



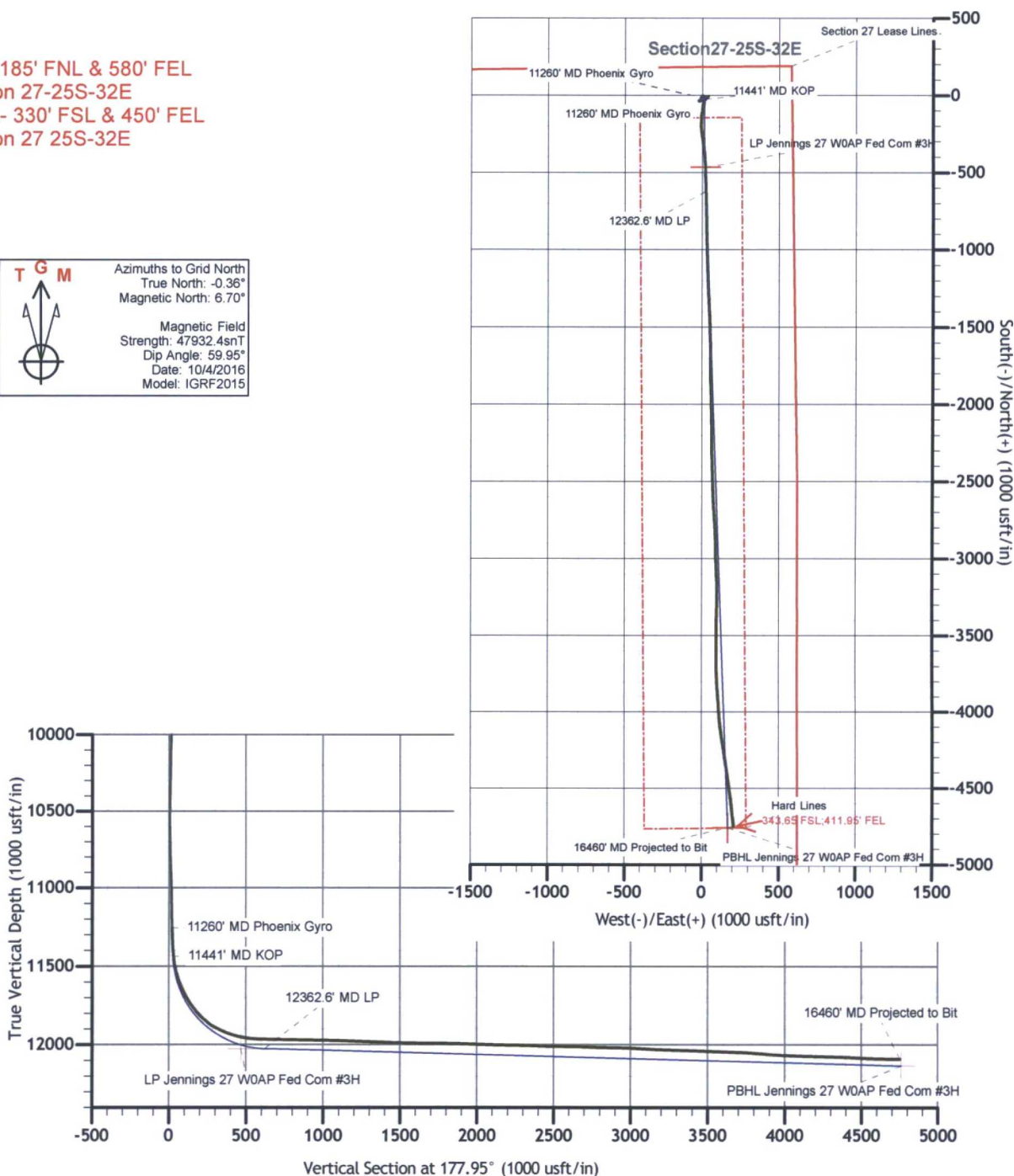
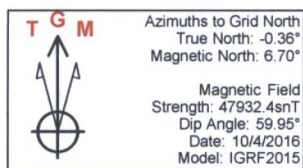
COMPANY: Mewbourne Oil Company  
WELL: Jennings 27 W0AP Fed Com #3H  
COUNTY: Lea County N.M.  
DATUM: NAD 1927 (NADCON CONUS)  
RIG: Patterson #231



