FORM 4

UNITED STATES SECURITIES AND EXCHANGE COMMISSION

Washington, D.C. 20549

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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

1. Name and Address of Reporting Person [*] McCall Ronald D						2. Issuer Name and Ticker or Trading Symbol <u>CRYOLIFE INC</u> [CRY]									5. Relationship of Reporting Person(s) to Issuer (Check all applicable) X Director 10% Owner					
(Last)	(Fir	st) (M		3. Date of Earliest Transaction (Month/Day/Year) 05/23/2007									л	Officer (give title below)				(specify		
CRYOLIFE, INC. 1655 ROBERTS BOULEVARD, NW						4. If Amendment, Date of Original Filed (Month/Day/Year)									6. Individual or Joint/Group Filing (Check Applicable Line) X Form filed by One Reporting Person					
(Street) KENNESAW GA 30144															Form filed by More than One Reporting Person					
(City)	(City) (State) (Zip)																			
Table I - Non-Derivative Securities Acquired, Disposed of, or Beneficially Owned																				
1. Title of Security (Instr. 3) Date (Month/Da						ion 2A. Deemed Execution Date, if any (Month/Day/Year)					ities Acquired (d Of (D) (Instr. 3			3,4 Se Be Ow		Amount of curities neficially med llowing		wnership m: Direct or rect (I) tr. 4)	7. Nature of Indirect Beneficial Ownership (Instr. 4)	
									Code	v	Amount		(A) or (D)	Pric	e	Repor Trans	Reported ransaction(s) nstr. 3 and 4)		u. 4)	(1150. 4)
Common Stock 05/23/2					2007	007		A		1,063	(1)	Α	\$ <mark>0</mark>		143,526			D		
Common Stock																16,000			I	By Spouse
	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)	vative Conversion Date Executio urity or Exercise (Month/Day/Year) if any			emed 4. Transac Code (li /Day/Year) 8)		ction of		6. Date Exercisable and Expiration Date (Month/Day/Year)			7. Title and Amount of Securities Underlying Derivative Security (Instr 3 and 4)			8. Pr of Deri Secu (Inst	vative rity	derivative ve Securities / Beneficially	Ownership Form: Direct (D) or Indirect (I) (Instr. 4)	11. Nature of Indirect Beneficial Ownership (Instr. 4)		
					Code	v	(A) (D	D)	Date Exercisab		Expiration Date	Title	or Nur of	ount nber res						

Explanation of Responses:

1. Represents shares of restricted stock that were received as supplemental presiding director compensation and that vest on the first anniversary of the grant date if the reporting person remains a member of the Company's board of directors, subject to earlier vesting upon certain events including death, disability and retirement from the board after serving out his full term because the director is not standing for reelection at the end of the term.

Remarks:

/s/ Ronald D. McCall

05/24/2007

** 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.