

ATMI®

2011 Annual Report

MICROELECTRONICS LIFE SCIENCES



Solving Critical Materials and Process Challenges

# Dear Shareholder:

Despite a very uncharacteristic year in the semiconductor industry—a strong first half, and a second half best described as a downturn—ATMI did very well both financially and strategically in 2011, its 25th anniversary year.

To be sure, the turmoil was related to global economic uncertainties that left our customers' customers tentative in all but a few bright spots—such as smartphones and tablet devices. At the same time, the gulf widened between those device makers working on the world's most sophisticated and complex designs and those who lack the scale or resources to continue to invest in leading-edge device and process technology. Working with the leading innovators presents ATMI's greatest opportunities.

## In 2011, ATMI generated strong growth and posted significant achievements:

Against a backdrop of 2% wafer start growth, revenues grew 6% to \$390 million and, excluding the effect of the SDS Direct transaction, we delivered strong growth in operating income.

- We terminated our SDS® manufacturing and distribution agreement with Matheson Tri-Gas, Inc. and established global control of the SDS product line, allowing us to interact directly with our semiconductor-producing customers as they work to integrate ever more challenging processes and new materials.
- Our ongoing investments in High Productivity Development (HPD) capabilities are yielding returns, accounting for 4% of 2011 revenues.
- We signed our first fee-based collaborative development agreement with a major IC producer focusing on microelectronics materials and process insight.
- We licensed several of our innovative single-use technologies to multiple companies in the life sciences market.
- Our history of innovation was recognized by the U.S. Small Business Administration, which made ATMI an inaugural inductee to its "Small Business Innovation Research Hall of Fame."

Founded in 1986, we have been a leader in developing advanced materials and high-performance, ultra-high integrity materials packaging and delivery solutions, which the world's leading device producers use today on their most challenging processes.

Over the past few years, we have expanded our packaging technology toward the life sciences markets.

We provide certain segments of the drug industry

with the means to achieve safe, cost-efficient production of critical biopharmaceuticals using "single-use technologies" for vaccine and drug discovery and manufacture.

While we have reached 25 years, the spirit of continuous innovation and desire to find new ways to serve customers and grow remains strong. Today, our employees are working with multiple collaboration partners on developing new applications that apply our core competencies in carbon engineering, chemistry formulation, and critical liquids packaging and delivery to markets with an ever-increasing focus on resource efficiency. As we move closer toward commercialization, we'll have a lot to tell you about the sizeable opportunities these applications represent.

There are some important details to share with you, so let me do that.

## Microelectronics—2011

Microelectronics applications make up the majority of ATMI's revenue, with a primary focus on developing and supplying advanced materials to the world's leading chipmakers. Our goal is straightforward: through the global investments we've made in technology development, technical and application support, and manufacturing, we want to be the best materials problem-solving partner that those leading chipmakers have ever worked with.

It all begins with development capability. There are three success metrics that we feel are vital. First, do we have the critical research and development engagements for the processes we are focused on? Flowing directly from the engagements is our second metric, a "process of record" designation from the engagement. When the process is released into High Volume Manufacturing we generate high margin new product revenue, our third measure.

In 2011, new product revenues generated from our investments over the last several years were more than 4% of ATMI's total revenues. Our major focus is on deposition processes, be they chemical vapor, atomic layer, or other approaches; surface preparation, including post-etch photoresist removal and post-copper chemical-mechanical planarization cleaning; and other highly specialized applications.

We have spent several years mastering our combinatorial science-based HPD capability. While we continue to do research and development on specific products, in 2011 we took a major step forward, when we entered into a structured collaborative development project with a leading integrated circuit producer. Using the capabilities

of our HPD platform, we are working together to shrink the time needed to solve critical material and process challenges, deploying tools and people in a technology-transparent environment. Should we be successful, the customer will bring advanced technology to the market sooner, and ATMI will—in addition to having research and development costs reimbursed today—be the exclusive supplier for the materials under terms that recognize the significant benefit that our customer receives when bringing new technologies to market earlier. This first-of-its-kind program is possible largely because of the speed advantage we bring to this customer, and is the type of agreement we are working toward with other leading customers.

These development activities help define the future for our materials business. Our established products are vitally important and give us the opportunity to look to the future. The most critical of these products is SDS, considered the safety and productivity standard for implant gas delivery in semiconductor manufacturing.

In October, in a transaction we call "SDS Direct," we terminated our global distribution agreement with Matheson, paying \$95 million in cash, with additional expense for inventory. We recognized an \$85 million charge for terminating the agreement, and we are spending incremental amounts to bring customer and supply chain operations around the world under ATMI management. Subsequent to the transaction, we are working more closely with customers to further advance the technology, better manage the distribution channel, and increase overall responsiveness and flexibility. You will find more details about this important transaction beneath this fold-out.

In our critical liquids packaging business, we recently introduced new technologies that we believe will redefine the application yet again. Our newest innovation is designed to address one of the most pressing yield issues in lithography today—preventing the incorporation of micro-bubbles, which behave like a particle defect—in critical fluids like photoresists, used on the most advanced devices.

Our progress with Microelectronics customers in 2011 is proof that our goal of being the best partner our customers have ever worked with, and making the investments to do it, is entirely consistent with delivering excellent financial results.

## LifeSciences—2011

In previous letters I've shared with you how we have been working to deploy our technologies into new markets. We are furthest along in the life

science market, where ATMI's single-use technologies create significant efficiencies for biopharmaceutical manufacturers. Our products—which combine novel process technologies with extensions and adaptations of our critical liquids packaging innovations currently used in microelectronics—make development much more efficient and flexible. The result dramatically shortens the time and cost of building new manufacturing facilities, delivering production efficiencies through increased manufacturing flexibility and reduced operating costs, and dramatically reducing or preventing cross-contamination risks.

Today, ATMI has the largest installed base for single-use mixers in the market. Our intellectual property and product performance have enabled us to sign multiple licensing agreements with several suppliers, which places ATMI technology with many more customers than we could on our own and generate ongoing royalties. While we are still relatively young in this market, LifeSciences product revenues grew 25% in 2011.

Having spent several years qualifying this approach, 2011 was the year when many of our customers—including Boehringer Ingelheim, GlaxoSmithKline, Lonza, Merck, and Pfizer—decided to move the technology into high volume manufacturing, for both established and new drugs. Our belief is that we have a solid position in a market that is just now beginning to grow.

## 2012 Vectors of growth

With the investments made over the last few years—the effects of which really started to become visible in 2011—shareholders should see continued progress in 2012, coming from three primary growth vectors:

- The SDS Direct transaction
- The trajectory of LifeSciences
- Our capability to work with chipmakers to solve the increasing complexities of new material introductions and integration, and the ramping of technology nodes that use the products resulting from those collaborations

## SDS—2012

Controlling all aspects of the SDS product line will make a significant difference for ATMI. In addition to the customer interaction benefits mentioned earlier, the financial effect is substantial. After the transition phase is completed and we are controlling the customer interface, we expect the transaction to add between \$7-\$8 million of revenue, and \$0.08-\$0.09 of earnings per diluted share, each quarter. We are working diligently to complete the transition as early in 2012 as is possible.

## LifeSciences—2012

Over the last few years, we've grown this business to the \$40 million revenue per year level. We are enthusiastic about the progress we have made, but the reality is that single-use technology adoption is at a very early stage. While customers began ramping in 2011, their mixing and bioreactor use is still low. Market studies indicate that adoption and consumption will begin to accelerate, starting now. With our strong technology and market positions, and the investments we are making in applications support, we expect to see this business grow on the order of 25% per year for several years, with the product mix progressing toward higher margin consumables over time.

## Microelectronics—2012

As I write this note, the trends of the last few years—consolidating markets and consolidating customers—remain intact. Over this period of time, we have dedicated increasingly greater resources to the companies who appear to be winning the technology race, those with healthier business models and the ability to invest for the future.

Technology's leading edge is where prosperity and growth come from, and we believe we

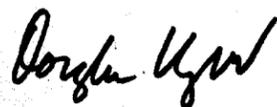
are well-positioned and playing an important part in helping our customers address the challenges of the future. We continued to expand our presence in Taiwan, with the establishment of a manufacturing partnership to complement our HPD capability in the Hsin Chu Science Park area.

In 2012, we'll be investing more in South Korea, establishing development, applications, and expanded manufacturing and support capabilities to ensure we can serve the important Korean market at the highest level.

We have balanced growth—from established products and from emerging products that are now ramping. In addition to wafer start growth in our existing businesses and the incremental growth in revenue and profits coming from the SDS Direct transaction, the new product revenue ramp that began in 2011 is accelerating. We intend to do much better than what the market offers us.

Yet, none of this is ever possible without the commitment that comes from our employees. Having a growth orientation puts a lot of pressure on employees in every type of job. We consistently invest in the development of employees and give them many opportunities to apply what they learn. I am proud to say that ATMI employees rise to the occasion, and then some! With their efforts and the support of our customers, 2012 should be a year of great returns!

As always, I want to thank you for your continued support of and belief in ATMI.



Doug Neugold  
Chairman, Chief Executive Officer, and President

# Technology's Leading Edge is Where Prosperity and Growth Come From

## Global Footprint

Semiconductors are a technology-driven industry. The leading edge is where the opportunities are—and where the real growth originates.

Rapidly applying research and development to create the latest chip innovations is crucial in an industry where time-to-market is a key component of long-term success. The continuous need—dynamic consumer demand for new and improved electronic devices and applications, specialized products in smaller quantities, and all at lower prices—requires new process technology solutions. Next-generation chips are higher performing and more complex—which in many cases require new materials, additional process steps, and novel integration challenges—all of which can lead to higher cost.

This has been going on for years, and the pressure continues to intensify. Consolidation of the chipmakers continues, and the list of companies that can support the necessary development costs, and generate the cash required to build the factories of the future, continues to be refined. We have made investments to support the customers who we believe are at the front of the pack in this race.

The challenges they have are increasing dramatically. The investments we've made in human and technology capabilities allowed us to become more of a partner to our customers—intimately aligned with their key value drivers, with deeper insight and a more comprehensive view of their plans, requirements, and goals. ATMI has focused for years on the critical areas that make the greatest difference to these leading chipmakers. When we collaborate closely, we can help solve problems more quickly—in the best case helping them get to market more quickly, with improved financial results for both of us.

Over the last few years, we've accelerated our investments in the areas of critical technology development, manufacturing, logistics, and applications

support. We have extensive development capabilities in close proximity to the rapidly developing Albany Nano region and Silicon Valley, allowing us to work closely with the critical North American customers.

Our development capabilities in Taiwan and Japan support foundry and memory customers throughout the vital Asian market. In 2012, we will be adding capabilities in South Korea.

In the end, our best product is our quarter century of broad-based experience and know how, which is delivered through people, their capabilities, and the resources they deploy. Through the global investments we've made in technology development, global support, applications, and manufacturing, we believe we are better positioned than anyone to work closely with customers to solve 28-nanometer generation and below materials and materials integration problems.

We want to be the best materials problem-solving partner our customers have ever worked with. The progress we made in 2011 demonstrates success, gives us confidence, and points to a promising future.

## SDS® Direct

ATMI is working to be the best supplier our customers have ever had, which means we need to be the best in all functions. While striving for this, our immediate focus is innovation in materials, process solutions, and supply chain capabilities.

In October 2011, ATMI completed our "SDS Direct" transaction, terminating the license, manufacturing, and global distribution agreements we had with Matheson Tri-Gas, Inc. for our SDS product line, for \$95 million in cash. We believe this was a very good use of cash.

ATMI and Matheson began working together in 1996, when ATMI was a much smaller company. With Matheson's operations capability, and ATMI's technical expertise, we collaborated to establish SDS as the industry standard for safe gas delivery to implant tools, with many billions of implants completed. SDS has a

remarkable safety and productivity record, one which has resulted in ATMI and the individual scientists behind its development receiving numerous industry awards.

The SDS Direct transaction was a response to market demands, notably the technological complexity of leading-edge devices, and the need to intensify our interactions with our customers to solve their current and future problems as quickly and efficiently as possible. Collaborative relationships are the key to solving these problems. ATMI has established these collaborations in other process areas, and this transaction extends that experience and capability to the vital implant process. We have vast knowledge of molecule generation and delivery for implant to put to work for our customers.

From accounting and financial perspectives, the transaction and related transition costs make the fourth quarter and year of 2011 results less straightforward. In addition to the contract termination charge, we reversed some prior SDS revenues and ran down product inventory. Residual integration and transition costs should cease in the second quarter of 2012. For the most part, we are using existing supply chain capabilities, but we will be making some targeted capacity additions to support the SDS products' high volumes, as well as ensuring a redundant manufacturing capability, a customer requirement in this market. We are expanding our direct marketing and sales infrastructure, which will add \$2-\$3 million of quarterly costs. While some of the transition costs will affect the first quarter of 2012, beginning in the second quarter we should be operating on a "normal" run-rate basis, with an incremental \$7-\$8 million of revenue, and \$0.08-\$0.09 of incremental earnings per diluted share, each quarter.

With our SDS Direct model, we will work side-by-side with customers, supporting current processes and developing next-generation solutions. One very significant step on our journey to being the best partner our customers have ever worked with.

## SELECTED FINANCIAL DATA

(in thousands, except per share data)

Fiscal Year Ended December 31,	2011	2010	2009	2008	2007
<b>Consolidated Statements of Operations</b>					
Revenues	\$390,087(1)	\$367,256	\$254,704	\$339,063	\$364,088
Cost of revenues	205,957(2)	191,248	152,520(9)	172,551(16)	182,480(20)
Gross profit	184,130	176,008	102,184	166,512(17)	181,608
Operating expenses					
Research and development	53,708	48,645	37,162(10)	37,809	29,879
Selling, general, and administrative	83,546(3)	85,425	76,359(11)	88,781	99,227(21)
Contract termination	84,590(4)	—	—	—	—
Total operating expenses	221,844	134,070	113,521	126,590	129,106
Operating income (loss)	(37,714)	41,938	(11,337)	39,922	52,502
Interest income	1,205	949	1,196	3,126	7,689
Other income (expense), net	(2,625)(5)	7,740(7)	(3,515)(12)	(2,902)(18)	(788)
Income (loss) before income taxes	(39,134)	50,627	(13,656)	40,146	59,403
Provision (benefit) for income taxes	(19,115)(6)	11,121(8)	(6,996)	6,819(19)	18,864
Net income (loss)	\$ (20,019)	\$ 39,506	\$ (6,660)	\$ 33,327	\$ 40,539
Earnings (loss) per share—diluted	\$ (0.63)	\$ 1.24	\$ (0.21)	\$ 1.04	\$ 1.16
Weighted-average shares outstanding—diluted	31,703	31,895	31,398	32,078	35,093

### Consolidated Balance Sheet Data

Cash, cash equivalents, and marketable securities (22)	\$113,484	\$152,572	\$107,978	\$ 96,020	\$193,697
Working capital	226,232	236,263	203,760(13)	190,095	280,221
Total assets	513,686	533,589	458,963(14)	452,449(23)	492,076(23)
Long-term obligations	18,399	28,427	17,790(15)	15,688(23)	10,491(23)
Total stockholders' equity	450,331	458,425	411,490	408,897	434,383

The Company has never declared any cash dividends.

- (1) Revenues were negatively impacted by \$6.9 million, due to the effects of the SDS Direct transaction, which included \$5.1 million of revenue reversal for inventory repurchases and an estimated \$1.8 million net impact due to excess inventory in the SDS channel, which was partially offset by incremental revenues realized as a result of the transaction. Includes \$2.4 million from IP settlements, which represent payments received related to periods prior to 2011.
- (2) The cost of revenues were favorably impacted by \$1.5 million, due to the effects of the SDS Direct transaction, representing \$1.1 million of cost reversals for inventory repurchased and \$0.4 million estimated net effect due to excess inventory in the SDS channel, partially offset by transition service costs and incremental costs on revenues realized following the transaction.
- (3) Includes a \$1.7 million gain on remeasurement of contingent consideration, a \$2.4 million benefit related to state tax credits, and distribution expenses of \$1.3 million related to the SDS Direct transaction.
- (4) \$84.6 million contract termination charge related to the SDS Direct transaction.
- (5) Includes \$1.3 million foreign exchange loss on Euro exposures, \$0.7 million of accretion related to the Artelis contingent consideration liability, partially offset by a \$0.9 million investment gain.
- (6) Includes a \$31.0 million tax benefit associated with the \$84.6 million pretax contract termination charge.
- (7) Includes a \$0.5 million gain from the sale of a marketable security, a \$2.5 million gain on sale of shares of one of our equity-method investees, and a \$5.9 million fair value remeasurement gain on our minority interest from our acquisition of Artelis.
- (8) Includes \$1.8 million of tax benefits (including interest) recognized to reverse previously established reserves for uncertain tax positions, due to expiration of statutes of limitation and settlements, a \$2.1 million tax benefit related to a European dividend, and a \$1.9 million charge related to changes in valuation allowances.
- (9) Includes \$1.1 million charge for incremental excess and obsolete inventory related to product discontinuances and a reserve to cover expected product shelf-life issues, and a \$3.1 million impairment charge for long-lived assets written down to their estimated fair values, primarily related to the planned idling of manufacturing capacity of our gas products.
- (10) Includes a \$1.6 million impairment charge for long-lived assets written down to their estimated fair values, related primarily to idled equipment.
- (11) Includes a \$1.4 million charge to increase our reserves for bad debt to cover exposures related to customer bankruptcy filings and uncertainties of collections, a \$2.6 million impairment charge for long-lived assets written down to their estimated fair values, primarily related to redundant enterprise management software, and a \$0.6 million charge for SG&A severance costs.
- (12) Includes a \$2.5 million impairment charge, primarily related to a write-down associated with an auction-rate security.
- (13) Balance has been reduced by \$0.1 million, related to reclassification of unrecognized tax benefits and valuation allowances.
- (14) Balance has been reduced by \$0.6 million, related to reclassification of unrecognized tax benefits and valuation allowances.
- (15) Balance has been reduced by \$0.6 million, related to reclassification of unrecognized tax benefits and valuation allowances.
- (16) Includes a \$2.4 million business interruption claim recovery, related to a fire at a contract manufacturer in Taiwan.
- (17) Includes a \$3.1 million benefit associated with the settlement of a dispute with a distributor (\$3.7 million recognized in revenues, with \$0.6 million of associated costs recognized in cost of revenues).
- (18) Includes a \$2.0 million gain from the sale of a marketable security, \$1.6 million of impairment charges related to our strategic investment portfolio and a \$1.8 million reserve on a convertible note, and \$1.1 million representing our proportionate share of gains on sales of assets by one of our equity-method investees.
- (19) Includes a \$3.7 million tax benefit (including interest) recognized to reverse previously established reserves for uncertain tax positions as a result of the expiration of the applicable statute of limitations.
- (20) Includes \$1.1 million of increased customs expense on imported goods from the United States to an overseas affiliate.
- (21) Includes \$1.1 million associated with a contingent legal fee arrangement.
- (22) Includes non-current marketable securities of \$3.3 million, \$25.4 million, \$10.6 million, \$3.7 million, and \$0 million at December 31, 2011, 2010, 2009, 2008, and 2007, respectively, which includes a \$22.1 million reclassification of our Intermolecular investment from "Other non-current assets" to "Marketable securities, current portion."
- (23) Balances have been reduced by \$0.6 million and \$0.2 million for years ended December 31, 2008 and December 31, 2007, respectively, related to reclassification of unrecognized tax benefits from deferred tax liabilities.

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

## Company Overview

We believe we are among the leading suppliers of high performance materials, materials packaging, and materials delivery systems used worldwide in the manufacture of microelectronics devices. Our products consist of "front-end" semiconductor performance materials, sub-atmospheric-pressure gas delivery systems for safe handling and delivery of toxic and hazardous gases to semiconductor process equipment, and high-purity materials packaging and dispensing systems that allow for the reliable introduction of low volatility liquids and solids to microelectronics and biopharmaceutical processes. ATMI targets both semiconductor and flat-panel display manufacturers, whose products form the foundation of microelectronics technology rapidly proliferating through the consumer products, information technology, automotive, and communications industries. The market for microelectronics devices is continually changing, which drives demand for new products and technologies at lower cost. ATMI's customers include many of the leading semiconductor and flat-panel display manufacturers in the world who target leading-edge technologies. ATMI also addresses an increasing number of critical materials handling needs for the life sciences markets. Our proprietary containment, mixing, and bioreactor technologies are sold to the biotechnology, laboratory, and cell therapy markets, which we believe offer significant growth potential. ATMI's objective is to meet the demands of our microelectronics and life sciences customers with solutions that maximize the efficiency of their manufacturing processes, reduce capital or operating costs, and minimize the time to develop new products and integrate them into their processes.

