscal year 2018 was \$2.7 billion, primarily consisting of net sale and maturities of available-for-sale securities of \$3.2 billion, partially offset by capital expenditures of \$273 million and business acquisitions of \$116 million.

### Cash Flow from Financing Activities

Net cash used by financing activities during fiscal year 2018 was \$3.3 billion, primarily consisting of \$2.7 billion in Common Stock repurchases, \$756 million of cash paid for debt extinguishment, and \$308 million of dividends paid, partially offset by \$360 million of net proceeds from issuance of commercial paper, and \$85 million of stock issuance and treasury stock reissuances associated with our employee stock-based compensation plans.

### Liquidity

Given that the semiconductor industry is highly competitive and has historically experienced rapid changes in demand, we believe that maintaining sufficient liquidity reserves is important to support sustaining levels of investment in R&D and capital infrastructure. Anticipated cash flows from operations based on our current business outlook, combined with our current levels of cash, cash equivalents, and short-term investments as of June 24, 2018, are expected to be sufficient to support our anticipated levels of operations, investments, debt service requirements, capital expenditures, capital redistributions, and dividends through at least the next twelve months. However, uncertainty in the global economy and the semiconductor industry, as well as disruptions in

### Continues on next page

### **Table of Contents**

credit markets, have in the past, and could in the future, impact customer demand for our products, as well as our ability to manage normal commercial relationships with our customers, suppliers, and creditors.

In the longer term, liquidity will depend to a great extent on our future revenues and our ability to appropriately manage our costs based on demand for our products and services. While we have substantial cash balances, we may require additional funding and need or choose to raise the required funds through borrowings or public or private sales of debt or equity securities. We believe that, if necessary, we will be able to access the capital markets on terms and in amounts adequate to meet our objectives. However, given the possibility of changes in market conditions or other occurrences, there can be no assurance that such funding will be available in needed quantities or on terms favorable to us.

Off-Balance Sheet Arrangements and Contractual Obligations

We have certain obligations to make future payments under various contracts, some of which are recorded on our balance sheet and some of which are not. Obligations that are recorded on our balance sheet in accordance with GAAP include our long-term debt which is outlined in the following table. Our off-balance sheet arrangements are presented as operating leases and purchase obligations in the table. Our contractual obligations and commitments as of June 24, 2018, relating to these agreements and our guarantees are included in the following table based on their contractual maturity date.

The amounts in the table below exclude \$280 million of liabilities related to uncertain tax benefits as we are unable to reasonably estimate the ultimate amount or time of settlement. See Note 6 of our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K for further discussion. The amounts in the table below also exclude \$14 million associated with funding commitments related to non-marketable equity investments as we are unable to make a reasonable estimate regarding the timing of capital calls.

	Total	Less than		3-5 Years	More than
	Total	1 Year	1-3 Tears	3-3 T Cars	5 Years
	(in thousand	ds)			
Operating leases	\$74,343	\$22,117	\$32,635	\$8,556	\$11,035
Capital leases	64,116	3,948	9,345	13,116	37,707
Purchase obligations	372,226	353,295	12,317	6,452	162
Long-term debt and interest expense (1)	2,513,556	61,736	1,404,664	51,173	995,983
One-time transition tax on accumulated unrepatriated foreign earnings (2)	882,995	70,640	141,279	141,279	529,797
Other long-term liabilities (3)	90,629	5,280	12,898	6,104	66,347
Total	\$3,997,865	\$517,016	\$1,613,138	\$226,680	\$1,641,031

The conversion period for the 2.625% Convertible Senior Notes due May 2041 (the "2041 Notes") was open as of June 24, 2018, and as such the net carrying value of the 2041 Notes is included within current liabilities on our

- Consolidated Balance Sheet. The principal balances of the 2041 Notes are reflected in the payment period in the table above based on the contractual maturity assuming no conversion. See Note 13 of our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K for additional information concerning the 2041 Notes and associated conversion features.
- Value represented is provisional in nature and subject to future measurement period adjustments under SAB 118. We may choose to apply existing tax credits, thereby reducing the actual cash payment.

  Certain tax-related liabilities and post-retirement benefits classified as other non-current liabilities on the
- (3) Consolidated Balance Sheet are included in the "More than 5 Years" category due to the uncertainty in the timing and amount of future payments. Additionally, the balance excludes contractual obligations recorded in our Consolidated Balance Sheet as current liabilities.

### **Operating Leases**

We lease most of our administrative, R&D, and manufacturing facilities; regional sales/service offices; and certain equipment under non-cancelable operating leases. Certain of our facility leases for buildings located in

### **Table of Contents**

Fremont and Livermore, California; Tualatin, Oregon; and certain other facility leases provide us with an option to extend the leases for additional periods or to purchase the facilities. Certain of our facility leases provide for periodic rent increases based on the general rate of inflation. In addition to amounts included in the table above, we have guaranteed residual values for certain of our Fremont and Livermore facility leases of up to \$250 million. See Note 15 to our Consolidated Financial Statements in Part II, Item 8 of this 2018 Form 10-K for further discussion. Capital Leases

Capital leases reflect building and office equipment lease obligations. The amounts in the table above include the interest portion of payment obligations.

## **Purchase Obligations**

Purchase obligations consist of significant contractual obligations either on an annual basis or over multi-year periods related to our outsourcing activities or other material commitments, including vendor-consigned inventories. The contractual cash obligations and commitments table presented above contains our minimum obligations at June 24, 2018, under these arrangements and others. For obligations with cancellation provisions, the amounts included in the preceding table were limited to the non-cancelable portion of the agreement terms or the minimum cancellation fee. Actual expenditures will vary based on the volume of transactions and length of contractual service provided. Income Taxes

During the December 2017 quarter, a one-time transition tax on accumulated unrepatriated foreign earnings, estimated at \$991 million, was recognized associated with the December 2017 U.S. tax reform. This value is identified as provisional in our Consolidated Financial Statements for the period ended June 24, 2018, and is subject to future measurement period adjustments under SAB 118. Such an adjustment was made during the June 2018 quarter, incorporating new information into the estimate; we may make further adjustments as new information is made available. The revised estimate is now \$883 million. The one-time transition tax may be elected to be paid over a period of eight years. The Company intends to make this election, and anticipates 8% of the transition tax to be paid each September 15 for years 2018 through 2022, and 15%, 20%, and 25%, respectively, to be paid each September 15 for years 2023 through 2025.

### Long-Term Debt

In May 2011, we issued and sold \$450 million in aggregate principal amount of 1.25% Convertible Senior Notes due May 2018 (the "2018 Notes") at par. The 2018 Notes matured in May 2018. Concurrent with the issuance of the 2018 Notes, we purchased convertible note hedges and sold warrants, which were structured to reduce the potential future economic dilution associated with the conversion of the 2018 Notes.

During the twelve months ended June 24, 2018 we paid approximately \$448 million in settlement of the 2018 Notes. We did not issue any shares of our Common Stock in respect of the 2018 Notes on a net basis as a result of our exercise of the convertible note hedge we purchased concurrently with the issuance of the 2018 Notes. The maturity of the 2018 Notes did not affect the warrants sold concurrent with the issuance of the 2018 Notes and those warrants remain outstanding, with contractual expirations ranging from August 15 to October 24, 2018.

In June 2012, with the acquisition of Novellus, we assumed \$700 million in aggregate principal amount of 2.625% Convertible Senior Notes due May 2041. We pay cash interest on the 2041 Notes at an annual rate of 2.625%, on a semi-annual basis. The 2041 Notes may be converted, under certain circumstances, into our Common Stock. During the quarter-ended June 24, 2018, the market value of our Common Stock was greater than or equal to 130% of the 2041 Notes conversion prices for 20 or more trading days of the 30 consecutive trading days preceding the quarter end. As a result, the 2041 Notes are convertible at the option of the holder and are classified as current liabilities in our Consolidated Balance Sheets for fiscal year 2018.

On March 12, 2015, we completed a public offering of \$500 million aggregate principal amount of Senior Notes due March 15, 2020 (the "2020 Notes") and \$500 million aggregate principal amount of Senior Notes due

Continues on next page

### **Table of Contents**

March 15, 2025 (the "2025 Notes"). We pay interest at an annual rate of 2.75% and 3.80%, respectively, on the 2020 Notes and 2025 Notes, on a semi-annual basis on March 15 and September 15 of each year.

We may redeem the 2020 Notes and 2025 Notes at a redemption price equal to 100% of the principal amount of such series ("par"), plus a "make whole" premium as described in the indenture in respect to the 2020 Notes and 2025 Notes and accrued and unpaid interest before February 15, 2020, for the 2020 Notes and before December 15, 2024, for the 2025 Notes. We may redeem the 2020 Notes and 2025 Notes at par, plus accrued and unpaid interest, at any time on or after February 15, 2020, for the 2020 Notes and on or after December 24, 2024, for the 2025 Notes. In addition, upon the occurrence of certain events, as described in the indenture, we will be required to make an offer to repurchase the 2020 Notes and 2025 Notes at a price equal to 101% of the principal amount of the respective note, plus accrued and unpaid interest.

On June 7, 2016, we completed a public offering of \$800.0 million aggregate principal amount of Senior Notes due June 15, 2021, (the "2021 Notes"), together with the 2020 Notes, and 2021 Notes, the "Senior Notes", and collectively with the Convertible Notes, the "Notes"). We pay interest at an annual rate of 2.80% on the 2021 Notes on a semi-annual basis on June 15 and December 15 of each year.

We may redeem the 2021 Notes at a redemption price equal to 100% of the principal amount of such series ("par"), plus a "make whole" premium as described in the respective indenture, and accrued and unpaid interest before May 15, 2021. We may redeem the 2021 Notes at par, plus accrued and unpaid interest at any time on or after May 15, 2021. In addition, upon the occurrence of certain events, as described in the indenture, we will be required to make an offer to repurchase the 2021 Notes, at a price equal to 101% of the principal amount of the respective note, plus accrued and unpaid interest.

During fiscal year 2018, 2017, and 2016, we made \$753 million, \$1.7 billion, and \$451 million, respectively, in principal payments on long-term debt and capital leases.

**Revolving Credit Arrangements** 

On October 13, 2017, we entered into Amendment No. 2 to Amended and Restated Credit Agreement (the "2nd Amendment"), among the Company, the lenders party thereto and JPMorgan Chase Bank, N.A., as administrative agent, which amends the Company's Amended and Restated Credit Agreement dated as of November 10, 2015, by and among the Company, the lenders party thereto and JPMorgan Chase Bank, N.A., as administrative agent, Amendment No. 1 to Amended and Restated Credit Agreement, dated as of April 26, 2016, among the Company, the lenders party thereto and JPMorgan Chase Bank, N.A., as administrative agent (as further amended by the 2nd Amendment, the "Amended Credit Agreement").

Among other things, the Amended Credit Agreement provides for a \$500 million increase to the Company's revolving credit facility, from \$750 million under the Credit Agreement to \$1.25 billion under the Amended Credit Agreement. The Amended Credit Agreement also modifies the date of maturity of the revolving credit facility from November 10, 2020 to October 13, 2022. The Amended Credit Agreement provides an expansion option, that will allow the Company, subject to certain requirements, to request an increase in the facility of up to an additional \$600 million, for a potential total commitment of \$1.85 billion. Other than as disclosed in this paragraph, the material terms of the Amended Credit Agreement are substantially the same as the Credit Agreement.

Interest on amounts borrowed under the credit facility is, at our option, based on (1) a base rate, defined as the greatest of (a) prime rate, (b) Federal Funds rate plus 0.5%, or (c) one-month London Interbank Offered Rate ("LIBOR") plus 1.0%, plus a spread of 0.0% to 0.5%, or (2) LIBOR multiplied by the statutory reserve rate, plus a spread of 0.9% to 1.5%, in each case as the applicable spread is determined based on the rating of our non-credit enhanced, senior unsecured long-term debt. Principal and any accrued and unpaid interest is due and payable upon maturity. Additionally, we will pay the lenders a quarterly commitment fee that varies based on our credit rating. The Amended Credit Agreement contains affirmative covenants, negative covenants, financial covenants, and events of default. As of June 24, 2018, we had no borrowings outstanding under the Amended Credit Agreement and were in compliance with all financial covenants.

### **Table of Contents**

### Commercial Paper Program

On November 13, 2017, we established a commercial paper program ("the CP Program") under which we may issue unsecured commercial paper notes on a private placement basis up to a maximum aggregate amount outstanding at any time of \$1.25 billion. Individual maturities may vary, but cannot not exceed 397 days from the date of issue. The net proceeds from the CP Program will be used for general corporate purposes, including repurchases of our Common Stock from time to time and under our stock repurchase program. If at any time, funds are not available under favorable terms under the CP Program, we may utilize the Amended Credit Agreement for funding. Amounts available under the CP Program may be re-borrowed. The CP Program is backstopped by our Revolving Credit Arrangement.

### Other Guarantees

We have issued certain indemnifications to our lessors for taxes and general liability under some of our agreements. We have entered into certain insurance contracts that may limit our exposure to such indemnifications. As of June 24, 2018, we had not recorded any liability on our Consolidated Financial Statements in connection with these indemnifications, as we do not believe, based on information available, that it is probable that we will pay any amounts under these guarantees.

Generally, we indemnify, under pre-determined conditions and limitations, our customers for infringement of third-party intellectual property rights by our products or services. We seek to limit our liability for such indemnity to an amount not to exceed the sales price of the products or services subject to our indemnification obligations. We do not believe, based on information available, that it is probable that we will pay any material amounts under these guarantees.

We provide guarantees and standby letters of credit to certain parties as required for certain transactions initiated during the ordinary course of business. As of June 24, 2018, the maximum potential amount of future payments that we could be required to make under these arrangements and letters of credit was \$22 million. We do not believe, based on historical experience and information currently available, that it is probable that any amounts will be required to be paid.

#### **Table of Contents**

Item 7A. Quantitative and Qualitative Disclosures About Market Risk Investments

We maintain an investment portfolio of various holdings, types, and maturities. As of June 24, 2018, our mutual funds are classified as trading securities. Investments classified as trading securities are recorded at fair value based upon quoted market prices. Any material differences between the cost and fair value of trading securities is recognized as "Other income (expense)" in our Consolidated Statement of Operations. All of our other investments are classified as available-for-sale and consequently are recorded in the Consolidated Balance Sheets at fair value with unrealized gains or losses reported as a separate component of accumulated other comprehensive income, net of tax. Interest Rate Risk

#### **Fixed-Income Securities**

Our investments in various interest-earning securities carry a degree of market risk for changes in interest rates. At any time, a sharp rise in interest rates could have a material adverse impact on the fair value of our fixed-income investment portfolio. Conversely, declines in interest rates could have a material adverse impact on interest income for our investment portfolio. We target to maintain a conservative investment policy, which focuses on the safety and preservation of our capital by limiting default risk, market risk, reinvestment risk, and concentration risk. The following table presents the hypothetical fair values of fixed-income securities that would result from selected potential decreases and increases in interest rates. Market changes reflect immediate hypothetical parallel shifts in the yield curve of plus or minus 50 basis points ("BPS"), 100 BPS, and 150 BPS. The hypothetical fair values as of June 24, 2018,were as follows:

	Valuation of Securities Given an Interest Rate Decrease of X Basis Points			Fair Value as of June 24, 2018  Valuation of Securities Given an Interest Rate Increase of X Basis Po			;	
	(150 BPS)	(100 BPS)	(50 BPS)	<u></u> %	50 BPS	100 BPS	150 BPS	
	(in thousand	ds)						
Municipal notes and bonds	153,974	153,365	152,750	152,136	151,521	150,906	150,292	
U.S. Treasury and agencies	357,056	356,874	356,692	356,509	356,327	356,145	355,963	
Government-sponsored enterprises	111,104	110,990	110,876	110,762	110,648	110,534	110,420	
Foreign government bonds	19,999	19,995	19,990	19,985	19,981	19,976	19,971	
Bank and corporate notes	518,765	517,798	516,832	515,866	514,899	513,933	512,967	
Mortgage backed securities - residential	849	833	817	801	785	770	754	

Total \$1,161,747 \$1,159,855 \$1,157,957 \$1,156,059 \$1,154,161 \$1,152,264 \$1,150,367 We mitigate default risk by investing in high credit quality securities and by positioning our portfolio to respond

appropriately to a significant reduction in a credit rating of any investment issuer or guarantor. The portfolio includes only marketable securities with active secondary or resale markets to achieve portfolio liquidity and maintain a prudent amount of diversification.

#### **Table of Contents**

#### Long-Term Debt

As of June 24, 2018, we had \$2.1 billion in principal amount of fixed-rate long-term debt outstanding, with a fair value of \$3.5 billion. The fair value of our Notes is subject to interest rate risk, market risk, and other factors due to the convertible feature, as applicable. Generally, the fair value of Notes will increase as interest rates fall and decrease as interest rates rise. Additionally, the fair value of the 2041 Notes will increase as our Common Stock price increases and decrease as our Common Stock price decreases. The interest and market value changes affect the fair value of our Notes but do not impact our financial position, cash flows, or results of operations due to the fixed nature of the debt obligations. We do not carry the Notes at fair value, but present the fair value of the principal amount of our Notes for disclosure purposes.

**Equity Price Risk** 

**Publicly Traded Securities** 

The values of our investments in publicly traded securities, including mutual funds related to our obligations under our deferred compensation plans, are subject to market price risk. The following table presents the hypothetical fair values of our publicly traded securities that would result from potential decreases and increases in the price of each security in the portfolio. Potential fluctuations in the price of each security in the portfolio of plus or minus 10%, 15%, or 25% were selected based on potential near-term changes in those security prices. The hypothetical fair values as of June 24, 2018, were as follows:

Valuation of Securities Given an X% Decrease in Stock Price		Fair Value as of June 24,	Valuation of Securities Given an X% Increase in Stock Price			
(25)% (in thous	` /	(10)%	2018 —%	10%	15%	25%

Mutual funds \$51,707 \$58,601 \$62,048 68,942 \$75,836 \$79,283 \$86,178

Foreign Currency Exchange ("FX") Risk

We conduct business on a global basis in several major international currencies. As such, we are potentially exposed to adverse as well as beneficial movements in foreign currency exchange rates. The majority of our revenues and expenses are denominated in U.S. dollars. However, we are exposed to foreign currency exchange rate fluctuations primarily related to revenues denominated in Japanese yen and euro-denominated and Korean won-denominated expenses.

We enter into foreign currency forward contracts to minimize the short-term impact of exchange rate fluctuations on certain foreign currency denominated monetary assets and liabilities, primarily cash, third-party accounts receivable, accounts payable, and intercompany receivables and payables. In addition, we hedge certain anticipated foreign currency cash flows, primarily on revenues denominated in Japanese yen and expenses denominated in euro and Korean won.

To protect against adverse movements in value of anticipated revenues denominated in Japanese yen and expenses denominated in euro and Korean won, we enter into foreign currency forward and option contracts that generally expire within 12 months and no later than 24 months. The option contracts include collars, an option strategy that is comprised of a combination of a purchased put option and a written call option with the same expiration dates and Japanese yen notional amounts but with different strike prices. These foreign currency hedge contracts are designated as cash flow hedges and are carried on our balance sheet at fair value, with the effective portion of the contracts' gains or losses included in accumulated other comprehensive income (loss) and subsequently recognized in earnings in the same period the hedged revenue and/or expense is recognized. We also enter into foreign currency forward contracts to hedge the gains and losses generated by the remeasurement of certain non-U.S.-dollar denominated monetary assets and liabilities, primarily cash, third-party accounts receivable, accounts payable, and intercompany receivables and payables. The change in fair value of these balance sheet hedge contracts is recorded into earnings as a component of other income (expense), net, and offsets the change in fair value of the foreign currency denominated monetary assets

and liabilities also recorded in other income (expense), net, assuming the hedge contract fully covers the hedged items. The notional amount and unrealized gain of our outstanding forward and option contracts that are

#### **Table of Contents**

designated as cash flow hedges, as of June 24, 2018, are shown in the table below. This table also shows the change in fair value of these cash flow hedges assuming a hypothetical foreign currency exchange rate movement of plus or minus 10 percent and plus or minus 15 percent.

		Notional Unrealized FX			Valuation of FX Contracts Given an X%			
		Notional Gain/(Loss) Amount		Increase (+)/Decrease(-) in Each			) in Each	
		Amoun	June 2	4, 2018	= +	·/- (10%)	= +	/- (15%)
		(in mill	ions)					
Forward	d contracts							
Sell	Japanese yen	\$569.0	\$	1.1	\$	55.8	\$	83.7
Buy	Euro	102.6	(4.7	)	10.	7	17.0	)
Buy	Korean won	28.9	(0.6)	)	2.8		4.2	
			\$	(4.2)	\$	69.3	\$	104.9
Option	Contracts (1)							
Buy put	Japanese yen	\$9.0	\$	0.2	\$	0.7	\$	1.0
Sell call	Japanese yen	9.7	(0.1	)				
	•		\$	0.1	\$	0.7	\$	1.0

(1) The local currency notional amounts of these foreign currency option contracts are equal to each other. The notional amount and unrealized loss of our outstanding foreign currency forward contracts that are designated as balance sheet hedges, as of June 24, 2018, are shown in the table below. This table also shows the change in fair value of these balance sheet hedges, assuming a hypothetical foreign currency exchange rate movement of plus or minus 10 percent and plus or minus 15 percent. These changes in fair values would be offset in other income (expense), net, by corresponding change in fair values of the foreign currency denominated monetary assets and liabilities, assuming the hedge contract fully covers the intercompany and trade receivable balances.

the heage contract far	1, 00,01	o tire irreer	Company	uiiu (	irade recervation o	ululicos.	
	Notional Gain/(Loss) Amount June 24, 2018			Valuation of FX Contracts Given an X% Increase (+)/Decrease(-) in Each			
	Amoun	June 24,	2018	= +/	- (10%)	= +/- (15%)	
	(in mill	ions)					
Forward contracts, ba	lance						
sheet hedge							
Sell Japanese yen	\$267.4	\$	0.1	\$	26.7	\$ 40.0	
Sell Korean won	99.4	_		9.9		14.9	
BuyEuro	45.3	_		14.9	)	16.6	
Buy Taiwan dollar	31.9	_		3.2		4.8	
Buy Singapore dollar	21.4	_		2.2		3.2	
Buy British pound	15.9	_		0.9		1.3	
Buy Swiss francs	14.9	_		1.5		2.2	
Buy Chinese renminbi	2.5	_		0.2		0.4	
Buy Indian rupee	3.2	_		0.3		0.5	
		\$	0.1	\$	59.8	\$ 83.9	

Continues on next page

#### **Table of Contents**

#### **Interest Rate Contracts**

Interest rate risk is present with both fixed- and floating-rate debt. Interest rate swap agreements designated as fair value hedges are used to mitigate our exposure to changes in the fair value of fixed-rate debt resulting from fluctuations in benchmark interest rates. Accordingly, benchmark interest rate fluctuations impact the fair value of our fixed-rate debt, which are offset by corresponding changes in the fair value of the swap agreements. Interest rate swaps may also be used to adjust interest rate exposures when appropriate, based on market conditions, and for qualifying hedges, the interest differential of swaps is included in interest expense. During the fiscal year ended June 26, 2016, we entered into a series of interest rate contracts with a total notional value of \$400 million where we received fixed rates and paid variable rates based on certain benchmark interest rates. Such interest rate swap arrangements were designated as fair value hedges of the fair value of the underlying debt instrument. The following table shows the change in fair value of these fair value hedges, assuming a hypothetical benchmark interest rate movement of plus or minus 10 BPS and plus or minus 15 BPS.

