

**SOUTHWEST PETROLEUM LAND SERVICES L.L.C.**  
**100 N. PENNSYLVANIA**  
**ROSWELL, NEW MEXICO 88203**

(505) 622-6713 OFFICE  
(505) 626-6879 CELLPHONE

(505) 622-9282 FAX  
(505) 622-3615 HM

April 19, 2006

Oil Conservation Division  
New Mexico State Land Office  
1220 S. St. Francis Drive  
Santa Fe, NM 87505

2006 APR 21 PM 11 56

RE: McKay Oil Corp.  
Non-Standard Location of the LL&E B Federal #4  
Township 6 South, Range 22 East, NMPM, Sec. 1, Unit F  
Chaves County, NM

Gentlemen:

McKay Oil Corp. desire to drill a location 860' from the north line, and 1887' from the west line of Unit F in Sec. 1 of Township 6 South, Range 22 East, NMPM (See Attached Survey Plat). Due to archeological and geological concerns, McKay Oil Corp. requests an unorthodox location.

The well was originally proposed to be at 660' from the north line and 1980' from the west line of Section 1. (See attached Location Verification Map). However, vast archaeology in the region limited the well to be moved to the south and to a particular spot. (See attached archaeological report) As a result of this move and because this is an adjustment Section, this location fell directly on a quarter section line. The geology dictated that the well stay as far east and north as possible. (See attached maps) McKay Oil Corp. owns all of the operating rights surrounding this location that are toward the unorthodox well location encroachment. (See attached map)

Therefore, McKay Oil Corporation is requesting that the OCD grant administrative approval to the unorthodox location at 860' from the north line and 1887' from the west line in Unit F of Section 1, Township 6 South, Range 22 East, NMPM. This location has been approved by the Southern New Mexico Archaeological Services, Inc. and the BLM.

Page 2 of 2  
Oil Conservation Division  
April 19, 2006

Thank you for your cooperation and assistance in this matter.

Sincerely,

A handwritten signature in black ink, appearing to read "Jim Schultz", written in a cursive style.

James L. Schultz, Manager and  
as Agent for McKay Oil Corp.

cc: McKay Oil Corp.

State of New Mexico

Energy, Minerals and Natural Resources Department

DISTRICT I  
1825 N. FRANCIS DR., ROSA, NM 88240

DISTRICT II  
1301 W. GRAND AVENUE, ALBUQUA, NM 88210

DISTRICT III  
1000 Rio Brazos Rd., Antec, NM 87410

DISTRICT IV  
1220 S. ST. FRANCIS DR., SANTA FE, NM 87505

OIL CONSERVATION DIVISION  
1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505

Form C-102  
Revised JUNE 10, 2003  
Submit to Appropriate District Office  
State Lease - 4 Copies  
Fee Lease - 3 Copies

WELL LOCATION AND ACREAGE DEDICATION PLAT

AMENDED REPORT

API Number		Pool Code	Pool Name
Property Code	Property Name <b>LL &amp; E FEDERAL B</b>		Well Number 4
OGRID No.	Operator Name <b>McKAY OIL CORPORATION</b>		Elevation 4226'

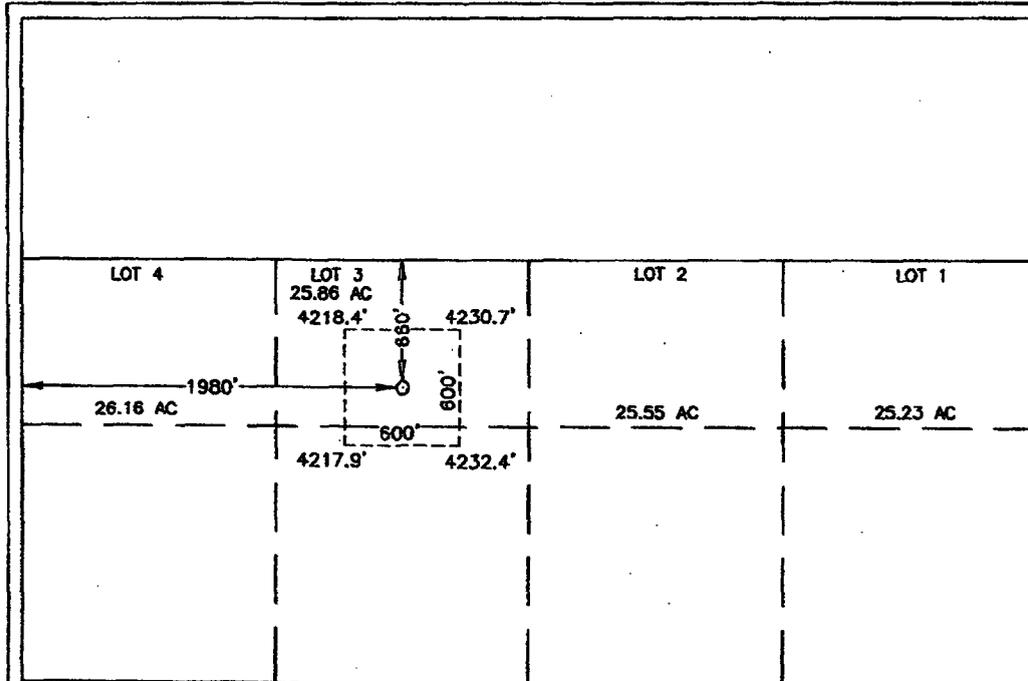
Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
3	1	6-S	22-E		660	NORTH	1980	WEST	CHAVES

Bottom Hole Location if Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
Dedicated Acres		Joint or Infill	Consolidation Code		Order No.				

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



GEODETTIC COORDINATES  
NAD 27 NME

Y=1026689.9 N  
X=396099.9 E

LAT.=33°49'18.49" N  
LONG.=104°40'31.57" W

OPERATOR CERTIFICATION

I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.

*James Schultz*  
Signature  
**James Schultz**  
Printed Name  
Agent  
Title  
10/11/2004  
Date

SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

SEPTEMBER 14, 2004

Date Surveyed 9/8/04 JR  
Signature of Seal of Professional Surveyor  
**GARY G. EIDSON**

*Gary G. Eidson*  
04.11.1144  
Certification No. GARY EIDSON 12841

12841

DISTRICT I  
1625 N. FRENCH DR., HOBBS, NM 88240

DISTRICT II  
1301 W. GRAND AVENUE, ARTESIA, NM 88210

DISTRICT III  
1000 Rio Brazos Rd., Aztec, NM 87410

DISTRICT IV  
1220 S. ST. FRANCIS DR., SANTA FE, NM 87505

State of New Mexico  
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION  
1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505

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WELL LOCATION AND ACREAGE DEDICATION PLAT

AMENDED REPORT

API Number	Pool Code	Pool Name
Property Code	Property Name LL & E FEDERAL B	Well Number 4
OGRID No.	Operator Name McKAY OIL CORPORATION	Elevation 4222'

Surface Location

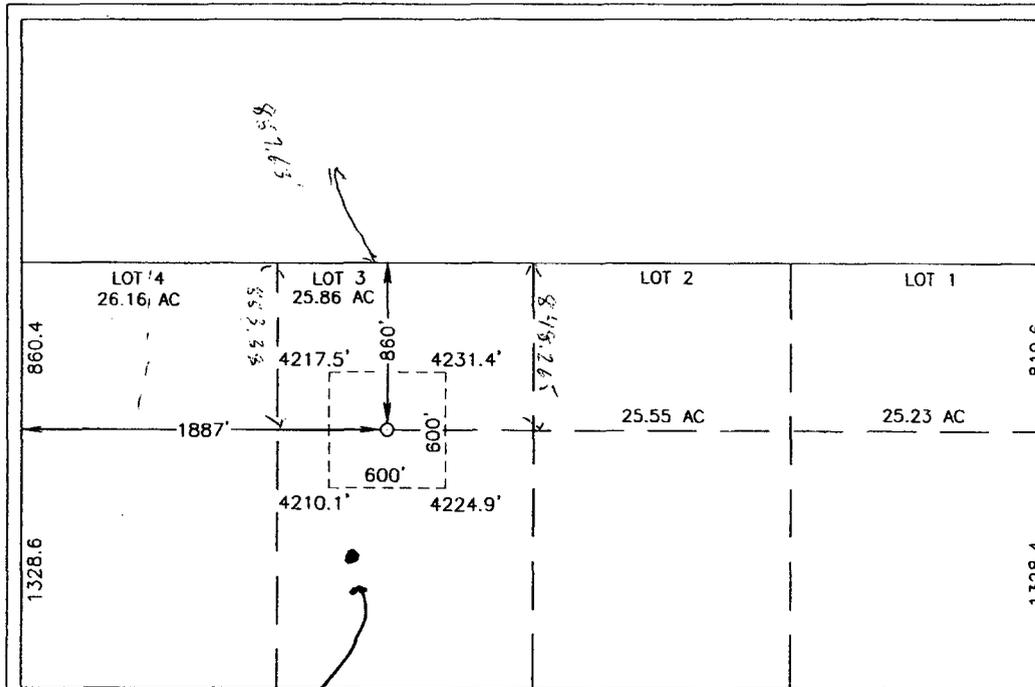
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
F	1	6-S	22-E		860	NORTH	1887	WEST	CHAVES

Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
160			

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



**OPERATOR CERTIFICATION**

I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.