## Critical Accounting Policies and Estimates

### *Use of Estimates*

Preparation of our financial statements requires management to make estimates and assumptions that affect the reported amounts of assets, liabilities, revenues, and expenses. Note 1 to the Consolidated Financial Statements describes the significant accounting policies used in preparation of the Consolidated Financial Statements. Management believes the most complex and sensitive judgments, because of their significance to the Consolidated Financial Statements, result primarily from the need to make estimates about the effects of matters that are inherently uncertain. The most significant areas involving management judgments and estimates are described below. Actual results in these areas could differ from management's estimates. These policies are determined by management and have been reviewed by ATMI's Audit Committee.

### *Revenue Recognition*

We recognize revenue when the following four criteria are met: (1) persuasive evidence of an arrangement exists; (2) delivery has occurred, or services have been rendered; (3) the fee is fixed or determinable; and (4) collectability is reasonably assured. Revenues from product sales are generally recognized upon delivery to a common carrier when terms are equivalent to free-on-board ("FOB") origin, and upon receipt by a customer when terms are equivalent to FOB destination. In instances where final acceptance of equipment is specified by the purchase agreement, revenue is deferred until all acceptance criteria have been satisfied, except when reasonable reserves for returns can be effectively established due to substantial successful installation history for homogeneous transactions.

Should changes in conditions cause management to determine these criteria are not met for certain future transactions, revenue recognized for any reporting period could be adversely affected. We accrue for sales returns, warranty costs, and other allowances based on a current evaluation of our experience based on stated terms of the transactions. Should actual product failure rates or customer return experience differ from our estimates, revisions to the estimated accruals would be required.

Prior to October 31, 2011, we used Matheson as our exclusive contract manufacturer and distribution partner for the manufacture and distribution of our SDS products (the "Licensed Products"). Under the terms of the original manufacturing agreement, ATMI retained the right to manufacture 25 percent of all Licensed Products, while Matheson had the right to manufacture 75 percent of all Licensed Products. Upon completion of manufacture, ATMI purchased all Licensed Products produced by Matheson. Under the terms of the distribution agreement, we received payment from Matheson based upon a formula which was dependent on the sale price obtained by Matheson from its customers. ATMI recognized revenue from the sale of Licensed Products to Matheson when Matheson sold the Licensed Products to its customers, because that is when the sales price became fixed and determinable. On October 31, 2011, we terminated the agreements with Matheson for manufacturing, marketing, selling, and distributing our SDS products. Matheson will provide ongoing support services to ATMI during a brief transition period and will continue to manufacture a portion of the SDS products for up to two years, for which it will be paid additional fees by ATMI. Subject to such continuing services, ATMI assumed control of all manufacturing, distribution, logistics, and sales services, which Matheson had provided globally prior to execution of the Termination Agreement, other than the distribution of the SDS and VAC product lines in Japan, which services will continue to be provided by Matheson's parent company, Taiyo Nippon Sanso Corporation. In those regions where Matheson is involved in distributing products during the transition period, revenues will be recognized only after sale of the Licensed Products to the end users.

### *Accounts Receivable Allowances*

The allowance for doubtful accounts is established to represent our best estimate of the net realizable value of the outstanding accounts receivable balances. We estimate our allowance for doubtful accounts based on past due amounts and historical write-off experience, as well as trends and factors surrounding the credit risk of the markets we operate in, and the financial viability of specific customers. In an effort to identify adverse trends, we assess the financial health of the markets we operate in and perform periodic credit evaluations of our customers and ongoing reviews of account balances and aging of receivables. Amounts are considered past due when payment has not been received within the time frame of the credit terms extended. Write-offs are charged directly against the allowance for doubtful accounts and occur only after all collection efforts have been exhausted. Actual write-offs and adjustments could differ from the allowance estimates because of unanticipated changes in the business environment, as well as factors and risks surrounding specific customers.

As of December 31, 2011 and 2010, we had \$0.8 million of accounts receivable allowances recorded. Although management believes these reserves are adequate, any adverse changes in market conditions may require us to record additional reserves.

### *Inventory Valuation Reserves*

Inventory valuation reserves are established in order to report inventories at the lower of cost or market value on our Consolidated Balance Sheets. The determination of inventory valuation reserves requires management to make estimates and judgments on the future salability of inventories. Valuation reserves for excess, obsolete, and slow-moving inventory are estimated by comparing the inventory levels of individual parts to both future sales forecasts or production requirements and historical usage rates, in order to identify inventory where the resale value or replacement value is less than inventory cost. Other factors that management considers in determining these reserves include whether individual inventory parts or chemicals meet current specifications and cannot be substituted for, or reworked into, a part currently being sold or used as a service part, overall market conditions, and other inventory management initiatives.

As of December 31, 2011 and 2010, we had \$2.6 million and \$2.4 million, respectively, of inventory valuation reserves recorded. Although management believes these reserves are adequate, any adverse changes in market conditions may require us to record additional inventory valuation reserves.

### *Non-Marketable Equity Securities*

We selectively invest in non-marketable equity securities of private companies, which range from early-stage companies that are often still defining their strategic direction, to more mature companies whose products or technologies may directly support an ATMI product or initiative. Our non-marketable equity investments are recorded using cost basis or the equity-method of accounting, depending on the facts and circumstances of each investment. At December 31, 2011, the carrying value of our portfolio of strategic investments in non-marketable equity securities totaled \$8.0 million (\$22.3 million at December 31, 2010). The main driver of the reduction from December 31, 2010 was the initial public offering of Intermolecular, which caused us to reclassify our investment from "Other non-current assets" to "Marketable securities" because the securities became publicly traded. In certain instances, we loan funds to early-stage investees at market interest rates to enable them to focus on product and technology development. Non-marketable equity and debt securities are included in the Consolidated Balance Sheets under the caption "Other non-current assets." We receive regular financial information from our investees, typically on a one-month lag.

Investments in non-marketable equity securities are inherently risky, and some of these companies are likely to fail. Their success (or lack thereof) is dependent on product development, market acceptance, operational efficiency, attracting and retaining talented professionals, and other key business success factors. In addition, depending on their future prospects, they may not be able to raise additional funds when needed, or they may receive lower valuations with less favorable investment terms than in previous financings, and the investments would likely become impaired.

We review our investments quarterly for indicators of impairment; however, for non-marketable equity securities, the impairment analysis may require significant judgment to identify events or circumstances that would likely have a significant adverse effect on the fair value of the investment. The indicators that we use to identify those events or circumstances include: (a) the investee's revenue and earnings trends relative to predefined milestones and overall business prospects; (b) the technological feasibility of

the investee's products and technologies; (c) the general market conditions in the investee's industry or geographic area, including adverse regulatory or economic changes; (d) factors related to the investee's ability to remain in business, such as the investee's liquidity, and the rate at which the investee is using its cash; and (e) the investee's receipt of additional funding at a lower valuation.

Investments identified as having an indicator of impairment are subject to further analysis to determine if the investment is other-than-temporarily impaired, in which case we write the investment down to its fair value, using the framework required by Accounting Standards Codification ("ASC") 820, "Fair Value Measurements and Disclosures" ("ASC 820"). When an investee is not considered viable from a financial or technological point of view, we write down the entire investment since we consider the estimated fair market value to be nominal. If an investee obtains additional funding at a valuation lower than our carrying amount, or requires a new round of equity funding to stay in operation and the new funding does not appear imminent, we presume that the investment is other-than-temporarily impaired, unless specific facts and circumstances indicate otherwise. We recognized a \$0.8 million impairment charge in our portfolio of non-marketable equity securities in 2011 (none in 2010 and 2009).

### *Income Taxes*

The net deferred tax asset at December 31, 2011 was \$23.4 million, compared to a net deferred tax liability of \$1.3 million at December 31, 2010, driven by the \$31.0 million benefit from the \$84.6 million contract termination charge associated with the SDS Direct transaction. For our deferred future tax benefits, we believe that our earnings during the periods when the temporary differences become deductible will be sufficient to realize the related future income tax benefits. For those jurisdictions where the expiration date of tax carryforwards or the projected operating results indicate that realization is not likely, a valuation allowance is provided.

In the ordinary course of business there is inherent uncertainty in quantifying our income tax positions. We assess our income tax positions and record tax benefits for all years, subject to examination based upon management's evaluation of the facts, circumstances, and information available at the reporting date. For those tax positions where it is more likely than not that a tax benefit will be sustained, we have recorded the largest amount of tax benefit with a greater than 50 percent likelihood of being realized, upon ultimate settlement with a taxing authority. For those income tax positions where it is not more likely than not that a tax benefit will be sustained, no tax benefit has been recognized in the financial statements. We adjust these unrecognized tax benefits, including any impact on the related interest and penalties, in light of changing facts and circumstances. A number of years may elapse before a particular matter for which we have established an unrecognized tax benefit is audited and fully resolved. To the extent we prevail in matters for which we have recorded an unrecognized benefit, or are required to pay amounts in excess of what we have recorded, our effective tax rate in a given financial statement period could be materially affected. An unfavorable tax settlement might require use of our cash and/or result in an increase in our effective tax rate in the year of resolution. A favorable tax settlement would be recognized as a reduction in our effective tax rate in the year of resolution. For a discussion of current tax matters, see Note 10 to the Consolidated Financial Statements.

In assessing the need for a valuation allowance, we estimate future taxable income, considering the feasibility of ongoing tax planning strategies and the realizability of tax loss carryforwards. Valuation allowances related to deferred tax assets can be affected by changes to tax laws, changes to statutory tax rates, and future taxable income levels. In the event we were to determine that we would not be able to realize all or a portion of our deferred tax assets in the future, we would reduce such amounts through a charge to income in the period in which that determination is made, or when tax law changes are enacted. Conversely, if we were to determine that we would be able to realize our deferred tax assets in the future in excess of the net carrying amounts, we would decrease the recorded valuation allowance through an increase to income in the period in which that determination is made. Changes in deferred tax asset valuation allowances recorded in a business combination, and income tax uncertainties after the acquisition date, generally will affect income tax expense.

#### *Depreciable Lives of Property, Plant, and Equipment*

ATMI's net property, plant, and equipment at December 31, 2011 and 2010 was \$116.3 million and \$119.1 million, respectively, representing 22.6 percent and 22.3 percent, respectively, of the Company's consolidated total assets. Depreciation expense for the years ended December 31, 2011, 2010, and 2009 was \$23.3 million, \$22.8 million, and \$22.3 million, respectively. Management judgment is required in the determination of the estimated depreciable lives that are used to calculate annual depreciation expense and accumulated depreciation.

Property, plant, and equipment are recorded at cost, and depreciated over the assets' useful lives on a straight-line basis for financial reporting purposes. The estimated useful life represents the projected period of time that the asset will be productively employed by the Company and is determined by management based on many factors, including historical experience with similar assets and technological life cycles. Circumstances and events relating to these assets are monitored to ensure that changes in asset lives or impairments are identified, and prospective depreciation expense or impairment expense is adjusted accordingly. The depreciation periods used are: buildings, 5 to 35 years; machinery and equipment, 3 to 15 years; software, 5 to 10 years; cylinders and canisters, 7 to 15 years; furniture and fixtures, 5 years; and leasehold improvements, over the lesser of the lease term or estimated useful life. We use accelerated depreciation methods for tax purposes where appropriate.

#### *Equity-Based Compensation*

We account for awards of equity-based compensation under our employee stock plans using the fair value method. Accordingly, we estimate the grant date fair value of our equity-based awards and amortize this fair value to compensation expense over the requisite service period or vesting term. To estimate the fair value of our stock option awards, we currently use the Black-Scholes-Merton options-pricing model. The determination of the fair value of equity-based awards on the date of grant using an options-pricing model is affected by our then current stock price, as well as assumptions regarding a number of complex and subjective variables. Management is required to make certain judgments for these variables, which include the expected stock price volatility over the term of the

awards, the expected term of options based on employee exercise behaviors, and the risk-free interest rate. For awards granted subsequent to January 1, 2006, expected stock price volatility is based on the historical volatility of ATMI common stock for a period shorter than the expected term of the options. We have excluded the historical stock price volatility prior to the public announcement regarding the sale of our non-core businesses in 2004, because those businesses that were sold represented a significant portion of ATMI's consolidated business and were subject to considerable cyclicality associated with the semiconductor equipment industry, which drove increased volatility in ATMI's stock price. The expected term of options granted represents the period of time that options are expected to be outstanding. The risk-free rate is based on the U.S. Treasury yield curve in effect at the time of grant, for a period commensurate with the estimated expected term. We recognize expense only for those awards expected to vest. If actual results are not consistent with our assumptions and judgments used in estimating key assumptions in future periods, the stock option expense that the Company records for future grants may differ significantly from what the Company has recorded in the current period.

Equity-based compensation expense is generally recognized on a straight-line or accelerated attribution basis over the estimated service period of the awards.

#### *Fair Value Measurements*

All of our financial assets and liabilities are measured at fair value, based upon Level 1 or Level 2 inputs as defined under ASC 820, with the exception of one auction-rate security, which has been measured using Level 3 inputs because the security is illiquid. For Level 1 measurements, we use quoted prices in active markets for identical assets and liabilities. For Level 2 measurements, we use observable inputs other than Level 1 prices, such as quoted prices for similar assets and liabilities, quoted prices in markets with insufficient volume or infrequent transactions (less active markets), or model-derived valuations in which all significant inputs are observable or can be derived principally from, or corroborated by, observable market data for substantially the full term of the assets or liabilities. For Level 3 measurements, we use unobservable inputs to the valuation methodology that are significant to the measurement of fair value of assets or liabilities.

The calculation of fair value for our auction-rate security requires critical judgments and estimates by management, including assumptions about the anticipated term and the yield that a market participant would require to purchase such a security in the current market environment. As of December 31, 2011, we have recorded a temporary impairment charge of \$0.9 million, net of tax, within the caption "Accumulated other comprehensive income" on the Consolidated Balance Sheets. We determined the fair value of our auction-rate security by incorporating assumptions about the anticipated term and the yield that a market participant would require to purchase such a security in the current market environment. We determined that there was no incremental credit loss in 2011 and 2010. In 2009, we recorded a credit loss of \$0.3 million in our Consolidated Statement of Operations. While we believe the valuation methodologies are appropriate, the use of valuation methodologies is highly judgmental, and changes in methodologies or market conditions for this security can have a material impact on the values of the related assets, our financial position, and overall liquidity.

On November 2, 2010, ATMI's Belgian subsidiary acquired the remaining 60 percent of the outstanding shares of Artelis S.A. As part of the acquisition, we recognized a liability for the fair value of contingent payments tied to future revenue performance for the fiscal years 2012 through 2014. The contingent payment tied to future revenue performance has a range of possible outcomes from \$0 to \$23.3 million. The fair value measurements were calculated using unobservable inputs (primarily using discounted cash flow analyses, a discounted average rate of 5.3 percent, and reliance on the market and product knowledge of internal experts), classified as Level 3, requiring significant management judgment due to the absence of quoted market prices or observable inputs for assets of a similar nature.

As of December 31, 2011 and 2010, the fair value of our auction-rate security was \$3.3 million and \$2.9 million, respectively. As of December 31, 2011 and 2010, the fair value of our Artelis acquisition contingent performance obligations associated with future revenue was \$7.2 million and \$8.4 million, respectively. See Notes 1 and 5 for additional discussion regarding our auction-rate security and Notes 1, 5, and 7 for additional details regarding the Artelis acquisition.

#### *Goodwill and Other Intangible Assets*

The assets and liabilities of acquired businesses are recorded under the purchase method of accounting at their estimated fair values at the dates of acquisition. Goodwill represents costs in excess of fair values assigned to the underlying net assets of acquired businesses.

Goodwill and intangible assets deemed to have indefinite lives are not amortized, but are subject to annual impairment testing. In 2011, we adopted ASU 2011-08, "Intangibles—Goodwill and Other (Topic 350): Testing Goodwill for Impairment," which simplified how entities are required to test goodwill for impairment by permitting an initial assessment of qualitative factors to determine whether it is more likely than not that the fair value of a reporting unit is less than its carrying amount, as a basis for determining whether it is necessary to perform the two-step goodwill impairment test.

For reporting units where the qualitative determination does not indicate that it is more likely than not that the fair value of a reporting unit is more than its carrying value, the two-step test is performed. In order to perform the two-step test, we estimate the fair value of a reporting unit based on the best information available as of the date of the assessment, which primarily incorporates management assumptions about expected future cash flows and contemplates other valuation techniques. Future cash flows can be affected by changes in the global economy and local economies, changes in the micro-electronics and biopharmaceutical industries, changes in technology, and the execution of management's plans. We concluded that goodwill was not impaired during 2011. A 10% decline in projected reporting unit cash flows would not impact the conclusion we reached in 2011. Although no goodwill impairment has been recorded to date, there can be no assurances that future goodwill impairments will not occur.

#### *Other Long-Lived Amortizable Assets*

We evaluate the potential impairment of other long-lived assets when appropriate. If the carrying value of assets exceeds the sum of the undiscounted expected future cash flows, the carrying value of the asset is written down to fair value.

#### *Recent Accounting Pronouncements*

See Note 1 to the Consolidated Financial Statements for information concerning recently issued accounting pronouncements.

#### **Related Party Transactions**

The Company's related parties are primarily unconsolidated equity affiliates. The Company did not engage in any material transactions involving related parties that included terms or other aspects that differ from those which would be negotiated with independent parties. In November 2011, Intermolecular completed an initial public offering, and we converted our preferred shares into common shares and exercised a warrant into common shares, which caused us to reclassify our investment from "Other non-current assets" to "Marketable securities," as the securities are now publicly traded. At December 31, 2011, we own common shares with a market value of \$33.1 million.

#### **Results of Operations**

This table shows the effect of pretax compensation cost arising from equity-based payment arrangements on the Consolidated Statements of Operations (in thousands):

December 31,	2011	2010	2009
Cost of revenues	\$ 496	\$ 357	\$ 315
Research and development	900	866	523
Selling, general, and administrative	6,143	6,470	4,902
<b>Total equity-based compensation expense</b>	<b>\$7,539</b>	<b>\$7,693</b>	<b>\$5,740</b>

#### **Year Ended December 31, 2011 Compared to Year Ended December 31, 2010**

##### *Overview*

Results for the year ended December 31, 2011 include revenues of \$390.1 million, an agreement for the reacquisition of license, manufacturing, and distribution rights for our Safe Delivery Source ("SDS<sup>®</sup>") product line, and our first fee-based collaborative development arrangement with a key customer, which will allow us to more effectively demonstrate our High Productivity Development ("HPD") capabilities.

The 2011 results include the effects of terminating a license, manufacturing, and distribution agreement associated with our SDS<sup>®</sup> technology, in exchange for a \$95 million cash payment. As a result of this agreement, we recognized a one-time operating charge of \$84.6 million in the fourth quarter of 2011. In connection with this agreement, revenues in the fourth quarter were unfavorably impacted by \$6.9 million, associated with a cash payment of \$5.1 million to repurchase inventory due to previously recognized product shipments into the former distributor's channel, as well as an estimated \$1.8 million net impact due to excess inventory in the SDS distribution channel in regions where the former distributor continues to sell product until ATMI secures the appropriate licenses to fully conduct business, which was partially offset by incremental revenues from the transaction. As a result of this agreement, beginning with the second quarter of 2012, we anticipate increased revenues of \$7 million to \$8 million per quarter, a 200 basis point improvement in gross margins, a \$2 million to \$3 million increase to selling, general, and administrative ("SG&A") expense per quarter, and an increase of \$0.08 to \$0.09 of diluted earnings per share per quarter. We anticipate that we will spend \$2 million on integration-related activities in the first quarter of 2012.

For the year ended December 31, 2011, ATMI revenues increased by 6.2 percent to \$390.1 million, compared to 2010 revenues of \$367.3 million, including the \$6.9 million unfavorable fourth quarter impact mentioned above. The 2011 growth reflects strength in the first half of 2011 in consumer electronics demand, which drove higher wafer starts and increased fab utilization, followed by a lower wafer start growth environment in the second half of 2011. The revenue growth from 2010 to 2011 was driven by a 17 percent increase in copper materials and a 25 percent increase in life sciences. Our gross profit margin declined by 70 basis points to 47.2 percent in 2011, compared to 47.9 percent in 2010, due to the impact of fourth quarter inventory repurchases, anticipated price reductions, some unanticipated cost overruns, and product mix. Research and development expenses ("R&D") grew 10.4 percent in 2011, compared to 2010, primarily driven by product development-related spending associated with the November 2010 acquisition of Artelis. SG&A declined by 2.2 percent in 2011 from 2010, due to a \$2.4 million benefit related to a capital-based state tax credit, and a \$1.7 million gain from the change in fair value of a contingent consideration obligation. SG&A, as a percent of revenues, decreased to 21.4 percent in 2011, compared to 23.3 percent in 2010. The operating loss of \$37.7 million in 2011 was driven by the \$84.6 million, one-time contract termination charge associated with the SDS Direct transaction. The 2011 effective tax benefit rate of 48.8 percent would have been an effective tax rate of 26.2 percent, excluding the \$31.0 million tax benefit from the \$84.6 million one-time contract termination charge. The 2011 net loss was \$20.0 million (\$0.63 per diluted share), compared to net income of \$39.5 million (\$1.24 per diluted share) in 2010. The 2011 net loss of \$20.0 million includes the after tax impact of \$53.6 million, due to the SDS Direct termination charge.

