

Financial Results FQ4 2019

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Sanjay Mehrotra

President and CEO



Overview

Strong Execution Against Backdrop of Challenging Industry Environment

- FQ4-19: Results exceeded guidance ranges
- FY-19: 2nd best year in Micron history for revenue, free cash flow, earnings

Continued Excellent Progress on Key Strategic Objectives

- Improved structural profitability
- Reduced technology gap with competitors
- Strengthened product portfolio

Executed \$2.7 Billion of Share Repurchases

65% of FY-19 free cash flow

Market Environment Broadly Consistent with Expectations

- DRAM demand bounced back as issues impacting first half 2019 dissipated
- NAND elasticity driving robust demand growth
- Demand recovery is encouraging, but we remain mindful of macroeconomic and trade uncertainties



Strong Technology and Roadmap Execution

Significantly improved profitability relative to peers since 2016

- Reduced cost structure
- Increased mix of high value solutions
- Enhanced customer engagement and go-to-market strategy

DRAM

- Cost per bit declines led the industry and exceeded our internal plans in FY-19
- Volume shipments of industry's first1Z products gives Micron feature sizeleadership
- Ended FY-19 with approximately 75% of production on 1X and beyond, with a meaningful portion on 1Y

NAND

- Continued to outpace industry cost declines during FY-19
- 96-layer 3D NAND is continuing to increase as a portion of our mix
- Achieved first yielding dies using replacement gate (RG), further reducing risk of RG transition



End Market Highlights



SSDs

- Consumer SSD had record revenue and unit shipments
- Price elasticity is driving an increase in attach rates and capacities
- Positioned to gain share in NVMe SSD market in FY-20



Mobile

- Resilient revenue and gross margin performance in FY-19
- Managed NAND bit shipments more than tripled Y/Y
- Leading in LP5 DRAM, which positions us well for 5G



Data Center & Graphics

- Data Center: Solid Q/Q demand growth in both cloud and enterprise markets
- Graphics: Strong Q/Q bit growth following inventory reductions in DRAM



Automotive

- Increased revenue Y/Y despite weak auto industry sales
- LP4 shipments over 5 times higher Y/Y





Huawei Update

- In the fiscal fourth quarter, sales to Huawei declined sequentially and were down meaningfully from the levels we anticipated prior to the addition of Huawei to the Entity List
- We have applied for licenses with the U.S. Department of Commerce that would allow us to ship additional products, but there have been no decisions on those licenses to date
- If the Entity List restrictions against Huawei continue and we are unable to get licenses, we could see a worsening decline in our sales to Huawei over the coming quarters



Industry Outlook

DRAM

- CY-19 industry bit demand growth remains unchanged at mid-teens, with supply exceeding demand
- CY-20 industry bit demand growth of high-teens to 20%, above supply growth of only mid-teens
- Long-term bit demand growth CAGR of mid-to-high teens

NAND

- CY-19 industry bit demand growth in the low-to-mid 40% range, which will exceed bit supply growth of approximately 30%
- CY-20 industry bit demand growth of high-20s to low-30% range, with supply growing somewhat below demand
- Long-term bit demand growth CAGR in low-30% range



Micron Outlook

DRAM

- CY-19 bit supply growth slightly below industry demand growth of mid-teens
- CY-20 bit supply growth to be close to market demand
- FY-20 cost reductions to moderate to high-single-digits percentage from FY-19
- Long-term Micron supply growth in line with industry demand



- CY-19 bit supply growth slightly above industry supply growth
- CY-20 bit supply growth to be significantly below the industry as we use our NAND inventory to support customer demand
- Minimal cost reductions in FY-20 and meaningful cost reductions in FY-21
- Long-term Micron supply growth in line with industry demand





