UNITED STATES SECURITIES AND EXCHANGE COMMISSION

WASHINGTON, D.C. 20549

FORM 8-K

CURRENT REPORT Pursuant to Section 13 or 15(d) of the Securities Exchange Act of 1934

Date of Report (Date of Earliest Event Reported): January 28, 2020

MKS Instruments, Inc.

(Exact name of registrant as specified in its charter)

Massachusetts (State or other jurisdiction of incorporation) 000-23621 (Commission File Number) 04-2277512 (I.R.S. Employer Identification No.)

2 Tech Drive, Suite 201, Andover, Massachusetts (Address of principal executive offices)

01810 (Zip Code)

Registrant's telephone number, including area code: 978-645-5500

Not Applicable

Former name or former address, if changed since last report

Check the appropriate box below if the Form 8-K filing is intended to simultaneously satisfy the filing obligation of the registrant under any of the following provisions:

□ Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)

□ Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)

Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))

Dere-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

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

	Trading	Name of each exchange
Title of each class	Symbol(s)	on which registered
Common Stock, no par value	MKSI	Nasdaq Global Select Market

Indicate by check mark whether the registrant is an emerging growth company as defined in Rule 405 of the Securities Act of 1933 (§230.405 of this chapter) or Rule 12b-2 of the Securities Exchange Act of 1934 (§240.12b-2 of this chapter).

Emerging growth company \Box

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.

Item 2.02 Results of Operations and Financial Condition.

On January 28, 2020, MKS Instruments, Inc. announced its financial results for the quarter ended December 31, 2019. The full text of the press release is attached as Exhibit 99.1 to this Current Report on Form 8-K.

The information in this Form 8-K and the Exhibit attached hereto shall not be deemed "filed" for purposes of Section 18 of the Securities Exchange Act of 1934 (the "Exchange Act") or otherwise subject to the liabilities of that section, nor shall it be deemed incorporated by reference in any filing under the Securities Act of 1933 or the Exchange Act, except as expressly set forth by specific reference in such a filing.

Item 9.01 Financial Statements and Exhibits.

(d) Exhibits

- 99.1 Press Release dated January 28, 2020
- 104 Cover Page Interactive Data File (embedded within the Inline XBRL document)

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

MKS Instruments, Inc.

Date: January 28, 2020

By: /s/ Seth H. Bagshaw

Name: Seth H. Bagshaw

Title: Sr. Vice President, Chief Financial Officer and Treasurer



MKS Instruments Reports Fourth Quarter and Full Year 2019 Financial Results

- Quarterly revenue of \$500 million, a sequential increase of 8%; semiconductor revenue sequential increase of 22%
- Quarterly Non-GAAP net earnings of \$66 million, or \$1.20 diluted share
- Quarterly GAAP net income of \$43 million, or \$0.77 per diluted share
- Completed \$50 million voluntary principal prepayment on January 24, 2020

Andover, MA, January 28, 2020 — MKS Instruments, Inc. (NASDAQ: MKSI), a global provider of technologies that enable advanced processes and improve productivity, today reported fourth quarter and full year 2019 financial results.

"We are very pleased with our strong financial performance in the quarter. Our top line growth exceeded our expectations, driven by strong sequential growth in our Semiconductor Market revenue, which increased 22% in the quarter. We believe the increasing breadth of our technology portfolio, and our commitment to innovation and operational excellence uniquely position MKS to address a broad range of growing advanced semiconductor applications. Semiconductor revenue increased across all divisions, confirming our strategy of SAM expansion over the past four years," said John TC Lee, President and Chief Executive Officer.

Mr. Lee added, "Within the Light and Motion and Vacuum and Analysis Divisions, we are encouraged by the continued stabilization of our Advanced Markets revenue, which has been impacted by geopolitical and trade headwinds, and we are particularly excited about the new market opportunities our recently acquired Equipment and Solutions Division provides us."

"We continue to manage our business with a focus on sustainable and profitable growth to achieve strong operating leverage in our financial model. In the quarter, while revenue was above the high-end of our expectations, we continued to manage our cost structure, resulting in non-GAAP operating expenses coming in favorable to the midpoint of our guidance," said Seth H. Bagshaw, Senior Vice President and Chief Financial Officer.

Mr. Bagshaw added, "We are also pleased to announce that on January 24th, we completed a \$50 million voluntary principal prepayment on our secured term loan for a total of \$150 million in voluntary prepayments since the acquisition of Electro Scientific Industries, Inc. less than a year ago. The cumulative impact of our voluntary prepayments and our successful term loan repricing last quarter, results in a reduction of our annualized interest expense by over \$9 million, based on current interest rates."

