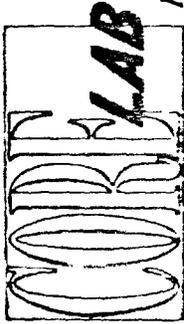


Before The  
**OIL CONSERVATION COMMISSION**  
 Santa Fe, New Mexico  
 Case No. 10443 Exhibit No. 8  
 Submitted by: Marathon Oil Company  
 Hearing Date: 3/05/92

WELL LOG/LOGHEAD HEADLINE FINAL WATER



**CORE LABORATORIES, INC.**

*Petroleum Reservoir Engineering*

COMPANY THE OHIO OIL COMPANY DATE ON 4-20-55 FILE NO. WP-3-246 FG  
 WELL STATE NO. DONALD ACCOUNT NO. A DATE OFF 4-30-55 ENGRS. BOONE, FOX  
 FIELD SOUTH EUNICE FORMATION AS NOTED ELEV. 3560' DP  
 COUNTY LEA STATENEX, MEXICO DRG. FLD. WATER BASE MUD CORES DIAMOND 3.5"  
 LOCATION SEC. 15, T-22-S, R-36-E

REMARKS SAMPLED BY A REPRESENTATIVE OF  
 THE OHIO OIL COMPANY

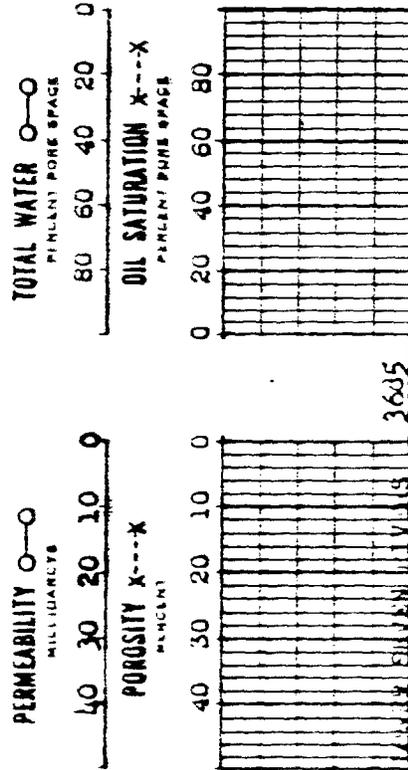
BAND LESTONE CONGLOMERATE CHEST  
 SHALE DOLOMITE

This report and data are based on observations and analysis conducted by the client or those used for other purposes and not subject to the usual conditions of liability. The interpretation of these data is the responsibility of the client. The oil, gas, and minerals contained herein are not guaranteed by the client and are subject to change without notice. The client is responsible for the accuracy of the data and for the interpretation of the data. The client is responsible for the accuracy of the data and for the interpretation of the data.

**TABULAR DATA and INTERPRETATION**

DEPTH FEET	FORM NO.	RESIDUAL SATURATION % PORE SPACE		PROD.
		OIL	TOTAL WATER	

**COMPLETION COREGRAPH**



3685

ANHYDRITE

JALMAT POOL

3300

3400

3500

JALMAT POOL

SOUTH EUNICE POOL (POLITICAL BOUNDARY)

LOWER SEVEN RIVERS 'A'

