

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

Form 10-K

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

For the Fiscal Year Ended December 31, 2017  
Commission File Number 000-29472

**Amkor Technology, Inc.**

(Exact name of registrant as specified in its charter)

Delaware  
(State of incorporation)

23-1722724  
(I.R.S. Employer Identification Number)

2045 East Innovation Circle  
Tempe, AZ 85284  
(480) 821-5000

(Address of principal executive offices and zip code)

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

Title of Each Class	Name of Each Exchange on Which Registered
Common Stock, \$0.001 par value	The NASDAQ Global Select Market

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

None

Indicate by check mark if the registrant is a well-known seasoned issuer, as defined in Rule 405 of the Securities Act. Yes  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

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, as amended, during the preceding 12 months (or for such shorter period that the registrant was required to file such reports), and (2) has been subject to such filing requirements for the past 90 days. Yes  No

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

Indicate by check mark if disclosure of delinquent filers pursuant to Item 405 of Regulation S-K 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.

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

Large accelerated filer  Accelerated filer  Non-accelerated filer  Smaller reporting company  Emerging growth company

(Do not check if a smaller reporting company)

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

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

The aggregate market value of the voting and non-voting common equity held by non-affiliates of the registrant as of June 30, 2017, based upon the closing price of the common stock as reported by the NASDAQ Global Select Market on that date, was approximately \$988.4 million.

The number of shares outstanding of each of the issuer's classes of common equity, as of February 16, 2018, was as follows: 239,373,301 shares of Common Stock, \$0.001 par value.

DOCUMENTS INCORPORATED BY REFERENCE:

Portions of the registrant's Proxy Statement relating to its 2018 Annual Meeting of Stockholders, to be filed subsequently, are incorporated by reference into Part III of this Report where indicated.

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All references in this Annual Report on Form 10-K to “Amkor,” “we,” “us,” “our” or the “company” are to Amkor Technology, Inc. and its subsidiaries. We refer to the Republic of Korea, which is also commonly known as South Korea, as “Korea”. All references to “J-Devices”, “Toshiba” and “Qualcomm” are to J-Devices Corporation, our wholly owned subsidiary in Japan, Toshiba Corporation and Qualcomm Incorporated, respectively. We also refer to our new factory and research and development facility in Incheon, Korea as “K5”. Amounts preceded by ¥ are in Japanese yen, and amounts preceded by ₩ are in Korean won. Amkor®, Amkor Technology®, ChipArray®, FusionQuad®, J-Devices™, MicroLeadFrame®, TMV®, SWIFT®, and SLIM™, among others, are trademarks of Amkor Technology, Inc. All other trademarks appearing herein are held by their respective owners. Subsequent use of the above trademarks in this report may occur without the respective superscript symbol (® and ™) in order to facilitate the readability of the report and are not a waiver of any rights that may be associated with the relevant trademarks.

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This report contains forward-looking statements within the meaning of the federal securities laws, including but not limited to statements regarding: (1) the amount, timing and focus of our expected capital investments in 2018 including expenditures in support of advanced packaging and test equipment, (2) our ability to fund our operating activities and financial requirements for the next twelve months, (3) the effect of changes in revenue levels and capacity utilization on our gross margin, (4) the focus of our research and development activities, (5) the anticipated impact of the Tax Act on our taxes, (6) the grant and expiration of tax holidays in jurisdictions in which we operate and expectations regarding our effective tax rate and the availability of tax incentives, (7) the creation or release of valuation allowances related to taxes in the future, (8) our repurchase or repayment of outstanding debt or the conversion of debt in the future, (9) payment of dividends, (10) compliance with our covenants, (11) expected contributions to foreign pension plans, (12) liability for unrecognized tax benefits and the potential impact of our unrecognized tax benefits on our effective tax rate, (13) the effect of foreign currency exchange rate exposure on our financial results, (14) the volatility of the trading price of our common stock, (15) changes to our internal controls related to integration of acquired operations and implementation of an enterprise resource planning system, (16) our efforts to enlarge our customer base in certain geographic areas and markets, (17) demand for advanced packages in mobile devices and our technology leadership and potential growth in this market, (18) our expected forfeiture rate for outstanding stock options and restricted shares, (19) our expected rate of return for pension plan assets, and (20) other statements that are not historical facts. In some cases, you can identify forward-looking statements by terminology such as “may,” “will,” “should,” “expects,” “plans,” “anticipates,” “believes,” “estimates,” “predicts,” “potential,” “continue,” “intend” or the negative of these terms or other comparable terminology. Because such statements include risks and uncertainties, actual results may differ materially from those anticipated in such forward-looking statements as a result of various factors, including those set forth in the following report as well as in Part I, Item 1A of this Annual Report on Form 10-K.

**PART I**

**Item 1. Business**

**OVERVIEW**

Amkor is one of the world's leading providers of outsourced semiconductor packaging and test services. Amkor pioneered the outsourcing of semiconductor packaging and test services through a predecessor corporation in 1968, and over the years we have built a leading position by:

- Designing and developing innovative packaging and test technologies;
- Offering a broad portfolio of cost-effective solutions and services;
- Focusing on strategic end markets that offer solid growth potential;
- Cultivating long-standing relationships with our customers, which include many of the world's leading semiconductor companies;
- Collaborating with customers, original equipment manufacturers ("OEMs") and equipment and material suppliers;
- Developing a competitive cost structure with disciplined capital investment;
- Building expertise in high-volume manufacturing processes and developing a reputation for high quality and solid execution and
- Providing a geographically diverse operating base, with research and development, engineering support and production capabilities at various facilities in China, Japan, Korea, Malaysia, the Philippines, Portugal and Taiwan.

Our packaging and test services are designed to meet application and chip specific requirements including the required type of interconnect technology; size; thickness and electrical, mechanical and thermal performance. We are able to provide turnkey packaging and test services including semiconductor wafer bump, wafer probe, wafer back-grind, package design, packaging, system-level and final test and drop shipment services. Our customers use us for one or more of these services.

We provide our services to integrated device manufacturers ("IDMs"), "fabless" semiconductor companies and contract foundries. IDMs generally design, manufacture, package and test semiconductors in their own facilities. However, the availability of technologically advanced outsourced manufacturing services has encouraged IDMs to outsource a portion of their manufacturing. Fabless semiconductor companies do not have factories and focus exclusively on the semiconductor design process and outsource virtually every step of the manufacturing process. Fabless semiconductor companies utilize contract foundries to manufacture their semiconductors in wafer form, and companies such as Amkor for their packaging and test needs. Some companies will engage a contract foundry to manage the complete semiconductor manufacturing process, and in turn, the contract foundry will outsource some of its packaging and test needs.

Our IDM customers include: Intel Corporation; Renesas Electronics Corporation; STMicroelectronics N.V.; Texas Instruments Incorporated and Toshiba Corporation. Our fabless customers include: Broadcom Limited, Qualcomm Incorporated and Socionext Inc. Our contract foundry customers include: GlobalFoundries Inc. and Taiwan Semiconductor Manufacturing Company Limited.

**AVAILABLE INFORMATION**

Amkor files annual, quarterly and current reports, proxy statements and other information with the U.S. Securities and Exchange Commission (the "SEC"). You may read and copy any document we file at the SEC's Public Reference Room, 100 F Street, NE, Washington, D.C. 20549. Please call the SEC at 1-800-SEC-0330 for information on the Public Reference Room. The SEC maintains a website that contains annual, quarterly and current reports, proxy statements and other information that issuers (including Amkor) file electronically with the SEC. The SEC's website is <http://www.sec.gov>.

Amkor's website is <https://www.amkor.com>. Amkor makes available, free of charge, through its website, our annual reports on Form 10-K; quarterly reports on Form 10-Q; current reports on Form 8-K; Forms 3, 4 and 5 filed on behalf of directors

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and executive officers and any amendments to those reports filed or furnished pursuant to the Securities Exchange Act of 1934, as amended (the "Exchange Act"), as soon as reasonably practicable after such material is electronically filed with, or furnished to, the SEC. We also make available, free of charge, through our website, our Corporate Governance Guidelines, the charters of the Audit Committee, Nominating and Governance Committee and Compensation Committee of our Board of Directors, our Code of Business Conduct, our Code of Ethics for Directors and other information and materials. The information on Amkor's website is not incorporated by reference into this report.

### **INDUSTRY BACKGROUND**

Semiconductor devices are the essential building blocks used in most electronic products. As electronic and semiconductor devices have evolved, several important trends have emerged that have fueled the growth of the overall semiconductor industry, as well as the market for outsourced semiconductor packaging and test services. These trends include:

- An increasing demand for mobile and internet-connected devices, including the world-wide adoption of "smart" phones, tablets and other consumer electronic devices that can access the internet and provide multimedia capabilities.
- An increase in mobility and connectivity capabilities and growing digital content driving demand for new broadband wired and wireless networking equipment.
- The proliferation of semiconductor devices into well-established end products such as automotive systems due to increased use of electronics for safety, navigation, fuel efficiency, emission reduction and entertainment systems.
- An overall increase in the semiconductor content within electronic products to provide greater functionality and higher levels of performance.
- The growth of advanced System-in-Package ("SiP") modules where multiple semiconductor and other electronic components with different functionalities are combined into a single package. The increasing demand for miniaturization and higher functionality at competitive cost is driving the adoption of advanced SiP in new products. Advanced SiPs are the primary vehicle for package-level integration, which allow customers to combine ICs from different silicon nodes and different foundries.

As a supplier in the semiconductor industry, our business is cyclical by nature and impacted by broad economic factors, such as world-wide gross domestic product and consumer spending. Historical trends indicate there has been a strong correlation between world-wide gross domestic product levels, consumer spending and semiconductor industry cycles.

#### ***Outsourcing Trends in Semiconductor Manufacturing***

Semiconductor companies outsource their packaging and test needs to service providers such as Amkor for the following reasons:

*Packaging and test service providers have developed expertise in advanced technologies.*

The increasing demands for miniaturization, greater functionality, lower power consumption and improved thermal and electrical performance are driving the continuous development of semiconductor packaging and test technologies that are more sophisticated, complex and customized. This trend has led many semiconductor companies and OEMs to view packaging and test as enabling technologies requiring the kind of leading-edge expertise for technological innovation found in the leading outsourced assembly and test companies. At the same time, these companies are often looking to reduce the internal manufacturing and research and development costs in packaging and test. As a result, many of these companies are increasingly relying on packaging and test service providers as key sources for new package designs and advanced interconnect technologies.

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*Packaging and test service providers offer a cost effective solution in a highly cyclical, capital intensive industry.*

The semiconductor industry is cyclical by nature and impacted by broad economic factors, such as changes in worldwide gross domestic product and consumer spending. Semiconductor packaging and test are complex processes requiring substantial investment in specialized equipment, factories and human resources. As a result of this cyclicity and the large investments required, manufacturing facilities must operate at consistently high levels of utilization to be cost effective. Shorter product life cycles, coupled with the need to update or replace packaging and test equipment to accommodate new package types, make it more difficult for integrated semiconductor companies to maintain cost effective utilization of their packaging and test assets throughout semiconductor industry cycles. Packaging and test service providers, on the other hand, can typically use their assets to support a broad range of customers, potentially generating more efficient use of their production assets and a more cost effective solution.

*Packaging and test service providers can facilitate a more efficient supply chain and help shorten time-to-market for new products.*

We believe that semiconductor companies, together with their customers, are seeking to shorten the time-to-market for their new products, and that having an effective supply chain is a critical factor in facilitating timely and successful product introductions. Packaging and test service providers have the resources and expertise to timely develop their capabilities and implement new packaging technology in volume. For this reason, semiconductor companies and OEMs are leveraging the capabilities of packaging and test service providers to deliver their new products to market more quickly.

*High quality packaging and test service providers enable semiconductor manufacturers to focus their resources on semiconductor design and wafer fabrication.*

As semiconductor process technology migrates to larger wafers and smaller feature sizes, the cost of building a state-of-the-art wafer fabrication factory has risen significantly and can now be several billions of dollars. The high cost of investing in next generation silicon technology and equipment is causing many semiconductor companies to adopt or maintain a “fabless” or “fab-lite” strategy to reduce or eliminate their investment in wafer fabrication and associated packaging and test operations. As a result, these companies are increasing their reliance on outsourced providers of semiconductor manufacturing services, including packaging and test.

## **STRATEGY AND COMPETITIVE STRENGTHS**

### **Strategy**

Our financial goals are sales growth and improved profitability, and we are focusing on the following strategies to achieve these goals:

#### *Leverage Our Investment in Services for Advanced Technologies*

We are an industry leader in developing and commercializing cost-effective advanced packaging and test technologies. These advanced technology solutions provide increased value to our customers. An important factor for success in the advanced packaging and test area is to generate reasonably quick returns on investments made in support of customers seeking leading-edge technologies.

In recent years we have made significant investments in state-of-the-art facilities and equipment to provide services for the industry’s most complex devices. With approximately 600 employees engaged in research and development of new semiconductor packaging and test technologies, we are a technology leader in areas such as fine pitch bumping, advanced flip chip and wafer-level processing. During 2017, we had success capitalizing on our advanced technology to achieve design wins and new product introductions in areas such as chips fabricated at 10, 14 and 16 nanometer geometries; advanced SiP products including radio frequency (“RF”), front end modules and micro-electro-mechanical systems (“MEMS”) devices; and wafer-level Chip Scale Packaging (“CSP”) and wafer-level fan-out packages.

We work closely with our customers to develop cost-effective leading-edge packages for the next generation of devices, and we are making substantial progress in a number of areas. These include integrated technologies such as advanced SiP,

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wafer-level fan-out, and Silicon Wafer Integrated Fan-out Technology ("SWIFT") solutions which enable very thin, very small products combining application processors, memory, baseband and other peripheral integrated circuits ("ICs"). They also include packages utilizing Through Silicon Via ("TSV") interconnects and silicon interposers which enable the integration of high performance chips such as high bandwidth memory and graphics processors into a single package.

We believe that advanced packaging services will continue to grow as our customers and leading electronics OEMs strive for smaller device geometries, higher levels of speed and performance and lower power consumption. We intend to continue to leverage our investment in advanced technology to meet the demand for these services.

### *Improve Utilization of Existing Assets and Broaden Our Customer Base*

Another key to our success is to improve the utilization of our existing assets. The transition by leading edge customers to newer packaging and test equipment platforms typically frees up capacity in existing, previously installed equipment. As part of our strategy, we are focused on developing a second wave of customers to more effectively utilize these assets over a longer period of time.

In particular, we are devoting substantial resources to increasing our sales to Chinese and Taiwanese fabless chip companies which have a significant portion of the fast-growing mid-tier and entry-level segments of the mobile device market where much of the growth is occurring.

A key element of our Greater China strategy is our world-class factory in Shanghai. In 2016, we expanded our clean room space at this facility by nearly 45%, to a total of about 625,000 square feet. Our Shanghai facility serves both international and local customers, with a heavy emphasis on wafer-level packaging, wafer bumping, stacked die packaging and advanced test services.

A portion of our expanded Shanghai facility houses Qualcomm Communication Technologies (Shanghai) Co. Ltd., Qualcomm's new semiconductor test facility. This new test center combines Amkor's extensive test services experience and state-of-the-art cleanroom facilities with Qualcomm's industry leadership in cutting-edge product engineering and development. The co-location of the test center at our Shanghai factory helps to strengthen our close business relationship with a key customer.

As part of our plan to consolidate factory operations in Korea, we sold the land and buildings comprising our K1 factory in May 2017 for \$142.4 million. We received 10% of the sale price at signing in November 2016 and the balance at closing, at which time we recognized a pre-tax gain of \$108.1 million.

We completed our factory consolidation efforts in Japan in 2017. We closed multiple factories and transferred the business to other Japanese facilities. We believe that this consolidation will better align our manufacturing footprint with the demand environment and reduce our fixed costs.

### *Balanced Growth*

Revenue growth is a significant objective for Amkor. We strive to grow in a balanced way and avoid over-reliance on any single market or customer. Our goal is to achieve more consistent financial performance through all phases of the business cycle. Our balanced growth strategy has four components, as follows:

- First, we are increasing our revenue in markets other than smartphones and tablets, such as automotive, which now drives approximately 26% of Amkor's total revenue. Revenue from these markets tends to be more stable, with less pronounced highs and lows from year to year. Sales in these other markets now account for 57% of our overall revenue, up from 47% in 2015, prior to the acquisition of J-Devices.
- Second, we are expanding our customer base in the smartphone and tablet market, primarily by engaging with fabless companies in Greater China. This allows us to more fully utilize our existing assets and broadens our participation in all tiers of the mobile device market.
- Third, we continue to make share gains in the iOS and high-end Android ecosystems, leveraging our expertise in advanced SiP, MEMS and other advanced packages to expand our content in flagship phones.

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- Finally, we are focused on building and utilizing manufacturing lines which support multiple customers, and increasing factory utilization through more sophisticated planning processes and more intensive efficiency improvement activities.

### *Selectively Grow Our Scale and Scope through Strategic Investments*

From time to time we see attractive opportunities to grow our customer base and expand markets through strategic investments. For example, in 2017 we completed the acquisition of Nanium, S.A. ("Nanium"), a provider of wafer-level fan-out semiconductor packaging solutions. We believe that this acquisition strengthens our position in the market for wafer-level packaging. In 2015 we completed the acquisition of 100% of J-Devices, our outsourced semiconductor assembly and test ("OSAT") joint venture in Japan. We believe that with this acquisition we are the largest OSAT by revenue for the automotive market, with over \$1 billion in automotive-based revenues in 2017. In addition, Renesas agreed to transfer most of its Singapore-based automotive microcontroller production to J-Devices' factories. That transfer began in 2015 and was completed in 2016.

We believe that selective growth through joint ventures, acquisitions and other strategic investments can help diversify our revenue streams, improve our profits and maintain our technological leadership.

### **Competitive Strengths**

The outsourced semiconductor packaging and test market is very competitive. We also compete with the internal semiconductor packaging and test capabilities of many of our customers and foundries. We believe we are well-positioned in the outsourced packaging and test services market. The following competitive strengths allow us to build upon our industry position and to remain one of the preferred providers of semiconductor packaging and test services.

#### *Leading Technology Innovator*

We are a leader in developing and deploying advanced semiconductor packaging and test solutions. We have designed and developed several state-of-the-art package formats and technologies including our Package-on-Package ("PoP") platform with Through Mold Via ("TMV") technology, molded embedded packages, FusionQuad, flip chip ball grid array, multi-chip modules with a silicon interposer placed between the module chips and substrate, copper pillar bumping and fine pitch copper pillar flip chip packaging technologies. In addition, we believe that as semiconductor technology continues to achieve smaller device geometries with higher levels of speed and performance, packages will increasingly require wafer-level chip scale packaging, wafer-level fan-out, SWIFT and flip chip interconnect solutions and advanced SiP products. We have been investing in our technology leadership in these packaging technologies. We have also been a leader in developing environmentally friendly IC packaging, which involves the elimination of lead and certain other materials.

The semiconductor industry is now in a period of packaging development where integrated wafer-level fan-out and TSV interconnect technologies will be used to create the next generation of advanced packages. We continue to invest in developing the key processes and packaging and test technologies required for our customers to deliver advanced integrated and modular solutions to market. We are a leader in wafer thinning, micro-bumping, die stacking, hybrid packaging and TSV-based flip chip innovation.

#### *Long-Standing Relationships and Collaboration with Prominent Semiconductor Companies*

Our customers include most of the world's largest semiconductor companies and over the last four decades, we have developed long-standing relationships with many of these companies. We believe that our production excellence has been a key factor in our success in attracting and retaining customers. We work with our customers and our suppliers to develop proprietary process technologies to enhance our existing capabilities, reduce time-to-market, increase quality and lower costs.

We believe that our focus on research and product development will enable us to enter new markets early, capture market share and promote the adoption of our new package designs as industry standards. We collaborate with customers and leading OEMs to develop comprehensive packaging solutions that make it easier for next-generation semiconductors to be designed into next-generation end products. By collaborating with leading semiconductor companies and OEM electronic



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companies, we gain access to technology roadmaps for next generation semiconductor designs and obtain the opportunity to develop new packages that satisfy their future requirements.

### *Broad Offering of Semiconductor Package Design, Packaging and Test Services*

Creating successful interconnect solutions for advanced semiconductor devices often poses unique thermal, electrical and mechanical design challenges, and we employ a large number of engineers to solve these challenges. We provide services for a wide variety of products. This wide variety of packaging offerings is necessary to meet the diverse needs of our customers for the optimal combination of performance, size and cost attributes. Our solutions enable our customers to focus on semiconductor design and wafer fabrication while utilizing Amkor as their turnkey design, packaging and test services provider and, in many cases, their packaging technology innovator.

We also offer an extensive line of advanced probe and final test services for analog, digital, logic, mixed signal and RF semiconductor devices. We believe that the breadth of our design, packaging and test services is important to customers seeking to limit the number of their suppliers.

### *Geographically Diversified Operating Base*

We have a broad and geographically diversified operating footprint strategically located in seven countries in many of the world's important electronics manufacturing regions. We believe that our scale and scope allow us to provide cost effective solutions to our customers by:

- Offering capacity to absorb large orders and accommodate quick turn-around times;
- Obtaining favorable pricing on materials and equipment, where possible, by using our purchasing power and leading industry position;
- Qualifying production of customer devices at multiple manufacturing sites to mitigate the risks of supply disruptions and
- Providing capabilities and solutions for customer-specific requirements.

For financial information about geographic areas, see Note 18 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K.

### *Competitive Cost Structure and Disciplined Capital Investment*

There is a continuous push throughout the entire semiconductor supply chain for lower cost solutions. We work to maintain a competitive cost structure and make disciplined capital investment decisions so that we can provide cost-competitive solutions to our customers and achieve sustainable profitability and cash flow. Some of our cost control efforts have included: (1) improving the utilization of our existing assets; (2) developing new manufacturing methods to reduce processing costs; (3) utilizing flexible manufacturing lines that can accommodate a variety of products and customers; (4) increasing strip densities to drive higher throughput; (5) implementing more cost-effective materials; (6) utilizing our scale to drive world-wide purchasing leverage and (7) increasing labor productivity.

We operate in a cyclical industry. During an industry downturn we seek to reduce our costs and drive greater factory and administrative efficiencies. Cost control efforts can include reducing labor costs by temporarily lowering compensation, reducing employee and contractor headcount, shortening work weeks and obtaining labor-related foreign government subsidies where available.

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### PACKAGING AND TEST SERVICES

#### *Overview of Semiconductor Manufacturing Process*

In general, the semiconductor manufacturing process consists of IC design, wafer fabrication, wafer probe, packaging and final test.

Integrated circuit design involves the laying out of electronic components, such as transistors, resistors, capacitors and the metallic interconnect of these components, to achieve the desired device functionality. Wafer fabrication is a multiple-step sequence of photolithographic and chemical processing steps during which the IC's are gradually created on semiconductor material, typically a silicon wafer. Individual IC's are generally known as a "chip" or "die", and a single wafer will contain many die. Wafers are fabricated by two types of companies - IDMs which design and fabricate wafers using their own in-house manufacturing facilities, and contract foundries which manufacture wafers that are designed by fabless companies or other customers.

The packaging and test services we provide occur subsequent to wafer fabrication. The wafers that we receive from our customers are generally consigned to us; we do not own the consigned wafers or record their value in our financial statements. During wafer probe, each individual die is electrically tested, or probed, for defects. Packaging is the processing of bare die to facilitate electrical connections and heat dissipation and protect the die. The wafer is separated into individual die. Each good die is then assembled into a package that typically encapsulates the die for protection and creates the electrical connections used to connect the package to a printed circuit board, module or other part of the electronic device. In some packages, chips are attached to a substrate or leadframe carrier through wirebonding or flip chip interconnects and then encased in a protective material. Or, for a wafer-level package, the electrical interconnections are created directly on the surface of the die so that the chip may be attached directly to other parts of an electronic device without a substrate or leadframe. The packages are then tested using sophisticated equipment to ensure that each packaged chip meets its design and performance specifications.

#### *Packaging and Test Technologies and Processes*

Our packages employ wirebond, flip chip, copper clip and other interconnect technologies. We use leadframe and substrate package carriers, and we perform a variety of test services.

##### *Interconnect Technologies*

*Wirebond:* In packages that employ wirebond interconnect technology, the die is mounted face up on the package carrier and the interconnections between the die and package carrier are made through very fine gold, silver or copper wires which are attached from the bond pads of the die to the package carrier. The interconnections are placed along the perimeter of the die. Wirebonding is generally considered to be the most cost-effective and flexible interconnect technology and is used to assemble the majority of semiconductor packages.

*Flip Chip:* In packages that employ flip chip interconnect technology, the interconnections between the die and package carrier are made through conductive "bumps" that are placed directly on the die surface utilizing a process called wafer bumping. The bumped die is then "flipped over" and placed face down, with the bumps connecting directly to the package carrier. Flip chip allows a higher number of interconnects than wirebond as it uses the entire surface area of the die, and sometimes the perimeter as well, instead of just the perimeter as used by most wirebond packages. Flip chip also provides enhanced thermal and electrical performance, and enables smaller die and thinner, smaller form factors (or physical package dimensions).

The wafer bumping process consists of preparing the wafer for bumping and forming or placing the bumps. Preparation may include cleaning, removing insulating oxides and providing a pad metallurgy that will protect the interconnections while making good mechanical and electrical connection between the bump and the wafer.

*Copper Clip:* Copper clip interconnect technology uses a solid copper bridge or "clip" to connect the die to the package carrier. The clip allows a higher level of current flow than a wire and also provides a better method of heat transfer from the die. The clip is either spot welded, or more often re-flow soldered, to the die pads and the package carrier pads.

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### *Package Carriers*

*Leadframe:* A leadframe is a miniature sheet of metal, generally made of copper and silver alloys, on which a pattern of electrical connections (or “leads”) has been cut. The leads are generally placed around the perimeter of the leadframe and are used to connect the package to the system board. The number of leads on an individual leadframe is limited as electrical shorting can occur if the leads are placed too close together.

*Substrate:* A substrate is a laminate of either single or multiple layers of epoxy resin, woven glass fibers and metal conductors. Solder bumps provide the electrical connection to the system board. The bumps are typically distributed evenly across the bottom surface of the substrate (called a “ball grid array” format). This allows less distance between individual leads and a higher number of interconnects than leadframe packages.

### *Test Services*

Amkor provides a complete range of semiconductor testing services including wafer testing or probe and final test. We offer a full range of test software, hardware, integration and product engineering services, and we support a range of business models and test capabilities. Substantially all of our test business is derived from testing packages that we assemble.

*Wafer Test Services:* Wafer test, also referred to as wafer probe, is performed after wafer fabrication or wafer bumping to screen out defective devices prior to packaging. We offer a range of wafer test coverage that can be tailored based on the cost and complexity of the die, the package and the product. These services range from coarse level screening for major defects all the way up to probing at high digital speeds and can include full radio frequency transmit and receive as well as testing at multiple temperatures. Wafer testing can also involve a range of wafer mapping and inspection operations.

*Final Test Services:* After the packaging process, final test is performed to ensure that the packaged device meets the customer’s requirements. Final test spans a range of rigor and complexity depending on the device and end market application. More rigorous types of final test include testing multiple times under different electrical and temperature conditions and before and after device reliability stresses, such as burn-in. In addition to electrical testing, specialized solutions are required for packages that also process non-electric stimuli.

The electrical tests are a mix of functional, structural and system-level tests depending on the customer’s requirements and cost and reliability parameters. The electrical test equipment we use includes commercially available automated test equipment, customized and proprietary system level test equipment and innovative types of low cost test equipment developed by Amkor.

### *Advanced Products and Mainstream Products*

We offer a broad range of advanced and mainstream packaging and test services to our customers. We refer to our flip chip, wafer-level processing and related test services as “Advanced Products”, and our wirebond packaging and related test services as “Mainstream Products”. The following table sets forth, for the periods indicated, the amount of advanced and mainstream packaging and test net sales and the percentage of such net sales:

	For the Year Ended December 31,								
	2017		2016		2015				
	(In millions, except percentage of net sales)								
Advanced Products	\$	1,950	46.6%	\$	1,680	43.1%	\$	1,433	49.7%
Mainstream Products		2,236	53.4%		2,214	56.9%		1,452	50.3%
Total net sales	\$	4,186	100.0%	\$	3,894	100.0%	\$	2,885	100.0%

We began consolidating J-Devices in 2016 and approximately 90% of J-Devices' \$913.7 million of net sales in 2016 were generated from Mainstream Products.

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### *Advanced Products*

Our Advanced Products include flip chip chip scale packages, wafer-level packages and flip chip ball grid array packages. These package families use flip chip interconnect technology so that the die can be connected to a substrate package carrier or, in the case of wafer-level chip scale packages, directly to a printed circuit board.

*Flip Chip Chip Scale Package ("FC CSP") Products:* FC CSP packages are small form factor packages where the substrate size is not much larger than the die itself. The size advantage provided by chip scale packaging technologies has made FC CSP an attractive choice for a wide variety of applications that require very small form factors such as smartphones, tablets and other mobile consumer electronic devices.

Flip chip stacked chip scale packages ("FC SCSP") stack a second die on top of the original flip-chip die. The top die is typically a memory device, and wirebond interconnects are used to attach it to the substrate. FC SCSP is frequently used to stack memory on top of digital baseband and applications processors for use in mobile devices.

We continue to drive thinner package solutions for our PoP technology through the development of ultra-thin substrates and enhancing our pre-stacking and thin die handling capabilities.

We developed fine pitch copper pillar flip chip interconnect technology, which creates interconnections at finer pitches using a plating process to reduce the number of substrate layers to facilitate very thin packages. This innovative solution is also an enabling technology for package stacking with TSVs.

*Flip Chip Ball Grid Array ("FC BGA") Products:* FC BGA packages are large form factor substrate-based packages which are used where processing power and speed are needed, and small form factors are not required. Our FC BGA packages are assembled around state-of-the-art substrates. Utilizing multiple high density routing layers, laser drilled vias, and ultra-fine line and space metallization, FC BGA substrates have the highest routing density available. The variety of FC BGA package options allows package selection to be tailored to the specific thermal needs of the end product. We offer FC BGA packaging in a variety of product formats to fit a wide range of end application requirements, including networking, storage, computing and consumer applications.

*Wafer-level Package Products:* We offer three types of wafer-level packages: Wafer-level CSP, wafer-level fan-out and SWIFT.

- Wafer-level CSP packages (also known as fan-in wafer-level packages) do not utilize a package carrier. The bumped wafer is singulated into individual die, and the wafer-level package is then attached directly to the system board. Wafer-level CSP offers one of the lowest total system costs, enabling higher semiconductor content while leveraging the smallest form factor and one of the highest performing, most reliable, semiconductor package platforms on the market today. We have seen significant growth in our wafer-level CSP business, driven largely by mobile communications. Applications for wafer-level CSP include power management, transceivers, sensors, wireless charging, codecs, and specialty silicon for new or unique functionality.
- Wafer-level fan-out packages (also known as low-density fan-out packages) are utilized for ICs where the die surface area is too small to accommodate all of the bond pads. The fan-out package enlarges the bondable surface area by building a border around the die using low-cost molding compound. Wafer-level CSP and wafer-level fan-out are complementary technologies. Customers can choose between the two package types as their die sizes shrink or grow. With our recent acquisition of Nanium, we are now a leader in low-density fan-out technology.
- Silicon Wafer Integrated Fan-out Technology ("SWIFT", also known as high-density fan-out) replaces a laminate substrate with a thinner structure. SWIFT solutions enable very thin, very small products combining application processors, memory, baseband and other peripheral ICs.

### *Mainstream Products*

Our Mainstream Products include leadframe packages, substrate-based wirebond packages and MEMS packages. These package families use wirebond interconnect technology to connect a die to a leadframe or substrate package carrier.

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*Leadframe Packages:* Leadframe packages use wirebond or flip chip technology to interconnect a die to a leadframe package carrier. Leadframe packages are used in many electronic devices and remain the most practical and cost-effective solution for many low to medium pin count applications.

Traditional leadframe packages support a wide variety of device types and applications. Two of our most popular traditional leadframe package types are small outline integrated circuit and quad flat package, commonly known as “dual” and “quad” products, respectively, based upon the number of sides from which the leads extend. The traditional leadframe package family has evolved from “through hole design,” where the leads are plugged into holes on the circuit board to “surface mount design,” where the leads are soldered to the surface of the circuit board. We offer a wide range of lead counts and body sizes to satisfy variations in the size of customers’ semiconductor devices.