First Quarter 2020 Outlook

Based on current business levels, the Company expects that revenue in the first quarter of 2020 could range from \$495 to \$545 million. At these volumes, GAAP net income could range from \$0.82 to \$1.18 per diluted share and non-GAAP net earnings could range from \$1.14 to \$1.49 per diluted share.

Conference Call Details

A conference call with management will be held on Wednesday, January 29, 2020 at 8:30 a.m. (Eastern Time). To access a live webcast of the conference call and the related presentation materials management will refer to during the call, visit MKS' website at www.mksinst.com and click on Company – Investor Relations – Investors Overview. The webcast and related presentation materials will be listed in the calendar of events. To participate by telephone, please dial (877) 212-6076 for domestic callers or (707) 287-9331 for international callers and provide the operator with Conference ID (9981719), and access the presentation materials on MKS' website. An archive of the webcast and related presentation materials will be available on MKS' website.

About MKS Instruments

MKS Instruments, Inc. is a is a global provider of instruments, subsystems and process control solutions that measure, monitor, deliver, analyze, power and control critical parameters of advanced manufacturing processes to improve process performance and productivity for our customers. Our products are derived from our core competencies in pressure measurement and control, flow measurement and control, gas and vapor delivery, gas composition analysis, residual gas analysis, leak detection, control technology, ozone generation and delivery, power, reactive gas generation, vacuum technology, lasers, photonics, sub-micron positioning, vibration control, optics, and laser-based manufacturing solutions. We also provide services relating to the maintenance and repair of our products, installation services and training. Our primary served markets include semiconductor, industrial technologies, life and health sciences, and research and defense. Additional information can be found at www.mksinst.com.

Use of Non-GAAP Financial Results

This release includes measures that are not in accordance with U.S. generally accepted accounting principles ("Non-GAAP measures"). These Non-GAAP measures should be viewed in addition to, and not as a substitute for, MKS' reported GAAP results, 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. MKS management believes the presentation of these Non-GAAP measures is useful to investors for comparing prior periods and analyzing ongoing business trends and operating results. For further information regarding these Non-GAAP measures, please refer to the tables presenting reconciliations of our Non-GAAP results to our U.S. GAAP results and the "Notes on our Non-GAAP Financial Information" at the end of this press release.

Selected GAAP and Non-GAAP Financial Measures (In millions, except per share data)

	Q4	1	Full Year		
	2019	2018	2019	2018	
Net revenues	\$ 500	\$461	\$1,900	\$2,075	
GAAP Financial Measures					
Operating margin	13.2%	20.4%	11.6%	23.8%	
Net income	\$ 43	\$ 72	\$ 140	\$ 393	
Diluted EPS	\$0.77	\$1.32	\$ 2.55	\$ 7.14	
Non-GAAP Financial Measures					
Operating margin	18.4%	23.7%	18.1%	26.3%	
Net earnings	\$ 66	\$ 84	\$ 249	\$ 430	
Diluted EPS	\$1.20	\$1.54	\$ 4.52	\$ 7.83	

Fourth Quarter 2019 Financial Results

Net revenues in the fourth quarter of 2019 were \$500 million, an increase of 8% from \$462 million in the third quarter of 2019, and an increase of 8% from \$461 million in the fourth quarter of 2018. The increase in net revenues was driven largely by increased demand from customers in the Semiconductor Market. Net revenues in the Semiconductor Market were \$272 million in the fourth quarter of 2019, a sequential increase of 22%. Net revenues in Advanced Markets were \$228 million in the fourth quarter of 2019, a sequential decrease of 5%, and in-line with expectations.

Net income in the fourth quarter of 2019 was \$43 million, or \$0.77 per diluted share, compared to net income of \$47 million, or \$0.86 per diluted share, in the third quarter of 2019, and \$72 million, or \$1.32 per diluted share, in the fourth quarter of 2018.

Net income in the fourth quarter of 2019 included acquisition and integration costs of \$2 million associated with the acquisition of Electro Scientific Industries, Inc., ("ESI") and \$2 million of restructuring and other costs.

Non-GAAP net earnings, which exclude special charges and credits, were \$66 million, or \$1.20 per diluted share, in the fourth quarter of 2019, compared to \$62 million, or \$1.12 per diluted share, in the third quarter of 2019, and \$84 million or \$1.54 per diluted share, in the fourth quarter of 2018.

Full Year 2019 Financial Results

Net revenues in 2019 were \$1.9 billion, a decrease of 8% from \$2.1 billion in 2018, driven largely by softness in the Semiconductor Market during the first half of 2019, as well as geopolitical and cyclical headwinds. Net revenues in the Semiconductor Market were \$929 million, a decrease of 19% compared to 2018, while net revenues from Advanced Markets, which included contribution from ESI of \$151 million, were \$971 million, an increase of 4% compared to 2018.

