

**UNITED STATES  
SECURITIES AND EXCHANGE COMMISSION**

Washington, D.C. 20549

**FORM 8-K**

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

Date of Report (Date of earliest event reported): **November 3, 2010**

**Axcelis Technologies, Inc.**

(Exact name of registrant as specified in its charter)

**Delaware**  
(State or other jurisdiction  
of incorporation)

**000-30941**  
(Commission  
File Number)

**34-1818596**  
(IRS Employer  
Identification No.)

**108 Cherry Hill Drive, Beverly, Massachusetts**  
(Address of principal executive offices)

**01915**  
(Zip Code)

Registrant's telephone number, including area code: **(978) 787-4000**

(Former name or former address, if changed since last report.)

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

- Written communications pursuant to Rule 425 under the Securities Act (17 CFR 230.425)
- Soliciting material pursuant to Rule 14a-12 under the Exchange Act (17 CFR 240.14a-12)
- Pre-commencement communications pursuant to Rule 14d-2(b) under the Exchange Act (17 CFR 240.14d-2(b))
- Pre-commencement communications pursuant to Rule 13e-4(c) under the Exchange Act (17 CFR 240.13e-4(c))

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**Item 2.02 Results of Operations and Financial Condition**

On November 3, 2010, Axcelis Technologies, Inc. (the "Company") issued a press release regarding its financial results for the quarter ended September 30, 2010. The Company's press release is attached as Exhibit 99.1 to this Current Report on Form 8-K and incorporated by reference herein

**Item 9.01 Financial Statements and Exhibits**

(d) Exhibits

99.1 Press Release dated November 3, 2010. Filed herewith.

2

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**SIGNATURE**

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

Date: November 3, 2010

Axcelis Technologies, Inc.

By: /s/ STEPHEN G. BASSETT  
Stephen G. Bassett  
Executive Vice President  
and Chief Financial Officer

3





**AXCELIS ANNOUNCES FINANCIAL RESULTS  
FOR THIRD QUARTER 2010**

***Company Reports 77% Increase in Systems Revenues, and 48% Jump in Systems Orders***

BEVERLY, Mass. — November 3, 2010—Axcelis Technologies, Inc. (Nasdaq: ACLS) today announced financial results for the third quarter ended September 30, 2010. The Company reported third quarter revenue of \$75.1 million, compared to \$58.2 million for the second quarter of 2010, a 29% increase over the prior quarter. Net loss for the quarter was \$6.3 million, or \$0.06 per share, of which \$1.5 million (\$0.01 per share) is attributable to non-cash foreign exchange losses. This compares to a net loss for the second quarter of 2010 of \$4.5 million, or \$0.04 per share. Loss from operations improved 6.6% over the second quarter. The Company reported a 77% increase in systems revenues and a 48% jump in systems orders over the previous quarter. Cash and cash equivalents, including restricted cash, were \$52.9 million at September 30, 2010. The Company ended the quarter with working capital of \$156.0 million.

“Momentum across our product lines continues to build. Ongoing innovation in ion implantation and plasma cleaning technology has propelled significant growth in our revenues and orders across all industry segments,” said Mary Puma, chairman and CEO. “Our outstanding win rate demonstrates that customers see value in our combination of enabling process technology and industry leading productivity. We’re confident this will continue to translate into market share gains. Our strategy and business model support a return to profitability beginning with the fourth quarter of 2010.”

**Third Quarter 2010 Conference Call**

The Company will host a conference call today at 5:00 pm ET to discuss results for the third quarter 2010. The call will be available to interested listeners via an audio webcast that can be accessed through Axcelis’ home page at [www.axcelis.com](http://www.axcelis.com), or by dialing 1-888-713-4199 (1-617-213-4861 outside North America). Participants calling into the conference call will be requested to provide the company name, Axcelis Technologies and pass code: 70472378. Webcast and telephone replays will be available from 8 pm ET on November 3, 2010 until 11:59 pm on February 1, 2011. Dial 1- 888-286-8010 (1-617-801-6888 outside North America), and enter conference ID code# 32926165.

1

**Safe Harbor Statement**

This document contains forward-looking statements under the SEC safe harbor provisions. These statements, which include our guidance for future financial performance, are based on management’s current expectations and should be viewed with caution. They are subject to various risks and uncertainties, many of which are outside the control of the Company, including the timing of orders and shipments, the conversion of orders to revenue in any particular quarter, or at all, our ability to implement successfully our profit plans, the continuing demand for semiconductor equipment, relative market growth, continuity of business relationships with and purchases by major customers, competitive pressure on sales and pricing, increases in material and other production costs that cannot be recouped in product pricing and global economic, political and financial conditions. These risks and other risk factors relating to Axcelis are described more fully in the most recent Form 10-K filed by Axcelis and in other documents filed from time to time with the Securities and Exchange Commission.

**About Axcelis**

Axcelis Technologies, Inc. (Nasdaq: ACLS) headquartered in Beverly, Massachusetts, provides innovative, high-productivity solutions for the semiconductor industry. Axcelis is dedicated to developing enabling process applications through the design, manufacture and complete life support of ion implantation and cleaning systems. The company’s Internet address is: [www.axcelis.com](http://www.axcelis.com).