Signature  
James L. Schultz

Printed Name  
Agent

Title  
8/22/2005

Date

---

**SURVEYOR CERTIFICATION**

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

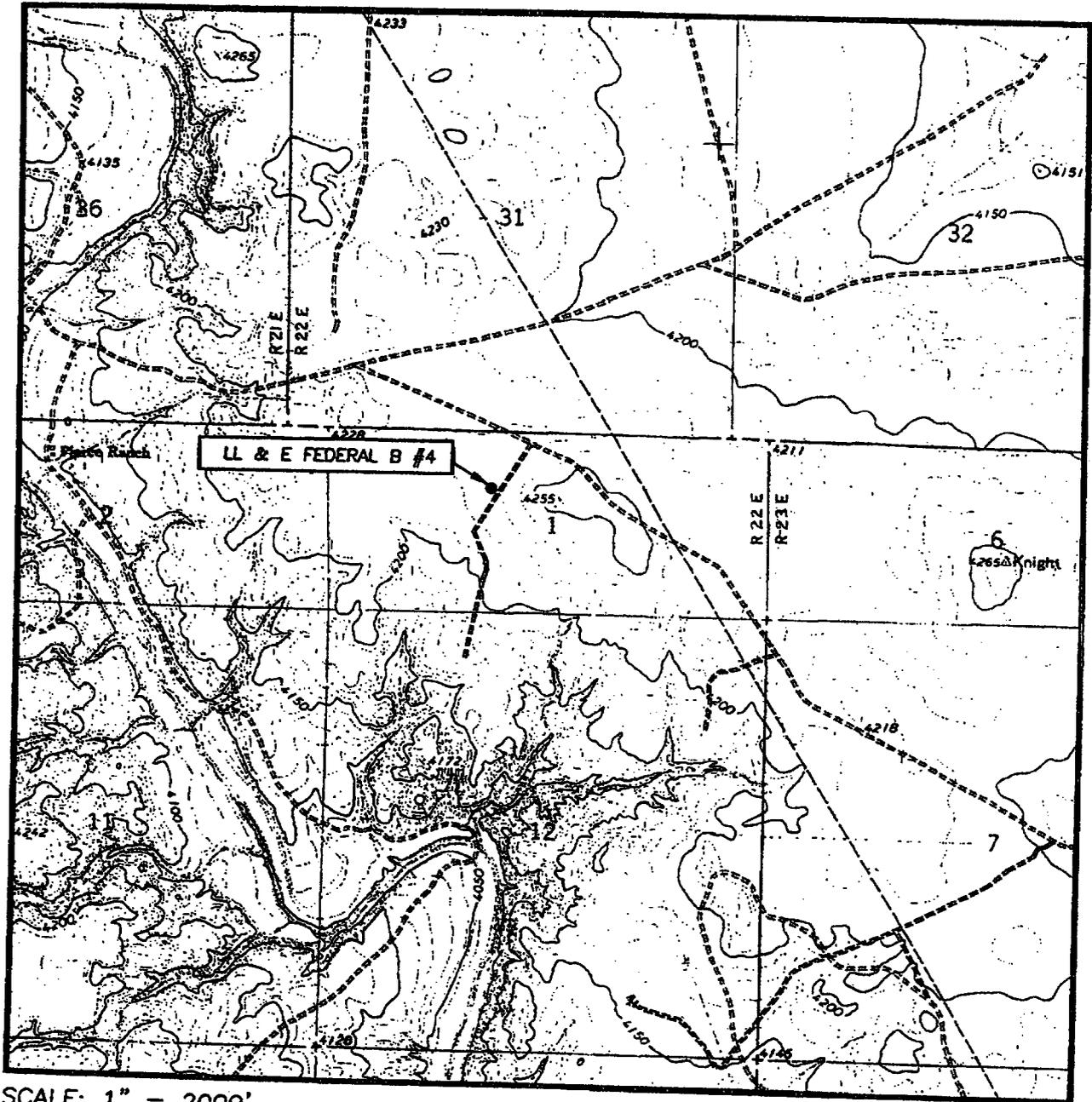
AUGUST 2, 2005

Date Surveyed  
Signature & Seal of Professional Surveyor  
Professional Surveyor  
NEW MEXICO  
8/17/05  
85.11.1172

Certificate No. GARY EIDSON 12841

LL & E Fed. #4  
30-005-62377 GEODETIC COORDINATES  
NAD 27 NME  
660' FSL - 1650' FDU  
Spud: 8-10-1987  
Y=1026490.5 N  
X=396011.8 E  
LAT.=33°49'16.52" N  
LONG.=104°40'32.61" W

# LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:  
MESA SW, N.M. - 10'

SEC. 1 TWP. 6-S RGE. 22-E

SURVEY N.M.P.M.

COUNTY CHAVES

DESCRIPTION 660' FNL & 1980' FWL

ELEVATION 4226'

OPERATOR McKAY OIL CORPORATION

LEASE LL & E FEDERAL B

U.S.G.S. TOPOGRAPHIC MAP  
MESA SW, N.M.

PROVIDING SURVEYING SERVICES  
SINCE 1948  
**JOHN WEST SURVEYING COMPANY**  
412 N. DAL PASO  
HOBBBS, N.M. 88240  
(505) 383-3117

<b>1. (For BLM Use)</b> BLM Report No.		<b>2. (For BLM Use)</b> Reviewers Initials/Date _____ Accepted ( ) Rejected ( )		<b>3. NMCRIS Number:</b> 94963	
<b>4. Type of Report:</b>		Negative ( )		Positive ( Yes )	
<b>5. Title of Report:</b> A Class III Cultural Resource Inventory Report for the LL & E Federal B Number 4 Proposed Original and Alternate Well Locations, and Pipeline Right-of-Way, and Sites LA 150,044, LA 150,045, and LA 150,046 Sections 1 and 12, T.6S, R.22E Chaves County, New Mexico  <b>Author):</b> Doralene Sanders and Gail Wimberly					
<b>6. Fieldwork Date(s)</b> June 16; July 8, 10-12; August 2; and September 22, 2005				<b>7. Report Date:</b> October 6, 2005	
<b>8. Consultant Name/Address:</b> Southern New Mexico Archaeological Services, Inc. Post Office Box 1, Bent, New Mexico 88314 <b>Direct Charge:</b> Joe Ben Sanders <b>Field Personnel Name(s):</b> Joe Ben Sanders, R.D. Bonnell, R. Hall, and J. Barnett <b>Phone Number:</b> (505) 671-4797					
<b>9. Cultural Resource Permit Number:</b> 145-2920-04-O			<b>10. Consultant Report Number:</b> SNMAS-05NM-1822		
<b>11. Clients Name:</b> McKay Oil Corporation <b>Responsible Individual:</b> Jim Schultz <b>Address:</b> P.O. Box 2014 Roswell, New Mexico 88202-2014 <b>Phone Number:</b> 505-623-4735			<b>12. Client Project Number:</b>		
<b>13. Land Status</b>	<b>BLM</b>	<b>State</b>	<b>Private</b>	<b>Other</b>	<b>Total</b>
<b>a. Area Surveyed (acres)</b>	25.6	-	-	-	25.6
<b>b. Area of Effect (acres)</b>	6.4	-	-	-	6.4
<b>14. Linear:</b>		<b>Length</b> 6,094.4 ft	<b>Width</b> 100 ft		
<b>15. Location (Map[s] Attached)</b> <b>a. State:</b> New Mexico <b>b. County:</b> Chaves <b>c. BLM Office:</b> Roswell Field Office <b>d. Nearest Town:</b> Roswell, NM  <b>e. Legal Description:</b> T.6S, R.22E, Sections 1 and 12 <b>Well Pad ¼s:</b> (Original) Section 1, S/2 NE/4 SW/4 (Alternate) Section 1, SW/4 NE/4 SW/4; W/2 SE/4 NE/4 SW/4; N/2 N/2 SE/4 SW/4 <b>Pipeline Right-of-Way ¼s:</b> Section 1, W/2 SE/4 SW/4; NE/4 SE/4 SW/4; W/2 SW/4 SE/4; SE/4 SW/4 SE/4; W/2 SE/4 SE/4 Section 12, W/2 NE/4 NW/4; SE/4 NE/4 NW/4; W/2 SW/4 NE/4  <b>f. Well Pad Footages:</b> (Original) 660 ft FNL and 1,980 ft FWL (Alternate) 860 ft FNL and 1,887 ft FWL  <b>g. USGS 7.5' Map Name(s), Date(s), and Code(s):</b> Mesa SW, NM (Photorevised 1982), 33104-G6					

**16. Project Data:**

**a. Records Search:** **Date(s) of BLM field Review:** June 15, 2005 and September 21, 2005  
**Name of Reviewer(s):** Joe Ben Sanders and R.D. Bonnell with Pat Flannery;  
and Doralene Sanders with Pat Flannery  
**Date of ARMS Data Review:** June 1, 2005 and September 21, 2005  
**Name of Reviewer(s):** Gail Wimberly

**Findings (see Field Office requirements to determine area to be reviewed during records search):**

The records search revealed three previously recorded sites (LA 59920, BLM 3417, and LA 150,008) located within a quarter-mile radius of the proposed project. There are five previous inventories in the project area, listed under BLM Report Numbers 87-18, 87-61-I-J, 87-18-B, 87-60, and SNMAS-05NM-1823.

**b. Description of Undertaking:** McKay Oil Corporation requested a Class III cultural resource inventory for the proposed LL & E Federal B Number 4 original well location, staked at 660 ft FNL and 1,980 ft FWL, in Section 1, T.6S, R.22E, Chaves County, New Mexico. One new site (LA 150,044) was encountered on the borehole and continuing east, so it was recommended that the location be re-staked at 860 ft FNL and 1,887 ft FWL, and another inventory conducted.

For the original well location, an area 600 ft by 600 ft was inventoried. For the alternate well location, areas 100 ft by 600 ft and 500 ft by 250 ft were inventoried. The impact area for the proposed alternate well location is 300 ft by 300 ft. A barrier fence and archaeological monitoring is recommended before construction of the alternate well location begins, for avoidance of Site LA 150,044.

A proposed pipeline right-of-way was also inventoried during the current work. The proposed pipeline right-of-way is 6,294.4 ft in length, with an impact area of 30 ft by 6,294.4 ft. An area 100 ft by 6,094.4 ft was inventoried for the proposed pipeline right-of-way. Two new sites (LA 150,045 and LA 150,046) were encountered during the inventory for the proposed right-of-way. Both sites were already marked with pin flags by ASC, but had not yet been recorded; therefore, the sites were recorded on LA Site Records as new sites, site datum's were placed on each site, and both sites were mapped and photographed.

The proposed pipeline right-of-way begins in Section 1 at an existing valve, and trends south/southwest 254.7 ft, thence 1,314.9 ft southwest, thence 180.1 ft northwest, thence 275.5 ft north, thence 1,244.0 ft west/northwest, thence 246.0 ft west, thence 187.7 ft southwest, thence 526.7 ft southeast, thence 891.4 ft southwest, thence 1,173.4 ft southeast, ending on the north portion of the proposed LL & E Federal C Number 3 well location, in Section 12, T.6S, R.22E.

**c. Environmental Setting (NCRS soil designation: vegetative community; elevation; etc.):**

The project is located on open, rolling plain and hill slopes east of Fifteen Mile Arroyo del Macho. Soils vary from shallow, windblown, earthy soils with sandy soil veneer overlying gypsum bedrock, to sandy and/or gypsum soils. The area vegetation is dominated by grasses, along with lesser amounts of gyp coldenia, Mormon tea, and various other forbs and cacti. The elevation is 4,226 ft above msl.