Net revenues for the Vacuum and Analysis Division were \$990 million in 2019, a decrease of 21% from \$1.3 billion in 2018. The decline was driven largely by softness in the Semiconductor Market during the first half of 2019. Net revenues for the Light and Motion Division were \$726 million in 2019, a decrease of 11% from \$814 million in 2018, driven largely by lower shipments to industrial manufacturing customers. Net revenues for the Equipment and Solutions Division were \$184 million in 2019.

Net income in 2019 was \$140 million, or \$2.55 per diluted share, compared to net income of \$393 million, or \$7.14 per diluted share in 2018.

Non-GAAP net earnings, which exclude special charges and credits, were \$249 million, or \$4.52 per diluted share, in 2019, compared to \$430 million, or \$7.83 per diluted share, in 2018.

Additional Financial Information

At December 31, 2019, the Company had \$524 million in cash and short-term investments, \$892 million of secured term loan principal outstanding and an unused \$100 million asset-based line of credit. During the fourth quarter of 2019, the Company paid a dividend of \$11 million or \$0.20 per diluted share.

Voluntary Principal Prepayment

On January 24, 2020, the Company completed a \$50 million voluntary principal prepayment on its secured term loan, reducing the outstanding principal to \$842 million. This voluntary prepayment results in annualized interest savings of approximately \$1.8 million, based on current interest rates.

SAFE HARBOR FOR FORWARD-LOOKING STATEMENTS

This release contains forward-looking statements within the meaning of the Private Securities Litigation Reform Act of 1995 regarding the future financial performance, business prospects and growth of MKS. These statements are only predictions based on current assumptions and expectations. Any statements that are not statements of historical fact (including statements containing the words "will," "projects," "intends," "believes," "plans," "anticipates," "expects," "estimates," "forecasts," "continues" and similar expressions) should be considered to be forward-looking statements. Actual events or results may differ materially from those in the forward-looking statements set forth herein. Among the important factors that could cause actual events to differ materially from those in the forward-looking statements are the conditions affecting the markets in which MKS operates, including the fluctuations in capital spending in the semiconductor industry and other advanced manufacturing markets, fluctuations in sales to our major customers, the ability of MKS to successfully integrate ESI's operations and employees, unexpected costs, charges or expenses resulting from the ESI acquisition, MKS' ability to realize anticipated synergies and cost savings from the ESI acquisition, the terms of our term loan, competition from larger or more established companies in MKS' markets; MKS' ability to successfully grow ESI's business; potential adverse reactions or changes to business relationships resulting from the ESI acquisition, the challenges, risks and costs involved with integrating the operations of the other companies we have acquired, the Company's ability to successfully grow our business, potential fluctuations in guarterly results, dependence on new product development, rapid technological and market change, acquisition strategy, manufacturing and sourcing risks, volatility of stock price, international operations, financial risk management, and the other factors described in MKS' most recent Annual Report on Form 10-K for the year ended December 31, 2018 and any subsequent Quarterly Reports on Form 10-Q, as filed with the SEC. MKS is under no obligation to, and expressly disclaims any obligation to, update or alter these forward-looking statements, whether as a result of new information, future events or otherwise after the date of this press release.

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<u>Company Contact</u>: David Ryzhik Vice President, Investor Relations Telephone: (978) 557-5180 Email: <u>david.ryzhik@mksinst.com</u>

MKS Instruments, Inc. Unaudited Consolidated Statements of Operations (In millions, except per share data)

			rter Ended			Twelve Mo		
	Dee	cember 31, 2019	ember 31, 2018	ember 30, 2019	De	cember 31, 2019	Dec	ember 31, 2018
Net revenues:		2013	 2010	 2013		2015		2010
Products	\$	426.5	\$ 402.3	\$ 386.2	\$	1,611.3	\$	1,835.2
Services		73.2	58.2	76.3		288.5		239.9
Total net revenues		499.7	 460.5	 462.5		1,899.8		2,075.1
Cost of revenues:								
Products		241.3	221.8	216.2		913.5		969.3
Services		42.1	28.9	41.3		155.9		126.3
Total cost of revenues		283.4	 250.7	 257.5		1,069.4		1,095.6
Gross profit		216.3	209.8	205.0		830.4		979.5
Research and development		41.7	32.5	41.6		164.1		135.7
Selling, general and administrative		82.5	68.1	82.1		330.3		298.1
Acquisition and integration costs		1.8	4.2	2.1		37.3		3.1
Restructuring and other		2.3	0.2	1.6		7.0		4.6
Fees and expenses related to term loan		0.1	—	0.6		6.6		0.4
Amortization of intangible assets		17.1	10.7	17.0		67.4		43.5
Gain on sale of long-lived assets		_	—	(6.8)		(6.8)		_
Asset impairment		4.7	 	 		4.7		
Income from operations		66.1	94.1	66.8		219.8		494.1
Interest income		1.0	1.7	1.2		5.4		5.7
Interest expense		8.8	3.9	13.5		44.1		16.9
Other expense (income), net		3.1	 0.8	 (0.9)		3.3		1.9
Income from operations before income taxes		55.2	91.1	55.4		177.8		481.0
Provision for income taxes		12.5	19.5	8.0		37.4		88.1
Net income	\$	42.7	\$ 71.6	\$ 47.4	\$	140.4	\$	392.9
Net income per share:			 					
Basic	\$	0.78	\$ 1.33	\$ 0.86	\$	2.57	\$	7.22
Diluted	\$	0.77	\$ 1.32	\$ 0.86	\$	2.55	\$	7.14
Cash dividends per common share	\$	0.20	\$ 0.20	\$ 0.20	\$	0.80	\$	0.78
Weighted average shares outstanding:								
Basic		55.0	54.0	54.9		54.7		54.4
Diluted		55.4	54.4	55.2		55.1		55.0

