

The Atrion logo features the word "Atrion" in a white, italicized sans-serif font. A white chevron symbol is positioned to the left of the letter "A".

Atrion

Annual Report **2018**

Atrion Corporation develops and manufactures products primarily for medical applications. Our products advance the standard of care by increasing safety for patients and providers. We target niche markets, with particular emphasis on fluid delivery, cardiovascular and ophthalmology applications. Headquartered in Allen, Texas, Atrion has design and manufacturing facilities in Alabama, Florida and Texas.

2018

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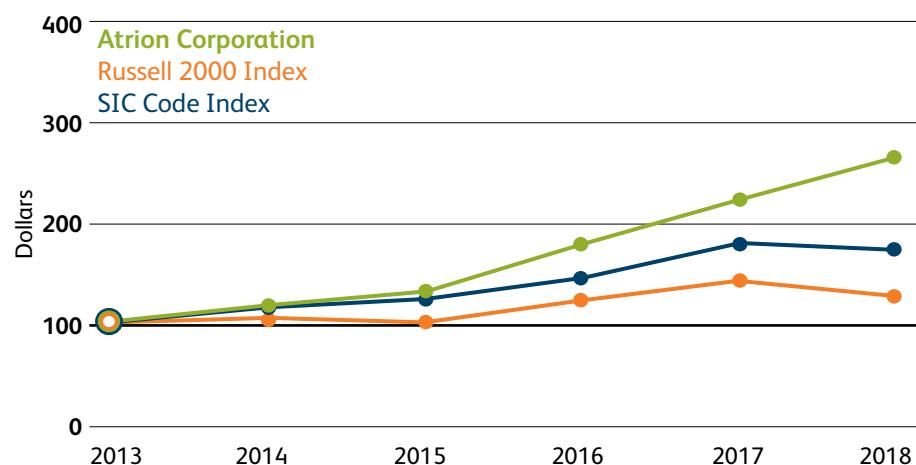
Financial Highlights

For the Year Ended December 31	2018	2017	As of December 31	2018	2017
Revenues	\$ 152,448,000	\$ 146,595,000	Total Assets	\$ 231,216,000	\$ 203,780,000
Operating Income	41,707,000	41,274,000	Cash and Investments	89,485,000	74,740,000
Net Income	34,255,000	36,593,000	Long-term Debt	—	—
Income per Diluted Share	\$ 18.44	\$ 19.71	Stockholders' Equity	\$ 210,767,000	\$ 184,388,000
Weighted Average Diluted Shares Outstanding	1,858,000	1,857,000			



Comparison of 5-Year Cumulative Total Return

Among Atrion Corporation, Russell 2000 Index and SIC Code Index



The graph set forth at left compares the total cumulative return for the five-year period ended December 31, 2018 on the Company's common stock, the Russell 2000 Index and SIC Code 3841 Index—Surgical and Medical Instruments (compiled by Zacks Investment Research, Inc.), assuming \$100 was invested on December 31, 2013 in our common stock, the Russell 2000 Index and the SIC Code Index and dividends were reinvested.

Company/Index	2013	2014	2015	2016	2017	2018
Atrion Corporation	\$100.00	\$115.79	\$130.96	\$175.83	\$220.29	\$260.94
Russell 2000 Index	\$100.00	\$104.89	\$100.26	\$121.63	\$139.44	\$124.09
SIC Code Index	\$100.00	\$115.24	\$123.26	\$143.46	\$178.39	\$171.09

To our stockholders,

Year after year, Atrion delivers on performance. In 2018, when the Russell 2000 index of small cap stocks like ours declined 12%, our stock was up 18%. This strong outcome—even in a period of slower growth as we phase out some commoditized products—is supported by the quality of our earnings. Operating income as a percentage of sales was still an outstanding 27%—a testament to the clinical value of our products and the efficiency of our manufacturing facilities. Cash generated in 2018 allowed us to meet all of our investment needs, raise dividends by 13%, and add \$15 million to our holdings of cash and short- and long-term investments, bringing that total to just shy of \$90 million at year end. We remain debt-free.

A clear strategy for growth

At Atrion, we continuously invest in our long-term future. A lot of companies say things like this, but our numbers reflect the depth of this commitment. To ensure our continued growth, in 2018 we spent an amount equal to 67% of our net income on R&D and capital expenditures. Over the last five years, total investments in these two areas have grown at a compounded rate of 14%.

We amplify these aggressive investments with a strategic approach to developing and manufacturing new products. By co-locating R&D and manufacturing at our three facilities, we are able to constantly learn how to make our products better. When we add talent, it is aimed not only at supplementing our skills, but also at refreshing our perspective.

A solidified market lead

In the fourth quarter of 2018, we began a limited market release in Canada of the third generation of our Myocardial Protection System (MPS 3), an unparalleled perfusion and drug delivery platform used in open heart surgery. This launch marks the culmination of a multi-year R&D program to enhance this technology for even better patient outcomes. This addition to our portfolio will ensure that we will both remain the market leader and expand our market share.

A consistent philosophy to guide us

I've outlined here some of the things we do to grow: target niche markets, develop strong IP, and invest in high-quality talent and production technology. However, the things we do *not* do say just as much about our values.

We do not tout our stock at investment conferences, nor do we hold analyst calls, as these sorts of self-promotion are a distraction from our mission: caring for our employees and promoting the health and safety of our end users with high-quality products. By remaining focused on our mission, we are confident that healthy financial results will follow.

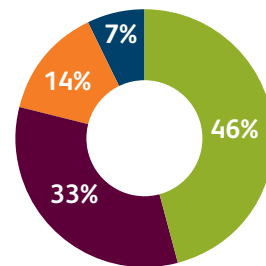
Finally, while we are determined to succeed, we never assume past success is a given as we move forward. To this end, we are relentlessly introspective about how we operate. I am grateful to our employees who make it possible to execute our business philosophy every day, and equally grateful to you for your belief in it.

Respectfully,



David A. Battat
President and CEO

2018 REVENUES BY PRODUCT LINE



Fluid Delivery	46%
\$ 70,606,000	
Cardiovascular	33%
\$ 50,904,000	
Other	14%
\$ 20,465,000	
Ophthalmology	7%
\$ 10,473,000	

ATRION CORPORATION CONSOLIDATED BALANCE SHEETS

As of December 31, 2018 and 2017

Assets:	2018	2017
	(in thousands)	
Current Assets:		
Cash and cash equivalents	\$ 58,753	\$ 30,136
Short-term investments	9,684	35,468
Accounts receivable, net of allowance for doubtful accounts of \$21 and \$28 in 2018 and 2017, respectively	17,014	17,076
Inventories	33,572	29,354
Prepaid expenses and other current assets	3,242	3,199
Total Current Assets	122,265	115,233
Long-term investments	21,048	9,136
Property, Plant and Equipment	181,582	167,080
Less accumulated depreciation	106,689	100,711
	74,893	66,369
Other Assets and Deferred Charges:		
Patents and licenses, net of accumulated amortization of \$12,181 and \$12,062 in 2018 and 2017, respectively	1,659	1,778
Goodwill	9,730	9,730
Other	1,621	1,534
	13,010	13,042
Total Assets	\$ 231,216	\$ 203,780

The accompanying notes are an integral part of these statements.

Liabilities and Stockholders' Equity:	2018	2017
	(in thousands)	
Current Liabilities:		
Accounts payable	\$ 5,082	\$ 3,929
Accrued liabilities	4,519	4,947
Accrued income and other taxes	619	746
Total Current Liabilities	10,220	9,622
Line of credit	—	—
Other Liabilities and Deferred Credits:		
Deferred income taxes	6,687	7,312
Other	3,542	2,458
Total Liabilities	10,229	9,770
Total Liabilities	20,449	19,392
Commitments and Contingencies		
Stockholders' Equity:		
Common stock, par value \$.10 per share, authorized 10,000 shares, issued 3,420 shares	342	342
Additional paid-in capital	50,391	48,730
Accumulated other comprehensive loss	—	(1,215)
Retained earnings	291,761	268,194
Treasury shares, 1,567 shares in 2018 and 1,568 shares in 2017, at cost	(131,727)	(131,663)
Total Stockholders' Equity	210,767	184,388
Total Liabilities and Stockholders' Equity	\$ 231,216	\$ 203,780

The accompanying notes are an integral part of these statements.

ATRION CORPORATION CONSOLIDATED STATEMENTS OF INCOME

For the year ended December 31, 2018, 2017 and 2016

	2018	2017	2016
	(in thousands, except per share amounts)		
Revenues	\$ 152,448	\$ 146,595	\$ 143,487
Cost of Goods Sold	80,670	75,841	75,857
Gross Profit	71,778	70,754	67,630
Operating Expenses:			
Selling	8,341	7,251	6,611
General and administrative	16,217	16,430	15,319
Research and development	5,513	5,799	6,574
	30,071	29,480	28,504
Operating Income	41,707	41,274	39,126
Interest and Dividend Income	1,667	1,061	448
Other Investment Income (Loss)	(1,380)	4	(311)
Other Income (Expense), net	42	1	3
Income before Provision for Income Taxes	42,036	42,340	39,266
Provision for Income Taxes	(7,781)	(5,747)	(11,685)
Net Income	\$ 34,255	\$ 36,593	\$ 27,581
Net Income Per Basic Share	\$ 18.49	\$ 19.82	\$ 15.12
Weighted Average Basic Shares Outstanding	1,853	1,846	1,824
Net Income Per Diluted Share	\$ 18.44	\$ 19.71	\$ 14.85
Weighted Average Diluted Shares Outstanding	1,858	1,857	1,857
Dividends Per Common Share	\$ 5.10	\$ 4.50	\$ 3.90

The accompanying notes are an integral part of these statements.

CONSOLIDATED STATEMENTS OF COMPREHENSIVE INCOME

For the year ended December 31, 2018, 2017 and 2016

	2018	2017	2016
	(in thousands)		
Net Income	\$ 34,255	\$ 36,593	\$ 27,581
Other Comprehensive Loss, net of tax: Unrealized Loss on investments, net of tax benefits of \$68 and \$408 in 2017 and 2016, respectively	—	(741)	(757)
Comprehensive Income	\$ 34,255	\$ 35,852	\$ 26,824

The accompanying notes are an integral part of these statements.