QUEEN

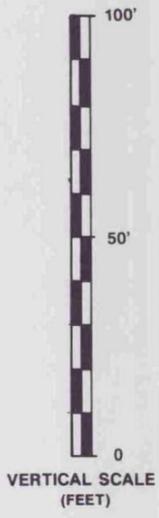
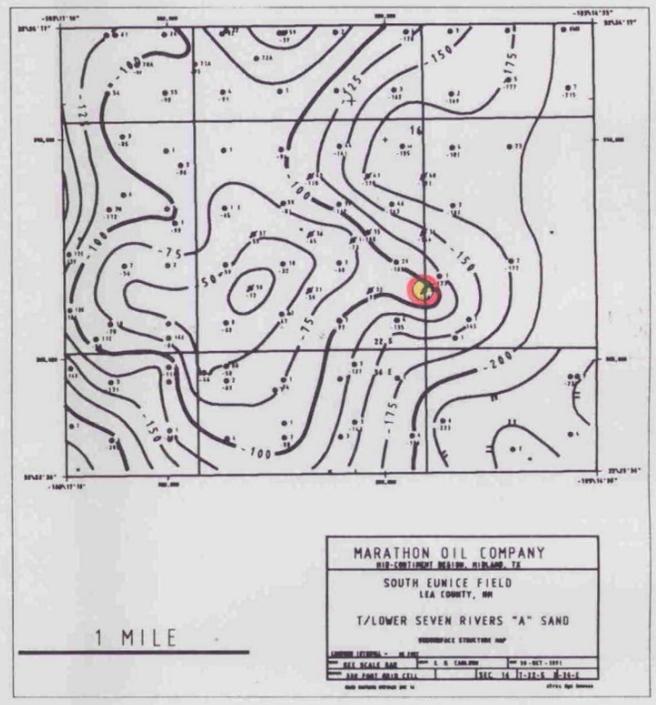
3700

FLOODABLE UPPER QUEEN

LOWER QUEEN SANDS

3800

1-240 Ft	GR (API units)	KINT	DCAL	
0.0	150.0 (GAP)	1000.0 0.0100 (MD)	-20.000 (IN) 20.000	
			effective porosity	
		KOIL 50.0000 (PU) 0.0000		
		1000.0 0.0100 (MD)	SW 100.0 0.0 (PU)	
		KGAS 1000.0 0.0100 (MD)	SXO 100.0 0.0 (PU)	
		KWTR 1000.0 0.0100 (MD)		
		oil perm	residual	
		gas perm	water	
		water perm		



Before The  
OIL CONSERVATION COMMISSION  
Santa Fe, New Mexico  
Case No. 10443 Exhibit No. 9  
Submitted by: Marathon Oil Company  
Hearing Date: 3/05/92

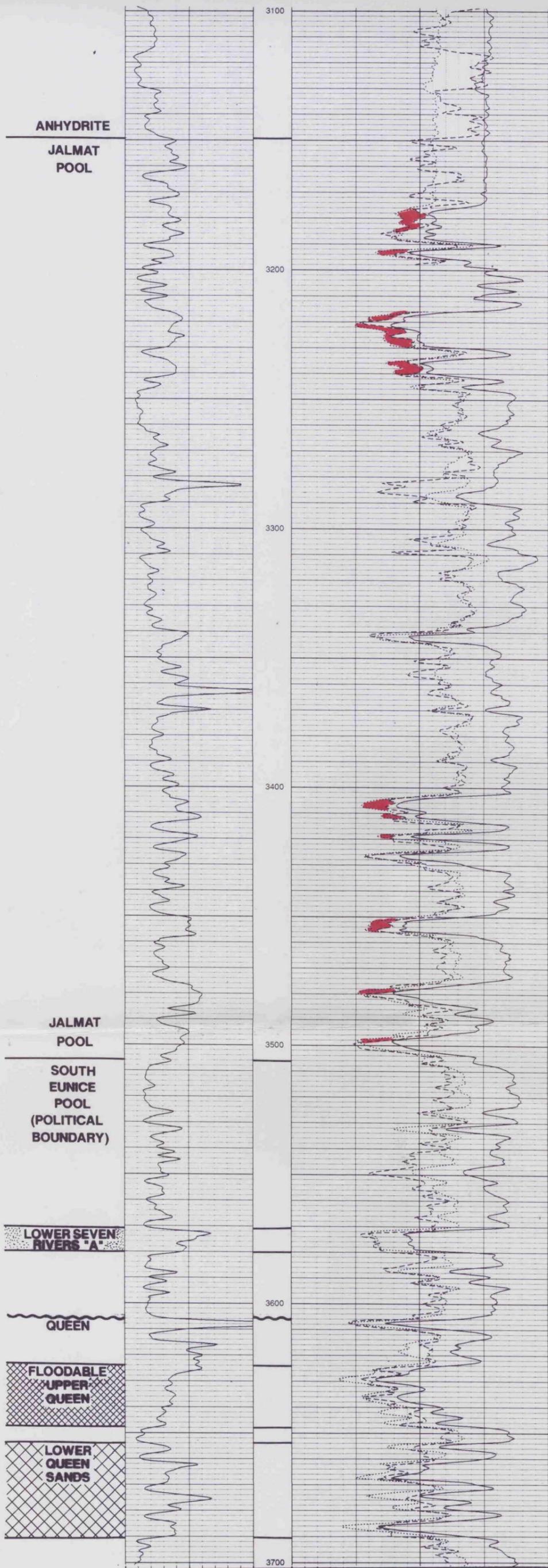
**M**  
MARATHON OIL COMPANY  
MID-CONTINENT REGION

