

Q4 2017 Earnings Presentation



January 31, 2018

Safe Harbor

The company's guidance with respect to anticipated financial results for the first quarter ending March 31, 2018, potential future growth and profitability, our future business mix, expectations regarding future market trends and the company's future performance within specific markets (e.g., statements regarding anticipated semiconductor and industrial market growth) and other statements herein or made on the above-announced conference call that are not historical information are forward-looking statements within the meaning of Section 27A of the Securities Act of 1933 and Section 21E of the Securities Exchange Act of 1934. Forward-looking statements are subject to known and unknown risks and uncertainties that could cause actual results to differ materially from those expressed or implied by such statements. Such risks and uncertainties include, but are not limited to: (a) the effects of global macroeconomic conditions upon demand for our products and services; (b) the volatility and cyclicality of the industries the company serves, particularly the semiconductor industry; (c) delays in capital spending by end-users in our served markets; (d) the accuracy of the company's estimates related to fulfilling solar inverter product warranty and post-warranty obligations; (e) the company's ability to realize its plan to avoid additional costs after the solar inverter wind-down; (f) the accuracy of the company's assumptions on which its financial statement projections are based; (g) the impact of product price changes, which may result from a variety of factors; (h) the timing of orders received from customers; (i) the company's ability to realize benefits from cost improvement efforts including avoided costs, restructuring plans and inorganic growth; (j) the company's ability to obtain in a timely manner the materials necessary to manufacture its products; (k) unanticipated changes to management's estimates, reserves or allowances; and (l) changes and adjustments to the tax expense and benefits related to the recently enacted U.S. tax reform. These and other risks are described in Advanced Energy's Form 10-K, Forms 10-Q and other reports and statements filed with the Securities and Exchange Commission (the "SEC"). These reports and statements are available on the SEC's website at www.sec.gov. Copies may also be obtained from Advanced Energy's investor relations page at <http://ir.advanced-energy.com> or by contacting Advanced Energy's investor relations at 970-407-6555. Forward-looking statements are made and based on information available to the company on the date of this press release. Aspirational goals and targets discussed on the conference call or in the presentation materials should not be interpreted in any respect as guidance. The company assumes no obligation to update the information in this presentation.

Non-GAAP Measures

This presentation includes GAAP and non-GAAP income and per-share earnings data and other GAAP and non-GAAP financial information. Advanced Energy's non-GAAP measures exclude the impact of non-cash related charges such as stock based compensation and amortization of intangible assets, as well as non-recurring items such as acquisition-related costs. Additionally, the fourth quarter and full year 2017 results exclude estimated income tax expense associated with U.S. tax reform. For the first quarter ending March 31, 2018 guidance, the company expects stock based compensation of \$2.7 million and amortization of intangibles of \$1.5 million. The non-GAAP measures included in this release are not in accordance with, or an alternative for, similar measures calculated under generally accepted accounting principles and may be different from non-GAAP measures used by other companies. In addition, these non-GAAP measures are not based on any comprehensive set of accounting rules or principles. Advanced Energy believes that these non-GAAP measures provide useful information to management and investors to evaluate business performance without the impacts of certain non-cash charges and other charges which are not part of the company's usual operations. The company uses these non-GAAP measures to assess performance against business objectives, make business decisions, develop budgets, forecast future periods, assess trends and evaluate financial impacts of various scenarios. In addition, management's incentive plans include these non-GAAP measures as criteria for achievements. Additionally, the company believes that these non-GAAP measures, in combination with its financial results calculated in accordance with GAAP, provide investors with additional perspective. While some of the excluded items may be incurred and reflected in the company's GAAP financial results in the foreseeable future, the company believes that the items excluded from certain non-GAAP measures do not accurately reflect the underlying performance of its continuing operations for the period in which they are incurred. The use of non-GAAP measures has limitations in that such measures do not reflect all of the amounts associated with the company's results of operations as determined in accordance with GAAP, and these measures should only be used to evaluate the company's results of operations in conjunction with the corresponding GAAP measures. Please refer to the Form 8-K regarding this presentation furnished today to the Securities and Exchange Commission.

Q4 2017 Earnings Presentation



Yuval Wasserman
President & CEO

Highlights

Q4 2017

- Revenue of \$179.2M; +32.4% y/y
 - Rising semiconductor demand
 - Increasing capital intensity
- Non-GAAP* EPS from continuing ops \$1.31**; +23.6% y/y

FY2017

- Revenue of \$671.0M; +38.7% y/y
- Non-GAAP* EPS from continuing ops \$4.77; +53.4% y/y
- Capital deployment strategy
 - Acquired Excelsys strengthening Specialty Power portfolio
 - Completed \$30M share repurchase

**Non-GAAP measures exclude the impact of non-cash related charges such as stock based compensation, amortization of intangible assets, estimated income tax expenses associated with U.S. tax reform, and restructuring costs, as well as acquisition related costs and other non-recurring items.*