Dave Zinsner

Chief Financial Officer



Revenue

FQ4-19

FY-19

\$4.9B

\$23.4B

Up 2% Q/Q and down 42% Y/Y

Down 23% Y/Y





DRAM

63% of overall revenue in FQ4-19

Revenue up 1% Q/Q and down 48% Y/Y

FQ4-19

 Bit shipments up approximately 30% Q/Q and mid-teens percent range Y/Y

ASPs down approximately 20% Q/Q

FY-19

Revenue down 28% Y/Y

Bit shipments up low-single-digit percent range Y/Y

ASPs down approximately 30% Y/Y



NAND

31% of overall revenue in FQ4-19

FQ4-19

Revenue up 5% Q/Q and down 32% Y/Y

Bit shipments up low-to-mid teens percent range Q/Q

ASPs down upper-single-digit percent range Q/Q

FY-19

Revenue down 12% Y/Y

ASPs down mid-40 percent range Y/Y

Strong bit shipment growth



Revenue by Business Unit

	FQ4-19	FQ3-19	Q/Q % Change	FQ4-18	Y/Y % Change	FY-19	FY-18	Y/Y % Change
Compute and Networking (CNBU)	\$1.90B	\$2.08B	(8)%	\$4.36B	(56)%	\$9.97B	\$15.25B	(35)%
Mobile (MBU)	\$1.41B	\$1.17B	20%	\$1.90B	(26)%	\$6.40B	\$6.58B	(3)%
Storage (SBU)	\$848M	\$813M	4%	\$1.24B	(32)%	\$3.83B	\$5.02B	(24)%
Embedded (EBU)	\$705M	\$700M	1%	\$923M	(24)%	\$3.14B	\$3.48B	(10)%

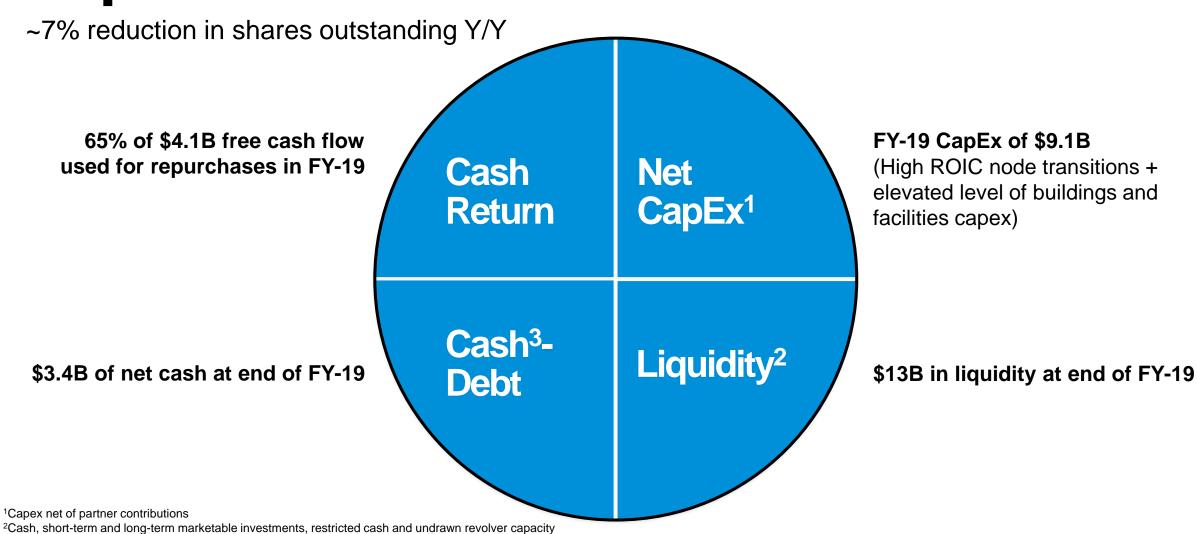


Non-GAAP Operating Results

	FQ4-19	FY-19
Revenue	\$4.9B	\$23.4B
Gross Margin	31%	47%
Net Income	\$637M	\$7.3B
Diluted EPS	\$0.56	\$6.35
Operating Expenses	\$797M	\$3.2B
Operating Income	\$694M	\$7.8B
Cash from Operations	\$2.2B	\$13.2B



