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FORM 4

UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

Check this box if no longer subject to
Section 16. Form 4 or Form 5
obligations may continue. See
Instruction 1(b).

STATEMENT OF CHANGES IN BENEFICIAL OWNERSHIP

Filed pursuant to Section 16(a) of the Securities Exchange Act of 1934 or Section 30(h) of the Investment Company Act of 1940

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1. Name and Add <u>Preiss Frede</u>	ress of Reporting Pers erick	son*	2. Issuer Name and Ticker or Trading Symbol <u>AtriCure, Inc.</u> [ATRC]		tionship of Reporting Pe all applicable) Director Officer (give title	erson(s) to Issuer 10% Owner Other (specify
(Last) (First) (Middle) 6217 CENTRE PARK DRIVE			3. Date of Earliest Transaction (Month/Day/Year) 07/29/2010	Α	below) Vice President (below) Operations
(Street) WEST CHESTER	ОН	45069	4. If Amendment, Date of Original Filed (Month/Day/Year)	6. Indiv Line) X	idual or Joint/Group Fili Form filed by One Re Form filed by More th Person	porting Person
(City)	(State)	(Zip)				

Table I - Non-Derivative Securities Acquired, Disposed of, or Beneficially Owned

1. Title of Security (Instr. 3)	2. Transaction Date (Month/Day/Year)	2A. Deemed Execution Date, if any (Month/Day/Year)	3. Transa Code (8)		4. Securities Disposed Of 5)			Securities Beneficially	6. Ownership Form: Direct (D) or Indirect (I) (Instr. 4)	7. Nature of Indirect Beneficial Ownership
			Code	v	Amount	(A) or (D)	Price	Transaction(s) (Instr. 3 and 4)		(Instr. 4)
Common Stock	07/29/2010		F		1,198(1)	D	\$6.41	29,482	D	

 Table II - Derivative Securities Acquired, Disposed of, or Beneficially Owned (e.g., puts, calls, warrants, options, convertible securities)

1. Title of Derivative Security (Instr. 3)	2. Conversion or Exercise Price of Derivative Security	3. Transaction Date (Month/Day/Year)	3A. Deemed Execution Date, if any (Month/Day/Year)		ransaction of code (Instr. Do) Se Ad (A Di of		osed) . 3, 4	6. Date Exercisable and Expiration Date (Month/Day/Year)		7. Title and Amount of Securities Underlying Derivative Security (Instr. 3 and 4)		8. Price of Derivative Security (Instr. 5)	9. Number of derivative Securities Beneficially Owned Following Reported Transaction(s) (Instr. 4)	10. Ownership Form: Direct (D) or Indirect (I) (Instr. 4)	11. Nature of Indirect Beneficial Ownership (Instr. 4)
				Code	v	(A)	(D)	Date Exercisable	Expiration Date	Title	Amount or Number of Shares				

Explanation of Responses:

1. Mr. Preiss has elected to transfer 1,198 shares to the Company to satisfy the tax withholding obligation incurred upon the vesting and release of shares previously acquired pursuant to a Restricted Stock Award.

/s/ Julie A. Piton for Frederick 07/30/2010 C. Preiss

** Signature of Reporting Person Date

Reminder: Report on a separate line for each class of securities beneficially owned directly or indirectly.

* If the form is filed by more than one reporting person, see Instruction 4 (b)(v).

** Intentional misstatements or omissions of facts constitute Federal Criminal Violations See 18 U.S.C. 1001 and 15 U.S.C. 78ff(a).

Note: File three copies of this Form, one of which must be manually signed. If space is insufficient, see Instruction 6 for procedure.

Persons who respond to the collection of information contained in this form are not required to respond unless the form displays a currently valid OMB Number.