CONSOLIDATED STATEMENTS OF CASH FLOWS

For the year ended December 31, 2018, 2017 and 2016

	2018	2017	2016
	(in thousands)		
Cash Flows From Operating Activities:			
Net income	\$ 34,255	\$ 36,593	\$ 27,581
Adjustments to reconcile net income to net cash provided by operating activities:			
Depreciation and amortization	9,123	8,677	8,953
Deferred income taxes	(625)	(1,374)	(247)
Stock-based compensation	1,659	1,602	1,566
Net change in unrealized gains and losses on investments	1,399	—	345
Net change in accrued interest, premiums, and discounts on investments	47	(195)	(37)
Other	(18)	49	—
	45,840	45,352	38,161
Changes in operating assets and liabilities:			
Accounts receivable	62	88	(546)
Inventories	(4,218)	(339)	756
Prepaid expenses and other current assets	(43)	(18)	(247)
Other non-current assets	(87)	75	(673)
Accounts payable and accrued liabilities	725	213	(324)
Accrued income and other taxes	(127)	336	81
Other non-current liabilities	1,084	1,330	195
	43,236	47,037	37,403
Cash Flows From Investing Activities:			
Property, plant and equipment additions	(17,507)	(9,677)	(10,639)
Purchase of investments	(28,472)	(69,193)	(30,799)
Proceeds from sale of investments	—	—	210
Proceeds from maturities of investments	40,898	58,000	5,000
	(5,081)	(20,870)	(36,228)
Cash Flows From Financing Activities:			
Shares tendered for employees' withholding taxes on stock-based compensation	(90)	(7,735)	(1,112)
Purchase of treasury stock	—	—	(1,276)
Dividends paid	(9,448)	(8,318)	(7,111)
	(9,538)	(16,053)	(9,499)
Net change in cash and cash equivalents	28,617	10,114	(8,324)
Cash and cash equivalents, beginning of year	30,136	20,022	28,346
Cash and cash equivalents, end of year	\$ 58,753	\$ 30,136	\$ 20,022
Cash paid for:			
Income taxes, net of refunds	\$ 9,858	\$ 4,959	\$ 10,750
Non-cash financing activities:			
Non-cash effect of stock option exercises	\$ —	\$ 10,237	\$ —

The accompanying notes are an integral part of these statements.

CONSOLIDATED STATEMENT OF CHANGES IN STOCKHOLDERS' EQUITY

For the year ended December 31, 2018, 2017 and 2016 (in thousands)

	Common Stock		Treasury Stock		Additional Paid-in Capital	Accumulated Other Comprehensive Income (loss)	Retained Earnings	Total
	Shares Outstanding	Amount	Shares	Amount				
Balances, January 1, 2016	1,824	\$ 342	1,596	\$ (111,988)	\$ 35,945	\$ 283	\$ 219,516	\$ 144,098
Net income							27,581	27,581
Other comprehensive income						(757)		(757)
Stock-based compensation transactions	7		(7)	102	1,503			1,605
Shares surrendered in stock transactions	(3)		3	(1,112)				(1,112)
Purchase of treasury stock	(4)		4	(1,276)				(1,276)
Dividends							(7,151)	(7,151)
Balances, December 31, 2016	1,824	342	1,596	(114,274)	37,448	(474)	239,946	162,988
Net income							36,593	36,593
Other comprehensive loss						(741)		(741)
Stock-based compensation transactions	61		(61)	583	11,282			11,865
Shares surrendered in stock transactions	(33)		33	(17,972)				(17,972)
Dividends							(8,345)	(8,345)
Balances, December 31, 2017	1,852	342	1,568	(131,663)	48,730	(1,215)	268,194	184,388
Net income							34,255	34,255
Reclass from adopting ASU 2016-01						1,215	(1,215)	—
Stock-based compensation transactions	1		(1)	26	1,661			1,687
Shares surrendered in stock transactions				(90)				(90)
Dividends							(9,473)	(9,473)
Balances, December 31, 2018	1,853	\$ 342	1,567	\$ (131,727)	\$ 50,391	\$ 0	\$ 291,761	\$ 210,767

The accompanying notes are an integral part of this statement.

ATRION CORPORATION

NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

(1) Summary of Significant Accounting Policies

Atrion Corporation and its subsidiaries (“we,” “our,” “us,” “Atrion” or the “Company”) develop and manufacture products primarily for medical applications. We market our products throughout the United States and internationally. Our customers include physicians, hospitals, distributors, and other manufacturers. Atrion Corporation’s principal subsidiaries through which these operations are conducted are Atrion Medical Products, Inc., Halkey-Roberts Corporation and Quest Medical, Inc.

Principles of Consolidation

The consolidated financial statements include the accounts of Atrion Corporation and its subsidiaries. All intercompany transactions and balances have been eliminated in consolidation.

Estimates

The preparation of the consolidated financial statements in conformity with accounting principles generally accepted in the United States of America requires management to make estimates and assumptions that affect the reported amounts of assets and liabilities and disclosures of contingent assets and liabilities at the dates of the financial statements and the reported amount of revenues and expenses during the reporting periods. Actual results could differ from those estimates.

Cash and Cash Equivalents and Investments

Cash and cash equivalents include cash on hand and in the bank as well as money market accounts and debt securities with maturities at the time of purchase of 90 days or less.

Our investments consist of corporate and government bonds, commercial paper, mutual funds and equity securities. We classify our investment securities in one of three categories: held-to-maturity, available-for-sale, or trading. Securities that we have the positive intent and ability to hold to maturity are reported at amortized cost and classified as held-to-maturity securities.

We report our available-for-sale and trading securities at fair value with changes in fair value recognized in other investment income (loss) in the Consolidated Statement of Income. Prior to our adoption of ASU 2016-01, *Financial Instruments-Overall, Subtopic 825-10: Recognition and Measurement of Financial Assets and Financial Liabilities* (ASU 2016-01) in January of 2018, unrealized gains and losses for our available-for-sale securities were reported in stockholders’ equity as accumulated other comprehensive income.

We consider as current assets those investments which will mature in the next 12 months including interest receivable on long-term bonds. The remaining investments are considered non-current assets including our investment in equity securities which we intend to hold longer than 12 months. We periodically evaluate our investments for impairment.

The components of the Company’s cash and cash equivalents and our short and long-term investments as of December 31, 2018 and 2017 are as follows (in thousands):

	December 31,	
	2018	2017
Cash and Cash Equivalents:		
Cash deposits	\$ 24,670	\$ 12,730
Money market funds	30,965	17,406
Commercial paper	3,118	—
Total cash and cash equivalents	\$ 58,753	\$ 30,136
Short-term investments:		
Mutual funds (trading)	\$ —	\$ 222
Commercial paper (held-to-maturity)	1,275	31,220
Certificates of deposit (held-to-maturity)	—	4,020
Bonds (held-to-maturity)	8,409	6
Total short-term investments	\$ 9,684	\$ 35,468
Long-term investments:		
Mutual funds (available for sale)	\$ 674	\$ —
Bonds (held-to-maturity)	17,513	5,000
Equity securities (available for sale)	2,861	4,136
Total long-term investments	\$ 21,048	\$ 9,136
Total cash, cash equivalents and short and long-term investments	\$ 89,485	\$ 74,740

Account Receivables

Accounts receivable are recorded at the original sales price to the customer. We maintain an allowance for doubtful accounts to reflect estimated losses resulting from the failure of customers to make required payments. The allowance for doubtful accounts is updated periodically to reflect our estimate of collectability issues. Accounts are written off when we determine the receivable will not be collected.

Inventories

Inventories are stated at the lower of cost (including materials, direct labor and applicable overhead) or net realizable value. Cost is determined by using the first-in, first-out method. The following table details the major components of inventory (in thousands):

	December 31,	
	2018	2017
Raw materials	\$ 14,994	\$ 13,545
Work in process	7,214	6,647
Finished goods	11,364	9,162
Total inventories	\$ 33,572	\$ 29,354

Accounts Payable

We reflect disbursements as trade accounts payable until such time as payments are presented to our bank for payment. At December 31, 2018 and 2017, disbursements totaling approximately \$388,000 and \$411,000, respectively, had not been presented for payment to our bank.

Income Taxes

We account for income taxes utilizing Accounting Standards Codification (ASC 740), *Income Taxes*, or ASC 740. ASC 740 requires the asset and liability method for the recording of deferred income taxes, whereby deferred tax assets and liabilities are recognized based on the tax effects of temporary differences between the financial statement and the tax basis of assets and liabilities, as measured at current enacted tax rates. When appropriate, we evaluate the need for a valuation allowance to reduce deferred tax assets.

ASC 740 also requires the accounting for uncertainty in income taxes recognized in an enterprise's financial statements and prescribes a recognition threshold and measurement attributes of income tax positions taken or expected to be taken on a tax return. Under ASC 740, the impact of an uncertain tax position taken or expected to be taken on an income tax return must be recognized in the financial statements at the largest amount that is more-likely-than-not to be sustained upon audit by the relevant taxing authority. An uncertain income tax position will not be recognized in the financial statements unless it is more-likely-than-not of being sustained.

Our uncertain tax positions are recorded within "Other non-current liabilities" in the accompanying consolidated balance sheet. We classify interest expense on underpayments of income taxes and accrued penalties related to unrecognized tax benefits in the income tax provision.

We account for excess tax benefits ("windfalls") and deficiencies ("shortfalls") related to employee stock compensation as required by ASU 2016-09, *Stock Compensation: Improvements to Employee Share-Based Payment Accounting* (ASU 2016-09), within income tax expense. An excess tax benefit is the realized tax benefit related to the amount of deductible compensation

cost reported on an employer's tax return for equity instruments in excess of the compensation cost for those instruments recognized for financial reporting purposes.

During the year ended December 31, 2018 we made quarterly payments in excess of federal income taxes due of approximately \$1,180,000. This amount was recorded in prepaid expenses and other current assets on our Consolidated Balance Sheet.

Property, Plant and Equipment

Property, plant and equipment is stated at cost and depreciated using the straight-line method over the estimated useful lives of the related assets. Additions and improvements are capitalized, including all material, labor and engineering costs to design, install or improve the asset. Expenditures for repairs and maintenance are charged to expense as incurred. The following table represents a summary of property, plant and equipment at original cost (in thousands):

	December 31,		Useful Lives
	2018	2017	
Land	\$ 5,511	\$ 5,511	—
Buildings	32,719	32,461	30-40 yrs
Machinery and equipment	143,352	129,108	3-15 yrs
Total property, plant and equipment	\$ 181,582	\$ 167,080	

Depreciation expense of \$9,003,000, \$8,526,000 and \$8,689,000 was recorded for the years ended December 31, 2018, 2017 and 2016, respectively. Depreciation expense is recorded in either cost of goods sold or operating expenses based on the associated assets' usage.