Capital Allocation



Micron

Non-GAAP Guidance

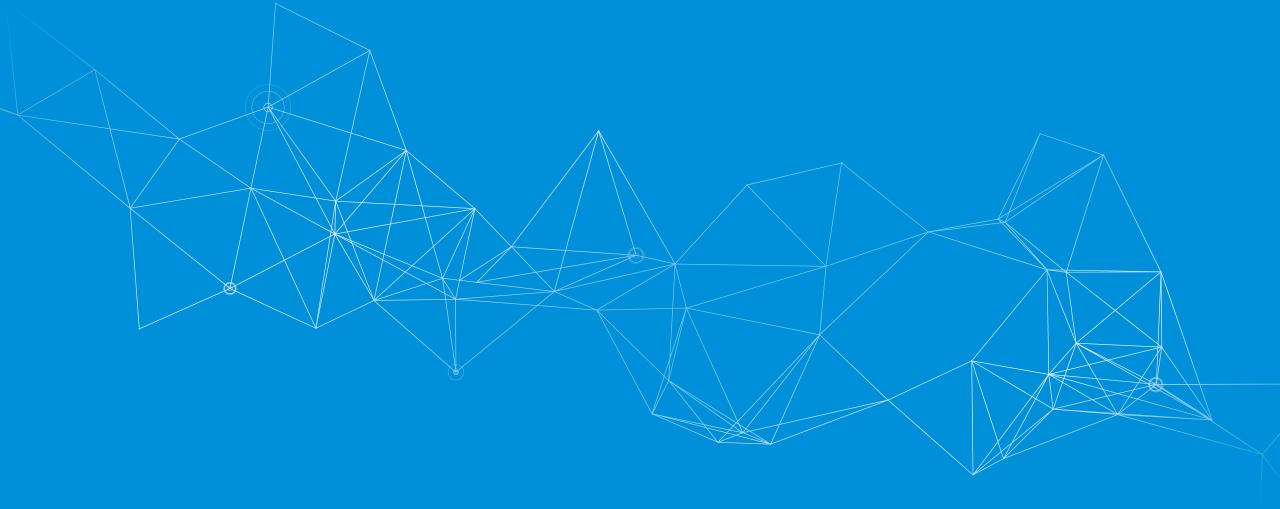
FQ1-20

Revenue	\$5.0 billion ± \$200 million
Gross Margin	26.5% ± 1.5%
Operating Expenses	\$780 million ± \$25 million
Diluted EPS*	\$0.46 ± \$0.07

FY-20

CapEx \$7 billion to \$8 billion





Other Key Data



Financial Summary

Non-GAAP

Amounts in millions, except per share	FQ4-19	% of Revenue	FQ3-19	% of Revenue	FQ4-18	% of Revenue
Revenue	\$4,870	100%	\$4,788	100%	\$8,440	100%
Gross margin	1,491	31%	1,884	39%	5,179	61%
Operating income	694	14%	1,110	23%	4,439	53%
Income tax (provision) benefit	(64)		63		(131)	
Net income attributable to Micron	637	13%	1,198	25%	4,313	51%
Diluted earnings per share	0.56		1.05		3.53	
Cash provided by operating activities	2,233		2,711		5,155	
Cash, marketable investments, and restricted cash	9,246		7,933		7,356	



Financial Summary

Non-GAAP

Amounts in millions, except per share	FY-19	% of Revenue	FY-18	% of Revenue
Revenue	\$23,406	100%	\$30,391	100%
Gross margin	10,973	47%	17,944	59%
Operating income	7,801	33%	15,243	50%
Income tax (provision) benefit	(579)		(418)	
Net income attributable to Micron	7,314	31%	14,700	48%
Diluted earnings per share	6.35		11.95	
Cash provided by operating activities	13,189		17,400	