GRID CORRECTION: To convert a Magnetic Direction to a Grid Direction, Add 6.70°

| GEODETTIC ZONE: New Mexico East 3001    |         |           |           |                 |                   |       |
|-----------------------------------------|---------|-----------|-----------|-----------------|-------------------|-------|
| 3401 + 27 @ 3428.0usft (Patterson #231) |         |           |           |                 |                   |       |
| GROUND ELEVATION: 3401.0                |         |           |           |                 |                   |       |
| +N/-S                                   | +E/-W   | Northing  | Easting   | Latitude        | Longitude         | Slot  |
| 0.0                                     | 0.0     | 403711.30 | 709830.00 | 32° 6' 29.179 N | 103° 39' 20.381 W |       |
| PLAN SECTIONS                           |         |           |           |                 |                   |       |
| Sec                                     | MD      | Inc       | Azi       | TVD             | +N/-S             | +E/-W |
| 1                                       | 11260.0 | 2.58      | 218.86    | 11255.3         | -19.8             | 21.8  |
| 2                                       | 11441.0 | 2.58      | 218.86    | 11436.2         | -26.2             | 16.7  |
| 3                                       | 12362.6 | 88.51     | 177.94    | 12025.0         | -620.2            | 21.1  |
| 4                                       | 16504.1 | 88.51     | 177.94    | 12133.0         | -4757.6           | 170.1 |
| PBHL Jennings 27 W0AP Fed Com #3H       |         |           |           |                 |                   |       |

SHL- 185' FNL & 580' FEL  
Section 27-25S-32E  
PBHL- 330' FSL & 450' FEL  
Section 27 25S-32E





November 18, 2016

HOBBS OCD

APR 27 2017

RECEIVED

New Mexico Energy, Minerals and Natural Resources Department  
Attn: Oil Conservation Division  
1220 South St. Francis Drive  
Santa Fe, NM 87505

Attn: Jackie Lathan

Re: Mewbourne Oil Company  
Jennings 27 W1AP Federal Com #003H  
WC-025-S253227A; Wolfcamp (Gas)  
Lea County, New Mexico  
API# 30-025-43353

Enclosed please find the original and one (1) copy of the survey performed on the reference well by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C. Other information required by your office is as follows:

| <u>Name &amp; Title</u> | <u>Drainhole No.</u> | <u>Survey Depths</u>   | <u>Dates Performed</u> | <u>Type Survey</u> |
|-------------------------|----------------------|------------------------|------------------------|--------------------|
| Keith Broussard         | Original Hole        | 11,360ft. to 16,411ft. | 10-24-16 to 11-01-16   | MWD Survey         |

A certified plat on which the bottom-hole location is oriented to both surface location and to the lease lines (or unit lines in case of pooling) is attached to the survey report. If any other information is required, please contact the undersigned at the letterhead address and phone number.

  
Todd Estes

Enclosures

CC:

Mewbourne Oil Company  
Attn: Frosty Lathan  
P.O. Box 5720  
Hobbs, NM 88241

Mewbourne Oil Company  
Attn: Robin Terrell  
P.O. Box 5720  
Hobbs, NM 88241

NMEMaNRD\Mewbourne Oil Company\Jennings 27 W1AP Federal Com #3H\M161075

**STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.**  
P.O. Box 1250  
Montgomery, TX 77356  
Office (936) 582-7296 \* Fax (936)-588-4163



November 18, 2016

Survey Certification Report

STATE OF            TEXAS

COUNTY OF        Montgomery

I, Todd Estes, certify that I am employed by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C., and that I did on the day(s) of October 24, 2016, through November 01, 2016 conduct or supervise the taking of a SEDS Original Hole MWD Survey from a depth of 11,360 feet to a depth of 16,411 feet; that I am authorized and qualified to make this report; that this survey was conducted at the request of Mewbourne Oil Company, for the Jennings 27 W1AP Federal Com #003H well, API # 30-025-43353 in Lea County, New Mexico; and that I have reviewed this report and find that it conforms to the principles as set forth by STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.