**d. Field Methods (transect intervals; crew size; time in field, etc.):** The field crews consisted of four persons. The proposed original and alternate well locations were inventoried by walking 12 zigzag transects (spaced at 15-m intervals) across each of the staked locations. The proposed pipeline right-of-way was inventoried by walking 15-m-interval transects, parallel to and 50 ft on both sides of the right-of-way centerline. In addition, Sites LA 150,044, LA 150,045, and LA 150,046 were recorded on LA Site Records, mapped, and photographed. Total time spent in the field was 46 hours.

**e. Artifacts Collected? No**

**17. Cultural Resource Findings:** Three sites (LA 150,044, LA 150,045, and LA 150,046) and seven isolated occurrences were encountered. See main report for site specifics.

**a. Location/Identification of Each Resource:**

Isolate one is a complete flake of maroon quartzite, with no cortex/use/wear, measuring 3 x 2 x 1 cm. Isolate one is located at UTM coordinates (NAD 1927, Zone 13) 530023 E and 3742192 N.

Isolate two consists of 1) a medial flake fragment of milky white quartzite, with no cortex/use/wear, measuring 2 x 1 x 1 cm; and 2) a proximal flake fragment of maroon quartzite, with no cortex/use/wear, measuring 3 x 2 x 2 cm. Isolate two is located at UTM coordinates 530034 E and 3742184 N.

Isolate three is a single flake fragment (lateral edge) of white chert, with no cortex/use/wear, measuring 2 x 2 x 1 cm. Isolate three is located at UTM coordinates 530033 E and 3742166 N.

Isolate four is a single proximal flake fragment of beige chert, with no cortex/use/wear, measuring 2 x 2 x 1 cm. Isolate four is located at UTM coordinates 530010 E and 742239 E.

Isolate five is a single complete flake of white chert, with a collapsed platform, 20% cortex, no use/wear, measuring 3 x 2 x 1 cm. Isolate five is located at UTM coordinates 529989 E and 3742219 N.

Isolate six consists of two artifacts within a 10 x 1 m area: 1) a medial flake fragment of maroon quartzite, with no cortex/use/wear, measuring 2 x 2 x 1 cm; and 2) a complete flake of beige chert, with a single-facet platform, no cortex/use/wear, measuring 2 x 2 x 1 cm. Isolate six is located at UTM coordinates 530286 E and 3742053 N.

Isolate seven is a single core flake of tan quartzite, with 10% cortex, no use/wear, measuring 4 x 2 x 1 cm. Isolate seven is located at UTM coordinates 530105 E and 3742124 N.

**b. Evaluation of Significance of Each Resource:** The research potential of the isolated occurrences is considered exhausted by field recordation. See main report for site specifics.

**18. Management Summary (Recommendations):**

During the current inventories, three new sites (LA 150,044, LA 150,045, and LA 150,046) and seven isolated occurrences were encountered. The research potential of the isolated occurrences was exhausted by field recordation.

Archaeological clearance is recommended for the proposed alternate well location, with the stipulation that a barrier fence and archaeological monitoring be conducted for avoidance of Site LA 150,044. The original location is to be abandoned. Site LA 150,044 is considered potentially eligible to the NRHP under criterion d (information potential), as only a representative sample of the assemblage was analyzed in the field; therefore, the site's information potential is not exhausted through this recording.

Archaeological clearance is recommended for the proposed pipeline right-of-way, with no stipulations. Two sites (LA 150,045 and LA 150,046) were encountered during inventory of the proposed right-of-way. Site LA 150,046 is located on the proposed right-of-way, and Site LA 150,045 is located within close proximity (viewing range, previously pin flagged by ASC) but outside of the proposed right-of-way. Site LA 150,046 is not considered eligible to the NRHP under any given criteria. The complete artifact assemblage was analyzed in the field, with no diagnostics noted. Trowel tests conducted in several areas on the site failed to encounter subsurface deposits, and the potential for such is low due to the lack of soil depth. Therefore, the research potential of this site is considered exhausted through the current recordation. No avoidance is recommended, providing SHPO and the reviewing BLM archaeologists concur.

Site LA 150,045 is considered potentially eligible to the NRHP under criterion d, as only a representative sample of the assemblage was analyzed in the field, and the site's information potential is not exhausted through this recording. Since the site is not located directly within the proposed right-of-way, no impacts to the site are expected.

One other site, labeled /BLM 3417, was located on the BLM records check map from a previous project in 1987, which only gave this number for identification. The site should have been relocated around Station 42+29, but no cultural materials were encountered in this area. No information was available from ARMS, and the database only listed Site LA 59920 in Section 1, T.6S, R.22E. Therefore, no site update was undertaken during the current work.

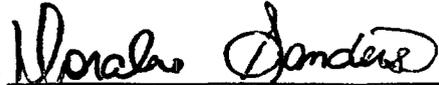
If at any time, cultural resources are encountered during construction of the proposed alternate well location or pipeline right-of-way, all construction activity is to cease, and the Roswell BLM Field Office archaeologist and SNMAS are to be notified immediately.

The final clearance, recommendations, and/or any stipulations will be set forth by the reviewing BLM archaeologist.

19.

I certify that the information provided above is correct and accurate, and meets all applicable BLM Standards.

Responsible Archaeologist(s)



October 6, 2005

Signature for  
Joe Ben Sanders  
Principal Investigator

Date

THE ABOVE COMPLETES A NEGATIVE REPORT. IF ELIGIBLE OR POTENTIALLY ELIGIBLE PROPERTIES ARE INVOLVED,  
THE ABOVE WILL BE THE TITLE PAGE AND ABSTRACT FOR A COMPLETE REPORT

**A Class III Cultural Resource Inventory Report for the  
LL & E Federal B Number 4 Proposed Original and Alternate Well Locations,  
and Pipeline Right-of-Way,  
and Sites LA 150,044, LA 150,045, and LA 150,046  
Sections 1 and 12, T.6S, R.22E  
Chaves County, New Mexico**

Written by:  
Doralene Sanders  
and  
Gail Wimberly

Prepared for:  
McKay Oil Corporation  
P.O. Box 2014  
Roswell, New Mexico 88202-2014

Prepared by:  
Southern New Mexico Archaeological Services, Inc.  
Post Office Box 1  
Bent, New Mexico 88314

Date  
October 6, 2005

Report Number: SNMAS-05NM-1822  
NMCRIS Project Activity Number 94963

BLM Cultural Resources Permit Number: 145-2920-04-O

## **2. Description of Project, Undertaking, or Proposed Action:**

McKay Oil Corporation requested a Class III cultural resource inventory for the proposed LL & E Federal B Number 4 original well location, staked at 660 ft FNL and 1,980 ft FWL, in Section 1, T.6S, R.22E, Chaves County, New Mexico. One new site (LA 150,044) was encountered on the borehole and continuing east, so it was recommended that the location be re-staked at 860 ft FNL and 1,887 ft FWL, and another inventory conducted.

For the original well location, an area 600 ft by 600 ft was inventoried. For the alternate well location, areas 100 ft by 600 ft and 500 ft by 250 ft were inventoried. The impact area for the proposed alternate well location is 300 ft by 300 ft. A barrier fence and archaeological monitoring is recommended before construction of the alternate well location begins, for avoidance of Site LA 150,044.

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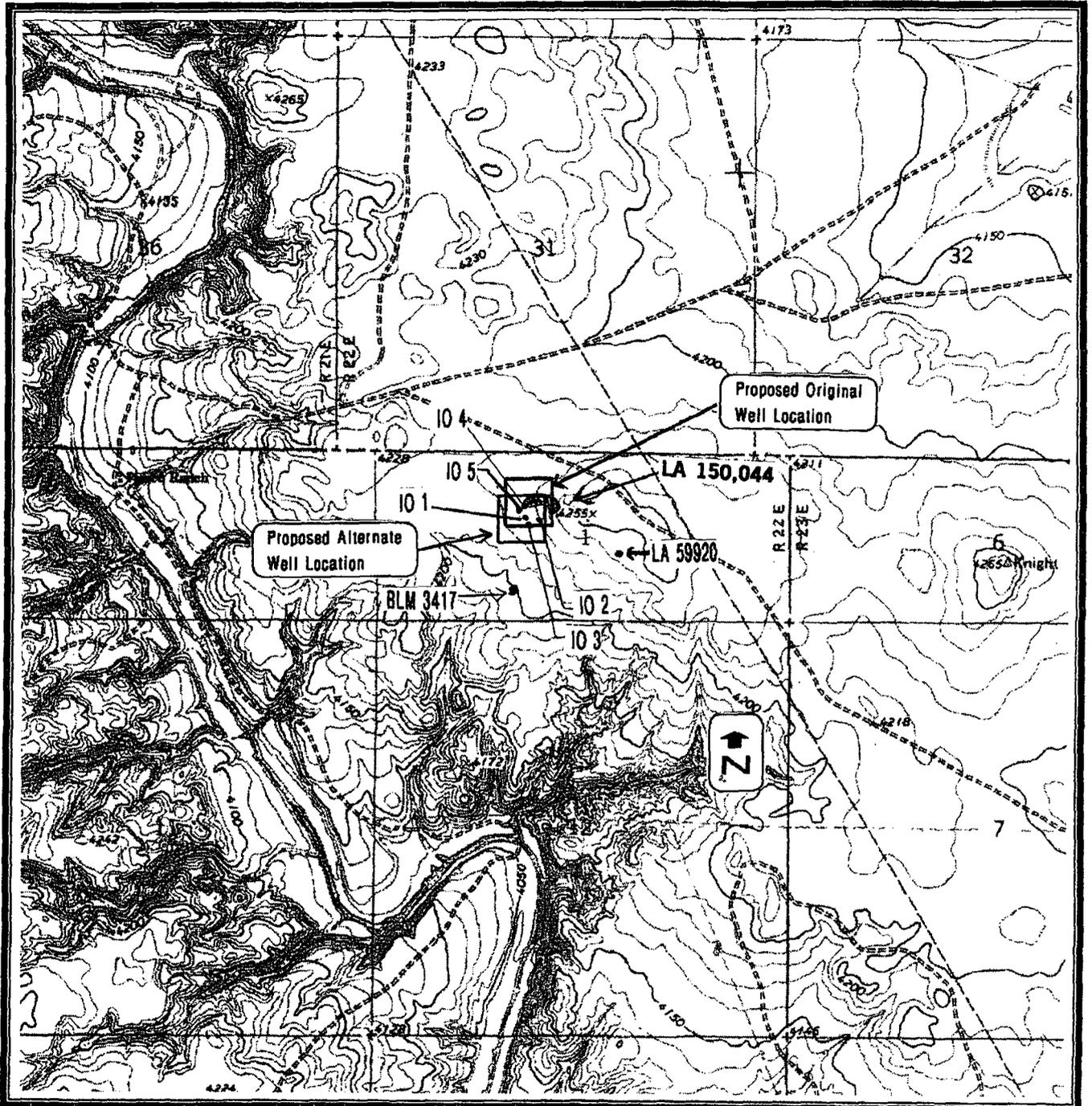
The proposed pipeline right-of-way begins in Section 1 at an existing valve, and trends south/southwest 254.7 ft, thence 1,314.9 ft southwest, thence 180.1 ft northwest, thence 275.5 ft north, thence 1,244.0 ft west/northwest, thence 246.0 ft west, thence 187.7 ft southwest, thence 526.7 ft southeast, thence 891.4 ft southwest, thence 1,173.4 ft southeast, ending on the north portion of the proposed LL & E Federal C Number 3 well location, in Section 12, T.6S, R.22E.