Through a process of continuous engineering and customization, we have designed several leadframe package types that are thinner and smaller than traditional leadframe packages, and which have the ability to accommodate more leads on the perimeter of the package. These leadframe packages typically have superior thermal and electrical characteristics, which allow them to dissipate heat generated by high-powered semiconductor devices while providing enhanced electrical connectivity. We are developing increasingly smaller versions of these packages to keep pace with continually shrinking semiconductor device sizes and demand for miniaturization of portable electronic products. One of our more successful leadframe package offerings is the *MicroLeadFrame* family of quad flat no lead packages.

Power discrete devices use a leadframe as the package carrier and primarily use wirebond interconnect technology. However, power applications that require improved thermal and electrical performance will use packaging with copper clip interconnect technology.

*Substrate-based Wirebond Packages:* Substrate-based wirebond packages use wirebond technology to connect a die to a substrate. Some of our packages in this category include stacked CSP, wirebond ball grid array packages and plastic ball grid array (“PBGA”) packages.

Stacked CSP technology enables the stacking of a wide range of different semiconductor devices to deliver high levels of silicon integration and area efficiency. Stacked CSP utilizes high density thin core substrates and advanced materials, along with leading-edge wafer thinning, die attach, and molding capabilities to stack multiple die on a substrate. Stacked CSP is ideal for memory, including NAND, NOR and DRAM memory, and mixed signal applications.

Wirebond ball grid array packages offer a broad selection of ball array pitches, ball counts and body sizes, single and multi-die layouts, stacked die and passive component integration. They are applicable for a wide range of semiconductors requiring a smaller package size than conventional PBGAs or leadframe packages.

Plastic ball grid array packages are used in applications requiring higher pin count than leadframe packages, but typically have lower pin counts than flip chip. PBGA packages are designed for low inductance, improved thermal operation and enhanced surface-mount technology ability. Custom performance enhancements, like ground and power planes, are also available.

*Micro-Electro-Mechanical Systems Packages:* MEMS are miniaturized mechanical and electro-mechanical devices that can sense and provide information about the physical world and sometimes trigger a response. Examples of MEMS devices include microphones, accelerometers, airbag deployment sensors, gyrometers, magnetometers, and humidity, temperature and pressure sensors. We also specialize in sensor fusion products which utilize our cavity MEMS platform and combine multiple sensors into a single package. MEMS packages leverage our expertise in wafer thinning, die stacking, wirebonding and flip chip interconnect to deliver sophisticated products with a very small form factor.

### *Advanced System-in-Package Modules*

Advanced SiP modules combine multiple semiconductor and other electronic components with different functionalities into a single package. These modules use wirebond, flip chip or wafer-level interconnect technologies. Components can include passive devices (inductors, capacitors, resistors, filters and diplexers), antennas and mechanical parts.

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The increasing demand for miniaturization and higher functionality at competitive cost is driving the adoption of advanced SiP in new products. Advanced SiP modules are used for many applications such as RF and front end modules, basebands, connectivity, fingerprint sensors, display and touch screen drivers, sensors and MEMS, NAND memory and solid state drives. Advanced SiP modules are found in many products including smartphones and tablets, automobiles, wearable electronics, high-performance gaming systems, computers and network systems.

In 2017 and 2016, we had net sales of approximately \$825 million and \$775 million, respectively, from our advanced SiP modules which are included in either Advanced Products or Mainstream Products depending upon the interconnect technology used in the module.

### **End Markets**

The following table lists the end markets that use our products and sets forth, for the periods indicated, the percentage of net sales in each end market. Based on our periodic evaluation of end markets, we aggregated our networking end market into our computing end market. All prior periods have been retrospectively recast to conform with current year presentation.

	2017	2016	2015
<b>End Market Distribution Data</b> (an approximation including representative devices and applications based on a sampling of our largest customers):			
Communications (smart phones, tablets, handheld devices)	43%	42%	53%
Automotive, industrial and other (driver assist, infotainment, safety, performance)	26%	26%	13%
Computing (data center, PC/laptops, infrastructure, storage)	18%	18%	22%
Consumer (televisions, set-top boxes, personal electronics)	13%	14%	12%
Total net sales	100%	100%	100%

### **RESEARCH AND DEVELOPMENT**

Our research efforts focus on developing new packaging solutions and test services, and improving the efficiency and capabilities of our existing production processes. We believe that technology development is one of the keys to success in the semiconductor packaging and test industry. By concentrating our research and development on our customers' needs for innovative packages, increased performance and lower cost, we gain opportunities to enter markets early, capture market share and promote our new package offerings as industry standards.

One of our top priorities is developing low-cost packaging solutions for the next generation of mobile devices, which minimize material and processing costs, while maximizing yields and reliability. This development effort is particularly important for customers seeking cost-effective alternatives to further silicon-level integration. Another important focus area is the development of wafer-level packages for larger chips. These wafer-level chip-scale packages and wafer-level fan-out (low density) packages are increasingly the preferred package type for many chips used in mobile devices. They provide a very low-profile product at a competitive cost. We are also developing integrated (high density) wafer-level fan-out solutions called SWIFT which enable very thin, very small products by combining application processors, memory, baseband and other peripheral IC's into one packaged module. Through the use of die partitioning and heterogeneous die integration, these sub-system and system modules provide higher functionality at lower cost versus multi-package options.

Our research and development employees are located throughout Asia and in the United States. In 2017, we had approximately 600 employees engaged in research and development activities. In 2017, 2016 and 2015, we incurred \$166.6 million, \$117.2 million and \$82.0 million, respectively, of research and development expense. The 2017 increase was primarily due to development and other costs associated with our new K5 factory and research and development facility in Korea. In addition, the consolidation of J-Devices added \$18.3 million in research and development expenses for the year ended December 31, 2016.

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### **SALES AND MARKETING**

Our sales offices are located throughout Asia, Europe and North America. Our support personnel manage and promote our packaging and test services and provide key customer and technical support. To provide comprehensive sales and customer service, we typically assign our customers a direct support team consisting of an account manager, technical program manager, test program manager and both field and factory customer support representatives. We also support our largest multinational customers from multiple office locations to ensure that we are aligned with their global operational and business requirements.

Our direct support teams are further supported by an extended staff of product, process, quality and reliability engineers, as well as marketing and advertising specialists, information systems technicians and factory personnel. Together, these direct and extended support teams deliver an array of services to our customers.

### **SEASONALITY**

Our sales have generally been higher in the second half of the year than in the first half due to the effect of consumer buying patterns in the U.S., Europe and Asia and the timing of flagship mobile device launches. In addition, semiconductor companies generally reduce their production during the holidays at the end of December which generally results in a decrease in packaging and test services during the first quarter. General economic conditions, changes in our supply chain or overall demand in any of our end-markets can impact our seasonality.

### **CUSTOMERS**

In 2017, we had approximately 275 customers, including many of the largest semiconductor companies in the world. Our ten largest customers accounted for 67% of our net sales in 2017. Toshiba accounted for more than 10% of our net sales in 2017.

### **MATERIALS AND EQUIPMENT**

#### ***Materials***

Our materials are used primarily for packaging activities. Our packaging operations depend upon obtaining adequate supplies of materials on a timely basis. The principal materials used in our packaging process are leadframes, laminate substrates, gold and copper wire, mold compound, epoxy, tubes and trays. The silicon wafer is generally consigned from the customer. We do not take ownership of the customer consigned wafer, and title and risk of loss remains with the customer for these materials. Test materials constitute a very small portion of our total test cost. We purchase materials based on customer forecasts, and our customers are generally responsible for any unused materials which we purchased based on such forecasts.

We obtain the materials required for packaging services from various suppliers. We source most of our materials, including critical materials such as leadframes, laminate substrates and gold wire, from a limited group of suppliers. We work closely with our primary material suppliers in an effort to ensure consistent quality and that materials are available and delivered on time. We also negotiate world-wide pricing agreements with our major suppliers to take advantage of the scale of our operations.

#### ***Equipment***

Our ability to meet the changing demand from our customers for manufacturing capacity depends upon obtaining packaging and test equipment in a timely manner. We work closely with our main equipment suppliers to coordinate the ordering and delivery of equipment to meet our expected capacity needs.

The primary types of equipment used in providing our packaging services are wirebonders and die bonders. In addition, we maintain a variety of other packaging equipment, including mold, singulation, die attach, ball attach and wafer backgrind, along with numerous other types of manufacturing equipment. A substantial portion of our packaging equipment base can generally be used and adapted to support the manufacture of many of our packages through the use of relatively low cost

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tooling, although equipment used in advanced packaging can be more difficult to redeploy than equipment used in traditional wirebond packaging.

We also purchase wafer bumping equipment to facilitate our flip chip and wafer level packaging services. Wafer bump equipment includes sputter and spin coaters, electroplating equipment, reflow ovens and other types of equipment. This equipment tends to have longer lead times for delivery and installation than other packaging equipment and is sold in relatively larger increments of capacity.

The primary equipment used in the testing process includes testers, handlers and probers. Handlers are used to transfer individual or small groups of packaged IC's to a tester. Test equipment is generally a more capital intensive portion of the process and tends to have longer delivery lead times than most types of packaging equipment. We focus our capital expenditures on standardized tester platforms in order to maximize test equipment utilization where possible. In some cases, our customers will consign test equipment to us. In those cases, we operate the equipment on their behalf but do not own it.

## **ENVIRONMENTAL MATTERS**

The semiconductor packaging process uses chemicals, materials and gases and generates byproducts that are subject to extensive governmental regulations. For example, we produce liquid waste when semiconductor wafers are diced into chips with the aid of diamond saws, then cooled with running water. In addition, semiconductor packages have historically utilized metallic alloys containing lead (Pb) within the interconnect terminals typically referred to as leads, pins or balls. The usage of lead (Pb) has decreased over the past few years, as we have ramped volume production of alternative lead (Pb)-free processes. Our operations are subject to numerous laws and regulations governing the protection of the environment, disposal of waste, discharges into water, emissions into the atmosphere and the protection of employee health and safety. Future regulations may impose stricter environmental requirements on the semiconductor packaging and test industry and may require additional capital investment.

We are engaged in a continuing program to assure compliance with federal, state and local environmental laws and regulations. We do not expect that capital expenditures or other costs attributable to compliance with environmental laws and regulations will have a material adverse effect on our business, liquidity, results of operations, financial condition or cash flows.

We are committed to sound and responsible environmental practices in conducting our business. We are an active member of the Responsible Business Alliance (formerly known as the Electronics Industry Citizenship Coalition, or "EICC"), the largest industry organization dedicated to supply chain responsibility. We also continuously engage with our customers and suppliers to improve the sustainability of our operations around the world.

## **COMPETITION**

The outsourced semiconductor packaging and test market is very competitive. We face substantial competition from established packaging and test service providers primarily located in Asia, including companies with significant manufacturing capacity, financial resources, research and development operations, marketing and other capabilities. These companies include Advanced Semiconductor Engineering, Inc., Siliconware Precision Industries Co., Ltd. and Jiangsu Changjiang Electronics Technology Co., Ltd.

Such companies also have developed relationships with most of the world's largest semiconductor companies, including current or potential customers of Amkor. We also compete with the internal semiconductor packaging and test capabilities of many of our customers and the contract foundries. Our IDM customers continually evaluate the attractiveness of outsourced services against their own in-house packaging and test services and at times may decide to shift some or all of their outsourced packaging and test services to internally sourced capacity. We also compete with contract foundries, such as Taiwan Semiconductor Manufacturing Company Limited and Samsung Electronics Co., Ltd., which offer full turnkey services from silicon wafer fabrication through packaging and final test. In addition, we compete with companies that offer only test services and not packaging.



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The principal elements of competition in the semiconductor packaging and test services market include:

- technical competence;
- quality;
- price;
- breadth of packaging and test services offered, including turnkey services;
- new package and test design, technology innovation and implementation;
- cycle times;
- customer service and
- available capacity and ability to invest in capacity, geographic location and scale of manufacturing.

We believe that we compete favorably with respect to each of these elements.

### **INTELLECTUAL PROPERTY**

We maintain an active program to protect and derive value from our investment in technology and the associated intellectual property rights. Intellectual property rights that apply to our various products and services include patents, copyrights, trade secrets and trademarks. We have filed and obtained a number of patents in the U.S. and abroad, and their durations vary depending on the jurisdiction in which each patent is filed. Although our patents are an important element of our intellectual property strategy as a whole, we are not materially dependent on any one patent or any one technology. We expect to continue to file patent applications when appropriate to protect our proprietary technologies, but we cannot assure you that we will receive patents from pending or future applications. In addition, any patents we obtain may be challenged, invalidated or circumvented and may not provide meaningful protection or other commercial advantage to us.

We also protect and maintain the confidentiality of certain information about our processes, products and strategies which we believe provides us with a competitive advantage. We have ongoing programs designed to maintain the confidentiality of such information. Further, to distinguish our products from our competitors' products, we have obtained certain trademarks and service marks and may promote our particular brands through advertising and other marketing techniques.

### **EMPLOYEES**

In 2017, Amkor had approximately 29,300 full-time employees. We believe that our relations with our employees are good, and we have not experienced a work stoppage in any of our factories. Our employees in the Philippines, Taiwan and the U.S. are not represented by any union. Certain employees at our factories in China, Japan, Korea, Malaysia and Portugal are members of a union, and we operate subject to collective bargaining agreements that we have entered into with these unions.

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

The factors discussed below are cautionary statements that identify important factors and risks that could cause actual results to differ materially from those anticipated by the forward-looking statements contained in this report. For more information regarding the forward-looking statements contained in this report, see the Table of Contents of this Annual Report on Form 10-K. You should carefully consider the risks and uncertainties described below, together with all of the other information included in this report, in considering our business and prospects. The risks and uncertainties described below are not the only ones facing Amkor. Additional risks and uncertainties not presently known to us may also impair our business operations. The occurrence of any of the following risks could affect our business, liquidity, results of operations, financial condition or cash flows.

#### ***Dependence on the Highly Cyclical Semiconductor Industry - We Operate in Volatile Industries and Industry Downturns and Declines in Global Economic and Financial Conditions Could Harm Our Performance.***

Our business is impacted by market conditions in the semiconductor industry, which is cyclical by nature and impacted by broad economic factors, such as world-wide gross domestic product and consumer spending. The semiconductor industry has experienced significant and sometimes sudden and prolonged downturns in the past. For example, the financial crisis and global recession in 2008 and 2009 resulted in a downturn in the semiconductor industry that adversely affected our business and results of operations during those periods. The economic recovery since that time has been slow and uneven. If the industry or markets we compete in experience slower, or even negative growth, our business and results of operations may be adversely affected.

Since our business is, and will continue to be, dependent on the requirements of semiconductor companies for outsourced packaging and test services, any downturn in the semiconductor industry or any other industry that uses a significant number of semiconductor devices, such as telecommunications, consumer electronics, or computing, could have a material adverse effect on our business and operating results. During downturns, we have experienced, among other things, reduced demand, excess capacity and reduced sales. For example, generally soft economic conditions and a lack of compelling new mobile products constrained overall demand during 2015. Macroeconomic uncertainties and a cautious business climate are also expected to constrain the revenue growth in our business. It is difficult to predict the timing, strength or duration of any economic slowdown or subsequent economic recovery, which, in turn, makes it more challenging for us to forecast our operating results, make business decisions and identify risks that may affect our business, sources and uses of cash, financial condition and results of operations. Additionally, if industry conditions deteriorate, we could suffer significant losses, as we have in the past, which could materially impact our business, liquidity, results of operations, financial condition and cash flows.

#### ***Fluctuations in Operating Results and Cash Flows - Our Operating Results and Cash Flows Have Varied and May Vary Significantly as a Result of Factors That We Cannot Control.***

Many factors, including the impact of adverse economic conditions, could have a material adverse effect on our net sales, gross profit, operating results and cash flows, or lead to significant variability of quarterly or annual operating results. Our profitability and ability to generate cash from operations is principally dependent upon demand for semiconductors, the utilization of our capacity, semiconductor package mix, the average selling price of our services, our ability to manage our capital expenditures and our ability to control our costs including labor, material, overhead and financing costs.

Our net sales, gross profit, operating income and cash flows have historically fluctuated significantly from quarter to quarter as a result of many of the following factors, over which we have little or no control and which we expect to continue to impact our business:

- fluctuation in demand for semiconductors and conditions in the semiconductor industry generally, as well as by specific customers, such as inventory reductions by our customers impacting demand in key markets;
- our ability to achieve our major growth objectives, including: transitioning second-wave customers to advanced packages; expanding our sales to customers in Greater China and, in particular, in the mid-level and entry-level tiers of the mobile device market; and increasing our share of the automotive market;
- changes in our capacity and capacity utilization rates;

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- changes in average selling prices which can occur quickly due to the absence of long-term agreements on price;
- changes in the mix of the semiconductor packaging and test services that we sell;
- the development, transition and ramp to high volume manufacture of more advanced silicon nodes and evolving wafer, packaging and test technologies, may cause production delays, lower manufacturing yields and supply constraints for new wafers and other materials;
- absence of backlog, the short-term nature of our customers' commitments, double bookings by customers and deterioration in customer forecasts and the impact of these factors, including the possible delay, rescheduling and cancellation of large orders, or the timing and volume of orders relative to our production capacity;
- changes in costs, quality, availability and delivery times of raw materials, components and equipment;
- changes in labor costs to perform our services;
- wage inflation and fluctuations in commodity prices, including gold, copper and other precious metals;
- the timing of expenditures in anticipation of future orders;
- changes in effective tax rates;
- the availability and cost of financing;
- intellectual property transactions and disputes;
- high leverage and restrictive covenants;
- warranty and product liability claims and the impact of quality excursions and customer disputes and returns;
- costs associated with legal claims, indemnification obligations, judgments and settlements;
- international events, such as the United Kingdom's vote to leave the European Union, political instability, civil disturbances or environmental or natural events, such as earthquakes like the recent ones in Japan, that impact our operations;
- pandemic illnesses that may impact our labor force and our ability to travel;
- costs of acquisitions and divestitures and difficulties integrating acquisitions;
- our ability to attract and retain qualified personnel to support our global operations;
- fluctuations in foreign exchange rates;
- fluctuations in our manufacturing yields;
- our ability to penetrate new end markets or expand our business in existing end markets;
- dependence on key customers or concentration of customers in certain end markets, such as mobile communications and automotive and
- restructuring charges, asset write-offs and impairments.

It is often difficult to predict the impact of these factors upon our results for a particular period. The downturn in the global economy and the semiconductor industry in 2009 increased the risks associated with the foregoing factors as customer forecasts became more volatile, and there was less visibility regarding future demand and significantly increased uncertainty regarding the economy, credit markets and consumer demand. The slow rate of economic growth in the U.S. and elsewhere and economic uncertainty worldwide could continue to cause volatility in customer forecasts and reduce our visibility regarding future demand in the semiconductor industry. These factors may have a material and adverse effect on our business, liquidity, results of operations, financial condition and cash flows or lead to significant variability of quarterly or

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annual operating results. In addition, these factors may adversely affect our credit ratings which could make it more difficult and expensive for us to raise capital and could adversely affect the price of our securities.

### ***Risks Associated with International Operations - We Depend on Our Factories and Operations in China, Japan, Korea, Malaysia, the Philippines, Portugal and Taiwan. Many of Our Customers' and Vendors' Operations Are Also Located Outside of the U.S.***

We provide packaging and test services through our factories and other operations located in China, Japan, Korea, Malaysia, the Philippines, Portugal and Taiwan. Substantially all of our property, plant and equipment is located outside of the United States. Moreover, many of our customers and the vendors in our supply chain are located outside the U.S. The following are some of the risks we face in doing business internationally:

- changes in consumer demand resulting from deteriorating conditions in local economies;
- regulations and policies imposed by U.S. or foreign governments, such as tariffs, customs, duties and other restrictive trade barriers, antitrust and competition, tax, currency and banking, privacy, labor, environmental, health and safety;
- laws, rules, regulations and policies within China and other countries that may favor domestic companies over non-domestic companies, including customer- or government-supported efforts to promote the development and growth of local competitors;
- the payment of dividends and other payments by non-U.S. subsidiaries may be subject to prohibitions, limitations or taxes in local jurisdictions;
- fluctuations in currency exchange rates, particularly with the recent acquisition of J-Devices;
- political and social conditions, and the potential for civil unrest, terrorism or other hostilities;
- disruptions or delays in shipments caused by customs brokers or government agencies;
- difficulties in attracting and retaining qualified personnel and managing foreign operations, including foreign labor disruptions;
- difficulty in enforcing contractual rights and protecting our intellectual property rights;
- potentially adverse tax consequences resulting from tax laws in the U.S. and in foreign jurisdictions in which we operate and
- local business and cultural factors that differ from our normal standards and practices, including business practices that we are prohibited from engaging in by the Foreign Corrupt Practices Act and other anti-corruption laws and regulations.

In particular, we have significant facilities and other investments in South Korea, and there have been heightened security concerns in recent years stemming from North Korea's nuclear weapon and long-range missile programs as well as its military actions in the region. Furthermore, there has been a history of conflict and a recent rise in tensions within and among other countries in the region.

### ***Competition - We Compete Against Established Competitors in the Packaging and Test Business as Well as Internal Customer Capabilities and May Face Competition from New Competitors, Including Foundries.***

The outsourced semiconductor packaging and test market is very competitive. We face substantial competition from established and emerging packaging and test service providers primarily located in Asia, including companies with significantly greater processing capacity, financial resources, local presence, research and development operations, marketing, technology and other capabilities. We also may face increased competition from domestic companies located in the People's Republic of China, or the PRC, where there are government-supported efforts to promote the development and growth of the local semiconductor industry. For example, STATS ChipPAC was acquired in 2015 by Jiangsu Electronics Technology Co., Ltd., a local PRC company. We may be at a disadvantage in attempting to compete with entities associated with such government-supported initiatives based on their lower cost of capital, access to government resources and

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incentives, preferential sourcing practices, stronger local relationships or otherwise. Our competitors may also have established relationships, or enter into new strategic relationships, with one or more of the large semiconductor companies that are our current or potential customers, or key suppliers to these customers. Consolidation among our competitors could also strengthen their competitive position. For example, Advanced Semiconductor Engineering, Inc. and Siliconware Precision Industries Co., Ltd. have announced that they are scheduled to become sister companies under a new joint holding company in April 2018.

We also face competition from the internal capabilities and capacity of many of our current and potential IDM and foundry customers. In addition, we compete with contract foundries, such as Taiwan Semiconductor Manufacturing Company Limited and Samsung Electronics Co., Ltd., which offer full turnkey services from silicon wafer fabrication through packaging and final test. These semiconductor foundries, which are substantially larger and have greater financial resources than we do, have expanded their operations to include packaging and test services, and may continue to expand these capabilities in the future.

We cannot assure you that we will be able to compete successfully in the future against our existing or potential competitors or that our customers will not rely on internal sources for packaging and test services, or that our business, liquidity, results of operations, financial condition and cash flows will not be adversely affected by such increased competition.

### ***Absence of Backlog - The Lack of Contractually Committed Customer Demand May Adversely Affect Our Sales.***

Our packaging and test business does not typically operate with any material backlog. Our quarterly net sales from packaging and test services are substantially dependent upon our customers' demand in that quarter. None of our customers have committed to purchase any significant amount of packaging or test services or to provide us with binding forecasts of demand for packaging and test services for any future period, in any material amount. In addition, we sometimes experience double booking by customers and our customers often reduce, cancel or delay their purchases of packaging and test services for a variety of reasons including industry-wide, customer-specific and Amkor-specific reasons. This makes it difficult for us to forecast our capacity utilization and net sales in future periods. Since a large portion of our costs is fixed and our expense levels are based in part on our expectations of future sales, we may not be able to adjust costs in a timely manner to compensate for any sales shortfall. If we are unable to adjust costs in a timely manner, our margins, operating results, financial condition and cash flows would be adversely affected.

### ***High Fixed Costs - Due to Our High Percentage of Fixed Costs, We Will Be Unable to Maintain Satisfactory Gross Margins if We Are Unable to Achieve Relatively High Capacity Utilization Rates.***

Our operations are characterized by relatively high fixed costs. Our profitability depends in part not only on pricing levels for our packaging and test services, but also on the efficient utilization of our human resources and packaging and test equipment. Increases or decreases in our capacity utilization can significantly affect gross margins. In periods of low demand, we experience relatively low capacity utilization in our operations, which leads to reduced margins during that period. Transitions between different packaging technologies, such as the transition from gold wirebond to flip chip and copper wirebond packages, can also impact our capacity utilization if we do not efficiently redeploy our equipment for other packaging and test opportunities. For example, in 2011 the migration of some customer demand from wirebond to flip chip packages resulted in under-utilized wirebond assets which negatively impacted our capacity utilization and gross margin. We cannot assure you that we will be able to achieve consistently high capacity utilization, and if we fail to do so, our gross margins will be negatively impacted. If our gross margins decrease, our business, liquidity, results of operations, financial condition and cash flows could be materially adversely affected.

In addition, our fixed operating costs have increased in recent years in part as a result of our efforts to expand our capacity through significant capital expenditures. Forecasted customer demand for which we have made capital investments may not materialize, especially if industry conditions deteriorate. As a result, our sales may not adequately cover fixed costs resulting in reduced profit levels or causing significant losses, both of which may adversely impact our business, liquidity, results of operations, financial condition and cash flows.

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### ***Guidance - Our Failure to Meet Our Guidance or Analyst Projections Could Adversely Impact the Trading Prices of Our Securities.***

We periodically provide guidance to investors with respect to certain financial information for future periods. Securities analysts also periodically publish their own projections with respect to our future operating results. As discussed above under “Fluctuations in Operating Results and Cash Flows - Our Operating Results and Cash Flows Have Varied and May Vary Significantly as a Result of Factors That We Cannot Control,” our operating results and cash flows vary significantly and are difficult to accurately predict. Volatility in customer forecasts and fluctuations in global consumer demand make it particularly difficult to predict future results. To the extent we fail to meet or exceed our own guidance or the analyst projections for any reason, the trading prices of our securities may be adversely impacted. Moreover, even if we do meet or exceed that guidance or those projections, if analysts and investors do not react favorably, or if analysts were to discontinue providing coverage of our company, the trading prices of our securities may be adversely impacted.

### ***Declining Average Selling Prices - Historically There Has Been Downward Pressure on the Prices of Our Packaging and Test Services.***

Prices for packaging and test services have generally declined over time, and sometimes prices can change significantly in relatively short periods of time. We expect downward pressure on average selling prices for our packaging and test services to continue in the future, and this pressure may intensify during downturns in business. If we are unable to offset a decline in average selling prices by developing and marketing new packages with higher prices, reducing our purchasing costs, recovering more of our material cost increases from our customers and reducing our manufacturing costs, our business, liquidity, results of operations, financial condition and cash flows could be materially adversely affected.

### ***Decisions by Our Integrated Device Manufacturer and Foundry Customers to Curtail Outsourcing May Adversely Affect Our Business.***

Historically, we have been dependent on the trend in outsourcing of packaging and test services by IDM customers. Our IDM and foundry customers continually evaluate the need for outsourced services against their own in-house packaging and test services. As a result, at any time and for a variety of reasons, IDMs and foundries may decide to shift some or all of their outsourced packaging and test services to internally sourced capacity.

The reasons IDMs and foundries may shift their outsourced business to internal capacity include:

- their desire to realize higher utilization of their existing packaging and test capacity, especially during downturns in the semiconductor industry;
- their unwillingness to disclose proprietary technology;
- their possession of more advanced packaging and test technologies and
- the guaranteed availability of their own packaging and test capacity.

In addition, to the extent we limit capacity commitments for certain customers, these customers may increase their level of in-house packaging and test capabilities, which could make it more difficult for us to regain their business when we have available capacity.

In a downturn in the semiconductor industry, IDMs and foundries could respond by shifting some or all outsourced packaging and test services to internally serviced capacity on a short-term basis. Also, the IDMs and foundries could curtail or reverse the trend of outsourcing packaging and test services. If we experience a significant loss of IDM or foundry business, it could have a material adverse effect on our business, liquidity, results of operations, financial condition and cash flows, especially during a prolonged industry downturn.

### ***Our Substantial Indebtedness Could Adversely Affect Our Financial Condition and Prevent Us from Fulfilling Our Obligations.***

We have a significant amount of indebtedness, and the terms of the agreements governing our indebtedness allow us and our subsidiaries to incur more debt, subject to certain limitations. As of December 31, 2017, our total debt balance was

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\$1,364.4 million, of which \$123.8 million was classified as a current liability and \$559.4 million was collateralized indebtedness at our subsidiaries. We may consider investments in joint ventures, increased capital expenditures or acquisitions which may increase our indebtedness. If new debt is added to our consolidated debt level, the related risks that we face could intensify.

Our substantial indebtedness could:

- make it more difficult for us to satisfy our obligations with respect to our indebtedness, including our obligations under our indentures to purchase notes tendered as a result of a change in control of Amkor;
- increase our vulnerability to general adverse economic and industry conditions;
- limit our ability to fund future working capital, capital expenditures, research and development and other business opportunities, including joint ventures and acquisitions;
- require us to dedicate a substantial portion of our cash flow from operations to service payments of interest and principal on our debt, thereby reducing the availability of our cash flow to fund future working capital, capital expenditures, research and development expenditures and other general corporate requirements;
- increase the volatility of the price of our common stock;
- limit our flexibility to react to changes in our business and the industry in which we operate;
- place us at a competitive disadvantage to any of our competitors that have less debt;
- limit, along with the financial and other restrictive covenants in our indebtedness, among other things, our ability to borrow additional funds;
- limit our ability to refinance our existing indebtedness, particularly during periods of adverse credit market conditions when refinancing indebtedness may not be available under interest rates and other terms acceptable to us or at all and
- increase our cost of borrowing.

### ***We May Have Difficulty Funding Liquidity Needs.***

We assess our liquidity based on our current expectations regarding sales, operating expenses, capital spending and debt service requirements and other funding needs. Our liquidity is affected by, among other things, the performance of our business, our capital expenditure and other investment levels and our ability to repay debt and other long-term obligations out of our operating cash flows or with the proceeds of debt or equity financings.

We operate in a capital-intensive industry. We had capital expenditures of \$550.9 million in 2017. Servicing our current and future customers requires that we incur significant operating expenses and continue to make significant capital expenditures and other investments, which are generally made in advance of the related revenues and without firm customer commitments. Ultimately the actual amount of our capital expenditures for 2018 and thereafter may vary materially and will depend on several factors. These factors include, among others, the amount, timing and implementation of our capital projects, including those under review and those not yet planned, the performance of our business, economic and market conditions, the cash needs and investment opportunities for the business, the need for additional capacity and facilities and the availability of cash flows from operations or financing.

In addition, we have a significant level of debt, which requires significant scheduled principal and interest payments in the coming years. The sources funding our operations, including making capital expenditures and other investments and servicing principal and interest obligations with respect to our debt, are cash flows from our operations, existing cash and cash equivalents, borrowings under available debt facilities, or proceeds from any additional debt or equity financing.

The health of the worldwide banking system and capital markets affects our liquidity. If financial institutions that have extended credit commitments to us are adversely affected by the conditions of the U.S., foreign or international banking system and capital markets, they may refuse or be unable to fund borrowings under their credit commitments to us. Volatility

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in the banking system and capital markets could also make it difficult or more expensive for us to maintain our existing credit facilities or refinance our debt.

The trading price of our common stock has been, and is likely to continue to be, highly volatile and could be subject to wide fluctuations. Such fluctuations could impact our decision or ability to utilize the equity markets as a potential source of our funding needs in the future.

In addition, there is a risk that we could fail to generate the necessary net income or operating cash flows to meet the funding needs of our business due to a variety of factors, including the other factors discussed in this "Risk Factors" section. If we fail to generate the necessary cash flows or we are unable to access the capital markets when needed, our liquidity may be adversely impacted.

### ***Restrictive Covenants in the Indentures and Agreements Governing Our Current and Future Indebtedness.***

The indentures and agreements governing our existing debt, and debt we may incur in the future, contain, or may contain, affirmative and negative covenants that materially limit our ability to take certain actions, including our ability to incur debt, pay dividends and repurchase stock, make certain investments and other payments, enter into certain mergers and consolidations, engage in sale leaseback transactions and encumber and dispose of assets. In addition, our future debt agreements may contain financial covenants and ratios.

The breach of any of these covenants by us or the failure by us to meet any of the financial ratios or conditions could result in a default under any or all of such indebtedness. If a default occurs under any such indebtedness, all of the outstanding obligations thereunder could become immediately due and payable, which could result in a default under our other outstanding debt and could lead to an acceleration of obligations related to other outstanding debt. The existence of such a default or event of default could also preclude us from borrowing funds under our revolving credit facilities. Our ability to comply with the provisions of the indentures, credit facilities and other agreements governing our outstanding debt and indebtedness we may incur in the future can be affected by events beyond our control and a default under any debt instrument, if not cured or waived, could have a material adverse effect on us.