**Todd Estes**

**STRYKER ENERGY DIRECTIONAL SERVICES, L.L.C.**

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**Montgomery, TX 77356**

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# HOBBS OCD

APR 27 2017

RECEIVED



Microsoft  
MWD Surveys



**Company:** Mewbourne Oil Company  
**Project:** Lea County N.M.  
**Site:** Section27-25S-32E Jennings 27 W1AP Fed Com  
**Well:** Jennings 27 W1AP Fed Com #3H  
**Wellbore:** Original Hole  
**Design:** Original Hole

**Local Co-ordinate Reference:** Well Jennings 27 W1AP Fed Com #3H  
**TVD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**MD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**North Reference:** Grid  
**Survey Calculation Method:** Minimum Curvature  
**Database:** Stryker\_EDM

|                    |                                      |                      |                |
|--------------------|--------------------------------------|----------------------|----------------|
| <b>Project</b>     | Lea County N.M.                      |                      |                |
| <b>Map System:</b> | US State Plane 1927 (Exact solution) | <b>System Datum:</b> | Mean Sea Level |
| <b>Geo Datum:</b>  | NAD 1927 (NADCON CONUS)              |                      |                |
| <b>Map Zone:</b>   | New Mexico East 3001                 |                      |                |

|                              |                                                |                          |                   |
|------------------------------|------------------------------------------------|--------------------------|-------------------|
| <b>Site</b>                  | Section27-25S-32E Jennings 27 W1AP Fed Com #3H |                          |                   |
| <b>Site Position:</b>        |                                                | <b>Northing:</b>         | 403,711.30 usft   |
| <b>From:</b>                 | Map                                            | <b>Easting:</b>          | 709,830.00 usft   |
| <b>Position Uncertainty:</b> | 0.0 usft                                       | <b>Slot Radius:</b>      | 13-3/16 "         |
|                              |                                                | <b>Latitude:</b>         | 32° 6' 29.179 N   |
|                              |                                                | <b>Longitude:</b>        | 103° 39' 20.381 W |
|                              |                                                | <b>Grid Convergence:</b> | 0.36 °            |

|                             |                              |          |                            |
|-----------------------------|------------------------------|----------|----------------------------|
| <b>Well</b>                 | Jennings 27 W1AP Fed Com #3H |          |                            |
| <b>Well Position</b>        | +N/-S                        | 0.0 usft | <b>Northing:</b>           |
|                             | +E/-W                        | 0.0 usft | <b>Easting:</b>            |
| <b>Position Uncertainty</b> |                              | 0.0 usft | <b>Wellhead Elevation:</b> |
|                             |                              |          | 27.0 usft                  |
|                             |                              |          | <b>Latitude:</b>           |
|                             |                              |          | 32° 6' 29.179 N            |
|                             |                              |          | <b>Longitude:</b>          |
|                             |                              |          | 103° 39' 20.381 W          |
|                             |                              |          | <b>Ground Level:</b>       |
|                             |                              |          | 3,401.0 usft               |

|                  |                   |                    |                        |                      |                            |  |
|------------------|-------------------|--------------------|------------------------|----------------------|----------------------------|--|
| <b>Wellbore</b>  | Original Hole     |                    |                        |                      |                            |  |
| <b>Magnetics</b> | <b>Model Name</b> | <b>Sample Date</b> | <b>Declination (°)</b> | <b>Dip Angle (°)</b> | <b>Field Strength (nT)</b> |  |
|                  | IGRF2015          | 10/4/2016          | 7.06                   | 59.95                | 47,932.39168897            |  |

|                          |                                |                     |                     |                      |     |
|--------------------------|--------------------------------|---------------------|---------------------|----------------------|-----|
| <b>Design</b>            | Original Hole                  |                     |                     |                      |     |
| <b>Audit Notes:</b>      |                                |                     |                     |                      |     |
| <b>Version:</b>          | 1.0                            | <b>Phase:</b>       | ACTUAL              | <b>Tie On Depth:</b> | 0.0 |
| <b>Vertical Section:</b> | <b>Depth From (TVD) (usft)</b> | <b>+N/-S (usft)</b> | <b>+E/-W (usft)</b> | <b>Direction (°)</b> |     |
|                          | 0.0                            | 0.0                 | 0.0                 | 132.25               |     |

