

UNISOURCE ENERGY CORP  
 Form 4/A  
 August 21, 2006

**FORM 4**

**UNITED STATES SECURITIES AND EXCHANGE COMMISSION  
 Washington, D.C. 20549**

OMB APPROVAL

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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 OF SECURITIES**

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(h) of the Investment Company Act of 1940

(Print or Type Responses)

1. Name and Address of Reporting Person \*  
 CARTER JOHN L

2. Issuer Name and Ticker or Trading Symbol  
 UNISOURCE ENERGY CORP  
 [UNS]

5. Relationship of Reporting Person(s) to Issuer

(Check all applicable)

(Last) (First) (Middle)

1 S. CHURCH AVENUE, UE183

(Street)

TUCSON, AZ 85701

(City) (State) (Zip)

3. Date of Earliest Transaction (Month/Day/Year)  
 08/21/2006

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

4. If Amendment, Date Original Filed(Month/Day/Year)  
 08/16/2006

6. 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 (Month/Day/Year) | 2A. Deemed Execution Date, if any (Month/Day/Year) | 3. Transaction Code (Instr. 8) | 4. Securities Acquired (A) or Disposed of (D) (Instr. 3, 4 and 5) |   |        | 5. Amount of Securities Beneficially Owned Following Reported Transaction(s) (Instr. 3 and 4) | 6. Ownership Form: Direct (D) or Indirect (I) (Instr. 4) | 7. Nature of Ownership (Instr. 4) |
|---------------------------------|--------------------------------------|--|--------------------------------|---|---|--------|---|--|-----------------------------------|
|                                 |                                      |  |                                | Code  | V | Amount |   |  |                                   |
| Common Stock                    | 08/16/2006                           |  | M                              |   |   | 1,200  | \$ 17   | 1,200  | D                                 |
| Common Stock                    | 08/16/2006                           |  | M                              |   |   | 1,200  | \$ 16.68  | 1,200  | D                                 |

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

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 (9-02)

**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. 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 Underlying Securities (Instr. 3 and 4) | 8. Amount or Number of Shares |
|--|--|--------------------------------------|--|--------------------------------|---|--|---|-------------------------------|
| Employee Stock Option                      | \$ 17  | 08/16/2006                           |  | M                              | 1,200   | <u>(1)</u> 10/04/2006                                    | Common Stock  | 1,200                         |
| Employee Stock Option                      | \$ 16.68   | 08/16/2006                           |  | M                              | 1,200   | <u>(2)</u> 01/03/2007                                    | Common Stock  | 1,200                         |

## Reporting Owners

| Reporting Owner Name / Address                                   | Relationships |           |         |       |
|--|---------------|-----------|---------|-------|
|  | Director      | 10% Owner | Officer | Other |
| CARTER JOHN L<br>1 S. CHURCH AVENUE<br>UE183<br>TUCSON, AZ 85701 | X             |           |         |       |

## Signatures

C. David Lamoreaux, attorney  
in fact 08/21/2006

\_\_Signature of Reporting Person Date

## Explanation of Responses:

- \* 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).
- (1) Options vested in three equal installments on October 4, 1997, 1998 and 1999.
- (2) The options vested in three equal installments on January 3, 1998, 1999 and 2000.

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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