Valuation of	Fair	Valuation of			
Fair Value	Value	Fair Value			
Hedge	as of	Hedge			
Given an		Given an			
Interest Rate	June	Interest Rate			
Decrease of	24.	Increase of			
X Basis	,	X Basis			
Points	2018	Points			
10 15		40 45			
10 15	<u></u> %	(10  (15			
BPS BPS	70	BPS) BPS)			
(in millions)					

Interest Rate Contracts \$33.6 \$34.8 \$31.2 \$28.8 \$27.6

Interest rate risk is also present on anticipated issuances of debt. We manage our interest rate exposure on anticipated issuances of debt through forward-starting interest rate swap agreements. Forward-starting interest rate swap agreements designated as cash flow hedges are used to mitigate our exposure to changes in future interest payments that results from fluctuations in benchmark interest rates prior to the issuance of the debt. Accordingly, benchmark interest rate fluctuations impact the interest cash flows of the Company's anticipated debt issuances, which are offset by corresponding changes in the fair value of the forward-starting interest rate swap agreements. During the fiscal year ended June 26, 2016, we entered into and settled a series of forward-starting interest rate swap agreements with a total notional value of \$600 million, associated with our June 2016 debt offering. Such forward-starting interest rates underlying future interest payments on the June 2016 debt issuances.

## Table of Contents

Item 8. Financial Statements and Supp	lementary Data
Index to Consolidated Financial States	ments

Pa	age
Consolidated Statements of Operations — Years Ended June 24, 2018, June 25, 2017, and June 26, 2016	<u>2</u>
Consolidated Statements of Comprehensive Income — Years Ended June 24, 2018, June 25, 2017, and June 26,	3
2016	
Consolidated Balance Sheets — June 24, 2018, and June 25, 2017	<u>4</u>
Consolidated Statements of Cash Flows — Years Ended June 24, 2018, June 25, 2017, and June 26, 2016 55	<u>5</u>
Consolidated Statements of Stockholders' Equity — Years Ended June 24, 2018, June 25, 2017, and June 26, 2015	<u>7</u>
Notes to Consolidated Financial Statements 58	8
Reports of Independent Registered Public Accounting Firm	<u>7</u>

Continues on next page

#### **Table of Contents**

#### LAM RESEARCH CORPORATION CONSOLIDATED STATEMENTS OF OPERATIONS

(in thousands, except per share data)

	Year Ended			
	June 24,	June 25,	June 26,	
	2018	2017	2016	
Revenue	\$11,076,998	\$8,013,620	\$5,885,893	
Cost of goods sold	5,911,966	4,410,261	3,266,971	
Gross margin	5,165,032	3,603,359	2,618,922	
Research and development	1,189,514	1,033,742	913,712	
Selling, general, and administrative	762,219	667,485	630,954	
Total operating expenses	1,951,733	1,701,227	1,544,666	
Operating income	3,213,299	1,902,132	1,074,256	
Other expense, net	(61,510)	(90,459)	(114,139	)
Income before income taxes	3,151,789	1,811,673	960,117	
Income tax expense	(771,108)	(113,910 )	(46,068	)
Net income	\$2,380,681	\$1,697,763	\$914,049	
Net income per share:				
Basic	\$14.73	\$10.47	\$5.75	
Diluted	\$13.17	\$9.24	\$5.22	
Number of shares used in per share calculations:				
Basic	161,643	162,222	158,919	
Diluted	180,782	183,770	175,159	
See Notes to Consolidated Financial Statements				

ee Notes to Consolidated Financial Statements

Continues on next page

## Table of Contents

# LAM RESEARCH CORPORATION CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME (in thousands)

	Year Ended		
	June 24,	June 25,	June 26,
	2018	2017	2016
Net income	\$2,380,681	\$1,697,763	\$914,049
Other comprehensive income (loss), net of tax:			
Foreign currency translation adjustment	9,649	(2,843	(4,403)
Cash flow hedges:			
Net unrealized (losses) gains during the period	(6,960)	5,841	(17,725)
Net losses reclassified into earnings	3,729	8,971	4,961
	(3,231)	14,812	(12,764)
Available-for-sale investments:			
Net unrealized (losses) gains during the period	(45,382)	(3,789	9,028
Net losses (gains) reclassified into earnings	43,086	(1	) (371 )
	(2,296)	(3,790	8,657
Defined benefit plans, net change in unrealized component	129	(546	(3,027)
Other comprehensive income (loss), net of tax	4,251	7,633	(11,537)
Comprehensive income	\$2,384,932	\$1,705,396	\$902,512
See Notes to Consolidated Financial Statements			

Continues on next page

## Table of Contents

## LAM RESEARCH CORPORATION CONSOLIDATED BALANCE SHEETS

(in thousands, except per share data)

	June 24, 2018	June 25, 2017
ASSETS:		
Cash and cash equivalents	\$4,512,257	\$2,377,534
Investments	437,338	3,663,628
Accounts receivable, less allowance for doubtful accounts of \$5,343 as of June 24, 2018 and \$5,103 as of June 25, 2017	2,176,936	1,673,398
Inventories	1,876,162	1,232,916
Prepaid expenses and other current assets	147,218	195,022
Total current assets	9,149,911	9,142,498
Property and equipment, net	902,547	685,595
Restricted cash and investments	256,301	256,205
Goodwill	1,484,904	1,385,673
Intangible assets, net	317,836	410,995
Other assets	367,979	241,799
Total assets	\$12,479,478	\$12,122,765
LIABILITIES AND STOCKHOLDERS' EQUITY:		
Trade accounts payable	\$510,983	\$464,643
Accrued expenses and other current liabilities	1,309,209	969,361
Deferred profit	720,086	607,672
Commercial paper and current portion of convertible notes and capital leases	610,030	908,439
Total current liabilities	3,150,308	2,950,115
Senior notes, convertible notes, and capital leases, less current portion	1,806,562	1,784,974
Income taxes payable	851,936	120,178
Other long-term liabilities	90,629	280,186
Total liabilities	5,899,435	5,135,453
Commitments and contingencies		, ,
Temporary equity, convertible notes	78,192	169,861
Stockholders' equity:	,	,
Preferred stock, at par value of \$0.001 per share; authorized - 5,000 shares, none outstanding	_	_
Common stock, at par value of \$0.001 per share; authorized - 400,000 shares; issued and outstanding 156,892 shares at June 24, 2018, and 161,723 shares at June 25, 2017	157	162
Additional paid-in capital	6,144,425	5,845,485
Treasury stock, at cost, 119,679 shares at June 24, 2018, and 105,569 shares at June 25, 2017		(5,216,187)
Accumulated other comprehensive loss	(57,449)	(61,700)
Retained earnings	8,261,194	6,249,691
Total stockholders' equity	6,501,851	6,817,451
Total liabilities and stockholders' equity	\$12,479,478	
Total habilities and stockholders equity	Ψ12, 717, 710	Ψ12,122,103

See Notes to Consolidated Financial Statements

Continues on next page

## Table of Contents

### LAM RESEARCH CORPORATION CONSOLIDATED STATEMENTS OF CASH FLOWS (in thousands)

	Year Ended June 24, 2018	June 25, 2017	June 26, 2016
CASH FLOWS FROM OPERATING ACTIVITIES:	Φ <b>2</b> 200 (01	Φ1 (OZ Z(2)	ΦΩ14 Ω4Ω
Net income	\$2,380,681	\$1,697,763	\$914,049
Adjustments to reconcile net income to net cash provided by operating activities:			
Depreciation and amortization	326,395	306,905	291,028
Deferred income taxes	3,046	104,936	(49,003)
	*	,	
Equity-based compensation expense Income tax benefit (expense) on equity-based compensation plans	172,216	149,975	142,348
	_	38,747	(1,023 )
Excess tax (benefits) expense on equity-based compensation plans Impairment of investments	— 42,456	(38,635)	1,020
(Gains) losses on extinguishment of debt, net	*	36,252	<del>_</del>
Amortization of note discounts and issuance costs	14,428	25,282	<del></del>
Gain on sale of assets	14,420		) (15,223
Other, net	34,260	19,052	48,788
Changes in operating asset and liability accounts:	34,200	19,032	40,700
Accounts receivable, net of allowance	(501,628)	(411,287)	(169,034)
Inventories			(169,034)
Prepaid expenses and other assets			(46,664)
Trade accounts payable	35,655	126,819	41,645
Deferred profit	112,413	258,473	27,129
Accrued expenses and other liabilities	751,766	50,307	161,066
Net cash provided by operating activities	2,655,747	2,029,282	1,350,277
CASH FLOWS FROM INVESTING ACTIVITIES:	2,033,747	2,029,262	1,330,277
Capital expenditures and intangible assets	(273,469)	(157,419	(175,330)
Business acquisition, net of cash acquired	1	— (137, <del>4</del> 17 )	— (175,550 )
Purchases of available-for-sale securities		(4,581,851)	(874 008 )
Proceeds from maturities of available-for-sale securities	650,255	891,002	642,505
Proceeds from sales of available-for-sale securities	5,035,460	1,806,963	1,031,321
Proceeds from sale of assets		1,291	79,730
Transfer of restricted cash and investments	(96)		(112,381)
Other, net	,		1,636
Net cash provided by (used for) investing activities	2,748,440	(2,058,613)	•
1.00 cash provided of (asses for) investing detivities	2,7 13,110	(2,000,010)	2,72,700
Continues on next page			
Lam Research Corporation 2018 10-K 55			
-			

## Table of Contents

	Year Ended		
	June 24,	June 25,	June 26,
	2018	2017	2016
CASH FLOWS FROM FINANCING ACTIVITIES:			
Principal payments on long-term debt and capital lease obligations and payments for debt issuance costs	(755,694)	(1,688,313 )	(451,497 )
Net proceeds from issuance of long-term debt			2,338,144
Net proceeds from issuance of commercial paper	359,604		
Proceeds from borrowings on revolving credit facility	750,000		
Repayment of borrowings on revolving credit facility			
Excess tax benefits (expense) on equity-based compensation plans	(750,000 ) —	38,635	(1,020 )
Treasury stock purchases	(2,653,249)	,	(158,389)
Dividends paid		, , ,	(190,402)
Reissuances of treasury stock related to employee stock purchase plan	75,624	59,663	55,992
Proceeds from issuance of common stock	9,258	12,913	3,405
Other, net	9	•	(488 )
Net cash (used for) provided by financing activities	-	\$(2,632,394)	` '
Effect of exchange rate changes on cash and cash equivalents	\$2,593		\$(722)
Net increase (decrease) in cash and cash equivalents	2,134,723	(2,661,788)	
Cash and cash equivalents at beginning of year	2,377,534	5,039,322	1,501,539
Cash and cash equivalents at end of year	\$4,512,257	\$2,377,534	\$5,039,322
Schedule of non-cash transactions	ΨΨ,312,237	Ψ2,377,334	\$5,057,522
Accrued payables for stock repurchases	\$116	<b>\$</b> —	\$—
Accrued payables for capital expenditures	24,001	ъ— 17,285	φ— 27,953
Dividends payable	174,372	72,738	48,052
* •	57,886	46,855	37,822
Transfers of finished goods inventory to property and equipment, net	37,000	40,633	31,822
Supplemental disclosures:	¢04.401	¢104.610	¢ 50 010
Cash payments for interest	\$84,401	\$104,619	\$58,810
Cash payments for income taxes, net	142,800	28,104	39,745
See Notes to Consolidated Financial Statements			

## Table of Contents

# LAM RESEARCH CORPORATION CONSOLIDATED STATEMENTS OF STOCKHOLDERS' EQUITY (in thousands)

	Common Stock Shares	Commor Stock	Additional Paid-in Capital	Treasury Stock	Accumulated Other Comprehensiv Income(Loss)	-	Total	
Balance at June 28, 2015 Sale of common stock	158,531 2,863	\$ 159 2	\$5,366,773 3,403	\$(4,302,847) —	, ,	\$4,096,855 —	\$5,103,144 3,405	
Purchase of treasury stock Income tax benefits on	(2,130 )	(2)	_	(155,132)	_	_	(155,134	)
equity-based compensation plans	_	_	(1,023 )	_	_	_	(1,023	)
Reissuance of treasury stock	937	1	27,329	28,662	_	_	55,992	
Equity-based compensation expense	_		142,348	_		_	142,348	
Effect of conversion of convertible notes Reclassification from	_	_	(188 )	_	_	_	(188	)
temporary to permanent equity	_		34,256	_	_	_	34,256	
Net income			_	_	_	914,049	914,049	
Other comprehensive income	<del>-</del>				(11,537)		(11,537	)
Cash dividends declared (\$1.20 per common share)	_		_	_		(190,795 )	(190,795	)
Balance at June 26, 2016	160,201	160	5,572,898	(4,429,317)	(69,333)	4,820,109	5,894,517	
Sale of common stock	2,661	3	12,910	_			12,913	
Purchase of treasury stock	(5,322)	(5)		(811,667)	_		(811,672	)
Income tax benefits on								
equity-based compensation plans	_	_	38,747	_	_	_	38,747	
Reissuance of treasury stock	825	1	34,865	24,797			59,663	
Equity-based compensation	_	_	149,975	_		_	149,975	
expense Effect of conversion of								
convertible notes	1,388	1	(1,596)				(1,595	)
Exercise of warrants Reclassification from	1,970	2	(5)	_	_	_	(3	)
temporary to permanent equity	_	_	37,691	_	_	_	37,691	
Net income	_					1,697,763	1,697,763	
Other comprehensive income	<u>-</u>	_	_		7,633		7,633	
Cash dividends declared					,,000	(260.101)		,
(\$1.65 per common share)	_					(268,181)	(268,181	)
Balance at June 25, 2017	161,723	162	5,845,485	(5,216,187)	(61,700 )	6,249,691	6,817,451	
Sale of common stock	1,934	2	9,256				9,258	
Purchase of treasury stock	(14,786)	(15)	_	(2,653,350)	_	_	(2,653,365	)
Reissuance of treasury stock	677	1	52,562	23,061			75,624	
	_	_	172,216				172,216	

Equity-based compensation								
expense								
Effect of conversion of convertible notes	10,199	10	(26,776	) —	_	_	(26,766 )	1
Effect of bond hedge, cash in lieu of shares	1(2,855)	(3)	13	_	_	_	10	
Reclassification from								
temporary to permanent	_	_	91,669	_	_	_	91,669	
equity								
Adoption of ASU 2016-09	_	_	_	_	_	40,065	40,065	
Net income	_	_	_	_	_	2,380,681	2,380,681	
Other comprehensive income	e—	_	_	_	4,251	_	4,251	
Cash dividends declared (\$2.55 per common share)	_	_	_	_	_	(409,243)	(409,243)	ı
Balance at June 24, 2018	156,892	\$ 157	\$6,144,425	\$(7,846,476)	\$ (57,449 )	\$8,261,194	\$6,501,851	
See Notes to Consolidated F	inancial St	tatements						

Continues on next page

#### **Table of Contents**

#### NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

June 24, 2018

Note 1: Company and Industry Information

The Company designs, manufactures, markets, refurbishes, and services semiconductor processing equipment used in the fabrication of integrated circuits. Semiconductor manufacturing, our customers' business, involves the complete fabrication of multiple dies or integrated circuits on a wafer. This involves the repetition of a set of core processes and can require hundreds of individual steps. Fabricating these devices requires highly sophisticated process technologies to integrate an increasing array of new materials with precise control at the atomic scale. Along with meeting technical requirements, wafer processing equipment must deliver high productivity and be cost-effective.

The Company sells its products and services primarily to companies involved in the production of semiconductors in the United States, China, Europe, Japan, Korea, Southeast Asia, and Taiwan.

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, such as electronics demand, memory pricing, and foundry utilization rates, may not be any more reliable than in prior years. Demand for the Company's equipment can vary significantly from period to period as a result of various factors including, but not limited to economic conditions; supply, demand, and prices for semiconductors; customer capacity requirements; and the Company's ability to develop and market competitive products. For these and other reasons, the Company's results of operations for fiscal years 2018, 2017, and 2016 may not necessarily be indicative of future operating results.

Reclassification: Certain amounts for the fiscal years 2017 and 2016 Consolidated Statement of Cash Flows, and certain amounts within the 2017 footnotes have been reclassified to conform to the fiscal year 2018 presentation. Note 2: Summary of Significant Accounting Policies

The preparation of financial statements in conformity with GAAP requires management to make judgments, estimates, and assumptions that could affect the reported amounts of assets and liabilities at the date of the financial statements and the reported amounts of revenue and expenses during the reporting period. The Company bases its estimates and assumptions on historical experience and on various other assumptions it believes to be applicable and evaluates them on an ongoing basis to ensure they remain reasonable under current conditions. Actual results could differ significantly from those estimates.

Revenue Recognition: The Company recognizes revenue when persuasive evidence of an arrangement exists, delivery has occurred and title has passed or services have been rendered, the selling price is fixed or determinable, collection of the receivable is reasonably assured, and the Company has received customer acceptance or is otherwise released from its customer acceptance obligations. If terms of the sale provide for a lapsing customer acceptance period, the Company recognizes revenue upon the expiration of the lapsing acceptance period or customer acceptance, whichever occurs first. If the practices of a customer do not provide for a written acceptance or the terms of sale do not include a lapsing acceptance provision, the Company recognizes revenue when it can be reliably demonstrated that the delivered system meets all of the agreed-to customer specifications. In situations with multiple deliverables, the Company recognizes revenue upon the delivery of the separate elements to the customer and when the Company receives customer acceptance or is otherwise released from its customer acceptance obligations. The Company allocates revenue from multiple-element arrangements among the separate elements using their relative selling prices based on the Company's best estimate of selling price. The Company's sales arrangements do not include a general right of return. The maximum revenue recognized on a delivered element is limited to the amount that is not contingent upon the delivery of additional items. The Company generally recognizes revenue related to sales of spare parts and system upgrade kits upon shipment. The Company generally recognizes revenue related to services upon completion of the services requested by a customer order. The Company recognizes revenue for extended maintenance service contracts with a fixed payment amount on a straight-line basis over the term of the contract. When goods or services have been delivered to the customer but all conditions for revenue recognition have not been met, deferred revenue and deferred costs are recognized in deferred profit on the Consolidated Balance Sheet.

#### **Table of Contents**

Inventory Valuation: Inventories are stated at the lower of cost or net realizable value using standard costs that approximate actual costs on a first-in, first-out basis. Finished goods are reported as inventories until the point of title transfer to the customer. Unless specified in the terms of sale, title generally transfers at the physical transfer of the products to the freight carriers. Transfer of title for shipments to Japanese customers occurs at the time of customer acceptance.

Management evaluates the need to record adjustments for impairment of inventory at least quarterly. The Company's policy is to assess the valuation of all inventories including manufacturing raw materials, work-in-process, finished goods, and spare parts in each reporting period. Obsolete inventory or inventory in excess of management's estimated usage requirement is written down to its estimated market value if less than cost. Estimates of market value include but are not limited to management's forecasts related to the Company's future manufacturing schedules, customer demand, technological and/or market obsolescence, general semiconductor market conditions, and possible alternative uses. If future customer demand or market conditions are less favorable than the Company's projections, additional inventory write-downs may be required and would be reflected in cost of goods sold in the period in which the revision is made.

Warranty: Typically, the sale of semiconductor capital equipment includes providing parts and service warranties to customers as part of the overall price of the system. The Company provides standard warranties for its systems. The Company records a provision for estimated warranty expenses to cost of sales for each system when it recognizes revenue. The Company does not maintain general or unspecified reserves; all warranty reserves are related to specific systems. All actual or estimated parts and labor costs incurred in subsequent periods are charged to those established reserves on a system-by-system basis.

While the Company periodically monitors the performance and cost of warranty activities, if actual costs incurred are different than its estimates, the Company may recognize adjustments to provisions in the period in which those differences arise or are identified. In addition to the provision of standard warranties, the Company offers customer-paid extended warranty services. Revenues for extended maintenance and warranty services with a fixed payment amount are recognized on a straight-line basis over the term of the contract. Related costs are recorded as incurred.

Equity-based Compensation — Employee Stock Plans: The Company recognizes the fair value of equity-based compensation expense. The Company determines the fair value of its RSUs, excluding market-based performance RSUs, based upon the fair market value of Company's Common Stock at the date of grant, discounted for dividends. The Company estimates the fair value of its market-based performance RSUs using a Monte Carlo simulation model at the date of the grant. The Company estimates the fair value of its stock options using a Black-Scholes option valuation model. This model requires the input of highly subjective assumptions, including expected stock price volatility and the estimated life of each award. The Company amortizes the fair value of equity-based awards over the vesting periods of the award, and the Company has elected to use the straight-line method of amortization. Income Taxes: Deferred income taxes reflect the net tax effect of temporary differences between the carrying amount of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, as well as the tax effect of carryforwards. The Company records a valuation allowance to reduce its deferred tax assets to the amount that is more likely than not to be realized. Realization of its net deferred tax assets is dependent on future taxable income. The Company believes it is more likely than not that such assets will be realized; however, ultimate realization could be negatively impacted by market conditions and other variables not known or anticipated at this time. In the event that the Company determined that it will not be able to realize all or part of its net deferred tax assets, an adjustment will be charged to earnings in the period such determination was made. Likewise, if the Company later determines that it is more likely than not that the deferred tax assets will be realized, then the previously provided valuation allowance will be reversed.