|                       |                        |                           |                  |                    |  |
|-----------------------|------------------------|---------------------------|------------------|--------------------|--|
| <b>Survey Program</b> | <b>Date</b> 11/17/2016 |                           |                  |                    |  |
| <b>From (usft)</b>    | <b>To (usft)</b>       | <b>Survey (Wellbore)</b>  | <b>Tool Name</b> | <b>Description</b> |  |
| 11,360.0              | 16,460.0               | Survey #2 (Original Hole) |                  |                    |  |



# Microsoft MWD Surveys



**Company:** Mewbourne Oil Company  
**Project:** Lea County N.M.  
**Site:** Section27-25S-32E Jennings 27 W1AP Fed Com  
**Well:** Jennings 27 W1AP Fed Com #3H  
**Wellbore:** Original Hole  
**Design:** Original Hole

**Local Co-ordinate Reference:** Well Jennings 27 W1AP Fed Com #3H  
**TVD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**MD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**North Reference:** Grid  
**Survey Calculation Method:** Minimum Curvature  
**Database:** Stryker\_EDM

## Survey

| MD<br>(usft)    | Inc<br>(°) | Azi (azimuth)<br>(°) | TVD<br>(usft) | N/S<br>(usft) | E/W<br>(usft) | Closure Distance<br>(usft) | Closure Azimuth<br>(°) |        |
|-----------------|------------|----------------------|---------------|---------------|---------------|----------------------------|------------------------|--------|
| 11,260.0        | 2.58       | 218.86               | 11,255.3      | -19.8         | 21.8          | 29.5                       | 132.25                 | Tie-In |
| 11,360.0        | 3.60       | 228.20               | 11,355.2      | -23.7         | 18.1          | 29.8                       | 142.64                 |        |
| 11,456.0        | 6.30       | 219.10               | 11,450.8      | -29.8         | 12.5          | 32.3                       | 157.22                 |        |
| 11,487.0        | 10.60      | 204.10               | 11,481.5      | -33.7         | 10.3          | 35.2                       | 163.06                 |        |
| 11,519.0        | 15.80      | 194.50               | 11,512.6      | -40.6         | 8.0           | 41.4                       | 168.90                 |        |
| 11,551.0        | 18.30      | 192.90               | 11,543.2      | -49.7         | 5.8           | 50.0                       | 173.40                 |        |
| 11,583.0        | 19.00      | 186.90               | 11,573.6      | -59.8         | 4.0           | 59.9                       | 176.17                 |        |
| 11,615.0        | 21.00      | 184.60               | 11,603.6      | -70.7         | 2.9           | 70.7                       | 177.63                 |        |
| 11,647.0        | 22.90      | 183.70               | 11,633.3      | -82.6         | 2.1           | 82.6                       | 178.57                 |        |
| 11,679.0        | 25.00      | 188.50               | 11,662.5      | -95.5         | 0.7           | 95.5                       | 179.61                 |        |
| 11,710.0        | 30.30      | 192.10               | 11,690.0      | -109.6        | -2.0          | 109.7                      | 181.02                 |        |
| 11,742.0        | 34.30      | 189.80               | 11,717.0      | -126.4        | -5.2          | 126.5                      | 182.35                 |        |
| 11,774.0        | 35.10      | 181.50               | 11,743.4      | -144.5        | -7.0          | 144.7                      | 182.76                 |        |
| 11,805.0        | 38.90      | 182.00               | 11,768.1      | -163.2        | -7.5          | 163.3                      | 182.64                 |        |
| 11,837.0        | 40.70      | 181.30               | 11,792.7      | -183.6        | -8.1          | 183.8                      | 182.53                 |        |
| 11,869.0        | 43.60      | 176.40               | 11,816.4      | -205.1        | -7.7          | 205.2                      | 182.14                 |        |
| 11,901.0        | 48.20      | 172.70               | 11,838.7      | -228.0        | -5.5          | 228.0                      | 181.37                 |        |
| 11,933.0        | 54.10      | 171.50               | 11,858.8      | -252.6        | -2.0          | 252.6                      | 180.46                 |        |
| 11,965.0        | 58.60      | 172.40               | 11,876.5      | -279.0        | 1.7           | 279.0                      | 179.65                 |        |
| 11,996.0        | 62.30      | 173.80               | 11,891.8      | -305.8        | 4.9           | 305.8                      | 179.07                 |        |
| 12,028.0        | 64.60      | 174.00               | 11,906.1      | -334.2        | 8.0           | 334.3                      | 178.63                 |        |
| 12,060.0        | 66.90      | 173.00               | 11,919.2      | -363.2        | 11.3          | 363.4                      | 178.22                 |        |
| 12,091.0        | 70.60      | 174.70               | 11,930.5      | -391.9        | 14.4          | 392.2                      | 177.90                 |        |
| <u>12,123.0</u> | 73.70      | 176.50               | 11,940.3      | <u>-422.3</u> | <u>16.7</u>   | 422.6                      | 177.73                 |        |
| 12,155.0        | 76.80      | 177.40               | 11,948.4      | -453.2        | 18.4          | 453.6                      | 177.68                 |        |
| 12,187.0        | 80.20      | 177.80               | 11,954.8      | -484.5        | 19.7          | 484.9                      | 177.68                 |        |
| 12,217.0        | 82.90      | 178.40               | 11,959.2      | -514.2        | 20.6          | 514.6                      | 177.70                 |        |