**SOUTH EUNICE POOL**  
LEA COUNTY, NEW MEXICO

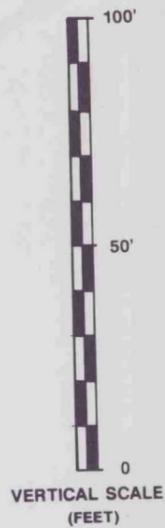
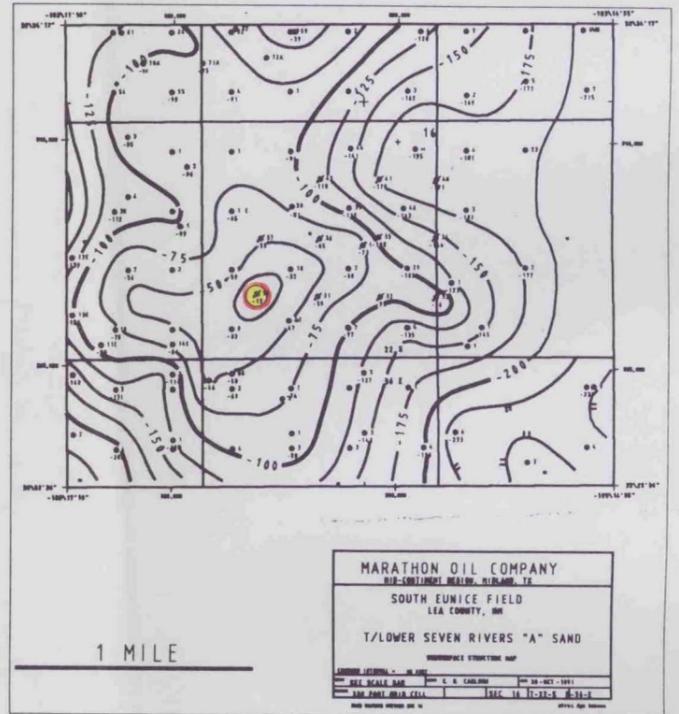
MCDONALD STATE ACCT 1 LEASE, SECTION 16, T-22-S, R-36-E

**WELL 33**  
**ELAN (COMPUTED) LOG**  
(SCHLUMBERGER)

USED: LDT, CNL, DLL, MSFL GR LOGS  
LOGGED: JUNE 19, 1991 COMPUTED: JANUARY 30, 1992



Gamma Ray (API units)	1.240 Ft	DT
0.00 (GAP) 150.000		100.00 (US/F) 40.000
		matrix corrected pbhc
		30.00 (PU) -10.000
		matrix corrected nphi
		30.00 (PU) -10.000
		GOR



Before The  
OIL CONSERVATION COMMISSION  
Santa Fe, New Mexico  
Case No. 10443 Exhibit No. 10  
Submitted by: Marathon Oil Company  
Hearing Date: 3/05/92