### ***We Have Significant Severance Plan Obligations Associated With Our Manufacturing Operations in Korea Which Could Reduce Our Cash Flow and Negatively Impact Our Financial Condition.***

Our subsidiary in Korea maintains an unfunded severance plan under which we have an accrued liability of \$153.7 million as of December 31, 2017. The plan covers certain employees that were employed prior to August 1, 2015. In the event of a significant layoff or other reduction in our labor force in Korea, our subsidiary in Korea would be required to make lump-sum severance payments under the plan, which could have a material adverse effect on our liquidity, financial condition and cash flows. See Note 14 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K.

### ***If We Fail to Maintain an Effective System of Internal Controls, We May Not be Able to Accurately Report Financial Results or Prevent Fraud.***

Effective internal controls are necessary to provide reliable financial reports and to assist in the effective prevention of fraud. We must annually evaluate our internal procedures to satisfy the requirements of Section 404 of the Sarbanes-Oxley Act of 2002, which requires management and our independent registered public accounting firm to assess the effectiveness of internal control over financial reporting.

Internal controls may not prevent or detect misstatements because of their inherent limitations, including the possibility of human error, the circumvention or overriding of controls, fraud or corruption. Therefore, even effective internal controls can provide only reasonable assurance with respect to the preparation and fair presentation of financial statements. In addition, projections of any evaluation of effectiveness of internal controls to future periods are subject to the risk that the internal controls may become inadequate because of changes in conditions, or that the degree of compliance with the policies or procedures may deteriorate.



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We assess our internal controls and systems on an ongoing basis, and from time-to-time, we update and make modifications to our global enterprise resource planning system. We have implemented several significant enterprise resource planning modules and expect to implement additional enterprise resource planning modules in the future. In addition, we have implemented new shop floor management systems in certain of our factories and integrated the acquired operations of Amkor Technology Malaysia Sdn. Bhd. into our overall internal control over financial reporting. In December 2015, we acquired the operations of J-Devices, and we integrated those operations into our overall internal control over financial reporting. Although we continue to monitor and assess our internal controls for these systems and operations, there is a risk that deficiencies may occur that could constitute significant deficiencies or, in the aggregate, a material weakness.

In addition, in May 2017, we completed our acquisition of Nanium. We are continuing to integrate the acquired operations into our overall internal control over financial reporting. Although we have extended our oversight and monitoring processes that support internal control over financial reporting to include the acquired operations, there is a risk that deficiencies may occur that could constitute significant deficiencies or in the aggregate a material weakness.

If we fail to remedy any deficiencies or maintain the adequacy of our internal controls, we could be subject to regulatory scrutiny, civil or criminal penalties or shareholder litigation. In addition, failure to maintain adequate internal controls could result in financial statements that do not accurately reflect our operating results or financial condition.

### ***We Face Warranty Claims, Product Return and Liability Risks, the Risk of Economic Damage Claims and the Risk of Negative Publicity if Our Packages Fail.***

Our packages are incorporated into a number of end products, and our business is exposed to warranty claims, product return and liability risks, the risk of economic damage claims and the risk of negative publicity if our packages fail.

We receive warranty claims from our customers which occur from time to time in the ordinary course of our business. If we were to experience an unusually high incidence of warranty claims, we could incur significant costs and our business could be adversely affected. In addition, we are exposed to the product and economic liability risks and the risk of negative publicity affecting our customers. Our sales may decline if any of our customers are sued on a product liability claim. We also may suffer a decline in sales from the negative publicity associated with such a lawsuit or with adverse public perceptions in general regarding our customers' products. Further, if our packages are delivered with defects, we could incur additional development, repair or replacement costs or suffer other economic losses, and our credibility and the market's acceptance of our packages could be harmed.

### ***We Face Risks in Connection with the Continuing Development and Implementation of Changes to, and Maintenance and Security of, Our Management Information Systems.***

We depend on our management information systems for many aspects of our business. Some of our key software has been developed by our own programmers, and this software may not be easily integrated with other software and systems. Our systems may be susceptible to damage, disruptions or shutdowns due to failures during the process of upgrading, replacing or maintaining software, databases or components thereof, power outages, hardware failures, computer viruses, attacks by computer hackers, telecommunication failures, user errors, malfeasance or catastrophic events. In addition, security breaches could result in unauthorized disclosure of confidential information. From time to time we make additions or changes to our management information systems. For example, we have implemented new shop floor systems in certain of our factories, and we are integrating J-Devices' management information systems with our existing systems and processes. In addition, in May 2017, we acquired a factory in Portugal, and have begun to integrate its management information systems into our existing systems and processes. We face risks in connection with current and future projects to install or integrate new management information systems or upgrade our existing systems. These risks include:

- we may face delays in the design and implementation of the system;
- the cost of the systems may exceed our plans and expectations and
- disruptions resulting from the implementation or integration of the systems may impact our ability to process transactions and delay shipments to customers, impact our results of operations or financial condition or harm our control environment.

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Our business could be materially and adversely affected if our management information systems are disrupted or if we are unable to successfully install new systems or improve, upgrade, integrate or expand upon our existing systems.

### ***We Face Risks Trying to Attract and Retain Qualified Employees to Support Our Operations.***

Our success depends to a significant extent upon the continued service of our key senior management, sales and technical personnel, any of whom may be difficult to replace. Competition for qualified employees is intense, and our business could be adversely affected by the loss of the services of any of our existing key personnel, including senior management, as a result of competition or for any other reason. We do not have employment agreements with our key employees, including senior management or other contracts that would prevent our key employees from working for our competitors in the event they cease working for us. We cannot assure you that we will be successful in our efforts to retain key employees or in hiring and properly training sufficient numbers of qualified personnel and in effectively managing our growth. Our inability to attract, retain, motivate and train qualified new personnel could have a material adverse effect on our business.

### ***Difficulties Consolidating and Integrating Our Operations - We Face Challenges as We Integrate Diverse Operations.***

We have experienced, and expect to continue to experience, change in the scope and complexity of our operations resulting primarily from existing and future facility consolidations, strategic acquisitions, joint ventures and other partnering arrangements. Some of the risks from these activities include those associated with the following:

- increasing the scope, geographic diversity and complexity of our operations;
- conforming an acquired company's standards, practices, systems and controls with our operations;
- increasing complexity from combining recent acquisitions of an acquired business;
- unexpected losses of key employees or customers of an acquired business; other difficulties in the assimilation of acquired operations, technologies or products and
- diversion of management and other resources from other parts of our operations and adverse effects on existing business relationships with customers.

In connection with these activities, we may:

- use a significant portion of our available cash;
- issue equity securities, which may dilute the ownership of current stockholders;
- incur substantial debt;
- incur or assume known or unknown contingent liabilities and
- incur large, immediate accounting write offs and face antitrust or other regulatory inquiries or actions.

For example, the businesses we have acquired had, at the time of acquisition, multiple systems for managing their own production, sales, inventory and other operations. Migrating these businesses to our systems typically is a slow, expensive process requiring us to divert significant resources from other parts of our operations. We may continue to face these challenges in the future. For example, in July 2013 and May 2017, we completed the purchase of Amkor Technology Malaysia Sdn. Bhd. and Nanium, respectively. Additionally, we increased our investment in J-Devices to 100% in 2015 through the exercise of additional options. We are now integrating these acquired entities with our existing operations. As a result of the risks discussed above, the anticipated benefits of these or other future acquisitions, consolidations and partnering arrangements may not be fully realized, if at all, and these activities could have a material adverse effect on our business, financial condition and results of operations.

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### ***Dependence on Materials and Equipment Suppliers - Our Business May Suffer If the Cost, Quality or Supply of Materials or Equipment Changes Adversely Including Any Disruption that May Occur in the Supply of Certain Materials due to Regulations and Customer Requirements.***

We obtain from various vendors the materials and equipment required for the packaging and test services performed by our factories. We source most of our materials, including critical materials such as leadframes, laminate substrates and gold wire, from a limited group of suppliers. A disruption to the operations of one or more of our suppliers could have a negative impact on our business. For example, the severe earthquake and tsunami in Japan in 2011 had a significant adverse effect on the electronics industry supply chain by impacting the supply of specialty chemicals, substrates, silicon wafers, equipment and other supplies to the electronics industry. In addition, we purchase the majority of our materials on a purchase order basis. Our business may be harmed if we cannot obtain materials and other supplies from our vendors in a timely manner, in sufficient quantities, at acceptable quality or at competitive prices. Some of our customers are also dependent on a limited number of suppliers for certain materials and silicon wafers. Shortages or disruptions in our customers' supply channels could have a material adverse effect on our business, financial condition, results of operations and cash flows. For example, the shortage in the supply of 28 nanometer wafers to some of our customers in 2012 delayed or otherwise adversely impacted the demand for certain of our advanced packaging and test services.

Rules adopted by the SEC implementing the Dodd-Frank Wall Street Reform and Consumer Protection Act impose diligence and disclosure requirements regarding the use of certain minerals originating from the conflict zones of the Democratic Republic of Congo and adjoining countries in our products. Industry associations and many of our customers have implemented initiatives to improve transparency and accountability concerning the supply of these materials and, in some cases, requiring us to certify that the covered materials we use in our packages do not come from the conflict areas. We may incur additional costs associated with complying with these requirements and customer initiatives. These requirements and customer initiatives could affect the pricing, sourcing and availability of materials used in the manufacture of semiconductor devices, and we cannot assure you that we will be able to obtain conflict-free materials in sufficient quantities and at competitive prices or that we will be able to verify the origin of all of the materials we use in our manufacturing process. If we are unable to meet these requirements and customer initiatives, it could adversely affect our business as some customers may move their business to other suppliers. Our reputation could also be adversely affected.

We purchase new packaging and test equipment to maintain and expand our operations. From time to time, increased demand for new equipment may cause lead times to extend beyond those normally required by equipment vendors. For example, in the past, increased demand for equipment caused some equipment suppliers to only partially satisfy our equipment orders in the normal time frame or to increase prices during market upturns for the semiconductor industry. The unavailability of equipment or failures to deliver equipment on a timely basis could delay or impair our ability to meet customer orders. If we are unable to meet customer orders, we could lose potential and existing customers. Generally, we acquire our equipment on a purchase order basis and do not enter into long-term equipment agreements. As a result, we could experience adverse changes in pricing, currency risk and potential shortages in equipment in a strong market, which could have a material adverse effect on our results of operations.

We are a large buyer of gold and other commodity materials including substrates and copper. The prices of gold and other commodities used in our business fluctuate. Historically, we have been able to partially offset the effect of commodity price increases through price adjustments to some customers and changes in our product designs that reduce the material content and cost, such as the use of shorter, thinner, gold wire and migration to copper wire. However, we typically do not have long-term contracts that permit us to impose price adjustments, and market conditions may limit our ability to do so. Significant price increases may adversely impact our gross margin in future periods to the extent we are unable to pass along past or future commodity price increases to our customers.

### ***Customer Concentration and Loss of Customers - The Loss of Certain Customers or Reduced Orders or Pricing from Existing Customers May Have a Significant Adverse Effect on Our Operations and Financial Results.***

We have derived and expect to continue to derive a large portion of our revenues from a small group of customers during any particular period due in part to the concentration of market share in the semiconductor industry. Our ten largest customers together accounted for 67% of our net sales for the year ended December 31, 2017, and one customer accounted for more than 10% of our consolidated net sales during the period. In addition, we have significant customer concentration within our end markets. The loss of a significant customer, a business combination among our customers, a reduction in orders

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or decrease in price from a significant customer or disruption in any of our significant strategic partnerships or other commercial arrangements may result in a decline in our sales and profitability and could have a material adverse effect on our business, liquidity, results of operations, financial condition and cash flows.

The demand for our services from each customer is directly dependent upon that customer's financial health, level of business activity and purchasing decisions, the quality and price of our services, our cycle time and delivery performance, the customer's qualification of additional competitors on products we package or test and a number of other factors. Each of these factors could vary significantly from year to year resulting in the loss or reduction of customer orders. Our business is likely to remain subject to this variability in order levels, and we cannot assure you that our key customers or any other customers will continue to place orders with us in the future at the same levels as in past periods.

For example, if a key customer decides to purchase wafers from a semiconductor foundry that provides packaging and test services, our business could be reduced if the customer also engages that foundry for related packaging and test services. We cannot assure that customer decisions regarding the purchase of semiconductor wafers will not significantly and adversely impact customer demand for our packaging and test services.

In addition, from time to time we may acquire or build new facilities, such as K5, or migrate existing business among our facilities. In connection with these facility changes, our customers require us to re-qualify the new facilities even though we have already qualified to perform the services at our other facilities. We cannot assure that we will successfully re-qualify or that our customers will not qualify our competitors and move the business for such services.

### ***Capital Expenditures - We Make Substantial Investments in Equipment and Facilities To Support the Demand Of Our Customers, Which May Adversely Affect Our Business If the Demand Of Our Customers Does Not Develop As We Expect or Is Adversely Affected.***

We make significant investments in equipment and facilities in order to service the demand of our customers. For example, we had capital expenditures of \$550.9 million in 2017, \$650.0 million in 2016 and \$538.0 million in 2015. The amount of our capital expenditures depends on several factors, including the performance of our business, our assessment of future industry and customer demand, our capacity utilization levels and availability, our liquidity position and the availability of financing. Our ongoing capital expenditure requirements may strain our cash and short-term asset balances, and, in periods when we are expanding our capital base, we expect that depreciation expense and factory operating expenses associated with our capital expenditures to increase production capacity will put downward pressure on our gross margin, at least over the near term. From time to time, we also make significant capital expenditures based on specific business opportunities with one or a few key customers, and the additional equipment purchased may not be readily usable to support other customers. If demand is insufficient to fill our capacity, or we are unable to efficiently redeploy such equipment, our capacity utilization and gross margin could be negatively impacted. Our capital expenditures or cost per square foot may increase as we transition to new or more advanced packaging and test technologies because, among other things, new equipment used for these technologies is generally more expensive and often our existing equipment cannot be redeployed in whole or part for these technologies.

Furthermore, if we cannot generate or raise additional funds to pay for capital expenditures, particularly in some of the advanced packaging and bumping areas, as well as research and development activities, our growth and future profitability may be adversely affected. Our ability to obtain external financing in the future is subject to a variety of uncertainties, including:

- our future financial condition, results of operations and cash flows;
- general market conditions for financing;
- volatility in fixed income, credit and equity markets and
- economic, political and other global conditions.

The lead time needed to order, install and put into service various capital investments is often significant, and, as a result, we often need to commit to capital expenditures in advance of our receipt of firm orders or advance deposits based on our view of anticipated future demand with only very limited visibility. Although we seek to limit our exposure in this regard, in the past we have from time to time expended significant capital for additional equipment or facilities for which the

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anticipated demand did not materialize for a variety of reasons, many of which were outside of our control. To the extent this occurs in the future, our business, liquidity, results of operations, financial condition and cash flows could be materially adversely affected.

In addition, during periods where customer demand exceeds our capacity, customers may transfer some or all of their business to other suppliers who are able to support their needs. To the extent this occurs, our business, liquidity, results of operations, financial condition and cash flows could be materially adversely affected.

In September 2014, we started the construction of K5. The land purchase agreement includes various construction, investment, hiring, regulatory and other compliance obligations. While we completed the initial phase of construction in December 2016, there can be no assurance regarding when K5 will be fully utilized, or that the actual scope, costs, timeline or benefits of the project will be consistent with our current expectations.

### ***Impairment Charges - Any Impairment Charges Required Under U.S. GAAP May Have a Material Adverse Effect on Our Net Income.***

Under U.S. GAAP, we review our long-lived assets including property, plant and equipment, intellectual property, goodwill and other intangibles for impairment when events or changes in circumstances indicate the carrying value may not be recoverable. In addition, we review goodwill for impairment annually during the fourth quarter of each year. Factors we consider include significant under-performance relative to expected historical or projected future operating results, significant negative industry or economic trends and our market capitalization relative to net book value. We may be required in the future to record a significant charge to earnings in our financial statements during the period in which any impairment of our long-lived assets is determined. Such charges have had and could have a significant adverse impact on our results of operations and our operating flexibility under our debt covenants.

### ***Litigation Incident to Our Business Could Adversely Affect Us.***

We have been a party to various legal proceedings, including those described from time to time in our reports filed with the SEC, and may be a party to legal proceedings in the future. These proceedings could require significant management time and resources and, if an unfavorable ruling or outcome were to occur in these legal proceedings, there could be a material adverse impact on our business, liquidity, results of operations, financial condition, cash flows and the trading price of our securities.

### ***We Could Suffer Adverse Tax and Other Financial Consequences if There Are Changes in Tax Laws or Taxing Authorities Do Not Agree with Our Interpretation of Applicable Tax Laws, Including Whether We Continue to Qualify for Tax Holidays, or if We Are Required to Establish or Adjust Valuation Allowances on Deferred Tax Assets.***

We earn a substantial portion of our income in foreign countries and our operations are subject to tax in multiple jurisdictions with complicated and varied tax regimes. Tax laws and income tax rates in these jurisdictions are subject to change due to economic and political conditions. In addition, organizations such as the Organisation for Economic Co-operation and Development may, from time to time, propose guidelines regarding transfer pricing and other international tax matters relating to multinational companies like Amkor. Changes in U.S. or foreign tax laws arising out of such proposals or otherwise could have a material adverse impact on our liquidity, results of operations, financial condition and cash flows.

Our tax liabilities are based, in part, on our corporate structure, interpretations of various U.S. and foreign tax laws, including withholding tax, compliance with tax holiday requirements, application of changes in tax law to our operations and other relevant laws of applicable taxing jurisdictions. From time to time, taxing authorities may conduct examinations of our income tax returns and other regulatory filings. We cannot assure you that the taxing authorities will agree with our interpretations, including whether we continue to qualify for tax holidays. If they do not agree, we may seek to enter into settlements with the taxing authorities. We may also appeal a taxing authority's determination to the appropriate governmental authorities, but we cannot be sure we will prevail. If we do not prevail or if we enter into settlements with taxing authorities, we may have to make significant payments or otherwise record charges (or reduce tax assets) that adversely affect our results of operations, financial condition and cash flows. Additionally, certain of our subsidiaries operate under tax holidays, which will expire in whole or in part at various dates in the future. As those tax holidays expire, we expect that our tax

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expense will increase as income from those jurisdictions becomes subject to higher statutory income tax rates, thereby reducing our liquidity and cash flow.

We monitor on an ongoing basis our ability to utilize our deferred tax assets and whether there is a need for a related valuation allowance. In evaluating our ability to recover our deferred tax assets, in the jurisdiction from which they arise, we consider all available positive and negative evidence, including scheduled reversals of deferred tax liabilities, projected future taxable income, tax-planning strategies and results of recent operations. For most of our foreign deferred tax assets, we believe that we will have sufficient taxable income to allow us to realize these deferred tax assets. In the event taxable income falls short of current expectations, we may need to establish a valuation allowance against such deferred tax assets that, if required, could materially affect our results of operations.

### ***The Enactment of Recent Tax Reform Could Materially Impact Our Financial Position and Results of Operations for the Period Ending December 31, 2017 and for Subsequent Periods.***

On December 22, 2017, the Tax Cuts and Jobs Act (the “Tax Act”) was signed into law. The Tax Act made significant changes to the U.S. Tax Code. Changes include a reduced corporate tax rate from 35% to 21%, a one-time transition tax on unremitted foreign earnings and profits applicable for our fiscal year ended December 31, 2017, limited tax deductions for interest expense for the period beginning January 1, 2018, and changes to other existing deductions and business-related exclusions in future periods. As a result, in the fourth quarter of 2017, we recognized a one-time net tax benefit of approximately \$41.6 million, primarily due to the release of a valuation allowance against U.S. deferred tax assets that we now expect to realize as a result of the change to the U.S. tax law limiting the deductibility of interest expense. We also incurred charges for the one-time transition tax on our unremitted foreign earnings and profits offset by the anticipated utilization of foreign tax credits. We were also required to re-measure our deferred tax assets based on the new U.S. federal tax rate of 21%. Our provisional estimates and preliminary view of the impact of the Tax Act are uncertain and may be adjusted in future periods as a result of the ongoing analysis of our tax positions and any new guidance from regulators and other interpretations of the law.

### ***Intellectual Property - Our Business Will Suffer if We Are Not Able to Develop New Proprietary Technology, Protect Our Proprietary Technology and Operate Without Infringing the Proprietary Rights of Others.***

The complexity and breadth of semiconductor packaging and test services are rapidly increasing. As a result, we expect that we will need to develop, acquire and implement new manufacturing processes and packaging technologies and tools in order to respond to competitive industry conditions and customer requirements. Technological advances also typically lead to rapid and significant price erosion and may make our existing packages less competitive or our existing inventories obsolete. If we cannot achieve advances in packaging design or obtain access to advanced packaging designs developed by others, our business could suffer.

The need to develop and maintain advanced packaging capabilities and equipment could require significant research and development, capital expenditures and acquisitions in future years. In addition, converting to new packaging designs or process methodologies could result in delays in producing new package types, which could adversely affect our ability to meet customer orders and adversely impact our business.

The process of seeking patent protection takes a long time and is expensive. There can be no assurance that patents will issue from pending or future applications or that, if patents are issued, the rights granted under the patents will provide us with meaningful protection or any commercial advantage. Any patents we do obtain will eventually expire, may be challenged, invalidated or circumvented and may not provide meaningful protection or other commercial advantage to us.

Some of our technologies are not covered by any patent or patent application. The confidentiality agreements on which we rely to protect these technologies may be breached and may not be adequate to protect our proprietary technologies. There can be no assurance that other countries in which we market our services will protect our intellectual property rights to the same extent as the U.S.

Our competitors may develop, patent or gain access to know-how and technology similar or superior to our own. In addition, many of our patents are subject to cross licenses, several of which are with our competitors. The semiconductor industry is characterized by frequent claims regarding the infringement of patent and other intellectual property rights. If any third party makes an enforceable infringement claim against us or our customers, we could be required to:

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- discontinue the use of certain processes or cease to provide the services at issue, which could curtail our business;
- pay substantial damages;
- develop non-infringing technologies, which may not be feasible or
- acquire licenses to such technology, which may not be available on commercially reasonable terms or at all.

We may need to enforce our patents or other intellectual property rights, including our rights under patent and intellectual property licenses with third parties, or defend ourselves against claimed infringement of the rights of others through litigation, which could result in substantial cost and diversion of our resources. Furthermore, if we fail to obtain necessary licenses, our business could suffer, and we could be exposed to claims for damages and injunctions from third parties, as well as claims from our customers for indemnification. In the past, we have been involved in legal proceedings involving the acquisition and license of intellectual property rights, the enforcement of our existing intellectual property rights or the enforcement of the intellectual property rights of others, including settled legal proceedings described in more detail in Note 17 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K. Unfavorable outcomes in any legal proceedings involving intellectual property could result in significant liabilities and could have a material adverse effect on our business, liquidity, results of operations, financial condition and cash flows. The potential impact from the legal proceedings referred to in this Annual Report on Form 10-K on our results of operations, financial condition and cash flows could change in the future.

### ***Packaging and Test Processes Are Complex and Our Production Yields and Customer Relationships May Suffer from Defects in the Services We Provide or if We Do Not Successfully Implement New Technologies.***

Semiconductor packaging and test services are complex processes that require significant technological and process expertise. Defective packages primarily result from:

- contaminants in the manufacturing environment;
- human error;
- equipment malfunction;
- changing processes to address environmental requirements;
- defective raw materials or
- defective plating services.

Test is also complex and involves sophisticated equipment and software. Similar to many software programs, these software programs are complex and may contain programming errors or “bugs.” The test equipment is also subject to malfunction. In addition, the test process is subject to operator error.

These and other factors have, from time to time, contributed to lower production yields. They may also do so in the future, particularly as we adjust our capacity, change our processing steps or ramp new technologies. In addition, we must continue to develop and implement new packaging and test technologies, and expand our offering of packages to be competitive. Our production yields on new packages, particularly those packages which are based on new technologies, typically are significantly lower than our production yields on our more established packages.

Our failure to maintain quality standards or acceptable production yields, if significant and prolonged, could result in loss of customers, increased costs of production, delays, substantial amounts of returned goods and claims by customers relating thereto. Any of these problems could have a material adverse effect on our business, liquidity, results of operations, financial condition and cash flows.

In addition, in line with industry practice, new customers usually require us to pass a lengthy and rigorous qualification process that may take several months. If we fail to qualify packages with potential customers or existing customers, such failure could have a material adverse effect on our business, results of operations, financial condition and cash flows.



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### ***Environmental, Health & Safety Laws and Industry and Customer Initiatives - Future Environmental, Health & Safety Laws and Industry and Customer Initiatives Could Place Additional Burdens on Our Manufacturing Operations.***

The semiconductor packaging process generates byproducts that are subject to extensive governmental regulations. For example, at our foreign facilities we produce liquid waste when semiconductor wafers are diced into chips with the aid of diamond saws, then cooled with running water. In addition, semiconductor packages have historically utilized metallic alloys containing lead (Pb) within the interconnect terminals typically referred to as leads, pins or balls. Environmental, health and safety laws and regulations in places we do business, impose various controls on the use, storage, handling, discharge and disposal of chemicals used in our production processes and on the factories we occupy and are increasingly imposing restrictions on the materials contained in semiconductor products. For example, the European Union's Restriction of Hazardous Substances in Electrical and Electronic Equipment directive and similar laws in other jurisdictions, including China, impose strict restrictions on the placement into the market of electrical and electronic equipment containing lead and certain other hazardous substances. We may become liable under these and other environmental, health and safety laws and regulations, including for the cost of compliance and cleanup of any disposal or release of hazardous materials arising out of our former or current operations, or otherwise as a result of the existence of hazardous materials on our properties or hazardous substances in the products we manufacture. We could also be held liable for damages, including fines, penalties and the cost of investigations and remedial actions, we could be subject to revocation of permits negatively affecting our ability to maintain or expand our operations, and we could suffer reputational harm.

There has also been an increase in public attention and focus on the materials contained in semiconductor products, the environmental impact of semiconductor operations and the risk of chemical releases from such operations, climate change and related environmental concerns. This increased focus on the environmental impact of semiconductor operations and products has caused industry groups and customers to impose additional requirements on us and our suppliers, sometimes exceeding regulatory standards. These requirements include increased tracking and reporting of greenhouse gas emissions, reductions in waste and wastewater from operations, additional reporting on the materials and components used in the products we manufacture, and the use of renewable energy sources in our factory operations. To comply with these additional requirements, we may need to procure additional equipment or make factory or process changes and our manufacturing costs may increase.

### ***Our Business and Financial Condition Could be Adversely Affected by Natural Disasters and Other Calamities, Political Instability, Hostilities, or Other Disruptions.***

We have significant packaging and test and other operations in China, Japan, Korea, Malaysia, the Philippines, Portugal, and Taiwan, which are or could be subject to natural disasters, such as earthquakes, tsunamis, typhoons, floods, droughts, volcanoes and other severe weather and geological events, and other calamities, such as fire; the outbreak of infectious diseases (such as Ebola, SARs or flu); industrial strikes; breakdowns of equipment; difficulties or delays in obtaining materials, equipment, utilities and services; political events or instability; acts of war, armed conflict, terrorist incidents and other hostilities, including any such events that may arise out of increased tensions involving North Korea or in other regions where we have facilities; industrial accidents and other events, that could disrupt or even shutdown our operations. In addition, our suppliers and customers also have significant operations in such locations. In the event of such a disruption or shutdown, we may be unable to reallocate production to other facilities in a timely or cost-effective manner (if at all) and we may not have sufficient capacity to service customer demands in our other facilities. A natural disaster or other calamity, political instability, the occurrence of hostilities or other event that results in a prolonged disruption to our operations, or the operations of our customers or suppliers, could have a material adverse effect on our business, financial condition, results of operations and cash flows.

For example, in April 2016, our Kumamoto factory was damaged by earthquakes in Japan. While production was restored at Kumamoto in the second quarter, our sales in the second quarter were reduced due to the temporary disruption in operations. We also incurred earthquake related costs for damaged inventory, buildings and equipment.

Also, Japan experienced a severe earthquake and tsunami in 2011 that resulted in significant disruption in the electronics industry supply chain and adversely affected Japan's economy and consumer spending. In addition, in October 2011, Thailand experienced substantial flooding which affected the facilities and operations of customers and suppliers in our industry. In addition, some of the processes that we utilize in our operations place us at risk of fire and other damage. For example, highly flammable gases are used in the preparation of wafers holding semiconductor devices for flip chip packaging.



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Although we maintain insurance policies for various types of property, casualty and other risks, we do not carry insurance for all the above referred risks, and with regard to the insurance we do maintain, we cannot assure you that it would be sufficient to cover all of our potential losses. As a result, our business, financial condition, results of operations and cash flows could be adversely affected by natural disasters and other calamities.

### ***Mr. James J. Kim and Members of His Family Can Effectively Determine or Substantially Influence The Outcome of All Matters Requiring Stockholder Approval.***

As of December 31, 2017, Mr. James J. Kim, the Executive Chairman of our Board of Directors, members of Mr. Kim's immediate family and affiliates owned approximately 137.6 million shares, or approximately 57%, of our outstanding common stock. The Kim family also has options to acquire approximately 0.5 million shares. If the options are exercised, the Kim family's total ownership would be an aggregate of approximately 138.1 million shares of our outstanding common stock or approximately 58% of our outstanding common stock.

In June 2013, the Kim family exchanged their convertible notes issued by Amkor for approximately 49.6 million shares of common stock (the "Convert Shares"). The Convert Shares are subject to a voting agreement. The agreement requires the Kim family to vote these shares in a "neutral manner" on all matters submitted to our stockholders for a vote, so that such Convert Shares are voted in the same proportion as all of the other outstanding securities (excluding the other shares owned by the Kim family) that are actually voted on a proposal submitted to Amkor's stockholders for approval. The Kim family is not required to vote in a "neutral manner" any Convert Shares that, when aggregated with all other voting shares held by the Kim family, represent 41.6% or less of the total then-outstanding voting shares of our common stock. The voting agreement for the Convert Shares terminates upon the earliest of (i) such time as the Kim family no longer beneficially owns any of the Convert Shares, (ii) consummation of a change of control (as defined in the voting agreement) or (iii) the mutual agreement of the Kim family and Amkor.

Mr. James J. Kim and his family and affiliates, acting together, have the ability to effectively determine or substantially influence matters submitted for approval by our stockholders by voting their shares or otherwise acting by written consent, including the election of our Board of Directors. There is also the potential, through the election of members of our Board of Directors, that the Kim family could substantially influence matters decided upon by our Board of Directors. This concentration of ownership may also have the effect of impeding a merger, consolidation, takeover or other business consolidation involving us, or discouraging a potential acquirer from making a tender offer for our shares, and could also negatively affect our stock's market price or decrease any premium over market price that an acquirer might otherwise pay. Concentration of ownership also reduces the public float of our common stock. There may be less liquidity and higher price volatility for the stock of companies with a smaller public float compared to companies with broader public ownership. Also, the sale or the prospect of the sale of a substantial portion of the Kim family shares may adversely affect the market price of our stock.

### **Item 1B. *Unresolved Staff Comments***

None.

### **Item 2. *Properties***

Our principal executive offices, which are leased, are located in Tempe, Arizona. The location and size of our manufacturing and research and development facilities are set forth in the table below. All facilities are owned unless otherwise specified. Generally, our facilities are collateral for indebtedness incurred by our subsidiary for the jurisdiction in which the facilities are located.

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	Approximate Facility Size (Square Feet)		
	Owned	Leased	Total
China (1)	1,317,000	—	1,317,000
Japan	1,687,000	525,000	2,212,000
Korea	2,979,000	—	2,979,000
Malaysia (1)	385,000	—	385,000
Philippines (2)	661,000	658,000	1,319,000
Portugal	498,000	—	498,000
Taiwan	864,000	—	864,000
Total all facilities	<u>8,391,000</u>	<u>1,183,000</u>	<u>9,574,000</u>

(1) Land is leased.

(2) As a result of foreign ownership restrictions in the Philippines, the land is leased. A portion of the land we lease is owned by realty companies in which we own a 40% interest.

We believe that our existing properties are in good condition and suitable for the conduct of our business and that the productive capacity of such properties is substantially being utilized or we have plans to utilize it.