The Company recognizes the benefit from a tax position only if it is more likely than not that the position will be sustained upon audit based solely on the technical merits of the tax position. The Company's policy is to include interest and penalties related to unrecognized tax benefits as a component of income tax expense.

Goodwill and Intangible Assets: The valuation of intangible assets acquired in a business combination requires the use of management estimates including but not limited to estimating future expected cash flows from assets acquired and

determining discount rates. Management's estimates of fair value are based upon assumptions believed to be reasonable, but which are inherently uncertain and unpredictable, and as a result, actual results

#### **Table of Contents**

may differ from estimates. Estimates associated with the accounting for acquisitions may change as additional information becomes available.

Goodwill represents the amount by which the purchase price in each business combination exceeds the fair value of the net tangible and identifiable intangible assets acquired. Each component of the Company for which discrete financial information is available and for which management regularly reviews the results of operations is considered a reporting unit. All goodwill acquired in a business combination is assigned to one or more reporting units as of the acquisition date. Goodwill is assigned to the Company's reporting units that are expected to benefit from the synergies of the combination. The goodwill assigned to a reporting unit is the difference between the acquisition consideration assigned to the reporting unit on a relative fair value basis and the fair value of acquired assets and liabilities that can be specifically attributed to the reporting unit. The Company tests goodwill and identifiable intangible assets with indefinite useful lives for impairment at least annually. The Company amortizes intangible assets with estimable useful lives over their respective estimated useful lives, and the Company reviews for impairment whenever events or changes in circumstances indicate that the carrying amount of the intangible asset may not be recoverable and the carrying amount exceeds its fair value.

The Company reviews goodwill at least annually for impairment. If certain events or indicators of impairment occur between annual impairment tests, the Company would perform an impairment test at that date. In testing for a potential impairment of goodwill, the Company (1) allocates goodwill to its reporting units to which the acquired goodwill relates, (2) estimates the fair value of its reporting units, and (3) determines the carrying value (book value) of those reporting units. Furthermore, if the estimated fair value of a reporting unit is less than the carrying value, the Company must estimate the fair value of all identifiable assets and liabilities of that reporting unit, in a manner similar to a purchase price allocation for an acquired business. This can require independent valuations of certain internally generated and unrecognized intangible assets such as in-process R&D and developed technology. Only after this process is completed can the amount of goodwill impairment, if any, be determined. In the Company's goodwill impairment process, it first assesses qualitative factors to determine whether it is necessary to perform a quantitative analysis. The Company does not calculate the fair value of a reporting unit unless the Company determines, based on a qualitative assessment, that it is more-likely-than-not that its fair value is less than its carrying amount. The Company performs an annual goodwill impairment analysis as of the first day of its fourth fiscal quarter. The Company did not record impairments of goodwill during the years ended June 24, 2018, June 25, 2017, or June 26, 2016.

The process of evaluating the potential impairment of goodwill is subjective and requires significant judgment at many points during the analysis. The Company determines the fair value of its reporting units by using an income approach. Under the income approach, the Company determines fair value based on estimated future cash flows of each reporting unit, discounted by an estimated weighted-average cost of capital, which reflects the overall level of inherent risk of a reporting unit and the rate of return an outside investor would expect to earn.

In estimating the fair value of a reporting unit, the Company makes estimates and judgments about the future cash

flows of its reporting units, including estimated growth rates and assumptions about the economic environment. Although the Company's cash flow forecasts are based on assumptions that are consistent with the plans and estimates it is using to manage the underlying businesses, there is significant judgment involved in determining the cash flows attributable to a reporting unit. In addition, the Company makes certain judgments about allocating shared assets to the estimated balance sheets of its reporting units. Changes in judgment on these assumptions and estimates could result in a goodwill impairment charge.

As a result, several factors could result in impairment of a material amount of the Company's goodwill balance in future periods, including but not limited to: (1) weakening of the global economy, weakness in the semiconductor equipment industry, or failure of the Company to reach its internal forecasts, which could impact the Company's ability to achieve its forecasted levels of cash flows and reduce the estimated discounted cash flow value of its reporting units and (2) a decline in the Company's stock price and resulting market capitalization and to the extent the Company determines that the decline is sustained and indicates a reduction in the fair value of the Company's reporting units below their carrying value. Further, the value assigned to intangible assets, other than goodwill, is based on estimates and judgments regarding expectations such as the success and lifecycle of products and technology

acquired. If actual product acceptance differs significantly from the estimates, the Company may be required to record an impairment charge to write down the asset to its realizable value.

Impairment of Long-lived Assets (Excluding Goodwill): The Company routinely considers whether indicators of impairment of long-lived assets are present. If such indicators are present, the Company determines whether the

#### **Table of Contents**

sum of the estimated undiscounted cash flows attributable to the assets is less than their carrying value. If the sum is less, the Company recognizes an impairment loss based on the excess of the carrying amount of the assets over their respective fair values. Fair value is determined by discounted future cash flows, appraisals, or other methods. The Company recognizes an impairment charge to the extent the present value of anticipated net cash flows attributable to the asset are less than the asset's carrying value. The fair value of the asset then becomes the asset's new carrying value, which the Company depreciates over the remaining estimated useful life of the asset. Assets to be disposed of are reported at the lower of the carrying amount or fair value. For the periods presented, there was no impairment of long-lived assets.

Fiscal Year: The Company follows a 52/53-week fiscal reporting calendar, and its fiscal year ends on the last Sunday of June each year. The Company's most recent fiscal years ended on June 24, 2018, June 25, 2017, and June 26, 2016, and each included 52 weeks.

Principles of Consolidation: The Consolidated Financial Statements include the accounts of the Company and its wholly owned subsidiaries. All intercompany accounts and transactions have been eliminated in consolidation. Cash Equivalents and Investments: Investments purchased with an original maturity of three months or less are considered cash equivalents. The Company also invests in certain mutual funds, which include equity and fixedincome securities, related to its obligations under its deferred compensation plan, and such investments are classified as trading securities on the consolidated balance sheets. All of the Company's other investments are classified as available-for-sale at the respective balance sheet dates. The Company accounts for its investment portfolio at fair value. Investments classified as trading securities are recorded at fair value based upon quoted market prices. Differences between the cost and fair value of trading securities are recognized as "Other income (expense)" in the Consolidated Statement of Operations. The investments classified as available-for-sale are recorded at fair value based upon quoted market prices, and difference between the cost and fair value of available-for-sale securities is presented as a component of accumulated other comprehensive income (loss). Unrealized losses on available-for-sale securities are charged against other income (expense) when a decline in fair value is determined to be other than temporary. The Company considers several factors to determine whether a loss is other than temporary. These factors include but are not limited to (1) the extent to which the fair value is less than cost basis, (2) the financial condition and near-term prospects of the issuer, (3) the length of time a security is in an unrealized loss position, and (4) the Company's ability to hold the security for a period of time sufficient to allow for any anticipated recovery in fair value. The Company's ongoing consideration of these factors could result in additional impairment charges in the future, which could adversely affect its results of operation. An other-than-temporary impairment is triggered when there is an intent to sell the security, it is more-likely-than-not that the security will be required to be sold before recovery, or the security is not expected to recover the entire amortized cost basis of the security. Other-than-temporary impairments attributed to credit losses are recognized in the income statement. The specific identification method is used to determine the realized gains and losses on investments. The Company recorded a \$42.5 million other-than-temporary impairment charge during the year ended June 24, 2018. No other-than-temporary impairment charges were recognized during the years ended June 25, 2017 or June 26, 2016.

Allowance for Doubtful Accounts: The Company evaluates its allowance for doubtful accounts based on a combination of factors. In circumstances where specific invoices are deemed uncollectible, the Company provides a specific allowance for bad debt against the amount due to reduce the net recognized receivable to the amount it reasonably believes will be collected. The Company also provides allowances based on its write-off history. Property and Equipment: Property and equipment is stated at cost. Equipment is depreciated by the straight-line method over the estimated useful lives of the assets, generally five years. Furniture and fixtures are depreciated by the straight-line method over the estimated useful lives of the assets, generally five years. Software is amortized by the straight-line method over the estimated useful lives of the assets, generally three to five years. Buildings are depreciated by the straight-line method over the estimated useful lives of the assets, generally twenty-five years. Leasehold improvements are generally amortized by the straight-line method over the shorter of the life of the related asset or the term of the underlying lease. Amortization of capital leases is included with depreciation expense.

Derivative Financial Instruments: In the normal course of business, the Company's financial position is routinely subjected to market risk associated with foreign currency exchange rate fluctuations. The Company's policy is to mitigate the effect of these exchange rate fluctuations on certain foreign currency denominated business

#### **Table of Contents**

exposures. The Company has a policy that allows the use of derivative financial instruments to hedge foreign currency exchange rate fluctuations on forecasted revenue and expenses and net monetary assets or liabilities denominated in various foreign currencies. The Company carries derivative financial instruments (derivatives) on the balance sheet at their fair values. The Company does not use derivatives for trading or speculative purposes. The Company does not believe that it is exposed to more than a nominal amount of credit risk in its interest rate and foreign currency hedges, as counterparties are large, global and well-capitalized financial institutions. The Company's exposures are in liquid currencies (Japanese yen, Swiss francs, euros, Taiwanese dollars, Chinese renminbi, Singapore dollars, and Korean won), so there is minimal risk that appropriate derivatives to maintain the Company's hedging program would not be available in the future.

To hedge foreign currency risks, the Company uses foreign currency exchange forward and option contracts, where possible and prudent. These hedge contracts are valued using standard valuation formulas with assumptions about future foreign currency exchange rates derived from existing exchange rates, interest rates, and other market factors. The Company considers its most current forecast in determining the level of foreign currency denominated revenue and expenses to hedge as cash flow hedges. The Company combines these forecasts with historical trends to establish the portion of its expected volume to be hedged. The revenue and expenses are hedged and designated as cash flow hedges to protect the Company from exposures to fluctuations in foreign currency exchange rates. If the underlying forecasted transaction does not occur, or it becomes probable that it will not occur, the related hedge gains and losses on the cash flow hedge are reclassified from accumulated other comprehensive income (loss) to other income (expense), net on the Consolidated Statement of Operations at that time.

Guarantees: The Company has certain operating leases that contain provisions whereby the properties subject to the operating leases may be remarketed at lease expiration. The Company has guaranteed to the lessor an amount approximating the lessor's investment in the property. Also, the Company's guarantees generally include certain indemnifications to its lessors under operating lease agreements for environmental matters, potential overdraft protection obligations to financial institutions related to one of the Company's subsidiaries, indemnifications to the Company's customers for certain infringement of third-party intellectual property rights by its products and services, and the Company's warranty obligations under sales of its products.

Foreign Currency Translation: The Company's non-U.S. subsidiaries that operate in a local currency environment, where that local currency is the functional currency, primarily generate and expend cash in their local currency. Accordingly, all balance sheet accounts of these local functional currency subsidiaries are translated into U.S. dollars at the fiscal period-end exchange rate, and income and expense accounts are translated into U.S. dollars using average rates in effect for the period, except for costs related to those balance sheet items that are translated using historical exchange rates. The resulting translation adjustments are recorded as cumulative translation adjustments and are a component of accumulated other comprehensive income (loss). Translation adjustments are recorded in other income (expense), net, where the U.S. dollar is the functional currency.

Note 3: Recent Accounting Pronouncements

Recently Adopted

In November 2015, the Financial Accounting Standards Board ("FASB") issued ASU 2015-17, "Balance Sheet Classification of Deferred Taxes." This ASU amended existing guidance to require that deferred income tax assets and liabilities be classified as non-current in a classified balance sheet and eliminates the prior guidance which required an entity to separate deferred tax assets and liabilities into a current amount and a non-current amount in a classified balance sheet. The Company adopted this standard prospectively in the first quarter of fiscal year 2018. The implementation resulted in a net reduction of prepaid expense and other current assets of \$49.7 million, accrued expense and other current liabilities of \$5.3 million, and other long-term liabilities of \$39.4 million; and an increase in other assets of \$5.0 million in the Company's Condensed Consolidated Balance Sheet, and had no impact on cash provided by or used in operations for any period presented.

#### **Table of Contents**

In March 2016, the FASB released ASU 2016-9, "Compensation – Stock Compensation." Key changes in the amendment include:

entities will be required to recognize all excess tax benefits or deficiencies as an income tax benefit or expense in the income statement, eliminating additional paid in capital ("APIC") pools;

entities will no longer be required to delay recognition of excess tax benefits until they are realized;

entities will be required to classify the excess tax benefits as an operating activity in the statement of cash flows; entities will be allowed to elect an accounting policy to either estimate the number of forfeitures or account for forfeitures as they occur;

entities can withhold up to the maximum individual statutory tax rate without classifying the awards as a liability; and the cash paid to satisfy the statutory income tax withholding obligations shall be classified as a financing activity in the statement of cash flows.

The Company adopted this standard in the first quarter of fiscal year 2018. As a result of the adoption, the Company recorded a \$40.1 million cumulative-effect adjustment to retained earnings for the recognition of previously unrecognized excess tax benefits for all years prior to the adoption. As required by the standard update, the amendment was applied prospectively to recognize excess tax benefits or deficiencies in the income statement in the period of occurrence. Accordingly, the provision for income taxes for the fiscal year ended June 24, 2018 included excess tax benefits of \$52.7 million that decreased the income tax provision. Additionally, the Company has elected to apply the change in cash flow classification on a prospective basis. The Company has elected to continue to estimate the number of forfeitures expected to occur to determine the amount of compensation cost to be recognized each period. The Company has elected to adopt the effects of the standard update with regard to the income tax withholdings obligations on a prospective basis. The impact of the adoption of the standard applicable to income tax withholdings was not material during the fiscal year ended June 24, 2018.

In August 2017, the FASB released ASU 2017-12, "Targeted Improvements to Accounting for Hedging Activities." The new guidance is intended to: (1) more closely align hedge accounting with an entity's risk management strategies, (2) simplify the application of hedge accounting by eliminating the requirement to separately measure and report hedge ineffectiveness, and (3) increase transparency around the scope and results of hedging programs. The Company is required to adopt the standard in the first quarter of fiscal year 2020, using a modified-retrospective approach for any cash flow or net investment hedges that exist on the date of adoption. The Company elected to early adopt the standard in the third quarter of fiscal year 2018. The cumulative-effect adjustment to eliminate ineffectiveness is not material to the Company's previously issued Consolidated Financial Statements. The presentation and disclosure have been modified on a prospective basis, as required by the standard update.

Updates Not Yet Effective

In May 2014, the FASB released ASU 2014-9, "Revenue from Contracts with Customers," to supersede nearly all existing revenue recognition guidance under GAAP. The FASB issued subsequent amendments to the initial guidance in August 2015, March 2016, April 2016, May 2016 and December 2016 within ASU 2015–14, ASU 2016–08, ASU 2016–10, ASU 2016–12 and ASU 2016–20, respectively. The core principle of the standard is to recognize revenues when promised goods or services are transferred to customers in an amount that reflects the consideration that is expected to be received for those goods or services. The new standard defines a five-step process to achieve this core principle and, in doing so, it is possible more judgment and estimates may be required within the revenue recognition process than required under existing GAAP, including identifying performance obligations in the contract, estimating the amount of variable consideration to include in the transaction price, and allocating the transaction price to each separate performance obligation.

The Company is required to adopt these standards starting in the first quarter of fiscal year 2019 using either of two methods: (1) retrospective to each prior reporting period presented with the option to elect certain practical expedients as defined within the standard or (2) retrospective with the cumulative effect of initially applying the standard recognized at the date of initial application and providing certain additional disclosures as defined per the standard. The Company will adopt this new guidance using the modified retrospective transition method. Management has substantially completed its evaluation of existing contracts and the impact to the Company's Consolidated Financial Statements and disclosures, business processes, systems, and controls. The Company

#### **Table of Contents**

Financial Statements.

believes that the timing of revenue recognition for certain of its systems will generally be earlier than under existing revenue guidance. The Company expects the impact of the initial adoption will result in a net decrease to its deferred profit balances, which is a component of total current liabilities estimated between \$100 million and \$200 million. In January 2016, the FASB released ASU 2016-1, "Financial Instruments - Overall - Recognition and Measurement of Financial Assets and Financial Liabilities," The FASB issued a subsequent amendment to the initial guidance in February 2018 within ASU 2018-03. These amendments change the accounting for and financial statement presentation of equity investments, other than those accounted for under the equity method of accounting or those that result in consolidation of the investee. The amendments provide clarity on the measurement methodology to be used for the required disclosure of fair value of financial instruments measured at amortized cost on the balance sheet and clarifies that an entity should evaluate the need for a valuation allowance on deferred tax assets related to available-for-sale securities in combination with the entity's other deferred tax assets, among other changes. The Company is required to adopt these standards starting in the first quarter of fiscal year 2019 and does not anticipate that implementation will have a material impact on its Consolidated Financial Statements. In January 2016, the FASB released ASU 2016-2, "Leases." The FASB issued a subsequent amendment to the initial guidance in January 2018 within ASU 2018-01. The core principle of the standard requires an entity to recognize right-of-use assets and lease liabilities on its balance sheet and disclose key information about leasing arrangements. The amendment offers specific accounting guidance for a lessee, a lessor, and sale and leaseback transactions. Lessees and lessors are required to disclose qualitative and quantitative information about leasing arrangements to enable a user of the financial statements to assess the amount, timing, and uncertainty of cash flows arising from leases. The Company is required to adopt these standards starting in the first quarter of fiscal year 2020 using a modified-retrospective approach on the earliest period presented. The Company is currently in the process of evaluating the impact of adoption on its Consolidated Financial Statements. In June 2016, the FASB released ASU 2016-13, "Financial Instruments - Credit Losses." The amendment revises the impairment model to utilize an expected loss methodology in place of the currently used incurred loss methodology, which will result in more timely recognition of losses on financial instruments, including but not limited to available-for-sale debt securities and accounts receivable. The Company is required to adopt this standard starting in the first quarter of fiscal year 2021 using a modified-retrospective approach. Early adoption is permitted. The Company is currently in the process of evaluating the impact of adoption on its Consolidated Financial Statements. In August 2016, the FASB released ASU 2016-15, "Statement of Cash Flows - Classification of Certain Cash Receipts and Cash Payments." The amendment provides and clarifies guidance on the classification of certain cash receipts and cash payments in the statement of cash flows to eliminate diversity in practice. The Company is required to adopt the standard update in the first quarter of fiscal year 2019, with a retrospective transition method required. The Company is currently in the process of evaluating the impact of adoption on its Consolidated Financial Statements. In October 2016, the FASB released ASU 2016-16, "Income Tax – Intra-Entity Transfers of Assets Other than Inventory," This standard update improves the accounting for the income tax consequences of intra-entity transfers of assets other than inventory. Early adoption is permitted. The Company is required to adopt the standard in the first quarter of fiscal year 2019 using a modified-retrospective approach through a cumulative-effect adjustment directly to retained earnings. The Company is currently in the process of evaluating the impact of adoption on its Consolidated

In November 2016, the FASB released ASU 2016-18, "Statement of Cash Flows – Restricted Cash." This standard update requires that restricted cash and restricted cash equivalents be included in cash and cash equivalents when reconciling the beginning-of-period and end-of-period total amounts shown in the statement of cash flows. The Company is required to adopt this standard in the first quarter of fiscal year 2019, with a retrospective transition method required. Early adoption is permitted. At June 24, 2018, the Company had \$256.3 million classified as restricted cash and investments on its Consolidated Balance Sheet which will be recognized as beginning-of-period cash and cash equivalents in the Company's fiscal year 2019 Consolidated Statement of Cash Flows. Additionally the Company expects cash provided by investment activities for the twelve months ended June 24, 2018 and June 25, 2017 will increase by \$0.1 million and \$5.8 million, respectively.

#### **Table of Contents**

In February 2018, the FASB released ASU 2018-2, "Reclassification of Certain Tax Effects from Accumulated Other Comprehensive Income." This standard update addresses a specific consequence of U.S tax reform and allows a reclassification from accumulated other comprehensive income to retained earnings for the stranded tax effects resulting from U.S. tax reform. Consequently, the update eliminates the stranded tax effects that were created as a result of the historical U.S. federal corporate income tax rate to the newly enacted U.S. federal corporate income tax rate. The Company is required to adopt this standard in the first quarter of fiscal year 2020, with early adoption permitted. The amendments in this update should be applied either in the period of adoption or retrospectively to each period in which the effect of the change in the U.S federal corporate income tax rate in regards to U.S. tax reform is recognized. The Company is currently in the process of evaluating the impact of adoption on its Consolidated Financial Statements.

Note 4: Equity-based Compensation Plans

The Company has stock plans that provide for grants of equity-based awards to eligible participants, including stock options and restricted stock units, of the Company's Common Stock. An option is a right to purchase Common Stock at a set price. An RSU award is an agreement to issue a set number of shares of Common Stock at the time of vesting. The Company's options and RSU awards typically vest over a period of three years or less. The Company also has an employee stock purchase plan that allows employees to purchase its Common Stock at a discount through payroll deductions.

The Lam Research Corporation 2007 Stock Incentive Plan, as amended and restated, 2011 Stock Incentive Plan, as amended and restated, and the 2015 Stock Incentive Plan (collectively the "Stock Plans"), provide for the grant of non-qualified equity-based awards to eligible employees, consultants and advisors, and non-employee directors of the Company and its subsidiaries. The 2015 Stock Incentive Plan was approved by shareholders authorizing up to 18,000,000 shares available for issuance under the plan. Additionally, 1,232,068 shares that remained available for grants under the Company's 2007 Stock Incentive Plan were added to the shares available for issuance under the 2015 Stock Incentive Plan. As of June 24, 2018, there were a total of 10,335,291 shares available for future issuance under the Stock Plans. New shares are issued from the Company's balance of authorized Common Stock from the 2015 Stock Incentive Plan to satisfy stock option exercises and vesting of awards.