## **3. Project Location:**

The project is located in southeastern New Mexico, on lands administered by the Roswell District BLM Field Office located in Roswell, New Mexico. The survey area for the proposed project is located east of Fifteen Mile Arroyo del Macho, in Sections 1 and 12, T.6S, R.22E, Chaves County. This area is depicted on the USGS Mesa SW, NM (Photorevised 1982) 7.5-minute topographic map (USGS Code 33104-G6).

## **4. Environmental Setting:**

The project is located on open, rolling plain and hill slopes east of Fifteen Mile Arroyo del Macho. Soils vary from shallow, windblown, earthy soils with sandy soil veneer overlying gypsum bedrock, to sandy and/or gypsum soils. The area vegetation is dominated by grasses, along with lesser amounts of gyp coldenia, Mormon tea, and various other forbs and cacti. The elevation is 4,226 ft above msl.

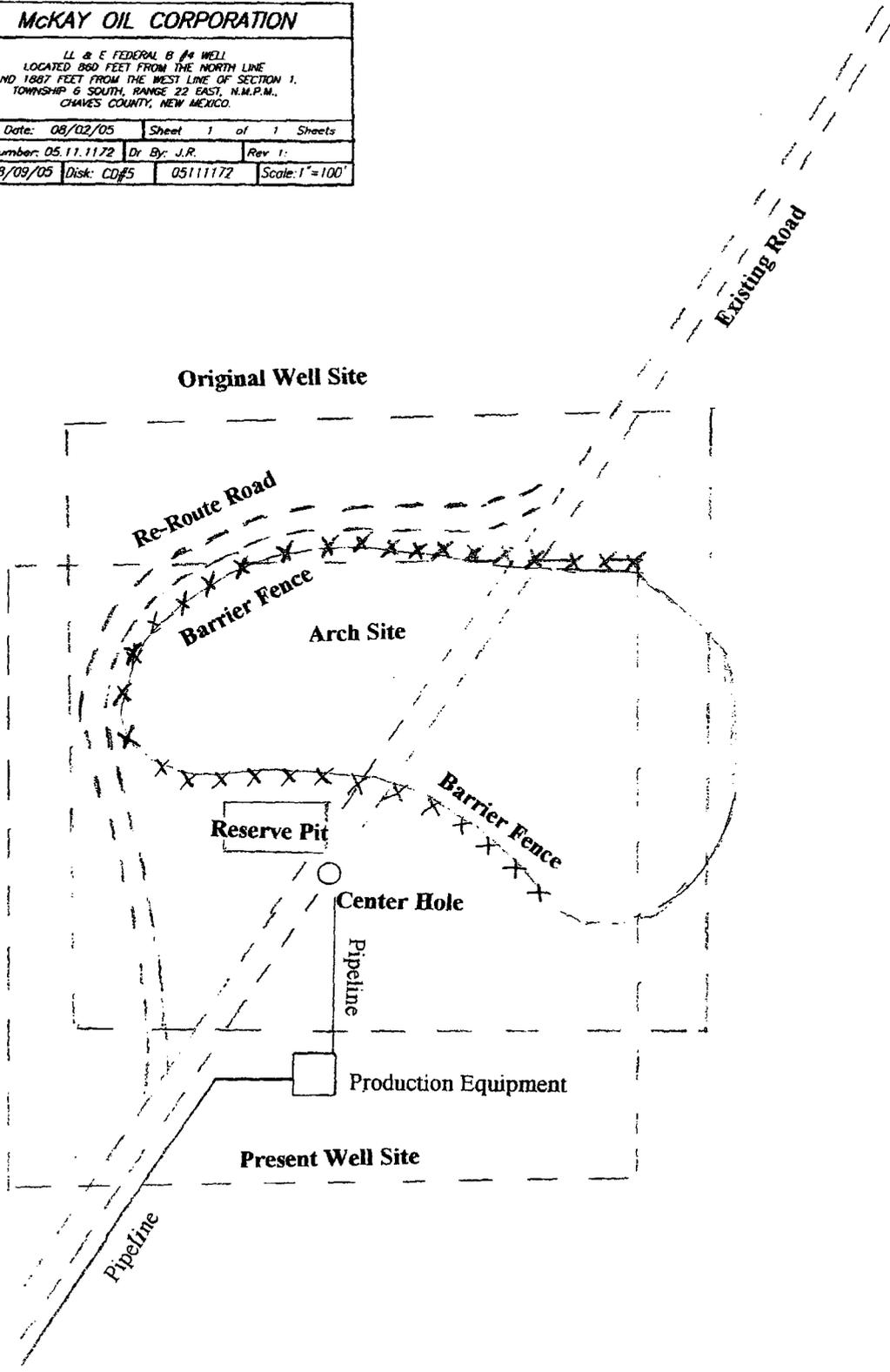
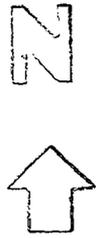


**Figure 1: Survey Area McKay Oil Corporation**  
**LL & E Federal B Number 4 Proposed Original and Alternate Well Locations,**  
**and Site LA 150,044**  
**Section 1, T.6S, R.22E**  
**USGS Mesa SW, NM (Photorevised 1982) 7.5' topo map**  
**Chaves County, New Mexico**  
**Scale 1:24,000**

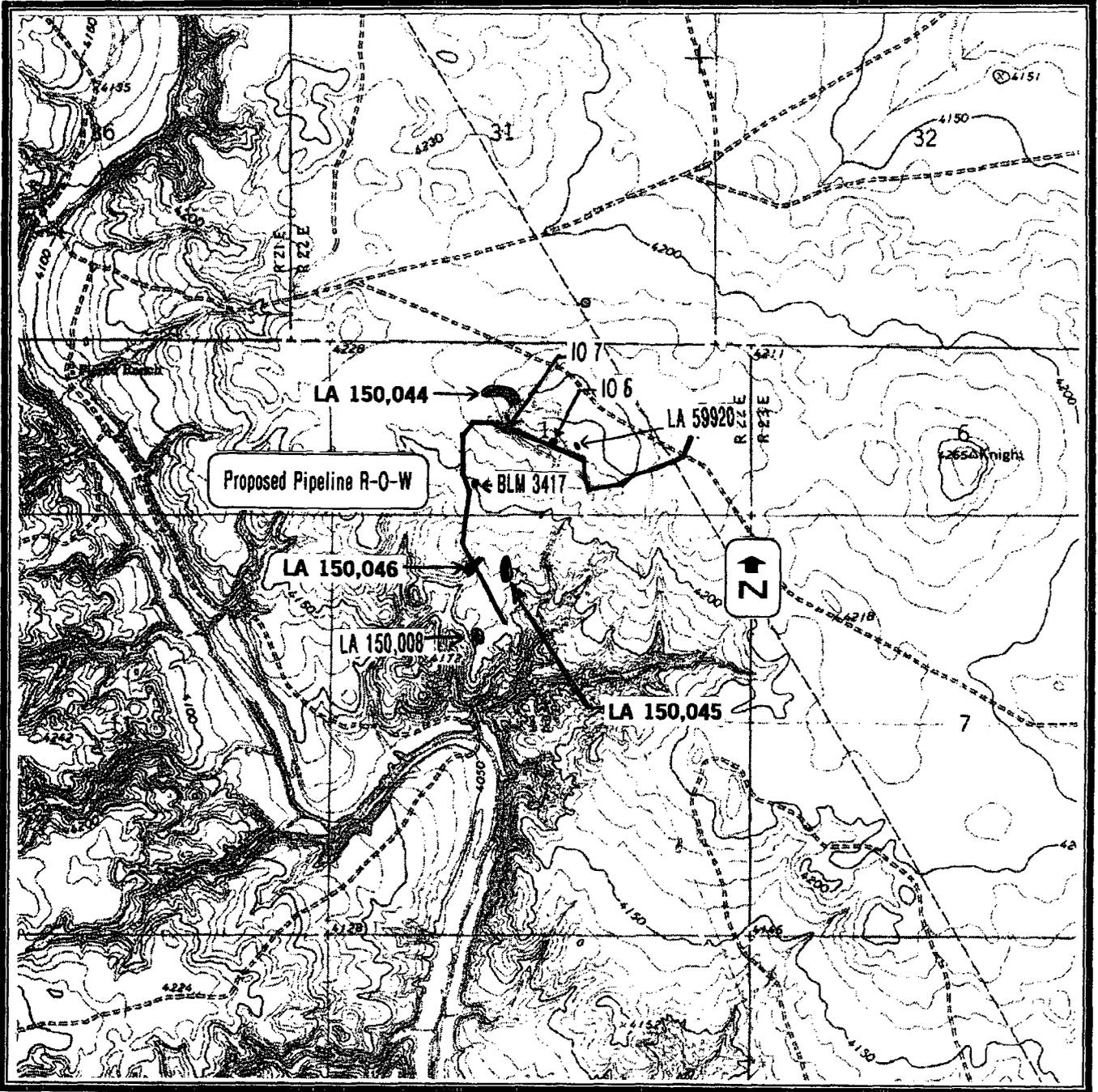
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**Southern New Mexico Archaeological Services, Inc.**

<b>McKAY OIL CORPORATION</b>			
LL & E FEDERAL B #4 WELL LOCATED 860 FEET FROM THE NORTH LINE AND 1887 FEET FROM THE WEST LINE OF SECTION 1, TOWNSHIP 6 SOUTH, RANGE 22 EAST, N.M.P.M., CHAVES COUNTY, NEW MEXICO.			
Survey Date:	08/02/05	Sheet	1 of 1 Sheets
W.O. Number:	05.11.1172	Dr. By:	J.R.
Date:	08/09/05	Disk:	CD#5
			Scale: 1"=100'







