Monolithic Power Systems, Inc. (MPWR)

Updated June 7th, 2021 by Nikolaos Sismanis

Key Metrics

Current Price:	$347	**5 Year CAGR Estimate:**	10.0%	**Market Cap:**	$15.87B
Fair Value Price:	$245	**5 Year Growth Estimate:**	17.0%	**Ex-Dividend Date:**	06/29/2021
% Fair Value:	142%	**5 Year Valuation Multiple Estimate:**	-6.7%	**Dividend Payment Date:**	07/15/2021
Dividend Yield:	0.7%	**5 Year Price Target**	$537	**Years Of Dividend Growth:**	4
Dividend Risk Score:	D	**Retirement Suitability Score:**	F	**Last Dividend Increase:**	20.0%

Overview & Current Events

Monolithic Power Systems is a leading semiconductor company that designs, develops, and markets high-performance power solutions. The company utilizes its deep system-level and applications expertise to develop highly integrated monolithic systems used in computing and storage, automotive, industrial, communications, and consumer applications industries. Its mission is to reduce total energy consumption in its customers' systems with green, practical, and compact solutions. Monolithic Power generates around $1 billion in annual revenues (current run-rate) and is headquartered in Kirkland, Washington.

On May 4th, 2021, Monolithic Power reported its Q1-2021 results for the quarter ended March 31st, 2021. For the quarter, revenues grew by 53.5% YoY to $254.46 million, powered by strength in the overall market and, more importantly, broad-based market share gains resulting from customer acceptance of Monolithic's new product introductions. Around 37% of revenues resulted from new products introduced in the last three years.

New product acceptance on this scale has paved the way for accelerated growth. Automotive revenues, for example, skyrocketed by 92.5% to $44.9 million, while industrial revenues snowballed to $39.8 million, a growth of 57.7% YoY. As a result of such acceleration, Monolithic expects Q2 revenues in the range of $274 million to $286 million, suggesting YoY growth of 50.3% in the midpoint of this outlook. Consequently, we expect an adjusted EPS of around $6.62 for the full FY2021, reflecting the company's current adjusted EPS run-rate and sequential QoQ growth. Keep in mind that adjusted EPS is a more meaningful valuation and performance metric than GAAP EPS due to Monolithic's high stock-based compensation expenses. However, all data shown in the table below reflects normalized results as originally reported in the company's 10K with the SEC.

Growth on a Per-Share Basis

Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2026
EPS	$0.39	$0.45	$0.61	$0.92	$0.89	$1.30	$1.58	$2.49	$2.52	$3.67	***$6.62***	***$14.51***
DPS	---	$1.00	---	$0.45	$0.80	$0.80	$0.80	$1.20	$1.60	$2.00	***$2.40***	***$5.97***
Shares[1]	34.1	34.9	37.4	38.7	39.5	40.4	41.4	42.2	43.2	44.8	***48.3***	***60.0***

Monolith's EPS has been growing rapidly over the past decade on the back of increasing demand for efficient analog semiconductor solutions. Specifically, the company features a 10-year and 5-year EPS CAGR of 28.3% and 35.5%, respectively. Despite Monolithic's prolonged success, EPS has accelerated over the past few years, as was also the case in its most recent results, while even the pace of said acceleration has also been snowballing. This is primarily due to the company's new cutting-edge products, which the market has welcomed with very strong demand. We anticipate EPS growth of around 17% in the medium term, implying a significant deceleration from its current levels to account for potential demand and production headwinds over the next few years.

[1] Share count is in millions.

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In 2014, Monolithic initiated its quarterly dividend, which it has grown with each new EPS plateau following higher profitability. We expect DPS growth of around 20% in the medium term, in line with the latest dividend increase. We assume that the company will retain a healthy payout ratio moving forward.

Valuation Analysis

Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2026
Avg. P/E	31.9	43.9	39.5	46.0	56.2	50.0	58.2	52.6	57.5	72.8	***52.4***	***37.0***
Avg. Yld.	---	---	---	1.1%	1.6%	1.2%	0.9%	0.9%	1.1%	0.7%	***0.7%***	***1.1%***

Monolithic's historical P/E has averaged at around 50 due to the company's constantly rapid expansion. While we believe that the current valuation is fair based on Monolithic's accelerated growth and profitability prospects, we are setting a medium-term fair multiple at 37 to account for any potential headwinds caused by the cyclical nature of the semiconductor industry. Due to its rich valuation multiple, Monolithic's dividend payments have resulted in very soft yields, historically. Despite the likely rapid dividend growth, we expect dividends to remain a token of the total returns.