MKS Instruments, Inc. Unaudited Consolidated Balance Sheet (In millions)

	December 31, 2019	December 31, 2018
ASSETS		
Cash and cash equivalents	\$ 414.6	\$ 644.3
Short-term investments	109.4	73.8
Trade accounts receivable, net	341.1	295.5
Inventories	462.1	384.7
Other current assets	106.3	65.8
Total current assets	1,433.5	1,464.1
Property, plant and equipment, net	241.9	194.4
Right-of-use asset	64.5	
Goodwill	1,058.5	587.0
Intangible assets, net	564.6	319.8
Long-term investments	5.8	10.3
Other assets	47.5	38.6
Total assets	\$ 3,416.3	\$ 2,614.2
LIABILITIES AND STOCKHOLDERS' EQUITY		
Short-term debt	\$ 12.1	\$ 4.0
Accounts payable	88.4	83.8
Accrued compensation	100.9	82.4
Income taxes payable	15.4	16.4
Lease liability	20.6	—
Deferred revenue and customer advances	21.5	14.2
Other current liabilities	58.8	62.5
Total current liabilities	317.7	263.3
Long-term debt, net	871.7	343.8
Non-current deferred taxes	72.4	48.2
Non-current accrued compensation	43.9	55.6
Non-current lease liability	44.8	
Other non-current liabilities	42.5	30.2
Total liabilities	1,393.0	741.1
Stockholders' equity:		
Common stock	0.1	0.1
Additional paid-in capital	864.3	793.9
Retained earnings	1,181.2	1,084.8
Accumulated other comprehensive loss	(22.3)	(5.7)
Total stockholders' equity	2,023.3	1,873.1
Total liabilities and stockholders' equity	\$ 3,416.3	\$ 2,614.2

MKS Instruments, Inc. Unaudited Statements of Cash Flows (In millions, except per share data)

			Oua	rter Ended			Twelve Months Ended			
		ember 31,		ember 31,	Sept	ember 30,	Dec	ember 31,		ember 31,
Cash flows from operating activities:		2019		2018		2019		2019	_	2018
Net income	\$	42.7	\$	71.6	\$	47.4	\$	140.4	\$	392.9
Adjustments to reconcile net income to net cash provided by	Ŷ	,	Ŷ	/ 110	Ŷ	.,	Ŷ	11011	Ŷ	00110
operating activities:										
Depreciation and amortization		30.2		19.9		27.2		110.0		79.8
Amortization of inventory step-up adjustment to fair										
value								7.6		_
Amortization of debt issuance costs and original issue										
discount		0.5		0.9		3.6		7.1		4.7
Stock-based compensation		7.1		5.3		7.4		49.2		27.3
Provision for excess and obsolete inventory		6.1		6.7		6.5		24.7		22.3
Provision for doubtful accounts		(0.9)		0.6		0.9		(0.7)		1.4
Deferred income taxes		4.9		(13.2)		(6.4)		(4.2)		(19.4
Gain on sale of long-lived asset		—				(6.8)		(6.8)		—
Asset impairment		4.7		—		—		4.7		—
Other		0.5		2.1		(0.6)		0.9		2.6
Changes in operating assets and liabilities		(18.5)		41.5		(18.6)		(88.4)		(97.8
Net cash provided by operating activities		77.3		135.4		60.6		244.5		413.8
Cash flows (used in) provided by investing activities:										
Acquisition of business, net of cash acquired		—		—		—		(988.6)		—
Purchases of investments		(75.0)		(39.8)		(53.4)		(246.3)		(253.6
Maturities of investments		49.2		139.7		4.7		142.6		181.7
Sales of investments		4.5		46.4		53.0		166.9		207.5
Proceeds from sale of assets		0.9		—		41.2		42.1		—
Purchases of property, plant and equipment		(19.1)		(26.1)		(16.5)		(63.9)		(62.9
Net cash (used in) provided by investing activities		(39.5)		120.2		29.0		(947.2)		72.7
Cash flows used in financing activities:										
Net proceeds from short and long-term borrowings				7.0		1.2		642.2		67.6
Payments of short-term borrowings		(1.5)		(9.3)		(2.0)		(5.4)		(67.1
Payments of long-term borrowings		(2.2)		—		(52.2)		(106.1)		(50.0
Repurchases of common stock		_		_		_		_		(75.0
Dividend payments		(10.9)		(10.8)		(10.9)		(43.5)		(42.4
Net proceeds (payments) related to employee stock										
awards		0.7		2.5		(0.7)		(11.0)		(11.1
Net cash used in financing activities		(13.9)		(10.6)		(64.6)		476.2		(178.0
Effect of exchange rate changes on cash and cash equivalents		4.4		(0.6)		(5.6)		(3.2)		1.9
Increase in cash and cash equivalents		28.3		244.4	_	19.4	_	(229.7)		310.4
Cash and cash equivalents at beginning of period	_	386.3		399.9		366.9		644.3	-	333.9
Cash and cash equivalents at end of period	\$	414.6	\$	644.3	\$	386.3	\$	414.6	\$	644.3
Cash and cash equivalents at the of period	Ψ	414.0	Ψ	044.5	Ψ	500.5	Ψ	414.0	Ψ	0