**M**  
MARATHON OIL COMPANY  
MID-CONTINENT REGION

**SOUTH EUNICE POOL**  
LEA COUNTY, NEW MEXICO

MCDONALD STATE ACCT 1 LEASE; SECTION 16, T-22S, R-36-E

**WELL 30**  
**MATRIX-CORRECTED POROSITY LOG**  
(SCHLUMBERGER)

CASED - HOLE SONIC / CASED - HOLE NEUTRON  
LOGGED: JUNE 24, 1991 COMPUTED: JANUARY 30, 1992

STATE OF NEW MEXICO  
ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT  
OIL CONSERVATION DIVISION

IN THE MATTER OF THE HEARING CALLED  
BY THE OIL CONSERVATION DIVISION  
FOR THE PURPOSE OF CONSIDERING:

CASE No. 10443

APPLICATION OF MARATHON OIL COMPANY  
FOR AN AMENDMENT TO DIVISION ORDER  
R-9503, MCDONALD STATE A/C-1 LEASE  
WATERFLOOD PROJECT, LEA COUNTY,  
NEW MEXICO

CERTIFICATE OF MAILING

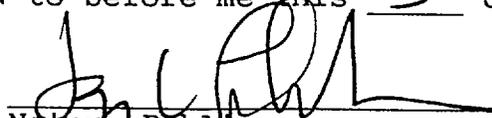
AND

COMPLIANCE WITH ORDER R-8054

W. THOMAS KELLAHIN, attorney in fact and authorized representative of MARATHON OIL COMPANY, states that the notice provisions of Division Rule 1207 (Order R-8054) have been complied with, that Applicant has caused to be conducted a good faith diligent effort to find the correct addresses of all interested parties entitled to receive notice, that on January 24, 1992, I caused to be mailed by certified mail return-receipt requested notice of this hearing and a copy of the application for the above referenced case along with the cover letter, at least twenty days prior to the hearing set for March 5, 1992, to the parties shown in the application as evidenced by the attached copies of return receipt cards, and that pursuant to Division Rule 1207, notice has been given at the correct addresses provided by such rule.

  
W. Thomas Kellahin

SUBSCRIBED AND SWORN to before me this 3<sup>RD</sup> day of  
March, 1992

  
Notary Public

My Commission Expires:

10/7/95

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
 Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. 2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  
 ARCO Oil and Gas Co.  
 P.O. Box 1610  
 Midland, TX 79702

4. Article Number  
**P 355 567 733**

Type of Service:  
 Registered  Insured  
 Certified  COD  
 Express Mail  Return Receipt for Merchandise

Always obtain signature of addressee or agent and **DATE DELIVERED**.

5. Signature - Addressee  
 X *[Signature]*

6. Signature - Agent  
 X

7. Date of Delivery  
 JAN 28 1989

8. Addressee's Address (ONLY if requested and fee paid)

PS Form 3811, Apr. 1989

\*U.S.G.P.O. 1989-238-815

DOMESTIC RETURN RECEIPT

NTK - MARATHA

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
 Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. 2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  
 Conoco, Inc.  
 P.O. Box 1959  
 Midland, TX 79702

4. Article Number  
**P 355 567 734**

Type of Service:  
 Registered  Insured  
 Certified  COD  
 Express Mail  Return Receipt for Merchandise

Always obtain signature of addressee or agent and **DATE DELIVERED**.

5. Signature - Addressee  
 X

6. Signature - Agent  
 X *[Signature]*

7. Date of Delivery  
 JAN 28 1989

8. Addressee's Address (ONLY if requested and fee paid)

PS Form 3811, Apr. 1989

\*U.S.G.P.O. 1989-238-815

DOMESTIC RETURN RECEIPT

NTK MARATHA

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
 Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. 2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  
 Meridian Oil Inc.  
 21 Desta Drive  
 Midland, TX 79701

4. Article Number  
**P 355 567 735**

Type of Service:  
 Registered  Insured  
 Certified  COD  
 Express Mail  Return Receipt for Merchandise

Always obtain signature of addressee or agent and **DATE DELIVERED**.