### **Item 3. *Legal Proceedings***

From time to time, we may become involved in various disputes and litigation matters that arise in the ordinary course of our business. These include disputes and lawsuits related to intellectual property, acquisitions, licensing, contracts, tax, regulatory, employee relations and other matters. For a discussion of “Legal Proceedings,” see Note 17 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K.

### **Item 4. *Mine Safety Disclosures***

Not applicable.

## **PART II**

### **Item 5. *Market for Registrant’s Common Equity, Related Stockholder Matters and Issuer Purchases of Equity Securities***

#### **LISTING ON THE NASDAQ GLOBAL SELECT MARKET**

Our common stock is traded on the NASDAQ Global Select Market under the symbol “AMKR.” The following table sets forth, for the periods indicated, the high and low sale prices per share of our common stock as quoted on the NASDAQ Global Select Market.

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	High	Low
<b>2017</b>		
First Quarter	\$ 11.59	\$ 9.41
Second Quarter	12.33	9.77
Third Quarter	11.06	8.38
Fourth Quarter	11.57	10.05
<b>2016</b>		
First Quarter	\$ 6.14	\$ 4.13
Second Quarter	6.44	5.37
Third Quarter	9.72	5.60
Fourth Quarter	12.32	9.19

There were approximately 127 holders of record of our common stock as of February 16, 2018.

### **DIVIDEND POLICY**

Since our public offering in 1998, we have never paid a dividend to our stockholders, and we do not have any present plans for doing so. In addition, our U.S. revolving credit agreement and the indentures governing our senior notes limit our ability to pay dividends. Refer to the Liquidity and Capital Resources section in Item 7 of this Annual Report on Form 10-K.

### **RECENT SALES OF UNREGISTERED SECURITIES**

None.

### **EQUITY COMPENSATION PLANS**

The information required by this item regarding equity compensation plans is set forth in Part III, Item 12 of this Annual Report on Form 10-K.

### **PURCHASES OF EQUITY SECURITIES BY THE ISSUER AND AFFILIATED PURCHASERS**

The following table provides information regarding repurchases of our common stock during the three months ended December 31, 2017.

Period	Total Number of Shares Purchased (a)	Average Price Paid Per Share (\$)	Total Number of Shares Purchased as part of Publicly Announced Plans or Programs (b)	Approximate Dollar Value of Shares that May Yet Be Purchased Under the Plans or Programs (\$) (b)
October 1-October 31	—	\$ —	—	\$ 91,586,032
November 1-November 30	5,750	11.39	—	91,586,032
December 1-December 31	—	—	—	91,586,032
Total	5,750	\$ 11.39	—	

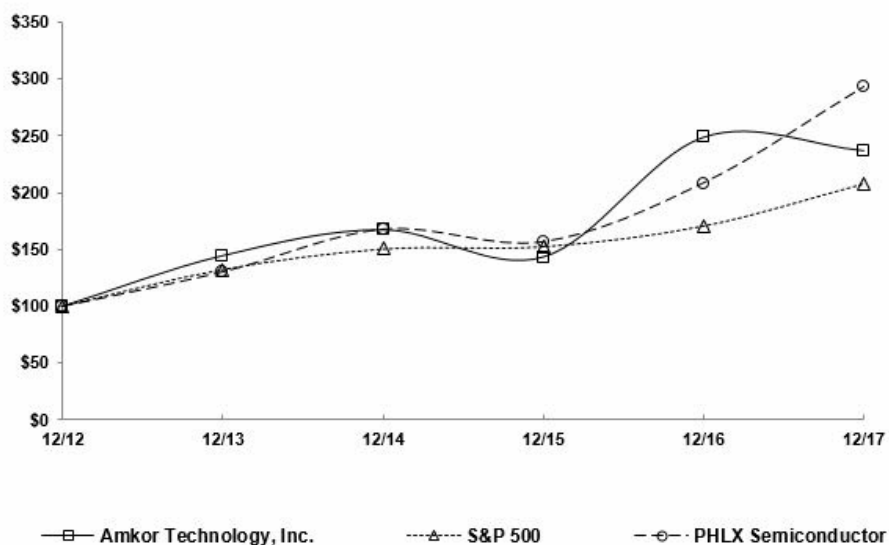
(a) Represents shares of common stock surrendered to us to satisfy tax withholding obligations associated with the vesting of restricted shares issued to employees.

(b) Our Board of Directors previously authorized the repurchase of up to \$300.0 million of our common stock, \$150.0 million in August 2011 and \$150.0 million in February 2012, exclusive of any fees, commissions or other expenses. During 2016 and 2017, we made no common stock purchases, and at December 31, 2017, approximately \$91.6 million was available pursuant to the stock repurchase program.

PERFORMANCE GRAPH (1)

**COMPARISON OF 5 YEAR CUMULATIVE TOTAL RETURN\***

Among Amkor Technology, Inc., the S&P 500 Index and the PHLX Semiconductor Index



\*\$100 invested on 12/31/12 in stock or index, including reinvestment of dividends. Fiscal year ending December 31.

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(1) The preceding Stock Performance Graph is not deemed filed with the SEC and shall not be incorporated by reference in any of our filings under the Securities Act of 1933, as amended, or the Exchange Act, whether made before or after the date hereof and irrespective of any general incorporation language in any such filing.

The following table sets forth the cumulative total returns included in the preceding Stock Performance Graph for the years ended December 31, 2012 through 2017.

	For the Year Ended December 31					
	2012	2013	2014	2015	2016	2017
Amkor Technology, Inc.	\$ 100.00	\$ 144.55	\$ 167.42	\$ 143.37	\$ 248.77	\$ 236.98
S&P 500	100.00	132.39	150.51	152.59	170.84	208.14
PHLX Semiconductor	100.00	130.15	167.68	156.67	208.23	292.66

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**Item 6. Selected Financial Data**

The following selected financial data should be read in conjunction with Management’s Discussion and Analysis of Financial Condition and Results of Operations and our Consolidated Financial Statements in Part II, Item 7 and Item 8, respectively, of this Annual Report on Form 10-K.

**SELECTED HISTORICAL CONSOLIDATED FINANCIAL DATA**

	For the Year Ended December 31				
	2017 (f)	2016 (g)	2015 (g)	2014 (e)	2013 (h)
(In thousands, except per share data)					
<b>Income Statement Data:</b>					
Net sales	\$ 4,186,497	\$ 3,893,635	\$ 2,884,603	\$ 3,129,440	\$ 2,956,450
Gross profit (a)	757,273	695,477	479,265	552,822	544,513
Gain on sale of real estate (b)	(108,109)	—	—	—	—
Operating income	401,313	293,940	164,839	221,460	232,109
Loss on debt retirement (c)	4,835	—	9,560	757	12,330
Income tax expense (d)	38,982	47,853	28,035	33,845	22,646
Equity in earnings of J-Devices (e)	—	—	14,016	31,007	9,452
Net income (a) (e)	264,888	167,304	53,893	133,240	110,793
Net income attributable to Amkor	260,706	164,190	51,098	129,739	108,432
Net income attributable to Amkor per common share:					
Basic	\$ 1.09	\$ 0.69	\$ 0.22	\$ 0.56	\$ 0.58
Diluted	\$ 1.09	\$ 0.69	\$ 0.22	\$ 0.55	\$ 0.50
<b>Other Financial Data:</b>					
Depreciation and amortization	\$ 581,940	\$ 555,186	\$ 494,200	\$ 464,706	\$ 410,346
Payments for property, plant and equipment	550,943	650,038	537,975	681,120	566,256
<b>Balance Sheet Data:</b>					
Cash and cash equivalents	\$ 596,364	\$ 549,518	\$ 523,172	\$ 449,946	\$ 610,442
Working capital	289,081	404,035	299,296	497,358	541,480
Total assets	4,521,509	4,092,086	4,026,428	3,633,918	3,426,166
Non-current liabilities, including debt	1,468,941	1,683,021	1,790,708	1,803,879	1,771,422
Total Amkor stockholders’ equity	1,667,328	1,383,588	1,200,286	1,114,748	952,608

- (a) In January 2015, we reached a resolution to a patent license dispute and entered into a settlement agreement. During 2014 and 2013 we recorded charges of \$75.3 million and \$10.0 million, respectively, to cost of sales and \$13.7 million and \$1.8 million, respectively, to interest expense relating to this patent license dispute.
- (b) In May 2017, we sold the land and buildings comprising our K1 factory for \$142.4 million which resulted in a pre-tax gain of \$108.1 million
- (c) In July 2017, we recorded a loss on debt retirement of \$4.4 million relating to the partial early repayment of our 6.625% Senior Notes due 2021. During 2015, we recorded a loss on debt retirement of \$8.9 million relating to the early repayment of our 7.375% Senior Notes due May 2018. During 2013, we exchanged debt for shares of our common stock and a cash payment and recorded a charge of \$11.6 million.
- (d) In 2017, income tax expense includes an estimated net tax benefit of \$41.6 million primarily due to the reversal of a valuation allowance on certain U.S. deferred tax assets as a result of the enactment of the Tax Act.
- (e) On June 30, 2014, we sold 100% of the shares of our then wholly-owned subsidiary in Japan to J-Devices, our then unconsolidated equity-method joint venture in Japan. Subsequent to June 30, 2014, the results of the divested entity are included in J-Devices’ financial results and in our corresponding equity in earnings of J-Devices. We recognized a net gain on the sale of \$9.2 million in other (income) expense, net. In addition, J-Devices recognized a gain on the

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transaction, which increased our equity in earnings of J-Devices by \$8.8 million. The combined net gain we recognized was \$18.0 million.

- (f) On May 22, 2017, we completed the purchase of Nanium. Their financial results have been included in our Consolidated Financial Statements from the date of acquisition.
- (g) We increased our investment in J-Devices to 60% in 2013 and to 100% on December 30, 2015 through the exercise of additional options. As a result, our accounting for J-Devices changed from the equity method to the consolidation method effective December 30, 2015. Our balance sheet data as of December 31, 2015 reflects the consolidation of J-Devices. We began consolidating the operating results of J-Devices in 2016. We recognized a net loss of \$13.5 million in other (income) expense, net in connection with the acquisition in 2015. The net loss resulted from a loss of \$29.6 million related to the release of certain accumulated foreign currency translation adjustments related to J-Devices, offset by a gain of \$16.1 million related to the step-up to fair value of our previous investments in J-Devices.
- (h) On July 31, 2013, we completed the purchase of Amkor Technology Malaysia Sdn. Bhd. Their financial results have been included in our Consolidated Financial Statements from the date of acquisition.

## **Item 7. *Management's Discussion and Analysis of Financial Condition and Results of Operations***

### **Overview**

Amkor is one of the world's leading providers of outsourced semiconductor packaging and test services. Our financial goals are sales growth and improved profitability. To achieve these goals, we are focused on generating increased value from our investments in advanced technologies, improving utilization of existing assets and selectively growing our scale and scope through strategic investments.

We are an industry leader in developing and commercializing cost-effective advanced packaging and test technologies. These advanced technology solutions provide increased value to our customers. This is particularly true in the mobile communications market, where growth has outpaced the semiconductor industry rate. Advanced packages are now the preferred choice in both the high-end and the mid-range segments of the smartphone market, which together account for a high portion of mobile phone semiconductor value. The demand for advanced packages is also being driven by second-wave mobile device customers, who are transitioning out of wirebond into wafer-level and flip-chip packages. We believe that our technology leadership and this technology transition create significant growth opportunities for us.

We typically look for opportunities in the advanced packaging and test area where we can generate reasonably quick returns on investments made for customers seeking leading edge technologies. We also focus on developing a second wave of customers to fill the capacity that becomes available when leading edge customers transition to newer packaging and test equipment and platforms. For example, we are currently working to expand our sales to Chinese and Taiwanese fabless chip companies that make up a significant portion of the mid-tier and entry-level segments of the mobile device market where much of the growth is occurring. In addition, we are seeking new customers and deepening our engagement with existing customers. This includes an expanded emphasis on the automotive market where semiconductor content continues to grow and in the analog area for our mainstream wirebond technologies.

From time to time, we identify attractive opportunities to grow our customer base and expand the markets we serve. For example, in May 2017, we acquired Nanium, which we expect will strengthen our position in the market for wafer-level fan-out packaging. In 2009, we invested in J-Devices, a joint venture to provide semiconductor packaging and test services in Japan. We increased our investment in J-Devices to 60% in 2013 and to 100% in 2015 through the exercise of additional options. J-Devices is the largest provider of outsourced semiconductor assembly and test services in Japan and is primarily focused in the automotive, industrial and consumer end markets. We believe that selective growth through joint ventures, acquisitions and other strategic investments can help diversify our revenue streams, improve our profits, broaden our portfolio of services and continue our technological leadership.

Our IDM customers include: Intel Corporation; Renesas Electronics Corporation; STMicroelectronics N.V.; Texas Instruments Incorporated and Toshiba Corporation. Our fabless customers include: Broadcom Limited, Qualcomm

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Incorporated and Socionext Inc. Our contract foundry customers include: GlobalFoundries Inc. and Taiwan Semiconductor Manufacturing Company Limited.

As a supplier in the semiconductor industry, our business is cyclical and impacted by broad economic factors. Historically, there has been a strong correlation between world-wide gross domestic product levels, consumer spending and semiconductor industry cycles. The semiconductor industry has experienced significant and sometimes prolonged cyclical upturns and downturns in the past. We cannot predict the timing, strength or duration of any economic slowdown or subsequent economic recovery.

Our net sales, gross profit, operating income, cash flows, liquidity and capital resources have historically fluctuated significantly from quarter to quarter as a result of many factors, including the seasonality of our business, the cyclical nature of the semiconductor industry and other factors discussed in Part 1, Item 1A of this Annual Report on Form 10-K.

We operate in a capital intensive industry and have a significant level of debt. Servicing our current and future customers requires that we incur significant operating expenses and continue to make significant capital expenditures, which are generally made in advance of the related revenues and without firm customer commitments. We fund our operations, including capital expenditures and debt service requirements, with cash flows from operations, existing cash and cash equivalents, borrowings under available credit facilities and proceeds from any additional financing. Maintaining an appropriate level of liquidity is important to our business and depends on, among other things, the performance of our business, our capital expenditure levels and our ability to repay debt out of our operating cash flows or proceeds from debt or equity financings.

### **2017 Financial Highlights**

Our net sales increased \$292.9 million or 7.5% to \$4,186.5 million in 2017 from \$3,893.6 million in 2016. The increase was attributable to strong demand in all of our end markets, particularly mobile communications.

Gross profit increased \$61.8 million in 2017 compared to 2016, attributable to the increase in net sales.

In May 2017, we completed the acquisition of Nanium, a provider of wafer-level fan-out semiconductor packaging solutions. Nanium's financial results have been included in our Consolidated Financial Statements from the date of acquisition.

In May 2017, we sold the land and buildings comprising our K1 factory for \$142.4 million which resulted in a pre-tax gain of \$108.1 million.

In December 2017, we recognized an estimated one-time net tax benefit of \$41.6 million, due to the enactment of the Tax Act. The tax benefit is driven by the reversal of a valuation allowance against certain deferred tax assets.

In 2017, our capital expenditures totaled \$550.9 million, or 13.2% of net sales compared to \$650.0 million, or 16.7% of net sales in 2016. The decrease is primarily related to the completion of construction of our K5 facility in Korea which started operations in 2017.

Net cash provided by operating activities was \$618.3 million for the year ended December 31, 2017, compared to \$729.4 million for the year ended December 31, 2016. This decrease was primarily due to changes in working capital.

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**Results of Operations**

The following table sets forth certain operating data as a percentage of net sales for the periods indicated:

	For the Year Ended December 31		
	2017	2016	2015
Net sales	100.0%	100.0%	100.0%
Materials	36.4%	37.2%	36.6%
Labor	15.6%	15.3%	15.1%
Other manufacturing costs	29.9%	29.6%	31.7%
Gross margin	18.1%	17.9%	16.6%
Operating income	9.6%	7.5%	5.7%
Income before income taxes and equity in earnings of unconsolidated affiliate	7.3%	5.5%	2.4%
Net income attributable to Amkor	6.2%	4.2%	1.8%

**Net Sales**

			Change	
	2017	2016	2017 over 2016	2016 over 2015
(In thousands, except percentages)				
Net sales	\$ 4,186,497	\$ 3,893,635	\$ 292,862	7.5%
			\$ 1,009,032	35.0%

The increase in net sales in 2017 compared to 2016 was due to strong demand across all end markets. The mobile communications market was particularly strong due to an increase in our content in flagship smartphones and improved sales with Greater China fabless customers. We also experienced growth in the automotive and computing end markets.

The increase in net sales in 2016 compared to 2015 was primarily attributable to the consolidation of J-Devices. J-Devices contributed \$913.7 million of net sales for the year ended December 31, 2016. Excluding J-Devices, net sales increased by \$95.3 million primarily due to higher sales in the automotive and mobile communications markets. The increase in the automotive market was driven by increased market share with existing customers and increasing semiconductor content in vehicles. The increase in the mobile communications market was attributable to strength in smartphones across multiple tiers.

**Gross Profit and Gross Margin**

			Change	
	2017	2016	2017 over 2016	2016 over 2015
(In thousands, except percentages)				
Gross profit	\$ 757,273	\$ 695,477	\$ 61,796	\$ 216,212
Gross margin	18.1%	17.9%	0.2%	1.3%

Our cost of sales consists principally of materials, labor, depreciation and manufacturing overhead. Since a substantial portion of the costs at our factories is fixed, there tends to be a strong relationship between our revenue levels and gross margin where relatively modest increases or decreases can have a significant effect.

Gross profit and gross margin for 2017 increased compared to 2016, primarily due to the increase in net sales. Manufacturing costs increased due to higher unit volumes, increased employee compensation costs, and our factory consolidation efforts in Japan.

Gross profit for 2016 increased compared to 2015, primarily due to the increase in net sales and favorable foreign currency movements. J-Devices contributed \$137.9 million in gross profit for the year ended December 31, 2016. Gross margin increased for 2016 compared to 2015, primarily due to higher net sales and favorable foreign currency movements. The



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increase was partially offset by higher net sales generated from mainstream packages, which have lower gross margin, as a result of the consolidation of J-Devices.

### *Selling, General and Administrative Expenses*

	2017	2016	2015	Change			
				2017 over 2016	2016 over 2015		
(In thousands, except percentages)							
Selling, general and administrative	\$ 297,455	\$ 284,331	\$ 232,409	\$ 13,124	4.6%	\$ 51,922	22.3%

Selling, general and administrative expenses increased in 2017 compared to 2016 primarily due to higher employee compensation costs, partially offset by net proceeds received from a one-time legal settlement in April 2017.

Selling, general and administrative expenses increased in 2016 compared to 2015 as a result of the consolidation of J-Devices, which accounted for \$56.3 million in selling, general and administrative expenses. Excluding J-Devices, selling, general and administrative expenses for 2016 decreased primarily due to general cost savings and lower depreciation expense. These decreases were partially offset by higher employee incentive compensation costs.

### *Research and Development*

	2017	2016	2015	Change			
				2017 over 2016	2016 over 2015		
(In thousands, except percentages)							
Research and development	\$ 166,614	\$ 117,206	\$ 82,017	\$ 49,408	42.2%	\$ 35,189	42.9%

Research and development activities are focused on developing new packaging solutions and test services and improving the efficiency and capabilities of our existing production processes. The costs related to our technology and product development projects are included in research and development expense until the project moves into production. Once production begins, the costs related to production become part of the cost of goods sold, including ongoing depreciation for the equipment previously held for research and development activities. Research and development expenses increased in 2017 over 2016, and 2016 over 2015, primarily due to increases in development activities and the related employee compensation costs and depreciation resulting from continued investments in equipment, in each of those periods. The increase in 2017 over 2016 was primarily due to development and other costs associated with our new K5 factory and research and development facility in Korea. The increase in each period was partially offset by the reduction in costs for projects that moved into production. In addition, the consolidation of J-Devices added \$18.3 million in research and development expenses for the year ended December 31, 2016.

### *Other Income and Expense*

	2017	2016	2015	Change			
				2017 over 2016	2016 over 2015		
(In thousands, except percentages)							
Interest expense, including related party	\$ 85,554	\$ 84,637	\$ 86,376	\$ 917	1.1%	\$ (1,739)	(2.0)%
Foreign currency (gain) loss, net	11,823	(3,592)	(7,849)	15,415	>(100)%	4,257	(54.2)%
Other (income) expense, net	66	(2,262)	18,400	2,328	>100%	(20,662)	>(100)%
Total other expense, net	\$ 97,443	\$ 78,783	\$ 96,927	\$ 18,660	23.7%	\$ (18,144)	(18.7)%

We ceased capitalizing interest in connection with the construction of our K5 factory and research and development facility in Korea in the first quarter of 2016, which resulted in an increase in interest expense in 2017. This increase was partially offset by the early redemption of our 6.625% Senior Notes due 2021 in July 2017. The decrease in interest

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expense in 2016 compared to 2015 was primarily due to the June 2015 repayment of our 7.375% Senior Notes due May 2018 which was funded by lower cost debt, offset by the ceasing of interest capitalization discussed above.

We recorded a foreign currency loss, net in 2017, primarily due to the unfavorable exchange rate movements, mainly the Korean Won, and the associated impact on our net monetary exposure at our foreign subsidiaries. In 2016 and 2015, we recognized net foreign currency gains as a result of favorable exchange rate movements and the associated impact on our net monetary exposure at our foreign subsidiaries.

The early repayment of our 6.625% Senior Notes due 2021 in July 2017 resulted in a loss on debt retirement of \$4.4 million, which was included in other (income) expense, net, offset by an increase in interest income in 2017. In 2015, other (income) expense, net included a net loss of \$13.9 million on the acquisition of the remaining interest of J-Devices and a loss on debt retirement of \$8.9 million relating to the repayment in full of our 7.375% Senior Notes due May 2018 with proceeds from lower cost debt in June 2015.

### **Income Tax Expense**

	2017	2016	2015	Change	
				2017 over 2016	2016 over 2015
	(In thousands, except percentages)				
Income tax expense	\$ 38,982	\$ 47,853	\$ 28,035	\$ (8,871)	\$ 19,818
Effective tax rate	12.8%	22.2%	41.3%		

Generally, our effective tax rate is below the U.S. federal tax rate of 35% because the majority of our income is taxed in foreign jurisdictions in the Asia Pacific region where we benefit from tax holidays or tax rates lower than the U.S. statutory rate. Our income tax expense includes foreign withholding taxes and minimum taxes. The effective income tax rate for 2015 was higher than 2017 and 2016 due primarily to losses in jurisdictions where there was no associated tax benefit.

The effective tax rate in 2017 includes an estimated one-time net tax benefit of \$41.6 million based on our analysis of the impact of the Tax Act. The components of the one-time benefit include the release of a valuation allowance against U.S. deferred tax assets that we now expect to realize as a result of the change to the U.S. tax law limiting the deductibility of interest expense. We also incurred charges for the one-time transition tax on our unremitted foreign earnings and profits offset by the anticipated utilization of foreign tax credits. We were also required to remeasure our deferred tax assets based on the new U.S. federal tax rate of 21%.

Our income tax expense reflects the applicable tax rates in effect in the various countries in which our income is earned and is subject to volatility depending on the relative mix of earnings in each location. During 2017, 2016 and 2015, our subsidiaries in Korea, Malaysia, the Philippines, Singapore and Taiwan operated under various tax holidays. The tax holiday granted to certain operations in Taiwan expired as of December 31, 2017. The tax holidays granted to our Malaysia operations and certain operations in the Philippines expire during 2018. As these tax holidays expire, income earned in those jurisdictions will be subject to higher statutory income tax rates, which may cause our effective tax rate to increase.

See Note 6 to our Consolidated Financial Statements included in Part II, Item 8 of this Annual Report on Form 10-K for additional information about our income tax expense.

### **Equity in Earnings of J-Devices**

On December 30, 2015, we increased our ownership in J-Devices from 65.7% to 100% through the exercise of existing options. As a result, our accounting for J-Devices changed from the equity method to the consolidation method effective at the time of acquisition on December 31, 2015. There is no equity in earnings of J-Devices subsequent to this date.

### **Liquidity and Capital Resources**

We assess our liquidity based on our current expectations regarding sales, operating expenses, capital spending, debt service requirements and other funding needs. Based on this assessment, we believe that our cash flow from operating activities, together with existing cash and cash equivalents and availability under our credit facilities, will be sufficient to fund our

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working capital, capital expenditure, debt service and other financial requirements for at least the next twelve months. Our liquidity is affected by, among other things, volatility in the global economy and credit markets, the performance of our business, our capital expenditure levels, other uses of our cash including any purchases of stock under our stock repurchase program, any acquisitions or investments in joint ventures and our ability to either repay debt out of operating cash flow or refinance it at or prior to maturity with the proceeds of debt or equity offerings. There can be no assurance that we will generate the necessary net income or operating cash flows, or be able to borrow sufficient funds, to meet the funding needs of our business beyond the next twelve months due to a variety of factors, including the cyclical nature of the semiconductor industry and other factors discussed in Part I, Item 1A of this Annual Report on Form 10-K.

Our primary source of cash and the source of funds for our operations are cash flows from operations, current cash and cash equivalents, borrowings under available credit facilities and proceeds from any additional debt or equity financings. As of December 31, 2017, we had cash and cash equivalents of \$596.4 million. Included in our cash balance as of December 31, 2017, is \$444.6 million held offshore by our foreign subsidiaries. We have the ability to access cash held offshore by our foreign subsidiaries through the repayment of intercompany debt obligations. Due to the changes in U.S. tax law, distributions of cash to the U.S. as dividends in the future will not be subject to U.S. income tax. If we were to distribute this offshore cash to the U.S. as dividends from our foreign subsidiaries, we may be subject to foreign withholding and state income taxes of approximately \$18.9 million.

The borrowing base under our \$200.0 million first lien senior secured revolving credit facility is limited to the amount of our eligible accounts receivable. As of December 31, 2017, we had availability of \$199.4 million under this facility, after reduction of \$0.6 million of outstanding standby letters of credit. Our foreign subsidiaries had \$19.0 million available to be drawn under secured revolving credit facilities and \$70.2 million available to be borrowed under secured term loan credit facilities for working capital purposes and capital expenditures. In April 2017, we borrowed \$75.0 million on our revolving credit facility in Korea and repaid the outstanding balance of \$80.0 million on our term loan due May 2020.

As of December 31, 2017, we had \$1,364.4 million of debt. Our scheduled principal repayments on debt include \$123.8 million due in 2018, \$173.6 million due in 2019, \$326.6 million due in 2020, \$210.6 million due in 2021 and \$530.7 million due in 2022. We were in compliance with all debt covenants at December 31, 2017, and we expect to remain in compliance with these covenants for at least the next twelve months.

In July 2017, we redeemed \$200.0 million of the outstanding \$400.0 million of our 6.625% Senior Notes due 2021. The note redemption was funded with cash on hand. We refer you to Note 13 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K for additional information.

In certain foreign locations, we use non-recourse factoring arrangements with third party financial institutions to manage our working capital and cash flows. Under this program, we sell receivables to a financial institution for cash at a discount to the face amount. Available capacity under these programs is dependent on the level of our trade accounts receivable eligible to be sold, the financial institutions' willingness to purchase such receivables and the limits provided by the financial institutions. As such, these factoring arrangements can be reduced or eliminated at any time due to market conditions and changes in the credit worthiness of customers. For the year ended December 31, 2017 and 2016, we sold accounts receivable totaling \$611.2 million and \$574.1 million, net of discounts and fees of \$4.6 million and \$2.5 million, respectively.

In order to reduce our debt and future cash interest payments, we may from time to time repurchase our outstanding notes for cash or exchange shares of our common stock for our outstanding notes. Any such transaction may be made in the open market, through privately negotiated transactions or otherwise and is subject to the terms of our indentures and other debt agreements, market conditions and other factors.

Certain debt agreements have restrictions on dividend payments and the repurchase of stock and subordinated securities. These restrictions are determined in part by calculations based upon cumulative net income. We have never paid a dividend to our stockholders and we do not have any present plans for doing so. From time to time, Amkor Technology, Inc. also guarantees certain debt of our subsidiaries.

Our subsidiary in Korea maintains an unfunded severance plan that covers certain employees that were employed prior to August 1, 2015. As of December 31, 2017, the severance liability was \$153.7 million. Accrued severance benefits are estimated assuming all eligible employees were to terminate their employment at the balance sheet date. For service periods

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subsequent to August 1, 2015, employees participate in either a defined benefit pension plan or a defined contribution pension plan.

Under the terms of a January 2015 patent license litigation settlement, Amkor agreed to pay a total of \$155.0 million in 16 equal quarterly recurring payments commencing in the first quarter of 2015 and continuing through the fourth quarter of 2018. As of December 31, 2017, we owe \$38.8 million under the settlement agreement.

We operate in a capital-intensive industry. Servicing our current and future customers may require that we incur significant operating expenses and make significant investments in equipment and facilities, which are generally made in advance of the related revenues and without firm customer commitments.

Our Board of Directors previously authorized the repurchase of up to \$300.0 million of our common stock, exclusive of any fees, commissions or other expenses. At December 31, 2017, approximately \$91.6 million was available to repurchase common stock pursuant to the stock repurchase program. The purchase of stock may be made in the open market or through privately negotiated transactions. The timing, manner, price and amount of any repurchases will be determined by us at our discretion and will depend upon a variety of factors including economic and market conditions, the cash needs and investment opportunities for the business, the current market price of our stock, applicable legal requirements and other factors. We have not purchased any stock under the plan since 2012.

### **Investments**

We make significant capital expenditures in order to service the demand of our customers, which is primarily focused on investments in advanced packaging and test equipment. In 2017, our capital expenditures totaled \$550.9 million or approximately 13.2% of net sales.

We expect that our 2018 capital expenditures will be approximately \$600 million. Ultimately, the amount of our 2018 capital expenditures will depend on several factors including, among others, the timing and implementation of any capital projects under review, the performance of our business, economic and market conditions, the cash needs and investment opportunities for the business, the need for additional capacity to service anticipated customer demand and the availability of cash flows from operations or financing.

In addition, we are subject to risks associated with our capital expenditures, including those discussed in Part I, Item 1A of this Annual Report on Form 10-K under the caption "Capital Expenditures - We Make Substantial Investments in Equipment and Facilities To Support the Demand Of Our Customers, Which May Adversely Affect Our Business If the Demand Of Our Customers Does Not Develop As We Expect or Is Adversely Affected."

### **Cash Flows**

Net cash provided by (used in) operating, investing and financing activities for each of the three years ended December 31, 2017 was as follows:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Operating activities	\$ 618,267	\$ 729,402	\$ 584,975
Investing activities	(454,832)	(589,427)	(514,990)
Financing activities	(124,886)	(112,179)	2,613

*Operating activities:* Our cash flow provided by operating activities for the year ended December 31, 2017, decreased by \$111.1 million compared to the year ended December 31, 2016, primarily due to changes in working capital, partially offset by higher sales and gross profit. Our cash flow provided by operating activities for the year ended December 31, 2016, increased by \$144.4 million compared to the year ended December 31, 2015. J-Devices contributed \$120.0 million of operating cash flow for the year ended December 31, 2016. Excluding J-Devices, our operating cash flow increased in 2016 primarily due to higher sales and gross profit.

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*Investing activities:* Our cash flow used in investing activities are principally for payments for property, plant and equipment, which decreased compared to the prior year primarily due to the completion of the initial phase of K5 construction in December 2016. The net cash used in investing activities for the year ended December 31, 2017, also included a payment for the acquisition of Nanium and receipt of the remaining proceeds for the sale of the K1 factory in Korea.

*Financing activities:* The net cash used in financing activities for the year ended December 31, 2017 was primarily driven by the partial redemption of our Senior Notes due 2021, partially offset by the net borrowings in China and Japan. The net cash used in financing activities during 2016 primarily resulted from repayments of our debt and revolving credit facility, offset by borrowings in Japan and Korea.

We provide the following supplemental data to assist our investors and analysts in understanding our liquidity and capital resources. We define free cash flow as net cash provided by operating activities less payments for property, plant and equipment, plus proceeds from the sale of and insurance recovery for property, plant and equipment, if applicable. Free cash flow is not defined by U.S. GAAP. We believe free cash flow to be relevant and useful information to our investors because it provides them with additional information in assessing our liquidity, capital resources and financial operating results. Our management uses free cash flow in evaluating our liquidity, our ability to service debt and our ability to fund capital expenditures. However, free cash flow has certain limitations, including that it does not represent the residual cash flow available for discretionary expenditures since other, non-discretionary expenditures, such as mandatory debt service, are not deducted from the measure. The amount of mandatory versus discretionary expenditures can vary significantly between periods. This measure should be considered in addition to, and not as a substitute for, or superior to, other measures of liquidity or financial performance prepared in accordance with U.S. GAAP, such as net cash provided by operating activities. Furthermore, our definition of free cash flow may not be comparable to similarly titled measures reported by other companies.