Patents and Licenses

Costs for patents and licenses acquired are determined at acquisition date. Patents and licenses are amortized over the useful lives of the individual patents and licenses, which are from seven to 20 years. Patents and licenses are reviewed for impairment whenever events or changes in circumstances indicate that the carrying amount of the asset may not be recoverable.

Goodwill

Goodwill represents the excess of cost over the fair value of tangible and identifiable intangible net assets acquired. Annual impairment testing for goodwill is performed in the fourth quarter using a qualitative assessment on goodwill impairment to determine whether it is more likely than not that the carrying value of our reporting units exceeds their fair value. If necessary, a two-step goodwill impairment analysis is performed. Goodwill is also reviewed whenever events or changes in circumstances indicate a change in value may have occurred. We have identified three reporting units where goodwill was recorded for purposes of testing goodwill impairment annually: (1) Atrion Medical Products, Inc.,

(2) Halkey-Roberts Corporation and (3) Quest Medical, Inc. The total carrying amount of goodwill in each of the years ended December 31, 2018 and 2017 was \$9,730,000. Our evaluation of goodwill during each year resulted in no impairment losses.

Current Accrued Liabilities

The items comprising current accrued liabilities are as follows (in thousands):

	December 31,	
	2018	2017
Accrued payroll and related expenses	\$ 3,608	\$ 3,943
Accrued vacation	291	273
Other accrued liabilities	620	731
Total accrued liabilities	\$ 4,519	\$ 4,947

Revenues

We recognize revenue when obligations under the terms of a contract with our customer are satisfied. This occurs with the transfer of control of our products to customers when products are shipped. Revenue is measured as the amount of consideration we expect to receive in exchange for transferring products or services. Sales and other taxes we may collect concurrent with revenue-producing activities are excluded from revenue.

We believe that our medical device business will benefit in the long term from an aging world population along with an increase in life expectancy. In the near term however, demand for our products fluctuates based on our customers' requirements which are driven in large part by their customers' needs for medical care which does not always follow broad economic trends. This affects the nature, amount, timing and uncertainty of our revenue. Also, changes in the value of the United States dollar relative to foreign currencies could make our products more or less affordable and therefore affect our sales in international markets.

A summary of revenues by geographic area, based on shipping destination, for 2018, 2017 and 2016 is as follows (in thousands):

	Year ended December 31,		
	2018	2017	2016
United States	\$ 95,757	\$ 93,082	\$ 91,092
Germany	8,898	8,172	6,396
Other countries less than 5% of revenues	47,793	45,341	45,999
Total	\$ 152,448	\$ 146,595	\$ 143,487

A summary of revenues by product line for 2018, 2017 and 2016 is as follows (in thousands):

	2018	2017	2016
Fluid Delivery	\$ 70,606	\$ 65,053	\$ 60,889
Cardiovascular	50,904	48,073	47,064
Ophthalmology	10,473	13,537	15,427
Other	20,465	19,932	20,107
Total	\$ 152,448	\$ 146,595	\$ 143,487

More than 98 percent of our total revenue in the periods presented herein is pursuant to shipments initiated by a purchase order. Under the new guidance from Accounting Standards Update (ASU) 2014-09, *Revenue from Contracts with Customers* (ASC 606), the purchase order is the contract with the customer. As a result, the vast majority of our revenue is recognized at a single point in time when the performance obligation of the product being shipped is satisfied, rather than recognized over time, and presented as a receivable on the balance sheet.

Our payment terms vary by the type and location of our customers and the products or services offered. The term between invoicing and when payment is due is 30 days in most cases. For certain products or services and customer types, we require payment before the products or services are delivered to the customer.

We evaluate the collectability of specific accounts and determine when to grant credit to our customers using a combination of factors, including the age of the outstanding balances, evaluation of customers' current and past financial condition, recent payment history, current economic environment, and discussions with our personnel and with the customers directly. We apply these same factors and more when evaluating certain aged receivables for collectability issues and to determine changes necessary to our allowance for doubtful accounts. If circumstances change, our estimates of the collectability of amounts could be changed by a material amount.

We have elected to recognize the cost for shipping as an expense in cost of sales when control over the product has transferred to the customer. Shipping and handling fees charged to customers are reported as revenue.

We do not make any material accruals for product returns and warranty obligations. Our manufactured products come with a standard warranty to be free from defect and, in the event of a defect, may be returned by the customer within a reasonable period of time. Historically, our returns have been unpredictable but very low due to our focus on quality control. A one-year warranty is provided with certain equipment sales but warranty claims and our accruals for these obligations have been minimal.

We expense sales commissions when incurred because the amortization period would be one year or less. These costs are recorded within selling expense.

Atrion has contracts in place with customers for equipment leases, equipment financing, and equipment and other services. These contracts represent less than 4% of our total revenue in all periods presented herein. A portion of these contracts contain multiple performance obligations including embedded leases. For such arrangements, we historically allocated revenue to each performance obligation which is capable of being distinct and accounted for as a separate performance obligation based on relative standalone selling prices. We generally determine standalone selling prices based on observable inputs, primarily the prices charged to customers.

Beginning July 1, 2018, for agreements with an embedded lease component, we adopted the practical expedient in ASU 2018-11 *Leases: Targeted Improvements (ASU 2018-11)* that allows us to treat these agreements as a single performance obligation and recognize revenue under ASC 606 rather than under the lease accounting guidelines, since the predominant component of revenue is the non-lease component.

Our fixed monthly equipment rentals to customers are accounted for as operating leases under ASU 2016-02, *Leases (ASC 842)*. Fixed monthly rentals provide for a flat rental fee each month.

A limited number of our contracts have variable consideration including tiered pricing and rebates which we monitor closely for potential constraints on revenue. For these contracts we estimate our position quarterly using the most-likely-outcome method, including customer-provided forecasts and historical buying patterns, and we accrue for any asset or liability these arrangements may create. The effect of accruals for variable consideration on our consolidated financial statements is immaterial.

We do not disclose the value of unsatisfied performance obligations for contracts for which we recognize revenue at the amount which we have the right to invoice. We believe that the complexity added to our disclosures by the inclusion of a large amount of insignificant detail in attempting to disclose information under ASC 606 about immaterial contracts would potentially obscure more useful and important information.

Leases to Customers

The lease assets from our sales type leases are recorded in our accounts receivables in the accompanying consolidated balance sheet, and as of December 31, 2018 and 2017 the balance totaled \$478,000 and \$551,000 respectively.

Our equipment treated as leases to customers under ASC 842 is included in our Property, Plant and Equipment on our balance sheet. After our adoption of ASU 2018-11, the cost of the assets

and associated depreciation that remain under lease agreements is immaterial. Due to the immaterial amount of revenue from our lessor activity, all other lessor disclosures under ASC 842 have been omitted.

As a lessee, we have only two leases for equipment used internally which we account for as operating leases. Upon adoption of ASC 842, we recorded a right-of-use asset and a lease liability for these leases as of January 1, 2018. The monthly expense of \$2,025 for these operating leases, which are our only lessee arrangements, is immaterial and therefore all other lessee disclosures under ASC 842 have been omitted.

Research and Development Costs

R&D costs relating to the development of new products and improvements of existing products are expensed as incurred.

Stock-Based Compensation

We have a stock-based compensation plan covering certain of our officers, directors and key employees. As explained in detail in Note 8, we account for stock-based compensation utilizing the fair value recognition provisions of ASC 718, *Compensation-Stock Compensation*, or ASC 718.

New Accounting Pronouncements

In May 2014, the Financial Accounting Standards Board (FASB) issued ASC 606. This new standard requires an entity to recognize the amount of revenue to which it expects to be entitled for the transfer of promised goods or services to customers. ASC 606 replaced most existing revenue recognition guidance in United States Generally Accepted Accounting Principles when it became effective for fiscal years beginning after December 15, 2017. We adopted the new standard on January 1, 2018, using the full retrospective method. Because accounting for revenue from contracts with customers did not materially change for us under the new standard, prior period consolidated financial statements did not require adjustment.

On February 25, 2016 the FASB issued ASC 842. The main objective of this standard is to recognize lease assets and lease liabilities on the balance sheet and disclose key information about leasing arrangements. This leasing standard requires lessees to recognize a right of use asset and lease liability on the balance sheet. Lessor accounting is updated to align with certain changes in the lessee model and the new revenue recognition standard (ASC 606). We elected to early adopt this standard as of January 1, 2018, using the modified retrospective approach as required. The impact of this change on our consolidated financial statements was not material.

In July 2018, we adopted the practical expedient in ASU 2018-11 which allows lessors to combine lease and non-lease components into a single performance obligation. If the non-lease components are the predominant component of the combined contract, ASU 2018-11 also allows for these agreements to be accounted for under ASC 606 rather than as

leases under ASC 842. The impact of this change on our consolidated financial statements was not material.

In January 2016, the FASB issued ASU 2016-01. The main objective of this update is to enhance the reporting model for financial instruments in order to provide users of financial statements with more decision-useful information. Changes to the previous guidance primarily affect the accounting for equity investments, financial liabilities under the fair value option, and the presentation and disclosure requirements for financial instruments.

The primary impact of this change for us relates to our available-for-sale equity investments and resulted in unrecognized gains and losses from our investments being reflected in our Consolidated Statement of Income beginning in 2018. We adopted ASU 2016-01 as of January 1, 2018, applying the update by means of a cumulative-effect adjustment to the balance sheet by reclassifying the balance of our Accumulated Other Comprehensive Loss in the shareholders' equity section of the balance sheet to Retained Earnings. The balance reclassified of \$1,215,000 was a result of prior-period unrealized losses from our equity investment.

In 2018 we recorded an additional loss on our equity investments of \$1,399,000 as a result of a decrease in the market value of these investments during the year. This loss is reflected in other investment income (loss) in our Consolidated Statement of Income. This change in accounting is expected to create greater volatility in our investment income each quarter in the future.

In March 2017, the FASB issued ASU 2017-08, *Receivables – Non-refundable Fees and Other Costs* (Subtopic 310-20). The main objective of this update is to shorten the period of amortization of the premium on certain callable debt securities to the earliest call date. However, the update does not require an accounting change for securities held at a discount; the discount continues to be amortized to maturity. The update is effective for annual periods beginning after December 15, 2018, including interim periods within those annual periods. We elected to early adopt this update as of January 1, 2018. None of our investments in 2017 and 2016 had any premium paid, so no adjustments were needed for prior-period activity. The impact of this change on our consolidated financial statements was not material.

From time to time, new accounting pronouncements applicable to us are issued by the FASB, or other standards setting bodies, which we will adopt as of the specified effective date. Unless otherwise discussed, we believe the impact of recently issued standards that are not yet effective will not have a material impact on our consolidated financial statements upon adoption.