***Q4'17 non-GAAP EPS benefitted by \$0.03 from the lower warranty costs and incentive pay.*

Semiconductor Highlights

- Semiconductor revenue for FY2017 of \$461.7M, +41.5% y/y
- Semiconductor revenue for Q4 2017 of \$123.6M, +27.6% y/y
 - Sales outpaced WFE industry as 3DNAND capacity investment continued
 - Demonstrated AE as the industry leader in precision power
- Multiple vectors driving market growth; underpinned by accelerating data usage
 - Conversion from planar NAND to 3DNAND
 - Next-gen devices with more stacked layers and advanced technologies
 - Need for memory
 - Conversion of server farms from hard disk to Solid State drives
 - Increasing memory content in mobile devices
 - Vectors driving increase in # of units shipped, power level and advanced features

Semiconductor Highlights (cont.)

- Accelerators for AE
 - Higher power capital intensity of plasma-based processes vs. rest of WFE
 - Growing complexity of device structures
 - New sets of tools and architectures needed to etch 32, 64, 96 layer 3DNAND
 - DRAM & Logic investment ramping and becoming more application-specific
 - Fabs and foundries require advanced dual and quad patterning
 - New materials & device geometries need selective dep and removal (ALD/ALE)
 - Shipped first units of next-gen solid-state match in Q4 (faster tuning, broader dynamic operating range of power level and frequencies)
- Anticipate a strong start to 2018

Industrial Highlights

- Total Industrial revenue for FY2017 of \$116.9M, +38.8% y/y
 - Strongest performance on record
 - Exceeding long-term goal of GDP+2-3%
 - Enabling highly-engineered materials (decorative, optical and functional coatings for consumer electronics)
 - Solar cells business making headway in China
 - Acquisitions add to Specialty Power
- Total Industrial revenue for Q4 2017 of \$30.6M; +60.6% y/y
 - Sequential decline as customers digested significant investment in consumer electronics coatings made in prior quarters

Industrial Highlights (cont.)

Q4 Thin Films Industrial

- Increase in major PV Solar projects
- Gained significant share for solar cell manufacturing equipment
 - AE #1 supplier: majority of the large Chinese OEMs selected AE
- Expanded presence in China and with capacity increases for Mobile OLED devices
- Adoption of new technology in glass coating with AE Ascent product
 - Continued upgrades and purchases of new equipment

Industrial Highlights (cont.)

Q4 Specialty Power

- Increasing requirement for more rigorous safety and complex inspection process demand more advanced power solutions
 - Driving need for highly sensitive analytical tools
 - Increased demand for stable, low ripple, high density power solutions.
- High Voltage power solutions providing low noise and ripple and small form factor
 - Gaining traction in medical, life science, mass spectrometry and SEM applications
- Excelsys Low Voltage customized power solutions expanding AE presence in highly regulated clinical instrumentation market

Industrial Outlook

- Q1'18 industrial revenue to be consistent with Q4'17 levels as y/y growth continues
 - Market share gains in new products and applications
 - Excelsys to be a strong contributor
- Expect further inorganic additions in future
 - To expand product portfolio
 - To provide new market opportunities worldwide

Semiconductor Design Wins

- Constant innovation critical to maintaining leading market position
 - Growing share
 - Penetrating new applications
 - Expanding SAM
- Leveraging R&D presence close to customers (US, EMEA, Asia)
 - Staying at forefront of power delivery and control technology
 - Capturing new opportunities for next-gen tools
 - Ex. AE dielectric etch presence grown rapidly in just a few years
- Q4: Won virtually all of the designs pursued in
 - Advanced Memory (NAND and DRAM) and Logic applications in deposition and etch

Industrial Design Wins

Thin Films Industrial

- Wins in Solar PV applications in China with new Ascent platform
- Wins in FPD, OLED and advanced coatings for consumer electronics

Specialty Power

- Gained share and displaced competitors
- Thermal wins in solar cell manufacturing in China and lithium ion battery manufacturing in Korea
- High Voltage wins in mass spectrometry, medical, security
- Low Voltage wins in medical equipment for therapeutic and advanced diagnostics

Service Highlights and Outlook

- Service revenue for FY2017 of \$92.4M, +26.3% y/y
- Service revenue for Q4 2017 of \$25.0M; +28.7% y/y
 - Driving market share gains with highly engineered products and recognition of lower TCO
 - Expanded capabilities, achieved economies of scale, improved responsiveness, flexibility and quality
 - Opened new service and repair facility in Japan
- Outlook for Q1 2018
 - Modest sequential growth

Q4 2017 Earnings Presentation



Tom McGimpsey

EVP, Interim CFO & General
Counsel

Q4 2017 Financial Highlights

- Delivered high-end of revenue expectations
- Exceeded non-GAAP* EPS guidance
- Total revenue of \$179.2M; +1.5% q/q and +32.4% y/y
- GAAP operating margin from continuing operations 32.4%**
- GAAP loss per share from continuing operations (\$0.73)
 - \$72.9M tax expense associated with the U.S. tax reform
 - \$6.4M one-time tax expenses related to solar inverters business
- Non-GAAP* operating margin from continuing operations 34.1%**
- Non-GAAP* EPS from continuing operations \$1.31***