**Figure 2: Survey Area    McKay Oil Corporation**  
**LL & E Federal B Number 4 Proposed Pipeline Right-of-Way,**  
**and Sites LA 150,045 and LA 150,046**  
**Sections 1 and 12, T.6S, R.22E**  
**USGS Mesa SW, NM (Photorevised 1982) 7.5' topo map**  
**Chaves County, New Mexico**  
**Scale 1:24,000**

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**Southern New Mexico Archaeological Services, Inc.**

State of New Mexico

Energy, Minerals and Natural Resources Department

Form C-102

Revised JUNE 10, 2003

Submit to Appropriate District Office  
(State Lease - 4 Copies)  
Fee Lease - 2 Copies

**OIL CONSERVATION DIVISION**  
1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505

DISTRICT I  
1001 N. FRANKLIN BL., SUITE 200, SANTA FE, NM 87505

DISTRICT II  
1001 N. FRANKLIN BL., SUITE 200, SANTA FE, NM 87505

DISTRICT III  
1000 W. GARDNER BL., ALBUQUERQUE, NM 87102

DISTRICT IV  
1000 W. GARDNER BL., ALBUQUERQUE, NM 87102

**WELL LOCATION AND ACREAGE DEDICATION PLAT**

AMENDED REPORT

API Number	Pool Code	Pool Name
Property Code	Property Name <b>LL &amp; E FEDERAL B</b>	Well Number <b>4</b>
OCRD No.	Operator Name <b>McKAY OIL CORPORATION</b>	Elevation <b>4226'</b>

Surface Location

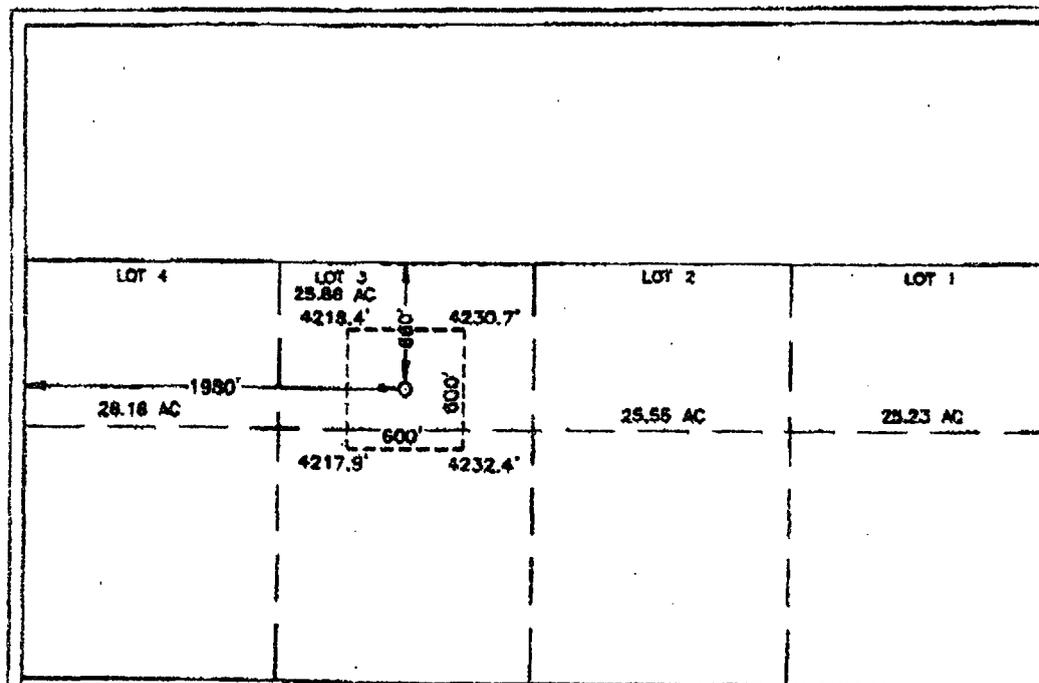
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
3	1	6-S	22-E		660	NORTH	1980	WEST	CHAVES

Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County

Dedicated Acres	Joint or Buffer	Consolidation Code	Order No. <b>SNHAS-05NM-1822</b>
-----------------	-----------------	--------------------	-------------------------------------

**NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION.**



GEODETIC COORDINATES  
NAD 27 NME  
  
Y=1026689.9 N  
X=398099.9 E  
  
LAT.=35°49'18.49" N  
LONG.=104°40'31.57" W

**OPERATOR CERTIFICATION**

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief.

**ORIGINAL**

*James Schultz*  
Signature

**James Schultz**  
Printed Name

**Agent**  
Title

**10/11/2004**  
Date

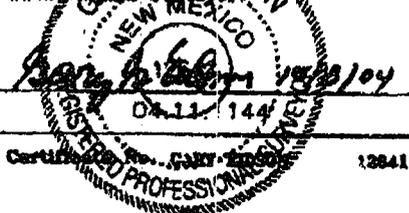
**SURVEYOR CERTIFICATION**

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

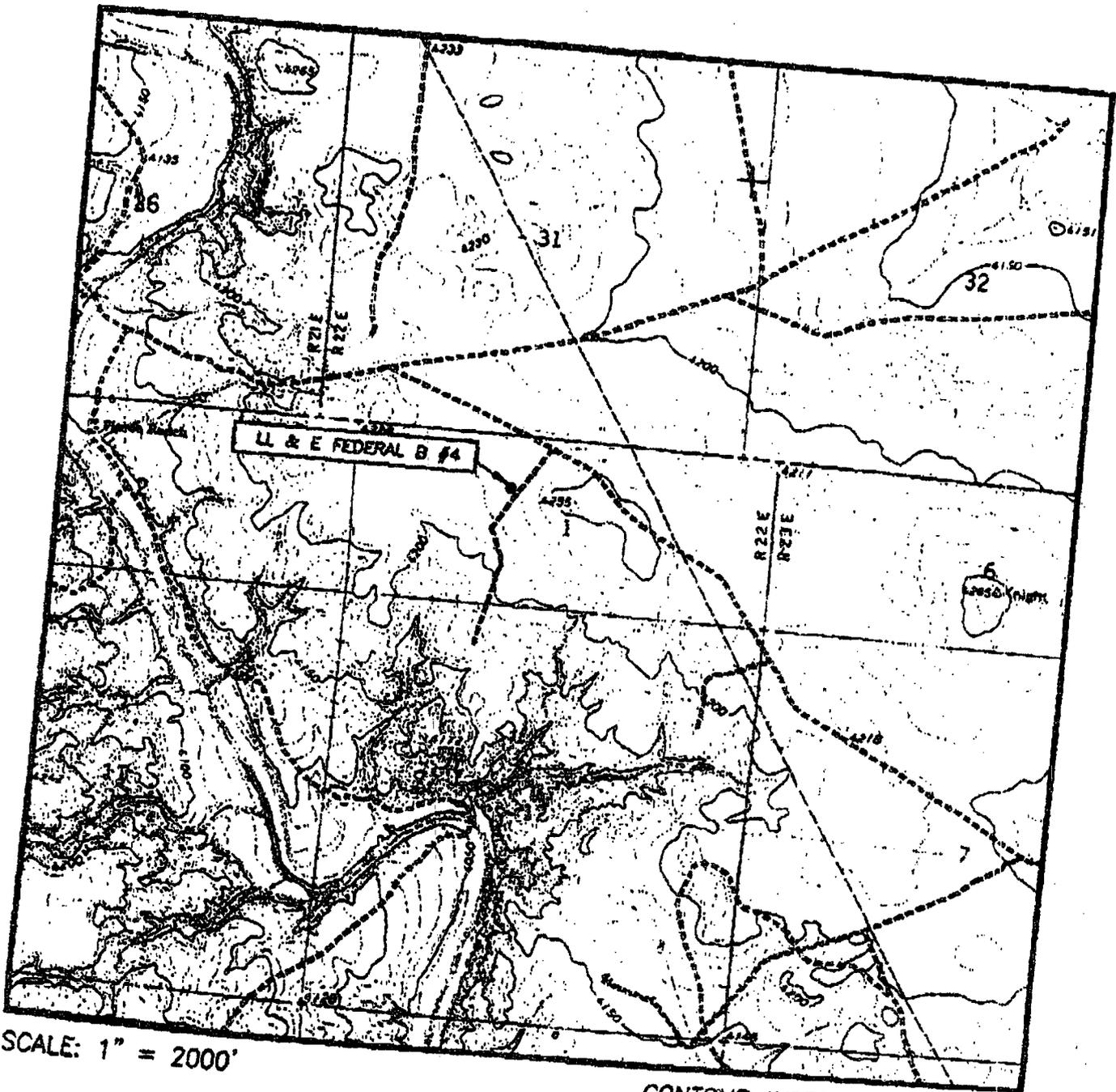
**SEPTEMBER 14, 2004**

Date Surveyed: 9/14/04 JR

Signature: *Greg Eidsen*  
Professional Seal



# LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:  
MESA SW, N.M. - 10'

SEC. 1 TWP. 6-S RGE. 22-E

SURVEY N.M.P.M.

COUNTY CHAVES

DESCRIPTION 660' FNL & 1980' FWL

ELEVATION 4226'

OPERATOR McKAY OIL CORPORATION

LEASE LL & E FEDERAL B

U.S.G.S. TOPOGRAPHIC MAP  
MESA SW, N.M.