Fair Value Measurements

Accounting standards use a three-tier fair value hierarchy which

prioritizes the inputs used in measuring fair value. These tiers are: Level 1, defined as observable inputs such as quoted prices in active markets; Level 2, defined as inputs other than quoted prices in active markets that are either directly or indirectly observable; and Level 3, defined as unobservable inputs in which little or no market data exists therefore requiring an entity to develop its own assumptions.

As of December 31, 2018 and 2017, we held certain investments in corporate and government bonds, commercial paper, mutual funds, certificates of deposit, and certain equity securities. These investments, with the exception of mutual funds, are all considered Level 2 assets and the fair value of our investments were estimated using recently executed transactions and market price quotations (see Note 2). Our investments in mutual funds are considered Level 1 assets and the reported fair value of these investments is based on observable quoted prices from active markets.

The carrying values of our other financial instruments including cash and cash equivalents, accounts receivable, accounts payable, accrued liabilities, and accrued income and other taxes approximated fair value due to their liquid and short-term nature.

Concentration of Credit Risk

Financial instruments that potentially subject us to concentrations of credit risk consist primarily of cash and cash equivalents, investments and accounts receivable.

Our cash and cash equivalents are held in accounts with financial institutions that we believe are creditworthy. Certain of these amounts at times may exceed federally-insured limits. At December 31, 2018, approximately 98 percent of our cash and cash equivalents were uninsured. We have not experienced any credit losses in such accounts and do not believe we are exposed to any significant credit risk on these funds.

We have investments in bonds and commercial paper. As a result, we are exposed to potential loss from market risks that may occur as a result of changes in interest rates, changes in credit quality of the issuer and otherwise. These securities have a higher degree of, and a greater exposure to, credit or default risk and may be less liquid in times of economic weakness or market disruptions.

For accounts receivable, we perform ongoing credit evaluations of our customers' financial condition and generally do not require collateral. We maintain reserves for possible credit losses. As of December 31, 2018 and 2017, we had allowances for doubtful accounts of approximately \$21,000 and \$28,000, respectively. The carrying amount of the receivables approximates their fair value. No customer exceeded 10% of our accounts receivable as of December 31, 2018. One customer, which accounted for 15.5% of accounts receivable as of December 31, 2017, was the only customer that exceeded 10% of our accounts receivable at December 31, 2017.

(2) Investments

As of December 31, 2018 and 2017, we held certain investments that were required to be measured for disclosure purposes at fair value on a recurring basis. These investments were considered Level 1 or Level 2 investments as detailed in the table below.

The amortized cost and fair value of our investments and the related gross unrealized gains and losses were as follows as of the dates shown below (in thousands):

	Level	Cost	Gross Unrealized		Fair Value
			Gains	Losses	
As of December 31, 2018					
Short-term Investments:					
Bonds	2	\$ 8,409	\$ —	\$ (13)	\$ 8,396
Commercial paper	2	\$ 1,275	\$ —	\$ —	\$ 1,275
Long-term Investments:					
Bonds	2	\$ 17,513	\$ —	\$ (198)	\$ 17,315
Mutual funds	1	\$ 795	\$ —	\$ (121)	\$ 674
Equity investment	2	\$ 5,675	\$ —	\$ (2,814)	\$ 2,861
As of December 31, 2017					
Short-term Investments:					
Certificates of deposit	2	\$ 4,020	\$ —	\$ (3)	\$ 4,017
Commercial paper	2	\$ 31,220	\$ 26	\$ (38)	\$ 31,208
Corporate bonds	2	\$ 6	\$ —	\$ —	\$ 6
Mutual funds	1	\$ 219	\$ 3	\$ —	\$ 222
Long-term Investments:					
Corporate bonds	2	\$ 5,000	\$ —	\$ (75)	\$ 4,925
Equity investment	2	\$ 5,675	\$ —	\$ (1,539)	\$ 4,136

The above short-term and long-term bonds represent investments in multiple issuers at December 31, 2018. The above equity investment represents an investment in one company at December 31, 2018 and is classified as available for sale. The carrying value of our investments is reviewed quarterly for changes in circumstances or the occurrence of events that suggest an investment may not be recoverable. The unrealized loss for our long-term bonds is attributable to a rise in interest rates which resulted in a lower market price for those securities. One of our bond investments has been in a loss position for more than 12 months due to the rise in interest rates. As of December 31, 2018 there were no changes in circumstances or events that would suggest our investments may not be recoverable. As a result, we recorded no impairment expense related to our investments during 2018.

At December 31, 2018, the length of time until maturity of the bonds we currently own ranged from 14 to 29.5 months and the length of time until maturity of the commercial paper ranged from 3.8 to 6.4 months.

Our accumulated other comprehensive loss at December 31, 2017 was comprised solely of unrealized losses on our above equity investment, net of tax.

(3) Patents and Licenses

Purchased patents and licenses paid for the use of other entities' patents are amortized over the useful life of the patent or license. The following tables provide information regarding patents and licenses (dollars in thousands):

December 31, 2018		
Weighted Average Original Life (years)	Gross Carrying Amount	Accumulated Amortization
15.67	\$ 13,840	\$ 12,181

December 31, 2017		
Weighted Average Original Life (years)	Gross Carrying Amount	Accumulated Amortization
15.67	\$ 13,840	\$ 12,062

Aggregate amortization expense for patents and licenses was \$119,000, \$151,000 and \$264,000 for 2018, 2017 and 2016, respectively. Estimated future amortization expense for each of the years set forth below ending December 31 is as follows (in thousands):

2019	\$119
2020	\$119
2021	\$119
2022	\$117
2023	\$113

(4) Line of Credit

As of December 31, 2018 we had a \$75.0 million revolving credit facility with a money center bank pursuant to which the lender is obligated to make advances until February 28, 2022. This credit facility, entered into on February 28, 2017, replaced a \$40.0 million revolving credit facility with the same bank which was in place for several years prior to that date. The credit facility is secured by substantially all our inventories, equipment and accounts receivable. Interest under the credit facility is assessed at 30-day, 60-day or 90-day LIBOR, as selected by us, plus .875 percent (3.38 percent at December 31, 2018) and is payable monthly. We had no outstanding borrowings under the credit facility at December 31, 2018 or December 31, 2017. Our ability to borrow funds under the credit facility from time to time is contingent on meeting certain covenants in the loan agreement, the most restrictive of which is the ratio of total debt to earnings before interest, income tax, depreciation and amortization. At December 31, 2018, we were in compliance with all of the covenants.

(5) Income Taxes

The items comprising Provision for Income Taxes are as follows (in thousands):

		Year ended December 31,		
		2018	2017	2016
Current	— Federal	\$ 6,405	\$ 6,244	\$ 10,706
	— State	2,001	877	1,226
		8,406	7,121	11,932
Deferred	— Federal	(626)	(1,542)	(92)
	— State	1	168	(155)
		(625)	(1,374)	(247)
Provision for Income Taxes		\$ 7,781	\$ 5,747	\$ 11,685

Temporary differences and carryforwards which have given rise to deferred tax liabilities as of December 31, 2018 and 2017 are as follows (in thousands):

	2018	2017
Deferred tax liabilities (assets):		
Property, plant and equipment	\$ 7,540	\$ 6,787
Patents and goodwill	1,742	1,740
Benefit plans	(1,847)	(854)
Inventories	(367)	(282)
Capital loss carryover	(572)	(572)
Other	(418)	(116)
	6,078	6,703
Plus: Valuation allowance	609	609
Total deferred tax liabilities	\$ 6,687	\$ 7,312

Total income tax expense differs from the amount that would be provided by applying the statutory federal income tax rate to pretax earnings as illustrated below (in thousands):

		Year ended December 31,		
		2018	2017	2016
Income tax expense at the statutory federal income tax rate		\$ 8,828	\$ 14,819	\$ 13,743
Increase (decrease) resulting from:				
State income taxes		1,572	662	730
Section 199 manufacturing deduction		—	(630)	(1,165)
R&D tax credits		(1,212)	(983)	(1,070)
Foreign-derived intangible income deduction		(1,000)	—	—
Excess tax benefit from stock compensation		(95)	(5,782)	(687)
Impact from tax law rate change		—	(4,053)	—
Change in valuation allowance		—	609	—
Uncertain tax positions		(373)	865	(120)
Other, net		61	240	254
Provision for Income Taxes		\$ 7,781	\$ 5,747	\$ 11,685

The Tax Cuts and Jobs Act of 2017, or Tax Act, enacted in December 2017, reduced the corporate federal income tax rate in the United States from 35% to 21% effective on January 1, 2018. This rate reduction reduced our net deferred tax liability, including adjustments to our net state deferred tax liabilities, by \$4.1 million as of December 31, 2017. Based upon this tax law enactment, we recorded a corresponding benefit in our income tax provision of \$4.1 million for the three months and year ended December 31, 2017. Also, in the fourth quarter of 2017 we recorded a deferred tax valuation allowance of \$609,000 primarily related to deferred tax assets for a \$2.7 million capital loss carryover deduction which may not be realized by its expiration date in 2021. This charge partially offset the benefit recorded in our income tax provision as a result of the Tax Act. The Tax Act also ended the domestic production activities deduction under Section 199 which previously helped lower our effective tax rate by three percentage points in 2017 and 2016. The Tax Act added a new deduction starting in 2018 for foreign-derived intangible income under Section 250 which created a tax benefit for us in 2018 of \$1.0 million. We will continue to evaluate the tax reform impacts noting that the ultimate impact of tax reform may differ from the amounts recorded due to changes in our interpretations and assumptions, as well as additional regulatory guidance that may be issued.

A reconciliation of the beginning and ending balances of the total amounts of gross unrecognized tax benefits as required by ASC 740 is as follows (in thousands):

Gross unrecognized tax benefits at January 1, 2016	\$ 120
Decrease in tax positions for prior years	(120)
Increase in tax positions for current year	0
Lapse in statutes of limitation	0
Gross unrecognized tax benefits at December 31, 2016	\$ 0
Decrease in tax positions for prior years	0
Increase in tax positions for current year	865
Lapse in statutes of limitation	0
Gross unrecognized tax benefits at December 31, 2017	\$ 865
Increase in tax positions for prior years	25
Increase in tax positions for current year	0
Lapse in statutes of limitation	(397)
Gross unrecognized tax benefits at December 31, 2018	\$ 493

As of December 31, 2018 all of the unrecognized tax benefits, which were comprised of uncertain tax positions, would impact the effective tax rate if recognized. Unrecognized tax benefits that are affected by statutes of limitation that expire within the next 12 months are immaterial.