**Company Contacts:**

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2

**Axcelis Technologies, Inc.  
Consolidated Statements of Operations  
In thousands, except per share amounts  
(Unaudited)**

	Three months ended September 30,		Nine months ended September 30,	
	2010	2009	2010	2009
Revenue				
Product	\$ 66,162	\$ 25,871	\$ 157,133	\$ 69,369
Service	8,944	9,132	24,676	24,527
Royalties from SEN	—	4	—	389
	<u>75,106</u>	<u>35,007</u>	<u>181,809</u>	<u>94,285</u>
Cost of revenue				
Product	47,848	21,681	111,858	62,571
Service	5,788	5,506	15,606	15,001

	53,636	27,187	127,464	77,572
Gross profit	21,470	7,820	54,345	16,713
Operating expenses				
Research and development	9,872	7,648	28,482	24,935
Sales and marketing	7,151	5,700	20,361	18,864
General and administrative	7,885	7,874	23,049	27,075
Restructuring charges	—	430	—	5,528
	<u>24,908</u>	<u>21,652</u>	<u>71,892</u>	<u>76,402</u>
Loss from operations	(3,438)	(13,832)	(17,547)	(59,689)
Other income (expense)				
Gain on sale of SEN	—	—	—	1,080
Equity loss of SEN	—	—	—	(3,238)
Interest income	15	59	69	152
Interest expense	—	—	—	(1,676)
Other, net	(1,996)	(1,681)	(2,061)	(3,197)
	<u>(1,981)</u>	<u>(1,622)</u>	<u>(1,992)</u>	<u>(6,879)</u>
Loss before income taxes	(5,419)	(15,454)	(19,539)	(66,568)
Income taxes	<u>854</u>	<u>444</u>	<u>2,364</u>	<u>864</u>
Net loss	<u>\$ (6,273)</u>	<u>\$ (15,898)</u>	<u>\$ (21,903)</u>	<u>\$ (67,432)</u>
Net loss per share				
Basic and diluted net loss per share	<u>\$ (0.06)</u>	<u>\$ (0.15)</u>	<u>\$ (0.21)</u>	<u>\$ (0.65)</u>
Shares used in computing basic and diluted net loss per share				
Weighted average common shares	<u>104,628</u>	<u>103,850</u>	<u>104,307</u>	<u>103,475</u>

3

**Axcelis Technologies, Inc.**  
**Consolidated Balance Sheets**  
**In thousands**  
**(Unaudited)**

	September 30, 2010	December 31, 2009
<b>ASSETS</b>		
Current assets		
Cash and cash equivalents	\$ 49,116	\$ 45,020
Restricted cash	3,742	4,918
Accounts receivable, net	40,957	19,094
Inventories, net	103,579	114,558
Prepaid expenses and other current assets	13,046	10,016
Total current assets	<u>210,440</u>	<u>193,606</u>
Property, plant and equipment, net	38,904	40,868
Long-term restricted cash	—	2,245
Other assets	9,004	13,884
	<u>\$ 258,348</u>	<u>\$ 250,603</u>
<b>LIABILITIES AND STOCKHOLDERS' EQUITY</b>		
Current liabilities		
Accounts payable	\$ 25,507	\$ 9,680
Accrued compensation	10,828	9,267
Warranty	1,629	638
Income taxes	1,725	1,499
Deferred revenue	10,170	5,127
Other current liabilities	4,561	3,546
Total current liabilities	<u>54,420</u>	<u>29,757</u>
Long-term deferred revenue	1,365	563
Other long-term liabilities	<u>4,023</u>	<u>3,884</u>
Stockholders' equity		
Preferred stock	—	—
Common stock	105	104
Additional paid-in capital	492,343	488,321
Treasury stock	(1,218)	(1,218)

Accumulated deficit	(297,850)	(275,947)
Accumulated other comprehensive income	5,160	5,139
	<u>198,540</u>	<u>216,399</u>
	<u>\$ 258,348</u>	<u>\$ 250,603</u>

4

**Axcelis Technologies, Inc.**  
**Consolidated Statements of Cash Flow**  
**In thousands**  
**(Unaudited)**

	Nine months ended September 30,	
	2010	2009
<b>Cash flows from operating activities</b>		
Net loss	\$ (21,903)	\$ (67,432)
Adjustments to reconcile net loss to net cash used for operating activities		
Undistributed loss of SEN	—	3,238
Depreciation and amortization	5,367	5,593
Gain on sale of SEN	—	(1,080)
Accretion of premium on convertible debt	—	133
Stock-based compensation expense	2,953	3,594
Provision for excess inventory	1,734	9,268
Changes in operating assets & liabilities		
Accounts receivable	(21,890)	1,097
Inventories	9,282	18,091
Prepaid expenses and other current assets	(2,747)	6,468
Accounts payable & other current liabilities	20,386	(12,908)
Deferred revenue	5,852	(3,650)
Income taxes	201	480
Other assets and liabilities	2,357	(710)
Net cash provided by (used for) operating activities	<u>1,592</u>	<u>(37,818)</u>
<b>Cash flows from investing activities</b>		
Expenditures for property, plant, and equipment	(761)	(381)
Decrease in restricted cash	3,421	1,666
Proceeds from sale of SEN	—	132,847
Payments related to sale of SEN	—	(10,590)
Net cash provided by investing activities	<u>2,660</u>	<u>123,542</u>
<b>Cash flows from financing activities</b>		
Repayment of convertible debt	—	(83,344)
Financing fees and other expenses	(523)	—
Proceeds from exercise of stock options	104	—
Proceeds from Employee Stock Purchase Plan	206	65
Net cash used for financing activities	<u>(213)</u>	<u>(83,279)</u>
Effect of exchange rate changes on cash	57	1,105
Net increase in cash and cash equivalents	4,096	3,550
Cash and cash equivalents at beginning of period	45,020	37,694
Cash and cash equivalents at end of period	<u>\$ 49,116</u>	<u>\$ 41,244</u>

5