MKS Instruments, Inc. Schedule Reconciling Selected Non-GAAP Financial Measures (In millions, except per share data)

		Quar	ter Ended			Twelve Mo	onths End	ded
	mber 31, 2019		mber 31, 2018	mber 30, 2019	Dec	2019 cember 31,		ember 31, 2018
Net income	\$ 42.7	\$	71.6	\$ 47.4	\$	140.4	\$	392.9
Acquisition and integration costs (Note 1)	1.8		4.2	2.1		37.3		3.1
Acquisition inventory step-up (Note 2)	_		_			7.6		—
Fees and expenses related to term loan (Note 3)	0.1		—	0.6		6.6		0.4
Amortization of debt issuance costs (Note 4)	0.2		0.7	3.1		5.1		3.9
Restructuring and other (Note 5)	2.3		0.2	1.6		7.0		4.6
Amortization of intangible assets	17.1		10.7	17.0		67.4		43.5
Gain on sale of long-lived assets (Note 6)				(6.8)		(6.8)		—
Asset impairment (Note 7)	4.7					4.7		—
Windfall tax (benefit) expense on stock-based compensation								
(Note 8)	(0.3)		(0.2)	0.3		(2.2)		(8.2)
Tax reform adjustments (Note 9)	(2.9)		_			(0.1)		(0.6)
Tax on MKS subsidiary distributions (Note 10)	—		(2.2)	—				(5.0)
Tax cost on the inter-company sale of an asset (Note 11)	5.4		0.5			5.4		0.5
Tax effect of pro-forma adjustments	(4.8)		(1.5)	(3.7)		(23.4)		(4.7)
Non-GAAP net earnings (Note 12)	\$ 66.3	\$	84.0	\$ 61.6	\$	249.0	\$	430.4
Non-GAAP net earnings per diluted share (Note 12)	\$ 1.20	\$	1.54	\$ 1.12	\$	4.52	\$	7.83
Weighted average diluted shares outstanding	 55.4		54.4	 55.2		55.1		55.0

MKS Instruments, Inc. Schedule Reconciling Selected Non-GAAP Financial Measures (In millions, except per share data)