This is a summary of selected consolidated earnings information (in thousands):

December 31,	2011	2010	% Change
Revenues	\$390,087	\$367,256	6.2%
Cost of revenues	205,957	191,248	7.7%
Gross profit	184,130	176,008	4.6%
Gross margin	47.2%	47.9%	(0.7)%
Research and development	53,708	48,645	10.4%
R&D as a percent of revenues	13.8%	13.2%	0.6%
Selling, general, and administrative	83,546	85,425	(2.2)%
SG&A as a percent of revenues	21.4%	23.3%	(1.9)%
Contract termination	84,590	—	—
Operating income (loss)	(37,714)	41,938	(189.9)%
Operating margin	(9.7)%	11.4%	(21.1)%
Effective tax (benefit) rate	(48.8)%	22.0%	27.0%
Net income (loss)	\$ (20,019)	\$ 39,506	(150.7)%
Earnings (loss) per diluted share	\$(0.63)	\$1.24	(150.8)%

*Revenues.* For the year ended December 31, 2011, ATMI revenues increased by 6.2 percent to \$390.1 million, compared to full year 2010 revenue of \$367.3 million. The 2011 revenues were negatively impacted by \$6.9 million, associated with a cash payment of \$5.1 million to repurchase previously recognized product shipments into the former distributor's channel, as well as an estimated \$1.8 million net impact due to excess inventory in the SDS distribution channel in regions where the former distributor continues to sell product until ATMI secures the appropriate licenses to fully conduct business, which was partially offset by incremental revenues from the transaction. The 2011 revenue growth reflects strength in the first half of 2011 in consumer electronics demand, which drove higher wafer starts and increased fab utilization, followed by a lower wafer start growth environment in the second half of 2011. The growth in revenues in 2011 compared to 2010 occurred in both our microelectronics and life sciences product lines. Driven by a strong first half of 2011, revenues in our microelectronics product lines grew 4.5 percent to \$351.8 million in 2011 from \$336.5 million in 2010, primarily due to strong growth in our copper products associated with adoption of our materials at the advanced technology nodes. In our life sciences product lines, revenues increased 24.5 percent to \$38.3 million in 2011, from \$30.7 million in 2010, driven by the transition from qualification to volume production at a few customers, the additional placements of our mixing and bioreactor platforms in the marketplace, and royalties from intellectual property licensing agreements. Given the ongoing pressures to bring costs down in the consumer and microelectronics industries, we continue to experience pricing pressure with several of our legacy products. Foreign currency translation provided a 100 basis point benefit to revenue in 2011, driven by a weakening U.S. Dollar against the Japanese Yen and the Euro.

*Gross Profit.* In 2011, gross profit of \$184.1 million increased 4.6 percent from \$176.0 million in 2010. Our gross profit margin declined by 70 basis points to 47.2 percent in 2011, compared to 47.9 percent in 2010, due to the impact of fourth quarter inventory repurchases, anticipated price reductions, some unanticipated cost overruns, and product mix. The SDS Direct transaction reduced gross profit by \$4.7 million, and gross profit margin by 60 basis points, due to the reversal of previously recognized product shipments, the estimated effect of excess channel inventories, and incremental transition services costs. Gross profit in our microelectronics product lines increased 3.0 percent to \$170.7 million in 2011, compared to \$165.8 million in 2010. Gross profit margin in microelectronics was approximately 49 percent in 2011, compared to 49 percent in 2010. Gross profit in our life sciences product lines increased 31.1 percent to \$13.4 million in 2011, compared to \$10.2 million for the same period in 2010. Life sciences gross profit margin increased year over year, to 35 percent in 2011 from 33 percent in 2010. Life sciences gross profit margin for 2011 includes the effect of the U.S. manufacturing capacity we brought online in mid-2010.

**Research and Development Expenses.** R&D expense increased 10.4 percent to \$53.7 million in 2011, compared to \$48.6 million in 2010. The increase in 2011 spending was driven by increased product development spending associated with the November 2010 Artelis acquisition (\$3.3 million), consumption of material consumables (\$0.7 million), intellectual property fees (\$0.5 million), and rent (\$0.3 million), partially offset by lower HPD licensing and maintenance (\$1.8 million), and cost reimbursements related to a collaborative development agreement (“CDA”) (\$0.9 million). The CDA was executed in the third quarter of 2011 with an advanced memory integrated circuit manufacturer for the purpose of developing molecules, including chemical precursors, and material systems for next-generation semiconductor products. We recognized a benefit of \$0.9 million in 2011, and expect to recognize up to \$2.9 million of benefit in 2012.

**Selling, General, and Administrative Expenses.** SG&A declined 2.2 percent to \$83.5 million in 2011, compared to \$85.4 million in 2010. The decrease is the result of a \$2.4 million benefit related to a capital-based state tax credit, a \$1.7 million gain from the change in fair value of a contingent consideration obligation, lower maintenance (\$0.7 million), legal fees (\$0.5 million), and asset impairments (\$0.3 million), partially offset by expenses associated with the Artelis acquisition (\$3.7 million), a 2010 bad debt reserve release of \$0.8 million not repeated in 2011, \$1.3 million associated with transition costs related to the SDS Direct transaction, and increased employee-related costs (\$1.3 million).

**Contract Termination Expense.** In 2011, we recognized an \$84.6 million charge associated with terminating a long-term license, manufacturing, and distribution agreement with Matheson Tri-Gas, Inc. that gives ATMI responsibility for worldwide distribution of our SDS and VAC gas storage and delivery systems.

**Operating Income (Loss).** For the year ended December 31, 2011, we generated an operating loss of \$37.7 million, compared to operating income of \$41.9 million in 2010. The decrease is primarily a result of the SDS Direct contract termination charge, and other items as noted above.

**Interest Income.** Interest income was \$1.2 million for the year ended December 31, 2011, compared to \$0.9 million for the year ended December 31, 2010, primarily caused by higher invested balances and slightly improved average yields.

**Other Income (Expense), Net.** In 2011, we reported net other expense of \$2.6 million, which was driven by a \$0.8 million impairment reserve for a minority investment, losses from equity-method investees of \$0.6 million, and losses from foreign exchange of \$1.2 million, partially offset by a \$0.7 million gain from a previously reserved investment. In 2010, we reported net other income of \$7.7 million, which was driven by a \$5.9 million non-cash gain on fair value of our minority interest in Artelis coincident with the acquisition of the remaining outstanding shares, and a \$2.5 million gain on the sale of Anji shares.

**Provision for Income Taxes.** In 2011, we had an effective income tax benefit rate of 48.8 percent, compared to a 2010 effective income tax rate of 22.0 percent. Excluding the \$31.0 million benefit from the SDS Direct contract termination charge, the 2011 effective income tax rate would have been 26.2 percent. The 2011 effective income tax rate differs from the Federal statutory rate of 35.0 percent primarily due to the benefit of the SDS Direct contract termination charge, lower income tax rates in foreign jurisdictions, an increase in certain valuation allowances, the U.S. R&D tax credit, equity-based compensation, and state taxes.

ATMI has not provided for U.S. federal income and foreign withholding taxes on approximately \$92.4 million of undistributed earnings from non-U.S. operations as of December 31, 2011, because such earnings are intended to be reinvested indefinitely outside of the United States. These earnings could become subject to additional tax if they are remitted as dividends, loaned to ATMI, or upon sale of subsidiary stock. It is not practicable to estimate the amount or timing of the additional tax, if any, that eventually might be paid on the foreign earnings.

South Korea has granted the Company an income tax exemption that expires in 2014, including the last two years at 50 percent of the exemption. The exemption applies only to income related to one of the Company’s product lines. The effect of the tax exemption was to reduce income tax expense by \$2.8 million, \$2.1 million, and \$1.3 million for the years ended December 31, 2011, 2010, and 2009, respectively.

At December 31, 2011, ATMI had \$3.7 million of unrecognized tax benefits, which, if recognized, would favorably affect the effective income tax rate in future periods. \$0.7 million of this amount is included in deferred taxes, and the balance of \$3.0 million is included in the caption “Other non-current liabilities” on the Consolidated Balance Sheets, together with \$0.4 million of accrued interest (net) on tax reserves and \$0 accrued for penalties. In January 2012, the Internal Revenue Service completed a U.S. tax audit of tax years 2008 and 2009, although the refund claim for tax year 2009 is still subject to review by the Joint Committee on Taxation.

## **Year Ended December 31, 2010 Compared to Year Ended December 31, 2009**

### **Overview**

During the year ended December 31, 2010, ATMI’s revenues increased by 44.2 percent, compared to the year ended December 31, 2009. Growth was seen across all of our product lines and was primarily the result of higher customer demand driven by higher wafer starts and fab utilization, and increased demand for life sciences products. Our gross margin increased by 780 basis points to 47.9 percent in 2010, compared to 40.1 percent in 2009, primarily because of sales volume increases as a result of the improving global economy and favorable product mix. R&D grew 30.9 percent in 2010 from 2009. The increase was driven primarily by increased HPD licensing/maintenance and higher employee-related spending. SG&A increased by 11.9 percent in 2010 from 2009. The increase is primarily the result of increased employee-related expenses, travel, and legal expenses. SG&A, as a percent of revenues, decreased to 23.3 percent in 2010, compared

to 30.0 percent in 2009. Operating income increased to \$41.9 million in 2010, from a loss of \$11.3 million in 2009. In 2010, we recognized \$8.4 million of gains on equity-method investments, due either to the sale of shares or remeasurement as a result of an acquisition. Our effective tax rate was 22.0 percent in 2010, compared to an effective tax benefit rate of 51.2 percent in 2009. In 2010, we generated net income of \$39.5 million (\$1.24 per diluted share), compared to a net loss of \$6.7 million (\$0.21 per diluted share) in 2009.

On November 2, 2010, ATMI's Belgian subsidiary acquired the remaining 60 percent of the outstanding shares of Artelis S.A. The total accounting purchase consideration of \$21.8 million included the cash payment of \$4.0 million, the fair value of contingent payments tied to future revenue performance of \$8.4 million, the carrying value of \$5.9 million related to our original 40 percent non-controlling ownership interest, and assumed debt of \$3.5 million. The contingent payments tied to future revenue performance have a range of possible outcomes from \$0 to a maximum of \$23.3 million. In 2010, we had an effective income tax rate of 22.0 percent, compared to a 2009 effective income tax benefit rate of 51.2 percent. The 2010 income tax rate differs from the Federal statutory rate of 35.0 percent, primarily due to the benefit of lower income tax rates in foreign jurisdictions, a non-taxable investment remeasurement gain from the Artelis acquisition, tax benefits on foreign dividends, an increase in certain valuation allowances, the U.S. R&D tax credit reinstatement, state taxes, and changes in established reserves.

This is a summary of selected consolidated earnings information (in thousands):

December 31,	2010	2009	% Change
Revenues	\$367,256	\$254,704	44.2%
Cost of revenues	191,248	152,520	25.4%
Gross profit	176,008	102,184	72.2%
Gross margin	47.9%	40.1%	7.8%
Research and development	48,645	37,162	30.9%
R&D as a percent of revenues	13.2%	14.6%	(1.4)%
Selling, general, and administrative	85,425	76,359	11.9%
SG&A as a percent of revenues	23.3%	30.0%	(6.7)%
Operating income (loss)	41,938	(11,337)	469.9%
Operating margin	11.4%	(4.5)%	15.9%
Effective tax rate	22.0%	(51.2)%	73.2%
Net income (loss)	\$ 39,506	\$ (6,660)	693.2%
Earnings per diluted share	\$1.24	\$(0.21)	690.5%

**Revenues.** Revenues increased 44.2 percent to \$367.3 million in 2010, from \$254.7 million in 2009. Growth was seen across all of our product lines and was primarily the result of higher customer demand driven by increased wafer starts and increased demand for life sciences products. Growth occurred in both our microelectronics and life sciences product lines, but was more pronounced in the microelectronics product lines, primarily as a result of improved wafer starts and fab utilization rates due in large part to the

macroeconomic recovery, and also driven by strength in demand for our copper-related materials, especially in memory applications. Revenues in 2009 were also negatively impacted by excess inventory in the SDS distribution channel. Revenues in our microelectronics product lines grew 45.9 percent to \$336.5 million in 2010, from \$230.7 million in 2009. In our life sciences product line, revenues grew 28.1 percent to \$30.7 million in 2010, compared to \$24.0 million in 2009. The growth in life sciences revenues was driven by a continuing industry shift to disposables, which is driving demand for our single-use mixing and containment technologies. While demand, in general, has been improving, given the pressures to bring costs down in the consumer and microelectronics industries, we continued to experience pricing pressure with several of our older products, including SDS and our photo and copper material products. The effect of foreign currency was not significant in 2010, as declines associated with the U.S. dollar's weakness against the Japanese Yen were partially offset by strengthening against the Euro.

**Gross Profit.** Gross profit increased 72.2 percent to \$176.0 million in 2010, from \$102.2 million in 2009. The increase in gross profit was driven primarily by increased revenues across our product lines as a result of improved economic conditions, and a mix benefit driven by increased sales volumes in our copper materials, SDS, and life sciences product lines, partially offset by continued pricing pressure. Gross profit in 2009 was reduced by \$3.1 million from asset impairment charges and by \$2.1 million of expense to increase our reserves for excess and obsolete inventories. Gross profit in our microelectronics product lines increased 74.4 percent to \$165.8 million in 2010, from \$95.1 million in 2009. Gross profit margin in microelectronics was approximately 49 percent in 2010, compared to approximately 41 percent in 2009. Gross profit in our life sciences product lines increased 43.5 percent to \$10.2 million in 2010, compared to \$7.1 million for 2009. Gross profit margins in our life sciences product lines also improved from approximately 30 percent in 2009, to approximately 33 percent in 2010, driven by increased revenue volumes.

**Research and Development Expenses.** R&D increased 30.9 percent to \$48.6 million in 2010, compared to \$37.2 million in 2009, as we continued to fund our investments to develop advanced materials and HPD capabilities. The increase in 2010 spending was driven by increased HPD licensing and maintenance contract costs (\$6.6 million), higher employee-related spending (\$2.8 million) driven by increased incentives \$1.3 million, higher salaries \$0.6 million, and equity-based compensation \$0.3 million, increased depreciation (\$0.8 million), higher outside services spending (\$0.6 million), increased travel (\$0.5 million), maintenance (\$0.4 million), increased consumption of materials and consumables (\$0.4 million), and higher intellectual property costs (\$0.5 million), partially offset by significantly lower asset impairments (\$1.6 million). As a percentage of revenues, spending was lower in 2010 (13.2 percent) than in 2009 (14.6 percent), because of economic improvements, growth in wafer starts, and fab utilization rates which resulted in increased revenues.

**Selling, General, and Administrative Expenses.** SG&A increased 11.9 percent (\$9.1 million) to \$85.4 million in 2010, from \$76.4 million in 2009. SG&A, as a percentage of revenues, decreased to 23.3 percent in 2010, compared to 30.0 percent in 2009. The increase in 2010 spending was due to higher employee-related costs (\$8.8 million), caused primarily by higher incentive compensation \$4.6 million, higher salaries on increased payroll \$0.9 million, and equity-based compensation \$1.5 million. We also increased spending in: travel and entertainment (\$1.8 million), employee recruitment (\$1.4 million), and legal expenses (\$1.3 million) which were driven by both business development and litigation activities. These spending increases were partially offset by increased distributor marketing reimbursements (\$1.1 million), lower depreciation (\$0.8 million), and significantly lower asset impairments (\$2.2 million). The results in 2009 included \$2.5 million of asset impairment charges, related primarily to redundant enterprise management software and a \$1.4 million charge to increase bad debt expense, due to customer bankruptcies and general economic conditions.

**Operating Income (Loss).** In 2010, we generated operating income of \$41.9 million, compared to an operating loss of \$11.3 million in 2009. This change is from a variety of factors, as noted above.

**Interest Income.** Interest income decreased to \$0.9 million in 2010, from \$1.2 million in 2009. The primary reason for the decrease was lower average yields on invested balances.

**Impairment of Investments.** The results for 2009 included a \$2.5 million impairment charge, primarily related to a write-down associated with an auction-rate security.

**Other Income (Expense), Net.** In 2010, "Other income (expense), net" of \$7.7 million was driven by a \$5.9 million non-cash investment gain on our minority interest in Artelis, a \$2.5 million gain from the sale of a portion of our equity investment in Anji, a \$0.5 million gain from the sale of a marketable equity security, and the release of notes receivable reserves of \$0.4 million. In 2009, we recognized \$1.2 million of losses from investments accounted for by the equity-method and \$0.2 million of realized and unrealized losses on foreign exchange.

**Provision (Benefit) for Income Taxes.** In 2010, we had an effective income tax rate of 22.0 percent, compared to a 2009 effective income tax benefit rate of 51.2 percent. The 2010 income tax rate differs from the Federal statutory rate of 35.0 percent, primarily due to the benefit of lower income tax rates in foreign jurisdictions, a non-taxable investment remeasurement gain from the Artelis acquisition, tax benefits on foreign dividends, an increase in certain valuation allowances, the U.S. R&D tax credit reinstatement, state taxes, and changes in established reserves. The 2009 income tax benefit rate of 51.2 percent differs from the Federal statutory rate of 35.0 percent, primarily due to the benefit of lower income tax rates in foreign jurisdictions, and a net \$0.7 million reversal of previously established reserves, primarily resulting from the lapse of the applicable statutes of limitations. As of December 31, 2010, the Company had a net deferred tax liability on the balance sheet of \$1.3 million, primarily because of temporary differences

(i.e., accrued liabilities, inventory adjustments, equity-based compensation, and depreciation and amortization), state tax credit carryforwards, foreign and state net operating loss carryforwards, and R&D tax credits in Taiwan.

### Liquidity and Capital Resources

We assess liquidity in terms of our ability to generate cash to fund our operating and investing activities. Of particular importance to management are cash flows generated by operating activities, cash used for capital expenditures, and cash used for acquisitions.

Until required for use in the business, we invest our cash reserves in bank deposits, certificates of deposit, money market securities, government and government-sponsored bond obligations, and other interest-bearing marketable debt instruments in accordance with our investment policy. We have contracted with investment advisers to invest our funds consistent with our investment policy. The value of our investments may be adversely affected by increases in interest rates, instability in the global financial markets that reduces the liquidity of securities included in our portfolio, and by other factors which may result in other-than-temporary declines in value of the investments, which could impact our financial position and our overall liquidity. Each of these events may cause us to record charges to reduce the carrying value of our investment portfolio, or to sell investments for less than our acquisition cost. We attempt to mitigate these risks with the assistance of our investment advisors by investing in high-quality securities and monitoring the overall risk profile of our portfolio. We also maintain a well-diversified portfolio that limits our credit exposure through concentration limits set within our investment policy.

We have financed our operating needs and capital expenditures through cash flows from our operations, and existing cash. We expect to continue to finance current and planned operating requirements principally through cash from operations, as well as existing cash resources. We believe that these funds will be sufficient to meet our operating requirements for the foreseeable future. However, we may, from time to time, seek additional funding through a combination of equity and debt financings, or from other sources.

We continue to invest in R&D to provide future sources of revenue through the development of new products, as well as through additional uses for existing products. We consider R&D, and the development of new products and technologies, an integral part of our growth strategy and a core competency of the Company. Likewise, we continue to make capital expenditures in order to expand and modernize manufacturing and R&D facilities around the globe and to drive efficiencies throughout the organization. Additionally, management considers, on a continuing basis, potential acquisitions of strategic technologies and businesses complementary to the Company's current business.

