

-----  
 OMB APPROVAL  
 -----

OMB Number  
 Expires:  
 Estimated average burden  
 hours per response ..... 0.5  
 -----

U.S. SECURITIES AND EXCHANGE COMMISSION  
 Washington, D.C. 20549

FORM 4

STATEMENT OF CHANGES IN BENEFICIAL OWNERSHIP

Filed pursuant to Section 16(a) of the Securities Exchange Act of 1934,  
 Section 17(a) of the Public Utility Holding Company Act of 1935 or  
 Section 30(f) of the Investment Company Act of 1940

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

1. Name and Address of Reporting Person\*

Leer Steven F.  
 -----  
 (Last) (First) (Middle)  
 -----  
 CityPlace One, Suite 300  
 -----  
 (Street)  
 St. Louis Missouri 63141  
 -----  
 (City) (State) (Zip)

2. Issuer Name and Ticker or Trading Symbol

Arch Coal, Inc. (ACI)

3. IRS Identification Number of Reporting Person, if an Entity (Voluntary)

4. Statement for Month/Year

February, 1999

5. If Amendment, Date of Original (Month/Year)

6. Relationship of Reporting Person to Issuer  
 (Check all applicable)

Director  10% Owner  
 Officer (give title below)  Other (specify below)

President and Chief Executive Officer

7. Individual or Joint/Group Filing (Check applicable line)

Form filed by one Reporting Person  
 Form filed by more than one Reporting Person

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

1. Title of Security (Instr. 3)	2. Transaction Date (mm/dd/yy)	3. Transaction Code (Instr. 8)		4. Securities Acquired (A) or Disposed of (D) (Instr. 3, 4 and 5)			5. Amount of Securities Beneficially Owned at End of Month (Instr. 3 and 4)	6. Owner- ship Form: Direct (D) or Indirect (I) (Instr.4)	7. Nature of Indirect Beneficial Ownership (Instr. 4)
		Code	V	Amount	(A) or (D)	Price			
Common Stock	2/4/99(1)	I	V	17,091	A	12.00		I	By 401(k)
Common Stock	2/5/99	I	V	15.6922	A	12.75	17,111.1935	I	By 401(k)
							1,010	D	

-----  
-----  
-----  
-----  
-----  
-----  
-----  
=====

(1) The purchase of shares were made by the Arch Coal Thrift Plan Administrator pursuant to the Reporting Person's intraplan transfer and the purchase of the shares occurred over two days.

\* If the Form is filed by more than one Reporting Person, see Instruction 4(b)(v).

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

(Print or Type Responses)

(Over)

(Form 4-07/98)

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. Conver- sion or Exer- cise Price of Deriv- ative Secur- ity	3. Trans- action Date (Month/ Day/ Year)	4. Trans- action 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 Underlying Securities (Instr. 3 and 4)	8. Price of Deriv- ative Secur- ity (Instr. 5)	9. Number of Deriv- ative Secur- ities Bene- ficially Owned at End Month (Instr. 4)	10. Owner- ship Form of Deriv- ative Secur- ity: Direct (D) or In- direct (I) (Instr. 4)	11. Nature of In- direct Bene- ficial Owner- ship (Instr. 4)	
Employee Stock Option (Right to Buy)	10.6875	2/25/99	A V	70,000	(1) 2/25/09	Common Stock	70,000	10.6875	70,000	D	

Explanation of Responses:  
(1) The option vests in four annual installments beginning 2/25/2000 in the following amounts: 1/6, 1/3, 1/3, 1/6.

/s/ Miriam Rogers Singer  
-----  
\*\*Signature of Reporting Person

March 8, 1999  
-----  
Date

\*\* 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 provided is insufficient, see Instruction 6 for procedure.