Non-GAAP Financial Data and Guidance

FQ4-19
63%
31%

% Sales Volume Change	FQ4-19 Q/Q
DRAM	Increased approximately 30%
NAND	Increased low-to-mid teens percent range

% ASP Change	FQ4-19 Q/Q
DRAM	Decreased approximately 20%
NAND	Decreased upper-single- digit percent range

See Non-GAAP reconciliations

	(amou	19 Non-GAAP nts in millions, ept per share)	FQ1-20 Non-GAAP Guidance
Revenue	\$	4,870	\$5.0 billion ± \$200 million
Gross margin		31%	26.5% ± 1.5%
Operating expenses	\$	797	\$780 million ± \$25 million
Earnings per share	\$	0.56	\$0.46 ± \$0.07

	19 Non-GAAP unts in millions)	FQ1-20 Non-GAAP Estimates
Diluted shares	\$ 1,134	~1.13 billion
Income tax (provision) benefit	\$ (64)	Mid-to high-single digit rate
Operating cash flow	\$ 2,233	_
Depreciation and amortization	\$ 1,409	_
Capital expenditures (capital cash flow)*	\$ 1,970	FY20: \$7 billion to \$8 billion

*Net of amounts funded by partners

September 26, 2019



Convertible Notes Dilution Overview

(shares in millions)

Stock Price	Actual FQ4-19*	\$35	\$38	\$41	\$44	\$47	\$50	\$53	\$56	\$59	\$62	\$65
2032 D Notes	10	10	10	10	10	11	11	11	11	11	11	11
2033 F Notes	4	1	1	1	1	1	1	1	1	1	1	1
Total dilutive shares	14	11	11	11	11	12	12	12	12	12	12	12
Benefit from capped call	(2)	(3)	(3)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)	(2)
Net dilution	12	8	8	9	9	10	10	10	10	10	10	10

Note: Except for actual FQ4-19 dilution, the table above presents the potential dilutive impact of convertible notes outstanding as of August 29, 2019 and the anti-dilutive benefit from capped calls over the range of trading prices for Micron's stock.



^{*}Represents the actual dilutive impact of convertible notes for FQ4-19 diluted share count based on an average share price of \$40.52 for the quarter.





Amounts in millions, except per share amounts		FQ4-19	FQ3-19	FQ4-18
GAAP gross margin	\$	1,395	\$ 1,828	\$ 5,151
Stock-based compensation		29	24	21
Start-up and preproduction costs		12	23	_
Employee severance		47	_	_
Other		8	9	7
Non-GAAP gross margin	\$	1,491	\$ 1,884	\$ 5,179
GAAP operating expenses	\$	745	\$ 818	\$ 774
Stock-based compensation		(38)	(34)	(26)
Employee severance		(32)	_	_
Restructure and asset impairments		122	(9)	(7)
Other	_		 (1)	 (1)
Non-GAAP operating expenses	\$	797	\$ 774	\$ 740
GAAP operating income	\$	650	\$ 1,010	\$ 4,377
Stock-based compensation		67	58	47
Start-up and preproduction costs		12	23	_
Employee severance		79	_	_
Restructure and asset impairments		(122)	9	7
Other		8	10	8
Non-GAAP operating income	\$	694	\$ 1,110	\$ 4,439



Amounts in millions, except per share amounts	FQ4-19	FQ3-19	FQ4-18
GAAP net income attributable to Micron	\$ 561	\$ 840	\$ 4,325
Stock-based compensation	67	58	47
Start-up and preproduction costs	12	23	_
Employee severance	79	_	_
Restructure and asset impairments	(122)	9	7
Amortization of debt discount and other costs	10	10	23
(Gain) loss on debt repurchases and conversions	10	317	(1)
(Gain) loss from changes in currency exchange rates	_	1	15
Other	13	12	8
Impact of U.S. income tax reform	_	(42)	(83)
Estimated tax effects of above, non-cash changes in net deferred income taxes, and assessments of tax exposures	7	(30)	(28)
Non-GAAP net income attributable to Micron	\$ 637	\$ 1,198	\$ 4,313
GAAP income tax (provision) benefit	\$ (71)	\$ 135	\$ (20)
Impact of U.S. income tax reform	_	(42)	(83)
Estimated tax effects of non-GAAP adjustments, non-cash changes in net deferred income taxes, and assessments of tax exposures	 7	(30)	(28)
Non-GAAP income tax (provision) benefit	\$ (64)	\$ 63	\$ (131)