This is a summary of our cash flows (in thousands):

Year Ended December 31,	2011	2010
<b>Cash provided by (used for)</b>		
Operating activities	<b>\$(30,962)</b>	\$ 65,976
Investing activities	<b>(2,471)</b>	(58,754)
Financing activities	<b>379</b>	(3,691)
Effects of exchange rate changes on cash	<b>(1,071)</b>	379

### Operating Activities

In 2011, we used \$31.0 million of cash for operations, which represents a change of \$96.9 million from the \$66.0 million generated from operations in 2010. Cash used in operations in 2011 included an \$84.6 million cash charge related to the Matheson contract termination, partially offset by \$31.0 million in deferred taxes associated with the charge. Cash used for operations was also the result of increases in inventories and other assets, and decreases in accrued expenses. Partially offsetting these items were a decrease in accounts receivable and an increase in other liabilities. Inventories increased by \$10.8 million in 2011, driven by stronger demand, \$3.0 million of SDS purchases from Matheson in the fourth quarter, and an increase to other strategic safety stocks.

### Investing Activities

Net cash used for investing activities decreased by \$56.3 million in 2011, to \$2.5 million. The primary reason for the decrease in 2011 was that we did not reinvest funds in marketable securities as existing marketable securities matured through the second half of the year, in order to ensure liquid funds were on hand for the anticipated \$95.0 million contract termination payment to Matheson. Other than changes in marketable

securities, our investing activities primarily relate to purchases of property, plant, and equipment, and acquisitions. Cash used for investing activities in 2011 was driven by \$20.7 million of capital expenditures, \$10.4 million associated with the acquisition of license, manufacturing, distribution rights, and a non-compete agreement from Matheson, and \$6.7 million for a cost-basis investment. Cash used for investing activities in the year ended 2010 was driven by the \$3.9 million acquisition of Artelis, minority equity investments, cash used for net purchases of marketable securities of \$40.8 million, and \$16.2 million of capital expenditures, partially offset by \$5.2 million of cash generated from the sale of shares of one of our equity-method investments.

### Financing Activities

Financing activities generated cash of \$0.4 million in 2011, compared to a use of cash of \$3.7 million in 2010. The cash provided in 2011 was related to the proceeds from the exercise of stock options of \$1.3 million, partially offset by share repurchases of \$0.9 million. The \$3.7 million use of cash in 2010 was comprised of share repurchases of \$2.6 million, the repayment of a loan assumed in the Artelis acquisition of \$2.4 million, and net repayments of credit lines of \$0.5 million, partially offset by the proceeds from the exercise of stock options of \$1.8 million.

### Summary of Contractual Obligations

This is a summary of consolidated debt, lease, purchase, and other obligations at December 31, 2011 (see Notes 3, 6, 7, 9, and 14 of the Consolidated Financial Statements) (in thousands):

	Payments Due by Period				
	Total	Less than 1 Year	1-3 Years	4-5 Years	Thereafter
<b>Contractual obligations</b>					
Capital leases	\$ 205	\$ 48	\$ 133	\$ 24	\$ —
Operating leases	12,306	3,579	5,011	929	2,787
<b>Purchase obligations</b>					
Inventory	15,622	15,622	—	—	—
Capital	954	954	—	—	—
Other (1)	10,188	10,188	—	—	—
Total	26,764	26,764	—	—	—
Other long-term liabilities (2)	5,145	—	4,756	—	389
Total debt, lease, purchase, and other long-term liability obligations	\$44,420	\$30,391	\$9,900	\$953	\$3,176

(1) Includes a \$7.6 million commitment to purchase R&D services associated with a strategic alliance partner.

(2) Includes \$3.6 million of asset retirement obligations.

See Note 9 to the Consolidated Financial Statements for further discussion of leases.

### *Off-Balance Sheet Arrangements*

In the fourth quarter of 2011, we extended the contract term of an existing commitment with Intermolecular to purchase R&D technology and processes. The extension maintains our current R&D infrastructure and expense structures over the next three years. The cash payment commitments are \$11.5 million, \$5.0 million, \$1.3 million, and \$1.3 million in fiscal years 2011, 2012, 2013, and 2014, respectively. In 2011, there was a \$1.3 million increase in commitments for that year, due to the contract extension. The contract extension did not include any full time-equivalent resource commitments beyond 2012.

### *Operations Outside the United States*

For the years ended December 31, 2011, 2010, and 2009, sales outside the United States, including Asia and Europe, accounted for 79.4 percent, 82.3 percent, and 80.2 percent, respectively, of our revenues. Sales to Taiwan for the years ended December 31, 2011, 2010, and 2009 were 25.0 percent, 24.3 percent, and 21.8 percent, respectively, of our revenues. Sales to Japan for the years ended December 31, 2011, 2010, and 2009 were 11.1 percent, 13.5 percent, and 14.3 percent, respectively, of our revenues. Sales to South Korea for the years ended December 31, 2011, 2010, and 2009 were 20.3 percent, 18.4 percent, and 20.2 percent, respectively, of our revenues. Management anticipates that sales outside the United States will continue to account for a significant percentage of our total revenues. ATMI has wholly-owned subsidiaries in Taiwan, Singapore, China, Japan, and Germany where the Company sells and services several product lines. ATMI also has a wholly-owned subsidiary in South Korea that manufactures, sells, and distributes materials packaging, materials delivery equipment, and thin-film materials to the semiconductor and flat-panel display markets in South Korea, and NOWPak® to the Taiwan and Japanese markets. In addition, ATMI has two wholly-owned subsidiaries in Belgium that manufacture and sell high-purity materials packaging products, primarily to the life sciences industry.

### **Quantitative and Qualitative Disclosures about Market Risk**

#### *Interest Rate Risk*

As of December 31, 2011, the Company's cash and cash equivalents and marketable securities included bank deposits, time deposits, money market securities, and government and government-sponsored bond obligations. As of December 31, 2011, an increase of 100 basis points in interest rates on securities with maturities greater than one year would reduce the fair value of the Company's marketable securities portfolio by approximately \$0.4 million. Conversely, a reduction of 100 basis points in interest rates on securities with maturities greater than one year would increase the fair value of the Company's marketable securities portfolio by approximately \$0.5 million.

#### *Foreign Currency Exchange Risk*

Most of the Company's sales are denominated in U.S. dollars and, as a result, the Company has limited exposure to foreign currency exchange risk with respect to sales made. Approximately 40 percent of the Company's revenues for the year ended December 31, 2011 were denominated in Japanese Yen ("JPY"), Korean Won ("KRW"), and Euros ("EUR"), but a majority of the product is sourced in U.S. dollars. Management periodically reviews the Company's exposure to currency fluctuations. This exposure may change over time as business practices evolve and could have a material effect on the Company's financial results in the future. We use forward foreign exchange contracts to hedge specific exposures relating to intercompany payments and anticipated, but not yet committed, intercompany sales (primarily parent

company export sales to subsidiaries at pre-established U.S. dollar prices). The terms of the forward foreign exchange contracts are generally matched to the underlying transaction being hedged, and are typically under one year.

Because such contracts are directly associated with identified transactions, they are an effective hedge against fluctuations in the value of the foreign currency underlying the transaction. We recognize in earnings ("Other income (expense), net") changes in the fair value of all derivatives designated as fair value hedges. We generally do not hedge overseas sales denominated in foreign currencies or translation exposures. Further, we do not enter into derivative instruments for trading or speculative purposes, and all of our derivatives were highly effective throughout the periods reported.

At December 31, 2011, we held forward foreign currency exchange contracts as economic hedges, with notional amounts totaling \$22.0 million, which are being used to hedge recorded foreign-denominated liabilities and which will be settled in either JPY, KRW, EUR, or New Taiwan Dollars ("NTD"). Holding other variables constant, if there were a 10 percent decline in foreign exchange rates against the U.S. dollar for the JPY, KRW, EUR, and NTD, the fair market value of the foreign exchange contracts outstanding at December 31, 2011 would increase by approximately \$0.3 million, which would be expected to be fully offset by foreign exchange gains on the amounts being hedged. The effect of an immediate 10 percent change in other foreign exchange rates would not be expected to have a material effect on the Company's future operating results or cash flows.

#### *Changes in Market Risk*

Although we have seen mixed signs of stability, the global economy continues to deal with the repercussions of the global recession, as manifest in the recent European economic crisis that caused significant credit and financial market swings. There can be no assurance that there will not be further deterioration in credit and financial markets and deterioration of confidence in economic conditions. These economic uncertainties affect businesses such as ours in a number of ways, making it difficult to accurately forecast and plan our future business activities.

### **Controls and Procedures**

#### *Conclusion Regarding the Effectiveness of Disclosure Controls and Procedures*

Our management, with the participation of our Chief Executive Officer ("CEO") and Chief Financial Officer ("CFO"), has evaluated the effectiveness of our disclosure controls and procedures (as such term is defined in Rules 13a-15(e) and 15d-15(e) under the Exchange Act) as of the end of the period covered by this Annual Report. There are inherent limitations to the effectiveness of any system of disclosure controls and procedures, including the possibility of human error and the circumvention or overriding of the controls and procedures. Accordingly, even effective disclosure controls and procedures can only provide reasonable assurance of achieving their control objectives. Based upon this evaluation, our CEO and CFO concluded that, as of the end of the period covered by this Annual Report, our disclosure controls and procedures were effective in that they provided reasonable assurance that the information we are required to disclose in the reports we file or submit under the Exchange Act is recorded, processed, summarized, and reported within the time periods specified in the applicable rules and forms, and that it is accumulated and communicated to our management, including our CEO and CFO, as appropriate, to allow timely decisions regarding required disclosure.

# CONSOLIDATED BALANCE SHEETS

(in thousands, except per share data)

December 31,	2011	2010
<b>Assets</b>		
Current assets:		
Cash and cash equivalents	\$ 34,523	\$ 68,648
Marketable securities, current portion	75,632	58,495
Accounts receivable, net of allowances of \$781 and \$783, respectively	51,563	54,518
Inventories, net	73,622	62,832
Income taxes receivable	3,721	4,627
Deferred income taxes	4,409	6,801
Prepaid expenses	14,439	14,384
Other current assets	13,279	12,695
Total current assets	271,188	283,000
Property, plant, and equipment, net	116,275	119,053
Goodwill	46,546	46,981
Other intangibles, net	36,571	28,948
Marketable securities, non-current	3,329	25,429
Deferred income taxes, non-current	19,139	2,097
Other non-current assets	20,638	28,081
Total assets	\$ 513,686	\$ 533,589
<b>Liabilities and stockholders' equity</b>		
Current liabilities:		
Accounts payable	\$ 20,779	\$ 21,045
Accrued liabilities	7,940	5,918
Accrued salaries and related benefits	10,469	12,163
Income taxes payable	1,229	3,700
Other current liabilities	4,539	3,911
Total current liabilities	44,956	46,737
Deferred income taxes, non-current	162	10,245
Other non-current liabilities	18,237	18,182
Commitments and contingencies (Note 14)		
Stockholders' equity		
Preferred stock, par value \$.01 per share: 2,000 shares authorized; none issued	—	—
Common stock, par value \$.01 per share: 100,000 shares authorized; 39,912 and 39,640 issued and 31,718 and 31,495 outstanding in 2011 and 2010, respectively	399	396
Additional paid-in capital	444,642	435,840
Treasury stock at cost (8,194 and 8,145 shares in 2011 and 2010, respectively)	(231,173)	(230,272)
Retained earnings	228,414	248,433
Accumulated other comprehensive income	8,049	4,028
Total stockholders' equity	450,331	458,425
Total liabilities and stockholders' equity	\$ 513,686	\$ 533,589

See accompanying notes.

## CONSOLIDATED STATEMENTS OF OPERATIONS

(in thousands, except per share data)

Year Ended December 31,	2011	2010	2009
Revenues	\$390,087	\$367,256	\$254,704
Cost of revenues	205,957	191,248	152,520
Gross profit	184,130	176,008	102,184
Operating expenses:			
Research and development	53,708	48,645	37,162
Selling, general, and administrative	83,546	85,425	76,359
Contract termination	84,590	—	—
Total operating expenses	221,844	134,070	113,521
Operating income (loss)	(37,714)	41,938	(11,337)
Interest income	1,205	949	1,196
Impairment of investments	(776)	—	(2,486)
Other income (expense), net	(1,849)	7,740	(1,029)
Income (loss) before income taxes	(39,134)	50,627	(13,656)
Provision (benefit) for income taxes	(19,115)	11,121	(6,996)
Net income (loss)	\$ (20,019)	\$ 39,506	\$ (6,660)
Earnings (loss) per common share—basic	\$(0.63)	\$1.26	\$(0.21)
Weighted-average shares outstanding—basic	31,703	31,413	31,398
Earnings (loss) per common share—diluted	\$(0.63)	\$1.24	\$(0.21)
Weighted-average shares outstanding—diluted	31,703	31,895	31,398

See accompanying notes.

## CONSOLIDATED STATEMENTS OF STOCKHOLDERS' EQUITY

(in thousands)	Common Stock	Additional Paid-in Capital	Treasury Stock	Retained Earnings	Accumulated Other Comprehensive Income	Total
<b>Balance at December 31, 2008</b>	\$392	\$421,040	\$ (227,101)	\$214,300	\$ 266	\$408,897
Issuance of 15 shares of common stock pursuant to the exercise of employee stock options	—	236	—	—	—	236
Purchase of 35 treasury shares	—	—	(569)	—	—	(569)
Equity-based compensation	—	5,740	—	—	—	5,740
Income tax deficiency from equity-based compensation	—	(579)	—	—	—	(579)
Other	1	(1)	—	—	—	—
Cumulative effect of adoption of new accounting standard	—	—	—	1,287	(1,287)	—
Net loss	—	—	—	(6,660)	—	(6,660)
Reclassification adjustment related to marketable securities sold in net unrealized gain position, net of \$32 tax provision	—	—	—	—	(55)	(55)
Change in fair value on available-for-sale securities, net of deferred income tax of \$1,139	—	—	—	—	1,940	1,940
Cumulative translation adjustment	—	—	—	—	2,540	2,540
Comprehensive loss	—	—	—	—	—	(2,235)
<b>Balance at December 31, 2009</b>	393	426,436	(227,670)	208,927	3,404	411,490
Issuance of 104 shares of common stock pursuant to the exercise of employee stock options	1	1,818	—	—	—	1,819
Purchase of 179 treasury shares	—	—	(2,602)	—	—	(2,602)
Equity-based compensation	—	7,693	—	—	—	7,693
Income tax deficiency from equity-based compensation	—	(105)	—	—	—	(105)
Other	2	(2)	—	—	—	—
Net income	—	—	—	39,506	—	39,506
Reclassification adjustment related to marketable securities sold in net unrealized gain position, net of \$282 tax provision	—	—	—	—	(481)	(481)
Change in fair value on available-for-sale securities, net of deferred income tax of \$201	—	—	—	—	343	343
Cumulative translation adjustment	—	—	—	—	762	762
Comprehensive income	—	—	—	—	—	40,130
<b>Balance at December 31, 2010</b>	396	435,840	(230,272)	248,433	4,028	458,425
Issuance of 71 shares of common stock pursuant to the exercise of employee stock options	1	1,265	—	—	—	1,266
Purchase of 48 treasury shares	—	—	(901)	—	—	(901)
Equity-based compensation	—	7,539	—	—	—	7,539
Other	2	(2)	—	—	—	—
Net loss	—	—	—	(20,019)	—	(20,019)
Reclassification adjustment related to marketable securities sold in net unrealized gain position, net of \$0 tax provision	—	—	—	—	(1)	(1)
Change in fair value on available-for-sale securities, net of deferred income tax of \$4,351	—	—	—	—	7,119	7,119
Cumulative translation adjustment	—	—	—	—	(3,097)	(3,097)
Comprehensive income	—	—	—	—	—	(15,998)
<b>Balance at December 31, 2011</b>	<b>\$399</b>	<b>\$444,642</b>	<b>\$ (231,173)</b>	<b>\$228,414</b>	<b>\$ 8,049</b>	<b>\$450,331</b>

See accompanying notes.

# CONSOLIDATED STATEMENTS OF CASH FLOWS

(in thousands)

Year Ended December 31,	2011	2010	2009
<b>Operating activities</b>			
Net income (loss)	\$ (20,019)	\$ 39,506	\$ (6,660)
Adjustments to reconcile net income (loss) to cash (used for) provided by operating activities			
Depreciation and amortization	27,162	26,718	26,799
Deferred income taxes	(29,443)	4,587	(1,880)
Stock-based compensation expense	7,539	7,693	5,740
Gain on remeasurement of contingent consideration	(1,733)	—	—
Gain on remeasurement of non-controlling interest	—	(5,923)	—
Long-lived asset impairments	594	544	7,298
Impairment of investments	776	—	2,486
Other	2,337	(1,050)	4,343
Changes in operating assets and liabilities, net of effect of acquisitions			
Accounts receivable	3,986	(9,034)	(2,790)
Inventories	(12,390)	(9,197)	400
Other assets	(8,233)	(4,680)	(3,767)
Accounts payable	(161)	5,169	1,808
Accrued expenses, income taxes, and other liabilities	(1,377)	11,643	(5,016)
Net cash (used for) provided by operating activities	(30,962)	65,976	28,761
<b>Investing activities</b>			
Capital expenditures	(20,703)	(16,173)	(17,318)
Purchases of marketable securities	(86,448)	(101,235)	(66,540)
Proceeds from sales or maturities of marketable securities	121,755	60,432	65,243
Acquisitions of cost-basis and equity-basis investments	(6,746)	(3,144)	—
Acquisitions, net of cash acquired	—	(3,928)	—
Intangible rights acquired due to contract termination, net	(10,410)	—	—
Proceeds from sale of cost-basis and equity-basis investments	—	5,175	—
Other	81	119	19
Net cash used for investing activities	(2,471)	(58,754)	(18,596)
<b>Financing activities</b>			
Purchases of treasury stock	(901)	(2,602)	(569)
Proceeds from exercise of stock options	1,266	1,819	236
Other	14	(2,908)	(662)
Net cash provided by (used for) financing activities	379	(3,691)	(995)
Effects of exchange rate changes on cash and cash equivalents	(1,071)	379	942
Net increase (decrease) in cash and cash equivalents	(34,125)	3,910	10,112
Cash and cash equivalents, beginning of period	68,648	64,738	54,626
Cash and cash equivalents, end of period	\$ 34,523	\$ 68,648	\$ 64,738
<b>SUPPLEMENTAL DISCLOSURES OF CASH FLOW INFORMATION:</b>			
Cash interest paid	\$ 45	\$ 82	\$ 188
Cash income taxes paid	\$ 11,343	\$ 12,237	\$ 1,552

See accompanying notes.

# NOTES TO CONSOLIDATED FINANCIAL STATEMENTS

## 1. Organization and Summary of Significant Accounting Policies

### Description of Business

ATMI, Inc. (together with its subsidiaries, collectively referred to as the "Company," "ATMI," or "we") believes it is among the leading suppliers of high performance materials, materials packaging, and materials delivery systems used worldwide in the manufacture of microelectronics devices. Our products consist of "front-end" semiconductor performance materials, sub-atmospheric-pressure gas delivery systems for safe handling and delivery of toxic and hazardous gases to semiconductor process equipment, and high-purity materials packaging and dispensing systems that allow for the reliable introduction of low volatility liquids and solids to microelectronics and biopharmaceutical processes. ATMI targets semiconductor and flat-panel display manufacturers, whose products form the foundation of microelectronics technology rapidly proliferating through the consumer products, information technology, automotive, and communications industries. The market for microelectronics devices is continually changing, which drives demand for new products and technologies at lower cost. ATMI's customers include many of the leading semiconductor and flat-panel display manufacturers in the world who target leading-edge technologies. ATMI also addresses an increasing number of critical materials handling needs for the life sciences markets. Our proprietary containment, mixing, and bioreactor technologies are sold to the biotechnology, laboratory, and cell therapy markets, which we believe offer significant growth potential. ATMI's objective is to meet the demands of our microelectronics and life sciences customers with solutions that maximize the efficiency of their manufacturing processes, reduce capital or operating costs, and minimize the time to develop new products and integrate them into their processes.

### Consolidation

The Consolidated Financial Statements include the accounts of all subsidiaries where control exists. Equity investments generally consist of 20 percent- to 50 percent-owned operations which, by definition, demonstrate significant influence and instances where the Company, through voting and similar rights, can exercise significant influence. Operations less than 20 percent-owned, where the Company does not exercise significant influence, are generally carried at cost. Earnings from equity investments are reported, net of income taxes, within the caption, "Other income (expense), net" on the Consolidated Statements of Operations. Intercompany transactions have been eliminated.

### Use of Estimates

The preparation of financial statements in conformity with U.S. generally accepted accounting principles ("GAAP") requires management to make estimates and assumptions that affect the reported amounts of assets, liabilities, revenues, and expenses. While actual results could differ, management believes such estimates to be reasonable.