We are subject to United States federal income tax as well as to income tax of multiple state jurisdictions. We have concluded all United States federal income tax matters for years through

2014. All material state and local income tax matters have been concluded for years through 2014.

We recognize interest and penalties, if any, related to unrecognized tax benefits in income tax expense. The liability for unrecognized tax benefits included accrued interest of \$19,000 and \$1,000 at December 31, 2018 and 2017, respectively. Tax expense for the year ended December 31, 2018 and 2017 included a net interest charge of \$18,000 and \$1,000, respectively. There were no tax expenses or tax benefits for interest and penalties in 2016.

(6) Stockholders' Equity

Our Board of Directors has at various times authorized repurchases of our stock in open-market or privately-negotiated transactions at such times and at such prices as management may from time to time determine. On May 21, 2015 our Board of Directors adopted a stock repurchase program authorizing the repurchase of up to 250,000 shares of our common stock in open-market or privately-negotiated transactions. This program has no expiration date but may be terminated by the Board of Directors at any time. As of December 31, 2018, there remained 231,765 shares available for repurchase under this program. There were no stock repurchases during 2018 and 2017. We repurchased 3,427 shares under this program during 2016.

We increased our quarterly cash dividend payments in September of each of the past three years. The quarterly dividend was increased to \$1.05 per share in September 2016, to \$1.20 per share in September 2017 and to \$1.35 per share in September 2018. Holders of our stock units earned non-cash dividend equivalents of \$25,000 in 2018, \$27,000 in 2017 and \$40,000 in 2016.

(7) Income Per Share

The following is the computation of basic and diluted income per share:

	Year ended December 31,		
	2018	2017	2016
	(in thousands, except per share amounts)		
Net Income	\$ 34,255	\$ 36,593	\$ 27,581
Weighted average basic shares outstanding	1,853	1,846	1,824
Add: Effect of dilutive securities	5	11	33
Weighted average diluted shares outstanding	1,858	1,857	1,857
Net Income Per Share			
Basic	\$ 18.49	\$ 19.82	\$ 15.12
Diluted	\$ 18.44	\$ 19.71	\$ 14.85

As required by ASC 260, *Earnings per Share*, unvested share-based payment awards that contain non-forfeitable rights to dividends or dividend equivalents are considered participating securities and, therefore, are included in the computation of basic income per share pursuant to the two-class method.

Incremental shares from stock options and restricted stock units were included in the calculation of weighted average diluted shares outstanding using the treasury stock method. Securities representing 148 shares of common stock for the year ended December 31, 2017, were excluded from the computation of weighted average diluted shares outstanding because their effect would have been anti-dilutive. There were no anti-dilutive shares excluded from the computation of weighted average diluted shares outstanding in 2018 and 2016.

(8) Stock Plans

At December 31, 2018, we had one stock-based compensation plan that is described below. We account for our plan under ASC 718, and the disclosures that follow are based on applying ASC 718.

Our Amended and Restated 2006 Equity Incentive Plan, or 2006 Plan, provides for awards to key employees, non-employee directors and consultants of incentive and nonqualified stock options, restricted stock, restricted stock units, deferred stock units, stock appreciation rights, performance shares and other stock-based awards. Under the 2006 Plan, 200,000 shares, in the aggregate, of common stock have been reserved for awards. The purchase price of shares issued on the exercise of options must be at least equal to the fair market value of such shares on the date of grant. The options granted become exercisable and expire as determined by the Compensation Committee. As of December 31, 2018, there remained 23,100 shares reserved for future stock-based awards under the 2006 Plan.

A summary of stock option transactions for the year ended December 31, 2018, is presented below:

Options	Shares	Weighted Average Exercise Price	Weighted Average Remaining Contractual Term
Outstanding at December 31, 2017	20,000	\$ 501.03	4.3 years
Granted	—	—	
Exercised	—	—	
Outstanding at December 31, 2018	20,000	\$ 501.03	3.3 years
Exercisable at December 31, 2018	4,000	\$ 501.03	3.3 years

All nonvested options outstanding at December 31, 2018 are expected to vest. None of our grants includes performance-based or market-based vesting conditions. We estimate the fair value of stock options granted using the Black-Scholes option-pricing formula and a single option award approach. Our Black-Scholes valuation uses a volatility factor based on our historical stock trading history, a risk-free interest rate based on the implied yield currently available on U.S. Treasury securities with an equivalent term, and a dividend yield based on our dividend history. Our expected life assumption represents the period that our stock-based awards are expected to be outstanding and was determined based on historical experience of similar awards, giving consideration to the contractual terms of the stock-based awards, vesting schedules and expectations of future employee behavior.

There were no options granted in 2018 and 2016. The fair value for the options granted in 2017 was estimated at the date of grant using a Black-Scholes option pricing model with the following weighted average assumptions:

	2018	2017	2016
Risk-free interest rate	—	2.13%	—
Dividend yield	—	0.85%	—
Volatility factor	—	25.45%	—
Expected life	—	5 years	—

The weighted average grant date fair value of the options granted in 2017 was \$130.35. The total intrinsic value of options outstanding at December 31, 2018, was \$4.8 million. The total intrinsic value of exercisable options at December 31, 2018, was \$1.0 million.

There were no restricted stock grants during 2018. During 2017, we granted two awards of restricted stock under the 2006 Plan. Under the terms of our restricted stock awards, the restrictions usually lapse over a five-year period. Both awards include restrictions on transfer for a two-year period following vesting. During the vesting period, holders of restricted stock have voting rights and earn dividends, but the shares may not be sold, assigned, transferred, pledged or otherwise encumbered. Nonvested shares are generally forfeited on termination of employment unless otherwise provided in the participant's employment agreement or the termination is in connection with a change in control. We calculated the weighted average fair value per share of the restricted stock awarded in 2017 using the market value of our common stock on the date of the grant with a discount for post-vesting restrictions of 11.2%. We estimated this discount using the Chaffe protective put method. A summary of changes in nonvested restricted stock for the year ended December 31, 2017, is presented below:

Nonvested Shares	Shares	Weighted Average Award Date Fair Value Per Share
Restricted stock at December 31, 2017	5,900	\$ 445.47
Granted in 2018	—	
Vested in 2018	(1,180)	\$ 445.47
Restricted stock at December 31, 2018	4,720	\$ 445.47

All shares of nonvested restricted stock outstanding at December 31, 2018 are expected to vest. The total fair value of restricted stock vested during 2018, 2017 and 2016 was \$699,000, \$803,000 and \$1,177,000, respectively.

During 2018, restricted stock units were awarded to certain employees under the 2006 Plan. All of our restricted stock units are convertible to shares of stock on a one-for-one basis when the restrictions lapse, which is generally after a five-year period. Nonvested stock units are generally forfeited on termination of employment unless the termination is in connection with a change in control. During the vesting period, holders of all restricted stock units earn dividends in the form of additional units. During 2018, one non-employee director elected to receive stock units in lieu of a portion of his cash fees for his services as a member of the Board of Directors.

A summary of changes in stock units for the year ended December 31, 2018, is presented below:

Nonvested Stock Units	Restricted Stock Units	Weighted Average Award Date Fair Value Per Unit	Director's Stock Units	Weighted Average Award Date Fair Value Per Unit
Nonvested at December 31, 2017	6,200	\$ 361.28	—	
Granted	869	\$ 589.66	10	\$ 645.00
Vested	(667)	\$ 219.69	(10)	\$ 645.00
Nonvested at December 31, 2018	6,402	\$ 407.03	—	

All nonvested restricted stock units at December 31, 2018 are expected to vest. The total intrinsic value of all outstanding stock units which were not convertible at December 31, 2018, including 478 stock units held for the accounts of non-employee directors, was \$5,099,000. The total fair value of directors' stock units that vested during 2018, 2017 and 2016 was \$6,000, \$6,000 and \$10,000, respectively.

The total value of stock awards to nonemployee directors awarded under the 2006 Plan was \$240,000, \$312,000 and \$240,000 in 2018, 2017 and 2016, respectively. These awards vested immediately at the time of grants. Compensation related to stock awards, restricted stock and stock units is based

on the fair market value of the stock on the date of the award. These fair values are then amortized on a straight-line basis over the requisite service periods of the entire awards, which is generally the vesting period. Compensation related to stock options is based on the fair value of stock options granted using the Black-Scholes option-pricing formula and a single option award approach.

For the years ended December 31, 2018, 2017 and 2016, we recorded stock-based compensation expense as a G&A expense in the amount of \$1,659,000, \$1,602,000 and \$1,566,000, respectively, for all of the above mentioned stock-based compensation arrangements. The total tax benefit recognized in the income statement from stock-based compensation arrangements for the years ended December 31, 2018, 2017 and 2016, was \$441,000, \$6,342,000 and \$1,235,000, respectively. These amounts include excess tax benefits in each year.

Unrecognized compensation cost information for our various stock-based compensation types is shown below as of December 31, 2018:

	Unrecognized Compensation Cost	Weighted Average Remaining Years in Amortization Period
Stock options	\$ 1,725,000	3.3
Restricted stock	1,738,000	3.3
Restricted stock units	1,150,000	3.5
Total	\$ 4,613,000	

We have a policy of utilizing treasury shares to satisfy stock option exercises, stock unit conversions and restricted stock awards.

(9) Industry Segment and Geographic Information

We operate in one reportable industry segment: developing and manufacturing products primarily for medical applications and have no foreign operating subsidiaries. We have other product lines which include pressure relief valves and inflation systems, which are sold primarily to the aviation and marine industries. Due to the similarities in product technologies and manufacturing processes, these products are managed as part of our medical products segment. Our revenues from sales to customers outside the United States totaled approximately 37 percent of our net revenues in 2018, 2017 and 2016. We have no assets located outside the United States.

(10) Employee Retirement and Benefit Plans

We sponsor a defined contribution 401(k) plan for all employees. Each participant may contribute certain amounts of eligible compensation. We make a matching contribution to the plan. Our contributions under this plan were \$752,000, \$720,000 and \$667,000 in 2018, 2017 and 2016, respectively.

The Company adopted a Nonqualified Deferred Compensation Plan effective September 1, 2017, for certain key management or highly-compensated employees. The plan allows for the deferral of salary and bonus compensation until retirement or other specified payment events occur. Employees' deferred compensation amounts are deemed to be invested in certain investment funds, indexes or vehicles selected by our Compensation Committee and designated by each participant and their deferral balances are adjusted for earnings based upon the performance of these deemed investments. Our deferred compensation obligation under the plan was \$1,774,000 and \$426,000 at December 31, 2018 and 2017, respectively. These amounts are reflected in "Other Liabilities and Deferred Credits" in the accompanying Consolidated Balance Sheets.