The Company recognized the following equity-based compensation expense and benefits in the Consolidated Statements of Operations:

Year Ended
June 24, June 25, June 26,
2018 2017 2016
(in thousands)
\$172,216 \$149,975 \$142,348
\$87,505 \$38,381 \$37,814

Income tax benefit recognized related to equity-based compensation

Income tax benefit realized from the exercise and vesting of options and RSUs

Income tax benefit realized from the exercise and vesting of options and RSUs \$90,297 \$92,749 \$67,756. The estimated fair value of the Company's equity-based awards, less expected forfeitures, is amortized over the awards' vesting terms on a straight-line basis. In the first quarter of fiscal year 2018, the Company adopted ASU 2016-9,

"Compensation – Stock Compensation," as discussed further in Note 3 - Recent Accounting Pronouncements.

Continues on next page Lam Research Corporation 2018 10-K 65

Equity-based compensation expense

#### **Table of Contents**

#### **Stock Options**

The following table summarizes stock option activity:

**Options Outstanding** Number Weighted-Average Exercise of Shares Price June 28, 2015 \$ 37.44 835,832 Granted \$ 75.57 196,167 Exercised (123,726) \$ 24.92 Forfeited or expired (862 ) \$ 21.43 June 26, 2016 \$ 47.41 907,411 Granted 90,128 \$ 119.67 Exercised (389,460) \$ 33.92 Forfeited or expired (14,020 ) \$ 69.81 June 25, 2017 \$ 66.69 594,059 Granted 63,980 \$ 190.07 Exercised (166,481) \$ 55.62 Forfeited or expired (8,630 ) \$ 84.44 June 24, 2018 482,928 \$ 86.53

Outstanding and exercisable options presented by price range at June 24, 2018, were as follows:

· ·	Options Outstanding		Options Exercisable	
Range of Exercise Prices	Number of Weighted-Average Options (Years)  Outstanding	Weighted-Average	Number Weighted-Average of Remaining Life (Years)	Weighted-Average Exercise Price
\$11.09-\$23.59	33,918 1.49	\$ 18.97	33,918 1.49	\$ 18.97
\$28.73-\$35.68	39,060 2.63	\$ 31.29	39,060 2.63	\$ 31.29
\$42.61-\$51.76	75,415 2.03	\$ 47.30	75,415 2.03	\$ 47.30
\$75.57-\$190.07	334,535 5.08	\$ 108.67	155,504 4.33	\$ 83.58
\$11.09-\$190.07	482,928 4.15	\$ 86.53	303,897 3.23	\$ 60.65

The fair value of the Company's stock options granted during fiscal years 2018, 2017, and 2016 was estimated using a Black-Scholes option valuation model. This model requires the input of highly subjective assumptions, including expected stock price volatility and the estimated life of each award:

	Year Ended					
	June	June	June			
	24,	25,	26,			
	2018	2017	2016			
Expected volatility	34.66%	28.85%	33.08%			
Risk-free interest rate	2.53 %	1.92 %	1.27 %			
Expected term (years)	4.74	4.75	4.79			
Dividend yield	1.05 %	1.50 %	1.59 %			

Continues on next page

#### **Table of Contents**

The year-end intrinsic value relating to stock options for fiscal years 2018, 2017, and 2016 is presented below:

Year Ended June 24, June 25, June 26, 2018 2017 2016 (in thousands)

Intrinsic value - options outstanding \$43,563 \$50,551 \$31,643 Intrinsic value - options exercisable \$34,661 \$36,396 \$29,112 Intrinsic value - options exercised \$23,925 \$29,674 \$6,562

As of June 24, 2018, the Company had \$5.4 million of total unrecognized compensation expense related to unvested stock options granted and outstanding which is expected to be recognized over a weighted-average remaining period of 2.2 years.

#### Restricted Stock Units

During the fiscal years 2018, 2017, and 2016, the Company issued both service-based RSUs and market-based performance RSUs ("PRSUs"). Market-based PRSUs generally vest three years from the grant date if certain performance criteria are achieved and require continued employment. Based upon the terms of such awards, the number of shares that can be earned over the performance periods is based on the Company's Common Stock price performance compared to the market price performance of the Philadelphia Semiconductor Sector Index ("SOX"), ranging from 0% to 150% of target. The stock price performance or market price performance is measured using the closing price for the 50-trading days prior to the dates the performance period begins and ends. The target number of shares represented by the market-based PRSUs is increased by 2% of target for each 1% that Common Stock price performance exceeds the market price performance of the SOX index. The result of the vesting formula is rounded down to the nearest whole number. Total stockholder return is a measure of stock price appreciation in this performance period.

The following table summarizes restricted stock activity:

	Service-base	ed	Market-based RSUs		
	RSUs Outsta	anding	Outstanding		
	Number of Shares	Weighted-Average Grant Date Fair Value	Number of Shares	Weighted-Average Grant Date Fair Value	
June 28, 2015	4,040,947	\$ 60.98	913,141	\$ 56.37	
Granted	1,771,599	72.14	459,252	70.58	
Vested	(2,445,902)	54.91	(293,802)	46.77	
Forfeited or canceled	(110,131)	69.17		_	
June 26, 2016	3,256,513	\$ 71.34	1,078,591	\$ 63.12	
Granted	1,224,877	114.13	435,694	111.75	
Vested	(1,677,318)	69.10	(592,321)	46.67	
Forfeited or canceled	(116,466 )	76.76	(59,509)	66.81	
June 25, 2017	2,687,606	\$ 92.01	862,455	\$ 83.83	
Granted	964,391	183.97	285,866	170.15	
Vested	(1,362,369)	87.80	(407,024)	76.88	
Forfeited or canceled	(96,540 )	108.67	(47,571)	91.36	
June 24, 2018	2,193,088	\$ 134.34	693,726	\$ 104.59	

The fair value of the Company's service-based RSUs was calculated based on fair market value of the Company's stock at the date of grant, discounted for dividends.

Continues on next page

#### **Table of Contents**

The fair value of the Company's market-based PRSUs granted during fiscal years 2018, 2017, and 2016 was calculated using a Monte Carlo simulation model at the date of the grant. This model requires the input of highly subjective assumptions, including expected stock price volatility and the estimated life of each award:

Year Ended				
June	June	June		
24,	25,	26,		
2018	2017	2016		
34.07%	27.48%	29.81%		
2.35 %	1.55 %	0.97 %		
2.92	2.92	2.92		
1.05 %	1.50 %	1.59 %		
	June 24, 2018 34.07% 2.35 % 2.92	June June 24, 25,		

As of June 24, 2018, the Company had \$247.7 million of total unrecognized compensation expense related to all unvested RSUs granted which is expected to be recognized over a weighted-average remaining period of 2.2 years. ESPP

The Company has an employee stock purchase plan which allows employees to designate a portion of their base compensation to be deducted and used to purchase the Company's Common Stock at a purchase price per share of the lower of 85% of the fair market value of the Company's Common Stock on the first or last day of the applicable purchase period. Unrecognized compensation costs associated with this plan are not considered material.

Note 5: Other Income (Expense), Net

The significant components of other income (expense), net, were as follows:

	Year Ended		
	June 24,	June 25,	June 26,
	2018	2017	2016
	(in thousa	nds)	
Interest income	\$85,813	\$57,858	\$29,512
Interest expense	(97,387)	(117,734)	(134,773)
Gains (losses) on deferred compensation plan related assets, net	14,692	17,880	(3,995)
Loss on impairment of investments	(42,456)	<del></del>	_
Gains (losses) on extinguishment of debt, net	542	(36,252)	_
Foreign exchange (losses) gains, net	(3,382)	(569)	308
Other, net	(19,332)	(11,642)	(5,191)
	\$(61,510)	\$(90,459)	\$(114,139)

Interest income in the year ended June 24, 2018, increased compared to the years ended June 25, 2017, and June 26, 2016, primarily as a result of higher yield. Interest expense in the year ended June 24, 2018, decreased compared to the year ended June 25, 2017, primarily due to the conversions of 2018 and 2041 Convertible Notes as well as the retirement of the 2018 Convertible Notes in May 2018. Interest expense in the year ended June 25, 2017, decreased compared to the year ended June 26, 2016, primarily due to the retirement of the 2016 Convertible Note.

The gain on deferred compensation plan related assets in fiscal years 2018 and 2017, compared to a loss in fiscal year 2016 was driven by an improvement in the fair market value of the underlying funds.

The loss on impairment of investments in the year ended June 24, 2018 is the result of a decision to sell selected investments held in foreign jurisdictions in conjunction with the Company's cash repatriation strategy following the December 2017 U.S. tax reform.

Continues on next page

#### **Table of Contents**

Net loss on extinguishment of debt realized in the year ended June 25, 2017, is primarily a result of the special mandatory redemption of the Senior Notes due 2023 and 2026, as well as the termination of the Term Loan Agreement.

Note 6: Income Taxes

On December 22, 2017, the "Tax Cuts & Jobs Act" (hereafter referred to as "U.S. tax reform") was signed into law and is effective for the Company starting in the quarter ended December 24, 2017. U.S. tax reform reduces the U.S. federal statutory tax rate from 35% to 21%, mandates payment of a one-time transition tax on earnings of certain foreign subsidiaries that were previously tax deferred, and creates new taxes on certain foreign sourced earnings. The impact on income taxes due to a change in legislation is required under the authoritative guidance of Accounting Standards Codification ("ASC") 740, Income Taxes, to be recognized in the period in which the law is enacted. In conjunction, the SEC issued Staff Accounting Bulletin ("SAB") 118, which allows for the recording of provisional amounts related to U.S. tax reform and subsequent adjustments related to U.S. tax reform during an up to one-year measurement period that is similar to the measurement period used when accounting for business combinations. As such, there is significant activity in the fiscal year ended June 24, 2018, which reflects the change in legislation. Most of that activity has provisionally been recorded in the Company's Consolidated Financial Statements in the period ended June 24, 2018, as the Company has not yet completed all of the accounting for the tax effects of enactment. The Company recorded what it believes to be a reasonable estimate and the provisional activity is subject to further adjustments under SAB 118, with the exception of revaluation of its deferred tax balances to reflect the new U.S. federal statutory tax rate, which is considered final and complete under SAB 118. In addition, for significant items for which the Company could not make a reasonable estimate, no provisional activity was recorded. The Company will continue to refine the provisional balances and adjustments may be made under SAB 118 during the measurement period as a result of future changes in interpretation, information available, assumptions made by the Company and/or issuance of additional guidance; these adjustments could be material.

During the December 2017 quarter, a one-time transition tax on accumulated unrepatriated foreign earnings, estimated at \$991.3 million, was recognized associated with the December 2017 U.S. tax reform. This value is identified as provisional in the Consolidated Financial Statements for the period ended June 24, 2018, and is subject to future measurement period adjustments under SAB 118. Such an adjustment was made during the June 2018 quarter, incorporating new information into the estimate; the Company may make further adjustments as new information is made available. The revised estimate is now \$883.0 million.

The components of income (loss) before income taxes were as follows:

Year Ended
June 24, June 25, June 26,
2018 2017 2016
(in thousands)

United States \$128,190 \$7,553 \$(113,607)

Foreign 3,023,599 1,804,120 1,073,724
\$3,151,789 \$1,811,673 \$960,117

#### **Table of Contents**

Significant components of the provision (benefit) for income taxes attributable to income before income taxes were as follows:

	Year Ended				
	June 24,	June 25,	June 26,		
	2018	2017	2016		
	(in thousan	ds)			
Federal:					
Current	\$630,148	\$(70,858)	\$1,426		
Deferred	12,871	99,700	(38,616)		
	643,019	28,842	(37,190)		
State:					
Current	5,348	(963)	2,892		
Deferred	(3,273)	(2,246)	(7,600)		
	2,075	(3,209)	(4,708)		
Foreign:					
Current	132,566	85,479	90,752		
Deferred	(6,552)	2,798	(2,786)		
	126,014	88,277	87,966		
T-4-1 C 4	¢771 100	¢ 1 1 2 O 1 O	¢ 4C 0C0		

Total provision for income taxes \$771,108 \$113,910 \$46,068

Revaluation of the Company's deferred tax balances to reflect the new U.S. federal statutory tax rate was recorded in the year ended June 24, 2018 and is considered final and complete under SAB 118. The computation of the one-time transition tax on accumulated unrepatriated foreign earnings was recorded on a provisional basis in the year ended June 24, 2018 and is therefore subject to potential measurement period adjustments under SAB 118. The amount recorded related to the revaluation of the Company's deferred tax balance was \$42.5 million. Also, an associated tax liability was remeasured at \$52.7 million. The one-time transition tax is based on the Company's total post-1986 earnings and profits ("E&P") that was previously deferred from U.S. income taxes. The Company had previously accrued deferred taxes on a portion of this E&P. The Company has not yet completed the calculation of total post-1986 E&P and related income tax pools for its foreign subsidiaries. The Company recorded a provisional amount for the one-time transition tax of \$883.0 million which was offset by the reversal of the associated previously accrued deferred taxes of \$287.8 million. The net increase to tax expense recognized in the year ended June 24, 2018 was \$595.2 million. The one-time transition tax may be elected to be paid over a period of eight years. The Company intends to make this election.

#### **Table of Contents**

Deferred income taxes reflect the net tax effect of temporary differences between the carrying amounts of assets and liabilities for financial reporting purposes and the amounts used for income tax purposes, as well as the tax effect of carryforwards. Significant components of the Company's net deferred tax assets and liabilities were as follows:

	June 24,	June 25,
	2018	2017
	(in thousan	ids)
Deferred tax assets:		
Tax carryforwards	\$206,073	\$175,595
Allowances and reserves	118,559	170,752
Equity-based compensation	16,189	25,828
Inventory valuation differences	14,021	19,602
Prepaid cost sharing	65,644	133,831
Other	16,514	20,175
Gross deferred tax assets	437,000	545,783
Valuation allowance	(199,839)	(114,011)
Net deferred tax assets	237,161	431,772
Deferred tax liabilities:		
Intangible assets	(21,558)	(30,944)
Convertible debt	(60,252)	(153,047)
Capital assets	(61,429 )	(72,727)
Amortization of goodwill	(10,738)	(15,582)
Unremitted earnings of foreign subsidiaries	(6,656)	(302,663)
Other	(7,955)	(9,844)
Gross deferred tax liabilities	(168,588)	(584,807)
Net deferred tax assets (liabilities)	\$68,573	\$(153,035)

The change in the gross deferred tax assets, gross deferred tax liabilities, and valuation allowance between fiscal year 2018 and 2017 is primarily due to deferred revaluation to reflect the new U.S. statutory tax rate and decreases related to allowances and reserves, prepaid cost sharing, and unremitted earnings of foreign subsidiaries.

Realization of the Company's net deferred tax assets is based upon the weighting of available evidence, including such factors as the recent earnings history and expected future taxable income. The Company believes it is more likely than not that such deferred tax assets will be realized with the exception of \$199.8 million primarily related to California deferred tax assets. At June 24, 2018, the Company continued to record a valuation allowance to offset the entire California deferred tax asset balance due to the single sales factor apportionment election resulting in lower taxable income in California.

At June 24, 2018, the Company had federal net operating loss carryforwards of \$126.8 million. The majority of these losses will begin to expire in fiscal year 2019, and are subject to limitation on their utilization.

At June 24, 2018, the Company had state net operating loss carryforwards of \$24.5 million. If not utilized, these losses will begin to expire in fiscal year 2020 and are subject to limitation on their utilization.

At June 24, 2018, the Company had state tax credit carryforwards of \$285.9 million. Substantially all of these credits can be carried forward indefinitely.

As a result of U.S. tax reform, the Company revised its estimated annual effective tax rate to reflect the change in the U.S. federal statutory tax rate from 35% to 21%. As the Company has a fiscal year ending the last Sunday in June, it is subject to transitional tax rate rules. Therefore, a blended rate of 28.27% was computed as effective for the current fiscal year. The difference between the U.S. federal statutory tax rate of 28.27% and the

Continues on next page

#### **Table of Contents**

Company's effective tax rate for the year ended June 24, 2018 is primarily due to income in lower tax jurisdictions offset by the impact of U.S. tax reform.

A reconciliation of income tax expense provided at the federal statutory rate (28.27% in fiscal year 2018 and 35% in fiscal years 2017 and 2016) to actual income tax expense (benefit) is as follows:

	Year Ended		
	June 24,	June 25,	June 26,
	2018	2017	2016
	(in thousar	nds)	
Income tax expense computed at federal statutory rate	\$891,011	\$634,086	\$336,041
State income taxes, net of federal tax benefit	(50,585)	(11,973)	(14,070 )
Foreign income taxed at different rates	(939,808)	(352,860)	(265,123)
Settlements and reductions in uncertain tax positions	(33,367)	(144,519)	
Tax credits	(69,301)	(37,713)	(48,277)
State valuation allowance, net of federal tax benefit	57,302	12,070	17,948
Equity-based compensation	(35,875)	13,187	12,366
Other permanent differences and miscellaneous items	43,214	1,632	7,183
U.S. tax reform impacts	908,517	_	
	\$771,108	\$113,910	\$46,068

In July 2015, the U.S. Tax Court issued an opinion favorable to Altera Corporation with respect to Altera's litigation with the Internal Revenue Service. The litigation related to the treatment of stock-based compensation expense in an intercompany cost-sharing arrangement with Altera's foreign subsidiary. In its opinion, the U.S. Tax Court accepted Altera's position of excluding stock-based compensation from its intercompany cost-sharing arrangement. In July 2018, the U.S. Court of Appeals for the Ninth Circuit reversed the 2015 decision of the U.S. Tax Court. In August 2018, the opinion made by the U.S. Court of Appeals for the Ninth Circuit was withdrawn to allow time for a reconstituted panel to confer on the appeal. The Company is currently evaluating the impact, if any, of these subsequent events on the fiscal year 2019 Consolidated Financial Statements. The Company is unable to estimate the impact at this time.

Effective from fiscal year 2014 through 2017, the Company had a tax ruling in Switzerland for one of its foreign subsidiaries. The impact of the tax ruling decreased taxes by approximately \$6.3 million and \$4.3 million for fiscal year 2017 and 2016, respectively. The benefit of the tax ruling on diluted earnings per share was approximately \$0.03 in fiscal year 2017 and \$0.02 in fiscal year 2016. Effective fiscal year 2018, the Company has withdrawn its reduced tax rate ruling in Switzerland for this subsidiary due to the ruling being no longer necessary as the subsidiary meets the requirements to achieve the reduced tax rate under Swiss tax law.

Other significant items which are being evaluated by the Company but for which no estimate can currently be made and for which no provisional amounts were recorded in the Consolidated Financial Statements, include the impact of the GILTI provision of U.S. tax reform. The GILTI provision imposes taxes on foreign earnings in excess of a deemed return on tangible assets. This tax is effective for the Company after the end of the current fiscal year. However, the Company is evaluating whether deferred taxes should be recorded in relation to the GILTI provisions or if the tax should be recorded in the period in which it occurs. Based on current interpretation, the Company may choose either method as an accounting policy election. The Company has not yet decided on the accounting policy related to GILTI and will only do so after completion of the GILTI analysis. The provisions related to GILTI are subject to adjustment during the measurement period under SAB 118.

Earnings of the Company's foreign subsidiaries included in consolidated retained earnings that are indefinitely reinvested in foreign operations aggregated to approximately \$456.1 million at June 24, 2018. If these earnings were remitted to the United States, they would be subject to foreign withholding taxes of approximately \$74.9 million at current statutory rates.

## **Table of Contents**

As of June 24, 2018, the total gross unrecognized tax benefits were \$305.4 million, compared to \$339.4 million as of June 25, 2017, and \$417.4 million as of June 26, 2016. During fiscal year 2018, gross unrecognized tax benefits decreased by \$34.0 million. The amount of unrecognized tax benefits that, if recognized, would impact the effective tax rate was \$268.3 million, \$247.6 million, and \$323.4 million, as of June 24, 2018, June 25, 2017, and June 26, 2016, respectively. The aggregate changes in the balance of gross unrecognized tax benefits were as follows:

	(in thousand	ds)
Balance as of June 28, 2015	\$ 363,552	
Lapse of statute of limitations	(10,992	)
Increases in balances related to tax positions taken during prior periods	18,200	
Decreases in balances related to tax positions taken during prior periods	(421	)
Increases in balances related to tax positions taken during current period	47,093	
Balance as of June 26, 2016	417,432	
Settlements and effective settlements with tax authorities	(6,691	)
Lapse of statute of limitations	(113,491	)
Increases in balances related to tax positions taken during prior periods	6,557	
Decreases in balances related to tax positions taken during prior periods	(11,528	)
Increases in balances related to tax positions taken during current period	47,168	
Balance as of June 25, 2017	339,447	
Settlements and effective settlements with tax authorities	(693	)
Lapse of statute of limitations	(88,837	)
Increases in balances related to tax positions taken during prior periods	2,044	
Decreases in balances related to tax positions taken during prior periods	(1,320	)
Increases in balances related to tax positions taken during current period	54,772	
Balance as of June 24, 2018	\$ 305,413	

The Company recognizes interest expense and penalties related to the above unrecognized tax benefits within income tax expense. The Company had accrued \$13.0 million, \$15.7 million, and \$42.4 million cumulatively for gross interest and penalties as of June 24, 2018, June 25, 2017, and June 26, 2016, respectively.

The Company is subject to audits by state and foreign tax authorities. The Company is unable to make a reasonable estimate as to when cash settlements, if any, with the relevant taxing authorities will occur.

The Company files U.S. federal, U.S. state, and foreign income tax returns. As of June 24, 2018, tax years 2004-2018 remain subject to examination in the jurisdictions where the Company operates.

The Company is in various stages of examinations in connection with all of its tax audits worldwide, and it is difficult to determine when these examinations will be settled. It is reasonably possible that over the next 12-month period the Company may experience an increase or decrease in its unrecognized tax benefits as a result of tax examinations or lapses of statute of limitations. The change in unrecognized tax benefits may range up to \$28 million.