5. Signature - Addressee  
 X

6. Signature - Agent  
 X *[Signature]*

7. Date of Delivery  
 1-29-89

8. Addressee's Address (ONLY if requested and fee paid)

PS Form 3811, Apr. 1989

\*U.S.G.P.O. 1989-238-815

DOMESTIC RETURN RECEIPT

ILLEGIBLE

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. (Extra charge)      2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  Doyle Hartman P.O. Box 10426 Midland, TX 79701	4. Article Number <b>P355 567 736</b>
	Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input type="checkbox"/> Certified <input checked="" type="checkbox"/> COD <input checked="" type="checkbox"/> Express Mail <input checked="" type="checkbox"/> Return Receipt for Merchandise
	Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature - Addressee X <i>[Signature]</i>	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature - Agent X <i>[Signature]</i>	
7. Date of Delivery <b>1-30-92</b>	

PS Form 3811, Apr. 1989      \*U.S.G.P.O. 1989-238-815      **WTK - MARATHON** DOMESTIC RETURN RECEIPT

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. (Extra charge)      2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  Headington Oil INC. 7557 Rambler Rd, Ste 1150 Dallas, TX 75231	4. Article Number <b>P355 567 737</b>
	Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input checked="" type="checkbox"/> COD <input checked="" type="checkbox"/> Express Mail <input checked="" type="checkbox"/> Return Receipt for Merchandise
	Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature - Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature - Agent X <i>[Signature]</i>	
7. Date of Delivery <b>1/28/92</b>	

PS Form 3811, Apr. 1989      \*U.S.G.P.O. 1989-238-815      **WTK - MARATHON** DOMESTIC RETURN RECEIPT

**SENDER:** Complete items 1 and 2 when additional services are desired, and complete items 3 and 4.  
Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.

1.  Show to whom delivered, date, and addressee's address. (Extra charge)      2.  Restricted Delivery (Extra charge)

3. Article Addressed to:  Dallas McCasland P.O. Box 206 Eunice, NM 88231	4. Article Number <b>P355 567 738</b>
	Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input checked="" type="checkbox"/> COD <input checked="" type="checkbox"/> Express Mail <input checked="" type="checkbox"/> Return Receipt for Merchandise
	Always obtain signature of addressee or agent and DATE DELIVERED.
5. Signature - Addressee X	8. Addressee's Address (ONLY if requested and fee paid)
6. Signature - Agent X <i>[Signature]</i>	
7. Date of Delivery <b>1-28-92</b>	

PS Form 3811, Apr. 1989      \*U.S.G.P.O. 1989-238-815      **WTK - MARATHON** DOMESTIC RETURN RECEIPT

**ILLEGIBLE**

HAND DELIVERED TO:

Commissioner of Public Lands  
State of New Mexico  
State Land Office  
310 Old Santa Fe Trail  
Santa Fe, New Mexico 87501

<p>● <b>SENDER:</b> Complete items 1 and 2 when additional services are desired, and complete items 3 and 4. Put your address in the "RETURN TO" Space on the reverse side. Failure to do this will prevent this card from being returned to you. The return receipt fee will provide you the name of the person delivered to and the date of delivery. For additional fees the following services are available. Consult postmaster for fees and check box(es) for additional service(s) requested.</p> <p>1. <input type="checkbox"/> Show to whom delivered, date, and addressee's address. (Extra charge)      2. <input type="checkbox"/> Restricted Delivery (Extra charge)</p>	
3. Article Addressed to:  Dasco Land Corp. P.O. Box 2454 Hobbs, NM 88240	4. Article Number <b>P355 567 740</b> Type of Service: <input type="checkbox"/> Registered <input type="checkbox"/> Insured <input checked="" type="checkbox"/> Certified <input type="checkbox"/> COD <input type="checkbox"/> Express Mail <input type="checkbox"/> Return Receipt for Merchandise
5. Signature - Addressee <b>X</b> <i>John Wallace</i>	Always obtain signature of addressee or agent and DATE DELIVERED.
6. Signature - Agent <b>X</b>	8. Addressee's Address (ONLY if requested and fee paid)
7. Date of Delivery <b>1-27-92</b>	

PS Form 3811, Apr. 1989

\* U.S.G.P.O. 1989-238-815

DOMESTIC RETURN RECEIPT

**WTK - MARATHON**