(11) Commitments and Contingencies

From time to time and in the ordinary course of business, we may be subject to various claims, charges and litigation. In some cases, the claimants may seek damages, as well as other relief, which, if granted, could require significant expenditures. We accrue the estimated costs of settlement or damages when a loss is deemed probable and such costs are estimable, and accrue for legal costs associated with a loss contingency when a loss is probable and such amounts are estimable. Otherwise, these costs are expensed as incurred. If the estimate of a probable loss or defense costs is a range and no amount within the range is more likely, we accrue the minimum amount of the range. As of December 31, 2018, the Company had no ongoing litigation or arbitration for such matters.

We had a dispute which was favorably settled in the third quarter of 2007. This settlement was amended in December 2008. The amended settlement agreement provides that we may receive annual payments from 2009 through 2024. We have not recorded \$3.0 million in potential future payments under this settlement as of December 31, 2018 due to the uncertainty of payment.

We have arrangements with three of our executive officers pursuant to which the termination of their employment under certain circumstances would result in lump sum payments to them. Termination under such circumstances at December 31, 2018, could have resulted in payments aggregating \$5.0 million.

At December 31, 2018, the Company had purchase obligations with certain suppliers for the purchase of inventory for 2019. These contracts were commitments to purchase inventory used in the production of the Company's products totaling \$1.9 million.

(12) Quarterly Financial Data (Unaudited)

Quarter Ended	Operating Revenue	Operating Income	Net Income	Income Per Basic Share	Income Per Diluted Share
(in thousands, except per share amounts)					
03/31/18	\$ 39,401	\$ 11,366	\$ 8,487	\$ 4.58	\$ 4.57
06/30/18	38,847	11,266	8,797	4.75	4.74
09/30/18	39,274	10,757	9,221	4.98	4.96
12/31/18	34,926	8,318	7,749	4.18	4.17
03/31/17	\$ 38,504	\$ 11,327	\$ 9,950	\$ 5.42	\$ 5.36
06/30/17	36,164	10,175	10,026	5.44	5.40
09/30/17	37,903	11,479	7,971	4.30	4.29
12/31/17	34,024	8,293	8,646	4.67	4.66

The quarterly information presented above reflects, in the opinion of management, all adjustments necessary for a fair presentation of the results for the interim periods presented.

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

Board of Directors and Stockholders Atrion Corporation

Opinion on the consolidated financial statements

We have audited the accompanying consolidated balance sheets of Atrion Corporation (a Delaware corporation) and subsidiaries (the “Company”) as of December 31, 2018 and 2017, and the related consolidated statements of income, comprehensive income, changes in stockholders’ equity, and cash flows for each of the three years in the period ended December 31, 2018, and the related notes and the schedule (not presented separately herein) (collectively referred to as the “financial statements”). In our opinion, the financial statements present fairly, in all material respects, the financial position of the Company as of December 31, 2018 and 2017, and the results of its operations and its cash flows for each of the three years in the period ended December 31, 2018, in conformity with accounting principles generally accepted in the United States of America.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (“PCAOB”), the Company’s internal control over financial reporting as of December 31, 2018, based on criteria established in the 2013 *Internal Control—Integrated Framework* issued by the Committee of Sponsoring Organizations of the Treadway Commission (“COSO”), and our report dated February 26, 2019 expressed an unqualified opinion.

Basis for opinion

These financial statements are the responsibility of the Company’s management. Our responsibility is to express an opinion on the Company’s financial statements based on our audits. We are a public accounting firm registered with the 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 audit to obtain reasonable assurance about whether the financial statements are free of material misstatement, whether due to error or fraud. Our audits included performing procedures to assess the risks of material misstatement of the 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 supporting the amounts and disclosures in the 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 financial statements. We believe that our audits provide a reasonable basis for our opinion.



Grant Thornton LLP
We have served as the Company’s auditor since 2002
Dallas, Texas
February 26, 2019

MANAGEMENT'S REPORT ON INTERNAL CONTROL OVER FINANCIAL REPORTING

Our management, including our Chief Executive Officer and Chief Financial Officer, is responsible for establishing and maintaining adequate internal control over financial reporting as defined in Rule 13a-15(f) under the Securities Exchange Act of 1934, as amended. Our internal control system is 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. All internal control systems, no matter how well designed, have inherent limitations. A system of internal control may become inadequate over time because of changes in

conditions or deterioration in the degree of compliance with the policies or procedures. Therefore, even those systems determined to be effective can provide only reasonable assurance with respect to financial statement preparation and presentation.

Our management assessed the effectiveness of our internal control over financial reporting as of December 31, 2018 using the criteria set forth by the Committee of Sponsoring Organizations of the Treadway Commission in the 2013 *Internal Control-Integrated Framework*. Based on this assessment, our management concluded that, as of December 31, 2018, our internal control over financial reporting was effective.

REPORT OF INDEPENDENT REGISTERED PUBLIC ACCOUNTING FIRM

Board of Directors and Stockholders Atrion Corporation

Opinion on internal control over financial reporting

We have audited the internal control over financial reporting of Atrion Corporation (a Delaware corporation) and subsidiaries (the “Company”) as of December 31, 2018, based on criteria established in the 2013 *Internal Control—Integrated Framework* issued by the Committee of Sponsoring Organizations of the Treadway Commission (COSO). In our opinion, the Company maintained, in all material respects, effective internal control over financial reporting as of December 31, 2018, based on criteria established in the 2013 *Internal Control—Integrated Framework* issued by COSO.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States) (“PCAOB”), the consolidated financial statements and schedule of the Company as of and for the year ended December 31, 2018, and our report dated February 26, 2019 expressed an unqualified opinion on those financial statements and schedule.

Basis for opinion

The Company’s management is responsible for maintaining effective internal control over financial reporting and for its assessment of the effectiveness of internal control over financial reporting, included in the accompanying Management’s Report on Internal Control Over Financial Reporting. Our responsibility is to express an opinion on the Company’s internal control over financial reporting based on our audit. We are a public accounting firm registered with the 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 audit in accordance with the standards of the PCAOB. Those standards require that we plan and perform the audit to obtain reasonable assurance about whether effective internal control over financial reporting was maintained in all material respects. Our audit included obtaining an understanding of internal control over financial reporting, assessing the risk that a material weakness exists, testing and evaluating the design and operating effectiveness of internal control based on the assessed risk, and performing such other procedures as we considered necessary in the circumstances. We believe that our audit provides a reasonable basis for our opinion.

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 (1) pertain to the maintenance of records that, in reasonable detail, accurately and fairly reflect the transactions and dispositions of the assets of the company; (2) 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 (3) 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.



Grant Thornton LLP
Dallas, Texas
February 26, 2019

MANAGEMENT'S DISCUSSION AND ANALYSIS OF FINANCIAL CONDITION AND RESULTS OF OPERATIONS

Overview

We develop and manufacture products primarily for medical applications. We market components to other equipment manufacturers for incorporation in their products and sell finished devices to physicians, hospitals, clinics and other treatment centers. Our medical products primarily serve the fluid delivery, cardiovascular and ophthalmology markets. Our other medical and non-medical products include valves and inflation devices used in marine and aviation safety products. In 2018, approximately 37 percent of our sales were outside the United States.

Our products are used in a wide variety of applications by numerous customers. We encounter competition in all of our markets and compete primarily on the basis of product quality, price, engineering, customer service and delivery time.

Our strategy is to provide a broad selection of products in the areas of our expertise. R&D efforts are focused on improving current products and developing highly-engineered products that meet customer needs and serve niche markets with meaningful sales potential. Proposed new products may be subject to regulatory clearance or approval prior to commercialization and the time period for introducing a new product to the marketplace can be unpredictable. We also focus on controlling costs by investing in modern manufacturing technologies and controlling purchasing processes. We have been successful in consistently generating cash from operations and have used that cash to reduce or eliminate indebtedness, to fund capital expenditures, to make investments, to repurchase stock and to pay dividends.

Our strategic objective is to further enhance our position in our served markets by:

- Focusing on customer needs;
- Expanding existing product lines and developing new products;
- Maintaining a culture of controlling cost; and
- Preserving and fostering a collaborative, entrepreneurial management structure.

For the year ended December 31, 2018, we reported revenues of \$152.5 million, operating income of \$41.7 million and net income of \$34.3 million

Results of Operations

Our net income was \$34.3 million, or \$18.49 per basic and \$18.44 per diluted share, in 2018 compared to \$36.6 million, or \$19.82 per basic and \$19.71 per diluted share, in 2017 and net income of \$27.6 million, or \$15.12 per basic and \$14.85 per diluted share, in 2016. Revenues were \$152.5 million in 2018 compared with \$146.6 million in 2017 and \$143.5 million in 2016. The four percent revenue increase in 2018 over 2017 was generally attributable to higher sales volumes. Our 2016 revenues were negatively impacted by the strong U. S. dollar in our international markets and lower sales prices in certain markets.

Annual revenues by product lines were as follows (in thousands):

	2018	2017	2016
Fluid Delivery	\$ 70,606	\$ 65,053	\$ 60,889
Cardiovascular	50,904	48,073	47,064
Ophthalmology	10,473	13,537	15,427
Other	20,465	19,932	20,107
Total	\$ 152,448	\$ 146,595	\$ 143,487

Although we have experienced decreasing revenues from sales of ophthalmic products over the last three years, we expect revenues from those products to remain at approximately the 2018 level for at least 2019.

Our cost of goods sold was \$80.7 million in 2018, \$75.8 million in 2017 and \$75.9 million in 2016. Increased sales volumes and an unfavorable product sales mix partially offset by improved manufacturing efficiencies and the impact of continued cost improvement projects were the primary contributors to the increase in cost of goods sold in 2018 compared to 2017. A favorable product sales mix, improved manufacturing efficiencies and the impact of continued cost improvement projects partially offset by higher sales volumes were the primary contributors to the decrease in cost of goods sold in 2017 compared to 2016.

Gross profit in 2018 was \$71.8 million compared with \$70.8 million in 2017 and \$67.6 million in 2016. Our gross profit was 47 percent of revenues in 2018, 48 percent of revenues in 2017 and 47 percent of revenues in 2016. The decrease in gross profit percentage in 2018 from 2017 was primarily related to an unfavorable product mix. The increase in gross profit percentage in 2017 from 2016 was primarily related to increased revenues and a favorable product sales mix.