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Net cash provided by operating activities	\$ 618,267	\$ 729,402	\$ 584,975
Payments for property, plant and equipment	(550,943)	(650,038)	(537,975)
Proceeds from sale of and insurance recovery for property, plant and equipment	141,530	60,801	6,945
Free cash flow	\$ 208,854	\$ 140,165	\$ 53,945

### Contractual Obligations

The following table summarizes our contractual obligations at December 31, 2017, and the effect such obligations are expected to have on our liquidity and cash flow in future periods.

	Total	Payments Due for Year Ending December 31,					
		2018	2019	2020	2021	2022	Thereafter
	(In thousands)						
Total debt	\$ 1,365,533	\$ 123,848	\$ 173,649	\$ 326,649	\$ 210,649	\$ 530,738	\$ —
Scheduled interest payment obligations (1)	255,162	66,274	63,516	51,689	40,197	33,486	—
Purchase obligations (2)	143,902	131,860	2,244	1,863	1,592	1,591	4,752
Operating lease obligations	109,826	26,439	21,740	13,694	10,530	8,468	28,955
Severance obligations (3)	153,735	15,190	13,594	12,248	11,061	9,971	91,671
Settlement payments (4)	38,750	38,750	—	—	—	—	—
Total contractual obligations	\$ 2,066,908	\$ 402,361	\$ 274,743	\$ 406,143	\$ 274,029	\$ 584,254	\$ 125,378

(1) Scheduled interest payment obligations were calculated using stated coupon rates for fixed-rate debt and interest rates applicable at December 31, 2017, for variable-rate debt.

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- (2) Represents off-balance sheet purchase obligations for capital expenditures and long-term supply contracts outstanding at December 31, 2017.
- (3) Represents estimated benefit payments for our Korean subsidiary severance plan.
- (4) Represents settlement payments for patent license litigation. At December 31, 2017, the total obligation is \$38.8 million of which \$37.8 million is a current liability and \$1.0 million will be imputed into interest over time.

In addition to the obligations identified in the table above, other non-current liabilities recorded in our Consolidated Balance Sheet at December 31, 2017, include:

- \$43.4 million of foreign pension plan obligations, for which the timing and actual amount of impact on our future cash flow is uncertain.
- \$29.0 million net liability associated with unrecognized tax benefits. Due to the uncertainty regarding the amount and the timing of any future cash outflows associated with our unrecognized tax benefits, we are unable to reasonably estimate the amount and period of ultimate settlement, if any, with the various taxing authorities.

### **Off-Balance Sheet Arrangements**

As of December 31, 2017, we had no off-balance sheet guarantees or other off-balance sheet arrangements as defined in Item 303(a)(4)(ii) of SEC Regulation S-K.

### **Other Contingencies**

We refer you to Note 17 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K for a discussion of our contingencies related to litigation and other legal matters.

### **Critical Accounting Policies and Use of Estimates**

We have identified the policies below as critical to our business operations and the understanding of our results of operations. A summary of our significant accounting policies used in the preparation of our Consolidated Financial Statements appears in Note 1 to our Consolidated Financial Statements included in Part II, Item 8 of this Annual Report on Form 10-K. Our preparation of this Annual Report on Form 10-K requires us to make estimates and assumptions that affect the reported amount of assets and liabilities, disclosure of contingent assets and liabilities at the date of our financial statements and the reported amounts of revenue and expenses during the reporting period. There can be no assurance that actual results will not differ from those estimates.

We believe the following critical accounting estimates and policies, which have been reviewed with the Audit Committee of our Board of Directors, affect our more significant judgments and estimates used in the preparation of our Consolidated Financial Statements.

*Acquisitions.* We account for businesses we acquire using the acquisition method of accounting and record the underlying net assets at their respective acquisition-date fair values. The accounting for acquisitions requires us to make significant estimates and assumptions, including those with respect to future cash flows, discount rates and asset lives, and therefore requires considerable judgment. These determinations affect the amount of depreciation and amortization expense recognized in future periods. Our estimates of fair value are based upon assumptions believed to be reasonable; however, they are inherently uncertain and unpredictable.

*Revenue Recognition.* We recognize revenue from our packaging and test services, net of value-added or other similar taxes, when there is evidence of an arrangement, delivery has occurred or services have been rendered, fees are fixed or determinable and collectibility is reasonably assured. Generally, these criteria are met and revenue is recognized upon shipment or, in some cases, customer acceptance. If the revenue recognition criteria are not met, we defer the revenue. Deferred revenue generally results from two types of transactions: contractual invoicing at interim points in the packaging and test process prior to shipment of the finished product and customer advances for supply agreements with customers where we commit capacity in exchange for customer prepayment of services. These prepayments are deferred and recorded as customer advances within accrued expenses and other non-current liabilities.

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We generally do not take ownership of customer-supplied semiconductor wafers. Title and risk of loss remains with the customer for these materials at all times. Accordingly, the cost of the customer-supplied materials is not included in our Consolidated Financial Statements.

An allowance for sales credits is recorded as a reduction to sales and accounts receivable during the period of sale such that accounts receivable is reported at its estimated net realizable value. The allowance for sales credits is an estimate of the future credits we will issue for billing adjustments primarily for invoicing corrections and miscellaneous customer claims and is estimated based upon recent credit issuance, historical experience and specific identification of known or expected sales credits at the end of the reporting period. Additionally, provisions are made for doubtful accounts when there is doubt as to the collectibility of accounts receivable. The allowance for doubtful accounts is recorded as bad debt expense and is classified as selling, general and administrative expense. The allowance for doubtful accounts is based upon specific identification of doubtful accounts considering the age of the receivable balance, the customer's historical payment history and current credit worthiness as well as specific identification of any known or expected collectibility issues. Historically, our allowance for doubtful accounts has been immaterial.

*Income Taxes.* We operate in and file income tax returns in various U.S. and non-U.S. jurisdictions which are subject to examination by tax authorities. The tax returns for years where the statute of limitations remains open in all jurisdictions in which we do business are subject to change upon examination. We believe that we have estimated and provided adequate accruals for potential additional taxes and related interest expense that may ultimately result from such examinations. We believe that any additional taxes or related interest over the amounts accrued will not have a material effect on our financial condition, results of operations or cash flows. However, resolution of these matters involves uncertainties and there can be no assurance that the outcomes will be favorable. In addition, changes in the mix of income from our foreign subsidiaries, expiration of tax holidays or changes in tax laws or regulations could result in increased effective tax rates in the future.

Additionally, we monitor on an ongoing basis our ability to utilize our deferred tax assets and whether there is a need for a related valuation allowance. In evaluating our ability to recover our deferred tax assets in the jurisdictions from which they arise, we consider all available positive and negative evidence, including scheduled reversals of deferred tax liabilities, projected future taxable income, tax planning strategies and results of recent operations. For most of our foreign deferred tax assets, we consider it more likely than not that we will have sufficient taxable income to allow us to realize these deferred tax assets. However, in the event taxable income falls short of current expectations, we may need to establish a valuation allowance against such deferred tax assets. We have valuation allowances on select deferred tax assets in certain foreign jurisdictions, including Portugal. In prior years, we maintained a valuation allowance on all of our U.S. net deferred tax assets, including our U.S. net operating loss carryforwards. During the fourth quarter of 2017, we determined it was more likely than not that we will have sufficient taxable income to allow us to realize a substantial portion of our U.S. deferred tax assets. Our evaluation considered, among other factors, limitations on the deductibility of interest expense in connection with the Tax Act.

ASC 740, Accounting for Income Taxes, requires companies to recognize the effect of tax law changes in the period of enactment even though the effective date for most provisions is for tax years beginning after December 31, 2017. Given the significance of the Tax Act, the SEC staff issued Staff Accounting Bulletin No. 118, which allows registrants to record provisional amounts during a one year "measurement period" similar to that used when accounting for business combinations. However, the measurement period is deemed to have ended earlier when the registrant has obtained, prepared and analyzed the information necessary to finalize its accounting. During the measurement period, impacts of the law are expected to be recorded at the time a reasonable estimate for all or a portion of the effects can be made, and provisional amounts can be recognized and adjusted as information becomes available, prepared or analyzed.

We have reported provisional amounts for the income tax effects of the Tax Act for which the accounting is incomplete but a reasonable estimate could be determined. There were no specific impacts of the Tax Act that could not be reasonably estimated. Our estimate of the impact of the Tax Act may be adjusted throughout the allowable measurement period as we collect additional information, prepare and analyze the information and evaluate any regulatory guidance or clarifications. Our review is expected to include:

- One-time transition tax: Further information is required to substantiate the underlying data supporting foreign earnings and profits, foreign tax credits, and amounts held in liquid and illiquid assets at various measurement

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dates. Changes to our provisional estimates and further analysis could impact our judgments, elections and assertions.

- Remeasurement of deferred tax assets and liabilities: Further analysis is required to calculate the impact on the related account balances including the impact of complex new provisions which include the Base Erosion Anti-abuse Tax and Global Intangible Low-Taxed Income (“GILTI”), designed to subject certain foreign earnings to U.S. tax.
- Valuation allowances: We have assessed whether valuation allowance analyses for deferred tax assets are affected by various aspects of the Tax Act (for example one-time transition tax, GILTI, new categories of foreign tax credits). Since we have recorded provisional amounts related to the provisions of the Tax Act, any corresponding determination of the need for a change in a valuation allowance is also provisional.

*Valuation of Inventory.* We order raw materials based on customers’ forecasted demand. If our customers change their forecasted requirements and we are unable to cancel our raw materials order or if our vendors require that we order a minimum quantity that exceeds the current forecasted demand, we will experience a build-up in raw material inventory. We will either seek to recover the cost of the materials from our customers or utilize the inventory in production. However, we may not be successful in recovering the cost from our customers or be able to use the inventory in production and, accordingly, if we believe that it is probable that we will not be able to recover such costs, we reduce the carrying value of our inventory. Additionally, we reduce the carrying value of our inventories for the cost of inventory we estimate is excess and obsolete based on the age of our inventories. When a determination is made that the inventory will not be utilized in production or is not saleable, it is written-off.

Inventories are stated at the lower of cost and net realizable value. Cost is principally determined by standard cost or the weighted moving average method, both of which approximate actual cost. For inventory valued using the standard cost method, we review and set our standard costs as needed, but at a minimum on an annual basis.

*Valuation of Long-lived Assets.* We review long-lived assets, which include property, plant and equipment and goodwill, for impairment whenever events or changes in circumstances indicate that the carrying amount may not be recoverable. Factors we consider important which could trigger an impairment review include the following:

- significant under-performance relative to expected historical or projected future operating results;
- significant changes in the manner of our use of the asset;
- significant negative industry or economic trends and
- our market capitalization relative to net book value.

Recoverability of a long-lived asset group to be held and used in operations is measured by a comparison of the carrying amount to the sum of the undiscounted cash flows expected to result from the use and eventual disposition of the asset group. If such asset group is considered to be impaired, the impairment loss is measured as the amount by which the carrying amount of the asset group exceeds its fair value. Long-lived assets to be disposed of are carried at the lower of cost or fair value less the costs of disposal.

We review goodwill for impairment annually during the fourth quarter of each year and whenever events or changes in circumstances indicate that an impairment may exist. Impairment losses are recorded when the carrying amount of the reporting unit exceeds its fair value.

### *Recently Adopted and Recently Issued Standards*

For information regarding recently adopted and recently issued accounting standards, see Note 2 to our Consolidated Financial Statements included in Part II, Item 8 of this Annual Report on Form 10-K.

### **Item 7A. *Quantitative and Qualitative Disclosures about Market Risk***

#### **Market Risk Sensitivity**

We are exposed to market risks, primarily related to foreign currency and interest rate fluctuations. In the normal course of business, we employ established policies and procedures to manage the exposure to fluctuations in foreign currency



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values and changes in interest rates. Our use of derivative instruments, including forward exchange contracts, has been historically insignificant; however, we continue to evaluate the use of hedging instruments to manage currency and other risks.

### ***Foreign Currency Risk***

In order to reduce our exposure to foreign currency gains and losses, we generally use natural hedging techniques to reduce foreign currency rate risk. The U.S. dollar is our reporting and functional currency and the functional currency for our subsidiaries, except for J-Devices, where the Japanese Yen is the functional currency.

We have foreign currency exchange rate risk associated with the remeasurement of monetary assets and liabilities on our Consolidated Balance Sheets that are denominated in currencies other than the functional currency. We performed a sensitivity analysis of our foreign currency exposure as of December 31, 2017, to assess the potential impact of fluctuations in exchange rates for all foreign denominated assets and liabilities. Assuming that all foreign currencies appreciated 10% against the U.S. dollar as of December 31, 2017, our income before taxes would have been approximately \$17 million lower, due to the remeasurement of monetary assets and liabilities. We have a significant net monetary liability at our subsidiary in Korea, principally driven by our Korean severance plan.

In addition, we have foreign currency exchange rate exposure on our results of operations. For the year ended December 31, 2017, approximately 74% of our net sales were denominated in U.S. dollars. Our remaining net sales were principally denominated in Japanese Yen for local country sales. For the year ended December 31, 2017, approximately 51% of our cost of sales and operating expenses were denominated in U.S. dollars and were largely for raw materials and depreciation. The remaining portion of our cost of sales and operating expenses was principally denominated in the Asian currencies where our production facilities are located and largely consisted of labor. To the extent that the U.S. dollar weakens against these Asian-based currencies, similar foreign currency denominated income and expenses in the future will result in higher sales, higher cost of sales and operating expenses, with cost of sales and operating expenses having the greater impact on our financial results. Similarly, our sales, cost of sales and operating expenses will decrease if the U.S. dollar strengthens against these foreign currencies. We performed a sensitivity analysis of our foreign currency exposure as of December 31, 2017, to assess the potential impact of fluctuations in exchange rates for all foreign denominated sales and operating expenses. Assuming that all foreign currencies appreciated 10% against the U.S. dollar, our operating income for the year ended December 31, 2017 would have been approximately \$88 million lower.

There are inherent limitations in the sensitivity analysis presented, primarily the assumption that foreign exchange rate movements across multiple jurisdictions would change instantaneously in an equal fashion. As a result, the analysis is unable to reflect the potential effects of more complex market or other changes that could arise which may positively or negatively affect our results of operations.

Our Consolidated Financial Statements are impacted by changes in exchange rates at entities where the local currency is the functional currency. The effect of foreign exchange rate translation for these entities was a gain of \$11.1 million and \$5.8 million for the years ended December 31, 2017 and 2016, respectively, and was recognized as an adjustment to equity through other comprehensive income (loss).

### ***Interest Rate Risk***

We have interest rate risk with respect to our debt. Our fixed and variable rate debt includes foreign borrowings and revolving credit facilities. Our fixed rate debt also consists of senior notes. Changes in interest rates have different impacts on the fixed and variable rate portions of our debt portfolio. A change in interest rates on the fixed portion of the debt portfolio impacts the fair value of the debt instrument but has no impact on interest expense or cash flows. A change in interest rates on the variable portion of the debt portfolio impacts the interest incurred and cash flows but does not generally impact the fair value of the instrument.

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The table below presents the interest rates, maturities and fair value of our fixed and variable rate debt as of December 31, 2017:

	<b>2018</b>	<b>2019</b>	<b>2020</b>	<b>2021</b>	<b>2022</b>	<b>Total</b>	<b>Fair Value</b>
	<b>(\$ in thousands)</b>						
Fixed rate debt	\$ 17,393	\$ 10,649	\$ 130,649	\$ 210,649	\$ 530,738	\$ 900,078	\$ 919,405
Average interest rate	0.7%	0.8%	3.5%	6.3%	6.3%	5.7%	
Variable rate debt	\$ 106,455	\$ 163,000	\$ 196,000	\$ —	\$ —	\$ 465,455	\$ 466,227
Average interest rate	2.9%	3.8%	3.6%	—%	—%	3.5%	
Total debt maturities	<u>\$ 123,848</u>	<u>\$ 173,649</u>	<u>\$ 326,649</u>	<u>\$ 210,649</u>	<u>\$ 530,738</u>	<u>\$ 1,365,533</u>	<u>\$ 1,385,632</u>

For information regarding the fair value of our long-term debt, see Note 16 to our Consolidated Financial Statements in Part II, Item 8 of this Annual Report on Form 10-K.

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**Item 8.**      *Financial Statements and Supplementary Data*

We present the information required by Item 8 of Form 10-K here in the following order:

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<a href="#">Report of Independent Registered Public Accounting Firm</a>	<a href="#">51</a>
<a href="#">Consolidated Statements of Income — Years ended December 31, 2017, 2016 and 2015</a>	<a href="#">53</a>
<a href="#">Consolidated Statements of Comprehensive Income — Years ended December 31, 2017, 2016 and 2015</a>	<a href="#">54</a>
<a href="#">Consolidated Balance Sheets — December 31, 2017 and 2016</a>	<a href="#">55</a>
<a href="#">Consolidated Statements of Stockholders' Equity — Years ended December 31, 2017, 2016 and 2015</a>	<a href="#">56</a>
<a href="#">Consolidated Statements of Cash Flows — Years ended December 31, 2017, 2016 and 2015</a>	<a href="#">57</a>
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**Report of Independent Registered Public Accounting Firm**

To the Board of Directors and Stockholders of Amkor Technology, Inc.

***Opinions on the Financial Statements and Internal Control over Financial Reporting***

We have audited the accompanying consolidated balance sheets of Amkor Technology, Inc. and its subsidiaries as of December 31, 2017 and 2016, and the related consolidated statements of income, comprehensive income, stockholders' equity and cash flows for each of the three years in the period ended December 31, 2017, including the related notes and schedule of valuation and qualifying accounts for each of the three years in the period ended December 31, 2017 appearing under Item 8 (collectively referred to as the "consolidated financial statements"). We also have audited the Company's internal control over financial reporting as of December 31, 2017, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO).

In our opinion, the consolidated financial statements referred to above present fairly, in all material respects, the financial position of the Company as of December 31, 2017 and 2016, and the results of their operations and their cash flows for each of the three years in the period ended December 31, 2017 in conformity with accounting principles generally accepted in the United States of America. Also in our opinion, the Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2017, based on criteria established in *Internal Control - Integrated Framework* (2013) issued by the COSO.

***Basis for Opinions***

The Company's management is responsible for these consolidated financial statements, for maintaining effective internal control over financial reporting, and for its assessment of the effectiveness of internal control over financial reporting, included in Management's Report on Internal Control over Financial Reporting appearing under Item 9A. Our responsibility is to express opinions on the Company's consolidated financial statements and on the Company's internal control over financial reporting based on our audits. We are a public accounting firm registered with the Public Company Accounting Oversight Board (United States) ("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 audits to obtain reasonable assurance about whether the consolidated financial statements are free of material misstatement, whether due to error or fraud, and whether effective internal control over financial reporting was maintained in all material respects.

Our audits of the consolidated financial statements included performing procedures to assess the risks of material misstatement of the consolidated 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 consolidated 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 consolidated financial statements. Our audit of internal control over financial reporting included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, and testing and evaluating the design and operating effectiveness of internal control based on the assessed risk. Our audits also included performing such other procedures as we considered necessary in the circumstances. We believe that our audits provide a reasonable basis for our opinions.

***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 (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (ii) 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

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and expenditures of the company are being made only in accordance with authorizations of management and directors of the company; and (iii) 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/ PricewaterhouseCoopers LLP  
Phoenix, Arizona  
February 23, 2018

We have served as the Company's auditor since 2000.

**AMKOR TECHNOLOGY, INC.**  
**CONSOLIDATED STATEMENTS OF INCOME**

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands, except per share data)		
Net sales	\$ 4,186,497	\$ 3,893,635	\$ 2,884,603
Cost of sales	3,429,224	3,198,158	2,405,338
Gross profit	757,273	695,477	479,265
Selling, general and administrative	297,455	284,331	232,409
Research and development	166,614	117,206	82,017
Gain on sale of real estate	(108,109)	—	—
Total operating expenses	355,960	401,537	314,426
Operating income	401,313	293,940	164,839
Interest expense	83,839	79,668	81,407
Interest expense, related party	1,715	4,969	4,969
Other (income) expense, net	11,889	(5,854)	10,551
Total other expense, net	97,443	78,783	96,927
Income before taxes and equity in earnings of unconsolidated affiliate	303,870	215,157	67,912
Income tax expense	38,982	47,853	28,035
Income before equity in earnings of unconsolidated affiliate	264,888	167,304	39,877
Equity in earnings of J-Devices	—	—	14,016
Net income	264,888	167,304	53,893
Net income attributable to noncontrolling interests	(4,182)	(3,114)	(2,795)
Net income attributable to Amkor	\$ 260,706	\$ 164,190	\$ 51,098
Net income attributable to Amkor per common share:			
Basic	\$ 1.09	\$ 0.69	\$ 0.22
Diluted	\$ 1.09	\$ 0.69	\$ 0.22
Shares used in computing per common share amounts:			
Basic	238,937	237,416	236,850
Diluted	239,651	238,034	237,170

The accompanying notes are an integral part of these statements.

**AMKOR TECHNOLOGY, INC.**  
**CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME**

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
Net income	\$ 264,888	\$ 167,304	\$ 53,893
Other comprehensive income (loss), net of tax:			
Adjustments to unrealized components of defined benefit pension plans	5,165	2,563	1,100
Foreign currency translation	11,092	5,783	(146)
Equity interest in J-Devices' other comprehensive income (loss)	—	—	29,433
Total other comprehensive income (loss)	16,257	8,346	30,387
Comprehensive income	281,145	175,650	84,280
Comprehensive income attributable to noncontrolling interests	(4,182)	(3,114)	(2,795)
Comprehensive income attributable to Amkor	<u>\$ 276,963</u>	<u>\$ 172,536</u>	<u>\$ 81,485</u>

The accompanying notes are an integral part of these statements.

**AMKOR TECHNOLOGY, INC.  
CONSOLIDATED BALANCE SHEETS**

	December 31,	
	2017	2016
	(In thousands, except per share data)	
<b>ASSETS</b>		
Current assets:		
Cash and cash equivalents	\$ 596,364	\$ 549,518
Restricted cash	2,000	2,000
Accounts receivable, net of allowances of \$6,946 and \$9,902, respectively	692,287	563,107
Inventories	326,492	267,990
Other current assets	33,727	27,081
Total current assets	1,650,870	1,409,696
Property, plant and equipment, net	2,695,065	2,564,648
Goodwill	25,036	24,122
Restricted cash	4,487	3,977
Other assets	146,051	89,643
Total assets	\$ 4,521,509	\$ 4,092,086
<b>LIABILITIES AND EQUITY</b>		
Current liabilities:		
Short-term borrowings and current portion of long-term debt	\$ 123,848	\$ 35,192
Trade accounts payable	569,085	487,430
Capital expenditures payable	294,258	144,370
Accrued expenses	374,598	338,669
Total current liabilities	1,361,789	1,005,661
Long-term debt	1,240,581	1,364,638
Long-term debt, related party	—	75,000
Pension and severance obligations	182,216	166,701
Other non-current liabilities	46,144	76,682
Total liabilities	2,830,730	2,688,682
Commitments and contingencies (Note 17)		
Amkor stockholders' equity:		
Preferred stock, \$0.001 par value, 10,000 shares authorized, designated Series A, none issued	—	—
Common stock, \$0.001 par value, 500,000 shares authorized, 285,129 and 284,479 shares issued, and 239,184 and 238,665 shares outstanding, respectively	285	284
Additional paid-in capital	1,903,357	1,895,089
Accumulated deficit	(42,851)	(303,557)
Accumulated other comprehensive income (loss)	22,519	6,262
Treasury stock, at cost, 45,945 and 45,814 shares, respectively	(215,982)	(214,490)
Total Amkor stockholders' equity	1,667,328	1,383,588
Noncontrolling interests in subsidiaries	23,451	19,816
Total equity	1,690,779	1,403,404
Total liabilities and equity	\$ 4,521,509	\$ 4,092,086

The accompanying notes are an integral part of these statements.



**AMKOR TECHNOLOGY, INC.**  
**CONSOLIDATED STATEMENTS OF STOCKHOLDERS' EQUITY**

	Common Stock		Additional Paid-In Capital	Accumulated Deficit	Accumulated Other Comprehensive Income (Loss)	Treasury Stock		Total Amkor Stockholders' Equity	Noncontrolling Interest in Subsidiaries	Total Equity
	Shares	Par Value				Shares	Cost			
(In thousands)										
<b>Balance at December 31, 2014</b>	282,231	\$ 282	\$ 1,878,810	\$ (518,845)	\$ (32,471)	(45,604)	\$ (213,028)	\$ 1,114,748	\$ 14,701	\$ 1,129,449
Net income	—	—	—	51,098	—	—	—	51,098	2,795	53,893
Other comprehensive income (loss)	—	—	—	—	30,387	—	—	30,387	—	30,387
Treasury stock acquired through surrender of shares for tax withholding	—	—	—	—	—	(115)	(730)	(730)	—	(730)
Issuance of stock through share-based compensation plans	493	1	930	—	—	—	—	931	—	931
Share-based compensation	—	—	3,852	—	—	—	—	3,852	—	3,852
Subsidiary dividends paid to noncontrolling interests	—	—	—	—	—	—	—	—	(246)	(246)
<b>Balance at December 31, 2015</b>	282,724	\$ 283	\$ 1,883,592	\$ (467,747)	\$ (2,084)	(45,719)	\$ (213,758)	\$ 1,200,286	\$ 17,250	\$ 1,217,536
Net income	—	—	—	164,190	—	—	—	164,190	3,114	167,304
Other comprehensive income (loss)	—	—	—	—	8,346	—	—	8,346	—	8,346
Treasury stock acquired through surrender of shares for tax withholding	—	—	—	—	—	(95)	(732)	(732)	—	(732)
Issuance of stock through share-based compensation plans	1,755	1	8,246	—	—	—	—	8,247	—	8,247
Share-based compensation	—	—	3,251	—	—	—	—	3,251	—	3,251
Subsidiary dividends paid to noncontrolling interests	—	—	—	—	—	—	—	—	(548)	(548)
<b>Balance at December 31, 2016</b>	284,479	\$ 284	\$ 1,895,089	\$ (303,557)	\$ 6,262	(45,814)	\$ (214,490)	\$ 1,383,588	\$ 19,816	\$ 1,403,404
Net income	—	—	—	260,706	—	—	—	260,706	4,182	264,888
Other comprehensive income (loss)	—	—	—	—	16,257	—	—	16,257	—	16,257
Treasury stock acquired through surrender of shares for tax withholding	—	—	—	—	—	(131)	(1,492)	(1,492)	—	(1,492)
Issuance of stock through share-based compensation plans	650	1	3,123	—	—	—	—	3,124	—	3,124
Share-based compensation	—	—	5,145	—	—	—	—	5,145	—	5,145
Subsidiary dividends paid to noncontrolling interests	—	—	—	—	—	—	—	—	(547)	(547)
<b>Balance at December 31, 2017</b>	285,129	\$ 285	\$ 1,903,357	\$ (42,851)	\$ 22,519	(45,945)	\$ (215,982)	\$ 1,667,328	\$ 23,451	\$ 1,690,779

The accompanying notes are an integral part of these statements.

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**AMKOR TECHNOLOGY, INC.**  
**CONSOLIDATED STATEMENTS OF CASH FLOWS**

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
<b>Cash flows from operating activities:</b>			
Net income	\$ 264,888	\$ 167,304	\$ 53,893
<b>Adjustments to reconcile net income to net cash provided by operating activities:</b>			
Depreciation and amortization	581,940	555,186	494,200
Gain on sale of real estate	(108,109)	—	—
Amortization of deferred debt issuance costs and premiums	1,235	1,403	1,665
Deferred income taxes	(42,998)	(1,746)	(697)
Equity in earnings of unconsolidated affiliate	—	—	(14,016)
Loss on debt retirement	4,835	—	9,560
Loss (gain) on disposal of fixed assets, net	(2,648)	1,390	1,190
Share-based compensation	5,145	3,251	3,852
Loss from acquisition of J-Devices	—	—	13,501
Proceeds from insurance recovery for property, plant and equipment	—	(15,166)	—
Other, net	(8,143)	2,858	4,014
<b>Changes in assets and liabilities, net of acquisitions:</b>			
Accounts receivable	(118,353)	(29,126)	122,840
Inventories	(54,195)	(28,397)	27,677
Other current assets	(2,473)	1,124	(3,309)
Other assets	(458)	1,037	333
Trade accounts payable	67,574	48,581	(48,368)
Accrued expenses	35,525	56,465	(42,042)
Pension and severance obligations	23,881	1,625	(7,321)
Other non-current liabilities	(29,379)	(36,387)	(31,997)
Net cash provided by operating activities	<u>618,267</u>	<u>729,402</u>	<u>584,975</u>
<b>Cash flows from investing activities:</b>			
Payments for property, plant and equipment	(550,943)	(650,038)	(537,975)
Proceeds from sale of property, plant and equipment	141,530	45,635	6,945
Proceeds from insurance recovery for property, plant and equipment	—	15,166	—
Acquisition of business, net of cash acquired	(43,771)	—	22,577
Investment in J-Devices	—	—	(12,908)
Disposition of business to J-Devices, net of cash transferred	—	—	8,355
Other investing activities	(1,648)	(190)	(1,984)
Net cash used in investing activities	<u>(454,832)</u>	<u>(589,427)</u>	<u>(514,990)</u>
<b>Cash flows from financing activities:</b>			
Proceeds from revolving credit facilities	75,000	125,000	290,000
Payments of revolving credit facilities	—	(255,000)	(150,000)
Proceeds from short-term debt	77,781	49,131	—
Payments of short-term debt	(70,236)	(49,500)	—
Proceeds from issuance of long-term debt	223,976	46,000	400,000
Payments of long-term debt	(405,269)	(32,078)	(537,030)
Payments of long-term debt, related party	(17,837)	—	—
Payments of capital lease obligations	(5,340)	(2,543)	—
Payment of deferred consideration for purchase of facility	(3,890)	—	—
Proceeds from issuance of stock through share-based compensation plans	3,124	8,247	931
Other financing activities	(2,195)	(1,436)	(1,288)
Net cash (used in) provided by financing activities	<u>(124,886)</u>	<u>(112,179)</u>	<u>2,613</u>
Effect of exchange rate fluctuations on cash, cash equivalents and restricted cash	8,807	351	—
Net increase in cash, cash equivalents and restricted cash	47,356	28,147	72,598
Cash, cash equivalents and restricted cash, beginning of period	555,495	527,348	454,750
Cash, cash equivalents and restricted cash, end of period	<u>\$ 602,851</u>	<u>\$ 555,495</u>	<u>\$ 527,348</u>
<b>Supplemental disclosures of cash flow information:</b>			

Cash paid during the period for:

Interest	\$	83,808	\$	86,777	\$	96,227
Income taxes		61,878		32,174		35,084
Non-cash investing and financing activities:						
Property, plant and equipment included in capital expenditures payable		294,912		146,080		242,980
Equipment acquired through capital lease		929		6,358		—

The accompanying notes are an integral part of these statements.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements**

**1. Description of Business and Summary of Significant Accounting Policies**

***Description of Business***

Amkor is one of the world's leading providers of outsourced semiconductor packaging and test services. Amkor pioneered the outsourcing of semiconductor packaging and test services through a predecessor corporation in 1968, and over the years we have built a leading position by:

- Designing and developing innovative packaging and test technologies;
- Offering a broad portfolio of cost-effective solutions and services;
- Focusing on strategic end markets that offer solid growth potential;
- Cultivating long-standing relationships with our customers, which include many of the world's leading semiconductor companies;
- Collaborating with customers, original equipment manufacturers ("OEMs") and equipment and material suppliers;
- Developing a competitive cost structure with disciplined capital investment;
- Building expertise in high-volume manufacturing processes and developing a reputation for high quality and solid execution and
- Providing a geographically diverse operating base, with research and development, engineering support and production capabilities at various facilities throughout China, Japan, Korea, Malaysia, the Philippines, Portugal and Taiwan.