Amounts in millions, except per share amounts	FQ4-19	FQ3-19	FQ4-18
GAAP cost of goods sold	\$ 3,475	\$ 2,960	\$ 3,289
Stock-based compensation	(29)	(24)	(21)
Start-up and preproduction costs	(12)	(23)	_
Employee severance	(47)	_	_
Other	 (8)	(9)	(7)
Non-GAAP cost of goods sold	\$ 3,379	\$ 2,904	\$ 3,261
GAAP selling, general and administrative	\$ 212	\$ 206	\$ 215
Stock-based compensation	(18)	(18)	(13)
Employee severance	(10)	 	
Non-GAAP selling, general and administrative	\$ 184	\$ 188	\$ 202
GAAP research and development	\$ 623	\$ 606	\$ 567
Stock-based compensation	(20)	(16)	(13)
Employee severance	(22)	(1)	_
Other	 	 <u> </u>	 (1)
Non-GAAP research and development	\$ 581	\$ 589	\$ 553



Amounts in millions, except per share amounts	ı	-Q4-19	FQ3-	-19	FQ4-18
GAAP shares used in diluted EPS calculations	<u> </u>	1,128		1,129	1,216
Adjustment for capped calls and stock-based compensation		6		6	4
Non-GAAP shares used in diluted EPS calculations		1,134		1,135	1,220
GAAP diluted earnings per share	\$	0.49	\$	0.74	\$ 3.56
Effects of non-GAAP adjustments		0.07		0.31	 (0.03)
Non-GAAP diluted earnings per share	\$	0.56	\$	1.05	\$ 3.53
GAAP net income	\$	586	\$	851	\$ 4,326
Interest (income) expense, net		(18)		(23)	16
Provision (benefit) for income taxes		71		(135)	20
Depreciation and amortization of property, plant, and equipment and intangibles		1,416		1,360	1,285
EBITDA	\$	2,055	\$	2,053	\$ 5,647
	<u> </u>				
Net cash provided by operating activities	\$	2,233	\$	2,711	\$ 5,155
Expenditures for property, plant, and equipment		(2,028)		(2,403)	(2,251)
Payments on equipment purchase contracts		(21)		(17)	(36)
Net partner contributions		79		213	225
Adjusted free cash flow	\$	263	\$	504	\$ 3,093



Amounts in millions, except per share amounts	FY-19		FY-18
GAAP gross margin	\$ 10),702	\$ 17,891
Stock-based compensation		102	83
Start-up and preproduction costs		58	_
Employee severance		73	_
Other		38	20
Non-GAAP gross margin	\$ 1),973	\$ 17,994
GAAP operating expenses	\$	3,326	\$ 2,897
Stock-based compensation		(141)	(115)
Employee severance		(43)	_
Restructure and asset impairments		32	(28)
Other		(2)	 (3)
Non-GAAP operating expenses	\$	3,172	\$ 2,751
GAAP operating income	\$	7,376	\$ 14,994
Stock-based compensation		243	198
Start-up and preproduction costs		58	
Employee severance		116	_
Restructure and asset impairments		(32)	28
Other		40	23
Non-GAAP operating income	\$	7,801	\$ 15,243