			rter Ended			Twelve Mo	
	Dec	ember 31, 2019	ember 31, 2018	ember 30, 2019	Dec	ember 31, 2019	ember 31, 2018
Gross profit	\$	216.3	\$ 209.8	\$ 205.0	\$	830.4	\$ 979.5
Acquisition inventory step-up (Note 2)		_	—			7.6	
Non-GAAP gross profit (Note 15)	\$	216.3	\$ 209.8	\$ 205.0	\$	838.0	\$ 979.5
Non-GAAP gross margin (Note 15)		43.3%	 45.6%	 44.3%		44.1%	 47.2%
Operating expenses	\$	150.2	\$ 115.7	\$ 138.2	\$	610.6	\$ 485.4
Acquisition and integration costs (Note 1)		1.8	4.2	2.1		37.3	3.1
Fees and expenses related to term loan (Note 3)		0.1	_	0.6		6.6	0.4
Amortization of intangible assets		17.1	10.7	17.0		67.4	43.5
Restructuring and other (Note 5)		2.3	0.2	1.6		7.0	4.6
Gain on sale of long-lived assets (Note 6)			—	(6.8)		(6.8)	_
Asset impairment (Note 7)		4.7	—	_		4.7	—
Non-GAAP operating expenses (Note 13)	\$	124.2	\$ 100.6	\$ 123.7	\$	494.4	\$ 433.8
Income from operations	\$	66.1	\$ 94.1	\$ 66.8	\$	219.8	\$ 494.1
Acquisition inventory step-up (Note 2)			_			7.6	_
Acquisition and integration costs (Note 1)		1.8	4.2	2.1		37.3	3.1
Fees and expenses related to term loan (Note 3)		0.1	—	0.6		6.6	0.4
Restructuring and other (Note 5)		2.3	0.2	1.6		7.0	4.6
Amortization of intangible assets		17.1	10.7	17.0		67.4	43.5
Gain on sale of long-lived assets (Note 6)			—	(6.8)		(6.8)	
Asset impairment (Note 7)		4.7	 	 		4.7	
Non-GAAP income from operations (Note 14)	\$	92.1	\$ 109.2	\$ 81.3	\$	343.6	\$ 545.7
Non-GAAP operating margin (Note 14)		18.4%	23.7%	17.6%		18.1%	26.3%
Interest expense	\$	8.8	\$ 3.9	\$ 13.5	\$	44.1	\$ 16.9
Amortization of debt issuance costs (Note 4)		0.2	0.7	3.1		5.1	3.9
Non-GAAP interest expense	\$	8.6	\$ 3.2	\$ 10.4	\$	39.0	\$ 13.0
Net income	\$	42.7	\$ 71.6	\$ 47.4	\$	140.4	\$ 392.9
Interest expense, net		7.8	2.2	12.3		38.7	11.2
Provision for income taxes		12.5	19.5	8.0		37.4	88.1
Depreciation		11.7	9.2	10.2		41.3	36.3
Amortization		17.1	10.7	17.0		67.4	43.5
EBITDA (Note 16)	\$	91.8	\$ 113.2	\$ 94.9	\$	325.2	\$ 572.0
Stock-based compensation		7.2	5.3	 5.8		28.2	 27.3
Acquisition and integration costs (Note 1)		1.8	4.2	2.1		37.3	3.1
Acquisition inventory step-up (Note 2)		_	—			7.6	
Fees and expenses related to term loan (Note 3)		0.1	_	0.6		6.6	0.4
Restructuring and other (Note 5)		2.3	0.2	1.6		7.0	4.6
Gain on sale of long-lived assets (Note 6)		_	—	(6.8)		(6.8)	
Asset impairment (Note 7)		4.7				4.7	_
Other adjustments						3.4	0.7
Adjusted EBITDA (Note 17)	\$	107.9	\$ 122.9	\$ 98.2	\$	413.2	\$ 608.1

MKS Instruments, Inc. Reconciliation of GAAP Income Tax Rate to Non-GAAP Income Tax Rate (In millions)

Three Mon	ths Ended December 3	1, 2019	Three Montl	ns Ended December 31	1, 2018
	Provision (benefit)	Effective Tax Pate	Income Before	Provision (benefit)	Effective Tax Rate
				\$ 19.5	21.4%
1.8	_		4.2	_	
0.1	_			_	
0.2	_		0.7	_	
2.3	—		0.2	—	
17.1	—		10.7	—	
4.7	—			—	
—	0.3			0.2	
	2.9			—	
—	—			2.2	
—	(5.4)			(0.5)	
	4.8			1.5	
\$ 81.4	\$ 15.1	18.6%	\$ 106.9	\$ 22.9	21.4%
	Income Before Income Taxes \$ 55.2 1.8 0.1 0.2 2.3 17.1 4.7 	Income Before Income Taxes Provision (benefit) for Income Taxes \$ 55.2 \$ 12.5 1.8 0.1 0.2 2.3 17.1 4.7 0.3 0.3 4.7 4.7 0.3 4.7 4.7 4.7 4.8	$\begin{array}{c c c c c c c c } \hline Income Taxes & for Income Taxes & Tax Rate \\ \hline \ 1000 & 12.5 & 22.6\% \\ \hline \ 1.8 & & 22.6\% \\ \hline \ 1.8 & & & \\ \hline \ \ 0.1 & & & \\ \hline \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \$	Income Before Income Taxes Provision (benefit) for Income Taxes Effective Tax Rate Income Before Income Taxes \$ 55.2 \$ 12.5 22.6% \$ 91.1 1.8 — 4.2 0.1 — 4.2 0.2 — 0.7 2.3 — 0.2 17.1 — 10.7 4.7 — — — 0.3 — — 2.9 — — (5.4) — — 4.8 —	Income Before Income Taxes Provision (benefit) for Income Taxes Effective Tax Rate Income Before Income Taxes Provision (benefit) for Income Taxes \$ 55.2 \$ 12.5 22.6% \$ 91.1 \$ 19.5 1.8 — 4.2 — 0.1 — — 4.2 — 0.2 — 0.7 — — 2.3 — 0.2 — 10.7 — 4.7 — 10.7 — — — 4.7 — 0.3 — 0.2 — — 0.3 — — 2.2 — — 0.3 — — 2.2 — — 0.3 — — — — — 0.3 — — — — — — 2.9 — — — — — — — 2.2 — — — — —