***Basis of Presentation***

Our Consolidated Financial Statements include the accounts of Amkor Technology, Inc. and our subsidiaries ("Amkor"). Our Consolidated Financial Statements reflect the elimination of all significant inter-company accounts and transactions. On December 30, 2015, we increased our investment in J-Devices to 100% (Note 3). As a result, our accounting for J-Devices changed from the equity method to the consolidation method effective December 30, 2015. The operating results of J-Devices were consolidated beginning in 2016. On May 22, 2017, we completed the purchase of Nanium, S.A. ("Nanium"). Nanium's financial results have been included in our Consolidated Financial Statements from the date of acquisition (Note 3). Our investments in variable interest entities in which we are the primary beneficiary are consolidated. We reflect the remaining portion of variable interest entities and foreign subsidiaries that are not wholly owned as noncontrolling interests.

The preparation of financial statements in conformity with U.S. generally accepted accounting principles requires management to make estimates and assumptions that affect the amounts reported in the financial statements and accompanying notes. On an ongoing basis, we evaluate our estimates, including those related to acquisitions, revenue recognition, income taxes, inventory, long lived assets and contingencies. These estimates are based on management's best knowledge of current events, historical experience, actions that we may undertake in the future and on various other assumptions that are believed to be reasonable under the circumstances. As a result, actual results could differ materially from these estimates and assumptions. Certain prior year amounts have been reclassified to conform to current year presentation.

**AMKOR TECHNOLOGY, INC.**

**Notes to Consolidated Financial Statements — (Continued)**

***Consolidation of Variable Interest Entities***

We have variable interests in certain Philippine realty corporations in which we have a 40% ownership. We lease land and buildings in the Philippines from these entities and we are the primary beneficiary of these arrangements. As of December 31, 2017, the combined book value of the assets and liabilities associated with these Philippine realty corporations included in our Consolidated Balance Sheet was \$16.9 million and \$0.4 million, respectively. The impact of consolidating these variable interest entities on our Consolidated Statements of Income was not significant, and other than our lease payments, we have not provided any significant assistance or other financial support to these variable interest entities for the years ended December 31, 2017, 2016 or 2015. The creditors of the Philippine realty corporations have no recourse to our general credit.

***Foreign Currency Translation***

The U.S. dollar is the functional currency of our subsidiaries other than J-Devices, and the foreign currency asset and liability amounts at these subsidiaries are remeasured into U.S. dollars at end-of-period exchange rates, except for nonmonetary items which are remeasured at historical rates. Foreign currency income and expenses are remeasured at daily exchange rates, except for expenses related to balance sheet amounts which are remeasured at historical exchange rates. Exchange gains and losses arising from remeasurement of foreign currency-denominated monetary assets and liabilities are included in other (income) expense, net in the period in which they occur.

The Japanese Yen is the functional currency of J-Devices. The asset and liability amounts of J-Devices are translated into U.S. dollars at end-of-period exchange rates. Income and expenses are translated into U.S. dollars at average exchange rates in effect during the period. The resulting translation adjustments are reported as a component of accumulated other comprehensive income in the stockholders' equity section of the balance sheet. Assets and liabilities denominated in a currency other than the functional currency are remeasured into the functional currency prior to translation into U.S. dollars, and the resulting transaction exchange gains or losses are included in other expense (income) in the period in which they occur.

***Risks and Concentrations***

The semiconductor industry is characterized by rapid technological change, competitive pricing pressures and cyclical market patterns. Our financial results are affected by a wide variety of factors, including general economic conditions worldwide, economic conditions specific to the semiconductor industry, the timely implementation of new package and test technologies, the ability to safeguard patents and intellectual property in a rapidly evolving market and reliance on materials and equipment suppliers. In addition, the semiconductor market has historically been cyclical and subject to significant economic downturns at various times. Our profitability and ability to generate cash from operations is principally dependent upon demand for semiconductors, the utilization of our capacity, semiconductor package mix, the average selling price of our services, our ability to manage our capital expenditures and our ability to control our costs including labor, material, overhead and financing costs.

A significant portion of our revenues is concentrated with a small group of customers (Note 18). The loss of a significant customer, a business combination among customers, a reduction in orders or decrease in price from a significant customer or disruption in any of our significant strategic partnerships or other commercial arrangements could have a material adverse effect on our business, liquidity, results of operations, financial condition and cash flows.

Financial instruments, for which we are subject to credit risk, consist principally of accounts receivable and cash and cash equivalents. With respect to accounts receivable, we mitigate our credit risk by selling primarily to well-established companies, performing ongoing credit evaluations and making frequent contact with customers. In addition, we may utilize non-recourse factoring to mitigate credit risk when considered appropriate. We have historically mitigated our credit risk with respect to cash and cash equivalents through diversification of our holdings into various high quality money market funds and bank deposit accounts. At December 31, 2017, our cash and cash equivalents were maintained in various U.S. and foreign bank operating and time deposit accounts and invested in U.S. money market funds.

**AMKOR TECHNOLOGY, INC.****Notes to Consolidated Financial Statements — (Continued)*****Contingencies and Litigation***

We may be subject to certain legal proceedings, lawsuits and other claims, as discussed in Note 17. We accrue for a loss contingency, including legal proceedings, lawsuits, pending claims and other legal matters, when we conclude that the likelihood of a loss is probable and the amount of the loss can be reasonably estimated. When the reasonable estimate of the loss is within a range of amounts, and no amount in the range constitutes a better estimate than any other amount, we accrue for the amount at the low end of the range. We adjust our accruals from time to time as we receive additional information, but the loss we incur may be significantly greater than or less than the amount we have accrued. We disclose loss contingencies if we believe they are material and there is at least a reasonable possibility that a loss has been incurred. Attorney fees related to legal matters are expensed as incurred.

***Cash and Cash Equivalents***

We consider all highly liquid investments with a maturity of three months or less when purchased to be cash equivalents. Our cash and cash equivalents are maintained in various U.S. and foreign bank operating and time deposit accounts and invested in U.S. money market funds.

***Restricted Cash***

Restricted cash, current, consists of short-term cash equivalents used to collateralize our daily banking services. Restricted cash, non-current, mainly consists of collateral to fulfill foreign trade compliance requirements.

***Inventories***

Inventories are stated at the lower of cost and net realizable value. Cost is principally determined by standard cost or the weighted moving average method, both of which approximate actual cost. We review and set our standard costs as needed, but at a minimum on an annual basis. We reduce the carrying value of our inventories for the cost of inventory we estimate is excess and obsolete based on the age of our inventories. When a determination is made that the inventory will not be utilized in production or is not saleable, it is written-off.

***Other Current Assets***

Other current assets consist principally of prepaid assets and an investment in government securities by a foreign subsidiary to satisfy local regulatory requirements, which is recorded at amortized cost.

***Property, Plant and Equipment***

Property, plant and equipment are stated at cost. Depreciation is calculated by the straight-line method over the estimated useful lives of depreciable assets which are as follows:

Land use rights	50 to 90 years
Buildings and improvements	10 to 40 years
Machinery and equipment	2 to 7 years
Software and computer equipment	3 to 5 years
Furniture, fixtures and other equipment	4 to 10 years

Cost and accumulated depreciation for property retired or disposed of are removed from the accounts, and any resulting gain or loss is included in earnings. Expenditures for maintenance and repairs are charged to expense as incurred.

We review long-lived assets for impairment whenever events or changes in circumstances indicate that the carrying amount may not be recoverable. Recoverability of a long-lived asset group to be held and used in operations is measured by a comparison of the carrying amount to the sum of the undiscounted cash flows expected to result from the use and eventual

**AMKOR TECHNOLOGY, INC.**

**Notes to Consolidated Financial Statements — (Continued)**

disposition of the asset group. If such asset group is considered to be impaired, the impairment loss is measured as the amount by which the carrying amount of the asset group exceeds its fair value. Long-lived assets to be disposed of are carried at the lower of cost or fair value less the costs of disposal.

***Goodwill***

Goodwill is recorded when the cost of an acquisition exceeds the fair value of the net tangible and identifiable intangible assets acquired. We review goodwill for impairment annually during the fourth quarter of each year and whenever events or changes in circumstances indicate that an impairment may exist. Impairment losses are recorded when the carrying amount of the reporting unit exceeds its fair value.

***Other Assets***

Other assets consist principally of deferred tax assets and refundable security deposits.

***Fair Value Measurements***

We apply fair value accounting for assets and liabilities that are recognized or disclosed at fair value in the financial statements on a recurring or nonrecurring basis. We define fair value as the price that would be received from selling an asset or paid to transfer a liability in the principal or most advantageous market for the asset or liability in an orderly transaction between market participants at the measurement date. See Note 16 for further discussion of fair value measurements.

***Revenue Recognition***

We recognize revenue from our packaging and test services, net of value-added or other similar taxes, when there is evidence of an arrangement, delivery has occurred or services have been rendered, fees are fixed or determinable and collectibility is reasonably assured. Generally, these criteria are met and revenue is recognized upon shipment or, in some cases, customer acceptance. If the revenue recognition criteria are not met, we defer the revenue. Deferred revenue generally results from two types of transactions: contractual invoicing at interim points in the packaging and test process prior to shipment of the finished product and customer advances for supply agreements with customers where we commit capacity in exchange for customer prepayment of services. These prepayments are deferred and recorded as customer advances within accrued expenses and other non-current liabilities.

We generally do not take ownership of customer-supplied semiconductor wafers. Title and risk of loss remains with the customer for these materials at all times. Accordingly, the cost of the customer-supplied materials is not included in our Consolidated Financial Statements.

An allowance for sales credits is recorded as a reduction to sales and accounts receivable during the period of sale such that accounts receivable is reported at its estimated net realizable value. The allowance for sales credits is an estimate of the future credits we will issue for billing adjustments primarily for invoicing corrections and miscellaneous customer claims and is estimated based upon recent credit issuance, historical experience and specific identification of known or expected sales credits at the end of the reporting period. Additionally, provisions are made for doubtful accounts when there is doubt as to the collectibility of accounts receivable. The allowance for doubtful accounts is recorded as bad debt expense and is classified as selling, general and administrative expense. The allowance for doubtful accounts is based upon specific identification of doubtful accounts considering the age of the receivable balance, the customer's historical payment history and current credit worthiness as well as specific identification of any known or expected collectibility issues. Historically, our allowance for doubtful accounts has been immaterial.

***Shipping and Handling Fees and Costs***

Amounts billed to customers for shipping and handling are presented in net sales. Costs incurred for shipping and handling are included in cost of sales.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

**Research and Development Costs**

Research and development expenses include costs attributable to the conduct of research and development programs primarily related to the development of new package designs or technologies and improving the efficiency and capabilities of our existing production processes. Such costs include salaries, payroll taxes, employee benefit costs, materials, supplies, depreciation and maintenance of research equipment, services provided by outside contractors and the allocable portions of facility costs such as rent, utilities, insurance, repairs and maintenance, depreciation and general support services. All costs associated with research and development are expensed as incurred.

**Income Taxes**

Income taxes are accounted for using the asset and liability method. Under this method, deferred income tax assets and liabilities are recognized for the future tax consequences attributable to temporary differences between the financial statement carrying amounts of existing assets and liabilities and their respective tax basis as well as for net operating loss and tax credit carryforwards. Deferred income tax assets and liabilities are measured using enacted tax rates expected to apply to taxable income in the years in which these temporary differences are expected to be recovered or settled. The effect on deferred tax assets and liabilities of a change in tax rates is recognized in income in the period that includes the enactment date. A valuation allowance is provided for those deferred tax assets for which it is more likely than not that the related tax benefits will not be realized.

We monitor on an ongoing basis our ability to utilize our deferred tax assets and whether there is a need for a related valuation allowance. In evaluating our ability to recover our deferred tax assets in the jurisdictions from which they arise, we consider all available positive and negative evidence, including scheduled reversals of deferred tax liabilities, projected future taxable income, tax-planning strategies and results of recent operations. For most of our U.S. and foreign deferred tax assets, we consider it more likely than not that we will have sufficient taxable income to allow us to realize these deferred tax assets. However, in the event taxable income falls short of current expectations, we may need to establish a valuation allowance against such deferred tax assets.

ASC 740, Accounting for Income Taxes, requires companies to recognize the effect of tax law changes in the period of enactment even though the effective date for most provisions is for tax years beginning after December 31, 2017. Given the significance of the Tax Act, the SEC staff issued Staff Accounting Bulletin No. 118, which allows registrants to record provisional amounts during a one year “measurement period” similar to that used when accounting for business combinations. However, the measurement period is deemed to have ended earlier when the registrant has obtained, prepared and analyzed the information necessary to finalize its accounting. During the measurement period, impacts of the law are expected to be recorded at the time a reasonable estimate for all or a portion of the effects can be made, and provisional amounts can be recognized and adjusted as information becomes available, prepared or analyzed.

We have reported provisional amounts for the income tax effects of the Tax Act for which the accounting is incomplete but a reasonable estimate could be determined. There were no specific impacts of the Tax Act that could not be reasonably estimated. Our estimate of the impact of the Tax Act may be adjusted throughout the allowable measurement period as we collect additional information, prepare and analyze the information and evaluate any regulatory guidance or clarifications. Our review is expected to include:

- One-time transition tax: Further information is required to substantiate the underlying data supporting foreign earnings and profits, foreign tax credits, and amounts held in liquid and illiquid assets at various measurement dates. Changes to our provisional estimates and further analysis could impact our judgments, elections and assertions.
- Remeasurement of deferred tax assets and liabilities: Further analysis is required to calculate the impact on the related account balances including the impact of complex new provisions which include the Base Erosion Anti-abuse Tax and Global Intangible Low-Taxed Income (“GILTI”), designed to subject certain foreign earnings to U.S. tax.
- Valuation allowances: We have assessed whether valuation allowance analyses for deferred tax assets are affected by various aspects of the Tax Act (for example one-time transition tax, GILTI, new categories of foreign tax credits).



AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

Since we have recorded provisional amounts related to the provisions of the Tax Act, any corresponding determination of the need for a change in a valuation allowance is also provisional.

We recognize in our Consolidated Financial Statements the impact of an income tax position, if that position is more likely than not of being sustained on audit, based on the technical merits of the position. Related interest and penalties are classified as income taxes in the financial statements.

See Note 6 for more information regarding unrecognized income tax benefits.

**2. New Accounting Standards**

***Recently Adopted Standards***

In July 2015, the Financial Accounting Standards Board ("FASB") issued Accounting Standards Update ("ASU") 2015-11, *Inventory - Simplifying the Measurement of Inventory (Topic 330)*. ASU 2015-11 requires inventory to be subsequently measured using the lower of cost and net realizable value, thereby eliminating the market value approach. Net realizable value is defined as the "estimated selling prices in the ordinary course of business, less reasonably predictable costs of completion, disposal and transportation." ASU 2015-11 is effective for reporting periods beginning after December 15, 2016 and is applied prospectively. We adopted ASU 2015-11 at January 1, 2017. The adoption of ASU 2015-11 did not have a significant impact on our financial statements or disclosure.

In January 2017, the FASB issued ASU 2017-04, *Intangible - Goodwill and Other (Topic 350) - Simplifying the Test for Goodwill Impairment*. ASU 2017-04 simplifies the goodwill impairment test by eliminating the second step of the current two-step impairment test. ASU 2017-04 is effective for interim and annual goodwill impairment tests in fiscal years beginning after December 15, 2019 and is applied prospectively. Early adoption is permitted for interim or annual goodwill impairment tests performed on testing dates after January 1, 2017. We adopted ASU 2017-04 at January 1, 2017. The adoption of ASU 2017-04 did not have a significant impact on our financial statements or disclosure.

***Recently Issued Standards***

In May 2014, the FASB issued ASU 2014-09, *Revenue from Contracts with Customers (Topic 606)*. ASU 2014-09 is based on the principle that revenue is recognized to depict the transfer of promised goods or services to customers in an amount that reflects the consideration to which the entity expects to be entitled in exchange for those goods or services. This ASU also requires additional disclosure about the nature, amount, timing and uncertainty of revenue and cash flows arising from contracts with customers, including significant judgments and changes in judgments. ASU 2014-09 permits the use of either full retrospective or modified retrospective methods of adoption. In August 2015, the FASB issued ASU 2015-14, *Revenue from Contracts with Customers (Topic 606): Deferral of the Effective Date*, which defers the effective date by one year to December 15, 2017, for interim and annual reporting periods beginning after that date. In March, April, May and December 2016, the FASB issued ASU 2016-08, ASU 2016-10, ASU 2016-12 and ASU 2016-20, respectively, which provide supplemental guidance and clarification to ASU 2014-09. In September 2017, the FASB issued ASU 2017-13, which provides supplemental guidance and clarification to ASU 2014-09. The new standard will result in a change to the timing of revenue recognition, whereby revenue will be recognized "over time" as services are performed rather than at a "point in time", generally upon shipment. The new standard will also result in an increase in accounts receivables, net and a related decrease in inventories, deferred revenues and accumulated deficit. We will adopt the standard using the full retrospective method to adjust each prior reporting period presented. We are in the process of finalizing the impact that this new standard will have on our consolidated financial statements and disclosure; however, we expect the following impacts to our reported results:

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

	For the Year Ended December 31, 2017		
	As Reported	New Revenue Standard Adjustment (Estimate)	As Adjusted (Estimate)
(In thousands, except per share data)			
<b>Income Statement:</b>			
Net sales	\$ 4,186,497	\$ 24,000	\$ 4,210,497
Cost of sales	3,429,224	17,000	3,446,224
Net income	264,888	5,000	269,888
Net income attributable to Amkor per common share:			
Basic	1.09	0.02	1.11
Diluted	1.09	0.02	1.11

	For the Year Ended December 31, 2016		
	As Previously Reported	New Revenue Standard Adjustment (Estimate)	As Adjusted (Estimate)
(In thousands, except per share data)			
<b>Income Statement:</b>			
Net sales	\$ 3,893,635	\$ 36,000	\$ 3,929,635
Cost of sales	3,198,158	21,000	3,219,158
Net income	167,304	11,000	178,304
Net income attributable to Amkor per common share:			
Basic	0.69	0.05	0.74
Diluted	0.69	0.04	0.73

	December 31, 2017		
	As Reported	New Revenue Standard Adjustment (Estimate)	As Adjusted (Estimate)
(In thousands)			
<b>Balance Sheet:</b>			
Accounts receivable, net	\$ 692,287	\$ 106,000	\$ 798,287
Inventories	326,492	(113,000)	213,492
Accrued expenses	374,598	(48,000)	326,598
Accumulated deficit	(42,851)	31,000	(11,851)

In February 2016, the FASB issued ASU 2016-02, *Leases (Topic 842)*. ASU 2016-02 requires a dual approach for lessee accounting under which a lessee would account for leases as finance leases or operating leases. Both finance leases and operating leases will result in the lessee recognizing a right-of-use asset and a corresponding lease liability. For finance leases the lessee would recognize interest expense and amortization of the right-of-use asset, and for operating leases the lessee would recognize a straight-line lease expense. ASU 2016-02 is effective for reporting periods beginning after December 15, 2018 using a modified retrospective approach. Early adoption is permitted. In September 2017 and January 2018, the FASB issued ASU 2017-13 and ASU 2018-01, respectively, which provide supplemental guidance and clarification

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

to ASU 2016-02. We are currently evaluating the impact that this guidance may have on our financial statements and disclosure.

In March 2017, the FASB issued ASU 2017-07, *Compensation – Retirement Benefits (Topic 715): Improving the Presentation of Net Periodic Pension Cost and Net Periodic Postretirement Benefit Cost*. ASU 2017-07 requires that the service cost component of net periodic pension costs be presented in the same line item as other compensation costs and all other components of net periodic pension costs to be presented in the statement of income as nonoperating expenses. ASU 2017-07 is effective for annual periods beginning after December 15, 2017, including interim periods within those annual periods. We will use the amounts previously disclosed within the prior year financial statements as a practical expedient for retrospective presentation within the consolidated statements of income. ASU 2017-07 will not have a material impact to our financial statements upon adoption.

In February 2018, the FASB issued ASU 2018-02, *Income Statement - Reporting Comprehensive Income (Topic 220): Reclassification of Certain Tax Effects from Accumulated Other Comprehensive Income*. ASU 2018-02 allows a reclassification from accumulated other comprehensive income to retained earnings for stranded tax effects resulting from the Tax Act. ASU 2018-02 is effective for fiscal years, including interim periods within those fiscal years, beginning after December 15, 2018. Early adoption is permitted. Adoption of this ASU should be applied either in the period of adoption or retrospectively to each period (or periods) in which the effect of the change in the U.S. federal corporate income tax rate in the Tax Act is recognized. We are currently evaluating the impact that this guidance may have on our financial statements and disclosure.

**3. Acquisitions**

*Acquisition of Nanium*

On May 22, 2017, we completed the purchase of 100% of the shares of Nanium, a provider of wafer-level fan-out semiconductor packaging solutions. We allocated the purchase price to the assets acquired and liabilities assumed based on their estimated fair values on the date of acquisition. We did not record goodwill as a result of the acquisition.

*Step-acquisition of J-Devices*

On December 30, 2015, through the exercise of additional options, we increased our ownership interest in J-Devices from 65.7% to 100% for a purchase price of \$105.4 million. As a result, our accounting for J-Devices changed from the equity method to the consolidation method effective December 30, 2015. The operating results of J-Devices were consolidated beginning in 2016. The acquisition of the remaining interest expands our presence in Japan and our business worldwide by capitalizing on our leadership position in the automotive market. Since there were no material transactions from December 30, 2015 to December 31, 2015, and for the convenience of reporting the acquisition for accounting purposes, December 31, 2015 was designated as the acquisition date.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

The following table summarizes the consideration transferred to acquire J-Devices and the amounts of identifiable assets acquired and liabilities assumed at the acquisition date:

	(In thousands)
Fair value of consideration transferred:	
Cash	\$ 105,391
Fair value of our previously held equity interest in J-Devices	160,087
<b>Total</b>	<b>\$ 265,478</b>
Recognized amounts of identifiable assets acquired and liabilities assumed:	
Cash	\$ 127,968
Accounts receivable	180,177
Inventory	42,502
Other current assets	2,363
Property, plant and equipment	230,319
Other assets	9,268
Short-term borrowings and current portion of long-term debt	(36,770)
Other current liabilities	(251,405)
Long-term debt	(18,885)
Pension obligations	(22,250)
Other non-current liabilities	(21,218)
<b>Total identifiable net assets</b>	<b>242,069</b>
Goodwill	23,409
<b>Total</b>	<b>\$ 265,478</b>

The goodwill is attributable to the workforce of J-Devices, as well as cost savings and synergies expected from combining the operations of J-Devices. It is not deductible for tax purposes.

As a result of obtaining control over J-Devices, our previously held equity interest of 65.7% was remeasured to fair value, resulting in a gain of \$16.1 million. Additionally, our previously held equity interest in J-Devices' accumulated foreign currency translation adjustments was released upon consolidation of J-Devices, resulting in a loss of \$29.6 million. The combined net loss of \$13.5 million was recognized in other (income) expense, net (Note 5) in our Consolidated Financial Statements.

The fair value of our previously held equity interest in J-Devices was estimated by applying an income approach using the discounted cash flow method. The fair value measurement is based on significant inputs not observable in the market and thus represents a Level 3 fair value measurement. Key assumptions include our estimates of J-Devices' financial projections, a terminal value based on its expected long-term growth rate and a discount rate based on the weighted-average cost of capital of comparable companies.

The following unaudited pro forma consolidated results of operations have been prepared as if the acquisition of J-Devices had occurred on January 1, 2014. The pro forma results include adjustments related to alignment to our accounting policies, the effect of fair value adjustments on property, plant and equipment and the related income tax effect. We also eliminated inter-company activity between the parties in the consolidated results. The pro forma results include the activities that are nonrecurring and not representative of future activities, including the gain of \$16.2 million from reversal of a deferred tax asset valuation allowance and the gain of \$12.6 million from release of accumulated foreign currency translation adjustments

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

associated with merging our subsidiary into J-Devices in 2014, offset by the loss on acquisition of J-Devices of \$13.5 million in 2014.

This pro forma data is presented for informational purposes only and does not purport to be indicative of the results of future operations or of the results that would have occurred had the 2015 acquisition taken place on January 1, 2014. The pro forma information does not include any potential revenue enhancements, cost synergies or other operating efficiencies that could result from the acquisition.

	For the Year Ended December 31	
	2015 (unaudited)	2014 (unaudited)
	(In thousands, except per share data)	
Net sales	\$ 3,696,495	\$ 4,051,076
Net income	88,190	153,049
Net income attributable to Amkor	85,394	149,548
Basic earnings per share	0.36	0.65
Diluted earnings per share	0.36	0.63

#### 4. Share-Based Compensation Plans

Our share-based compensation is measured at fair value and expensed over the service period (generally the vesting period). The amount of compensation expense to be recognized is adjusted for an estimated forfeiture rate which is based on historical data. For the years ended December 31, 2017, 2016 and 2015, we recognized share-based compensation attributable to stock options and restricted shares of \$5.1 million, \$3.3 million and \$3.9 million, respectively, primarily in selling, general and administrative expenses. The corresponding deferred income tax benefits for stock options or restricted shares is \$2.4 million for 2017 and zero for 2016 and 2015.

##### *Equity Incentive Plan*

*Amended and Restated 2007 Equity Incentive Plan.* The Amended and Restated 2007 Equity Incentive Plan, (the “2007 Plan”) provides for the grant of the following types of incentive awards: (i) stock options, (ii) restricted stock, (iii) restricted stock units, (iv) stock appreciation rights, (v) performance units and performance shares and (vi) other stock or cash awards. Those eligible for awards include employees, directors and consultants who provide services to Amkor and its subsidiaries. The 2007 Plan is effective through 2027 and can be terminated at the discretion of the Board of Directors. There were originally 17.0 million shares of our common stock reserved for issuance under the 2007 Plan and at December 31, 2017 there were 8.0 million shares available for grant.

##### *Stock options*

Stock options are generally granted with an exercise price equal to the market price of the stock at the date of grant. Substantially all of the options granted are exercisable pursuant to a one to four year vesting schedule and the term of the options granted is no longer than ten years. Upon option exercise, we may issue new shares of common or treasury stock.

In order to calculate the fair value of stock options at the date of grant, we use the Black-Scholes option pricing model. Expected volatilities are based on historical performance of our stock. We also use historical data to estimate the timing and amount of option exercises and forfeitures within the valuation model. The expected term of the options is based on evaluations of historical and expected future employee exercise behavior and represents the period of time that options granted are expected to be outstanding. The risk-free interest rate for periods within the contractual life of the option is based on the U.S. Treasury yield curve in effect at the time of grant.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

The following table summarizes our stock option activity for the year ended December 31, 2017:

	Number of Shares (In thousands)	Weighted-Average Exercise Price per Share	Weighted-Average Remaining Contractual Term (Years)	Aggregate Intrinsic Value (In thousands)
Outstanding at December 31, 2016	2,443	\$ 6.93		
Granted	2,900	9.97		
Exercised	(469)	6.66		
Forfeited or expired	(122)	5.12		
Outstanding at December 31, 2017	<u>4,752</u>	<u>\$ 8.86</u>	<u>7.51</u>	<u>\$ 6,403</u>
Fully vested at December 31, 2017 and expected to vest thereafter	<u>4,632</u>	<u>\$ 8.83</u>	<u>7.46</u>	<u>\$ 6,369</u>
Exercisable at December 31, 2017	<u>1,733</u>	<u>\$ 7.17</u>	<u>4.75</u>	<u>\$ 5,455</u>

The following assumptions were used to calculate the weighted-average fair values of the options granted:

	For the Year Ended December 31,		
	2017	2016	2015
Expected life (in years)	5.7	6.5	5.8
Risk-free interest rate	1.9%	1.5%	1.8%
Volatility	43%	48%	45%
Dividend yield	—	—	—
Weighted-average grant date fair value per option granted	\$ 4.24	\$ 2.89	\$ 3.14

Total unrecognized compensation expense from stock options was \$9.6 million as of December 31, 2017, which is expected to be recognized over a weighted-average period of approximately 3.0 years beginning January 1, 2017.

**Restricted Shares**

We grant restricted shares to directors and employees under the 2007 Plan. Restricted shares granted to directors vest on the earlier of the one year anniversary of the grant date or the date of the next annual meeting of stockholders. All other restricted shares vest ratably over four years, with 6.25% of the shares vesting in equal quarterly installments such that 100% of the shares will become vested on the fourth anniversary of the award, subject to the recipient's continued employment with us on the applicable vesting dates. In addition, provided that the restricted shares have not been forfeited earlier, for certain grants, the restricted shares will vest upon the recipient's death or disability, or upon a change in control of Amkor. The value of the restricted shares is determined based on the fair market value of the underlying shares on the date of the grant and is recognized ratably over the vesting period. Upon vesting of restricted stock awards, we may issue new shares of common or treasury stock.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

The following table summarizes our restricted share activity for the year ended December 31, 2017:

	Number of Shares (In thousands)	Weighted- average Grant Date Fair Value (Per Share)
Nonvested at December 31, 2016	145	\$ 5.02
Awards granted	224	10.06
Awards vested	(181)	5.93
Awards forfeited	—	—
Nonvested at December 31, 2017	<u>188</u>	<u>10.15</u>

Total unrecognized compensation cost from restricted shares was \$1.5 million as of December 31, 2017, which is expected to be recognized over a weighted-average period of approximately 2.8 years beginning January 1, 2017.

**5. Other Income and Expense**

Other income and expense consists of the following:

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
Interest income	\$ (3,215)	\$ (1,326)	\$ (2,539)
Foreign currency (gain) loss, net	11,823	(3,592)	(7,849)
Loss on debt retirement	4,835	—	9,560
Loss from acquisition of J-Devices (Note 3)	—	—	13,501
Other (income) expense, net	(1,554)	(936)	(2,122)
Total other (income) expense, net	<u>\$ 11,889</u>	<u>\$ (5,854)</u>	<u>\$ 10,551</u>

**6. Income Taxes**

On December 22, 2017, the Tax Act was signed into law. The Tax Act reduced the corporate tax rate from 35% to 21%, included a one-time transition tax on unremitted foreign earnings and profits applicable for our fiscal year ended December 31, 2017 and limited tax deductions for interest expense for periods beginning January 1, 2018 which caused a release of valuation allowance. In 2017, we recognized a net benefit for the impact of the Tax Act with components as follows:

	(In thousands)
One-time transition tax before credits	\$ 162,750
Tax credits	(128,395)
Remeasure deferred tax assets	36,794
Release valuation allowance	(112,703)
Net impact of the Tax Act	<u>\$ (41,554)</u>

In accordance with SEC staff issued Staff Accounting Bulletin No. 118, we have not finalized our accounting and have made a provisional estimate of the impacts of the Tax Act. (See Note 1).

Geographic sources of income (loss) before taxes and equity in earnings of unconsolidated affiliate are as follows:

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
United States	\$ 14,935	\$ (12,385)	\$ (39,684)
Foreign	288,935	227,542	107,596
Income before taxes and equity in earnings of unconsolidated affiliate	<u>\$ 303,870</u>	<u>\$ 215,157</u>	<u>\$ 67,912</u>

The provision for income taxes includes current federal, state and foreign taxes payable and those deferred because of temporary differences between the financial statement and the tax bases of assets and liabilities.

The components of the provision (benefit) for income taxes are as follows:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Current:			
Federal	\$ —	\$ —	\$ —
State	11	22	11
Foreign	81,969	49,577	28,721
	<u>81,980</u>	<u>49,599</u>	<u>28,732</u>
Deferred:			
Federal	(36,943)	—	—
State	(4,611)	—	—
Foreign	(1,444)	(1,746)	(697)
	<u>(42,998)</u>	<u>(1,746)</u>	<u>(697)</u>
Income tax expense	<u>\$ 38,982</u>	<u>\$ 47,853</u>	<u>\$ 28,035</u>

The reconciliation between the U.S. federal statutory income tax rate of 35% and our income tax expense is as follows:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
U.S. federal tax at 35%	\$ 106,354	\$ 75,305	\$ 23,769
State taxes, net of federal benefit	2,193	836	2,622
Foreign income taxed at different rates	(51,412)	(17,907)	(11,756)
Foreign exchange (loss) gain	29,756	(1,127)	(5,680)
Change in valuation allowance	(4,703)	(7,362)	18,259
Adjustments related to prior years	3,329	(2,648)	(912)
U.S. tax reform (the Tax Act)	(41,554)	—	—
Income tax credits generated	(7,296)	(40,301)	(1,919)
Repatriation of foreign earnings and profits	719	25,604	91
Expiration of net operating losses and credits	166	15,092	74
Non-deductible loss on acquisition of J-Devices (Note 3)	—	—	4,725
Other	1,430	361	(1,238)
Income tax expense	<u>\$ 38,982</u>	<u>\$ 47,853</u>	<u>\$ 28,035</u>



**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

The change in valuation allowance, excluding the impact of the Tax Act, for 2017, 2016 and 2015 is primarily the result of changes in net operating loss and tax credit carryforwards for which no tax expense or benefit has been recognized. The benefit of foreign income taxed at different rates has increased as foreign income before tax has increased. In 2016, we recognized taxable income and associated foreign income tax credits from the repatriation of foreign earnings and profits in connection with the merger of our Japanese subsidiaries. In 2015, we recognized a loss in connection with our increased ownership interest in J-Devices which is not deductible for income tax purposes.