# Note 7: Net Income per Share

Basic net income per share is computed by dividing net income by the weighted-average number of common shares outstanding during the period. Diluted net income per share is computed using the treasury stock method, for dilutive stock options, restricted stock units, and Convertible Notes.

Continues on next page

## **Table of Contents**

The following table reconciles the numerators and denominators of the basic and diluted computations for net income per share.

	Year Ended						
	June 24,	June 25,	June 26,				
	2018	2017	2016				
	(in thousand	ls, except per	share data)				
Numerator:							
Net income	\$2,380,681	\$1,697,763	\$914,049				
Denominator:							
Basic average shares outstanding	161,643	162,222	158,919				
Effect of potential dilutive securities:							
Employee stock plans	2,312	2,058	2,120				
Convertible notes	12,258	16,861	13,464				
Warrants	4,569	2,629	656				
Diluted average shares outstanding	180,782	183,770	175,159				
Net income per share - basic	\$14.73	\$10.47	\$5.75				
Net income per share - diluted	\$13.17	\$9.24	\$5.22				

For purposes of computing diluted net income per share, weighted-average common shares do not include potentially dilutive securities that are anti-dilutive under the treasury stock method. The following potentially dilutive securities were excluded:

Year Ended Jundune June 24, 25, 26, 2018017 2016 (in thousands)

Options and RSUs 34 34 149

Diluted shares outstanding do not include any effect resulting from note hedges associated with the Company's 2018 Notes (as described in Note 13) as their impact would have been anti-dilutive.

Note 8: Financial Instruments

Fair Value

The Company defines fair value as the price that would be received from selling an asset or paid to transfer a liability in an orderly transaction between market participants at the measurement date. When determining the fair value measurements for assets and liabilities required or permitted to be recorded at fair value, the Company considers the principal or most advantageous market in which it would transact, and it considers assumptions that market participants would use when pricing the asset or liability.

A fair value hierarchy has been established that prioritizes the inputs to valuation techniques used to measure fair value. The level of an asset or liability in the hierarchy is based on the lowest level of input that is significant to the fair value measurement. Assets and liabilities carried at fair value are classified and disclosed in one of the following three categories:

Level 1: Valuations based on quoted prices in active markets for identical assets or liabilities with sufficient volume and frequency of transactions.

Level 2: Valuations based on observable inputs other than Level 1 prices such as quoted prices for similar assets or liabilities, quoted prices in markets that are not active, or model-derived valuations techniques for which all significant inputs are observable in the market or can be corroborated by observable market data for substantially the full term of the assets or liabilities.

Continues on next page

## **Table of Contents**

Level 3: Valuations based on unobservable inputs to the valuation methodology that are significant to the measurement of fair value of assets or liabilities and based on non-binding, broker-provided price quotes and may not have been corroborated by observable market data.

The Company's primary financial instruments include its cash, cash equivalents, investments, restricted cash and investments, long-term investments, accounts receivable, accounts payable, long-term debt and capital leases, and foreign currency related derivative instruments. The estimated fair value of cash, accounts receivable, and accounts payable approximates their carrying value due to the short period of time to their maturities. The estimated fair values of capital lease obligations approximate their carrying value as the substantial majority of these obligations have interest rates that adjust to market rates on a periodic basis. Refer to Note 13 - Long Term Debt and Other Borrowings for additional information regarding the fair value of the Company's Senior Notes and 2041 Notes.

#### Investments

The following table sets forth the Company's cash, cash equivalents, investments, restricted cash and investments, and other assets measured at fair value on a recurring basis as of June 24, 2018, and June 25, 2017:

June 24, 2018

	Cost	Guin	nrealizednrealized Fair (Loss) Fair Value (		(Reported V Cash and Cash Equivalents	Investment	Restricted tsCash & Investment	Other Assets	
~ .	(in thousand							* - <b></b> .	
Cash	\$708,364	\$ —	\$—		\$708,364	\$702,090	\$—	\$6,274	<b>\$</b> —
Time deposit	999,666		_		999,666	749,639	_	250,027	_
Level 1:									
Money market funds	2,341,807	_	_		2,341,807	2,341,807			_
U.S. Treasury and agencies	356,679	_	(170	)	356,509	333,721	22,788		_
Mutual funds	68,568	516	(142	)	68,942		_	_	68,942
Level 1 total	2,767,054	516	(312	)	2,767,258	2,675,528	22,788	_	68,942
Level 2:									
Municipal notes and bonds	152,378	37	(279	)	152,136	_	152,136	_	
Government-sponsored enterprises	110,963	_	(201	)	110,762	99,934	10,828	_	_
Foreign government bonds	19,986		(1	)	19,985	19,985	_	_	_
Corporate notes and bonds	516,955	95	(1,184	)	515,866	265,081	250,785	_	_
Mortgage backed securities - residential	804		(3	)	801	_	801	_	_
Level 2 total	801,086	132	(1,668	)	799,550	385,000	414,550		
Total	\$5,276,170	\$ 648	\$(1,980	)	\$5,274,838	\$4,512,257	\$437,338	\$256,301	\$68,942

Continues on next page

## **Table of Contents**

June 25, 2017

	Cost	UnrealizedUnrealized Gain (Loss)		d Fair Value	(Reported Within) Cash and Cash Investments Equivalents		Restricted Cash & Investment	Other Assets	
	(in thousand	*							
Cash	\$551,308	\$ <i>—</i>	\$—		\$551,308	\$545,130	<b>\$</b> —	\$6,178	<b>\$</b> —
Time deposit	640,666	_			640,666	390,639		250,027	_
Level 1:									
Money market funds	1,423,417	_			1,423,417	1,423,417		_	_
U.S. Treasury and agencies	783,848	684	(2,111	)	782,421	8,297	774,124	_	_
Mutual funds	53,247	3,007			56,254		_		56,254
Level 1 total	2,260,512	3,691	(2,111	)	2,262,092	1,431,714	774,124		56,254
Level 2:									
Municipal notes and bonds	194,575	308	(7	)	194,876	_	194,876	_	_
U.S. Treasury and agencies	12,795	_	(167	)	12,628	_	12,628	_	_
Government-sponsored enterprises	24,502	_	(6	)	24,496	_	24,496	_	_
Foreign government bond	s62,917	219	(114	)	63,022		63,022	_	_
Corporate notes and bond	s 2,433,622	4,654	(1,840	)	2,436,436	10,051	2,426,385	_	_
Mortgage backed securities - residential	102,760	87	(489	)	102,358	_	102,358	_	_
Mortgage backed securities - commercial	65,828	9	(98	)	65,739	_	65,739	_	_
Level 2 total	2,896,999	5,277	(2,721	)	2,899,555	10,051	2,889,504	_	
Total	\$6,349,485	\$ 8,968		)	\$6,353,621	\$2,377,534	\$3,663,628	\$256,205	\$56,254

The Company accounts for its investment portfolio at fair value. Realized gains (losses) for investment sales are specifically identified. Management assesses the fair value of investments in debt securities that are not actively traded through consideration of interest rates and their impact on the present value of the cash flows to be received from the investments. The Company also considers whether changes in the credit ratings of the issuer could impact the assessment of fair value. Additionally, the Company also considers factors such as the Company's intent to sell the security and whether it is more likely than not that the Company will be required to sell the security before recovery of its amortized cost basis.

During the fiscal year 2018, the Company recorded a \$42.5 million other-than-temporary impairment charge on a portion of its available for sale investments as a result of a decision to sell selected investments held in foreign jurisdictions in conjunction with our cash repatriation strategy following the U.S. tax reform legislation. The Company did not recognize any losses on investments due to other-than-temporary impairments in fiscal year 2017 or 2016.

## **Table of Contents**

The Company does not intend to sell its domestic investment portfolio and it is not more likely than not that it will be required to sell these investments before recovery of their amortized cost bases. Accordingly, the Company does not consider its domestically held investments to be other-than-temporarily impaired.

Gross realized gains/(losses) from sales of investments were \$2.4 million and \$(8.5) million in fiscal year 2018, \$3.6 million and \$(2.4) million in fiscal year 2017, and \$2.0 million and \$(3.0) million in fiscal year 2016.

The following is an analysis of the Company's cash, cash equivalents, investments, and restricted cash and investments in unrealized loss positions:

	June 24, 2	June 24, 2018									
	Unrealized Less than		Losses		ed Losses hs or	Total					
	Fair Value	Gross Unrealize Loss	ed	Fair Valı	Gross uUnrealized Loss	Fair Value	Gross Unrealize Loss	ed			
	(in thousa	nds)									
U.S. Treasury and agencies	\$332,903	\$ (100	)	\$11,026	\$ (70 )	\$343,929	\$ (170	)			
Municipal notes and bonds	141,139	(279	)	_	_	141,139	(279	)			
Mutual funds	25,312	(142	)	_	_	25,312	(142	)			
Government-sponsored enterprises	110,722	(201	)	_	_	110,722	(201	)			
Foreign government bonds	19,985	(1	)	_	_	19,985	(1	)			
Corporate notes and bonds	161,813	(1,092	)	14,928	(92)	176,741	(1,184	)			
Mortgage backed securities - residential	801	(3	)	_	_	801	(3	)			
	\$792,675	\$ (1,818	)	\$25,954	\$ (162 )	\$818,629	\$ (1,980	)			

The amortized cost and fair value of cash equivalents, investments, and restricted investments with contractual maturities as of June 24, 2018, are as follows:

	Cost	Estimated
		Fair Value
	(in thousand	ds)
Due in one year or less	\$4,312,694	\$4,312,352
Due after one year through five years	181,681	180,352
Due in more than five years	4,863	4,828
	\$4,499,238	\$4,497,532

The Company has the ability, if necessary, to liquidate its investments in order to meet the Company's liquidity needs in the next 12 months. Accordingly, those investments with contractual maturities greater than one year from the date of purchase nonetheless are classified as short-term on the accompanying Consolidated Balance Sheets.

Derivative Instruments and Hedging

The Company carries derivative financial instruments ("derivatives") on its Consolidated Balance Sheets at their fair values. The Company enters into foreign currency forward contracts and foreign currency options with financial institutions with the primary objective of reducing volatility of earnings and cash flows related to foreign currency exchange rate fluctuations. In addition, the Company enters into interest rate swap arrangements to manage interest rate risk. The counterparties to these derivatives are large, global financial institutions that the Company believes are creditworthy, and therefore, it does not consider the risk of counterparty nonperformance to be material.

## **Table of Contents**

## Cash Flow Hedges

The Company's financial position is routinely subjected to market risk associated with foreign currency exchange rate fluctuations on non-U.S. dollar transactions or cash flows, primarily from Japanese yen-denominated revenues and euro-denominated and Korean won-denominated expenses. The Company's policy is to mitigate the foreign exchange risk arising from the fluctuations in the value of these non-U.S. dollar denominated transactions or cash flows through a foreign currency cash flow hedging program, using forward contracts and foreign currency options that generally expire within 12 months and no later than 24 months. These hedge contracts are designated as cash flow hedges and are carried on the Company's balance sheet at fair value with the effective portion of the contracts' gains or losses included in accumulated other comprehensive income (loss) and subsequently recognized in revenue/expense in the same period the hedged items are recognized.

In addition, the Company has entered into interest rate swap agreements to hedge against the variability of cash flows due to changes in certain benchmark interest rates on fixed rate debt. These instruments are designated as cash flow hedges at inception and are settled in conjunction with the issuance of debt. The effective portion of the contracts' gains or losses is included in accumulated other comprehensive income (loss) and is amortized into income as the hedged item impacts earnings.

At inception and at each quarter-end, hedges are tested prospectively and retrospectively for effectiveness using regression analysis. Changes in the fair value of foreign exchange contracts due to changes in time value are included in the assessment of effectiveness. To qualify for hedge accounting, the hedge relationship must meet criteria relating to both the derivative instrument and the hedged item. These criteria include identification of the hedging instrument, the hedged item, the nature of the risk being hedged, and how the hedging instrument's effectiveness in offsetting the exposure to changes in the hedged item's fair value or cash flows will be measured. There were no material gains or losses during the fiscal years ended June 24, 2018, June 25, 2017, or June 26, 2016 associated with forecasted transactions that failed to occur. There were no material gains or losses during the fiscal years ended June 25, 2017, or June 26, 2016 associated with ineffectiveness.

To receive hedge accounting treatment, all hedging relationships are formally documented at the inception of the hedge, and the hedges must be tested to demonstrate an expectation of providing highly effective offsetting changes to future cash flows on hedged transactions. When derivative instruments are designated and qualify as effective cash flow hedges, the Company recognizes effective changes in the fair value of the hedging instrument within accumulated other comprehensive income (loss) until the hedged exposure is realized. Consequently, the Company's results of operations are not subject to fluctuation as a result of changes in the fair value of the derivative instruments. If hedges are not highly effective or if the Company does not believe that the underlying hedged forecasted transactions will occur, the Company may not be able to account for its derivative instruments as cash flow hedges. If this were to occur, future changes in the fair values of the Company's derivative instruments would be recognized in earnings. Additionally, related amounts previously recorded in other comprehensive income would be reclassified to income immediately. As of June 24, 2018, the Company had a net loss of \$2.2 million accumulated in other comprehensive income, net of tax, related to foreign exchange cash flow hedges which it expects to reclassify from other comprehensive income into earnings over the next 12 months. Additionally, as of June 24, 2018, the Company had a net loss of \$1.8 million accumulated in other comprehensive income, net of tax, related to interest rate contracts which it expects to reclassify from other comprehensive income into earnings over the next 6.7 years. Fair Value Hedges

The Company has interest rate contracts whereby the Company receives fixed rates and pays variable rates based on certain benchmark interest rates, resulting in a net increase or decrease to interest expense, a component of other expense, net in our Consolidated Statement of Operations. These interest rate contracts are designated as fair value hedges and hedge against changes in the fair value of our debt portfolio. The Company concluded that these interest rate contracts meet the criteria necessary to qualify for the short-cut method of hedge accounting, and as such, an assumption is made that the change in the fair value of the hedged debt, due to changes in the benchmark rate, exactly offsets the change in the fair value of the interest rate swap. Therefore, the derivative is considered to be effective at achieving offsetting changes in the fair value of the hedged liability, and no ineffectiveness is recognized.

## **Table of Contents**

## Balance Sheet Hedges

The Company also enters into foreign currency forward contracts to hedge fluctuations associated with foreign currency denominated monetary assets and liabilities, primarily cash, third-party accounts receivable, accounts payable, and intercompany receivables and payables. These forward contracts are not designated for hedge accounting treatment. Therefore, the change in fair value of these derivatives is recorded as a component of other income (expense) and offsets the change in fair value of the foreign currency denominated assets and liabilities, which are also recorded in other income (expense).

As of June 24, 2018, the Company had the following outstanding foreign currency contracts that were entered into under its cash flow and balance sheet hedge programs:

Notional Value

Derivatives Designated as Hedging Instruments.

Derivatives Not Designated as as

**Hedging Instruments:** 

**Hedging Instruments:** 

(in thousands)

Foreign currency forward contracts

	Buy Cont	racts Contracts	<b>Buy Contract</b>	sSell Contracts
Japanese yen	<b>\$</b> —	\$ 568,970	\$ —	\$ 267,367
Euro	102,557	_	45,298	
Korean won	28,887	_		99,408
Taiwan dollar	_	_	31,859	_
Singapore dollar	_	_	21,376	
British pound sterling	_	_	15,865	
Swiss franc	_	_	14,899	
Indian rupee	_	_	3,220	
Chinese renminbi	_	_	2,467	
	\$131,444	\$ 568,970	\$ 134,984	\$ 366,775
Foreign currency option contracts				
	Buy Put	Sell Call	Buy Put	Sell Put
Japanese yen (1)	\$9,050	\$ 9,709	\$ —	\$ —

<sup>(1)</sup> The local currency notional amounts of these foreign currency option contracts are equal to each other.

Continues on next page

## **Table of Contents**

The fair value of derivative instruments in the Company's Consolidated Balance Sheet as of June 24, 2018, and June 25, 2017, were as follows:

	June 24, 2018				June 25, 2017					
	Fair Value	e of Deri	vative Instruments (	ative Instruments (Level 2)			Fair Value of Derivative Instruments (Lev			
	Derivative	e Assets	Derivative Liabiliti	es	Derivative Assets		Derivative Liabilities			
	Balance Sheet Location	Fair Value	Balance Sheet Location	Fair Value	Balance Sheet Location	Fair Value	Balance Sheet Location	Fair Value		
	(in thousa	nds)								
Derivatives designate	ed as hedgi	ng instru	iments:							
Foreign exchange contracts	Prepaid expense and other assets	\$7,581	Accrued expenses and other current liabilities	\$8,866	Prepaid expense and other assets	\$8,061	Accrued expenses and other current liabilities	\$2,916		
Interest rate contracts, short-term		_	Accrued expenses and other current liabilities	7,468		_	Accrued expenses and other current liabilities	2,833		
Interest rate contracts, long-term		_	Other long-term liabilities	23,720		_	Other long-term liabilities	7,269		
Derivatives not desig	nated as he	edging in	struments:							
Foreign exchange contracts	Prepaid expense and other assets	111	Accrued expenses and other current liabilities	32	Prepaid expense and other assets	213	Accrued expenses and other current liabilities	342		
Total derivatives		\$7,692		\$40,086		\$8,274		\$13,360		

Under the master netting agreements with the respective counterparties to the Company's derivative contracts, subject to applicable requirements, the Company is allowed to net settle transactions of the same currency with a single net amount payable by one party to the other. However, the Company has elected to present the derivative assets and derivative liabilities on a gross basis on its balance sheet. As of June 24, 2018, the potential effect of rights of offset associated with the above foreign exchange and interest rate contracts would be an offset to assets and liabilities by \$5.6 million, resulting in a net derivative asset of \$2.1 million and net derivative liability of \$34.4 million. As of June 25, 2017, the potential effect of rights of offset associated with the above foreign exchange contracts would be an offset to both assets and liabilities by \$5.9 million, resulting in a net derivative asset of \$2.3 million and a net derivative liability of \$7.4 million. The Company is not required to pledge, nor is the Company entitled to receive, cash collateral for these derivative transactions.

## **Table of Contents**

The effect of derivative instruments designated as cash flow hedges on the Company's Consolidated Statements of Operations, including accumulated other comprehensive income ("AOCI"), was as follows:

```
Year Ended June 24,
                                            2018
                          Location of
                                            Gain (Loss)
Recognized
                          Gain (Loss)
                          Recognized in or
                                                      from AOCI
                          Reclassified into
                                            in AOCI
                                                      into Income
                          Income
Derivatives in Cash Flow Hedging
                                            (in thousands)
Relationships
Foreign exchange contracts Revenue
                                             $(8,305) $(11,284)
Foreign exchange contracts Cost of goods sold 57
                                                      5,218
Foreign exchange contracts SG&A
                                             558
                                                      2,654
Foreign exchange contracts Other expense, net —
                                            $(7,690) $(3,412)
                                                                )
Derivatives in Fair Value Hedging
Relationships
Interest rate contracts
                          Other expense, net $—
                                                      $ (126
                                                                 )
                                            Year Ended June 25, 2017
                                                                 Ineffective
                                                                 Portion and
                                                                 Amount
                          Location of
                                            Effective Portion
                                                                 Excluded
                          Gain (Loss)
                                                                 from
                          Recognized in or
                                                                 Effectiveness
                          Reclassified into
                                             Gain
                                                    Gain (Loss)
                          Income
                                                                 Gain (Loss)
Derivatives Designated as
                                             (Loss) Reclassified
                                                                 Recognized
                                            Recognificatin AOCI
Hedging Instruments
                                                                 in Income
                                            in AOCInto Income
                                            (in thousands)
Foreign exchange contracts Revenue
                                            $2,927 $ (12,000 ) $ 6,982
Foreign exchange contracts Cost of goods sold 2,859
                                                    666
                                                                 (686)
                                                                            )
Foreign exchange contracts SG&A
                                                    71
                                                                 (267)
                                                                            )
Foreign exchange contracts Other expense, net—
                                                                 (82
                                                                            )
                          Other expense, net —
Interest rate contracts
                                                    1,727
                                            $6,914 $ (9,536 ) $ 5,947
```

The effect of derivative instruments not designated as cash flow hedges on the Company's Consolidated Statement of Operations was as follows:

or comments where the control of		Year En	nded	
		7/1	June 25, 2017	
	Location of Gain	Gain	Gain	
Derivatives Not Designated as Hedging Instruments:	Recognized	RecogniRectognized		
	in Income	in Income Income		
		(in thou	sands)	
Foreign exchange contracts	Other income	\$7,756	\$ 523	

## **Table of Contents**

The following table presents the effect of the fair value cash flow hedge accounting on the Statement of Financial Performance:

Location and Amount of Gain (Loss) Recognized in Income on Fair Value and Cash Flow Hedging Relationships

Year ended June 24, 2018

Revenue Cost of Selling, Other
Goods General and Income
Sold Administrative (Expense)

2,654

(in thousands)

Total amounts of income and expense line items presented in the statement of financial performance in which the effects of fair value or cash flow hedges are recorded:

\$11,076,998 \$5,911,966 \$ 762,219 \$(61,510)

The effects of fair value and cash flow hedging:

Gain or (loss) on fair value hedging relationships in Subtopic 815-20:

Interest contracts:

Hedged items — — — 21,086
Derivatives designated as hedging instruments — — — — (21,086)

Gain or (loss) on cash flow hedging relationships in Subtopic 815-20:

Foreign exchange contracts:

Amount of gain or (loss) reclassified from accumulated other comprehensive income into income (11,284) 5,218

Concentrations of Credit Risk

Financial instruments that potentially subject the Company to concentrations of credit risk consist principally of cash and cash equivalents, investments, restricted cash and investments, trade accounts receivable, and derivative financial instruments used in hedging activities. Cash is placed on deposit at large, global financial institutions. Such deposits may be in excess of insured limits. Management believes that the financial institutions that hold the Company's cash are creditworthy and, accordingly, minimal credit risk exists with respect to these balances.

The Company's overall portfolio of available-for-sale securities must maintain an average minimum rating of "AA-" or "Aa3" as rated by Standard and Poor's, Fitch Ratings, or Moody's Investor Services. To ensure diversification and minimize concentration, the Company's policy limits the amount of credit exposure with any one financial institution or commercial issuer.