Operating expenses were \$30.1 million in 2018, \$29.5 million in 2017 and \$28.5 million in 2016. R&D expenses decreased \$286,000 in 2018 as compared with 2017 primarily as a result of decreased costs for outside services and supplies partially offset by increased compensation costs. R&D expenses consist primarily of salaries and other related expenses of our R&D personnel as well as costs associated with regulatory matters. In 2018, selling expenses increased \$1.1 million as compared with 2017 primarily as a result of increased commissions, outside services, compensation and travel costs. Selling expenses consist primarily of salaries, commissions and other related expenses for sales and marketing personnel, marketing, advertising and promotional expenses. General and Administrative, or G&A, expenses decreased \$213,000 in 2018 as compared to 2017 primarily as a result of decreased compensation and compensation related costs partially offset by increased outside services and increased computer hardware and software costs. G&A expenses consist primarily of salaries and other related expenses of administrative, executive and financial personnel and outside professional fees.

R&D expenses decreased \$775,000 in 2017 as compared with 2016 primarily as a result of decreased costs for outside services and supplies. In 2017, selling expenses increased \$640,000 as compared with 2016 primarily as a result of increased commissions, outside services, compensation and travel costs. G&A expenses increased \$1.1 million in 2017 as compared to 2016 primarily as a result of increased compensation and compensation related costs and increased outside services partially offset by reduced depreciation, amortization and travel costs.

Our operating income for 2018 was \$41.7 million compared with \$41.3 million in 2017 and \$39.1 million in 2016. Operating income was 27 percent of revenues in 2018, 28 percent of revenues for 2017 and 27 percent of revenues for 2016. An increase in 2018 gross profit partially offset by increased operating expenses was the major contributor to the increase in operating income for 2018 as compared to the previous year. The increase in 2017 gross profit was the major contributor to the increase in operating income for 2017 as compared to the previous year.

Interest and Dividend income for 2018 was \$1.7 million compared with \$1.1 million in 2017 and \$448,000 in 2016. Increased levels of investments, increased interest rates and increased dividends on our equity investments were the primary reason for the increases in both 2018 and 2017 as compared to the previous years.

Other Investment Loss in 2018 of \$1.4 million was primarily related to an unrealized loss on an equity investment as a result of a drop in the market value on this investment. Other Investment Loss in 2016 was primarily related to a \$311,000

impairment loss on one of our long-term corporate bonds which experienced a significant decline in market value.

Income tax expense in 2018 totaled \$7.8 million, compared with \$5.7 million in 2017 and \$11.7 million in 2016. The effective tax rates for 2018, 2017 and 2016 were 18.5 percent, 13.6 percent and 29.8 percent, respectively. The Tax Act reduced the corporate federal income tax rate in the United States from 35 % to 21 % effective for us on January 1, 2018. This rate reduction reduced our net deferred tax liability, including adjustments to our net state deferred tax liabilities, by \$4.1 million as of December 31, 2017. Based upon this tax law enactment, we recorded a corresponding benefit in our income tax provision of \$4.1 million for the fourth quarter and the full year of 2017. Also, in the fourth quarter of 2017 we recorded a valuation allowance of \$609,000 to reduce our deferred tax assets which partially offset the benefit recorded in our income tax provision from the tax law change in 2017. We recorded excess tax benefits related to employee stock compensation of \$95,000, \$5.8 million and \$687,000 for the years ended December 31, 2018, 2017 and 2016, respectively. Benefits from R&D tax credits totaled \$1.2 million in 2018, \$1.0 million in 2017 and \$1.1 million in 2016. Benefits from tax incentives for domestic production totaled \$630,000 in 2017 and \$1.2 million in 2016. The Tax Act ended the domestic production activities deduction under Section 199 for 2018. The Tax Act added a new deduction starting in 2018 for foreign-derived intangible income under Section 250 which created a tax benefit for us in 2018 of \$1.0 million. Charges from changes in uncertain tax positions totaled \$865,000 in 2017. Benefits from changes in uncertain tax positions totaled \$373,000 in 2018 and \$120,000 in 2016. Charges for state income taxes totaled \$1.6 million in 2018, \$662,000 in 2017 and \$730,000 in 2016. We expect our effective tax rate for 2019 to be approximately 20.0 percent. Accounting for stock based awards could create volatility in our effective tax rate depending upon the extent of exercise or vesting activity.

Liquidity and Capital Resources

As of December 31, 2018 we had a \$75.0 million revolving credit facility with a money center bank pursuant to which the lender is obligated to make advances until February 28, 2022. This credit facility, entered into on February 28, 2017, replaced a \$40.0 million revolving credit facility with the same bank which was in place for several years prior to that date. The credit facility is secured by substantially all our inventories, equipment and accounts receivable. Interest under the credit facility is assessed at 30-day, 60-day or 90-day LIBOR, as selected by us, plus .875 percent (3.38 percent at December 31, 2018) and is payable monthly. We had no outstanding borrowings under the credit facility at December 31, 2018 or December 31, 2017. Our ability to borrow funds under the credit facility from time to time is contingent on meeting certain covenants in the loan

agreement, the most restrictive of which is the ratio of total debt to earnings before interest, income tax, depreciation and amortization. At December 31, 2018, we were in compliance with all of these covenants.

At December 31, 2018, we had a total of \$89.5 million in cash and cash equivalents, short-term investments and long-term investments, an increase of \$14.7 million from December 31, 2017. The principal contributor to this increase was positive cash flows resulting from operations.

Cash flows provided by operations of \$43.2 million in 2018 were primarily comprised of net income plus the net effect of non-cash expenses. At December 31, 2018, we had working capital of \$112.1 million, including \$58.8 million in cash and cash equivalents and \$9.7 million in short-term investments. The \$6.4 million increase in working capital during 2018 was primarily related to increases in cash and inventories partially offset by decreases in short-term investments. The net increase in cash and short-term investments was primarily a result of operational results partially offset by purchases of property, plant and equipment and payment of dividends. Working capital items consisted primarily of cash, accounts receivable, short-term investments, inventories and other current assets minus accounts payable and other current liabilities.

Capital expenditures for property, plant and equipment totaled \$17.5 million in 2018, compared with \$9.7 million in 2017 and \$10.6 million in 2016. These expenditures were primarily for machinery and equipment. Purchases of investments totaled \$28.5 million in 2018, compared to \$69.2 million in 2017 and \$30.8 million in 2016. Proceeds from maturities of investments totaled \$40.9 million in 2018, \$58.0 million in 2017 and \$5.0 million in 2016. We expect 2019 capital expenditures, primarily machinery and equipment, to be greater than the average of the levels expended during each of the past three years.

We paid cash dividends totaling \$9.5 million, \$8.3 million and \$7.1 million during 2018, 2017 and 2016, respectively. We expect to fund future dividend payments with cash flows from operations. We purchased treasury stock totaling \$1.3 million during 2016. No treasury stock was purchased in 2018 or 2017.

The table below summarizes debt, lease and other contractual obligations outstanding at December 31, 2018:

Contractual Obligations	Payments Due by Period		
	Total	2019	2020 and thereafter
	(in thousands)		
Purchase Obligations	\$ 1,915	\$ 1,915	\$ —
Total	\$ 1,915	\$ 1,915	\$ —

We believe our cash, cash equivalents, short-term investments and long-term investments, cash flows from operations and

available borrowings of up to \$75.0 million under our credit facility will be sufficient to fund our cash requirements for at least the foreseeable future. We believe our strong financial position would allow us to access equity or debt financing should that be necessary. Additionally, we expect our cash and cash equivalents and investments, as a whole, will continue to increase in 2019.

Off-Balance Sheet Arrangements

We have no off-balance sheet financing arrangements.

Impact of Inflation

We experience the effects of inflation primarily in the prices we pay for labor, materials and services. Over the last three years, we have experienced the effects of moderate inflation in these costs. At times, we have been able to offset a portion of these increased costs by increasing the sales prices of our products. However, competitive pressures have not allowed for full recovery of these cost increases.

New Accounting Pronouncements

In May 2014, the Financial Accounting Standards Board (FASB) issued Accounting Standards Update (ASU) 2014-09, *Revenue from Contracts with Customers*, also known as ASC 606. This new standard requires an entity to recognize the amount of revenue to which it expects to be entitled for the transfer of promised goods or services to customers. ASC 606 replaced most existing revenue recognition guidance in United States Generally Accepted Accounting Principles when it became effective for fiscal years beginning after December 15, 2017. We adopted the new standard on January 1, 2018, using the full retrospective method. Because accounting for revenue from contracts with customers did not materially change for us under the new standard, prior period consolidated financial statements did not require adjustment.

On February 25, 2016 the FASB issued ASU 2016-02, *Leases* (ASC 842). The main objective of this standard is to recognize lease assets and lease liabilities on the balance sheet and disclose key information about leasing arrangements. This leasing standard requires lessees to recognize a right of use asset and lease liability on the balance sheet. Lessor accounting is updated to align with certain changes in the lessee model and the new revenue recognition standard (ASC 606). We elected to early adopt this standard as of January 1, 2018, using the modified retrospective approach as required. The impact of this change on our consolidated financial statements was not material.

In July 2018, we adopted the practical expedient in ASU 2018-11 - *Leases: Targeted Improvements* which allows lessors to combine lease and non-lease components into a single performance obligation. If the non-lease components are the

predominant component of the combined contract, ASU 2018-11 also allows for these agreements to be accounted for under ASC 606 rather than as leases under ASC 842. The impact of this change on our consolidated financial statements was not material.

In January 2016, the FASB issued ASU 2016-01, *Financial Instruments - Overall (Subtopic 825-10): Recognition and Measurement of Financial Assets and Financial Liabilities*. The main objective of this update is to enhance the reporting model for financial instruments in order to provide users of financial statements with more decision-useful information. Changes to the previous guidance primarily affect the accounting for equity investments, financial liabilities under the fair value option, and the presentation and disclosure requirements for financial instruments.

The primary impact of this change for us relates to our available-for-sale equity investments and resulted in unrecognized gains and losses from our investments being reflected in our Consolidated Statement of Income beginning in 2018. We adopted ASU 2016-01 as of January 1, 2018, applying the update by means of a cumulative-effect adjustment to the balance sheet by reclassifying the balance of our Accumulated Other Comprehensive Loss in the shareholders' equity section of the balance sheet to Retained Earnings. The balance reclassified of \$1,215,000 was a result of prior-period unrealized losses from our equity investments.