### Revenue Recognition and Accounts Receivable

We recognize revenue when the following four criteria are met: (1) persuasive evidence of an arrangement exists; (2) delivery has occurred, or services have been rendered; (3) the fee is fixed or determinable; and (4) collectability is reasonably assured. Revenues from product sales are generally recognized upon delivery to a common carrier when terms are equivalent to free-on-board ("FOB") origin, and upon receipt by a customer when terms are equivalent to FOB destination. In instances where final acceptance of equipment is specified by the purchase agreement, revenue is deferred until all acceptance

criteria have been satisfied, except when reasonable reserves for returns can be effectively established due to substantial successful installation history for homogeneous transactions. Should changes in conditions cause management to determine these criteria are not met for certain future transactions, revenue recognized for any reporting period could be adversely affected. We accrue for sales returns, warranty costs, and other allowances based on a current evaluation of our experience based on stated terms of the transactions.

Prior to October 31, 2011, we used Matheson as our exclusive contract manufacturer and distribution partner for the manufacture and distribution of our Safe Delivery Source<sup>®</sup> ("SDS") products (the "Licensed Products"). Under the terms of the original manufacturing agreement, ATMI retained the right to manufacture 25 percent of all Licensed Products, while Matheson had the right to manufacture 75 percent of all Licensed Products. Upon completion of manufacture, ATMI purchased all Licensed Products produced by Matheson. Under the terms of the distribution agreement, we received payment from Matheson based upon a formula which was dependent on the sale price obtained by Matheson from its customers. ATMI recognized revenue from the sale of Licensed Products to Matheson when Matheson sold the Licensed Products to its customers, because that is when the sales price became fixed and determinable. On October 31, 2011, we terminated the agreements with Matheson for manufacturing, marketing, selling, and/or distributing of our SDS products ("SDS Direct transaction"). Matheson will provide ongoing support services to ATMI during a transition period. Subject to such continuing services, ATMI assumed control of all manufacturing, distribution, logistics, and sales services, which Matheson had provided globally prior to execution of the Termination Agreement, other than the distribution of the SDS and VAC product lines in Japan, which services will continue to be provided by Matheson's parent company, Taiyo Nippon Sanso Corporation. In those regions where Matheson is involved in distributing products during the transition period, revenues will be recognized only after sale of the Licensed Products to the end users.

During the years ended December 31, 2011, 2010, and 2009, ATMI recognized \$65.8 million, \$79.9 million, and \$37.9 million of revenues from Matheson, respectively. During the years ended December 31, 2011, 2010, and 2009, ATMI recognized revenues from a Taiwanese foundry of \$48.7 million, \$46.8 million, and \$36.2 million, respectively, and revenues of \$47.6 million, \$31.3 million, and \$16.3 million, respectively, from a leading South Korea-based integrated circuit manufacturer.

Billings to customers for shipping and handling are included in revenues. Costs incurred for shipping and handling of products are charged to cost of revenues. Credit is extended to customers based on an evaluation of each customer's financial condition; generally, collateral is not required. Revenues are presented in the Consolidated Financial Statements net of sales allowances and discounts. Accounts receivable are presented in the Consolidated Financial Statements net of the allowance for doubtful accounts. Taxes collected from customers and remitted to governmental authorities are presented on a net basis, and they are excluded from revenues.

### Accounts Receivable Allowances

The allowance for doubtful accounts is established to represent our best estimate of the net realizable value of the outstanding accounts receivable balances. We estimate our allowance for doubtful accounts based on past due amounts and historical write-off experience, as well as trends and factors surrounding the credit risk of the markets we operate in, and the financial viability of specific customers. In an effort to identify adverse trends, we assess the financial health of the markets we operate in and perform periodic credit evaluations of our customers and ongoing reviews of

account balances and aging of receivables. Amounts are considered past due when payment has not been received within the time frame of the credit terms extended. Write-offs are charged directly against the allowance for doubtful accounts and occur only after all collection efforts have been exhausted.

### Concentrations of Credit Risk

Financial instruments that potentially subject the Company to significant concentrations of credit risk consist primarily of cash and cash equivalents, marketable securities, accounts receivable, and currency forward exchange contracts. We invest our cash and cash equivalents and marketable securities in U.S. Government and municipal debt obligations, and time deposits. The Company had amounts due from two customers that accounted for approximately 34 percent and 42 percent of accounts receivable at December 31, 2011 and 2010, respectively.

### Research and Development

Costs associated with the development of new products and improvements to existing products are charged to expense as incurred.

### Cash and Cash Equivalents and Marketable Securities

Highly liquid investments with maturities of three months or less, when acquired, are classified as cash and cash equivalents. Investments in publicly traded securities with maturities greater than three months, when acquired, are classified as marketable securities.

All of the Company's marketable securities are classified as available-for-sale as of the balance sheet date and are reported at fair value, with unrealized gains and losses included in stockholders' equity as a component of "Accumulated other comprehensive income," net of applicable taxes. We regularly review the fair value of marketable security declines below amortized cost, to evaluate whether the decline is other-than-temporary. In making this determination, the Company considers all available evidence including, among other things, the duration and extent of the decline and the economic factors influencing the market, to determine if the fair value will recover to equal, or exceed, the amortized cost. If we determine that the fair value will not recover, an other-than-temporary impairment is recognized, net of applicable taxes.

In April 2009, the guidance on the recognition and presentation of other-than-temporary impairments was amended for debt securities, like our Massachusetts Educational Financing Authority auction-rate security, requiring us to determine both the credit and non-credit components when we conclude an investment has an other-than-temporary impairment. The change resulted in a second quarter 2009 recognition of a cumulative-effect adjustment to "Retained earnings," with a corresponding adjustment to "Accumulated other comprehensive income," because we recognized a non-cash other-than-temporary impairment of \$2.4 million for our auction-rate security in the first quarter of 2009. As part of the transition of adoption, we determined the amount of the impairment related to credit loss and the amount related to all other factors. Since we concluded that we had no current intent to sell this security and it was not more likely than not that we will be required to sell the security before anticipated recovery of its remaining amortized cost, we adjusted "Accumulated other comprehensive income (loss)" for the component of the impairment loss due to all other factors, net of tax. Of the total \$2.4 million pretax loss recognized in the first quarter of 2009, we determined the credit loss was \$0.3 million and the loss due to other factors was \$2.1 million. The credit loss of \$0.3 million is being accreted to the cost basis of the security ratably over the expected term of the security, currently estimated to be 15 years. The estimated fair value of the auction-rate security was \$3.3 million at December 31, 2011 and \$2.9 million at December 31, 2010. See Note 5 for further discussion regarding the auction-rate security.

Marketable securities that are in a temporarily impaired position, where management has the ability and intent to hold until anticipated recovery or maturity, are classified as either current or non-current based on the remaining contractual maturity of the security. Those securities in a temporarily impaired position with contractual maturities greater than one year are classified as non-current.

As part of our ongoing cash management optimization efforts during 2011, the Company purchased South Korean time deposits which were classified as "Marketable securities." At December 31, 2011 and 2010, the Company had \$6.9 million and \$5.4 million, respectively, of time deposits in South Korea.

As of December 31, 2011, we had \$13.1 million of cash and cash equivalents in South Korea, \$4.1 million of cash and cash equivalents in Taiwan, and \$4.2 million in cash and cash equivalents in Japan, which were not available to fund domestic U.S. operations without repatriation. These funds could become subject to additional tax if they are repatriated. It is not practicable to estimate the amount or timing of the additional tax, if any, that eventually might be paid on these foreign funds. We do not anticipate repatriating these funds in the foreseeable future.

### Non-Marketable Equity and Debt Securities

We selectively invest in non-marketable equity securities of private companies, which range from early-stage companies that are often still defining their strategic direction, to more mature companies whose products or technologies may directly support an ATMI product or initiative. Our non-marketable equity investments are recorded using cost basis or the equity-method of accounting, depending on the facts and circumstances of each investment. At December 31, 2011, the carrying value of our portfolio of strategic investments in non-marketable equity securities totaled \$8.0 million (\$22.3 million at December 31, 2010). The main driver of the reduction from December 31, 2010 was the initial public offering of Intermolecular, Inc., which caused us to reclassify our investment from "Other non-current assets" to "Marketable securities" because the securities became publicly traded. In certain instances, we loan funds to early-stage investees at market interest rates to enable them to focus on product and technology development. Non-marketable equity and debt securities are included in the Consolidated Balance Sheets under the caption "Other non-current assets." ATMI's share of the income or losses of all equity-method investees, using the most current financial information available, which is typically one month behind ATMI's normal closing date, is included in our results of operations from the investment date forward.

Investments in non-marketable equity securities are inherently risky, and some of these companies are likely to fail. Their success (or lack thereof) is dependent on product development, market acceptance, operational efficiency, attracting and retaining talented professionals, and other key business success factors. In addition, depending on their future prospects, they may not be able to raise additional funds when needed, or they may receive lower valuations with less favorable investment terms than in previous financings, and the investments would likely become impaired.

We review our investments quarterly for indicators of impairment; however, for non-marketable equity securities, the impairment analysis may require significant judgment to identify events or circumstances that would likely have a significant adverse effect on the fair value of the investment. The indicators that we use to identify those events or circumstances include: (a) the investee's revenue and earnings trends relative to pre-defined milestones and overall business prospects; (b) the technological feasibility of the investee's products and technologies; (c) the general market conditions in the investee's industry or geographic area, including adverse regulatory or economic changes; (d) factors related to the investee's ability to remain in business, such as the investee's liquidity, and the rate at which the investee is using its cash; and (e) the investee's receipt of additional funding at a lower valuation.

Investments identified as having an indicator of impairment are subject to further analysis to determine if the investment is other-than-temporarily impaired, in which case we write the investment down to its fair value, using the framework required by Accounting Standards Codification ("ASC") 820, "Fair Value Measurements and Disclosures" ("ASC 820"). When an investee is not considered viable from a financial or technological point of view, we write down the entire investment balance to zero since we consider the estimated fair market value to be nominal. If an investee obtains additional funding at a valuation lower than our carrying amount, or requires a new round of equity funding to stay in operation and the new funding does not appear imminent, we presume that the investment is other-than-temporarily impaired, unless specific facts and circumstances indicate otherwise. We recognized a \$0.8 million impairment charge in our portfolio of non-marketable equity securities in 2011 (none in 2010 and 2009).

In July 2005, ATMI made an investment in Anji Microelectronics Co., Ltd. ("Anji"), an entity in the development stage of researching and developing advanced semiconductor materials, with primary operations in Shanghai, China. We have determined that Anji is a variable interest entity. However, we have determined that we are not the primary beneficiary of Anji because we do not have the power, through voting or similar rights, to direct the activities of Anji that most significantly impact the entity's economic performance, and we are also not expected to absorb significant losses or gains from Anji. ATMI's carrying value of this cost basis investment is \$3.9 million at December 31, 2011. The carrying value of our investment in Anji represents the cash paid, less our share of the cumulative losses during the period we used the equity-method of accounting. At December 31, 2011, our maximum exposure to loss is \$4.3 million, which consists of \$3.9 million of our carrying value in this investment, plus a \$0.4 million reserve for a put option.

#### **Inventories**

Inventories are stated at the lower of cost or market, using the first-in, first-out method. Inventory valuation reserves are established in order to report inventories at the lower of cost or market value on our Consolidated Balance Sheets. The determination of inventory valuation reserves requires management to make estimates and judgments on the future salability of inventories. Valuation reserves for excess, obsolete, and slow-moving inventory are estimated by comparing the inventory levels of individual parts to both future sales forecasts or production requirements and historical usage rates, in order to identify inventory where the resale value or replacement value is less than inventory cost. Other factors that management considers in determining these reserves include whether individual inventory parts or chemicals meet current specifications and cannot be substituted for, or reworked into, a part currently being sold or used as a service part, overall market conditions, and other inventory management initiatives.

As of December 31, 2011 and 2010, we had \$2.6 million and \$2.4 million, respectively, of inventory valuation reserves recorded.

#### **Property, Plant, and Equipment, Net**

Property, plant, and equipment are carried at cost, net of accumulated depreciation. Depreciation is calculated on the straight-line method based on the estimated useful lives of the assets, which range from 3 to 35 years (see Note 6). The estimated useful life represents the projected period of time that the asset will be productively employed by the Company and is determined by management based on many factors, including historical experience with similar assets and technological life cycles. Circumstances and events relating to these assets are monitored to ensure that changes in asset lives or impairments are identified, and prospective depreciation expense or impairment expense is adjusted accordingly. The depreciation periods used are: buildings, 5 to 35 years; machinery and equipment, 3 to 15 years; software, 5 to 10 years; cylinders and canisters, 7 to 15 years; furniture and fixtures, 5 years; and leasehold improvements, over the lesser of the lease term or estimated useful life. We use accelerated depreciation methods for tax purposes where appropriate.

#### **Asset-Retirement Obligations**

An asset-retirement obligation ("ARO") is recognized in the period in which sufficient information exists to determine the fair value of the liability, with a corresponding increase to the carrying amount of the related property, plant, and equipment, which is then depreciated over its useful life. The liability is initially measured at fair value, and then accretion expense is recorded in each subsequent period. The Company's AROs are primarily associated with five leased facilities where we have made substantial modifications to the leased property and we are obligated to restore the facilities at the end of the contractual term of each lease. See Note 9 for further discussion on leases.

#### **Income Taxes**

Current income taxes are determined based on estimated taxes payable or refundable on tax returns for the current year. Deferred income taxes are determined using enacted tax rates for the effect of temporary differences between the book and tax bases of recorded assets and liabilities. The effect on deferred tax assets and liabilities of a change in tax rates is recognized in income in the period that includes the enactment date. The Company recognizes the benefit of an income tax position only if it is more likely than not (greater than 50 percent) that the tax position will be sustained upon tax examination, based solely on the technical merits of the tax position. Otherwise, no benefit can be recognized. The tax benefits recognized are measured based on the largest benefit that has a greater than 50 percent likelihood of being realized upon ultimate settlement. We adjust these unrecognized tax benefits, including any impact on the related interest and penalties, in light of changing facts and circumstances. A number of years may elapse before a particular matter for which we have established an unrecognized tax benefit is audited and fully resolved. Additionally, the Company accrues interest and related penalties, if applicable, on all tax exposures for which reserves have been established consistent with jurisdictional tax laws, which is included in income tax expense. See Note 10 for more information and disclosures on income taxes.

#### **Fair Value of Financial Instruments**

The Company measures and reports financial assets and financial liabilities on a fair value basis, consistent with ASC 820, using the following three categories for classification and disclosure purposes:

Level 1—Quoted prices in active markets for identical assets and liabilities. Level 1 assets and liabilities consist of cash, money market fund deposits, time deposits, certain of our marketable equity instruments, and forward foreign currency exchange contracts that are traded in an active market with sufficient volume and frequency of transactions.

Level 2—Observable inputs, other than Level 1 prices, such as quoted prices for similar assets or liabilities, quoted prices in markets with insufficient volume or infrequent transactions (less active markets), or model-derived valuations in which all significant inputs are observable, or can be derived principally from or corroborated by, observable, market data for substantially the full term of the assets or liabilities. Level 2 assets include certain of our marketable debt instruments, with quoted market prices that are traded in less active markets, or priced using a quoted market price for similar instruments.

Level 3—Unobservable inputs to the valuation methodology that are significant to the measurement of fair value of assets or liabilities. At December 31, 2011, our auction-rate security and the Artelis acquisition contingent consideration payment liability are the only items reflected in this category.

See Note 5 for more information regarding the details, methods, and assumptions used to estimate the fair value of our other financial instruments.

### Foreign Currency Exchange Contracts

We use forward foreign currency exchange contracts to hedge specific or anticipated exposures relating to intercompany payments (primarily U.S. export sales to subsidiaries at pre-established U.S. dollar prices), intercompany loans, and other specific and identified exposures. The terms of the forward foreign currency exchange contracts are matched to the underlying transaction being hedged, and are typically under one year. Because such contracts are directly associated with identified transactions, they are an effective hedge against fluctuations in the value of the foreign currency underlying the transaction.

Changes in the fair value of economic hedges are recognized in earnings as an offset to the change in the fair value of the underlying exposures being hedged. We do not enter into derivative instruments for trading or speculative purposes. At December 31, 2011, we did not have any cash flow hedges outstanding.

Counterparties to forward foreign currency exchange contracts are major banking institutions, with credit ratings of investment grade or better, and no collateral is required. There are no significant risk concentrations. We believe the risk of incurring losses on derivative contracts related to credit risk is remote.

### Goodwill and Other Indefinite-Lived Intangible Assets

The assets and liabilities of acquired businesses are recorded under the purchase method of accounting at their estimated fair values at the dates of acquisition. Goodwill represents costs in excess of fair values assigned to the underlying net assets of acquired businesses.

Goodwill and intangible assets deemed to have indefinite lives are not amortized, but are subject to annual impairment testing. In 2011, we adopted ASU 2011-08, "Intangibles — Goodwill and other (Topic 350): Testing Goodwill for Impairment," which simplified how entities are required to test goodwill for impairment, by permitting an initial assessment of qualitative factors to determine whether it is more likely than not that the fair value of the reporting unit is less than its carrying amount, as a basis for determining whether it is necessary to perform the two-step goodwill impairment test.

For reporting units where the qualitative determination does not indicate that it is more likely than not that the fair value of a reporting unit is more than its carrying value, the two-step test is performed. In order to perform the two-step test, we estimate the fair value of a reporting unit based on the best information available as of October 31, 2011, which primarily incorporates management assumptions about expected future cash flows and contemplates other valuation techniques. No goodwill impairment has been recorded to date.

### Other Long-Lived Assets

We evaluate the potential impairment of other long-lived assets when indicators of impairment are present. If the carrying value of assets exceeds the sum of the undiscounted expected future cash flows, the carrying value of the asset is written down to fair value. We amortize acquired patents and other amortizable intangible assets over their estimated useful lives. All amortizable intangible assets are amortized using the straight-line method over the estimated useful lives of the assets, ranging from 3 to 15 years.

### Intercompany Loans

In certain circumstances, the Company maintains intercompany agreements with and among our wholly-owned subsidiaries under which funds are provided to subsidiaries to finance general business activities. Since settlement of these agreements is not expected in the foreseeable future, and there is no repayment schedule as part of the agreements, we treat these loans as permanent advances. Therefore, any associated foreign exchange gains and losses are deferred in "Accumulated other comprehensive income" in the period in which they arise.

### Translation of Foreign Currencies

We conduct business in many different currencies and, accordingly, are subject to the inherent risks associated with foreign exchange rate movements. The financial position and results of operations of many of our foreign subsidiaries are measured using the local currency as the functional currency. Foreign currency-denominated assets and liabilities are translated into U.S. dollars at the exchange rates existing at the respective balance sheet dates, and income and expense items are translated at the average exchange rates during the respective periods. The aggregate effects of translating the balance sheets of these subsidiaries are deferred as a separate component of "Stockholders' equity."

### Equity-Based Compensation

The Company recognizes compensation expense in its Consolidated Financial Statements for all share-based payments granted, based on the fair value on the date of grant. For share-based payments granted with a service period vesting restriction, compensation expense is recognized on a straight-line basis, or accelerated attribution method, over the awards' respective vesting period. For share-based payments granted with a performance condition, we accrue compensation expense when we determine it is probable that the awards will be earned.

### Recently Issued Accounting Pronouncements

In June 2011, the FASB issued Accounting Standards Update ("ASU," or "Update") 2011-4, "Fair Value Measurement (Topic 820): Amendments to Achieve Common Fair Value Measurement and Disclosure Requirements in U.S. GAAP and IFRS." This Update provides guidance, which is expected to result in common fair value measurement and disclosure requirements between U.S. GAAP and IFRS, and should be applied prospectively. It is not intended for this Update to result in a change in the application of the requirements in Topic 820. For public entities, the amendments are effective during interim and annual periods beginning after December 15, 2011. Early application by public entities is not permitted. We do not anticipate any material impact from this Update.

In June 2011, the FASB issued ASU 2011-5, "Comprehensive Income (Topic 220)," and in December 2011, the FASB issued ASU 2011-12, "Comprehensive Income (Topic 220): Deferral of the Effective Date for Amendments to the Presentation of Reclassifications of Items Out of Accumulated Other Comprehensive Income." In ASU 2011-05, an entity has the option to present the total of comprehensive income, the components of net income, and the components of other comprehensive income, either in a single continuous statement of comprehensive income or in two separate, but consecutive, statements. The amendments do not change the items, portrayal, or timing of what must be reported in other comprehensive income. The amendments in this Update should be applied retrospectively. In ASU 2011-12, the FASB deferred the effective date pertaining to reclassification adjustments out of accumulated other comprehensive income ("AOCI") until further notice. Entities should continue to report reclassifications out of AOCI consistent with the presentation requirements in effect prior to Update 2011-05. These amendments are effective for fiscal years, and interim periods within those years, beginning after December 15, 2011. Early adoption is permitted. We do not anticipate any material impact from these Updates.