ORIGINAL


 PROVIDING SURVEYING SERVICES  
 SINCE 1946  
**JOHN WEST SURVEYING COMPANY**  
 412 N. DAL. PASO  
 HOOVER, TEX. 79209  
 (806) 319-3117

30MAS-05NM-1822

DISTRICT I  
1625 N. FRENCH DR., HOBBS, NM 88240

DISTRICT II  
1301 W. GRAND AVENUE, ARTESIA, NM 88210

DISTRICT III  
1000 Rio Brazos Rd., Artec, NM 87410

DISTRICT IV  
1220 S. ST. FRANCIS DR., SANTA FE, NM 87505

State of New Mexico  
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION  
1220 SOUTH ST. FRANCIS DR.  
Santa Fe, New Mexico 87505

Form C-102  
Revised JUNE 10, 2003  
Submit to Appropriate District Office  
State Lease - 4 Copies  
Fee Lease - 3 Copies

WELL LOCATION AND ACREAGE DEDICATION PLAT

AMENDED REPORT

API Number		Pool Code	Pool Name
Property Code	Property Name LL & E FEDERAL B		Well Number 4
OGRID No.	Operator Name McKAY OIL CORPORATION		Elevation 4222'

Surface Location

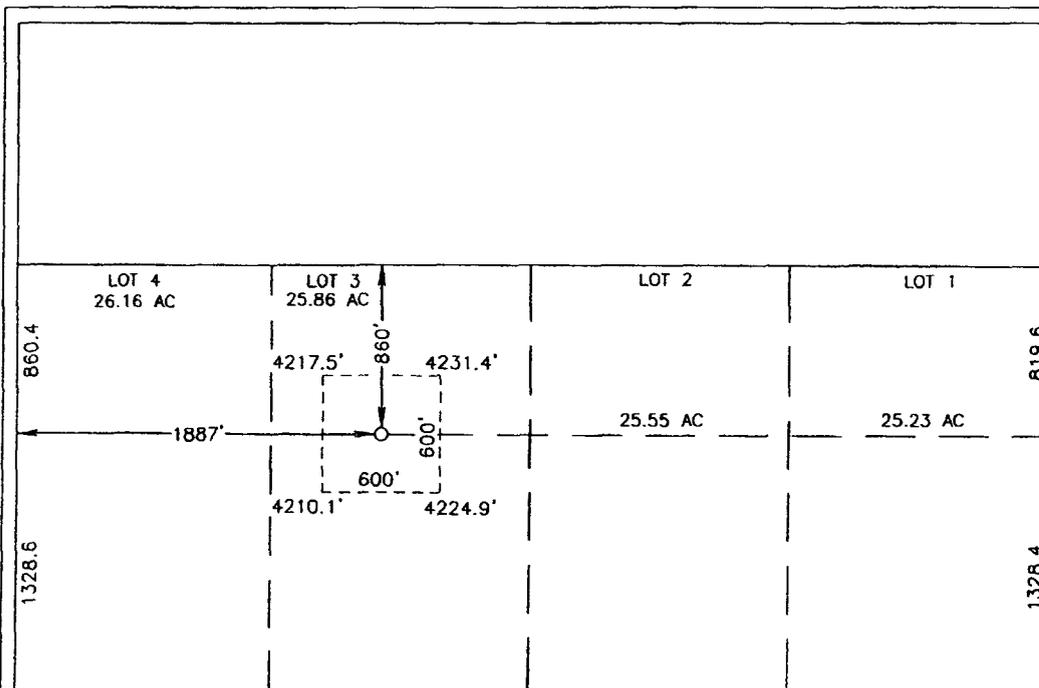
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
F	1	6-S	22-E		860	NORTH	1887	WEST	CHAVES

Bottom Hole Location If Different From Surface

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County

Dedicated Acres	Joint or Infill	Consolidation Code	Order No. SNMAS-05NM-1822
-----------------	-----------------	--------------------	------------------------------

NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION



GEODETIC COORDINATES  
NAD 27 NME

Y=1026490.5 N  
X=396011.8 E

LAT.=33°49'16.52" N  
LONG.=104°40'32.61" W

OPERATOR CERTIFICATION

I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.



ORIGINAL

Signature

Printed Name

Title

Date

SURVEYOR CERTIFICATION

I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.

AUGUST 2, 2005

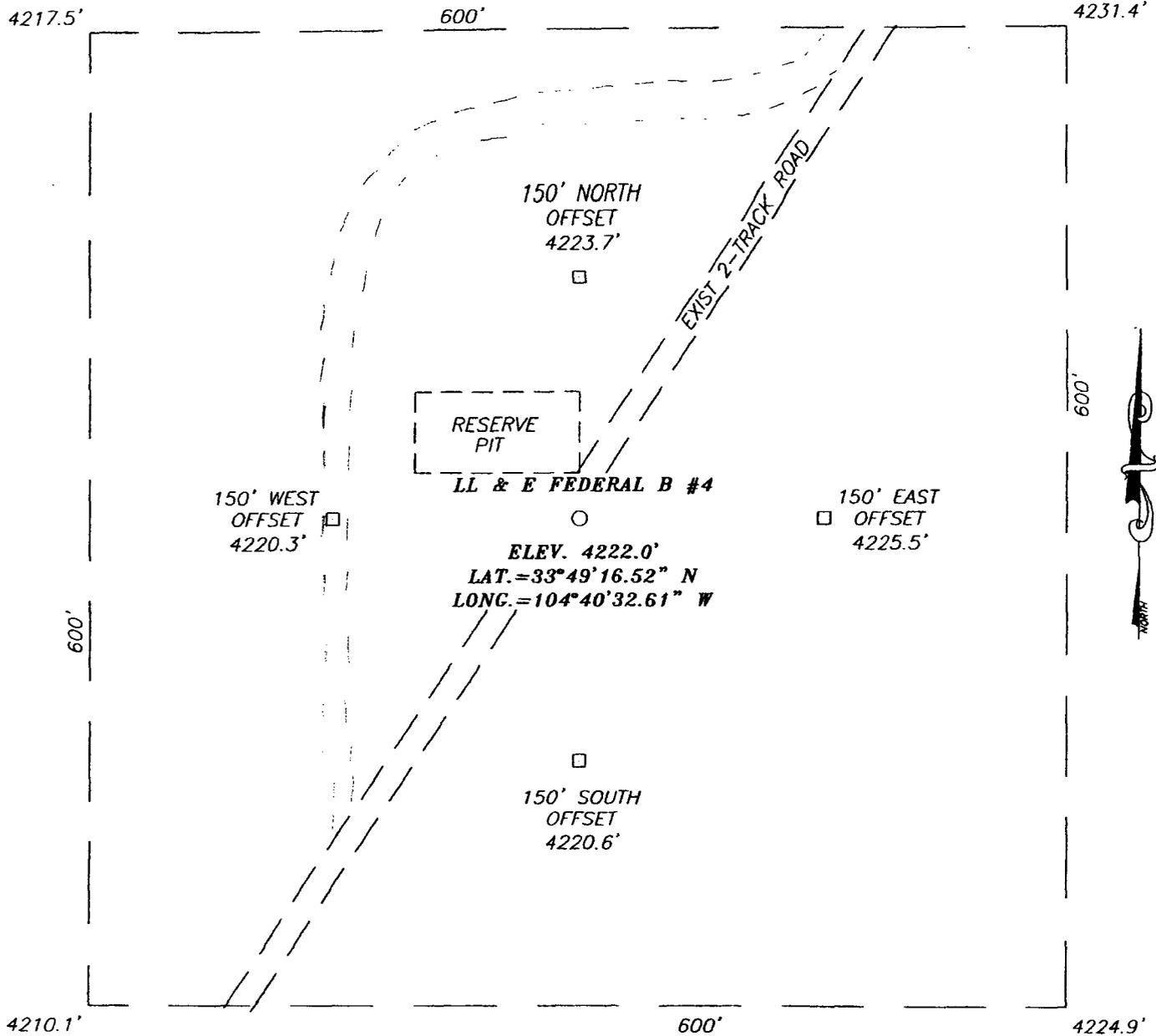
Date Surveyed JR

Signature & Seal  
Professional Surveyor

GARY EDSON  
8/17/05  
05.11.1172

Certificate No. GARY EDSON 12641

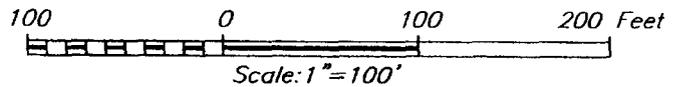
**SECTION 1, TOWNSHIP 6 SOUTH, RANGE 22 EAST, N.M.P.M.,**  
 CHAVES COUNTY, NEW MEXICO



**DIRECTIONS TO LOCATION**

FROM THE INTERESECTION OF U.S. HWY. # 208 AND CO. RD. #40 (STARGRASS RD.) GO WEST ON CO. RD. #40 FOR APPROX. 2.5 MILES TO A CALICHE ROAD ON THE RIGHT. TURN RIGHT (NORTH) AND GO APPROX. 2.0 MILES, TURN LEFT (WEST) AND GO APPROX. 1.0 MILES, TURN RIGHT (NORTH) AND GO APPROX. 0.15 MILES PAST CATTLEGUARD. TURN WEST AND GO APPROX. 2.6 MILES. TURN LEFT (SOUTH/SW) AND FOLLOW 2-TRACK ROAD APPROX. 0.1 MILES. THIS LOCATION IS APPROX. 10' EAST.

