FORM 4

## UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

OMB APPROVAL										
OMB Number:	3235-028									

37 Estimated average burden 0.5 hours per response:

## 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 5. Relationship of Reporting Person(s) to Issuer (Check all applicable) 2. Issuer Name and Ticker or Trading Symbol 1. Name and Address of Reporting Person\* MERCURY COMPUTER SYSTEMS INC **FLOOD DOUGLAS** Director 10% Owner [ MRCY ] Officer (give title Other (specify below) below) (Last) (First) (Middle) 3. Date of Earliest Transaction (Month/Day/Year) VP, Corporate Development **4 CONSTITUTION DRIVE** 02/20/2006 4. If Amendment, Date of Original Filed (Month/Day/Year) 6. Individual or Joint/Group Filing (Check Applicable (Street) Line) SOUTHBOROUGH MA 01772 Form filed by One Reporting Person Form filed by More than One Reporting Person (City) (State) (Zip) Table I - Non-Derivative Securities Acquired, Disposed of, or Beneficially Owned 4. Securities Acquired (A) or Disposed Of (D) (Instr. 3, 4 and 1. Title of Security (Instr. 3) 2. Transaction 2A. Deemed 5. Amount of 6. Ownership 7. Nature Transaction **Execution Date** Securities Form: Direct of Indirect (Month/Day/Year) Code (Instr. 8) Beneficially (D) or Indirect (I) (Instr. 4) if any 5) Beneficial (Month/Day/Year) Owned Following Ownership Reported (Instr. 4) (A) or (D) Transaction(s) Code Amount Price (Instr. 3 and 4) Common Stock 02/20/2006  $6.000^{(1)}$ \$17.25 9,662 D Table II - Derivative Securities Acquired, Disposed of, or Beneficially Owned puts, calls, warrants, options, convertible securities)

(e.g., puis, cans, warrants, options, conventible securities)																	Ĺ
	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)	4. Transaction Code (Instr. 8)		5. Number of Derivative Securities Acquired (A) or Disposed of (D) (Instr. 3, 4 and 5)		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. These shares of restricted stock vest in three equal annual installments commencing on February 20, 2007.

Craig Barrows, Attorney-in-

fact

02/22/2006

\*\* 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.