In December 2011, the FASB issued ASU 2011-11, "Balance Sheet (Topic 210): Disclosures about Offsetting Assets and Liabilities." In this update, entities are required to disclose both gross information and net information about both instruments and transactions eligible for offset in the statement of financial position, and instruments and transactions subject to an agreement similar to a master netting arrangement. An entity is required to apply the amendments retrospectively for annual reporting periods beginning on or after January 1, 2013, and interim periods within those annual periods. We do not anticipate any material impact from this Update.

## Collaborative Arrangements

ATMI entered into a collaborative development agreement (“CDA”) with an advanced memory integrated circuit manufacturer for the purpose of developing molecules, including chemical precursors, and material systems for next-generation semiconductor products. ATMI will use its High Productivity Development platform to collaboratively work with this customer on specific statements of work designed to develop next-generation materials. The agreement, which was signed in September 2011 and expires in August 2012, requires the customer to make quarterly payments to ATMI over the contract term. The arrangement has been determined to be a reimbursement of research and development costs and will be recognized as a reduction of expense under the caption, “Research and development” in the Consolidated Statements of Operations. At December 31, 2011, we recognized \$0.9 million related to the CDA.

Each CDA we execute will be reviewed, based on the unique terms and conditions associated with such arrangement, to determine using applicable accounting guidance, the timing of recognition, whether the arrangement is revenue producing, or represents a reimbursement of research and development costs, and the appropriate amounts to be

recognized. If an arrangement is determined to be revenue producing, we apply applicable accounting standards to ensure proper timing and amounts of revenue recognition. If an arrangement is determined to represent a reimbursement of research and development costs, we apply accounting standards for reimbursements to ensure proper timing, amounts, and classification as an offset to research and development expenses.

## Reclassifications of Financial Statements

In the presentation of the Statements of Cash Flows, for the years ended December 31, 2010 and 2009, respectively, we have regrouped the following categories within Operating Activities under the caption “Other”: provision for (reversal of) bad debt, provision for inventory obsolescence, income tax benefit (deficiency) from share-based payment arrangements, loss from equity-method investments, and gain on sale of equity investment. For the years ended December 31, 2010 and 2009, respectively, we have regrouped the following categories within Financing Activities under the caption “Other”: credit line borrowings, credit line repayments, and payments of loans.

## 2. Marketable Securities

Marketable securities include at December 31, (in thousands):

	2011			2010		
	Cost	Gross Unrealized Gain (Loss)	Estimated Fair Value	Cost	Gross Unrealized Gain (Loss)	Estimated Fair Value
Securities in unrealized gain position:						
Common stock	\$22,376	\$12,241	\$34,617	\$ 251	\$ 1,545	\$ 1,796
Government debt obligations (1)	22,612	69	22,681	16,661	87	16,748
Government-sponsored debt obligations	7,000	6	7,006	15,004	11	15,015
U.S. Treasury obligations (2)	—	—	—	8,045	2	8,047
Subtotal	51,988	12,316	64,304	39,961	1,645	41,606
Securities in unrealized loss position:						
Government debt obligations (1)	4,437	(2)	4,435	26,138	(63)	26,075
Government-sponsored debt obligations	—	—	—	8,000	(9)	7,991
Auction-rate security (3)	4,720	(1,391)	3,329	4,695	(1,794)	2,901
Subtotal	9,157	(1,393)	7,764	38,833	(1,866)	36,967
Securities at amortized cost:						
Time deposits	6,893	—	6,893	5,351	—	5,351
Subtotal	6,893	—	6,893	5,351	—	5,351
<b>Total marketable securities</b>	<b>\$68,038</b>	<b>\$10,923</b>	<b>\$78,961</b>	<b>\$84,145</b>	<b>\$ (221)</b>	<b>\$83,924</b>

(1) State and municipal government debt obligations.

(2) U.S. Treasury obligations were included as part of U.S. Government-sponsored securities in the Company’s Annual Report for the year ended December 31, 2010.

(3) The cost basis of the Massachusetts Educational Financing Authority auction-rate security is equal to the par value of \$5,000,000, less unaccrued non-cash credit losses of \$280,000 and \$305,000 at December 31, 2011 and December 31, 2010, respectively.

The amortized cost and estimated fair value of available-for-sale securities, by contractual maturity, as of December 31, 2011; expected maturities may differ from contractual maturities because the issuers of the securities may exercise the right to prepay obligations without prepayment penalties (in thousands):

	Cost	Estimated Fair Value
Due in one year or less	\$29,276	\$29,306
Due between one and three years	11,666	11,709
Auction-rate security (due in 2038)	4,720	3,329
	45,662	44,344
Common stock	22,376	34,617
	\$68,038	\$78,961

As of December 31, 2011, 8 out of the 42 marketable securities currently held were in an unrealized loss position. This table shows the Company's marketable securities that were in an unrealized loss position at December 31, 2011, and also shows the duration of time the security had been in an unrealized loss position (in thousands):

	Less Than 12 Months		12 Months or Greater		Total	
	Fair Value	Unrealized Losses	Fair Value	Unrealized Losses	Fair Value	Unrealized Losses
Government debt obligations	\$4,435	\$ (2)	\$ 0	\$ 0	\$4,435	\$ (2)
Auction-rate security	—	—	3,329	(1,391)	3,329	(1,391)
Total	\$4,435	\$ (2)	\$3,329	\$(1,391)	\$7,764	\$(1,393)

See Note 5 for further discussion.

### 3. Inventories

Inventories include at December 31, (in thousands):

	2011	2010
Raw materials	\$20,508	\$16,499
Work-in-process	1,681	2,133
Finished goods	53,986	46,575
	76,175	65,207
Excess and obsolescence reserve	(2,553)	(2,375)
Inventories, net	\$73,622	\$62,832

As of December 31, 2011, the Company had commitments for inventory purchases of \$15.6 million.

As of December 31, 2011 and 2010, respectively, we had \$5.0 million and \$3.8 million of finished goods inventory residing at non-ATMI consignment locations.

### 4. Foreign Currency Exchange Contracts

At December 31, 2011, we held foreign currency exchange contracts that are economic hedges with notional amounts totaling \$22.0 million, of which \$10.4 million will be settled in Euros, \$1.9 million will be settled in Taiwan Dollars, \$0.6 million will be settled in Japanese Yen, and \$9.1 million will be settled in Korean Won. Changes in the fair market value (gain or loss) on these contracts were not significant as of December 31, 2011.

At December 31, 2010, we held foreign currency exchange contracts that were economic hedges with notional amounts totaling \$32.7 million, of which \$12.6 million were settled in Euros, \$1.8 million were settled in Taiwan Dollars, \$1.9 million were settled in Japanese Yen, and \$16.4 million were settled in Korean Won. Changes in the fair market value (gain or loss) on these contracts were not significant as of December 31, 2010.

### 5. Fair Value Measurements

At December 31, 2011 and 2010, we have included the fair value of our auction-rate security under the caption "Marketable securities, non-current" in the Consolidated Balance Sheets.

### Assets/Liabilities Measured at Fair Value on a Recurring Basis

This table summarizes the Company's assets (liabilities) measured at fair value on a recurring basis at December 31, 2011 (in thousands):

	Total	Fair Value Measured Using		
		Quoted Prices in Active Markets for Identical Assets (Level 1)	Significant Other Observable Inputs (Level 2)	Significant Unobservable Inputs (Level 3)
Cash and cash equivalents	\$34,523	\$34,523	\$ —	\$ —
Available-for-sale marketable securities				
Common stock (1)	34,617	34,617	—	—
Time deposits	6,893	6,893	—	—
Government debt obligations	27,116	—	27,116	—
Government-sponsored debt obligations	7,006	—	7,006	—
Auction-rate security	3,329	—	—	3,329
Foreign currency exchange contract asset	187	187	—	—
Foreign currency exchange contract liability	\$ (212)	\$ (212)	\$ —	\$ —

(1) Includes reclassification of our Intermolecular investment from non-marketable equity securities, which previously was classified as a Level 3 non-recurring measurement.

The Company recorded losses of \$2.0 million and \$0.8 million for the years ended December 31, 2011 and 2010, respectively, and a gain of \$0.2 million for the year ended 2009, under the caption "Other income (expense), net" in the Consolidated Statements of Operations, related to changes in the fair value of its financial instruments for forward foreign currency exchange contracts accounted for as fair value hedges.

During 2011, our valuation methodologies were consistent with previous years, and there were no transfers into or out of Level 3 based on changes in observable inputs.

There were no transfers between Level 1 and Level 2 during 2011. We reclassified our investment in Intermolecular from a non-recurring fair value measurement to a recurring fair value measurement as a result of their initial public offering in November 2011.

This table presents a reconciliation for all assets and liabilities measured at fair value on a recurring basis using significant unobservable inputs (Level 3) for the year ended December 31, 2011 (in thousands).

	Fair Value Measurements Using Significant Unobservable Inputs (Level 3)	
	Available-For-Sale Marketable Securities	Total
Balance at December 31, 2010	\$2,901	\$2,901
Total gains (losses), realized and unrealized:		
Included in net income	—	—
Included in accumulated other comprehensive income	428	428
Purchases, issuances, and settlements, net	—	—
Transfers into (out of) Level 3	—	—
Balance at December 31, 2011	\$3,329	\$3,329

See Note 2 for further discussion.

### Assets/Liabilities Measured at Fair Value on a Nonrecurring Basis

All assets and liabilities measured at fair value on a nonrecurring basis are categorized as Level 3, requiring significant management judgment due to the absence of quoted market prices or observable inputs for assets of a similar nature. The individual amounts of assets and liabilities measured on a non-recurring basis are discussed below.

On November 2, 2010, ATMI's Belgian subsidiary acquired the remaining 60 percent of the outstanding shares of Artelis S.A. The total accounting purchase consideration of \$21.8 million included a cash payment of \$4.0 million, the fair value of contingent payments tied to future revenue performance of \$8.4 million, the carrying value of \$5.9 million related to our original 40 percent non-controlling ownership interest, and assumed debt of \$3.5 million. The contingent payments tied to future revenue performance, for the years 2012 through 2014, have a range of possible outcomes from \$0 to \$23.3 million. The gain has been recorded in our Statements of Operations under the caption "Other income (expense), net." The acquisition was recorded under the purchase method of accounting and, accordingly, Artelis' results of operations are included in the Company's financial statements from the date of acquisition.

Consistent with prior quarters, the fair value of the Artelis contingent consideration liability was estimated using a discounted cash flow methodology. Since the value is primarily based on revenues achieved in the measurement period, our estimate this quarter included a simulation of revenues undertaken in a Monte Carlo simulation framework. We risk adjusted the revenue estimates in the simulation in accordance with their market-related risks. The amounts calculated based on the simulated revenues were then discounted to present value at an average rate of 5.3 percent, using a term-appropriate risk-free rate, plus a spread commensurate to the Company's credit rating, as of the valuation date.

The fair value of the contingent payments as of December 31, 2011 was \$7.2 million, compared to \$8.4 million as of December 31, 2010. The decline was driven by a decline in our assessment of future sales, due to the current economic uncertainty in conjunction with a reduction in value due to translation of Euro-denominated balances into U.S. dollars through 2011. We will continue to use a term-appropriate risk-free rate, plus a spread commensurate to our credit rating, going forward.

During 2009, long-lived assets held and used with a carrying amount of \$8.4 million were written down to their estimated fair values of \$1.1 million, resulting in an impairment charge of \$7.3 million. The fair value measurements were calculated using unobservable inputs (primarily using discounted cash flow analyses and reliance on market knowledge of internal experts), classified as Level 3, requiring significant management judgment, due to the absence of quoted market prices or observable inputs for assets of a similar nature. \$3.1 million of the impairment charge is included in cost of revenues, and is primarily related to the planned idling of manufacturing capacity of our gas products. \$1.6 million of the impairment charge is included in research and development expense, and is related primarily to idled equipment used in our research and development efforts. \$2.6 million of the impairment charge is included in selling, general, and administrative expense, and is primarily related to redundant enterprise management software.

Due to their nature, the carrying value of cash, receivables, and payables approximates fair value.

### 6. Property, Plant, and Equipment, Net

Property, plant, and equipment, net, consists of (in thousands):

December 31,	2011	2010
Land	\$ 1,104	\$ 1,123
Buildings	26,129	25,739
Machinery and equipment	139,294	138,664
Software	24,955	28,252
Cylinders and canisters	49,844	43,535
Furniture and fixtures	3,042	2,751
Leasehold improvements	24,841	26,488
Construction in progress	6,486	2,105
	<u>275,695</u>	<u>268,657</u>
Accumulated depreciation and amortization	<u>(159,420)</u>	<u>(149,604)</u>
	<u>\$ 116,275</u>	<u>\$ 119,053</u>

Depreciation and amortization expense for property, plant, and equipment for the years ended December 31, 2011, 2010, and 2009 was \$23.3 million, \$22.8 million, and \$22.3 million, respectively.

Fully depreciated assets which were no longer in use of approximately \$12.7 million (primarily software and machinery and equipment) and \$2.3 million, were written off in the years ended December 31, 2011 and 2010, respectively.

We recognized impairment losses from property, plant, and equipment of \$0.6 million, \$0.5 million, and \$7.3 million, in the years ended December 31, 2011, 2010, and 2009, respectively. Refer to Note 5 for additional information.

As of December 31, 2011, the Company had commitments for capital expenditures of \$1.0 million.

This table shows amounts recorded in the Consolidated Statements of Operations related to depreciation expense for property, plant, and equipment (in thousands):

Year Ended December 31,	2011	2010	2009
Cost of revenues	\$10,480	\$10,531	\$10,633
Research and development	7,913	5,219	4,381
Selling, general, and administrative	4,928	7,006	7,314
Total depreciation and amortization	<u>\$23,321</u>	<u>\$22,756</u>	<u>\$22,328</u>

### 7. Goodwill and Other Intangibles

In conjunction with the SDS Direct transaction, we recognized intangible assets of \$11.8 million for the reacquired rights (\$8.8 million) and a non-competition agreement (\$3.0 million), net of liabilities assumed. The useful lives of the reacquired rights and the non-competition agreement are 10 years and 9 years, respectively.

The license for our distribution rights to Enthone's copper ECD products, including its ViaForm products, is subject to automatic renewal upon satisfaction of certain conditions in 2013, which we expect to meet.

Changes in carrying amounts of goodwill and other intangibles, for the years ended December 31, 2011 and 2010, respectively, were (in thousands):

	Goodwill	Patents and Trademarks	Other	Total Other Intangibles
Balance at December 31, 2009	\$33,394	\$21,760	\$ 1,442	\$23,202
Acquisitions	13,566	10,028	—	10,028
Amortization expense	—	(3,502)	(460)	(3,962)
Other, including foreign currency translation	21	(360)	40	(320)
Balance at December 31, 2010	\$46,981	\$27,926	\$ 1,022	\$28,948
Acquisitions	—	—	11,802	11,802
Amortization expense	—	(3,522)	(319)	(3,841)
Other, including foreign currency translation	(435)	(338)	—	(338)
<b>Balance at December 31, 2011</b>	<b>\$46,546</b>	<b>\$24,066</b>	<b>\$12,505</b>	<b>\$36,571</b>

Goodwill and other intangibles balances at December 31, 2011 and 2010 were (in thousands):

	Goodwill	Patents and Trademarks	Other	Total Other Intangibles
Gross amount as of December 31, 2010	\$46,981	\$ 49,869	\$1,396	\$ 51,265
Accumulated amortization	—	(21,943)	(374)	(22,317)
Balance at December 31, 2010	\$46,981	\$ 27,926	\$1,022	\$ 28,948
<b>Gross amount as of December 31, 2011</b>	<b>\$46,546</b>	<b>\$ 49,404</b>	<b>\$13,195</b>	<b>\$ 62,599</b>
<b>Accumulated amortization</b>	<b>—</b>	<b>(25,338)</b>	<b>(690)</b>	<b>(26,028)</b>
<b>Balance at December 31, 2011</b>	<b>\$46,546</b>	<b>\$ 24,066</b>	<b>\$12,505</b>	<b>\$ 36,571</b>

This table shows amounts recorded in the Consolidated Statements of Operations related to amortization expense for intangibles (in thousands):

Year Ended December 31,	2011	2010	2009
Cost of revenues	\$ 334	\$ 313	\$ 296
Selling, general, and administrative	3,507	3,649	4,175
<b>Total amortization</b>	<b>\$3,841</b>	<b>\$3,962</b>	<b>\$4,471</b>

The approximate amortization expense expected to be recognized related to intangible assets is (in thousands):

Year	Amount
2012	\$ 4,716
2013	4,716
2014	4,716
2015	4,201
2016	4,201
Thereafter	14,021
<b>Total</b>	<b>\$36,571</b>

In 2010, the Artelis acquisition was recorded under the purchase method of accounting and accordingly, the Artelis results of operations are included in the Company's financial statements from the date of acquisition.

The purchase consideration was allocated as summarized here (in thousands):

Identified intangible assets	\$10,028
Net liabilities acquired	(1,770)
Goodwill	13,566
<b>Purchase price, net of cash acquired</b>	<b>\$21,824</b>

The excess of the purchase price over the estimated fair value of identifiable net assets acquired has been recorded as goodwill. The identified intangible assets identified were patents of \$9.3 million and a trademark of \$0.7 million. Patents are being amortized over 15 years, while the trademark has been assigned an indefinite life. Goodwill acquired is not deductible for income tax purposes.

## 8. Other Non-Current Assets

In 2007, we entered into a purchase agreement with Intermolecular, Inc. ("Intermolecular"). As part of the initial agreement, we purchased HPD capabilities from Intermolecular, which expanded upon an existing alliance agreement. We have since purchased additional HPD capabilities (including tool sets), as well as services related to the use of these tools, including the use of dedicated research personnel. In December 2007, we made a \$10.0 million royalty prepayment to Intermolecular, which is being applied to guaranteed royalties associated with products developed using the HPD capabilities.

In November 2011, Intermolecular completed an initial public offering, and we converted our preferred shares into common shares and exercised a warrant to purchase additional common shares, which caused us to reclassify our investment from "Other non-current assets" to "Marketable securities," as the securities are now publicly traded. At December 31, 2011, we own common shares with a market value of \$33.1 million.

In 2011, we expensed \$5.0 million of prepaid royalties, and we expect to expense \$2.5 million in 2012. The 2012 amount is included in the Consolidated Balance Sheets under the caption, "Other current assets."

In the fourth quarter of 2011, we extended the contract term of an existing commitment with Intermolecular to purchase R&D technology and processes. The extension maintains our current R&D infrastructure and expense structures over the next three years. The cash payment commitments are \$11.5 million, \$5.0 million, \$1.3 million, and \$1.3 million in fiscal years 2011, 2012, 2013, and 2014, respectively. In 2011, there was a \$1.3 million increase in commitments for that year, due to the contract extension. The contract extension did not include any full time-equivalent resource commitments beyond 2012.

## 9. Leases

The Company leases office and manufacturing facilities, and certain manufacturing equipment, under several operating leases expiring between 2012 and 2034. Rental expense was \$3.7 million, \$3.4 million, and \$4.3 million, for the years ended December 31, 2011, 2010, and 2009, respectively.

This is a schedule of future minimum lease payments for operating leases as of December 31, 2011 (in thousands):

	Operating Leases
2012	\$ 3,579
2013	2,761
2014	1,233
2015	1,017
2016	929
Thereafter	2,787
<b>Total minimum lease payments</b>	<b>\$12,306</b>

We lease two facilities in Danbury, CT. One facility houses our research and development activities and certain of our microelectronics manufacturing capabilities, and contains approximately 73,000 square feet of space. In December 2010, we exercised a renewal option for the period January 1, 2012 to December 31, 2016. For the period January 1, 2011 to December 31, 2011, the monthly base rent is \$42,094. For the period January 1, 2012 to December 31, 2016, the monthly base rent is \$47,500. There is one additional five-year renewal period available to ATMI under this lease. We have agreed to certain restoration obligations associated with this facility, which we are accounting for as an asset retirement obligation ("ARO"), associated with the leasehold improvements made to this facility. The discounted fair value of the ARO at December 31, 2011 is \$2.7 million.