SNMAS-05NM-1822 ORIGINAL

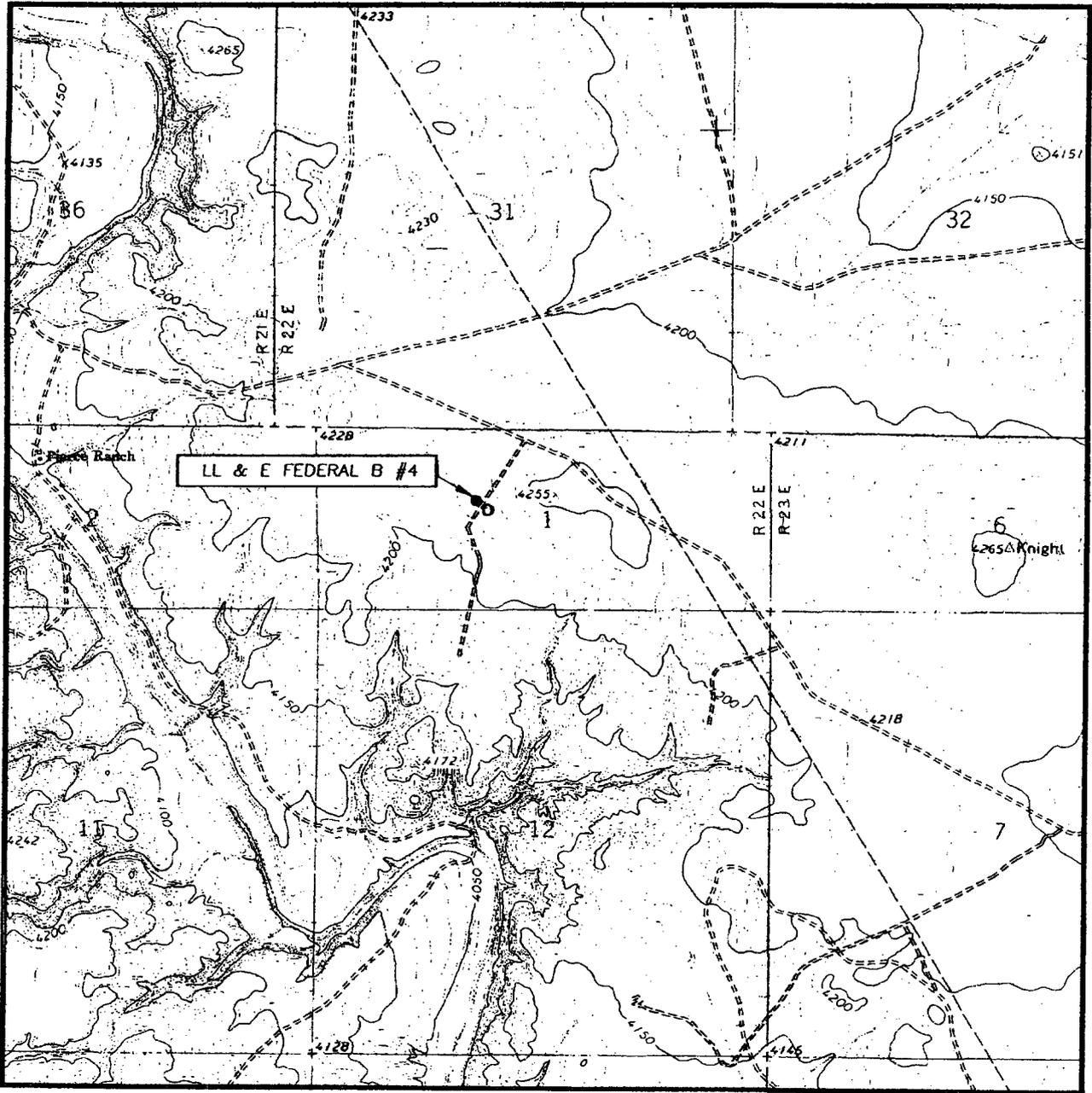


PROVIDING SURVEYING SERVICES  
 SINCE 1948  
**JOHN WEST SURVEYING COMPANY**  
 412 N. DAL PASO  
 HOBBS, N.M. 88240  
 (505) 383-3117

<b>McKAY OIL CORPORATION</b>			
LL & E FEDERAL B #4 WELL LOCATED 860 FEET FROM THE NORTH LINE AND 1887 FEET FROM THE WEST LINE OF SECTION 1, TOWNSHIP 6 SOUTH, RANGE 22 EAST, N.M.P.M., CHAVES COUNTY, NEW MEXICO.			
Survey Date: 08/02/05	Sheet 1 of 1 Sheets		
W.O. Number: 05.11.1172	Dr By: J.R.	Rev 1:	
Date: 08/09/05	Disk: CD#5	05111172	Scale: 1"=100'



# LOCATION VERIFICATION MAP



SCALE: 1" = 2000'

CONTOUR INTERVAL:  
MESA SW, N.M. - 10'

SEC. 1 TWP. 6-S RGE. 22-E

SURVEY N.M.P.M.

COUNTY CHAVES

DESCRIPTION 860' FNL & 1887' FWL

ELEVATION 4222'

OPERATOR McKAY OIL CORPORATION

LEASE LL & E FEDERAL B

U.S.G.S. TOPOGRAPHIC MAP  
MESA SW, N.M.

SNMAS-05NM-1822

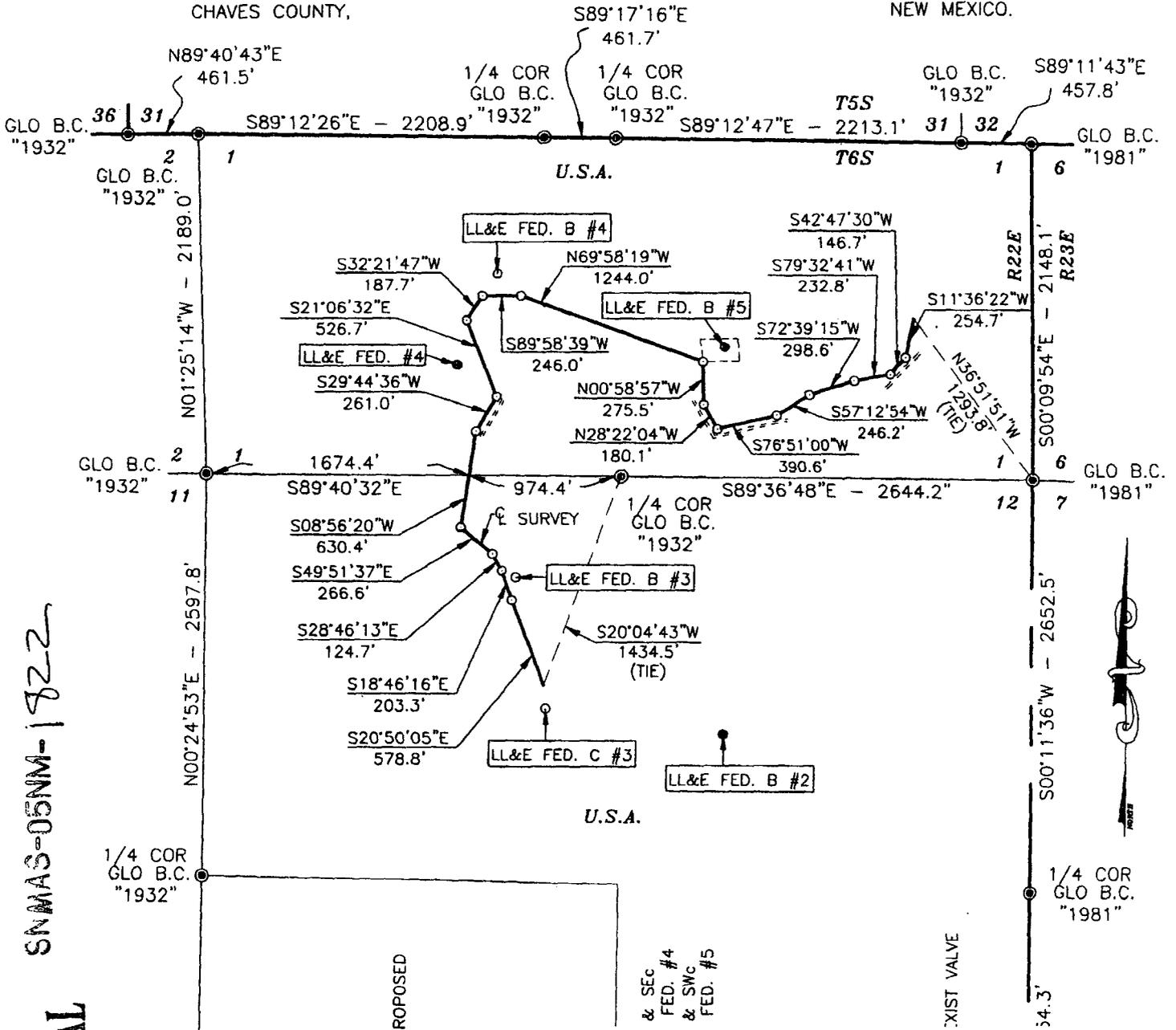


ORIGINAL



**PROVIDING SURVEYING SERVICES**  
 SINCE 1946  
**JOHN WEST SURVEYING COMPANY**  
 412 N. DAL PASO  
 HOBBS, N.M. 88240  
 (505) 383-3117

SECTIONS 1 & 12, TOWNSHIP 6 SOUTH, RANGE 22 EAST, N.M.P.M.,  
CHAVES COUNTY, NEW MEXICO.



SNMAS-05NM-1822

11



The climate within the area is semiarid, characterized by long hot summers and short mild winters, with the exception of periodic cold fronts that can produce cold temperatures. Variation in seasonal and daily temperatures and precipitation is typical of the area. Peak precipitation occurs in the late summer and early fall.

Regional land use is primarily petroleum exploitation and ranching. Environmental impacts within the study area were not observed during the current project.

#### **5. Prefield Records Check and Review of Previous Research:**

A records check and review was conducted through the Bureau of Land Management (BLM) Field Office, located in Roswell, New Mexico. In addition, a search for previously recorded sites within State and private lands was conducted through the Archeological Records Management Section (ARMS) of the New Mexico Cultural Resource Management System database, Santa Fe, New Mexico, via Internet. The records search revealed three previously recorded sites (LA 59920, BLM 3417, and LA 150,008) located within a quarter-mile radius of the proposed project. There are five previous inventories in the project area, listed under BLM Report Numbers 87-18, 87-61-I-J, 87-18-B, 87-60, and SNMAS-05NM-1823.

#### **6. Survey Methods:**

The field crews consisted of four persons. The proposed original and alternate well locations were inventoried by walking 12 zigzag transects (spaced at 15-m intervals) across each of the staked locations. The proposed pipeline right-of-way was inventoried by walking 15-m-interval transects, parallel to and 50 ft on both sides of the right-of-way centerline. In addition, Sites LA 150,044, LA 150,045, and LA 150,046 were recorded on LA Site Records mapped, and photographed. Total time spent in the field was 46 hours.

#### **7. Cultural Resource Findings, Evaluation of Significance, and Determination of Effect:**

During the current inventory, three sites (LA 150,044, LA 150,045, and LA 150,046) and seven isolated occurrences were encountered. Sites LA 150,044 and LA 150,045 were encountered on the proposed pipeline right-of-way, and Site LA 150,046 is located on the proposed original well pad. Two of these sites were already marked with pin flags by ASC but not recorded, so they were recorded by SNMAS as new Sites LA 150,045 and LA 150,046, and mapped and photographed.

Two of the three sites (LA 150,044 and LA 150,045) are considered potentially eligible to the NRHP under criterion d (information potential), as only representative samples of the assemblages were analyzed in the field and their information potential is not exhausted through recordation. The complete artifact assemblage at Site LA 150,046 was analyzed in the field, with no diagnostics noted. Trowel tests conducted in several areas on the site failed to encounter subsurface deposits, and the potential for such is low due to

the lack of soil depth. Therefore, the information potential from Site LA 150,046 is considered exhausted by recordation and the site is not considered potentially eligible under any of the given criteria. A brief narrative description of these sites and recommendations concerning NRHP eligibility are provided below.

