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

OMB APPROVAL

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

			or Section 30(ff) of the investment Company Act of 1940			
1. Name and Addres  MURPHY TE	s of Reporting Persor	* 1	2. Issuer Name and Ticker or Trading Symbol SMITH A O CORP [ AOS ]		tionship of Reporting Perso all applicable) Director	n(s) to Issuer 10% Owner
(Last) (First) A. O. SMITH CORPORATION 11270 WEST PARK PLACE		(Middle)	3. Date of Earliest Transaction (Month/Day/Year) 02/10/2011	X	Officer (give title below)  Executive Vice Presid	Other (specify below) ent & CFO
(Street) MILWAUKEE (City)	WI (State)	53224 (Zip)	4. If Amendment, Date of Original Filed (Month/Day/Year)	6. Indiv Line) X	ridual or Joint/Group Filing ( Form filed by One Repor Form filed by More than o Person	ting Person

(City) (State)	(Zip)							Person		
	uble I - Non-Derivative S	ecurities Aca	uired	Dier	nosed of a	or Ren	eficially	Owned		
1. Title of Security (Instr. 3)	2. Transaction Date (Month/Day/Year)	2A. Deemed Execution Date, if any (Month/Day/Year)	1		4. Securities Disposed Of			5. Amount of Securities Beneficially Owned Following Reported	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	02/10/2011		М		27,000	A	\$24.02	58,217	D	
Common Stock	02/10/2011		S		100	D	\$41.61	58,117	D	
Common Stock	02/10/2011		S		100	D	\$41.63	58,017	D	
Common Stock	02/10/2011		S		100	D	\$41.64	57,917	D	
Common Stock	02/10/2011		S		400	D	\$41.65	57,517	D	
Common Stock	02/10/2011		S		600	D	\$41.66	56,917	D	
Common Stock	02/10/2011		S		400	D	\$41.67	56,517	D	
Common Stock	02/10/2011		S		700	D	\$41.68	55,817	D	
Common Stock	02/10/2011		S		300	D	\$41.69	55,517	D	
Common Stock	02/10/2011		S		700	D	\$41.7	54,817	D	
Common Stock	02/10/2011		S		500	D	\$41.71	54,317	D	
Common Stock	02/10/2011		S		200	D	\$41.72	54,117	D	
Common Stock	02/10/2011		S		500	D	\$41.74	53,617	D	
Common Stock	02/10/2011		S		300	D	\$41.75	53,317	D	
Common Stock	02/10/2011		S		200	D	\$41.76	53,117	D	
Common Stock	02/10/2011		S		1,000	D	\$41.77	52,117	D	
Common Stock	02/10/2011		S		300	D	\$41.78	51,817	D	
Common Stock	02/10/2011		S		100	D	\$41.79	51,717	D	
Common Stock	02/10/2011		S		500	D	\$41.8	51,217	D	
Common Stock	02/10/2011		S		853	D	\$41.81	50,364	D	
Common Stock	02/10/2011		S		600	D	\$41.83	49,764	D	
Common Stock	02/10/2011		S		100	D	\$41.84	49,664	D	
Common Stock	02/10/2011		S		300	D	\$41.85	49,364	D	
Common Stock	02/10/2011		S		400	D	\$41.86	48,964	D	
Common Stock	02/10/2011		S		200	D	\$41.88	48,764	D	
Common Stock	02/10/2011		S		100	D	\$41.89	48,664	D	
Common Stock	02/10/2011		S		500	D	\$41.9	48,164	D	
Common Stock	02/10/2011		S		500	D	\$41.91	47,664	D	
Common Stock	02/10/2011		S		500	D	\$41.92	47,164	D	

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. Transaction Code (Instr. 8)					5. Amount of Securities Beneficially Owned Following	6. Ownership Form: Direct (D) or Indirect (I) (Instr. 4)	7. Nature of Indirect Beneficial Ownership (Instr. 4)		
	Code V Amount		Amount	(A) or (D)	Price	Reported Transaction(s) (Instr. 3 and 4)						
Common Stock	02/10/2011		S		100	D	\$41.93	47,064	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)	4. Transa Code ( 8)		of Deri Sec Acq (A) o Disp of (I	umber vative urities uired or oosed O) (Instr. and 5)	6. Date Exercisable and Expiration Date (Month/Day/Year)  (Month/Day/Year)  Title and Amount of Securities Underlying Derivative Security (Instr. 3 and 4)		ies g Security	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				
Employee Stock Options (Right to Buy)	\$24.02	02/10/2011		M			27,000	(1)	01/03/2016	Common Stock	27,000	\$0	113,400	D	

#### **Explanation of Responses:**

1. The employee stock options were granted on 01/03/2006 under the A. O. Smith Combined Executive Incentive Compensation Plan, a transaction exempt under Rule 16b-3. The options became exercisable in three annual installments of 1/3 of the award starting on 01/03/2007.

## Remarks:

James F. Stern, Attorney-in-Fact for Terry M. Murphy

02/11/2011

\*\* Signature of Reporting Person

Date

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

- $^{\star}$  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.

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