The Company is exposed to credit losses in the event of nonperformance by counterparties on foreign currency and interest rate hedge contracts that are used to mitigate the effect of exchange rate and interest rate fluctuations and on contracts related to structured share repurchase arrangements. These counterparties are large, global financial institutions and, to date, no such counterparty has failed to meet its financial obligations to the Company. Credit risk evaluations, including trade references, bank references, and Dun & Bradstreet ratings, are performed on

Credit risk evaluations, including trade references, bank references, and Dun & Bradstreet ratings, are performed on all new customers, and the Company monitors its customers' financial condition and payment performance. In general, the Company does not require collateral on sales.

As of June 24, 2018, four customers accounted for approximately 24%, 17%, 10%, and 10%, of accounts receivable, respectively. As of June 25, 2017, four customers accounted for approximately 22%, 19%, 13%, and 12% of accounts receivable, respectively. No other customers accounted for more than 10% of accounts receivable, respectively. The Company's balance and transactional activity for its allowance for doubtful accounts is not material as of and for the twelve months ended June 24, 2018, June 25, 2017, and June 26, 2016.

Continues on next page

## **Table of Contents**

#### Note 9: Inventories

Inventories are stated at the lower of cost (first-in, first-out method) or net realizable value. System shipments to customers in Japan, for which title does not transfer until customer acceptance, are classified as finished goods inventory and carried at cost until title transfers. Inventories consist of the following:

June 24, June 25, 2018 2017 (in thousands) Raw materials \$916,438 \$625,600 Work-in-process 222,921 213,066 Finished goods 736,803 394,250 \$1,876,162 \$1,232,916

Note 10: Property and Equipment

Property and equipment, net, consist of the following:

June 24, June 25, 2018 2017 (in thousands) Manufacturing and engineering equipment \$911,140 \$819,239 Computer equipment and software 182,451 166,441 Land 46,155 46,155 Buildings and improvements 530,032 358,081 Office equipment, furniture and fixtures 66,378 52,959 1,736,156 1,442,875 Less: accumulated depreciation and amortization (833,609) (757,280) \$902,547 \$685,595

Depreciation expense, including amortization of capital leases, during fiscal years 2018, 2017, and 2016, was \$165.2 million, \$152.3 million, and \$134.7 million, respectively.

The Company recorded a \$15.2 million gain on sale of real estate and related development rights, net of associated exit costs, in fiscal year 2016 in selling, general, and administrative expenses in the Consolidated Statement of Operations. No significant gains on sale were realized in fiscal years 2018 or 2017.

Note 11: Goodwill and Intangible Assets

## Goodwill

The balance of goodwill was \$1.5 billion and \$1.4 billion as of June 24, 2018, and June 25, 2017, respectively. As of June 24, 2018, \$61.1 million of the goodwill balance is tax deductible, and the remaining balance is not tax deductible due to purchase accounting and applicable foreign law. No goodwill impairments were recognized in fiscal years 2018, 2017, or 2016. Refer to Note 19 - Business Combinations for information regarding goodwill additions during the fiscal year ended June 24, 2018.

Continues on next page

## **Table of Contents**

## **Intangible Assets**

The following table provides details of the Company's intangible assets, other than goodwill:

	June 24, 2018				June 25, 20			
	Gross	Accumulated Amortization Net		ted ion Net Gross		Accumulated Amortization		Net
	(in thousand	ls)						
Customer relationships	\$630,220	\$(433,309	)	\$196,911	\$615,164	\$ (366,439	)	\$248,725
Existing technology	669,520	(576,844	)	92,676	643,196	(487,056	)	156,140
Patents and other intangible assets	99,767	(71,518	)	28,249	73,067	(66,937	)	6,130
Total intangible assets	\$1,399,507	\$(1,081,671	)	\$317,836	\$1,331,427	\$ (920,432	)	\$410,995

The Company recognized \$161.2 million, \$154.6 million, and \$156.3 million in intangible asset amortization expense during fiscal years 2018, 2017, and 2016, respectively. No intangible asset impairments were recognized in fiscal years 2018, 2017, or 2016.

Refer to Note 19 - Business Combinations for information regarding intangible assets acquired during the fiscal year ended June 24, 2018.

The estimated future amortization expense of intangible assets as of June 24, 2018, was as follows:

## Fiscal Year Amount

(in thousands)
2019 \$ 125,921
2020 60,792
2021 58,019
2022 54,492
2023 10,967
Thereafter 7,645
\$ 317,836

Note 12: Accrued Expenses and Other Current Liabilities

Accrued expenses and other current liabilities consist of the following:

	June 24,	June 25,
	2018	2017
	(in thousand	ls)
Accrued compensation	\$506,471	\$447,363
Warranty reserves	192,480	161,981
Income and other taxes payable	185,384	95,127
Dividend payable	174,372	72,738
Other	250,502	192,152
	\$1,309,209	\$969,361

Continues on next page

## **Table of Contents**

Note 13: Long Term Debt and Other Borrowings

As of June 24, 2018, and June 25, 2017, the Company's outstanding debt consisted of the following:

	June 24, 20			June 25, 20	ne 25, 2017				
	Amount		Effective		Amount		Effec	tive	
	(in	(in		est	(in		Intere	Interest	
	thousands)		Rate		thousands)		Rate		
Fixed-rate 1.25% Convertible Notes Due May 15, 2018 ("2018 Notes")	_	(1)	5.27	%	447,436	(2)	5.27	%	
Fixed-rate 2.75% Senior Notes Due March 15, 2020 ("2020 Notes")	500,000		2.88	%	500,000		2.88	%	
Fixed-rate 2.80% Senior Notes Due June 15, 2021 ("2021 Notes	3'800,000		2.95	%	800,000		2.95	%	
Fixed-rate 3.80% Senior Notes Due March 15, 2025 ("2025 Notes")	500,000		3.87	%	500,000		3.87	%	
Fixed-rate 2.625% Convertible Notes Due May 15, 2041 ("2041 Notes")	326,953	(2)	4.28	%	631,074	(2)	4.28	%	
Commercial paper	360,000		2.33	% (3)			_	%	
Total debt outstanding, at par	2,486,953				2,878,510				
Unamortized discount	(85,196	)			(178,589	)			
Fair value adjustment - interest rate contracts	(31,189	)			(10,102	)			
Unamortized bond issuance costs	(1,820	)			(3,161	)			
Total debt outstanding, at carrying value	\$2,368,748	3			\$2,686,658	3			
Reported as:									
Current portion of long-term debt	\$608,532	(2)			\$907,827	(2)			
Long-term debt	1,760,216				1,778,831				
Total debt outstanding, at carrying value	\$2,368,748	}			\$2,686,658	3			
(1) The 2010 Notes were settled were their metanity on May 15	2010								

- (1) The 2018 Notes were settled upon their maturity on May 15, 2018.
- (2) As of the report date, these notes were convertible at the option of the bond holder. This is a result of the following condition being met; the market value of the Company's Common Stock was greater than 130% of the convertible notes conversion price for 20 or more of the 30 consecutive trading days preceding the quarter-end. As a result, the 2041 Notes were classified in current liabilities and a portion of the equity component associated with the convertible notes, representing the unamortized discount, was classified in temporary equity on the Company's Consolidated Balance Sheets. Upon closure of the conversion period, the notes not converted will be reclassified back into noncurrent liabilities and the temporary equity will be reclassified into permanent equity.
- (3) Represents the weighted-average effective interest rate for all outstanding balances as of the report date. The Company's contractual cash obligations relating to its outstanding debt as of June 24, 2018, were as follows: Payments Due by Fiscal Year:

	(in thousands)
2019 (1)	\$ 686,953
2020	500,000
2021	800,000
2022	_
2023	_
Thereafter	500,000
Total	\$ 2,486,953

(1) As noted above, the conversion period for the 2041 Notes is open as of June 24, 2018. As there is the potential for conversion at the option of the holder, the principal balance of the 2041 Notes has been included in the one-year payment period.

Continues on next page

## **Table of Contents**

#### Convertible Senior Notes

In May 2011, the Company issued and sold \$450 million in aggregate principal amount of 1.25% Convertible Senior Notes due May 2018 at par. The 2018 Notes were extinguished upon maturity on May 15, 2018. During the twelve months ended June 24, 2018, the majority the 2018 Notes were converted at the option of the bondholders. In settlement, the bondholders received 4.8 million shares of Common Stock. To offset the dilutive impact of the Common Stock consideration paid, the Company exercised the associated note hedge and received 4.8 million shares from counterparties. The remaining 2018 Notes were settled at par value, without conversion.

In June 2012, with the acquisition of Novellus, the Company assumed \$700 million in aggregate principal amount of 2.625% Convertible Senior Notes due May 2041 (collectively with the 2018 Notes, the "Convertible Notes"). The Company pays cash interest at an annual rate of 2.625%, on a semi-annual basis on May 15 and November 15 of each year on the 2041 Notes. The 2041 Notes also have a contingent interest payment provision that may require the Company to pay additional interest, up to 0.60% per year, based on certain thresholds, beginning with the semi-annual interest payment on May 15, 2021, and upon the occurrence of certain events, as outlined in the indenture governing the 2041 Notes.

The Company separately accounts for the liability and equity components of the Convertible Notes. The initial debt components of the Convertible Notes were valued based on the present value of the future cash flows using the Company's borrowing rate at the date of the issuance or assumption for similar debt instruments without the conversion feature, which equals the effective interest rate on the liability component disclosed in the table below, respectively. The equity component was initially valued equal to the principle value of the notes, less the present value of the future cash flows using the Company's borrowing rate at the date of the issuance or assumption for similar debt instruments without a conversion feature, which equated to the initial debt discount.

Under certain circumstances, the Convertible Notes may be converted into shares of the Company's Common Stock. The number of shares each debenture is convertible into is based on conversion rates, disclosed in the table below. The principal value of Convertible Note conversions in the fiscal year ended June 24, 2018, were \$751.3 million. During the quarter ended June 24, 2018 and in the subsequent period through August 10, 2018, the Company received notice of conversion for an additional \$79.4 million principal value of 2041 Notes, which will settle in the quarter ending September 23, 2018.

Selected additional information regarding the Convertible Notes outstanding as of June 24, 2018, and June 25, 2017, is as follows:

is as follows:			
	June 24, 2018	June 25,	2017
	2041	2018	2041
	Notes	Notes	Notes
	(in thousand	ds, except	years,
	percentages	s, convers	ion rate,
	and convers	sion price	)
Carrying amount of permanent equity component, net of tax	\$159,120	\$89,604	\$156,374
Carrying amount of temporary equity component, net of tax	\$78,192	\$15,186	\$154,675
Remaining amortization period (years)	22.9	0.8	23.8
Fair Value of Notes (Level 2)	\$1,736,653		
Conversion rate (shares of common stock per \$1,000 principal amount of notes)	30.1361		
Conversion price (per share of common stock)	\$33.18		
If-converted value in excess of par value	\$1,394,383		
Estimated share dilution using average quarterly stock price of \$195.01 per share	8,176		
Conventible Note Hedges and Wements			

Convertible Note Hedges and Warrants

Concurrent with the issuance of the 2018 Notes, the Company purchased a convertible note hedge and sold warrants. The warrants settlement is contractually defined as net share settlement. The exercise price is adjusted for certain corporate events, including dividends on the Company's Common Stock. As of June 24, 2018, the warrants associated with the 2018 Notes had not been exercised and remained outstanding.

## **Table of Contents**

In conjunction with the convertible note hedge, counterparties agreed to sell to the Company shares of Common Stock equal to the number of shares issuable upon conversion of the 2018 Notes in full. The convertible note hedge transactions will be settled in net shares and will terminate upon the earlier of the maturity date or the first day none of the respective notes remain outstanding due to conversion or otherwise. Settlement of the convertible note hedge in net shares, based on the number of shares issued upon conversion of the 2018 Notes, on the expiration date would result in the Company receiving net shares equivalent to the number of shares issuable by the Company upon conversion of the 2018 Notes. The exercise price is adjusted for certain corporate events, including dividends on the Company's Common Stock. During the fiscal year ended June 24, 2018, the note hedge was partially settled, resulting in the receipt of approximately 4.8 million shares.

The following table presents the details of the outstanding warrants as of June 24, 2018:

(shares in thousands)

Warrants:

Underlying shares 7,557
Estimated share dilution using average quarterly stock price \$195.01 per share 4,770
Exercise price \$71.91

Expiration date range August 15 - October 24, 2018

Senior Notes

On March 12, 2015, the Company completed a public offering of \$500 million aggregate principal amount of the Company's Senior Notes due March 2020 and \$500 million aggregate principal amount of the Company's Senior Notes due March 2025. The Company pays interest at an annual rate of 2.75% and 3.80% on the 2020 Notes and 2025 Notes, respectively, on a semi-annual basis on March 15 and September 15 of each year. During the year ended June 26, 2016, the Company entered into a series of interest rate contracts hedging the fair value of a portion of the 2025 Notes par value, whereby the Company receives a fixed rate and pays a variable rate based on a certain benchmark interest rate. Refer to Note 8 for additional information regarding these interest rate contracts. The Company may redeem the 2020 Notes and 2025 Notes at a redemption price equal to 100% of the principal amount of such series ("par"), plus a "make whole" premium as described in the indenture in respect of these notes and accrued and unpaid interest before February 15, 2020, for the 2020 Notes and before December 15, 2024, for the 2025 Notes. The Company may redeem the Senior Notes at par, plus accrued and unpaid interest at any time on or after February 15, 2020, for the 2020 Notes and on or after December 24, 2024, for the 2025 Notes. In addition, upon the occurrence of certain events, as described in the indenture, the Company will be required to make an offer to repurchase these notes at a price equal to 101% of the principal amount of the notes, plus accrued and unpaid interest. On June 7, 2016, The Company completed a public offering of \$800 million aggregate principal amount of Senior Notes due June 2021 (together with the 2020, and 2025 Notes, the "Senior Notes"). The Company pays interest at an annual rate of 2.80% on the 2021 Notes on a semi-annual basis on June 15 and December 15 of each year. The Company may redeem the 2021 Notes at a redemption price equal to 100% of the principal amount of such series ("par"), plus a "make whole" premium as described in the indenture in respect to the 2021 Notes and accrued and unpaid interest before May 15, 2021. The Company may redeem the 2021 Notes at par, plus accrued and unpaid interest at any time on or after May 15, 2021. In addition, upon the occurrence of certain events, as described in the indenture, the Company will be required to make an offer to repurchase the 2021 Notes at a price equal to 101% of the principal amount of the respective note, plus accrued and unpaid interest.

## **Table of Contents**

Selected additional information regarding the Senior Notes outstanding as of June 24, 2018, is as follows:

		Fair Value
	Remaining Amortization period	of Notes
		(Level 2)
(1100mg)	(voors)	(in
(years)		thousands)
2020 Notes	1.7	\$497,250
2021 Notes	3.0	\$ 786,856
2025 Notes	6.7	\$497,560

**Revolving Credit Facility** 

On October 13, 2017, the Company entered into Amendment No. 2 to Amended and Restated Credit Agreement, (the "2nd Amendment"), which amends the Company's prior unsecured Credit Agreement, (as amended by the 2nd Amendment, the "Amended Credit Agreement"). Among other things, the Amended Credit Agreement provides for a \$500 million increase to the Company's revolving credit facility, from \$750.0 million to \$1.25 billion with a syndicate of lenders. The Amended Credit Agreement provides an expansion option that will allow the Company, subject to certain requirements, to request an increase in the facility of up to an additional \$600.0 million, for a potential total commitment of \$1.85 billion. The facility matures on October 13, 2022.

Interest on amounts borrowed under the credit facility is, at the Company's option, based on (1) a base rate, defined as the greatest of (a) prime rate, (b) Federal Funds rate plus 0.5%, or (c) one-month LIBOR plus 1.0%, plus a spread of 0.0% to 0.5%, or (2) LIBOR multiplied by the statutory rate, plus a spread of 0.9% to 1.5%, in each case as the applicable spread is determined based on the rating of the Company's non-credit enhanced, senior unsecured long-term debt. Principal and any accrued and unpaid interest is due and payable upon maturity. Additionally, the Company will pay the lenders a quarterly commitment fee that varies based on the Company's credit rating. The Amended and Restated Credit Agreement contains affirmative covenants, negative covenants, financial covenants, and events of default. As of June 24, 2018, the Company had no borrowings outstanding under the credit facility and was in compliance with all financial covenants.

## Commercial Paper Program

On November 13, 2017, the Company established a new commercial paper program under which the Company may issue unsecured commercial paper notes on a private placement basis up to a maximum aggregate principal amount of \$1.25 billion. The net proceeds from the CP Program will be used for general corporate purposes, including repurchases of the Company's Common Stock from time to time and under the Company's stock repurchase program. As of June 24, 2018, borrowings under the CP Program totaled \$360.0 million with a weighted-average interest rate of 2.33% and maturities of 90 days or less. Amounts available under the CP Program may be re-borrowed. The CP Program is backstopped by the Company's Revolving Credit Arrangement.

## Interest Cost

The following table presents the amount of interest cost recognized relating to both the contractual interest coupon and amortization of the debt discount, issuance costs, and effective portion of interest rate contracts with respect to the Convertible Notes, the Senior Notes, the term loan agreement, commercial paper, and and the revolving credit facility during the fiscal years ended June 24, 2018, June 25, 2017, and June 26, 2016.

	Year End	ded	
	June 24,	June 25,	June 26,
	2018	2017	2016
	(in thous	ands)	
Contractual interest coupon	\$77,091	\$95,195	\$63,053
Amortization of interest discount	12,225	22,873	35,206
Amortization of issuance costs	2,034	2,414	35,315
Effect of interest rate contracts, net	3	(4,756)	359
Total interest cost recognized	\$91,353	\$115,726	\$133,933

## **Table of Contents**

The increase in interest expense during the 12 months ended June 25, 2017, is primarily the result of the issuance of \$2.4 billion of Senior Notes in June 2016, \$1.6 billion of which was extinguished in October 2016. The decrease in amortization of issuance costs is primarily due to the termination of the bridge loan financing. The variation in amortization of interest rate contracts is primarily related to the interest rate contracts associated with the \$1.6 billion senior notes extinguished in October 2016.

Note 14: Retirement and Deferred Compensation Plans

Employee Savings and Retirement Plan

The Company maintains a 401(k) retirement savings plan for its eligible employees in the United States. Each participant in the plan may elect to contribute from 1% to 75% of annual eligible earnings to the plan, subject to statutory limitations. The Company makes matching employee contributions in cash to the plan at the rate of 50% of the first 6% of earnings contributed. Employees participating in the 401(k) retirement savings plan are fully vested in the Company matching contributions, and investments are directed by participants. The Company made matching contributions of \$21.4 million, \$15.2 million, and \$13.2 million, in fiscal years 2018, 2017, and 2016, respectively. Deferred Compensation Arrangements

The Company has an unfunded, non-qualified deferred compensation plan whereby certain executives may defer a portion of their compensation. Participants earn a return on their deferred compensation based on their allocation of their account balance among various mutual funds. The Company controls the investment of these funds, and the participants remain general creditors of the Company. Participants are able to elect the payment of benefits on a specified date at least three years after the opening of a deferral sub-account or upon retirement. Distributions are made in the form of lump sum or annual installments over a period of up to 20 years as elected by the participant. If no alternate election has been made, a lump sum payment will be made upon termination of a participant's employment with the Company. As of June 24, 2018, and June 25, 2017, the liability of the Company to the plan participants was \$188.0 million and \$155.7 million, respectively, which was recorded in accrued expenses and other current liabilities on the Consolidated Balance Sheets. As of June 24, 2018, and June 25, 2017, the Company had investments in the aggregate amount of \$209.0 million and \$180.2 million, respectively, which correlate to the deferred compensation obligations, which were recorded in other assets on the Consolidated Balance Sheets. Post-Retirement Healthcare Plan

The Company maintains a post-retirement healthcare plan for certain executive and director retirees. Coverage continues through the duration of the lifetime of the retiree or the retiree's spouse, whichever is longer. The benefit obligation was \$37.2 million and \$39.9 million as of June 24, 2018, and June 25, 2017, respectively.

Note 15: Commitments and Contingencies

The Company has certain obligations to make future payments under various contracts; some of these are recorded on its balance sheet and some are not. Obligations that are recorded on the Company's balance sheet include the Company's capital lease obligations. Obligations that are not recorded on the Company's balance sheet include contractual relationships for operating leases, purchase obligations, and certain guarantees. The Company's commitments relating to capital leases and off-balance sheet agreements are included in the tables below. These amounts exclude \$280.4 million of liabilities related to uncertain tax benefits because the Company is unable to reasonably estimate the ultimate amount or time of settlement. See Note 6 - Income Taxes for further discussion.

## **Table of Contents**

## Capital Leases

Capital leases reflect building and office equipment leases. The Company's contractual cash obligations relating to its existing capital leases, including interest, as of June 24, 2018, were as follows:

Dormanto Dua ha Fiscal Vesa	Capital
Payments Due by Fiscal Year:	Leases
	(in thousands)
2019	\$ 3,948
2020	4,491
2021	4,854
2022	8,765
2023	4,351
Thereafter	37,707
Total	64,116
Interest on capital leases	16,272
Current portion of capital leases	1,498
Long-term portion of capital leases	\$ 46,346
O	

Operating Leases and Related Guarantees

The Company leases the majority of its administrative, R&D and manufacturing facilities, regional sales/service offices, and certain equipment under non-cancelable operating leases. Certain of the Company's facility leases for buildings located at its Fremont, California headquarters; Tualatin, Oregon campus; and certain other facility leases provide the Company with options to extend the leases for additional periods or to purchase the facilities. Certain of the Company's facility leases provide for periodic rent increases based on the general rate of inflation. The Company's rental expense for facilities occupied during fiscal years 2018, 2017, and 2016 was \$23.5 million, \$20.2 million, and \$16.3 million, respectively.