In 2018 we recorded an additional loss on our equity investments of \$1,399,000 as a result of a decrease in the market value of these investments during the year. This loss is reflected in other investment income (loss) in our Consolidated Statement of Income. This change in accounting is expected to create greater volatility in our investment income each quarter in the future.

In March 2017, the FASB issued ASU 2017-08, *Receivables – Non-refundable Fees and Other Costs (Subtopic 310-20)*. The main objective of this update is to shorten the period of amortization of the premium on certain callable debt securities to the earliest call date. However, the update does not require an accounting change for securities held at a discount; the discount continues to be amortized to maturity. The update is effective for annual periods beginning after December 15, 2018, including interim periods within those annual periods. We elected to early adopt this update as of January 1, 2018. None of our investments in 2017 and 2016 had any premium paid, so no adjustments were needed for prior-period activity. The impact of this change on our consolidated financial statements was not material.

From time to time, new accounting pronouncements applicable to us are issued by the FASB, or other standards setting bodies,

which we will adopt as of the specified effective date. Unless otherwise discussed, we believe the impact of recently issued standards that are not yet effective will not have a material impact on our consolidated financial statements upon adoption.

Critical Accounting Policies

The discussion and analysis of our financial condition and results of operations are based on our consolidated financial statements, which have been prepared in accordance with accounting principles generally accepted in the United States. In the preparation of these financial statements, we make estimates and assumptions that affect the reported amounts of assets, liabilities, revenues and expenses, and related disclosures of contingent assets and liabilities. We believe the following discussion addresses our most critical accounting policies and estimates, which are those that are most important to the portrayal of our financial condition and results and require management's most difficult, subjective and complex judgments, often as a result of the need to make estimates about the effect of matters that are inherently uncertain. Actual results could differ significantly from those estimates under different assumptions and conditions.

From time to time, we accrue legal costs associated with certain litigation. In making determinations of likely outcomes of litigation matters, we consider the evaluation of legal counsel knowledgeable about each matter, case law and other case-specific issues. We believe these accruals are adequate to cover the legal fees and expenses associated with litigating these matters. However, the time and cost required to litigate these matters as well as the outcomes of the proceedings may vary significantly from what we have projected.

We maintain an allowance for doubtful accounts to reflect estimated losses resulting from the failure of customers to make required payments. On an ongoing basis, the collectability of accounts receivable is assessed based upon historical collection trends, current economic factors and the assessment of the collectability of specific accounts. We evaluate the collectability of specific accounts and determine when to grant credit to our customers using a combination of factors, including the age of the outstanding balances, evaluation of customers' current and past financial condition, recent payment history, current economic environment, and discussions with our personnel and with the customers directly. Accounts are written off when it is determined the receivable will not be collected. If circumstances change, our estimates of the collectability of amounts could be changed by a material amount.

We are required to estimate our provision for income taxes and uncertain tax positions in each of the jurisdictions in which we operate. This process involves estimating our actual current tax exposure, including assessing the risks associated with tax

audits, together with assessing temporary differences resulting from the different treatment of items for tax and accounting purposes. These differences result in deferred tax assets and liabilities, which are included within the balance sheet. We assess the likelihood that our deferred tax assets will be recovered from future taxable income and, to the extent we believe that recovery is more likely than not, do not establish a valuation allowance. In the event that actual results differ from these estimates, the provision for income taxes could be materially impacted.

We assess the impairment of our long-lived identifiable assets, excluding goodwill which is tested for impairment as explained below, whenever events or changes in circumstances indicate that the carrying value may not be recoverable. This review is based upon projections of anticipated future cash flows. Although we believe that our estimates of future cash flows are reasonable, different assumptions regarding such cash flows or changes in our business plan could materially affect our evaluations. No such changes are anticipated at this time.

We assess goodwill for impairment pursuant to Accounting Standards Codification, or ASC 350, *Intangibles—Goodwill and Other*, which requires that goodwill be assessed on an annual basis, or whenever events or changes in circumstances indicate that the carrying value may not be recoverable, by applying a qualitative assessment on goodwill impairment to determine whether it is necessary to perform the two-step goodwill impairment test.

We assess the total carrying value for each of our investments on a quarterly basis for changes in circumstances or the occurrence of events that suggest our investment may not be recoverable. If an investment is considered impaired, we must determine whether the impairment is other than temporary. If it is determined to be other than temporary, the impairment must be recognized in our financial statements.

During 2018, 2017 and 2016, none of our critical accounting estimates required significant adjustments. We did not note any material events or changes in circumstances indicating that the carrying value of long-lived assets were not recoverable.

Quantitative and Qualitative Disclosures About Market Risks

Foreign Exchange Risk

We are not exposed to material fluctuations in currency exchange rates that would result in realized gains or losses being reflected in the Consolidated Statements of Income because the payments from our international customers are received primarily in United States dollars.

However, fluctuations in exchange rates may affect the prices that our international customers are willing to pay and may put us at a price disadvantage compared to other customers. Increases in the value of the United States dollar relative to foreign currencies could make our products less competitive or less affordable and therefore adversely affect our sales in international markets.

Market Risk and Credit Risk

The Company's cash and cash equivalents are held in accounts with financial institutions that we believe are creditworthy. Certain of these accounts at times may exceed federally-insured limits. We have not experienced any credit losses in such accounts and do not believe we are exposed to any significant credit risk on these funds.

We have investments in commercial paper and corporate and government bonds. As a result, we are exposed to potential loss from market risks that may occur as a result of changes in interest rates, changes in credit quality of the issuer and otherwise. These securities have a higher degree of, and a greater exposure to, credit or default risk and may be less liquid in times of economic weakness or market disruptions. We have also invested a portion of our available funds in equity securities and mutual funds. The value of these securities fluctuates due to changes in the equity and credit markets along with other factors. In times of economic weakness, the market value and liquidity of these assets may decline and may negatively impact our financial condition.

Forward-looking Statements

Statements in this Management’s Discussion and Analysis and elsewhere in this Annual Report that are forward looking are based upon current expectations, and actual results or future events may differ materially. Therefore, the inclusion of such forward-looking information should not be regarded as a representation by us that our objectives or plans will be achieved. Such statements include, but are not limited to, our R&D program in 2019, our ability to continue operations in the event of a supply disruption, our effective tax rate for 2019, the impact of the restrictive covenants in our credit facility on our liquidity and capital resources, our earnings in 2019, our 2019 capital expenditures, future dividend payments, funding future dividend payments with cash flows from operations, availability of equity and debt financing, our ability to meet our cash requirements for the foreseeable future, the impact on our consolidated financial statement of recently issued accounting standards when we adopt those standards, increases in 2019 in cash, cash equivalents and investments, and the impact of the addition of MPS 3 on our market position. Words such as “expects,” “believes,” “anticipates,” “intends,” “should,” “plans,” and variations of such words and similar expressions are intended to identify such forward-looking statements. Forward-looking statements contained herein involve numerous risks and uncertainties,

and there are a number of factors that could cause actual results or future events to differ materially, including, but not limited to, the following: changing economic, market and business conditions; acts of war or terrorism; the effects of governmental regulation; the impact of competition and new technologies; slower-than-anticipated introduction of new products or implementation of marketing strategies; implementation of new manufacturing processes or implementation of new information systems; our ability to protect our intellectual property; changes in the prices of raw materials; changes in product mix; intellectual property and product liability claims and product recalls; the ability to attract and retain qualified personnel and the loss of any significant customers. In addition, assumptions relating to budgeting, marketing, product development and other management decisions are subjective in many respects and thus susceptible to interpretations and periodic review which may cause us to alter our marketing, capital expenditures or other budgets, which in turn may affect our results of operations and financial condition. The forward-looking statements in this Annual Report are made as of the date hereof, and we do not undertake any obligation, and disclaim any duty, to supplement, update or revise such statements, whether as a result of subsequent events, changed expectations or otherwise, except as required by applicable law.

SELECTED FINANCIAL DATA

(in thousands, except per share amounts)

	2018	2017	2016	2015	2014
Operating Results for the Year ended December 31,					
Revenues	\$ 152,448	\$ 146,595	\$ 143,487	\$ 145,733	\$ 140,762
Operating income	41,707	41,274	39,126	42,510	40,817
Net income	34,255	36,593	27,581	28,925	27,808
Depreciation and amortization	9,123	8,677	8,953	8,823	8,723
Per Share Data:					
Net income per diluted share	\$ 18.44	\$ 19.71	\$ 14.85	\$ 15.47	\$ 14.08
Cash dividends per common share	\$ 5.10	\$ 4.50	\$ 3.90	\$ 3.30	\$ 2.78
Average diluted shares outstanding	1,858	1,857	1,857	1,870	1,975
Financial Position at December 31,					
Total assets	\$ 231,216	\$ 203,780	\$ 181,942	\$ 164,336	\$ 171,514
Long-term debt	—	—	—	—	—

Leadership

Board of Directors

Emile A Battat

Chairman of the Board
Atrion Corporation

Preston G. Athey

Private Investor
Former Portfolio Manager,
T. Rowe Price Small Cap Value Fund
T. Rowe Price Associates, Inc.
Baltimore, Maryland

Hugh J. Morgan, Jr.

Private Investor
Former Chairman of the Board
National Bank of Commerce
of Birmingham
Morganton, North Carolina

Ronald N. Spaulding

Private Investor
Former President of
Worldwide Commercial Operations
Abbott Vascular
Miami, Florida

John P. Stupp, Jr.

President and Chief Executive Officer
Stupp Bros., Inc.
St. Louis, Missouri

Executive Officers

Emile A Battat

Chairman of the Board

David A. Battat

President and Chief Executive Officer

Jeffery Strickland

Vice President and Chief Financial
Officer, Secretary and Treasurer

Corporate Information

Corporate Office

Atrion Corporation
One Allentown Parkway
Allen, Texas 75002
(972) 390-9800
www.atrioncorp.com

Registrar and Transfer Agent

American Stock Transfer and
Trust Company, LLC
Attn: Shareholder Services
6201 15th Avenue
Brooklyn, NY 11219

Form 10-K

A copy of the Company's 2018 Annual Report on Form 10-K, as filed with the Securities and Exchange Commission, may be obtained by any stockholder without charge by written request to:

Corporate Secretary

Atrion Corporation
One Allentown Parkway
Allen, Texas 75002

Stock Information

The Company's common stock is traded on The Nasdaq Global Select Market (Symbol: ATRI). As of February 13, 2019, we had 115 record holders, and approximately 6,100 beneficial owners, of our common stock.

The Company presently plans to pay quarterly cash dividends in the future.



ATRION CORPORATION

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Allen, Texas 75002

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972.390.9800