Amounts in millions, except per share amounts	FY-19	FY-18
GAAP net income attributable to Micron	\$ 6,313	\$ 14,135
Stock-based compensation	243	198
Start-up and preproduction costs	58	_
Employee severance	116	_
Restructure and asset impairments	(32)	28
Amortization of debt discount and other costs	49	101
(Gain) loss on debt repurchases and conversions	396	385
(Gain) loss from changes in currency exchange rates	9	75
Other	48	28
Impact of U.S. income tax reform	(9)	(174)
Estimated tax effects of above, non-cash changes in net deferred income taxes, and assessments of tax exposures	123	(76)
Non-GAAP net income attributable to Micron	\$ 7,314	\$ 14,700
GAAP income tax (provision) benefit	\$ (693)	\$ (168)
Impact of U.S. income tax reform	(9)	(174)
Estimated tax effects of non-GAAP adjustments, non-cash changes in net deferred income taxes, and assessments of tax exposures	 123	 (76)
Non-GAAP income tax (provision) benefit	\$ (579)	\$ (418)



Amounts in millions, except per share amounts	FY-19	FY-18
GAAP cost of goods sold	\$ 12,704	\$ 12,500
Stock-based compensation	(102)	(83)
Start-up and preproduction costs	(58)	_
Employee severance	(73)	_
Other	(38)	 (20)
Non-GAAP cost of goods sold	\$ 12,433	\$ 12,397
GAAP selling, general and administrative	\$ 836	\$ 813
Stock-based compensation	(73)	(61)
Employee severance	 (15)	 —
Non-GAAP selling, general and administrative	\$ 748	\$ 752
GAAP research and development	\$ 2,441	\$ 2,141
Stock-based compensation	(68)	(54)
Employee severance	(28)	_
Other	(2)	(3)
Non-GAAP research and development	\$ 2,343	\$ 2,084



Amounts in millions, except per share amounts	FY-19	FY-18
GAAP shares used in diluted EPS calculations	1,143	1,229
Adjustment for capped calls and stock-based compensation	 7	 1
Non-GAAP shares used in diluted EPS calculations	1,150	1,230
GAAP diluted earnings per share	\$ 5.51	\$ 11.51
Effects of non-GAAP adjustments	 0.84	 0.44
Non-GAAP diluted earnings per share	\$ 6.35	\$ 11.95
GAAP net income	\$ 6,358	\$ 14,138
Interest (income) expense, net	(77)	222
Provision (benefit) for income taxes	693	168
Depreciation and amortization of property, plant, and equipment and intangibles	 5,424	 4,759
EBITDA	\$ 12,398	\$ 19,287
Net cash provided by operating activities	\$ 13,189	\$ 17,400
Expenditures for property, plant, and equipment	(9,780)	(8,879)
Payments for equipment purchase contracts	(75)	(206)
Net partner contributions	747	889
Adjusted free cash flow	\$ 4,081	\$ 9,204



FQ1-20 Guidance

Non-GAAP Reconciliations

	GAAP	Adjustments		Non-GAAP
Revenue	\$5.0 billion ± \$200 million	_		\$5.0 billion ± \$200 million
Gross margin	25.5% ± 1.5%	1%	Α	26.5% ± 1.5%
Operating expenses	\$818 million ± \$25 million	\$38 million	В	\$780 million ± \$25 million
Diluted EPS*	\$0.42 ± \$0.07	\$0.04	A,B,C	\$0.46 ± \$0.07

Adjustments (amounts in millions)	
A Stock-based compensation – cost of goods sold \$	30
A Other – cost of goods sold	7
B Stock-based compensation – sales, general, and administrative	20
B Stock-based compensation – research and development	18
C Amortization of debt discount and other costs	7
C (Gain) loss on debt repurchases and conversions ((77)
C Tax effects of the above items and non-cash changes in net deferred income taxes	35
\$	40

The above guidance does not incorporate the impact of any potential business combinations, divestitures, restructuring activities, balance sheet valuation adjustments, strategic investments, financing transactions, and other significant transactions. The timing and impact of such items are dependent on future events that may be uncertain or outside of our control.



*GAAP and non-GAAP EPS are based on ~1.13 billion diluted shares