The Company has operating leases regarding certain improved properties in Fremont and Livermore, California (the "Operating Leases"). The Company is required to maintain cash collateral in an aggregate of approximately \$250.0 million in separate interest-bearing accounts as security for the Company's obligations. These amounts are recorded with other restricted cash and investments in the Company's Consolidated Balance Sheet as of June 24, 2018. During the term of the Operating Leases and when the terms of the Operating Leases expire, the property subject to those Operating Leases may be re-marketed. The Company has guaranteed to the lessor that each property will have a certain minimum residual value. The aggregate guarantee made by the Company under the Operating Leases is generally no more than \$220.4 million; however, under certain default circumstances, the guarantee with regard to an Operating Lease may be 100% of the lessor's aggregate investment in the applicable property, which in no case will exceed \$250.0 million, in the aggregate.

The Company's contractual cash obligations with respect to operating leases, excluding the residual value guarantees discussed above, as of June 24, 2018, were as follows:

Payments Due by Fiscal Year:	Operating
rayments Due by Fiscal Teal.	Leases
	(in thousands)
2019	\$ 22,117
2020	18,672
2021	13,963
2022	4,879
2023	3,677
Thereafter	11,035
Total	\$ 74,343

Continues on next page

## **Table of Contents**

#### Other Guarantees

The Company has issued certain indemnifications to its lessors for taxes and general liability under some of its agreements. The Company has entered into insurance contracts that are intended to limit its exposure to such indemnifications. As of June 24, 2018, the Company had not recorded any liability on its Consolidated Financial Statements in connection with these indemnifications, as it does not believe that it is probable that any amounts will be paid under these guarantees.

Generally, the Company indemnifies, under pre-determined conditions and limitations, its customers for infringement of third-party intellectual property rights by the Company's products or services. The Company seeks to limit its liability for such indemnity to an amount not to exceed the sales price of the products or services subject to its indemnification obligations. The Company does not believe that it is probable that any material amounts will be paid under these guarantees.

The Company provides guarantees and standby letters of credit to certain parties as required for certain transactions initiated during the ordinary course of business. As of June 24, 2018, the maximum potential amount of future payments that the Company could be required to make under these arrangements and letters of credit was \$21.6 million. The Company does not believe, based on historical experience and information currently available, that it is probable that any amounts will be required to be paid.

# **Purchase Obligations**

Purchase obligations consist of non-cancelable significant contractual obligations either on an annual basis or over multi-year periods. The contractual cash obligations and commitments table presented below contains the Company's minimum obligations at June 24, 2018, under these arrangements and others. For obligations with cancellation provisions, the amounts included in the following table were limited to the non-cancelable portion of the agreement terms or the minimum cancellation fee. Actual expenditures will vary based on the volume of transactions and length of contractual service provided.

The Company's commitments related to these agreements as of June 24, 2018, were as follows:

Payments Due by Fiscal Year	Purchase		
	Obligations		
	(in thousands)		
2019	\$ 353,295		
2020	6,281		
2021	6,036		
2022	3,287		
2023	3,165		
Thereafter	162		
Total	\$ 372,226		

Warranties

The Company provides standard warranties on its systems. The liability amount is based on actual historical warranty spending activity by type of system, customer, and geographic region, modified for any known differences such as the impact of system reliability improvements.

Continues on next page

## **Table of Contents**

Changes in the Company's product warranty reserves were as follows:

	Year Ende	d
	June 24,	June 25,
	2018	2017
	(in thousan	ids)
Balance at beginning of period	\$161,981	\$100,321
Warranties issued during the period	235,252	188,813
Settlements made during the period	(196,680)	(135,213)
Changes in liability for pre-existing warranties	(8,073)	8,060
Balance at end of period	\$192,480	\$161,981
I and Duran I'm		

Legal Proceedings

While the Company is not currently a party to any legal proceedings that it believes material, the Company is either a defendant or plaintiff in various actions that have arisen from time to time in the normal course of business, including intellectual property claims. The Company accrues for a liability when it is both probable that a liability has been incurred and the amount of the loss can be reasonably estimated. Significant judgment is required in both the determination of probability and the determination as to whether a loss is reasonably estimable. Based on current information, the Company does not believe that a material loss from known matters is probable and therefore has not recorded an accrual for litigation or other contingencies related to existing legal proceedings.

## Note 16: Stock Repurchase Program

In March 2018, the Board of Directors authorized the Company to repurchase up to an additional \$2.0 billion of Common Stock. The new authorization increases the share repurchase authorization granted in November 2017 to an aggregate of \$4.0 billion of Common Stock, and supplements the remaining balances from any prior authorizations. These repurchases can be conducted on the open market or as private purchases and may include the use of derivative contracts with large financial institutions, in all cases subject to compliance with applicable law. Repurchases are funded using the Company's cash and available credit facilities. This repurchase program has no termination date and may be suspended or discontinued at any time.

Repurchases under the repurchase program were as follows during the periods indicated:

	Total Number	Average	Amount Available
Period	of Shareost of	Price Paid	Under Repurchase
	RepurdRapedchase	per Share <sup>(1)</sup>	Program
	(in thousands, exce	ept per share	data)
Available balance as of June 25, 2017			\$ 282,141
Quarter ended September 24, 2017	1,779 \$157,938	\$ 158.40	\$ 124,203
Board authorization, \$2.0 billion increase, November 2017			\$ 2,124,203
Quarter ended December 24, 2017	3,709 \$1,089,744	\$ 196.28	\$ 1,034,459
Board authorization, \$2.0 billion increase, March 2018			\$ 3,034,459
Quarter ended March 25, 2018	1,019 \$—	\$ —	\$ 3,034,459
Quarter ended June 24, 2018	7,702 \$1,300,821	\$ 191.03	\$ 1,733,638

<sup>(1)</sup> Average price paid per share excludes effect of accelerated share repurchases; see additional disclosure below regarding our accelerated share repurchase activity during the fiscal year.

In addition to the shares repurchased under the Board-authorized repurchase program shown above, the Company acquired 577 thousand shares at a total cost of \$104.9 million during the 12 months ended June 24, 2018, which the Company withheld through net share settlements to cover minimum tax withholding obligations upon the vesting of restricted stock unit awards granted under the Company's equity compensation plan. The

Continues on next page

## **Table of Contents**

shares retained by the Company through these net share settlements are not a part of the Board-authorized repurchase program but instead are authorized under the Company's equity compensation plans.

Accelerated Share Repurchase Agreements Settled in the 2018 Fiscal Year

On May 9, 2018, the Company entered into two separate accelerated share repurchase agreements (collectively, the "May 2018 ASR") with two financial institutions to repurchase a total of \$1 billion of Common Stock. The Company took an initial delivery of approximately 3,505,000 shares, which represented 70% of the prepayment amount divided by the Company's closing stock price on May 9, 2018. The total number of shares received under the May 2018 ASR was based upon the average daily volume weighted average price of the Company's Common Stock during the repurchase period, less an agreed upon discount. Final settlement of these two transactions occurred on June 8, 2018 and June 11, 2018. Approximately 1,640,000 shares were received at final settlement which resulted in a weighted—average price of approximately \$194.35 for the transaction period.

On November 20, 2017, the Company entered into four separate accelerated share repurchase agreements (collectively, the "November 2017 ASR") with two financial institutions to repurchase a total of \$1 billion of Common Stock. The Company took an initial delivery of 3,254,300 shares, which represented 70% of the prepayment amount divided by the Company's closing stock price on November 20, 2017. The total number of shares received under the November 2017 ASR was based upon the average daily volume weighted average price of the Company's Common Stock during the repurchase period, less an agreed upon discount. Final settlement of two of the transactions occurred on February 1, 2018 and February 2, 2018. Approximately 1,019,000 shares were received at final settlement, which resulted in a weighted-average share price of approximately \$189.03 for the transaction period. Final settlement for the remaining transactions occurred on April 24, 2018 and May 23, 2018. Approximately 984,000 shares were received at final settlement, which resulted in a weighted-average share price of approximately \$191.55 for the transaction period.

On April 19, 2017, the Company entered into two separate accelerated share repurchase agreements (collectively, the "April 2017 ASR") with two financial institutions to repurchase a total of \$500 million of Common Stock. The Company took an initial delivery of approximately 2,570,000 shares, which represented 70% of the prepayment amount divided by the Company's closing stock price on April 19, 2017. The total number of shares received under the April 2017 ASR was based upon the average daily volume weighted average price of our Common Stock during the repurchase period, less an agreed upon discount. The April 2017 ASR settled on June 30, 2017. Approximately 780,000 shares were received at final settlement, which resulted in a weighted-average share price of approximately \$149.16 for the transaction period.

## **Table of Contents**

Note 17: Comprehensive Income (Loss)

The components of accumulated other comprehensive loss, net of tax at the end of the period, as well as the activity during the period, were as follows:

Accumulated

				Accumulate	ea		
	Accumulated	Accumula	ted	Unrealized		Accumulate	d
		Unrealized	ı	Holding		Unrealized	
	Foreign	Gain or		Gain or		Components	S Total
	Currency Translation	Loss on		Loss on		of Defined	Total
	Adjustment	Cash Flow	7	Available-F	For-	Benefit	
	Adjustillelit	Hedges		Sale		Plans	
				Investment	S		
	(in thousands	s)					
Balance as of June 25, 2017	\$(42,371)	\$ (811	)	\$ 1,106		\$ (19,624)	\$(61,700)
Other comprehensive income (loss) before reclassifications	5,703	(6,960	)	(45,382	)	129	(46,510 )
Losses (gains) reclassified from accumulated							
other comprehensive income (loss) to net	3,946 (2)	3,729	(1)	8,996	(2)		16,671
income							
Securities impairment				34,090			34,090
Net current-period other comprehensive income (loss)	9,649	(3,231	)	(2,296	)	129	4,251
Balance as of June 24, 2018	\$(32,722)	\$ (4,042	)	\$ (1,190	)	\$ (19,495)	\$(57,449)

Amount of after-tax gain reclassified from accumulated other comprehensive income into net income located in (1) revenue: \$10,030 loss; cost of goods sold: \$4,393 gain; selling, general, and administrative expenses: \$1,994 gain; and other income and expense: \$86 loss.

Tax related to other comprehensive income, and the components thereto, for the years ended June 24, 2018, June 25, 2017 and June 26, 2016 was not material.

Note 18: Segment, Geographic Information, and Major Customers

The Company operates in one reportable business segment: manufacturing and servicing of wafer processing semiconductor manufacturing equipment. The Company's material operating segments qualify for aggregation due to their customer base and similarities in economic characteristics, nature of products and services, and processes for procurement, manufacturing, and distribution.

The Company operates in seven geographic regions: United States, China, Europe, Japan, Korea, Southeast Asia, and Taiwan. For geographical reporting, revenue is attributed to the geographic location in which the customers' facilities are located, while long-lived assets are attributed to the geographic locations in which the assets are located.

Continues on next page

<sup>(2)</sup> Amount of after-tax gain reclassified from accumulated other comprehensive income into net income located in other expense, net.

## **Table of Contents**

Revenues and long-lived assets by geographic region were as follows:

	Ye	ar Ended	, , , , , , , , , , , , , , , , , , ,	
	Jui	ne 24,	June 25,	June 26,
	20	18	2017	2016
Revenue:	(in	thousands	)	
Korea	\$3	,832,798	\$2,480,32	9 \$1,057,331
Japan	1,8	882,799	1,041,969	983,821
China	1,7	784,436	1,023,195	1,039,951
Taiwan	1,3	397,978	2,095,669	1,485,037
United States	82	0,438	629,937	495,123
Southeast Asia	.78	1,360	401,877	605,236
Europe	57	7,189	340,644	219,394
Total revenue	\$1	1,076,998	\$8,013,62	0 \$5,885,893
		June 24,	June 25,	June 26,
		2018	2017	2016
Long-lived ass	ets:	(in thousa	nds)	
United States		\$784,469	\$575,264	\$529,316
Europe		73,336	77,211	81,377
Korea		24,312	19,982	17,281
Taiwan		7,922	7,970	8,647
China		5,466	1,906	1,339
Southeast Asia		3,715	2,179	668
Japan		3,327	1,083	980

In fiscal year 2018, five customers accounted for approximately 25%, 14%, 14%, 13%, and 12% of total revenues, respectively. In fiscal year 2017, five customers accounted for approximately 23%, 16%, 12%, 11%, and 10% of total revenues, respectively. In fiscal year 2016, four customers accounted for approximately 17%, 16%, 12%, and 10% of total revenues, respectively. No other customers accounted for more than 10% of total revenues.

Note 19: Business Combinations

Coventor Acquisition

On August 28, 2017, the Company completed the acquisition of the outstanding shares of Coventor, Inc., a privately-held company that is a provider of simulation and modeling solutions for semiconductor process technology, MEMS, and the Internet of Things, for a total purchase consideration of \$137.6 million.

The following table represents the purchase price allocation and summarizes the aggregate estimated fair value of the net assets acquired on the closing date of the acquisition:

Purchase
Price
Allocation
(in
thousands)

Intangible assets
Assets acquired (including cash of \$8.7 million)
Goodwill
Liabilities assumed
Fair value of net assets acquired

\$137,611

\$902,547 \$685,595 \$639,608

Continues on next page

## **Table of Contents**

The Company elected to close the measurement period as of June 24, 2018. The operating results of the acquired entity, from the date of acquisition, have been included in the Company's Consolidated Financial Statements for fiscal year ended June 24, 2018. Goodwill represents the excess of the purchase price over the net tangible and identifiable intangible assets acquired. None of the goodwill recognized is deductible for income tax purposes.

The identified intangible assets assumed in the acquisition of Coventor were recognized as follows based upon their fair values as of August 28, 2017:

Fair Value	Weighted-Average Estimated Useful Life
(In	(In vicens)
thousands)	(In years)
\$ 26,200	6.0
15,000	6.0
7,300	6.4
\$ 48,500	6.0
1	(In thousands) \$ 26,200 15,000 7,300

Acquired existing technology represents the fair value of products that have reached technological feasibility and are a part of Coventor's product offerings and customer relationships represent the fair values of the underlying relationships and agreements with Coventor's customers.

During the years ended June 24, 2018, and June 25, 2017, the Company expensed as incurred acquisition-related costs of \$2.9 million and \$9.8 million, respectively, within selling, general, and administrative expense in the Consolidated Statement of Operations.

## **Table of Contents**

Report of Independent Registered Public Accounting Firm To the Stockholders and the Board of Directors of Lam Research Corporation Opinion on the Financial Statements

We have audited the accompanying consolidated balance sheets of Lam Research Corporation (the Company) as of June 24, 2018 and June 25, 2017, the related consolidated statements of operations, comprehensive income, cash flows, and stockholders' equity for each of the three years in the period ended June 24, 2018, and the related notes (collectively referred to as the "consolidated financial statements"). In our opinion, the consolidated financial statements present fairly, in all material respects, the financial position of the Company at June 24, 2018 and June 25, 2017, and the results of its operations and its cash flows for each of the three years in the period ended June 24, 2018, in conformity with US generally accepted accounting principles.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the Company's internal control over financial reporting as of June 24, 2018, based on criteria established in Internal Control-Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission (2013 framework) and our report dated August 14, 2018 expressed an unqualified opinion thereon.

## **Basis for Opinion**

These financial statements are the responsibility of the Company's management. Our responsibility is to express an opinion on the Company's financial statements based on our audits. We are a public accounting firm registered with the PCAOB and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB. We conducted our audits in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. Our audits included performing procedures to assess the risks of material misstatement of the financial statements, whether due to error or fraud, and performing procedures that respond to those risks. Such procedures included examining, on a test basis, evidence regarding the amounts and disclosures in the financial statements. Our audits also included evaluating the accounting principles used and significant estimates made by management, as well as evaluating the overall presentation of the financial statements. We believe that our audits provide a reasonable basis for our opinion.

/s/ Ernst & Young LLP We have served as the Company's auditor since 1981. San Jose, California August 14, 2018

## **Table of Contents**

Report of Independent Registered Public Accounting Firm

To the Stockholders and the Board of Directors of Lam Research Corporation

Opinion on Internal Control over Financial Reporting

We have audited Lam Research Corporation's internal control over financial reporting as of June 24, 2018, based on criteria established in Internal Control-Integrated Framework issued by the Committee of Sponsoring Organizations of the Treadway Commission (2013 framework) (the COSO criteria). In our opinion, Lam Research Corporation (the Company) maintained, in all material respects, effective internal control over financial reporting as of June 24, 2018, based on the COSO criteria.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (PCAOB), the consolidated balance sheets of the Company as of June 24, 2018 and June 25, 2017, the related consolidated statements of operations, comprehensive income, cash flows, and stockholders' equity for each of the three years in the period ended June 24, 2018, and the related notes and our report dated August 14, 2018 expressed an unqualified opinion thereon.

**Basis for Opinion** 

The Company's management is responsible for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting included in the accompanying Management's Report on Internal Control over Financial Reporting. Our responsibility is to express an opinion on the Company's internal control over financial reporting based on our audit. We are a public accounting firm registered with the PCAOB and are required to be independent with respect to the Company in accordance with the U.S. federal securities laws and the applicable rules and regulations of the Securities and Exchange Commission and the PCAOB. We conducted our audit in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether effective internal control over financial reporting was maintained in all material respects.

Our audit included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, testing and evaluating the design and operating effectiveness of internal control based on the assessed risk, and performing such other procedures as we considered necessary in the circumstances. We believe that our audit provides a reasonable basis for our opinion.

Definition and Limitations of Internal Control Over Financial Reporting

A company's internal control over financial reporting is a process designed to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles. A company's internal control over financial reporting includes those policies and procedures that (1) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (2) provide reasonable assurance that transactions are recorded as necessary to permit preparation of financial statements in accordance with generally accepted accounting principles, and that receipts and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (3) provide reasonable assurance regarding prevention or timely detection of unauthorized acquisition, use, or disposition of the company's assets that could have a material effect on the financial statements.

Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Also, projections of any evaluation of effectiveness to future periods are subject to the risk that controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.

/s/ Ernst & Young LLP San Jose, California August 14, 2018

#### **Table of Contents**

Item 9. Changes in and Disagreements with Accountants on Accounting and Financial Disclosure None.

Item 9A. Controls and Procedures

Design of Disclosure Controls and Procedures and Internal Control over Financial Reporting

We maintain disclosure controls and procedures and internal control over final reporting that are designed to comply with Rule 13a-15 of the Exchange Act. In designing and evaluating the controls and procedures associated with each, management recognizes that any controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving the desired control objectives and that the effectiveness of controls cannot be absolute because the cost to design and implement a control to identify errors or mitigate the risk of errors occurring should not outweigh the potential loss caused by the errors that would likely be detected by the control. Moreover, we believe that a control system cannot be guaranteed to be 100% effective all of the time. Accordingly, a control system, no matter how well designed and operated, can provide only reasonable, not absolute, assurance that the control system's objectives will be met.

Disclosure Controls and Procedures

As required by Rule 13a-15(b) under the Securities Exchange Act of 1934, as amended (the "Exchange Act"), as of June 24, 2018, we carried out an evaluation, under the supervision and with the participation of our management, including our Chief Executive Officer and our Chief Financial Officer, of the effectiveness of the design and operation of our disclosure controls and procedures as defined in Rule 13a-15(e). Based upon that evaluation, our Chief Executive Officer and our Chief Financial Officer each concluded that our disclosure controls and procedures are effective, as of June 24, 2018, at the reasonable assurance level.

We intend to review and evaluate the design and effectiveness of our disclosure controls and procedures on an ongoing basis and to correct any material deficiencies that we may discover. Our goal is to ensure that our senior management has timely access to material information that could affect our business.

Changes in Internal Control over Financial Reporting

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

Management's Report on Internal Control over Financial Reporting

Management is responsible for establishing and maintaining adequate "internal control over financial reporting", as that term is defined in Exchange Act Rules 13a-15(f) and 15d-15(f). Management conducted an evaluation of the effectiveness of internal control over financial reporting based on the framework in Internal Controls — Integrated Framework used by the Committee of Sponsoring Organizations of the Treadway Commission (2013 Framework). Based on that evaluation, management has concluded that the Company's internal control over financial reporting was effective as of June 24, 2018, at providing reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with GAAP.

Ernst & Young LLP, an independent registered public accounting firm, has audited the Company's internal control over financial reporting, as stated in their report, which is included in Part II, Item 8 of this 2018 Form 10-K. Effectiveness of Controls

While we believe the present design of our disclosure controls and procedures and internal control over financial reporting is effective at the reasonable assurance level, future events affecting our business may cause us to modify our disclosure controls and procedures or internal controls over financial reporting.

Item 9B. Other Information

None.

#### **Table of Contents**

#### **PART III**

We have omitted from this 2018 Form 10-K certain information required by Part III because we, as the Registrant, will file a definitive proxy statement with the SEC within 120 days after the end of our fiscal year, pursuant to Regulation 14A, as promulgated by the SEC, for our Annual Meeting of Stockholders expected to be held on or about November 6, 2018, (the "Proxy Statement"), and certain information included in the Proxy Statement is incorporated into this report by reference.

Item 10. Directors, Executive Officers and Corporate Governance

For information regarding our executive officers, see Part I, Item 1 of this 2018 Form 10-K under the caption "Executive Officers of the Company," which information is incorporated into Part III by reference.

The information concerning our directors required by this Item is incorporated by reference to our Proxy Statement under the heading "Voting Proposals — Proposal No. 1: Election of Directors — 2018 Nominees for Director."

The information concerning our audit committee and audit committee financial experts required by this Item is incorporated by reference to our Proxy Statement under the heading "Governance Matters — Corporate Governance — Board Committees" and "Governance Matters — Corporate Governance — Board Committees — Audit Committee."

The information concerning compliance by our officers, directors and 10% shareholders with Section 16 of the Exchange Act required by this Item is incorporated by reference to our Proxy Statement under the heading "Stock Ownership – Section 16(a) Beneficial Ownership Reporting Compliance."

The Company has adopted a Corporate Code of Ethics that applies to all employees, officers, and directors of the Company. Our Code of Ethics is publicly available on the Investor Relations page of our website at http://investor.lamresearch.com. To the extent required by law, any amendments to, or waivers from, any provision of the Code of Ethics will promptly be disclosed to the public. To the extent permitted by applicable legal requirements, we intend to make any required public disclosure by posting the relevant material on our website in accordance with SEC rules.

Item 11. Executive Compensation

The information required by this Item is incorporated by reference to our Proxy Statement under the heading "Compensation Matters — Executive Compensation and Other Information," "Compensation Matters — CEO Pay Ratio," and "Governance Matters — Director Compensation."

Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters
The information required by this Item is incorporated by reference to our Proxy Statement under the headings "Stock
Ownership — Security Ownership of Certain Beneficial Owners and Management" and "Compensation Matters — Securities
Authorized for Issuance Under Equity Compensation Plans."

Item 13. Certain Relationships and Related Transactions, and Director Independence

The information required by this Item is incorporated by reference to our Proxy Statement under the headings "Audit Matters — Certain Relationships and Related Transactions" and "Governance Matters — Corporate Governance — Director Independence Policies."

Item 14. Principal Accounting Fees and Services

The information required by this Item is incorporated by reference to our Proxy Statement under the heading "Audit Matters — Relationship with Independent Registered Public Accounting Firm — Fees Billed by Ernst & Young LLP" and "Audit Matters — Relationship with Independent Registered Public Accounting Firm — Policy on Audit Committee Pre-Approval of Audit and Non-Audit Services."

Continues on next page

Lam Research Corporation 2018 10-K 100

## **Table of Contents**

### **PART IV**

Item 15. Exhibits, Financial Statement Schedules
(a) The following documents are filed as part of this Annual Report on Form 10-K.

Page

### 1. Index to Financial Statements

### 2. Index to Financial Statement Schedules

Schedules have been omitted since they are not applicable, not required, not material, or the information is included elsewhere herein.

### **Table of Contents**

LAM RESEARCH CORPORATION ANNUAL REPORT ON FORM 10-K FOR THE FISCAL YEAR ENDED JUNE 24, 2018 EXHIBIT INDEX

Drahihit	Description	_
Exhibit	Description	1

Agreement and Plan of Merger and Reorganization, dated as of October 20, 2015, by and among Lam

2.1 Research Corporation, Topeka Merger Sub 1, Inc., Topeka Merger Sub 2, Inc., and KLA-Tencor Corporation which is incorporated by reference to Exhibit 2.1 to the Registrant's Current Report on Form 8-K filed on October 21, 2015 (SEC File No. 000-12933).

Termination Agreement dated as of October 5, 2016 by and between Lam Research Corporation and

- 2.2 <u>KLA-Tencor Corporation which is incorporated by reference to Exhibit 2.1 to the Registrant's Current Report on Form 8-K filed on October 6, 2016 (SEC File No. 000-12933).</u>
   Restated Certificate of Incorporation of the Registrant, (including Certificate and Designation, Preferences
- 3.1 and Rights of Series A Junior Participating Preferred Stock), dated November 22, 2016 which is incorporated by reference to Exhibit 3.1 to the Registrant's Quarterly Report on Form 10-Q filed on January 30, 2017 (SEC File No. 000-12933).

Bylaws of the Registrant, as amended and restated, dated February 8, 2017 which is incorporated by

3.2 <u>reference to Exhibit 3.1 to the Registrant's Current Report on Form 8-K filed on February 14, 2017 (SEC File No. 000-12933).</u>

Indenture between Novellus Systems, Inc. as Issuer and The Bank of New York Mellon Trust Company,

4.1 N.A. as Trustee, dated as of May 10, 2011, including the form of 2.625% Senior Convertible Notes due 2041 which is incorporated by reference to Exhibit 4.1 to Novellus' Current Report on Form 8-K filed on May 10, 2011 (SEC File No. 000-17157).

<u>Supplemental Indenture among the Registrant, as Guarantor, Novellus Systems, Inc. as Issuer and The Bank</u>

4.2 of New York Mellon Trust Company, N.A. as Trustee, dated as of June 4, 2012 which is incorporated by reference to Exhibit 4.2 to the Registrant's Current Report on Form 8-K filed on June 4, 2012 (SEC File No. 000-12933).

Indenture (including Form of Notes), dated as of February 13, 2015, between Registrant and The Bank of

- 4.3 New York Mellon Trust Company, N.A. which is incorporated by reference to Exhibit 4.1 to the Registrant's Registration Statement on Form S-3 filed on February 13, 2015 (SEC File No. 333-202110).

  First Supplemental Indenture, dated as of March 12, 2015, by and between Lam Research Corporation and
- 4.4 The Bank of New York Mellon Trust Company, N.A., as trustee which is incorporated by reference to Exhibit 4.2 to the Registrant's Current Report on Form 8-K filed on March 12, 2015 (SEC File No. 000-12933).

Second Supplemental Indenture, dated as of June 7, 2016, by and between Lam Research Corporation and

- 4.5 The Bank of New York Mellon Trust Company, N.A., as trustee which is incorporated by reference to Exhibit 4.2 to the Registrant's Current Report on Form 8-K filed on June 7, 2016 (SEC File No. 000-12933).
- Form of Indemnification Agreement which is incorporated by reference to the Registrant's Quarterly Report on Form 10-Q for the quarter ended April 3, 1988 (SEC File No. 000-12933).

  Form of Restricted Stock Unit Award Agreement—Outside Directors (U.S. Agreement) Lam Research
- 10.2\* Corporation 2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.107 to the Registrant's Quarterly Report on Form 10-Q filed on April 30, 2007 (SEC File No. 000-12933).

  Form of Restricted Stock Unit Award Agreement—Outside Directors (non-U.S. Agreement) Lam Research
- 10.3\* Corporation 2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.108 to the Registrant's Quarterly Report on Form 10-Q filed on April 30, 2007 (SEC File No. 000-12933).
- 10.4\* Form of Indemnification Agreement which is incorporated by reference to Exhibit 10.148 to the Registrant's Current Report on Form 8-K filed on November 13, 2008 (SEC File No. 000-12933).

10.5\*

Form of Indemnification Agreement which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on June 4, 2012 (SEC File No. 000-12933).

#### Table of Contents

File No. 000-12933).

Table of	<u>l Contents</u>
Exhibit	Description
	Form of Novellus Directors and Officers Indemnification Agreement which is incorporated by reference to
10.6*	Exhibit 10.1 to Novellus' Current Report on Form 10-Q filed on August 13, 2002 (SEC File No. 000-17157).
	Lease Guaranty between Novellus and Phoenix Industrial Investment Partners, L.P. dated January 21, 2003
10.7	which is incorporated by reference to Exhibit 10.39 to Novellus' Annual Report on Form 10-K filed on
10.7	March 5, 2003 (SEC File No. 000-17157).
	Binding Memorandum of Understanding between Novellus, and Applied Materials, Inc., effective as of
10.8	September 3, 2004 which is incorporated by reference to Exhibit 99.1 to Novellus' Current Report on Form
	8-K filed on September 24, 2004 (SEC File No. 000-17157). Portions of this exhibit have been omitted
	pursuant to a request for confidential treatment.
	Novellus Amended Executive Voluntary Deferred Compensation Plan, as amended which is incorporated by
10.9*	reference to Exhibit 10.28 to Novellus' Quarterly Report on Form 10-Q filed on November 5, 2008 (SEC
10.5	File No. 000-17157).
	Novellus Accelerated Stock Vesting Retirement Plan Summary which is incorporated by reference to Exhibit
10.10*	10.30 to Novellus' Quarterly Report on Form 10-Q filed on November 2, 2010 (SEC File No. 000-17157).
	Novellus Systems, Inc. 2011 Stock Incentive Plan, as amended July 18, 2012 which is incorporated by
10.11*	reference to Exhibit 10.172 to the Registrant's Annual Report on Form 10-K filed on August 22, 2012 (SEC
10.11	File No. 000-12933).
	Form of Restricted Stock Unit Award Agreement (U.S. Participants) — Lam Research Corporation 2007 Stock
10.12*	Incentive Plan which is incorporated by reference to Exhibit 10.1 to the Registrant's Quarterly Report on
	Form 10-Q filed on February 6, 2014 (SEC File No. 000-12933).
	Form of Restricted Stock Unit Award Agreement (International Participants) — Lam Research Corporation
10.13*	2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.2 to the Registrant's Quarterly
	Report on Form 10-Q filed on February 6, 2014 (SEC File No. 000-12933).
	Form of Nonstatutory Stock Option Award Agreement (U.S. Participants) — Lam Research Corporation 2007
10.14*	Stock Incentive Plan which is incorporated by reference to Exhibit 10.3 to the Registrant's Quarterly Report
	on Form 10-Q filed on February 6, 2014 (SEC File No. 000-12933).
	Form of Nonstatutory Stock Option Award Agreement (International Participants) — Lam Research
10.15*	Corporation 2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.4 to the Registrant's
	Quarterly Report on Form 10-Q filed on February 6, 2014 (SEC File No. 000-12933).
	Form of Restricted Stock Unit Award Agreement (U.S. Participants) — Lam Research Corporation (Novellus
10.16*	Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by reference to Exhibit 10.7
	to the Registrant's Quarterly Report on Form 10-Q filed on February 6, 2014 (SEC File No. 000-12933).
	Form of Restricted Stock Unit Award Agreement (International Participants) — Lam Research Corporation
10.17*	(Novellus Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by reference to
10.17	Exhibit 10.8 to the Registrant's Quarterly Report on Form 10-Q filed on February 6, 2014 (SEC
	File No. 000-12933).
	Form of Nonstatutory Stock Option Award Agreement (U.S. Participants) — Lam Research Corporation
10.18*	(Novellus Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by reference to
	Exhibit 10.9 to the Registrant's Quarterly Report on Form 10-Q filed on February 6, 2014 (SEC
	File No. 000-12933).
	Form of Nonstatutory Stock Option Award Agreement (International Participants) — Lam Research
10.19*	Corporation (Novellus Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by
	reference to Exhibit 10.11 to the Registrant's Quarterly Report on Form 10-Q filed on February 6, 2014 (SEC

Form of Market-Based Performance Restricted Stock Unit Award Agreement (U.S. Participants) — Lam

10.20\* Research Corporation 2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on February 18, 2014 (SEC File No. 000-12933).

#### **Table of Contents**

- Form of Market-Based Performance Restricted Stock Unit Award Agreement (International Participants)—Lam
- 10.21\* Research Corporation 2007 Stock Incentive Plan which is incorporated by reference to Exhibit 10.2 to the Registrant's Current Report on Form 8-K filed on February 18, 2014 (SEC File No. 000-12933). Form of Market-Based Performance Restricted Stock Unit Award Agreement (U.S. Participants) Lam
- 10.22\* Research Corporation (Novellus Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by reference to Exhibit 10.3 to the Registrant's Current Report on Form 8-K filed on February 18, 2014 (SEC File No. 000-12933).
  - Form of Market-Based Performance Restricted Stock Unit Award Agreement (International Participants) —
- 10.23\* Lam Research Corporation (Novellus Systems, Inc.) 2011 Stock Incentive Plan (As Amended) which is incorporated by reference to Exhibit 10.4 to the Registrant's Current Report on Form 8-K filed on February 18, 2014 (SEC File No. 000-12933).

  Employment Agreement with Martin B. Anstice, dated January 2, 2018 which is incorporated by reference to
- 10.24\* Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on January 8, 2018 (SEC File No. 000-12933).
  - Employment Agreement with Timothy M. Archer, dated January 2, 2018 which is incorporated by reference
- 10.25\* to Exhibit 10.2 to the Registrant's Current Report on Form 8-K filed on January 8, 2018 (SEC File No. 000-12933).

  Employment Agreement with Douglas R. Bettinger, dated January 2, 2018 which is incorporated by
- 10.26\* reference to Exhibit 10.3 to the Registrant's Current Report on Form 8-K filed on January 8, 2018 (SEC
- File No. 000-12933).
  Employment Agreement with Richard A. Gottscho, dated January 2, 2018 which is incorporated by reference
- 10.27\* to Exhibit 10.4 to the Registrant's Current Report on Form 8-K filed on January 8, 2018 (SEC File No. 000-12933).
- 10.28\* Form of Change in Control Agreement which is incorporated by reference to Exhibit 10.5 to the Registrant's Current Report on Form 8-K filed on January 8, 2018 (SEC File No. 000-12933).

  Chairman's Agreement with Stephen G. Newberry, dated December 14, 2015 which is incorporated by
- 10.29\* reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q filed on February 3, 2016 (SEC File No. 000-12933).
- Form of Confidentiality Agreement which is incorporated by reference to Exhibit 10.7 to the Registrant's Quarterly Report on Form 10-Q filed on February 3, 2015 (SEC File No. 000-12933).

  Commitment Letter, dated October 20, 2015, by and among Lam Research
- 10.31 Corporation, Goldman Sachs Bank USA and Goldman Sachs Lending Partners LLC which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on October 21, 2015 (SEC File No. 000-12933).
- Form of Restricted Stock Unit Award Agreement (U.S. Participants) 2015 Stock Incentive Plan which is
- 10.32\* incorporated by reference to Exhibit 10.244 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).
   Form of Restricted Stock Unit Award Agreement (International Participants) 2015 Stock Incentive Plan
- 10.33\* which is incorporated by reference to Exhibit 10.245 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).
- Form of Restricted Stock Unit Award Agreement (Outside Directors) 2015 Stock Incentive Plan which is
- 10.34\* incorporated by reference to Exhibit 10.246 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).
  - Form of Option Award Agreement (U.S. Participants) 2015 Stock Incentive Plan which is incorporated by
- 10.35\* reference to Exhibit 10.247 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).
- 10.36\* Form of Option Award Agreement (International Participants) 2015 Stock Incentive Plan which is incorporated by reference to Exhibit 10.248 to the Registrant's Current Report on Form 8-K filed on

November 5, 2015 (SEC File No. 000-12933).

Form of Market-Based Performance Restricted Stock Unit Award Agreement (U.S. Participants) - 2015

10.37\* Stock Incentive Plan which is incorporated by reference to Exhibit 10.249 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).

#### **Table of Contents**

- Form of Market-Based Performance Restricted Stock Unit Award Agreement (International Participants) -
- 10.38\* 2015 Stock Incentive Plan which is incorporated by reference to Exhibit 10.250 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).

  Amendment and Restatement Agreement, dated November 10, 2015 among Lam Research Corporation,
- JPMorgan Chase Bank, N.A., as administrative agent, and the other agents and lenders listed therein, and all exhibits and schedules attached thereto which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on November 12, 2015 (SEC File No. 000-12933).

  Joinder Agreement, dated as of November 10, 2015, among Lam Research Corporation and the other agents
- and lenders listed therein, and the schedules attached thereto which is incorporated by reference to Exhibit 10.3 to the Registrant's Current Report on Form 8-K filed on November 12, 2015 (SEC File No. 000-12933). Amended and Restated Term Loan Agreement, dated May 13, 2016, among Lam Research Corporation, the
- lenders party thereto and JPMorgan Chase Bank, N.A., as administrative agent which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on May 13, 2016 (SEC File No. 000-12933).

  Amendment No. 1 to the Amended and Restated Credit Agreement, dated April 26, 2016 among Lam

Research Corporation, JPMorgan Chase Bank, N.A., as administrative agent, and the other agents and

- 10.42 lenders listed therein, and all exhibits and schedules attached thereto which is incorporated by reference to Exhibit 10.254 to the Registrant's Annual Report on Form 10-K filed on August 17, 2016 (SEC File No. 000-12933).

  Form of Market-Based Performance Restricted Stock Unit Award Agreement (U.S. Participants) 2015
- 10.43\* Stock Incentive Plan which is incorporated by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q filed on October 25, 2016 (SEC File No. 000-12933).

  Form of Market-Based Performance Restricted Stock Unit Award Agreement (International Participants) -
- 10.44\* 2015 Stock Incentive Plan which is incorporated by reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q filed on October 25, 2016 (SEC File No. 000-12933).
- 10.45\* Form of Indemnification Agreement which is incorporated by reference to Exhibit 10.1 to the Registrant's Quarterly Report on Form 10-Q filed on April 24, 2017 (SEC File No. 000-12933).

  Chairman's Agreement with Stephen G. Newberry, dated December 14, 2016 which is incorporated by
- 10.46\* reference to Exhibit 10.2 to the Registrant's Quarterly Report on Form 10-Q filed on April 24, 2017 (SEC File No. 000-12933).

Amendment No. 2 to Amended and Restated Credit Agreement dated October 13, 2017, among Lam Research Corporation, as borrower, the lenders party thereto and JPMorgan Chase Bank, N.A., as

- 10.47 Research Corporation, as borrower, the fenders party thereto and 37 Worgan Chase Bank, N.A., as administrative agent which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on October 17, 2017 (SEC File No. 000-12933).

  Form of Commercial Paper Dealer Agreement 4(a)(2) Program between Lam Research Corporation, as
- 10.48 <u>issuer, and the dealer which is incorporated by reference to Exhibit 10.1 to the Registrant's Current Report on Form 8-K filed on November 14, 2017 (SEC File No. 000-12933).</u>
- 10.49\* Amendment to Employment Agreement with Timothy M. Archer, dated March 16, 2018

  Lam Research Corporation 2007 Stock Incentive Plan, as amended, which is incorporated by reference to
- 10.50\* Exhibit 4.15 to the Registrant's Annual Report on Form 10-K filed on August 27, 2013 (SEC File No. 000-12933).

  Low Research Comparation Floative Deformed Comparation Plan which is incomparated by reference
- Lam Research Corporation Elective Deferred Compensation Plan which is incorporated by reference to 10.51\* Exhibit 4.16 to the Registrant's Annual Report on Form 10-K filed on August 19, 2011 (SEC File
- No. 000-12933)
  Lam Research Corporation Elective Deferred Compensation Plan II which is incorporated by reference to
- 10.52\* Exhibit 4.17 to the Registrant's Annual Report on Form 10-K filed on August 19, 2011 (SEC File No. 000-12933)

Lam Research Corporation 1999 Employee Stock Purchase Plan, as amended which is incorporated by reference to Exhibit 4.20 to the Registrant's Quarterly Report on Form 10-Q filed on January 31, 2013 (SEC File No. 000-12933).

## Table of Contents

Exhibit	Description	
10.54*	2004 Executive Incentive Plan, as Amended and Restated which is incorporated by reference to Exhibit	
	4.23 to the Registrant's Current Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).	
10.55*	2015 Stock Incentive Plan which is incorporated by reference to Exhibit 4.24 to the Registrant's Current	
	Report on Form 8-K filed on November 5, 2015 (SEC File No. 000-12933).	
20	Notice of Adjustment of Conversion Rate pursuant to the indenture dated May 10, 2011, by and between	
	Novellus Systems Incorporated and The Bank of New York Mellon Trust company, N.A. as Trustee with	
	respect to the 2.625% Senior Convertible Notes Due 2041 which is incorporated by reference to Exhibit	
	99.1 to the Registrant's Current Report on Form 8-K filed on June 12, 2018 (SEC File No. 000-12933).	
21	Subsidiaries of the Registrant.	
23	Consent of Independent Registered Public Accounting Firm.	
24	Power of Attorney (See Signature page)	
31.1	Rule 13a — 14(a) / 15d — 14(a) Certification (Principal Executive Officer)	
31.2	Rule 13a — 14(a) / 15d — 14(a) Certification (Principal Financial Officer)	
32.1	Section 1350 Certification — (Principal Executive Officer)	
32.2	Section 1350 Certification — (Principal Financial Officer)	
101.INS	XBRL Instance Document	
101.SCH	XBRL Taxonomy Extension Schema Document	
101.CAL	XBRL Taxonomy Extension Calculation Linkbase Document	
101.DEF	XBRL Taxonomy Extension Definition Linkbase Document	
101.LAB	XBRL Taxonomy Extension Label Linkbase Document	
101.PRE	XBRL Taxonomy Extension Presentation Linkbase Document	

<sup>\*</sup>Indicates management contract or compensatory plan or arrangement.

## **Table of Contents**

### **SIGNATURES**

Pursuant to the requirements of Section 13 or 15(d) of the Securities Exchange Act of 1934, as amended, the Registrant has duly caused this Report to be signed on its behalf by the undersigned, thereunto duly authorized.

Date: August 14, 2018 LAM RESEARCH CORPORATION

(Registrant)

/s/ Martin B. Anstice

By: Martin B. Anstice

Chief Executive Officer

Continues on next page

Lam Research Corporation 2018 10-K 107

### **Table of Contents**

### POWER OF ATTORNEY AND SIGNATURES

By signing this Annual Report on Form 10-K below, I hereby appoint each of Martin B. Anstice and Douglas R. Bettinger, jointly and severally, as my attorney-in-fact to sign all amendments to this Form 10-K on my behalf and to file this Form 10-K (including all exhibits and other related documents) with the Securities and Exchange Commission. I authorize each of my attorneys-in-fact to (1) appoint a substitute attorney-in-fact for himself and (2) perform any actions that he believes are necessary or appropriate to carry out the intention and purpose of this Power of Attorney. I ratify and confirm all lawful actions taken directly or indirectly by my attorneys-in-fact and by any properly appointed substitute attorneys-in-fact.

Pursuant to the requirements of the Securities Exchange Act of 1934, as amended, this Report has been signed below

Pursuant to the requirements of the Securities Exchange Act of 1934, as amended, this Report has been signed below by the following persons on behalf of the Registrant and in the capacities and on the dates indicated.				
Signatures Principal Executive Officer	Title	Date		
/s/ Martin B. Anstice  Martin B. Anstice	Chief Executive Officer and Director	August 14, 2018		
Principal Financial Officer and Principal Accounting Officer				
/s/ Douglas R. Bettinger Douglas R. Bettinger	Executive Vice President, Chief Financial Officer, and Chief Accounting Officer	August 14, 2018		
Other Directors				
/s/ Stephen G. Newberry	Chairman	August 14, 2018		
Stephen G. Newberry				
/s/ Eric K. Brandt Eric K. Brandt	Director	August 14, 2018		
/s/ Michael R. Cannon Michael R. Cannon	Director	August 14, 2018		
/a/ Youssef A. El-Mansy Youssef A. El-Mansy	Director	August 14, 2018		
/s/ Christine A. Heckart Christine A. Heckart	Director	August 14, 2018		
/s/ Catherine P. Lego Catherine P. Lego	Director	August 14, 2018		

/s/ Abhi Talwalkar Director August 14, 2018

Abhijit Y. Talwalkar

/s/ Lih Shyng Tsai Director August 14, 2018

Lih Shyng (Rick L.) Tsai

Continues on next page

Lam Research Corporation 2018 10-K 108