	Three Months Ended September 30, 2						
	Income Before Income Taxes	Provision (benefit) for Income Taxes	Effective Tax Rate				
GAAP	\$ 55.4	\$ 8.0	14.4%				
Acquisition and integration costs (Note 1)	2.1	—					
Fees and expenses related to term loan (Note 3)	0.6	_					
Amortization of debt issuance costs (Note 4)	3.1	—					
Restructuring and other (Note 5)	1.6	—					
Amortization of intangible assets	17.0	—					
Gain on sale of long-lived assets (Note 6)	(6.8)) —					
Windfall tax expense on stock-based compensation (Note 8)	—	(0.3)					
Tax effect of pro-forma adjustments	—	3.7					
Non-GAAP	\$ 73.0	\$ 11.4	15.6%				

MKS Instruments, Inc. Reconciliation of GAAP Income Tax Rate to Non-GAAP Income Tax Rate (In millions)

	Twelve Months Ended December 31, 2019 Twelve Months E						nths Ende	s Ended December 31, 2018		
		me Before me Taxes		ion (benefit) come Taxes	Effective Tax Rate		me Before me Taxes		ion (benefit) come Taxes	Effective Tax Rate
GAAP	\$	177.8	\$	37.4	21.1%	\$	481.0	\$	88.1	18.3%
Acquisition and integration costs (Note 1)		37.3					3.1			
Acquisition inventory step-up (Note 2)		7.6					_			
Fees and expenses related to repricing of term loan (Note 3)		6.6					0.4		_	
Amortization of debt issuance costs										
(Note 4)		5.1					3.9			
Restructuring and other (Note 5)		7.0		—			4.6			
Amortization of intangible assets		67.4		_			43.5			
Gain on sale of long-lived assets (Note 6)		(6.8)		—			—			
Asset impairment (Note 7)		4.7					—			
Windfall tax benefit on stock-based compensation (Note 8)		_		2.2					8.2	
Tax reform adjustments (Note 9)		_		0.1					0.6	
Tax on MKS subsidiary distributions (Note 10)		_		_			_		5.0	
Tax cost on the inter-company sale of an asset (Note 11)		_		(5.4)			_		(0.5)	
Tax effect of pro-forma adjustments	_			23.4					4.7	
Non-GAAP	\$	306.7	\$	57.7	18.8%	\$	536.5	\$	106.1	19.8%

MKS Instruments, Inc. Reconciliation of Q1-20 Guidance – GAAP Net Income to Non-GAAP Net Earnings (In millions, except per share data)

		Three Months Ended March 31, 2020						
	Low	Guidance	High C	Guidance				
	\$ Amount	\$ Per Share	\$ Amount	\$ Per Share				
GAAP net income	\$ 45.6	\$ 0.82	\$ 65.6	\$ 1.18				
Amortization	16.8	0.30	16.8	0.30				
Deferred financing costs	0.8	0.01	0.8	0.01				
Integration costs	2.4	0.04	2.4	0.04				
Restructuring and other costs	2.3	0.04	2.3	0.04				
Tax effect of adjustments (Note 18)	(4.8)	(0.09)	(5.0)	(0.09)				
Non-GAAP net earnings	\$ 63.1	\$ 1.14	\$ 82.9	\$ 1.49				
Estimated weighted average diluted shares outstanding		55.5		55.5				

MKS Instruments, Inc. Notes on Our Non-GAAP Financial Information

Non-GAAP financial measures adjust GAAP financial measures for the items listed below. These Non-GAAP measures should be viewed in addition to, and not as a substitute for, MKS' reported GAAP results, 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. MKS management believes the presentation of these Non-GAAP measures is useful to investors for comparing prior periods and analyzing ongoing business trends and operating results.

Note 1: Acquisition and integration costs during the three and twelve months ended December 31, 2019, three months ended September 30, 2019 and the three and twelve months ended December 31, 2018, related to our acquisition of Electro Scientific Industries, Inc. ("ESI") which closed on February 1, 2019. In addition, during the twelve months ended December 31, 2018, we reversed a severance accrual of \$1.1 million related to our acquisition of Newport Corporation in April 2016.