Safety, Quality, Competitive Advantage, & Recession Resiliency

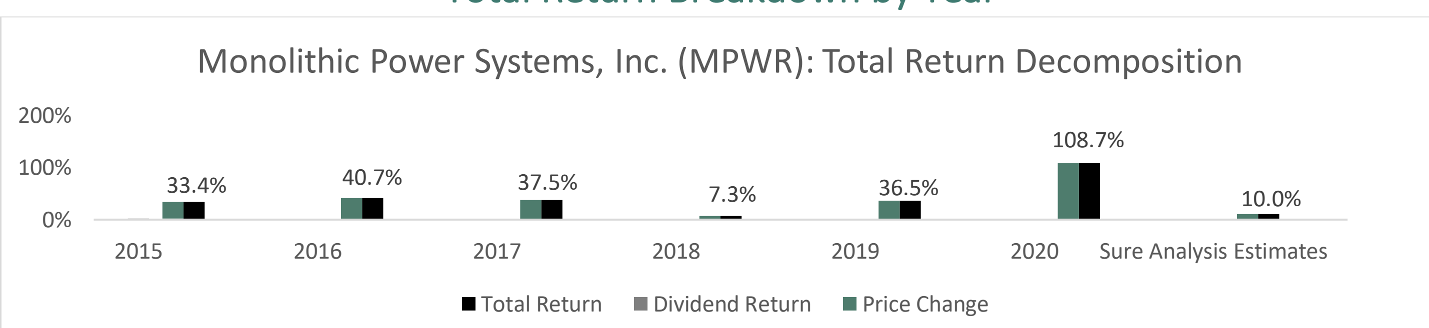
Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020	2021	2026
Payout	---	---	---	49%	90%	62%	51%	48%	63%	54%	***36%***	***41%***

We consider Monolithic's dividend very safe, not only due to the stock's healthy payout ratio, which currently stands at around 36% of its adjusted EPS, but also due to the sky-high profitability growth expectations. The company also enjoys several qualities, including juicy margins, no long-term debt on its balance sheet, and continually strong R&D spending, which should help it stay above its competitors. That being said, the analog and mixed-signal semiconductor industry is highly competitive and will most certainly remain so. The company's primary competitors include industry giants such as Analog Devices, Infineon Technologies, Maxim Integrated Products, and NXP Semiconductors, which could easily gain market share if Monolithic doesn't remain constantly innovative. On the positive side, the company has displayed fantastic recession resiliency qualities, despite the cyclical nature of semiconductors due to its mission-critical products. Revenues remained robust during the Great Financial Crisis and even accelerated through the COVID-19 pandemic.

Final Thoughts & Recommendation

Monolithic Power Systems has rewarded its shareholders with fabulous returns over the past decade, powered by spectacular top & bottom line growth. Instead of maturing, the company is seeing accelerated potential moving forward. Our relatively prudent estimates point towards annualized returns of around 10% in the medium-term, primarily powered by the stock's expected EPS grow, and slightly by its quarterly dividend. However, our returns price-in a steep valuation compression and EPS growth deceleration. If they do not materialize following implied headwinds and demand deceleration, however, total returns could be quite stronger. Hence, shares earn a Buy rating.

Total Return Breakdown by Year



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Disclosure: This analyst has no position in the security discussed in this research report, and no plans to initiate one in the next 72 hours.

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Income Statement Metrics

Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Revenue	197	214	238	283	333	389	471	582	628	844
Gross Profit	102	113	128	153	180	211	258	323	346	466
Gross Margin	51.7%	52.9%	53.7%	54.0%	54.1%	54.3%	54.8%	55.4%	55.2%	55.2%
SG&A Exp.	40	50	55	67	72	83	97	114	134	162
D&A Exp.	9	9	12	13	14	15	16	12	15	19
Operating Profit	17	14	24	27	42	54	79	115	105	167
Operating Margin	8.5%	6.7%	9.9%	9.7%	12.6%	13.9%	16.7%	19.8%	16.7%	19.7%
Net Profit	13	16	23	35	35	53	65	105	109	164
Net Margin	6.8%	7.4%	9.6%	12.6%	10.6%	13.6%	13.8%	18.1%	17.3%	19.5%
Free Cash Flow	23	4	45	65	54	71	68	119	120	212
Income Tax	0	2	1	1	7	5	18	13	4	5

Balance Sheet Metrics

Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Total Assets	274	287	369	399	431	511	653	793	956	1,208
Cash & Equivalents	96	75	101	126	91	113	83	173	173	335
Accounts Receivable	15	19	24	26	31	34	38	55	53	67
Inventories	20	32	40	41	63	71	99	136	128	157
Goodwill & Int. Ass.			-	13	12	10	8	7	7	7
Total Liabilities	31	29	46	53	63	80	131	153	183	242
Accounts Payable	9	10	11	13	13	17	23	23	27	38
Long-Term Debt	-	-	-	-	-	-	-	-	-	-
Shareholder's Equity	243	258	323	346	369	431	522	640	773	967
D/E Ratio	-	-	-	-	-	-	-	-	-	-

Profitability & Per Share Metrics

Year	2011	2012	2013	2014	2015	2016	2017	2018	2019	2020
Return on Assets	4.8%	5.6%	7.0%	9.2%	8.5%	11.2%	11.2%	14.6%	12.4%	15.2%
Return on Equity	5.4%	6.3%	7.9%	10.6%	9.8%	13.2%	13.7%	18.1%	15.4%	18.9%
ROIC	5.4%	6.3%	7.9%	10.6%	9.8%	13.2%	13.7%	18.1%	15.4%	18.9%
Shares Out.	34.1	34.9	37.4	38.7	39.5	40.4	41.4	42.2	43.2	44.8
Revenue/Share	5.59	5.90	6.17	7.10	8.15	9.27	10.81	13.06	13.72	17.96
FCF/Share	0.64	0.11	1.16	1.62	1.31	1.69	1.56	2.67	2.61	4.51

Note: All figures in millions of U.S. Dollars unless per share or indicated otherwise.