The other facility in Danbury, CT is our headquarters, and contains approximately 31,000 square feet of space. In October 2010, we exercised a renewal option for the period January 1, 2012 to December 31, 2016. For the period January 1, 2011 to December 31, 2016, the monthly base rent is \$17,606. There is one additional five-year renewal period available to ATMI under this lease.

We lease a facility in Bloomington, MN where we manufacture high-purity materials packaging and dispensing systems, within our microelectronics and life sciences product lines. This facility contains approximately 68,000 square feet of space. We entered into an amendment of this lease on September 23, 2008, which extended the lease term to August 31, 2013. For the period January 1, 2011 to August 31, 2013, the monthly base rent is \$26,706. There are two successive three-year renewal periods available to ATMI under this lease. We have agreed to certain restoration obligations associated with this facility, which we are accounting for as an ARO, associated with the leasehold improvements made to this facility. The discounted fair value of the ARO as of December 31, 2011 is \$0.3 million.

Changes in the carrying amounts of the Company's ARO's at December 31, 2011 are (in thousands):

Balance as of December 31, 2010	\$3,506
Liabilities incurred	73
Liabilities settled	—
Accretion expense	63
<b>Balance as of December 31, 2011</b>	<b>\$3,642</b>

The ARO liability is included in the Consolidated Balance Sheets under the caption, "Other non-current liabilities."

## 10. Income Taxes

Pretax income (loss) from continuing operations was taxed in these jurisdictions (in thousands):

Year Ended December 31,	2011	2010	2009
Domestic	\$(54,437)	\$32,644	\$(20,784)
Foreign	15,303	17,983	7,128
<b>Total pretax income (loss)</b>	<b>\$(39,134)</b>	<b>\$50,627</b>	<b>\$(13,656)</b>

Significant components of the provision (benefit) for income taxes for the following years ended are (in thousands):

December 31,	2011	2010	2009
<b>Current:</b>			
Federal	\$ 7,326	\$ 4,144	\$(7,317)
State	320	74	79
Foreign	2,682	2,316	2,154
<b>Total current</b>	<b>10,328</b>	<b>6,534</b>	<b>(5,084)</b>
<b>Deferred:</b>			
Federal	(27,049)	4,174	(117)
State	(2,102)	739	(392)
Foreign	(292)	(326)	(1,403)
<b>Total deferred</b>	<b>(29,443)</b>	<b>4,587</b>	<b>(1,912)</b>
	<b>\$(19,115)</b>	<b>\$11,121</b>	<b>\$(6,996)</b>

Significant components of the Company's deferred tax assets and liabilities are (in thousands):

December 31,	2011	2010
Deferred tax assets		
Accrued liabilities	\$ 5,516	\$ 3,647
Inventory reserves	1,797	1,699
Net operating loss and tax credit carryforwards	12,463	10,758
Equity-based compensation	8,338	7,890
Reacquired rights on contract termination	30,691	—
Other, net	525	560
	<b>59,330</b>	<b>24,554</b>
Valuation allowance	(5,305)	(3,178)
	<b>54,025</b>	<b>21,376</b>
Deferred tax liabilities		
Depreciation and amortization	(23,978)	(21,835)
Unrealized gain on marketable securities	(4,333)	(651)
Other, net	(2,328)	(237)
	<b>(30,639)</b>	<b>(22,723)</b>
Net deferred tax assets (liabilities)	<b>\$ 23,386</b>	<b>\$ (1,347)</b>

The valuation allowance relates to the realizability of certain U.S. state and foreign net operating losses, and certain foreign tax credits.

As of December 31, 2011, the Company had these deferred tax assets related to net operating loss ("NOLs") and tax credit carryforwards (in thousands):

		Expiration
Federal		
Capital loss	\$ 938	2015
	<b>\$ 938</b>	
State		
NOLs	525	2017-2031
Credits	38	2017-2024
Credits	143	None
	<b>\$ 706</b>	
Foreign		
NOLs	9,771	None
NOLs	40	2016
Credits	1,008	2012-2013
	<b>\$10,819</b>	
Total	<b>\$12,463</b>	

The reconciliation of income tax expense (benefit) from operations computed at the U.S. federal statutory tax rate to the Company's tax expense (benefit) is (in thousands):

For the Year Ended December 31,	2011	2010	2009
U.S. statutory rate	<b>\$(13,698)</b>	\$17,719	\$(4,779)
State income taxes	(1,158)	529	(196)
Foreign income taxes	(5,948)	(8,322)	(2,375)
Tax exempt income	(115)	(112)	(213)
Change in valuation allowance			
of deferred tax assets	2,445	1,854	133
Adjustment to tax liabilities	(393)	(213)	457
Research and development credits	(681)	(846)	(284)
Other, net	433	512	261
	<b>\$(19,115)</b>	<b>\$11,121</b>	<b>\$(6,996)</b>

ATMI has not provided for U.S. federal income and foreign withholding taxes on approximately \$92.4 million of undistributed earnings from non-U.S. operations as of December 31, 2011, because such earnings are intended to be reinvested indefinitely outside of the United States. These earnings could become subject to additional tax if they are remitted as dividends, loaned to ATMI, or upon sale of subsidiary stock. It is not practicable to estimate the amount or timing of the additional tax, if any, that eventually might be paid on the foreign earnings.

South Korea has granted the Company an income tax exemption that expires in 2014, including the last two years at 50 percent of the exemption. The exemption applies only to income related to one of the Company's product lines. The effect of the tax exemption was to reduce income tax expense by \$2.8 million, \$2.1 million, and \$1.3 million for the years ended December 31, 2011, 2010, and 2009, respectively.

At December 31, 2011, ATMI had \$3.7 million of unrecognized tax benefits, which, if recognized, would favorably affect the effective income tax rate in future periods. \$0.7 million of this amount is included in deferred taxes, and the balance of \$3.0 million is included in the caption "Other non-current liabilities" on the Consolidated Balance Sheets, together with \$0.4 million of accrued interest (net) on tax reserves and \$0 accrued for penalties. At December 31, 2010, the amount of unrecognized tax benefits, which, if recognized, would have favorably affected the effective income tax rate in future periods, was \$5.6 million, \$0.7 million of accrued interest (net) on tax reserves, and \$0 accrued for penalties.

The reconciliation of the unrecognized tax benefits (exclusive of interest) at the beginning of 2010 through the end of 2011 is (in thousands):

Ending Balance—December 31, 2009	\$ 6,182
Increases from prior period positions	241
Decreases from prior period positions	(586)
Increases from current period positions	1,293
Decreases related to settlements with taxing authorities	(1,130)
Decreases from lapse of statute of limitations	(409)
Ending Balance—December 31, 2010	\$ 5,591
Reclasses out of non-income tax-based positions	(1,350)
Increases from prior period positions	59
Decreases from prior period positions	(259)
Increases from current period positions	469
Decreases related to settlements with taxing authorities	(482)
Decreases from lapse of statute of limitations	(372)
Ending Balance—December 31, 2011	<b>\$ 3,656</b>

In the second quarter of 2011, based on facts and circumstances and recent interpretation of tax law, we determined that \$1.4 million of unrecognized tax benefits will not impact income taxes; as a result, the classification of this amount was changed from unrecognized tax benefits to a loss contingency within the same caption "Other non-current liabilities." It is reasonably possible that in the next 12 months, because of changes in facts and circumstances, the unrecognized tax benefits for tax positions taken related to previously filed tax returns may decrease. The range of possible decrease is \$0 million to \$0.2 million. In January 2012, the Internal Revenue Service completed a U.S. tax audit of tax years 2008 and 2009, although the refund claim for tax year 2009 is still subject to review by the Joint Committee on Taxation.

### 11. Defined Contribution Plan

The Company maintains a defined contribution plan (401(k) Plan), covering substantially all of its U.S. employees, that is subject to the provisions of the Employee Retirement Income Security Act of 1974. The Company's matching contributions are discretionary by plan year and were approximately \$1.8 million, \$1.5 million, and \$1.1 million for the years ended December 31, 2011, 2010, and 2009, respectively. On June 5, 2009, the Company discontinued the matching of contributions, but the Company match was reinstated on October 9, 2009. The Plan provides for discretionary matching contributions of 100 percent of the first 3 percent of each participant's eligible compensation, plus 50 percent on the next 2 percent of each participant's eligible compensation, up to statutory limitations. There is no matching contribution above 5 percent of each participant's eligible compensation.

### 12. Stockholders' Equity

This table shows the effect of pretax compensation cost arising from equity-based payment arrangements recognized in the Consolidated Statements of Operations (in thousands):

December 31,	2011	2010	2009
Cost of revenues	\$ 496	\$ 357	\$ 315
Research and development	900	866	523
Selling, general, and administrative	6,143	6,470	4,902
Total equity-based compensation expense	\$7,539	\$7,693	\$5,740

No equity-based compensation cost was capitalized.

### Summary of Plans

We currently have three equity-based compensation plans which provide for the granting of up to 7,000,000 shares of common stock, pursuant to nonqualified stock options, incentive stock options ("ISOs"), stock appreciation rights, and restricted stock awards to employees, directors, and consultants of the Company. Stock options typically vest over periods ranging from one to four years, with a maximum term of ten years. Restricted stock awards typically vest over periods ranging from three to five years. Shares issued as a result of stock option exercises are primarily settled by the issuance of new shares.

This table shows the number of shares approved by shareholders for each plan, and the number of shares that remain available for equity awards at December 31, 2011 (in thousands):

Stock Plan	Number of Shares Approved	Number of Shares Available
2003 Stock Plan (1)	3,000	74
2010 Stock Plan (1)	3,000	2,895
Employee Stock Purchase Plan (2)	1,000	245
Totals	7,000	3,214

(1) Exercise prices for ISOs and non-qualified stock options granted under this plan may not be less than 100 percent of the fair market value for the Company's common stock on the date of grant.

(2) Employees may purchase shares at 95 percent of the closing price on the day previous to the last day of each six-month offering period. This plan is not considered to be compensatory.

### Fair Value

The Company uses the Black-Scholes-Merton options-pricing model to determine the fair value of stock options under ASC 718, "Compensation — Stock Compensation." Management is required to make certain assumptions with respect to selected model inputs, including anticipated changes in the underlying stock price (i.e., expected volatility) and option exercise activity (i.e., expected term). For awards granted subsequent to January 1, 2006, expected volatility is based on the historical volatility of ATMI common stock for a period shorter than the expected term of the options. We have excluded the historical volatility prior to the public announcement regarding the sale of our non-core businesses in 2004, because those businesses that were sold represented a significant portion of ATMI's consolidated business and were subject to considerable cyclicity associated with the semiconductor equipment industry, which drove increased volatility in ATMI's stock price. The expected term of options granted is derived using historical exercise patterns, which represent the period of time that options granted are expected to be outstanding. The risk-free rate is based on the U.S. Treasury yield curve in effect at the time of grant, for a period commensurate with the estimated expected term. In accordance with ASC 718, in the determination of equity-based compensation cost, the Company estimates the total number of instruments that will be forfeited as a result of a failure to provide the requisite service to earn the award.

The weighted-average fair value of options granted during the years ended December 31, 2011, 2010, and 2009 was \$9.66, \$8.62, and \$6.44, respectively, based on the Black-Scholes-Merton options-pricing model. These weighted-average assumptions were used for grants in the periods indicated:

	2011	2010	2009
Stock option grants:			
Risk-free interest rate	3.15%	3.00%	2.15%
Expected term, in years	7.85	7.40	7.20
Expected volatility	43.3%	44.0%	41.4%
Dividend yield	0%	0%	0%

The Company uses historical data to estimate forfeitures of awards from employee terminations in order to estimate compensation cost for awards expected to vest. In addition, we separate employees into groups that have similar characteristics for purposes of making forfeiture estimates.

### Stock Option and Restricted Stock Activity

This table shows the option activity under the plans as of December 31, 2011, and changes during the year then ended (options are expressed in thousands; averages are calculated on a weighted basis; life in years; intrinsic value expressed in thousands):

	Number of Options	Average Exercise Price	Average Remaining Life	Aggregate Intrinsic Value
Outstanding at December 31, 2010	1,931	\$21.87		
Granted	211	\$18.48		
Exercised	(59)	\$17.65		
Forfeited	(164)	\$23.84		
<b>Outstanding at December 31, 2011</b>	<b>1,919</b>	<b>\$21.47</b>	<b>4.5</b>	<b>\$2,940</b>
<b>Exercisable at December 31, 2011</b>	<b>1,451</b>	<b>\$22.66</b>	<b>3.2</b>	<b>\$1,574</b>

The aggregate intrinsic value represents the difference between the Company's closing stock price of \$20.03 as of December 31, 2011 and the exercise price of the dilutive options at that date, multiplied by the number of dilutive options outstanding at that date. The total intrinsic value of stock options exercised during the years ended December 31, 2011, 2010, and 2009 was \$0.1 million, \$0.2 million, and \$0 million, respectively. The total fair value of options which vested during the years ended December 31, 2011, 2010, and 2009 was \$1.7 million (184,000 shares), \$1.7 million (189,000 shares), and \$2.1 million (167,000 shares), respectively.

An income tax deficiency was recognized in additional paid-in capital from equity-based compensation totaling \$0, \$0.1 million, and \$0.6 million for the years ended December 31, 2011, 2010, and 2009, respectively. An income tax deficiency was recognized in income tax expense from equity-based compensation totaling \$0.9 million and \$0.4 million for the years ended December 31, 2011 and December 31, 2010, respectively. There was no income tax deficiency in 2009.

This table shows restricted stock activity as of December 31, 2011, and changes during the year then ended (shares are expressed in thousands; averages are calculated on a weighted basis):

	Number of Shares	Average Grant Date Fair Value
Nonvested at December 31, 2010	1,184	\$19.28
Granted	470	\$18.34
Vested	(200)	\$26.81
Forfeited	(191)	\$17.86
<b>Nonvested at December 31, 2011</b>	<b>1,263</b>	<b>\$17.97</b>

The total fair value of restricted stock which vested during the years ended December 31, 2011, 2010, and 2009 was \$5.3 million, \$5.0 million, and \$3.8 million, respectively.

As of December 31, 2011, \$2.4 million of unrecognized compensation cost related to non-vested stock options is expected to be recognized over a weighted-average period of approximately 1.6 years. As of December 31, 2011, \$9.6 million of unrecognized compensation cost related to restricted stock is expected to be recognized over a weighted-average period of approximately 2.1 years.

### Earnings Per Share

This table shows the computation of basic and diluted earnings per share (in thousands, except per share data):

	2011	2010	2009
Numerator:			
Net income (loss)	\$(20,019)	\$39,506	\$(6,660)
Denominator:			
Denominator for basic earnings (loss) per share—weighted-average shares	31,703	31,413	31,398
Dilutive effect of employee stock options	—	36	—
Dilutive effect of restricted stock	—	446	—
Denominator for diluted earnings (loss) per common share—weighted-average shares	31,703	31,895	31,398
Earnings (loss) per share—basic	\$(0.63)	\$1.26	\$(0.21)
Earnings (loss) per share—diluted	\$(0.63)	\$1.24	\$(0.21)

This table shows the potential common shares excluded from the calculation of weighted-average shares outstanding because their effect was considered to be antidilutive (in thousands):

	2011	2010	2009
Antidilutive shares	2,144	1,450	2,340

The Company has never declared or paid cash dividends on its capital stock.

In August 2010, the Company's Board of Directors approved a share repurchase program for up to \$50.0 million of ATMI common stock. The program, which has no expiration date, does not require the Company to purchase any specific number or amount of shares, and may be suspended or reinstated at any time at the Company's discretion and without notice. Under the terms of the share repurchase program, repurchases can be made from time to time in open market transactions at prevailing market prices, or in privately negotiated transactions. Management determined the timing and amount of purchases under the Repurchase Programs, based upon market conditions or other factors.

Under all the repurchase programs approved by the Company's Board of Directors, the Company purchased a total of 8,001,000 shares of its common stock at an average price of \$28.37 per share. There were no shares repurchased under these programs in 2011.

### 13. Accumulated Other Comprehensive Income

The components of accumulated other comprehensive income are (in thousands):

	Currency Translation Adjustments	Unrealized Gain (Loss) on Available-for-Sale Securities	Total
Balance at December 31, 2008	\$ 865	\$ (599)	\$ 266
Cumulative effect of adoption of new accounting standard	—	(1,287)	(1,287)
Reclassification adjustment related to marketable securities in unrealized gain position at prior period end, net of \$32 tax benefit (1)	—	(55)	(55)
Change in fair value of available-for-sale securities, net of deferred income tax of \$1,139	—	1,940	1,940
Cumulative translation adjustment	2,540	—	2,540
Balance at December 31, 2009	\$ 3,405	\$ (1)	\$ 3,404
Reclassification adjustment related to marketable securities in unrealized gain position at prior period end, net of \$282 tax provision (1)	—	(481)	(481)
Change in fair value of available-for-sale securities, net of deferred income tax of \$201	—	343	343
Cumulative translation adjustment	762	—	762
Balance at December 31, 2010	\$ 4,167	\$ (139)	\$ 4,028
Reclassification adjustment related to marketable securities in net unrealized gain position at prior period end, net of \$0 tax provision (1)	—	(1)	(1)
Change in fair value of available-for-sale securities, net of deferred income tax of \$4,351	—	7,119	7,119
Cumulative translation adjustment	(3,097)	—	(3,097)
<b>Balance at December 31, 2011</b>	<b>\$ 1,070</b>	<b>\$ 6,979</b>	<b>\$ 8,049</b>

(1) Determined based on the specific identification method

### 14. Commitments, Contingencies, and Other

ATMI is from time to time involved in legal actions, governmental audits, and proceedings relating to various matters incidental to its business including contract disputes, intellectual property disputes, product liability claims, employment matters, export and trade matters, and environmental claims. While the outcome of such matters cannot be predicted with certainty, in the opinion of management, after reviewing such matters and consulting with ATMI's counsel and considering any applicable insurance or indemnifications, any liability which may ultimately be incurred is not expected to materially affect ATMI's consolidated financial position, cash flows, or results of operations.

In the fourth quarter of 2011, we extended the contract term of an existing commitment with Intermolecular to purchase R&D technology and processes. The extension maintains our current R&D infrastructure and expense structures over the next three years. The cash payment commitments are \$11.5 million, \$5.0 million, \$1.3 million, and \$1.3 million in fiscal years 2011, 2012, 2013, and 2014, respectively. In 2011, there was a \$1.3 million increase in commitments for that year, due to the contract extension. The contract extension did not include any full time-equivalent resource commitments beyond 2012.

As part of the Artelis acquisition, we recognized a liability for the fair value of contingent payments, tied to future revenue performance for the fiscal years 2012 through 2014, of \$8.4 million as of the acquisition date. As of December 31, 2011, the fair value of the contingent consideration was \$7.2 million. The contingent payment tied to future revenue performance has a range of possible outcomes from \$0 to \$23.3 million.

ATMI currently has self-insurance limits for U.S. employee medical claims. The medical plan for U.S. employees has a stop-loss of \$0.2 million per individual occurrence and an annual aggregate stop-loss of \$4.9 million.

#### Other

Approximately 9 percent of the Company's employees are covered by collective bargaining agreements that will expire in June 2013. All of the employees covered by these agreements are based in Belgium. The net assets of the Company's Belgian subsidiary represent approximately 7 percent of the Company's consolidated net assets.

## 15. Segments

ATMI is organized along functional lines of responsibility, whereby each member of the Company's executive team has global responsibility for each respective functional area, such as supply chain operations, sales, marketing, finance, and research and development. The executive team is the chief operating decision maker of ATMI. Discrete financial information is only prepared at the product-line level for revenues and certain direct costs. Functional results are reviewed at the consolidated level. ATMI's operations comprise one operating segment. Our organizational structure has been consistent from 2009 to 2011.

ATMI derives virtually all its revenues from providing materials and packaging products, and related integrated process solutions, to microelectronics and life sciences

manufacturers. ATMI's products are consumed or used in the front-end manufacturing process. They span many different technology applications at various stages of maturity and in many cases are interrelated in their application to a customer's process.