**Table 1. Site Summary.**

Site Numbers	Location (NAD 1927, Zone 13)	Owner- ship	Site function	Cultural affiliation	Chrono- logical placement	Category designation	Formal recog- nition	Recorded (by/date)
SNMAS-05NM- 1822-1 (RH-3) LA 150,044	530248 E 3742250 N	Roswell BLM Field Office	Unknown Artifact Scatter	Unknown Prehistoric	Unknown	Class II	N/A	R. Hall 7-10 -2005
SNMAS-05NM- 1822-2 (RH-6) LA 150,045	530110 E 3741575 N	"	Unknown Artifact Scatter	Unknown Prehistoric	Unknown	Class II	N/A	R. Hall and J. Barnett 7-12-2005
SNMAS-05NM- 1822-3 (RH-7) LA 150,046	529970 E 3741580 N	"	Unknown Artifact Scatter	Unknown Prehistoric	Unknown	Class I	N/A	R. Hall and J. Barnett 7-12-2005

### Site LA 150,044

Site LA 150,044 (SNMAS-05NM-1822-1/RH-3) is a prehistoric artifact scatter on a ridge overlooking Fifteen Mile Arroyo del Macho. The site is a single component prehistoric site based on the presence of prehistoric artifacts, although no diagnostics are present. The assemblage includes lithic debitage, lithic tools, and ground stone. The site measures approximately 122 x 46 m, and is at an elevation of 4,225 ft above msl. The desert scrub vegetation community consists of acacia, grasses, forbs, broom snakeweed, prickly pear cactus, and cholla. Disturbances to the site are moderate, and include natural aeolian and alluvial processes. Due to these disturbances, the site is estimated 50 percent intact.

The artifact assemblage is comprised of lithic debitage and lithic tools. The lithic assemblage totals over 1,000 core reduction flakes, cores, one biface, and one utilized flake. One sandstone pestle comprises the ground stone artifacts. Lithic materials present include chert, silicified limestone, silicified sandstone, quartzite, basalt, and chalcedony.

This site has been moderately impacted by natural erosion. A representative random sample of the surface assemblage was analyzed in the field. Four trowel tests for subsurface deposits taken throughout the site area failed to encounter cultural deposits. The information potential of this site has not been exhausted through recordation. Therefore, this site is recommended potentially eligible to the NRHP under criterion d.

### **Site LA 150,045**

Site LA 150,045 (SNMAS-05NM-1822-2/RH-6) is a prehistoric artifact scatter located on a low rise just east of Fifteen Mile Arroyo del Macho. The site is a single component prehistoric site based on the presence of prehistoric artifacts. The assemblage includes lithic debitage, lithic tools, and ground stone. The site measures approximately 140 x 50 m, and is at an elevation of 4,160 ft above msl. The desert scrub vegetation community consists of acacia, broom snakeweed, grasses, cholla, and prickly pear cactus. Disturbances to the site are moderate, and include natural aeolian and alluvial processes, and private collection. Due to these disturbances, the site is estimated 50 percent intact.

The artifact assemblage is comprised of lithic debitage and lithic tools. The lithic assemblage consists of approximately 300 core and biface reduction flakes, cores, hammerstones, scrapers, and one biface. Lithic materials include chert and silicified limestone.

This site has been moderately impacted by natural erosion. A representative random sample of the surface assemblage was analyzed in the field. Trowel tests conducted throughout the site area encountered no subsurface deposits. However, the geomorphology suggests a good potential for buried deposits. The information potential of this site has not been exhausted through recordation. Therefore, this site is recommended potentially eligible to the NRHP under criterion d.

### **Site LA 150,046**

Site LA 150,046 (SNMAS-05NM-1822-3/RH-7) is a prehistoric artifact scatter located on a low rise just east of Fifteen Mile Arroyo del Macho. The site is a single component prehistoric site, based on the presence of prehistoric artifacts. The assemblage includes lithic debitage and lithic tools. The site measures approximately 135 x 53 m, and is at an elevation of 4,170 ft above msl. The desert scrub vegetation community consists of mesquite, acacia, broom snakeweed, prickly pear, grasses, forbs, and cholla. Disturbances to the site are moderate, and include natural aeolian and alluvial processes, and private collection. Due to these disturbances, the site is estimated 50 percent intact.

The artifact assemblage is comprised of lithic debitage and lithic tools. The lithic assemblage includes 11 core-reduction flakes, a chopper, and 104 pieces of angular debris. Some of the angular debris may not be cultural, and may be the results of rock outcropping on the adjacent hill. Lithic materials include silicified limestone, chert, chalcedony, and rhyolite.

This site has been moderately impacted by natural erosion. One hundred percent of the observed artifacts were analyzed in the field, and no diagnostic were noted. Trowel tests conducted throughout the site area encountered no subsurface deposits, and the geomorphology suggests a low potential for buried deposits. The information potential of this site is considered exhausted by this recordation. Therefore, this site is not recommended potentially eligible to the NRHP under any of the given criteria.

## 8. RECOMMENDATIONS

During the current inventories, three new sites (LA 150,044, LA 150,045, and LA 150,046) and seven isolated occurrences were encountered. The research potential of the isolated occurrences was exhausted by field recordation.

Archaeological clearance is recommended for the proposed alternate well location, with the stipulation that a barrier fence and archaeological monitoring be conducted for avoidance of Site LA 150,044. The original location is to be abandoned. Site LA 150,044 is considered potentially eligible to the NRHP under criterion d (information potential), as only a representative sample of the assemblage was analyzed in the field; therefore, the site's information potential is not exhausted through this recording.

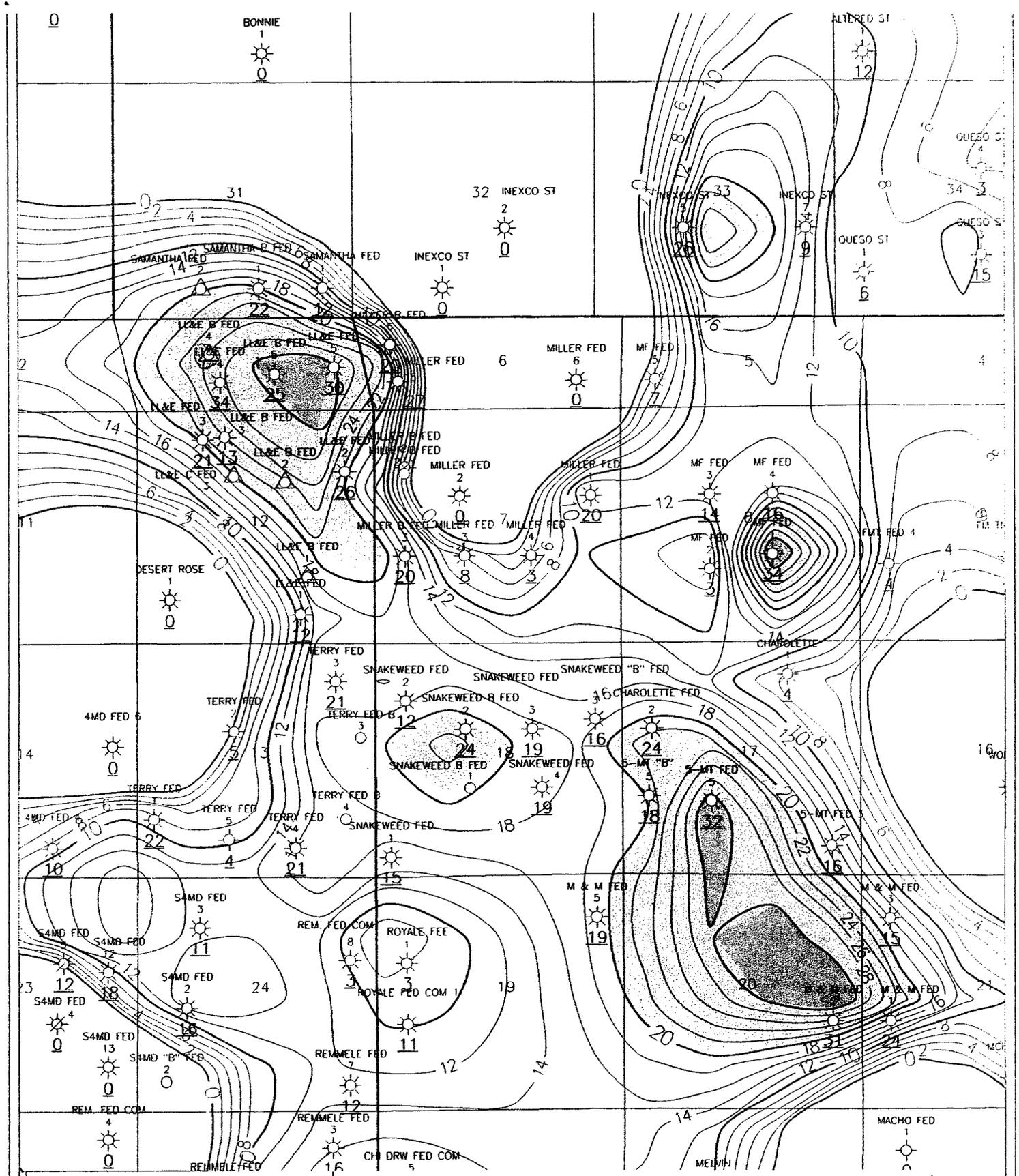
Archaeological clearance is recommended for the proposed pipeline right-of-way, with no stipulations. Two sites (LA 150,045 and LA 150,046) were encountered during inventory of the proposed right-of-way. Site LA 150,046 is located on the proposed right-of-way, and Site LA 150,045 is located within close proximity (viewing range, previously pin flagged by ASC) but outside of the proposed right-of-way. Site LA 150,046 is not considered eligible to the NRHP under any given criteria. The complete artifact assemblage was analyzed in the field, with no diagnostics noted. Trowel tests conducted in several areas on the site failed to encounter subsurface deposits, and the potential for such is low due to the lack of soil depth. Therefore, the research potential of this site is considered exhausted through the current recordation. No avoidance is recommended, providing SHPO and the reviewing BLM archaeologists concur.

Site LA 150,045 is considered potentially eligible to the NRHP under criterion d, as only a representative sample of the assemblage was analyzed in the field, and the site's information potential is not exhausted through this recording. Since the site is not located directly within the proposed right-of-way, no impacts to the site are expected.

One other site, labeled /BLM 3417, was located on the BLM records check map from a previous project in 1987, which only gave this number for identification. The site should have been relocated around Station 42+29, but no cultural materials were encountered in this area. No information was available from ARMS, and the database only listed Site LA 59920 in Section 1, T.6S, R.22E. Therefore, no site update was undertaken during the current work.

If at any time, cultural resources are encountered during construction of the proposed alternate well location or pipeline right-of-way, all construction activity is to cease, and the Roswell BLM Field Office archaeologist and SNMAS are to be notified immediately.

**BLM will review and make the final decision for clearance and any further stipulations.**



MCKAY OIL CORPORATION

WEST PECOS SLOPE INFILL DRILLING  
 TOTAL NET SANDSTONE ISOLITH  
 PECOS SLOPE ABO UNIT 1

LL & E AREA

Scale 1:36000.

George R. Roddy		1/31/2006
FEE: ELLENB1.007	CR 7	