The following is a summary of the components of our deferred tax assets and liabilities:

	December 31,	
	2017	2016
	(In thousands)	
Deferred tax assets:		
Net operating loss carryforwards	\$ 53,130	\$ 111,899
Income tax credits	23,998	41,900
Property, plant and equipment	35,479	21,860
Accrued liabilities	68,091	68,563
Receivable	32,719	—
Unrealized foreign exchange loss	1,924	531
Other	12,682	14,583
<b>Total deferred tax assets</b>	<b>228,023</b>	<b>259,336</b>
Valuation allowance	(83,338)	(165,367)
<b>Total deferred tax assets net of valuation allowance</b>	<b>144,685</b>	<b>93,969</b>
Deferred tax liabilities:		
Property, plant and equipment	15,754	20,407
Deferred gain	939	2,655
Unrealized foreign exchange gain	8,383	990
Other	4,566	4,836
<b>Total deferred tax liabilities</b>	<b>29,642</b>	<b>28,888</b>
<b>Net deferred tax assets</b>	<b>\$ 115,043</b>	<b>\$ 65,081</b>
Recognized as:		
Other assets	117,608	66,831
Other non-current liabilities	(2,565)	(1,750)
<b>Total</b>	<b>\$ 115,043</b>	<b>\$ 65,081</b>

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

Valuation allowance against deferred tax assets consist of the following:

	December 31,	
	2017	2016
	(In thousands)	
Valuation allowance:		
U.S.	\$ 43,719	\$ 164,479
Portugal	39,009	—
Other	610	888
<b>Total valuation allowance</b>	<b>\$ 83,338</b>	<b>\$ 165,367</b>

U.S. deferred tax assets and liabilities were remeasured down to the new U.S. federal tax rate of 21% as a result of the Tax Act. In connection with our acquisition of Nanium, we acquired a receivable which resulted in the creation of a deferred tax asset. The decrease in our valuation allowance included the reversal of the valuation allowance against most of our U.S. deferred tax assets in connection with the Tax Act offset by the valuation allowance against the deferred tax assets of our Portuguese deferred tax assets, acquired in 2017.

As a result of certain capital investments, export commitments and employment levels, income from operations in Korea, Malaysia, the Philippines, Singapore and Taiwan was subject to reduced income tax rates and, in some cases, was exempt from income taxes. We recognized \$6.2 million, \$5.6 million and \$3.3 million in tax benefits as a result of the tax holidays in 2017, 2016 and 2015, respectively. The benefit of the tax holidays on diluted earnings per share was approximately \$0.03, \$0.02 and \$0.01 for 2017, 2016 and 2015, respectively.

Our net operating loss carryforwards (“NOL’s”) are as follows:

	December 31,		Expiration
	2017	2016	
	(In thousands)		
U.S. Federal NOL’s	\$ 220,445	\$ 292,715	2021-2037
U.S. State NOL’s	121,095	138,218	2018-2036
Foreign NOL’s	2,967	3,378	2018-2025

We monitor on an ongoing basis our ability to utilize our deferred tax assets and whether there is a need for a related valuation allowance. In evaluating our ability to recover our deferred tax assets in the jurisdictions from which they arise, we consider all available positive and negative evidence, including scheduled reversals of deferred tax liabilities, projected future taxable income, tax-planning strategies and results of recent operations. For most of our U.S. and foreign deferred tax assets, we consider it more likely than not that we will have sufficient taxable income to allow us to realize these deferred tax assets.

In prior years, the deferred tax assets along with the U.S. federal and state net operating losses available for carryforward have been fully reserved with valuation allowances. During the fourth quarter of 2017, we determined it was more likely than not that we will have sufficient taxable income to allow us to realize most of our U.S. deferred tax assets, including a substantial portion of our U.S. net operating loss carryforward. Our evaluation considered, among other factors, limitations on the deductibility of interest expense in connection with the Tax Act. At December 31, 2017, a portion of our U.S. federal net operating loss carryforward continues to be reserved with a valuation allowance due to an estimate of the net operating loss carryforward not expected to be realized due to GILTI, due to ownership change limitations from a prior year acquisition as well as certain state net operating loss carryforwards expected to expire unused. Our ability to utilize our U.S. net operating loss carryforwards may be limited in the future if we experience an ownership change as defined by the Internal Revenue Code.

## AMKOR TECHNOLOGY, INC.

## Notes to Consolidated Financial Statements — (Continued)

At December 31, 2017, we have various tax credits available to be carried forward including U.S. foreign income tax credits totaling \$12.6 million which expire in 2026. The deferred tax assets associated with the U.S. foreign income tax credits expected to expire unused have been fully reserved with a valuation allowance. Income tax credits generated by certain of our foreign subsidiaries in 2017, 2016 and 2015 have been recognized in our income tax provision.

As a result of the deemed repatriation provision of the Tax Act, U.S. income taxes have been provided on approximately \$1.1 billion of the undistributed earnings of our foreign subsidiaries at December 31, 2017. However, we have not provided foreign withholding taxes or state income taxes on the undistributed earnings of our foreign subsidiaries, over which we have sufficient influence to control the distribution of such earnings and have determined that substantially all such earnings have been reinvested indefinitely. These earnings could become subject to foreign withholding tax if they are remitted as dividends. We estimate that repatriation of these foreign earnings would generate withholding taxes and state income taxes of approximately \$80.5 million.

We operate in and file income tax returns in various U.S. and foreign jurisdictions which are subject to examination by tax authorities. We have tax returns that are open to examination in various jurisdictions for tax years 2010-2017. The open years contain matters that could be subject to differing interpretations of applicable tax laws and regulations related to the amount and/or timing of income, deductions and tax credits. There can be no assurance that the outcome of examinations will be favorable. Our unrecognized tax benefits are subject to change as examinations of specific tax years are completed in the respective jurisdictions. Current examinations include our 2012 and 2013 Philippine income tax returns, 2013-2015 Portuguese income tax returns, and 2010-2014 Malaysian income tax returns.

A reconciliation of the beginning and ending gross amount of unrecognized tax benefits is as follows:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Balance at January 1	\$ 23,149	\$ 23,332	\$ 12,670
Additions based on tax positions related to the current year	1,419	1,822	12,727
Additions for tax positions of prior years	2,661	689	3,341
Reductions for tax positions of prior years	(1)	(2,589)	(4,815)
Reductions from lapse of statutes of limitations	(17)	(105)	(591)
Balance at December 31	<u>\$ 27,211</u>	<u>\$ 23,149</u>	<u>\$ 23,332</u>

The net increase in our unrecognized tax benefits was \$4.1 million from December 31, 2016 to December 31, 2017. The increases were primarily related to income attribution and income characterization. At December 31, 2017, all of our gross unrecognized tax benefits would reduce our effective tax rate, if recognized.

The liability related to our unrecognized tax benefits is \$24.8 million as of December 31, 2017, and is reported as a component of other non-current liabilities. The unrecognized tax benefits presented in the table above also include positions that have reduced deferred tax assets. The balance of accrued and unpaid interest and penalties is \$4.2 million as of December 31, 2017 and is included as a component of other non-current liabilities in connection with our unrecognized tax benefits.

## 7. Earnings Per Share

Basic earnings per share ("EPS") is computed by dividing net income attributable to Amkor common stockholders by the weighted-average number of common shares outstanding during the period. The weighted-average number of common shares outstanding includes restricted shares held by retirement eligible recipients and is reduced for treasury stock.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

Diluted EPS is computed on the basis of the weighted-average number of shares of common stock plus the effect of dilutive potential common shares outstanding during the period. Dilutive potential common shares include outstanding stock options and unvested restricted shares.

The following table summarizes the computations of basic and diluted EPS:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands, except per share data)		
Net income attributable to Amkor	\$ 260,706	\$ 164,190	\$ 51,098
Income allocated to participating securities	—	—	(59)
Net income available to Amkor common stockholders	<u>\$ 260,706</u>	<u>\$ 164,190</u>	<u>\$ 51,039</u>
Weighted-average shares outstanding — basic	238,937	237,416	236,850
Effect of dilutive securities:			
Stock options and restricted share awards	714	618	320
Weighted-average shares outstanding — diluted	<u>239,651</u>	<u>238,034</u>	<u>237,170</u>
Net income attributable to Amkor per common share:			
Basic	\$ 1.09	\$ 0.69	\$ 0.22
Diluted	1.09	0.69	0.22

The following table summarizes the potential shares of common stock that were excluded from diluted EPS, because the effect of including these potential shares was anti-dilutive:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Stock options and restricted share awards	3,445	1,135	1,858

**8. Factoring of Accounts Receivable**

In certain foreign locations, we use non-recourse factoring arrangements with third party financial institutions to manage our working capital and cash flows. Under this program, we sell receivables to a financial institution for cash at a discount to the face amount. As part of the factoring arrangements, we perform certain collection and administrative functions for the receivables sold. For the year ended December 31, 2017 and 2016, we sold accounts receivable totaling \$611.2 million and \$574.1 million, respectively, net of discounts and fees of \$4.6 million and \$2.5 million, respectively.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

**9. Inventories**

Inventories consist of the following:

	December 31,	
	2017	2016
	(In thousands)	
Raw materials and purchased components	\$ 213,649	\$ 173,035
Work-in-process	112,843	94,955
Total inventories	\$ 326,492	\$ 267,990

**10. Property, Plant and Equipment**

Property, plant and equipment consist of the following:

	December 31,	
	2017	2016
	(In thousands)	
Land	\$ 224,894	\$ 240,719
Land use rights	26,845	26,845
Buildings and improvements	1,384,846	1,362,007
Machinery and equipment	4,938,291	4,483,523
Software and computer equipment	200,500	205,969
Furniture, fixtures and other equipment	15,722	21,313
Construction in progress	104,910	87,037
Total property, plant and equipment	6,896,008	6,427,413
Less accumulated depreciation and amortization	(4,200,943)	(3,862,765)
Total property, plant and equipment, net	\$ 2,695,065	\$ 2,564,648

The following table summarizes our depreciation expense:

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
Depreciation expense	\$ 580,172	\$ 552,989	\$ 492,458

We had \$46.9 million and \$44.8 million of costs for our factory and research and development facility in Korea ("K5") in construction in progress as of December 31, 2017 and 2016, respectively.

As part of our plan to consolidate factory operations in Korea, we sold the land and buildings comprising our K1 factory in May 2017 for \$142.4 million. We received 10% of the sale price at signing in November 2016 and the balance at closing, at which time we recognized a pre-tax gain of \$108.1 million.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

**11. Goodwill**

Changes in the carrying amount of goodwill are as follows:

	<b>Goodwill</b>
	<b>(In thousands)</b>
Balance at December 31, 2015	\$ 23,409
Translation adjustment	713
Balance at December 31, 2016	\$ 24,122
Translation adjustment	914
Balance at December 31, 2017	\$ 25,036

Goodwill relates to the increase in our ownership interest in J-Devices to 100% on December 30, 2015 (Note 3). No goodwill impairment has been identified in any of the years presented.

**12. Accrued Expenses**

Accrued expenses consist of the following:

	<b>December 31,</b>	
	<b>2017</b>	<b>2016</b>
	<b>(In thousands)</b>	
Payroll and benefits	\$ 134,785	\$ 117,636
Deferred revenue and customer advances	63,196	65,653
Income taxes payable	56,664	37,961
Accrued settlement costs	37,783	35,304
Accrued severance plan obligations (Note 14)	15,190	14,053
Accrued interest	11,873	13,046
Other accrued expenses	55,107	55,016
Total accrued expenses	\$ 374,598	\$ 338,669

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

**13. Debt**

Short-term borrowings and long-term debt consist of the following:

	December 31,	
	2017	2016
(In thousands)		
<b>Debt of Amkor Technology, Inc.:</b>		
Senior secured credit facilities:		
\$200 million revolving credit facility, LIBOR plus 1.25%-1.75%, due December 2019 (1)	\$ —	\$ —
Senior notes:		
6.625% Senior notes, due June 2021 (2)	200,000	400,000
6.375% Senior notes, due October 2022	524,971	524,971
<b>Debt of subsidiaries:</b>		
Amkor Technology Korea, Inc.:		
\$75 million revolving credit facility, foreign currency funding-linked base rate plus 1.60%, due June 2018 (3)	75,000	—
Term loan, LIBOR plus 2.70%, due December 2019	55,000	55,000
Term loan, foreign currency funding-linked base rate plus 1.32%, due May 2020	150,000	150,000
Term loan, fixed rate at 3.70%, due May 2020 (4)	120,000	—
Term loan, fund floating rate plus 1.60%, due June 2020 (5)	86,000	86,000
Term loan, LIBOR plus 2.60%, due May 2018 (4)	—	120,000
Term loan, foreign currency funding-linked base rate plus 1.33%, due May 2020 (3)	—	80,000
J-Devices Corporation:		
Short-term term loans, variable rates (6)	30,455	22,230
Term loans, fixed rate at 0.53%, due April 2018	6,744	19,460
Term loan, fixed rate at 0.86%, due June 2022 (7)	39,933	—
Term loan, fixed rate at 0.60%, due July 2022 (8)	8,430	—
Other:		
Revolving credit facility, TAIFX plus a bank-determined spread, due November 2020 (Taiwan) (9)	20,000	20,000
Term loan, LIBOR plus 1.80%, due December 2019 (China) (10)	49,000	—
	1,365,533	1,477,661
Less: Unamortized premium and deferred debt costs, net	(1,104)	(2,831)
Less: Short-term borrowings and current portion of long-term debt	(123,848)	(35,192)
Long-term debt (including related party)	\$ 1,240,581	\$ 1,439,638

- (1) Our \$200.0 million senior secured revolving credit facility has a letter of credit sub-limit facility of \$25.0 million. Principal is payable at maturity. The availability for the revolving credit facility is based on the amount of our eligible accounts receivable. As of December 31, 2017, we had availability of \$199.4 million under this facility, after reduction of \$0.6 million of outstanding standby letters of credit.
- (2) In July 2017, we redeemed \$200.0 million aggregate principal amount of the outstanding \$400.0 million of our 6.625% Senior Notes due 2021 ("Notes"), which included \$17.5 million held by a related party. In accordance with the terms of the indenture governing the Notes, the redemption price was 101.656% of the principal amount

**AMKOR TECHNOLOGY, INC.**

**Notes to Consolidated Financial Statements — (Continued)**

of the Notes, plus accrued and unpaid interest. We recorded a \$3.3 million loss on extinguishment related to the premium paid on the call of the Notes and a \$1.1 million charge for the write-off of the associated unamortized debt issuance costs. The redemption of the Notes was funded with cash on hand. In 2017, our related party sold all of its remaining Notes in the open market reducing the long-term debt, related party balance to zero.

- (3) In April 2017, we decreased the revolving credit facility from \$100.0 million to \$75.0 million. Principal is payable at maturity, which was extended in June 2017 for one year to June 2018. In April 2017, we borrowed \$75.0 million on this facility and repaid the outstanding balance of \$80.0 million on our term loan due May 2020.
- (4) In May 2017, we entered into a \$120.0 million term loan agreement to repay the \$120.0 million term loan due in 2018. The new term loan agreement extended the maturity date to 2020 and changed the interest rate to a fixed rate. Principal is payable at maturity.
- (5) In May 2015, we entered into a term loan agreement pursuant to which we may borrow up to \$150.0 million for capital expenditures. Principal is payable at maturity. As of December 31, 2017, \$64.0 million was available to be borrowed.
- (6) We entered into various short-term loans which mature semiannually. Principle is payable in monthly installments. As of December 31, 2017, \$6.2 million was available to be drawn.
- (7) In June 2017, we entered into a ¥5.0 billion term loan agreement for capital expenditures. Principal is payable in quarterly installments of ¥250.0 million. In June 2017, we borrowed ¥5.0 billion.
- (8) In July 2017, we entered into a ¥1.0 billion term loan agreement for capital expenditures. Principal is payable in quarterly installments of ¥50.0 million. In July 2017, we borrowed ¥1.0 billion.
- (9) In November 2015, we entered into a \$39.0 million revolving credit facility. Principal is payable at maturity. As of December 31, 2017, \$19.0 million was available to be drawn.
- (10) In December 2016, we entered into a \$50.0 million term loan agreement. Principal is payable in semiannual installments of \$0.5 million, with the remaining balance due at maturity. In January 2017, we borrowed \$50.0 million.

Our foreign debt is generally collateralized by the land, buildings and equipment in the respective locations. The carrying value of the collateral exceeds the carrying amount of the debt.

***Interest Rates***

Interest is payable semiannually on our senior notes and quarterly or monthly on our other fixed- and variable-rate debt. Refer to the table above for the interest rates on our fixed-rate debt and to the table below for the interest rates on our variable-rate debt.



**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

	December 31,	
	2017	2016
<b>Amkor Technology, Inc.:</b>		
\$200 million revolving credit facility, LIBOR plus 1.25%-1.75%, due December 2019	—%	—%
<b>Amkor Technology Korea, Inc.:</b>		
\$75 million revolving credit facility, foreign currency funding-linked base rate plus 1.60%, due June 2018	4.01%	—%
Term loan, LIBOR plus 2.60%, due May 2018	—%	3.49%
Term loan, LIBOR plus 2.70%, due December 2019	4.02%	3.54%
Term loan, foreign currency funding-linked base rate plus 1.32%, due May 2020	4.06%	3.58%
Term loan, foreign currency funding-linked base rate plus 1.33%, due May 2020	—%	3.59%
Term Loan, fund floating rate plus 1.60%, due June 2020	3.29%	2.79%
<b>J-Devices Corporation:</b>		
Short-term credit facilities, variable rates	0.22%	0.32%
<b>Amkor Technology Taiwan Ltd.:</b>		
Revolving credit facility, TAIFX plus a bank-determined spread, due November 2020	3.18%	2.78%
<b>Amkor Assembly &amp; Test (Shanghai) Co., Ltd.:</b>		
Term loan, LIBOR plus 1.80%, due December 2019	3.16%	—%

**Compliance with Debt Covenants**

The debt of Amkor Technology, Inc. is structurally subordinated in right of payment to all existing and future debt and other liabilities of our subsidiaries. The agreements governing our indebtedness contain a number of affirmative and negative covenants which restrict our ability to pay dividends and could restrict our operations. We have never paid a dividend to our stockholders and we do not have any present plans for doing so. We were in compliance with all of our covenants at December 31, 2017 and 2016.

**Maturities**

	<b>Total Debt</b>
	<b>(In thousands)</b>
Payments due for the year ending December 31,	
2018	\$ 123,848
2019	173,649
2020	326,649
2021	210,649
2022	530,738
Total debt	<u>\$ 1,365,533</u>

**14. Pension and Severance Plans**

**Korean Severance Plan**

Our subsidiary in Korea maintains an unfunded severance plan that covers certain employees that were employed prior to August 1, 2015. To the extent eligible employees are terminated, our subsidiary in Korea would be required to make lump-

## AMKOR TECHNOLOGY, INC.

## Notes to Consolidated Financial Statements — (Continued)

sum severance payments on behalf of these eligible employees for service provided prior to August 1, 2015. Factors used to determine severance benefits include employees' length of service, seniority and rate of pay. The employees' length of service and seniority are fixed as of July 31, 2015. The employees' rate of pay is adjusted to the rate of pay at the time of termination. Accrued severance benefits are estimated assuming all eligible employees were to terminate their employment at the balance sheet date. Our contributions to the National Pension Plan of the Republic of Korea are deducted from accrued severance benefit liabilities. On August 1, 2015, our subsidiary in Korea began sponsoring a defined benefit pension plan and a defined contribution plan. Existing employees at that time were given the option of choosing either a defined benefit pension plan or a defined contribution plan for their future benefits and new employees since that date are enrolled in a defined contribution plan.

The changes to the balance of our accrued severance plan obligations are as follows:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Balance at January 1	\$ 136,396	\$ 143,151	\$ 146,880
Provision of severance benefits	11,714	6,746	21,088
Severance payments	(11,787)	(9,429)	(15,021)
Foreign currency (gain) loss	17,597	(4,072)	(9,796)
Balance at December 31	153,920	136,396	143,151
Payments remaining with the National Pension Fund	(185)	(182)	(192)
Total accrued severance plan obligations at December 31	153,735	136,214	142,959
Less current portion of accrued severance plan obligations (Note 12)	15,190	14,053	14,306
Non-current portion of accrued severance plan obligations	\$ 138,545	\$ 122,161	\$ 128,653

**Foreign Defined Benefit Pension Plans**

Our subsidiaries in Japan, Korea, Malaysia, the Philippines and Taiwan sponsor defined benefit plans (the "Plans"). Charges to expense are based upon actuarial analyses. The following table summarizes the changes to the Plans' benefit obligations, fair value of the Plans' assets and the funded status of the Plans at December 31, 2017 and 2016:

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

	For the Year Ended December 31	
	2017	2016
	(In thousands)	
<b>Change in projected benefit obligation:</b>		
Projected benefit obligation at January 1	\$ 131,416	\$ 109,695
Service cost	33,823	33,854
Interest cost	4,067	3,641
Benefits paid	(15,183)	(8,499)
Actuarial (gain) loss	(1,387)	(2,801)
Effects of curtailment	573	—
Settlement	(2,496)	(1,165)
Foreign exchange (gain) loss	7,653	(3,309)
Projected benefit obligation at December 31	158,466	131,416
<b>Change in plan assets:</b>		
Fair value of plan assets at January 1	91,471	76,042
Actual gain (loss) on plan assets	8,559	2,876
Employer contributions	28,073	25,114
Settlement	(2,496)	(1,165)
Benefits paid	(15,183)	(8,499)
Foreign exchange gain (loss)	5,301	(2,897)
Fair value of plan assets at December 31	115,725	91,471
Funded status of the Plans at December 31	\$ (42,741)	\$ (39,945)

	December 31,	
	2017	2016
	(In thousands)	
<b>Amounts recognized in the Consolidated Balance Sheets consist of:</b>		
Prepaid benefit cost (included in non-current assets)	\$ 656	\$ —
Accrued benefit liability (included in pension and severance obligations)	(43,397)	(39,945)
Net amount recognized at year end	\$ (42,741)	\$ (39,945)

The accumulated benefit obligation as of December 31, 2017 and 2016 was \$113.6 million and \$94.5 million, respectively.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

The following table summarizes, by component, the change in accumulated other comprehensive income (loss), net of tax related to our Plans:

	Prior Service Cost	Actuarial Net Gain (Loss)	Total
	(In thousands)		
Balance at December 31, 2015	\$ 560	\$ (1,985)	\$ (1,425)
Amortization included in net periodic pension cost	22	73	95
Net gain (loss) arising during period	—	2,468	2,468
Adjustments to unrealized components of defined benefit pension plan included in other comprehensive income (loss)	22	2,541	2,563
Balance at December 31, 2016	582	556	1,138
Amortization included in net periodic pension cost	21	69	90
Net gain (loss) arising during period	—	5,075	5,075
Adjustments to unrealized components of defined benefit pension plan included in other comprehensive income (loss)	21	5,144	5,165
Balance at December 31, 2017	\$ 603	\$ 5,700	\$ 6,303
Estimated amortization of cost to be included in 2018 net periodic pension cost	\$ 1	\$ (147)	\$ (146)

Information for pension plans with benefit obligations in excess of plan assets is as follows:

	December 31,	
	2017	2016
	(In thousands)	
Plans with underfunded or non-funded projected benefit obligation:		
Aggregate projected benefit obligation	\$ 119,708	\$ 131,416
Aggregate fair value of plan assets	76,313	91,471
Plans with underfunded or non-funded accumulated benefit obligation:		
Aggregate accumulated benefit obligation	53,720	49,285
Aggregate fair value of plan assets	18,970	16,811

The following table summarizes total pension expense:

	For the Year Ended December 31		
	2017	2016	2015
	(In thousands)		
Components of net periodic pension cost and total pension expense:			
Service cost	\$ 33,823	\$ 33,854	\$ 12,481
Interest cost	4,067	3,641	2,954
Expected return on plan assets	(4,537)	(3,788)	(3,330)
Amortization of prior service cost	30	35	34
Recognized actuarial (gain) loss	84	94	91
Net periodic pension cost	33,467	33,836	12,230
Curtailment loss	574	—	—
Settlement (gain) loss	383	128	27
Total pension expense	\$ 34,424	\$ 33,964	\$ 12,257

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

As a result of the adoption of a defined benefit pension plan in Korea beginning on August 1, 2015, and the acquisition of J-Devices on December 30, 2015, our net periodic pension cost has increased from the prior period.

The following table summarizes the weighted-average assumptions used in computing the net periodic pension cost and projected benefit obligations:

	For the Year Ended December 31		
	2017	2016	2015
Discount rate for determining net periodic pension cost	3.1%	3.3%	4.2%
Discount rate for determining benefit obligations at December 31	3.2%	3.1%	3.3%
Rate of compensation increase for determining net periodic pension cost	3.8%	3.9%	4.7%
Rate of compensation increase for determining benefit obligations at December 31	3.8%	3.8%	3.9%
Expected rate of return on plan assets for determining net periodic pension cost	4.9%	5.0%	6.2%

The measurement date for determining the Plans' assets and benefit obligations is December 31, each year. Discount rates are generally derived from yield curves constructed from high-quality corporate or foreign government bonds, for which the timing and amount of cash outflows approximate the estimated payouts.

The expected rate of return assumption is based on weighted-average expected returns for each asset class. Expected returns reflect a combination of historical performance analysis and the forward-looking views of the financial markets and include input from our actuaries. We have no control over the direction of our investments in our defined benefit plans in Taiwan as the local Labor Standards Law Fund mandates such contributions into a cash account balance at the Bank of Taiwan. Our defined benefit pension plan in Malaysia is a non-funded plan, and as such, no asset exists related to this plan. Our investment strategies for our defined benefit plans in Japan, Korea and the Philippines, are based on long-term, sustained asset growth through low to medium risk investments. The current rate of return assumption targets are based on asset allocation strategies as follows:

	Allocation		
	Debt	Equity	Other
Japan defined benefit plan	60%	37%	3%
Korea defined benefit plan	40%	50%	10%
Philippine defined benefit plan	40%	56%	4%

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

The fair value of our pension plan assets, by asset category utilizing the fair value hierarchy as discussed in Note 16, is as follows:

	December 31,	
	2017	2016
	(In thousands)	
Cash and cash equivalents (Level 1)	\$ 1,098	\$ 10,419
Equity securities		
U.S. securities (Level 1)	16,854	12,602
Foreign securities (Level 1)	16,826	8,825
Foreign mutual funds (Level 1)	22,193	12,718
	<u>55,873</u>	<u>34,145</u>
Debt securities		
U.S. government bonds (Level 1)	2,188	2,859
U.S. government bonds (Level 2)	830	—
U.S. corporate bonds (Level 1)	2,144	1,980
U.S. corporate bonds (Level 2)	5	—
Foreign government bonds (Level 1)	5,211	11,001
Foreign government bonds (Level 2)	6,270	7,727
Foreign corporate bonds (Level 1)	520	—
Foreign corporate bonds (Level 2)	3,058	1,693
Foreign treasury notes (Level 1)	4,686	—
Foreign mutual funds (Level 1)	8,787	10,044
	<u>33,699</u>	<u>35,304</u>
Foreign guaranteed investment contracts (Level 2)	14,138	2,445
Taiwan retirement fund (Level 1)	10,094	8,972
Other (Level 1)	584	—
Other (Level 2)	239	186
Total fair value of pension plan assets	<u>\$ 115,725</u>	<u>\$ 91,471</u>

The Taiwan retirement fund category of our plan assets represents accounts that our subsidiaries in Taiwan have in a government labor retirement fund in the custody of the Bank of Taiwan. The accounts earn a minimum guaranteed rate of return and are invested in a mix of cash, domestic and foreign equity securities and domestic and foreign debt securities.

We expect to make contributions of approximately \$23 million during 2018. We closely monitor the funded status of the Plans with respect to legislative requirements. We intend to make at least the minimum contribution required by law each year.

**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

The estimated future benefit payments related to our foreign defined benefit plans are as follows:

	<b>Payments</b>
	<b>(In thousands)</b>
2018	\$ 6,288
2019	7,516
2020	9,538
2021	11,602
2022	14,143
2023 to 2027	107,557

**Defined Contribution Plans**

We sponsor defined contribution plans in Korea, Malaysia, Taiwan and the U.S. Total defined contribution expense was \$10.4 million, \$8.8 million and \$8.6 million for 2017, 2016 and 2015, respectively.

**15. Accumulated Other Comprehensive Income (Loss)**

The following table reflects the changes in accumulated other comprehensive income (loss), net of tax:

	<b>Defined Benefit Pension</b>	<b>Foreign Currency Translation</b>	<b>Total</b>
	<b>(In thousands)</b>		
Balance at December 31, 2015	\$ (1,425)	\$ (659)	\$ (2,084)
Other comprehensive income (loss) before reclassifications	2,468	5,783	8,251
Amounts reclassified from accumulated other comprehensive income (loss)	95	—	95
Other comprehensive income (loss)	2,563	5,783	8,346
Balance at December 31, 2016	\$ 1,138	\$ 5,124	\$ 6,262
Other comprehensive income (loss) before reclassifications	5,075	11,092	16,167
Amounts reclassified from accumulated other comprehensive income (loss)	90	—	90
Other comprehensive income (loss)	5,165	11,092	16,257
Balance at December 31, 2017	\$ 6,303	\$ 16,216	\$ 22,519

Amounts reclassified out of accumulated other comprehensive income (loss) are included as a component of net periodic pension cost (Note 14) or other (income) expense, net.

**16. Fair Value Measurements**

The accounting framework for determining fair value includes a hierarchy for ranking the quality and reliability of the information used to measure fair value, which enables the reader of the financial statements to assess the inputs used to develop those measurements. The fair value hierarchy consists of three tiers as follows: Level 1, defined as quoted market prices in active markets for identical assets or liabilities; Level 2, defined as inputs other than Level 1 that are observable, either directly or indirectly, such as quoted prices for similar assets or liabilities, quoted prices in markets that are not active, model-based valuation techniques for which all significant assumptions are observable in the market or other inputs that are observable or can be corroborated by observable market data for substantially the full term of the assets or liabilities; and Level 3, defined as unobservable inputs that are not corroborated by market data.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

The fair values of cash, accounts receivable, trade accounts payable, capital expenditures payable, and certain other current assets and accrued expenses approximate carrying values because of their short-term nature. The carrying value of certain other non-current assets and liabilities approximates fair value. Our assets and liabilities recorded at fair value on a recurring basis include cash equivalent money market funds and restricted cash money market funds. We also review goodwill for impairment annually during the fourth quarter of each year. Cash equivalent money market funds and restricted cash money market funds are invested in U.S. money market funds and various U.S. and foreign bank operating and time deposit accounts, which are due on demand or carry a maturity date of less than three months when purchased. No restrictions have been imposed on us regarding withdrawal of balances with respect to our cash equivalents as a result of liquidity or other credit market issues affecting the money market funds we invest in or the counterparty financial institutions holding our deposits. Money market funds are valued using quoted market prices in active markets for identical assets.

Recurring fair value measurements consist of the following:

	December 31,	
	2017	2016
(In thousands)		
Cash equivalent money market funds (Level 1)	\$ 121,627	\$ 39,548
Restricted cash money market funds (Level 1)	2,000	2,000

We also measure certain assets and liabilities, including property, plant and equipment and goodwill, at fair value on a nonrecurring basis.

We measure the fair value of our debt for disclosure purposes. The following table presents the fair value of financial instruments that are not recorded at fair value on a recurring basis:

	December 31, 2017		December 31, 2016	
	Fair Value	Carrying Value	Fair Value	Carrying Value
(In thousands)				
Senior notes (Level 1)	\$ 745,943	\$ 723,867	\$ 954,765	\$ 922,140
Revolving credit facilities and term loans (Level 2)	639,689	640,562	551,793	552,690
Total financial instruments	\$ 1,385,632	\$ 1,364,429	\$ 1,506,558	\$ 1,474,830

The estimated fair value of our senior notes is based primarily on quoted market prices reported on or near the respective balance sheet dates. The estimated fair value of our revolving credit facilities and term loans is calculated using a discounted cash flow analysis, which utilizes market based assumptions including forward interest rates adjusted for credit risk.