Note 2: Cost of revenues during the twelve months ended December 31, 2019 includes the amortization of the step-up of inventory to fair value as a result of the ESI acquisition.

Note 3: We recorded fees and expenses during the three and twelve months ended December 31, 2019 and the three months ended September 30, 2019, related to Amendment No. 6 to our Term Loan Credit Agreement dated as of April 29, 2016 (as amended, the "Term Loan Credit Agreement"), which included the fifth repricing of our secured term loan and a consolidation of the two existing tranches into one tranche with a maturity date in February 2026. We also recorded fees and expenses during the twelve months ended December 31, 2019 related to Amendment No. 5 to our Term Loan Credit Agreement. We recorded fees and expenses during the twelve months ended December 31, 2018 related to previous repricings of our secured term loan.

Note 4: We recorded additional interest expense during the three and twelve months ended December 31, 2019, three months ended September 30, 2019 and the three and twelve months ended December 31, 2018, related to the amortization of debt issuance costs related to our Term Loan Credit Agreement and our ABL Credit Agreement dated February 1, 2019, as amended on April 26, 2019.

Note 5: Restructuring costs during the three months ended December 31, 2019 resulted from the pending closure of a facility in Europe. Additional restructuring costs recorded during the twelve months ended December 31, 2019 and the three months ended September 30, 2019 consisted primarily of severance costs related to an organization-wide reduction in workforce, the consolidation of service functions in Asia, and the movement of certain products to lower cost regions. In the twelve months ended December 31, 2019, we also recorded a legal settlement from a contractual obligation we assumed as part of our acquisition of Newport Corporation. Restructuring costs during the twelve months ended December 31, 2018 were primarily comprised of severance costs related to transferring a portion of our shared services functions to a third party, as well as the consolidation of certain shared service functions in Asia. We also recorded environmental costs during the twelve months ended December 31, 2018, related to an Environmental Protection Agency-designated Superfund site, which we acquired as part of our acquisition of Newport Corporation.

Note 6: During the three months ended September 30, 2019 and twelve months ended December 31, 2019, we recorded a net gain on the sale of two properties in Boulder, CO and three properties in Portland, OR.

Note 7: During the three and twelve months ended December 31, 2019, we recorded an impairment charge related to a minority interest investment in a private company.

Note 8: We recorded windfall tax expenses (benefits) during the three and twelve months ended December 31, 2019, three months ended September 30, 2019 and the three and twelve months ended December 31, 2018, on the vesting of stock-based compensation.

Note 9: We recorded tax adjustments resulting from additional guidance provided by tax authorities and the enactment of tax reform.

Note 10: During the three and twelve months ended December 31, 2018, we recorded adjustments to tax accruals related to distributions of MKS subsidiaries.

MKS Instruments, Inc. Notes on Our Non-GAAP Financial Information

Note 11: We recorded taxes on the inter-company sales of assets during the three and twelve months ended December 31, 2019 and 2018.

Note 12: Non-GAAP net earnings and Non-GAAP net earnings per diluted share amounts exclude acquisition and integration costs, amortization of the step-up of inventory to fair value, fees and expenses related to our secured term loan, amortization of debt issuance costs, restructuring and other costs, amortization of intangible assets, a gain on the sale of long-lived assets, an asset impairment, windfall tax adjustments related to stock compensation expense, tax reform adjustments, accrued tax on subsidiary distributions, tax costs on the inter-company sale of an asset and the related tax effect of these adjustments to reflect the expected full year effective tax rate in the related period.

Note 13: Non-GAAP operating expenses exclude acquisition and integration costs, fees and expenses related to our secured term loan, amortization of intangible assets, restructuring and other costs, a gain on sale of long-lived assets and an asset impairment.

Note 14: Non-GAAP income from operations and Non-GAAP operating margin percentages exclude acquisition and integration costs, the amortization of the step-up of inventory to fair value, fees and expenses related to the repricing and amendment of our secured term loan, restructuring and other costs, amortization of intangible assets, a gain on the sale of long-lived assets and an asset impairment.

Note 15: The Non-GAAP gross profit amount and Non-GAAP gross margin exclude the amortization of the step-up of inventory to fair value.

Note 16: EBITDA excludes net interest, income taxes, depreciation and amortization of intangible assets.

Note 17: Adjusted EBITDA excludes stock-based compensation, acquisition and integration costs, the amortization of the step-up of inventory to fair value, fees and expenses related to the repricing and amendment of our secured term loan, restructuring and other costs, a gain on the sale of long-lived assets, an asset impairment and other adjustments as defined in our Term Loan Credit Agreement.

Note 18: Non-GAAP adjustments are tax effected at applicable statutory rates resulting in a difference between the GAAP and Non-GAAP tax rates.