Revenues from external customers, by product type, were as follows (in thousands):

For the Year Ended December 31,	2011	2010	2009
Microelectronics	\$351,823	\$336,519	\$230,707
Life sciences	38,264	30,737	23,997
Total	\$390,087	\$367,256	\$254,704

## 16. Geographic Data

The Company's geographic data for the years ended December 31, 2011, 2010, and 2009 are (in thousands):

	United States	Taiwan	Japan	South Korea	Other Pacific Rim	Belgium	Europe and Other	Total
<b>December 31, 2011</b>								
Revenues	\$ 80,288	\$97,324	\$43,416	\$79,332	\$50,010	\$ 3,269	\$36,448	\$390,087
Long-lived assets	157,536	6,037	7,872	6,440	492	41,376	277	220,030
<b>December 31, 2010</b>								
Revenues	\$ 64,824	\$89,415	\$49,539	\$67,743	\$56,377	\$ 2,050	\$37,308	\$367,256
Long-lived assets	159,267	7,581	8,473	6,118	285	41,013	326	223,063
<b>December 31, 2009</b>								
Revenues	\$ 50,347	\$55,454	\$36,482	\$51,555	\$31,347	\$ 2,759	\$26,760	\$254,704
Long-lived assets	168,678	8,513	7,354	3,274	265	24,216	392	212,692

Revenues are attributed to countries based on the location of the customer. Long-lived assets are located in the respective geographic regions, as shown above. Other than Taiwan, Japan, Belgium, and South Korea, no one specific country within the Pacific Rim, Europe, South America, and other regions accounted for greater than 10 percent of consolidated revenues and long-lived assets in 2011, 2010, and 2009.

## 17. Quarterly Results of Operations (Unaudited)

Summarized quarterly results of operations data is as follows (in thousands, except per share amounts):

2011	Quarter			
	First	Second	Third	Fourth
Revenues	\$100,724(a)	\$104,027	\$95,006	\$ 90,330(d)
Gross profit	48,091	49,462	44,051	42,526(e)
Operating income (loss)	11,658	15,448(b)	11,816	(76,636)(f)
Net income (loss)	\$ 8,007	\$ 11,134	\$ 8,041(c)	\$(47,201)(g)
Basic income (loss) per common share:				
Earnings (loss) per common share	\$0.25	\$0.35	\$0.25	\$(1.49)
Diluted income (loss) per common share:				
Earnings (loss) per common share	\$0.25	\$0.34	\$0.25	\$(1.49)
2010				
Revenues	\$ 85,311	\$ 90,996	\$94,960	\$ 95,989
Gross profit	41,689	43,555	45,661	45,103
Operating income	11,994	10,644	10,688	8,612
Net income	\$ 8,666(h)	\$ 7,598	\$ 9,477(i)	\$ 13,765(i)
Basic income per common share:				
Earnings per common share	\$0.27	\$0.24	\$0.30	\$ 0.44
Diluted income per common share:				
Earnings per common share	\$0.27	\$0.24	\$0.30	\$ 0.43

(a) Includes \$1.7 million from IP settlements, which represents the payment of royalties for periods prior to 2011.

(b) Includes a \$0.9 million gain on remeasurement of contingent consideration and a \$1.2 million benefit related to state tax credits.

(c) Includes \$0.7 million of pretax foreign exchange losses.

(d) Revenues were negatively impacted by the effects of the SDS Direct transaction, which included inventory repurchases and excess inventory in the SDS channel, partially offset by incremental revenues realized from the transaction. Includes \$0.7 million from IP settlements, which represents the payment of royalties for periods prior to 2011.

(e) The cost of revenues were favorably impacted by the effects of the SDS Direct transaction, representing cost reversals for inventory repurchased and the effects of excess inventory in the SDS channel, partially offset by transition service costs and incremental costs on revenues realized from the transaction.

(f) Includes an \$84.6 million contract termination charge related to the SDS Direct transaction, transition-related distribution expenses of \$1.3 million, a \$0.8 million gain on remeasurement of contingent consideration, and a \$1.2 million benefit related to state tax credits.

(g) Includes \$31.0 million of tax benefit associated with the contract termination charge, and a \$0.8 million pretax impairment loss on an equity investment.

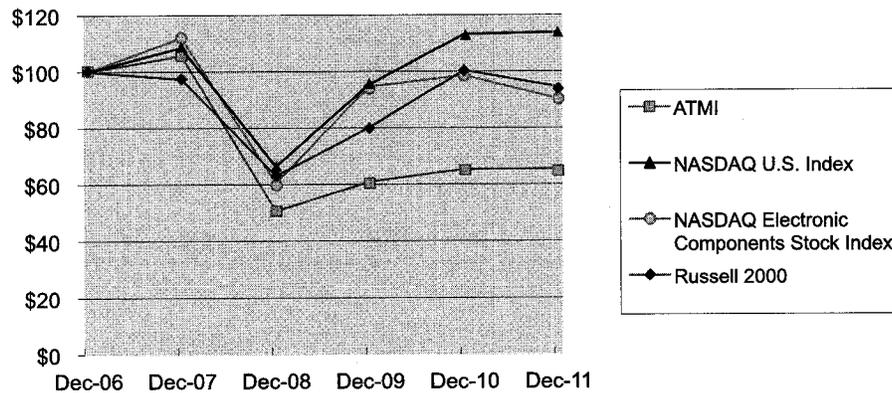
(h) Includes a \$0.5 million gain from the sale of a marketable security, and a \$0.5 million tax benefit (including interest) recognized to reverse previously established reserves for uncertain tax positions.

(i) Includes a \$2.5 million pretax gain on sale of shares of one of our equity-method investees.

(j) Includes a \$5.9 million fair value remeasurement gain related to acquisition of Artelis, a \$1.2 million tax benefit (including interest) recognized to reverse previously established reserves for uncertain tax positions, a \$2.1 million tax benefit related to a European dividend, and a \$1.9 million charge related to changes in valuation allowances.

## Stock Performance

This graph compares the cumulative total stockholder return on ATMI's common stock with the return on the Total Return Index for the NASDAQ Global Select Market (NASDAQ U.S. Index) and the NASDAQ Electronic Components Stock Index. The measurement assumes a \$100 investment as of December 31, 2006 with all dividends, if any, reinvested. The data presented are on an annual basis for the five years ended December 31, 2011. The performance shown is not necessarily indicative of future performance.



## TOTAL RETURN CALCULATION

Date	Relative Stock Performance			
	NASDAQ U.S. Index	NASDAQ Electronic Components Stock Index	Russell 2000	ATMI
12/29/06	100.00	100.00	100.00	100.00
12/31/07	108.47	112.12	97.27	105.63
12/31/08	66.35	60.44	63.10	50.54
12/31/09	95.38	94.57	80.02	60.99
12/31/10	113.19	98.61	100.27	65.31
12/31/11	113.81	90.17	94.51	65.61

## PRICE RANGE OF COMMON STOCK

The common stock of ATMI has traded on the NASDAQ Global Select Market under the symbol ATMI since October 13, 1997, and the common stock of our predecessor company traded under that symbol from 1993 until October 12, 1997. This table sets forth, for the periods indicated, the high and low sales price for the common stock as reported on the NASDAQ Global Select Market:

### Fiscal Year Ended December 31, 2011

	High	Low
1st Quarter	\$21.28	\$17.01
2nd Quarter	20.65	17.25
3rd Quarter	21.32	15.32
4th Quarter	21.48	15.15

### Fiscal Year Ended December 31, 2010

	High	Low
1st Quarter	\$19.65	\$15.13
2nd Quarter	22.05	14.21
3rd Quarter	16.07	12.13
4th Quarter	20.99	14.47

As of January 31, 2012, there were approximately 153 holders of record of our common stock.

We have never paid cash dividends on our common stock and have no current plans to do so. There are no contractual restrictions in place that currently materially limit, or are likely in the future to materially limit, us from paying dividends on our common stock, but applicable state law may limit the payment of dividends. Our present policy is to retain earnings, if any, to provide funds for the operation and expansion of our business.

The Transfer Agent and Registrar for ATMI is Continental Stock Transfer & Trust Company.

## Management's Report on Internal Control over Financial Reporting

Our management is responsible for establishing and maintaining adequate internal control over financial reporting. 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 reporting purposes in accordance with accounting principles generally accepted in the United States of America. Because of its inherent limitations, internal control over financial reporting may not prevent or detect misstatements. Our management has assessed the effectiveness of our internal control over financial reporting as of December 31, 2011. In making its assessment, management has used the criteria set forth by the Committee of Sponsoring Organizations (COSO) of the Treadway Commission in *Internal Control—Integrated Framework*. Our management concluded that based on its assessment, our internal control over financial reporting was effective as of December 31, 2011. The Company's internal control over financial reporting as of December 31, 2011 has been audited by Ernst & Young LLP, an independent registered public accounting firm, as stated in their attestation report on the Company's internal control over financial reporting, which is included in this annual report.

There has been no change in our internal control over financial reporting during the quarter ended December 31, 2011 that has materially affected, or is reasonably likely to materially affect, our internal control over financial reporting.

## Report of Independent Registered Public Accounting Firm

The Board of Directors and Stockholders of ATMI, Inc.

We have audited the accompanying consolidated balance sheets of ATMI, Inc. as of December 31, 2011 and 2010, and the related consolidated statements of operations, stockholders' equity, and cash flows for each of the three years in the period ended December 31, 2011. These financial statements are the responsibility of ATMI, Inc.'s management. Our responsibility is to express an opinion on these financial statements based on our audits.

We conducted our audits in accordance with the standards of the Public Company Accounting Oversight Board (United States). Those standards require that we plan and perform the audit to obtain reasonable assurance about whether the financial statements are free of material misstatement. An audit includes examining, on a test basis, evidence supporting the amounts and disclosures in the financial statements. An audit also includes assessing the accounting principles used and significant estimates made by management, as well as evaluating the overall financial statement presentation. We believe that our audits provide a reasonable basis for our opinion.

In our opinion, the financial statements referred to above present fairly, in all material respects, the consolidated financial position of ATMI, Inc. at December 31, 2011 and 2010, and the consolidated results of its operations and its cash flows for each of the three years in the period ended December 31, 2011, in conformity with U.S. generally accepted accounting principles.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States), ATMI, Inc.'s internal control over financial reporting as of December 31, 2011, based on criteria established in *Internal Control—Integrated Framework* issued by the Committee of Sponsoring Organizations of the Treadway Commission and our report dated February 17, 2012 expressed an unqualified opinion thereon.

*Ernst + Young LLP*

Stamford, Connecticut  
February 17, 2012

## Report of Independent Registered Public Accounting Firm

The Board of Directors and Stockholders of ATMI, Inc.

We have audited ATMI, Inc.'s internal control over financial reporting as of December 31, 2011, based on criteria established in *Internal Control—Integrated Framework* issued by the Committee of Sponsoring Organizations of the Treadway Commission (the COSO criteria). ATMI, Inc.'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. Our responsibility is to express an opinion on ATMI, Inc.'s internal control over financial reporting based on our audit.

We conducted our audit in accordance with the standards of the Public Company Accounting Oversight Board (United States). 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.

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.

In our opinion, ATMI, Inc. maintained in all material respects, effective internal control over financial reporting as of December 31, 2011, based on the COSO criteria.

We also have audited, in accordance with the standards of the Public Company Accounting Oversight Board (United States), the consolidated balance sheets of ATMI, Inc. as of December 31, 2011 and 2010, and the related consolidated statements of operations, stockholders' equity, and cash flows for each of the three years in the period ended December 31, 2011 and our report dated February 17, 2012 expressed an unqualified opinion thereon.

*Ernst + Young LLP*

Stamford, Connecticut  
February 17, 2012

# Company Information

## DIRECTORS

**Douglas A. Neugold**  
*Chairman of the Board,  
Chief Executive Officer, and President, ATMI, Inc.*

**Mark A. Adley**<sup>1,3\*</sup>  
*Managing Director, Banc of America Merrill Lynch*

**Eugene G. Banucci, Ph.D.**<sup>1,4</sup>  
*Formerly Chairman of the Board, ATMI, Inc.*

**Robert S. Hillas**<sup>1\*,2</sup>  
*Independent Advisor*

**Stephen H. Mahle**<sup>2\*,3</sup>  
*Formerly Executive Vice President, Health Care Policy  
and Regulatory, Medtronic, Inc.*

**C. Douglas Marsh**<sup>2,3</sup>  
*Formerly Vice President, Business Integration,  
U.S. Investor Relations  
ASML Holding, NV*

**George M. Scalise**<sup>3,4</sup>  
*Formerly President of the Semiconductor Industry Association*

**Cheryl L. Shavers, Ph.D.**<sup>2,4\*</sup>  
*Chief Executive Officer, Global Smarts, Inc.*

<sup>1</sup> Audit Committee

<sup>2</sup> Compensation Committee

<sup>3</sup> Corporate Governance and Nominating Committee

<sup>4</sup> Technology Committee

\* Committee Chairman

## EXECUTIVE OFFICERS

**Douglas A. Neugold**  
*Chairman, Chief Executive Officer, and President*

**Timothy C. Carlson**  
*Executive Vice President, Chief Financial Officer,  
and Treasurer*

**Ellen T. Harmon**  
*Executive Vice President, Chief Legal Officer, Chief Compliance Officer,  
and Secretary*

**Tod A. Higinbotham**  
*Executive Vice President, and General Manager, Microelectronics*

**Daniel P. Sharkey**  
*Executive Vice President, Business Development*

**Lawrence H. Dubois**  
*Senior Vice President, and Chief Technology Officer*

**Paul J. Hohlstein**  
*Senior Vice President, Supply Chain and Operations*

**Kathleen G. Mincieli**  
*Senior Vice President, Human Resources*

**Mario Philips**  
*Senior Vice President, and General Manager, LifeSciences*

## CORPORATE HEADQUARTERS

ATMI, Inc.  
7 Commerce Drive  
Danbury, Connecticut 06810  
203.794.1100  
203.792.8040 facsimile  
info@atmi.com  
http://www.atmi.com

## COMMON STOCK LISTING

ATMI's Common Stock trades as "ATMI"  
on the NASDAQ Global Select Market.

## TRANSFER AGENT AND REGISTRAR

Continental Stock Transfer & Trust Company  
17 Battery Place, 8th Floor  
New York, New York 10004  
www.continentalstock.com  
cstmail@continentalstock.com  
800.509.5586  
212.509.4000

## AUDITORS

Ernst & Young LLP  
Stamford, Connecticut

## FORM 10-K

Free copies of ATMI's Annual Report on Form 10-K for the fiscal year ended December 31, 2011, as filed with the Securities and Exchange Commission, are available

- from the SEC's web site—  
[http://www.sec.gov/cgi-bin/browse-edgar?  
company=atmi&action=getcompany](http://www.sec.gov/cgi-bin/browse-edgar?company=atmi&action=getcompany)
- through the investor pages at ATMI's web site—[atmi.com](http://atmi.com)
- by e-mail request—[ir@atmi.com](mailto:ir@atmi.com)
- by mail—Attn: Investor Relations,  
at ATMI Corporate Headquarters

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# Facilities

## Corporate Headquarters

7 Commerce Drive  
Danbury, Connecticut 06810  
800.766.2681  
203.794.1100  
info@atmi.com  
www.atmi.com

## NORTH AMERICA

### Arizona

*Sales & Marketing*  
2151 East Broadway Road, Suite 101  
Tempe, Arizona 85282  
480.736.7600  
customerservice@atmi.com

### Connecticut

*High Productivity Development Center*  
7 Commerce Drive  
Danbury, Connecticut 06810  
800.766.2681  
203.794.1100

### Minnesota

*Manufacturing and Operations*  
10851 Louisiana Avenue South  
Bloomington, Minnesota 55438  
800.966.6698  
952.942.0855  
lifesciencesUS@atmi.com

### Texas

*Sales and Customer Service*  
700 Jeffrey Way  
Round Rock, Texas 78665  
512.244.5200  
customerservice@atmi.com

*Materials Manufacturing*  
706 Houston Clinton Drive  
Burnet, Texas 78611  
888.303.4401  
512.756.7314

## ASIA

### China

*Sales and Customer Service*  
Building 7, Suite 201-203  
3000 Long Dong Avenue  
Pudong 201203, Shanghai  
China  
86.21.6876.7670

### Japan

*Sales and Customer Service*  
The Itoyama Tower 3F  
3-7-18 Mita  
Minato-ku, Tokyo 108-0073  
Japan  
81.3.5765.2488

### Singapore

*Sales and Customer Service*  
25 International Business Park  
04-75 German Centre  
Singapore 609916  
65.6562.8200

### South Korea

*Sales and Customer Service*  
Korea Advanced Nano Fab Center, 11F  
906-10, Iui-dong, Yeongtong-gu, Suwon-si  
Gyeonggi-do, 443-270  
South Korea  
82.31.546.6262

### Taiwan

*Sales and Customer Service*  
4F-7, No. 81, Shui-lee Road  
Hsin-chu 300  
Taiwan, ROC  
886.3.516.9248

*High Productivity Development Center*  
No. 669, Section 4, Chung-Hsin Road  
Chutung Town, Hsinchu County  
Taiwan, ROC  
886.3.582.0858

## EUROPE

### Belgium

*Manufacturing*  
Reugelstraat 2, B-3320 Hoegaarden  
Belgium  
32.16.76.80.70

### Manufacturing

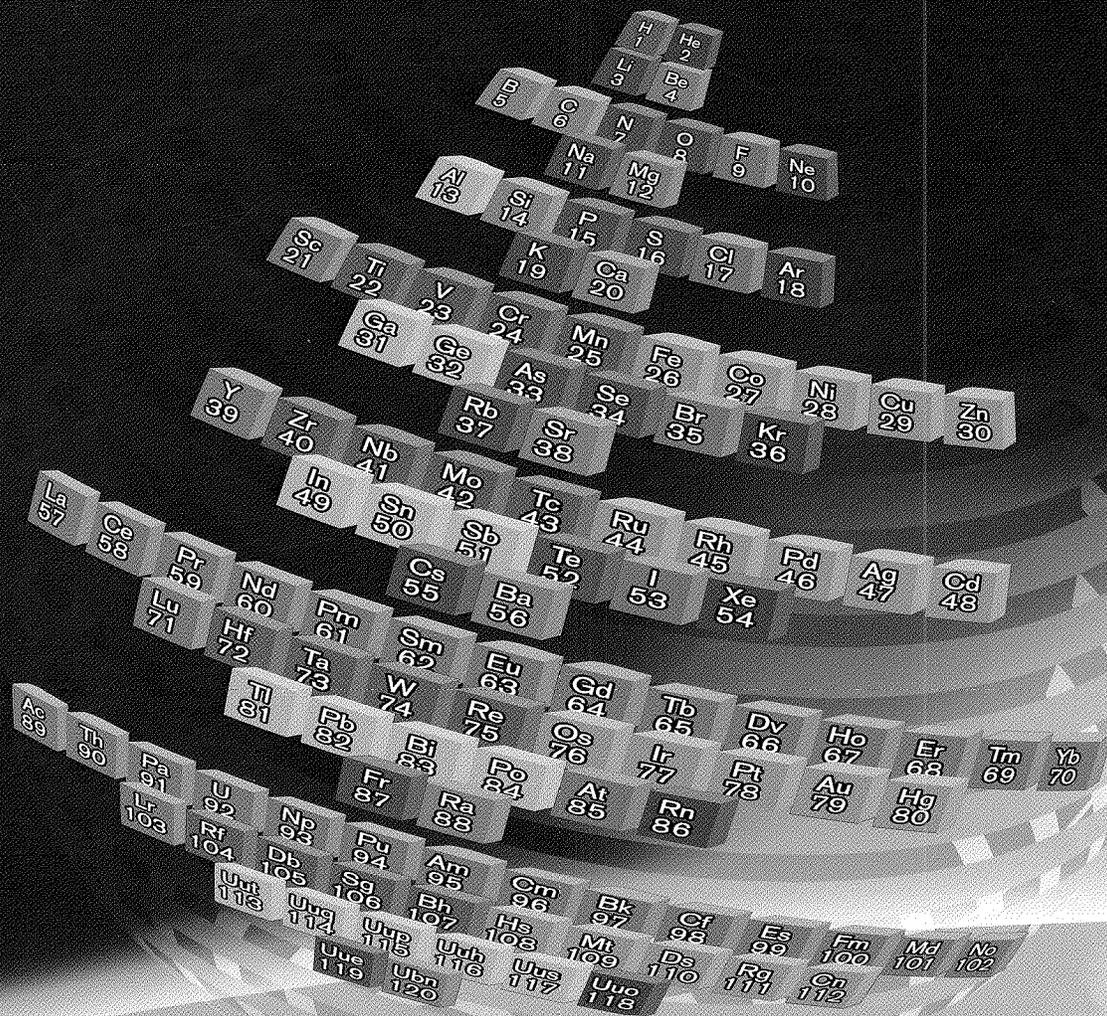
Rue de Ransbeek 310  
1120 Brussels  
Belgium  
32.22.64.18.80

### Germany

*Sales and Customer Service*  
Inselkammerstrasse 2  
D-82008 Unterhaching  
Germany  
49.89.622995.0



ATMI®



ATMI®

7 COMMERCE DRIVE  
DANBURY, CONNECTICUT 06810 USA  
203.794.1100  
203.792.8040 FACSIMILE  
ATMI.COM