**17. Commitments and Contingencies**

We generally warrant that our services will be performed in a professional and workmanlike manner and in compliance with our customers' specifications. We accrue costs for known warranty issues. Historically, our warranty costs have been immaterial.

**Legal Proceedings**

We are involved in claims and legal proceedings and may become involved in other legal matters arising in the ordinary course of our business. We evaluate these claims and legal matters on a case-by-case basis to make a determination as to the impact, if any, on our business, liquidity, results of operations, financial condition or cash flows. Although the outcome of these matters is uncertain, we believe that the ultimate outcome of these claims and proceedings, individually and in the aggregate, will not have a material adverse impact to us. Our evaluation of the potential impact of these claims and legal proceedings on our business, liquidity, results of operations, financial condition or cash flows could change in the future.



**AMKOR TECHNOLOGY, INC.**  
**Notes to Consolidated Financial Statements — (Continued)**

*Settlement of Patent License Litigation*

Under the terms of a January 2015 patent license litigation settlement, Amkor agreed to pay a total of \$155.0 million in 16 equal quarterly recurring payments commencing in the first quarter of 2015, and continuing through the fourth quarter of 2018. During the three months ended December 31, 2014, we recorded a pre-tax charge of \$87.1 million, of which \$75.3 million was charged to cost of sales and \$11.8 million was charged to interest expense. This charge reflected the aggregate amount due under the settlement agreement, net of amounts previously reserved.

At December 31, 2017, the remaining amount we owe under our settlement agreement was \$38.8 million. The liability is recorded in accrued expenses (Note 12) in our Consolidated Financial Statements. We will also charge \$1.0 million of the amount owed to interest expense over the remaining term of the arrangement.

**Leases**

Future minimum lease payments under operating leases that have initial or remaining noncancelable lease terms in excess of one year are:

	<b>For the Year Ended December 31</b>
	<b>(In thousands)</b>
2018	\$ 26,439
2019	21,740
2020	13,694
2021	10,530
2022	8,468
Thereafter	28,955
Total future minimum lease payments	<u>\$ 109,826</u>

Rent expense was \$48.1 million, \$43.8 million and \$24.5 million for 2017, 2016 and 2015, respectively.

In order to provide packaging and test services, we purchase materials under various long-term supply contracts. Future minimum payments to be made under these contracts for the period 2018 through 2028 are \$18.3 million.

**18. Business Segments, Customer Concentrations and Geographic Information**

We operate as a single operating segment as managed by our Chief Executive Officer, who is considered our chief operating decision maker ("CODM"). The CODM bears the ultimate responsibility for, and is actively engaged in, the allocation of resources and the evaluation of our operating and financial results. We have concluded that we have a single operating segment based on the following:

- We are managed under a functionally-based organizational structure with the head of each function reporting directly to the CODM;
- We assess performance, including incentive compensation, based on consolidated operating performance and financial results;
- Our CODM allocates resources and makes other operating decisions based on specific customer business opportunities and
- We have an integrated process for the design, development and manufacturing services we provide to all of our customers. We also have centralized sales and administrative functions.

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

Net sales by product group consist of the following:

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
Advanced Products	\$ 1,950,340	\$ 1,679,529	\$ 1,432,493
Mainstream Products	2,236,157	2,214,106	1,452,110
Total net sales	<u>\$ 4,186,497</u>	<u>\$ 3,893,635</u>	<u>\$ 2,884,603</u>

Net sales by region based on customer headquarters location consist of the following:

	For the Year Ended December 31,		
	2017	2016	2015
	(In thousands)		
Japan	\$ 1,208,822	\$ 1,158,318	\$ 372,810
Asia Pacific (excluding Japan)	827,061	627,177	609,409
Europe, Middle East and Africa	536,552	487,584	489,842
Total foreign countries	2,572,435	2,273,079	1,472,061
United States	1,614,062	1,620,556	1,412,542
Total net sales	<u>\$ 4,186,497</u>	<u>\$ 3,893,635</u>	<u>\$ 2,884,603</u>

One customer accounted for 14.3%, 15.8%, and 11.0% of net sales in 2017, 2016 and 2015, respectively. A second customer accounted for 12.7% and 14.4% of net sales in 2016 and 2015, respectively. Net sales for our second customer were below 10% in 2017.

Property, plant and equipment, net, based on physical location, consist of the following:

	December 31,	
	2017	2016
	(In thousands)	
China	\$ 528,739	\$ 500,319
Japan	246,223	245,233
Korea	1,131,271	1,130,147
Malaysia	47,922	36,248
Philippines	309,425	313,885
Portugal	64,578	—
Taiwan	356,174	326,614
Other foreign countries	216	243
Total foreign countries	2,684,548	2,552,689
United States	10,517	11,959
Total property, plant and equipment, net	<u>\$ 2,695,065</u>	<u>\$ 2,564,648</u>

AMKOR TECHNOLOGY, INC.

Notes to Consolidated Financial Statements — (Continued)

19. Quarterly Results (unaudited)

The following table sets forth our consolidated unaudited financial data for the last eight quarters ended December 31, 2017. We believe that we have included all adjustments, consisting only of normal recurring adjustments necessary for a fair statement of our selected quarterly data. The calculation of basic and diluted per share amounts for each quarter is based on the weighted-average shares outstanding for that period; consequently, the sum of the quarters may not necessarily be equal to the full year basic and diluted net income per share.

	For the Quarter Ended							
	Dec. 31, 2017 (e)	Sept. 30, 2017	June 30, 2017 (a)	Mar. 31, 2017	Dec. 31, 2016	Sept. 30, 2016	June 30, 2016	Mar. 31, 2016
	(In thousands, except per share data)							
Net sales	\$ 1,148,423	\$ 1,135,027	\$ 989,447	\$ 913,600	\$ 1,021,613	\$ 1,086,014	\$ 917,326	\$ 868,682
Gross profit	225,494	216,638	172,235	142,906	227,187	213,800	131,606	122,884
Operating income (b)	110,128	98,237	168,293	24,655	126,689	114,615	30,542	22,094
Income tax (benefit) expense	(12,782)	18,752	32,573	439	18,534	24,086	3,360	1,873
Net income (loss)	101,943	55,630	116,459	(9,144)	101,202	61,141	5,366	(405)
Net income (loss) attributable to Amkor	100,770	54,435	115,507	(10,006)	100,263	60,089	4,713	(875)
Net income (loss) attributable to Amkor per common share:								
Basic	\$ 0.42	\$ 0.23	\$ 0.48	\$ (0.04)	\$ 0.42	\$ 0.25	\$ 0.02	\$ —
Diluted	\$ 0.42	\$ 0.23	\$ 0.48	\$ (0.04)	\$ 0.42	\$ 0.25	\$ 0.02	\$ —

- (a) In May 2017, we completed the purchase of Nanium. Nanium's financial results have been included in our Consolidated Financial Statements from the date of acquisition.
- (b) In May 2017, we sold the land and buildings comprising our K1 factory for \$142.4 million which resulted in a pre-tax gain of \$108.1 million.
- (c) In the fourth quarter of 2017, net income includes an estimated net tax benefit of \$41.6 million primarily due to the reversal of a valuation allowance on certain U.S. deferred tax assets as a result of the enactment of the Tax Act.

## SCHEDULE II — VALUATION AND QUALIFYING ACCOUNTS

	Balance at Beginning of Period	Additions (Credited) Charged to Expense	Write-offs	(a) Other	Balance at End of Period
(In thousands)					
<b>Deferred tax asset valuation allowance:</b>					
Year ended December 31, 2015	\$ 149,847	18,507	(248)	(1)	\$ 168,105
Year ended December 31, 2016	\$ 168,105	7,729	(15,091)	4,624	\$ 165,367
Year ended December 31, 2017	\$ 165,367	(116,917)	(489)	35,377	\$ 83,338

- (a) Column represents adjustments to the deferred tax asset valuation allowance established as part of the purchase accounting related to Amkor's acquisition of Nanium in 2017 and adjustments directly through stockholders' equity for changes in accumulated other comprehensive income (loss) related to our foreign defined benefit pension plans and the adoption of ASU 2016-09 on July 1, 2016.

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### **Item 9. *Changes In and Disagreements with Accountants on Accounting and Financial Disclosure***

None.

#### **Item 9A. *Controls and Procedures***

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

We maintain disclosure controls and procedures that are designed to ensure that information required to be disclosed in our periodic reports to the Securities and Exchange Commission (“SEC”) is recorded, processed, summarized and reported within the time periods specified in the SEC’s rules and forms, and that such information is accumulated and communicated to our management, including the Chief Executive Officer and the Chief Financial Officer, as appropriate, to allow timely decisions regarding required disclosure, based on the definition of “disclosure controls and procedures” in Rule 13a-15(e) and Rule 15d-15(e) under the Securities Exchange Act of 1934, as amended. In designing and evaluating the disclosure controls and procedures, management recognizes that any disclosure controls and procedures, no matter how well designed and operated, can provide only reasonable assurance of achieving the desired control objectives, and management necessarily is required to apply its judgment in evaluating the cost-benefit relationship of possible disclosure controls and procedures.

We carried out an evaluation, under the supervision and with the participation of 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 of December 31, 2017, and concluded those disclosure controls and procedures were effective as of that date.

##### **Management’s Report on Internal Control Over Financial Reporting**

Management is responsible for establishing and maintaining adequate internal control over financial reporting, as such term is defined in Exchange Act Rules 13a-15(f) and 15d-15(f). 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.

Internal control over financial reporting includes those policies and procedures that (i) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (ii) 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 (iii) 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. 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 and procedures may deteriorate.

Management conducted an assessment of the effectiveness of our internal control over financial reporting as of December 31, 2017, based on the framework established in Internal Control — Integrated Framework (2013) issued by the Committee of Sponsoring Organizations of the Treadway Commission (“COSO”). Based on the results of this evaluation, our management concluded that our internal control over financial reporting was effective as of December 31, 2017, based on criteria in Internal Control — Integrated Framework (2013) issued by the COSO.

The effectiveness of our internal control over financial reporting as of December 31, 2017, has been audited by PricewaterhouseCoopers LLP, an independent registered public accounting firm, as stated in their report which appears under Item 8 of this Annual Report on Form 10-K.

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

As previously reported, we are implementing an enterprise resource planning system in a multi-year program in certain of our factories. There have been no changes in our internal control over financial reporting that occurred during the

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three months ended December 31, 2017 that have materially affected, or are reasonably likely to materially affect, our internal control over financial reporting.

### **Item 9B. Other Information**

None.

## **PART III**

### **Item 10. Directors, Executive Officers and Corporate Governance**

The information required by this Item 10, with the exception of information relating to the Code of Business Conduct as disclosed below, is incorporated herein by reference from the material included under the captions “Election of Directors,” “Executive Officers,” and “Section 16(a) Beneficial Ownership Reporting Compliance” in our definitive proxy statement (to be filed pursuant to Regulation 14A) for our 2018 Annual Meeting of Stockholders.

Additionally, our Code of Business Conduct, Code of Ethics for Directors, Corporate Governance Guidelines, and the charters of the Audit Committee, Nominating and Governance Committee and Compensation Committee of our Board of Directors are available and maintained on our website (<http://www.amkor.com>). We intend to disclose on our website future amendments or waivers of our Code of Business Conduct required to be disclosed pursuant to applicable rules and regulations.

### **Item 11. Executive Compensation**

The information required by this Item 11 is incorporated herein by reference from the material included under the captions “Executive Compensation,” “Compensation Committee Interlocks and Insider Participation” and “Report of the Compensation Committee of the Board of Directors” in our definitive proxy statement (to be filed pursuant to Regulation 14A) for our 2018 Annual Meeting of Stockholders.

### **Item 12. Security Ownership of Certain Beneficial Owners and Management and Related Stockholder Matters**

The information required by this Item 12, with the exception of the equity compensation plan information presented below, is incorporated herein by reference to our definitive proxy statement (to be filed pursuant to Regulation 14A) for our 2018 Annual Meeting of Stockholders.

## **EQUITY COMPENSATION PLAN**

The following table summarizes our equity compensation plan as of December 31, 2017:

	(a) Number of Securities to be Issued Upon Exercise of Outstanding Options (In thousands)	(b) Weighted Average Exercise Price of Outstanding Options	(c) Number of Securities Remaining Available for Future Issuance Under Equity Compensation Plans (Excluding Securities Reflected in Column(a) (In thousands)
Equity compensation plan approved by stockholders (1)	4,752	\$ 8.86	8,024
Equity compensation plans not approved by stockholders	—	—	—
<b>Total equity compensation plans</b>	<b>4,752</b>		<b>8,024</b>

(1) As of December 31, 2017, a total of 8.0 million shares were reserved for issuance under the 2007 Plan. Shares available for issuance under our 2007 Plan can be granted pursuant to stock options, restricted stock, restricted stock units, stock appreciation rights, performance units and performance shares.

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

The information required by this Item 13 is incorporated herein by reference from the material included under the captions “Certain Relationships and Related Transactions” and “Proposal One — Election of Directors” in our definitive proxy statement (to be filed pursuant to Regulation 14A) for our 2018 Annual Meeting of Stockholders.

**Item 14. *Principal Accountant Fees and Services***

The information required by this Item 14 is incorporated herein by reference from the material included under the proposal “Ratification of Appointment of Independent Registered Public Accounting Firm” in our definitive proxy statement (to be filed pursuant to Regulation 14A) for our 2018 Annual Meeting of Stockholders.

**PART IV**

**Item 15. *Exhibits and Financial Statement Schedules***

*(a) Financial Statements, Financial Statement Schedules and Exhibits*

The financial statements and schedules filed as part of this Annual Report on Form 10-K are listed in the index under Part II, Item 8 of this Annual Report.

The exhibits required by Item 601 of Regulation S-K which are filed with this report or incorporated by reference herein, are set forth in the Exhibit Index. Management contracts or compensatory plans or arrangements are identified by an asterisk.

**Item 16. *Form 10-K Summary***

None.

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**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 Annual Report on Form 10-K to be signed, on its behalf by the undersigned, thereunto duly authorized.

AMKOR TECHNOLOGY, INC.

By: /s/ Stephen D. Kelley  
Stephen D. Kelley  
President and Chief Executive Officer  
Date: February 23, 2018

**POWER OF ATTORNEY**

KNOW ALL PERSONS BY THESE PRESENTS, that each person whose signature appears below constitutes and appoints Stephen D. Kelley and Megan Faust, and each of them, his attorneys-in-fact, and agents, each with the power of substitution, for him and in his name, place and stead, in any and all capacities, to sign any and all amendments to this Report on Form 10-K, and all documents in connection therewith, with the Securities and Exchange Commission, granting unto said attorneys-in-fact and agents, and each of them, full power and authority to do and perform each and every act and thing requisite and necessary to be done in and about the premises, as fully to all intents and purposes as he might or could do in person, hereby ratifying and conforming all that said attorneys-in-fact and agents of any of them, or his or their substitute or substitutes, may lawfully do or cause to be done by virtue hereof.

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.

<u>Name</u>	<u>Title</u>	<u>Date</u>
<u>/s/ Stephen D. Kelley</u> Stephen D. Kelley	President and Chief Executive Officer	February 23, 2018
<u>/s/ Megan Faust</u> Megan Faust	Corporate Vice President and Chief Financial Officer	February 23, 2018
<u>/s/ James J. Kim</u> James J. Kim	Executive Chairman	February 23, 2018
<u>/s/ John T. Kim</u> John T. Kim	Executive Vice Chairman	February 23, 2018
<u>/s/ Susan Y. Kim</u> Susan Y. Kim	Director	February 23, 2018
<u>/s/ Douglas Alexander</u> Douglas Alexander	Director	February 23, 2018
<u>/s/ Roger A. Carolin</u> Roger A. Carolin	Director	February 23, 2018



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<b>Name</b>	<b>Title</b>	<b>Date</b>
<hr/> <i>/s/ Winston J. Churchill</i> Winston J. Churchill	Director	February 23, 2018
<hr/> <i>/s/ MaryFrances McCourt</i> MaryFrances McCourt	Director	February 23, 2018
<hr/> <i>/s/ Robert R. Morse</i> Robert R. Morse	Director	February 23, 2018
<hr/> <i>/s/ John F. Osborne</i> John F. Osborne	Director	February 23, 2018
<hr/> <i>/s/ David N. Watson</i> David N. Watson	Director	February 23, 2018
<hr/> <i>/s/ James W. Zug</i> James W. Zug	Director	February 23, 2018

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EXHIBIT INDEX

Exhibit Number	Exhibit Description	Incorporated by Reference				Filed Herewith
		Form	Period Ending	Exhibit	Filing Date	
2.1	<a href="#">Sales Contract of Commodity Premises between Shanghai Waigaoqiao Free Trade Zone Xin Development Co., Ltd. and Amkor Assembly &amp; Test (Shanghai) Co., Ltd. dated May 7, 2004.</a>	10-Q	6/30/04	2.3	8/6/04	
3.1	<a href="#">Certificate of Incorporation.</a>	S-1		3.1	10/6/97	
3.2	<a href="#">Certificate of Correction to Certificate of Incorporation.</a>	S-1		3.1	4/8/98	
3.3	<a href="#">Restated Bylaws as amended on November 5, 2013.</a>	10-K	12/31/13	3.3	2/28/14	
4.1	<a href="#">Specimen Common Stock Certificate.</a>	S-1/A		4.1	3/31/98	
4.2	<a href="#">Indenture, dated May 20, 2011, by and between Amkor Technology, Inc. and U.S. Bank National Association, as trustee, regarding the 6.625% Senior Notes due 2021.</a>	8-K		4.1	5/20/11	
4.3	<a href="#">Letter Agreement, dated May 17, 2011, between Amkor Technology, Inc., James J. Kim and 915 Investments, LP.</a>	8-K		10.1	5/20/11	
4.4	<a href="#">Indenture, dated September 21, 2012, by and between Amkor Technology, Inc. and U.S. Bank National Association, as trustee, regarding the 6.375% Senior Notes due 2022.</a>	8-K		4.1	9/21/12	
10.1	<a href="#">Form of Indemnification Agreement for directors and officers.</a>	S-1/A		10.1	3/31/98	
10.2	<a href="#">1998 Stock Plan, as amended.*</a>	10-Q	6/30/08	10.1	8/7/08	
10.3	<a href="#">Form of Stock Option Agreement under the 1998 Stock Plan.*</a>	10-K	12/31/05	10.2	3/16/06	
10.4	<a href="#">2003 Nonstatutory Inducement Grant Stock Plan, as amended.*</a>	10-Q	6/30/08	10.2	8/7/08	
10.5	<a href="#">Amended and Restated 2007 Equity Incentive Plan.*</a>	14A			4/5/12	
10.6	<a href="#">Form of Stock Option Award Agreement under the Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	6/30/12	10.3	8/2/12	
10.7	<a href="#">Form of Restricted Stock Award Agreement under the Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	6/30/12	10.4	8/2/12	
10.8	<a href="#">Executive Incentive Bonus Plan.*</a>	14A			4/5/12	
10.9	<a href="#">Kun-Mortgage Agreement, dated March 30, 2007, between Woori Bank and Amkor Technology Korea, Inc.</a>	10-Q	3/31/07	10.4	5/4/07	
10.10	<a href="#">2009 Voting Agreement, dated as of March 26, 2009, between Amkor Technology, Inc., James J. Kim and 915 Investments, LP.</a>	8-K		10.1	4/1/09	
10.11	<a href="#">Second Amended and Restated Loan and Security Agreement, dated as of June 28, 2012, among Amkor Technology, Inc., its subsidiaries from time to time party thereto, the lending institutions from time to time party thereto and Bank of America, N.A., as administrative agent.</a>	8-K		10.1	7/2/12	

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Exhibit Number	Exhibit Description	Incorporated by Reference				Filed Herewith
		Form	Period Ending	Exhibit	Filing Date	
10.12	<a href="#">First Amendment, dated December 24, 2014, to Second Amended and Restated Loan and Security Agreement, dated as of June 28, 2012, among Amkor Technology, Inc., its subsidiaries from time to time party thereto, the lending institutions from time to time party thereto and Bank of America, N.A., as administrative agent.</a>	8-K		10.1	12/24/14	
10.13	<a href="#">Amendment to Kun-Mortgage Agreement, dated May 24, 2010, by and between Amkor Technology Korea, Inc. and Woori Bank.</a>	8-K		10.4	5/27/10	
10.14	<a href="#">Loan Agreement, dated November 23, 2012, by and between Amkor Technology Korea, Inc. and The Korea Development Bank.</a>	8-K		10.1	11/27/12	
10.15	<a href="#">Form of Amendment to Factory Mortgage Agreement, dated November 23, 2012, by and between The Korea Development Bank and Amkor Technology Korea, Inc.</a>	8-K		10.2	11/27/12	
10.16	<a href="#">Amendment to Loan Agreement, dated November 22, 2013, by and between Amkor Technology Korea, Inc. and The Korea Development Bank.</a>	10-K	12/31/13	10.28	2/28/14	
10.17	<a href="#">Amendment to Kun Mortgage Agreement, dated April 19, 2013, by and between Amkor Technology Korea, Inc. and Woori Bank.</a>	10-Q	6/30/13	10.7	8/2/13	
10.18	<a href="#">Employment Offer Letter, dated April 30, 2013, between Amkor Technology, Inc. and Stephen D. Kelley.*</a>	8-K		10.1	5/3/13	
10.19	<a href="#">Retirement Agreement and Release, dated May 8, 2013, between Amkor Technology, Inc. and Kenneth T. Joyce.*</a>	8-K		10.1	5/10/13	
10.20	<a href="#">Separation and Consulting Agreement, dated July 17, 2013, between Amkor Technology, Inc. and Michael J. Lamble.*</a>	10-Q	6/30/13	10.3	8/2/13	
10.21	<a href="#">Amendment No. 1 to Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	9/30/15	10.1	10/30/15	
10.22	<a href="#">Form of Outside Director Stock Option Award Agreement under the Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	3/31/16	10.1	5/5/16	
10.23	<a href="#">Separation Agreement and Release, dated February 11, 2015, between Amkor Technology, Inc. and JooHo Kim.*</a>	10-Q	3/30/15	10.3	4/30/15	
10.24	<a href="#">Amendment No. 2 to Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	6/30/16	10.1	8/8/16	
10.25	<a href="#">Agreement and Release, dated September 12, 2016, between Amkor Technology, Inc. and Joanne Solomon.*</a>	10-Q	9/30/16	10.1	11/4/16	
10.26	<a href="#">Employment Letter Agreement, dated February 27, 2017, between Amkor Technology, Inc. and Stephen D. Kelley.*</a>	8-K		10.1	3/3/17	
10.27	<a href="#">Form of Stock Option Award Agreement under the Second Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	3/31/17	10.2	5/5/17	

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Exhibit Number	Exhibit Description	Incorporated by Reference				Filed Herewith
		Form	Period Ending	Exhibit	Filing Date	
10.28	<a href="#">Form of Restricted Stock Award Agreement under the Second Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	3/31/17	10.3	5/5/17	
10.29	<a href="#">Form of Outside Director Stock Option Award Agreement under the Second Amended and Restated 2007 Equity Incentive Plan.*</a>	10-Q	3/31/17	10.4	5/5/17	
10.30	<a href="#">Second Amended and Restated 2007 Equity Incentive Plan*</a>	8-K		10.1	5/5/17	
10.31	<a href="#">Amended and Restated Executive Incentive Bonus Plan*</a>	8-K		10.2	5/5/17	
12.1	<a href="#">Computation of Ratio of Earnings to Fixed Charges</a>					X
21.1	<a href="#">List of subsidiaries of the Registrant.</a>					X
23.1	<a href="#">Consent of PricewaterhouseCoopers LLP.</a>					X
31.1	<a href="#">Certification of Stephen D. Kelley, Chief Executive Officer of Amkor Technology, Inc., Pursuant to Rule 13a-14(a) under the Securities Exchange Act of 1934, as amended.</a>					X
31.2	<a href="#">Certification of Megan Faust, Chief Financial Officer of Amkor Technology, Inc., Pursuant to Rule 13a-14(a) under the Securities Exchange Act of 1934, as amended.</a>					X
32.1	<a href="#">Certification of Chief Executive Officer and Chief Financial Officer Pursuant to 18 U.S.C. Section 1350, as Adopted Pursuant to Section 906 of the Sarbanes-Oxley Act of 2002.</a>					X
101.INS	XBRL Instance Document					X
101.SCH	XBRL Taxonomy Extension Schema Document					X
101.CAL	XBRL Taxonomy Extension Calculation Linkbase Document					X
101.LAB	XBRL Taxonomy Extension Label Linkbase Document					X
101.PRE	XBRL Taxonomy Extension Presentation Linkbase Document					X
101.DEF	XBRL Taxonomy Extension Definition Linkbase Document					X

\* Indicates management compensatory plan, contract or arrangement.

**AMKOR TECHNOLOGY, INC.**  
**COMPUTATION OF RATIO OF EARNINGS TO FIXED CHARGES**

	Year Ended December 31,				
	2017	2016	2015	2014	2013
	(In thousands)				
<b>Earnings</b>					
Income before taxes and equity in earnings of unconsolidated affiliate	\$ 303,870	\$ 215,157	\$ 67,912	\$ 136,078	\$ 123,987
Interest expense	84,290	83,233	84,713	107,688	103,027
Amortization of capitalized interest	494	—	—	—	—
Amortization of deferred debt issuance costs and premiums	1,235	1,403	1,662	2,237	2,880
Interest portion of rent (1)	16,029	14,592	8,171	9,502	7,947
	<u>\$ 405,918</u>	<u>\$ 314,385</u>	<u>\$ 162,458</u>	<u>\$ 255,505</u>	<u>\$ 237,841</u>
<b>Fixed Charges</b>					
Interest expense	\$ 84,290	\$ 83,233	\$ 84,713	\$ 107,688	\$ 103,027
Capitalized interest	52	4,686	10,079	6,912	1,740
Amortization of debt issuance costs and premiums	1,235	1,403	1,662	2,237	2,880
Interest portion of rent (1)	16,029	14,592	8,171	9,502	7,947
	<u>\$ 101,606</u>	<u>\$ 103,914</u>	<u>\$ 104,625</u>	<u>\$ 126,339</u>	<u>\$ 115,594</u>
Ratio of earnings to fixed charges	<u>4.0</u>	<u>3.0</u>	<u>1.6</u>	<u>2.0</u>	<u>2.1</u>

(1) Represents one-third of total rent expense, which we believe is a reasonable estimate of the interest component of rent expense.

## AMKOR TECHNOLOGY, INC.

## LIST OF SUBSIDIARIES

Subsidiary	Jurisdiction of Organization
Amkor Advanced Technology Taiwan, Inc.	Taiwan
Amkor Assembly & Test (Shanghai) Co., Ltd.	China
Amkor Technology Euroservices, S.A.S.	France
Amkor Technology Holding, B.V.	Netherlands
Amkor Technology Holding, B.V., Germany (A Branch of a Netherlands Company)	Germany
Amkor Technology Korea, Inc.	Korea
Amkor Technology Limited	Cayman Islands
Amkor Technology Malaysia Sdn. Bhd.	Malaysia
Amkor Technology Philippines, Inc. (A Branch of a Singapore Company)	Philippines
Amkor Technology Singapore Investment Pte. Ltd.	Singapore
Amkor Technology Singapore Holding Pte. Ltd.	Singapore
Amkor Technology Taiwan Ltd.	Taiwan
Amkor Worldwide Services LLC	Delaware
ATEP - Amkor Technology Portugal, S.A.	Portugal
Guardian Assets, Inc.	Delaware
J-Devices Corporation	Japan
Unitive International Ltd.	Curacao

**CONSENT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM**

We hereby consent to the incorporation by reference in the Registration Statements on Form S-8 (Nos. 333-62891, 333-86161, 333-63430, 333-100814 and 333-149376) of Amkor Technology, Inc. of our report dated February 23, 2018, relating to the financial statements, financial statement schedule and the effectiveness of internal control over financial reporting, which appears in this Form 10-K.

/s/ PricewaterhouseCoopers LLP  
Phoenix, Arizona  
February 23, 2018

## SECTION 302(a) CERTIFICATION

I, Stephen D. Kelley, certify that:

1. I have reviewed this Annual Report on Form 10-K of Amkor Technology, Inc.;
2. Based on my knowledge, this Annual Report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this Annual Report;
3. Based on my knowledge, the financial statements, and other financial information included in this Annual Report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this Annual Report;
4. The registrant's other certifying officer and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:
  - a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this Annual Report is being prepared;
  - b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;
  - c) Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this Annual Report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this Annual Report based on such evaluation; and
  - d) Disclosed in this Annual Report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of this Annual Report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and
5. The registrant's other certifying officer and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):
  - a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and
  - b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal controls over financial reporting.

/s/ Stephen D. Kelley

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By: Stephen D. Kelley  
Title: President and Chief Executive Officer  
Date: February 23, 2018



## SECTION 302(a) CERTIFICATION

I, Megan Faust, certify that:

1. I have reviewed this Annual Report on Form 10-K of Amkor Technology, Inc.;
2. Based on my knowledge, this Annual Report does not contain any untrue statement of a material fact or omit to state a material fact necessary to make the statements made, in light of the circumstances under which such statements were made, not misleading with respect to the period covered by this Annual Report;
3. Based on my knowledge, the financial statements, and other financial information included in this Annual Report, fairly present in all material respects the financial condition, results of operations and cash flows of the registrant as of, and for, the periods presented in this Annual Report;
4. The registrant's other certifying officer and I are responsible for establishing and maintaining disclosure controls and procedures (as defined in Exchange Act Rules 13a-15(e) and 15d-15(e)) and internal control over financial reporting (as defined in Exchange Act Rules 13a-15(f) and 15d-15(f)) for the registrant and have:
  - a) Designed such disclosure controls and procedures, or caused such disclosure controls and procedures to be designed under our supervision, to ensure that material information relating to the registrant, including its consolidated subsidiaries, is made known to us by others within those entities, particularly during the period in which this Annual Report is being prepared;
  - b) Designed such internal control over financial reporting, or caused such internal control over financial reporting to be designed under our supervision, to provide reasonable assurance regarding the reliability of financial reporting and the preparation of financial statements for external purposes in accordance with generally accepted accounting principles;
  - c) Evaluated the effectiveness of the registrant's disclosure controls and procedures and presented in this Annual Report our conclusions about the effectiveness of the disclosure controls and procedures, as of the end of the period covered by this Annual Report based on such evaluation; and
  - d) Disclosed in this Annual Report any change in the registrant's internal control over financial reporting that occurred during the registrant's most recent fiscal quarter (the registrant's fourth fiscal quarter in the case of this Annual Report) that has materially affected, or is reasonably likely to materially affect, the registrant's internal control over financial reporting; and
5. The registrant's other certifying officer and I have disclosed, based on our most recent evaluation of internal control over financial reporting, to the registrant's auditors and the audit committee of the registrant's board of directors (or persons performing the equivalent functions):
  - a) All significant deficiencies and material weaknesses in the design or operation of internal control over financial reporting which are reasonably likely to adversely affect the registrant's ability to record, process, summarize and report financial information; and
  - b) Any fraud, whether or not material, that involves management or other employees who have a significant role in the registrant's internal controls over financial reporting.

/s/ Megan Faust

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By: Megan Faust  
Title: Corporate Vice President and Chief Financial Officer  
Date: February 23, 2018

**CERTIFICATION OF CHIEF EXECUTIVE OFFICER AND CHIEF FINANCIAL OFFICER  
PURSUANT TO 18 U.S.C. SECTION 1350, AS ADOPTED  
PURSUANT TO SECTION 906 OF THE SARBANES-OXLEY ACT OF 2002**

I, Stephen D. Kelley, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that the Annual Report of Amkor Technology, Inc. on Form 10-K for the year ended December 31, 2017 fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934 and that information contained in such Form 10-K fairly presents in all material respects the financial condition and results of operations of Amkor Technology, Inc.

/s/ Stephen D. Kelley

By: Stephen D. Kelley  
Title: President and Chief Executive Officer  
Date: February 23, 2018

I, Megan Faust, certify, pursuant to 18 U.S.C. Section 1350, as adopted pursuant to Section 906 of the Sarbanes-Oxley Act of 2002, that the Annual Report of Amkor Technology, Inc. on Form 10-K for the year ended December 31, 2017 fully complies with the requirements of Section 13(a) or 15(d) of the Securities Exchange Act of 1934 and that information contained in such Form 10-K fairly presents in all material respects the financial condition and results of operations of Amkor Technology, Inc.

/s/ Megan Faust

By: Megan Faust  
Title: Corporate Vice President and Chief Financial Officer  
Date: February 23, 2018