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***Q4'17 GAAP and non-GAAP operating margins were positively affected by lower warranty costs and incentive pay.*

****Q4'17 non-GAAP EPS benefitted by \$0.03 from the lower warranty costs and incentive pay.*

Q4 2017 Revenue by Application

	Q4 2017		Q3 2017		Q4 2016	
<i>(in thousands)</i>	Actual	% of Sales	Actual	% of Sales	Actual	% of Sales
Semiconductors	\$ 123,565	68.9%	\$ 116,468	66.0%	\$ 96,830	71.5%
Industrial	30,607	17.1%	35,895	20.3%	19,054	14.1%
Service	25,042	14.0%	24,212	13.7%	19,459	14.4%
Total Revenue	179,214		\$176,575		\$135,343	

Q4 2017 Income Statement

<i>(\$ in Millions, except percentage & EPS)</i>	Q4'17	Q3'17	Q4'16
Revenue	\$179.2	\$176.6	\$135.3
Operating expenses	\$40.1	\$40.6	\$33.0
GAAP operating margin from continuing ops %	32.4%**	29.3%	28.5%
GAAP earnings (loss) from continuing ops	(\$0.73)	\$2.09	\$1.01
Non-GAAP* operating margin from continuing ops %	34.1%**	31.9%	30.7%
Non-GAAP* EPS from continuing ops	\$1.31***	\$1.19	\$1.06

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***Q4'17 GAAP and non-GAAP operating margins were positively affected by lower warranty costs and incentive pay.*

****Q4'17 non-GAAP EPS benefitted by \$0.03 from the lower warranty costs and incentive pay.*

Q4 2017 Balance Sheet

- Generated \$49.6M in cash from continuing operations
- \$5.0M share repurchase
- Continue to pursue pipeline of potential acquisitions

<i>(\$ in Millions)</i>	Q4'17	Q4'16
Cash & Investments	\$410.4	\$286.7
Accounts Receivable	\$87.4	\$75.7
Inventory	\$78.5	\$55.8
Total Assets	\$733.3	\$571.5
Liabilities	\$212.7	\$179.4
Shareholders' Equity	\$520.6	\$392.1

Full Year 2017

- \$30.0M Share repurchase
 - Approx. 422,000 shares
- Acquired Excelsys for \$17.4M
 - Expanded Specialty Power business

3-year Aspirational Goals* Update

- Revenue: >\$1B
- Non-GAAP** EPS: \$5.50-\$6.50
- Cumulative Cash Gen: >\$550M

	2017	2016
<i>(\$ in Millions, except percentage & EPS)</i>		
Revenue	\$671.0	\$483.7
GAAP operating margin from continuing ops	29.9%	26.2%
GAAP EPS from continuing ops	\$3.39	\$2.92
Non-GAAP** operating margin from continuing ops	32.5%	28.4%
Non-GAAP** EPS from continuing ops	\$4.77	\$3.11
Cash flow from continuing ops	\$190.0	\$127.1

**Please note that hypothetical scenarios regarding revenue growth, EBITDA, EPS, cash generation, acquisitions, aspirational goals and targets and similar statements illustrate various possible outcomes of our different strategies if they are successful. These hypothetical scenarios and illustrations should not be treated as forecasts or projections or financial guidance. We cannot assure you that we will be able to accomplish any of these goals, metrics or opportunities at any point in the future (if at all), all of which are subject to significant risks and uncertainties.*

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Q1 2018 Guidance*

	Q1 2018		
Revenue	\$183M	-	\$193M
GAAP operating margins from continuing operations	30.0%	-	32.0%
GAAP EPS from continuing operations	\$1.19	-	\$1.29
Non-GAAP** operating margins from continuing operations	32.0%	-	34.0%
Non-GAAP** EPS from continuing operations	\$1.27	-	\$1.37

*Estimates as of Q4'17 earnings conference call. The company assumes no obligation to update guidance.

**Q1'18 non-GAAP measures exclude the impact of stock based compensation of \$2.7M, amortization of intangibles of \$1.5M, restructuring costs, and significant non-recurring items.

Reconciliation of Q1 2018 Guidance*

	Low End		High End
Revenues	\$183M	-	\$193M
Reconciliation of Non-GAAP** operating margin			
GAAP operating margin	30%	-	32%
Stock-based compensation	1%	-	1%
Amortization of intangible assets	1%	-	1%
Non-GAAP** operating margin	32%	-	34%
Reconciliation of Non-GAAP** earnings per share			
GAAP earnings per share	\$1.19	-	\$1.29
Stock-based compensation	0.07	-	0.07
Amortization of intangible assets	0.04	-	0.04
Tax effects of excluded items	(0.03)		(0.03)
Non-GAAP** earnings per share	\$1.27	-	\$1.37

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