Microsoft  
MWD Surveys



**Company:** Mewbourne Oil Company  
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**Site:** Section27-25S-32E Jennings 27 W1AP Fed Com  
**Well:** Jennings 27 W1AP Fed Com #3H  
**Wellbore:** Original Hole  
**Design:** Original Hole

**Local Co-ordinate Reference:** Well Jennings 27 W1AP Fed Com #3H  
**TVD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**MD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**North Reference:** Grid  
**Survey Calculation Method:** Minimum Curvature  
**Database:** Stryker\_EDM

**Survey**

| MD<br>(usft) | Inc<br>(°) | Azi (azimuth)<br>(°) | TVD<br>(usft) | N/S<br>(usft) | E/W<br>(usft) | Closure Distance<br>(usft) | Closure Azimuth<br>(°) |
|--------------|------------|----------------------|---------------|---------------|---------------|----------------------------|------------------------|
| 12,281.0     | 87.90      | 178.50               | 11,964.3      | -577.9        | 22.4          | 578.4                      | 177.78                 |
| 12,313.0     | 88.70      | 178.00               | 11,965.3      | -609.9        | 23.3          | 610.3                      | 177.81                 |
| 12,408.0     | 88.90      | 178.90               | 11,967.3      | -704.8        | 25.9          | 705.3                      | 177.89                 |
| 12,504.0     | 89.90      | 179.60               | 11,968.3      | -800.8        | 27.2          | 801.3                      | 178.06                 |
| 12,599.0     | 88.10      | 177.90               | 11,969.9      | -895.8        | 29.2          | 896.3                      | 178.13                 |
| 12,694.0     | 89.80      | 179.60               | 11,971.7      | -990.7        | 31.3          | 991.2                      | 178.19                 |
| 12,790.0     | 87.50      | 177.40               | 11,973.9      | -1,086.7      | 33.8          | 1,087.2                    | 178.22                 |
| 12,885.0     | 89.00      | 178.30               | 11,976.8      | -1,181.5      | 37.4          | 1,182.1                    | 178.19                 |
| 12,980.0     | 87.40      | 176.90               | 11,979.8      | -1,276.4      | 41.4          | 1,277.1                    | 178.14                 |
| 13,076.0     | 87.20      | 177.50               | 11,984.3      | -1,372.2      | 46.1          | 1,373.0                    | 178.08                 |
| 13,171.0     | 88.00      | 178.00               | 11,988.3      | -1,467.0      | 49.8          | 1,467.9                    | 178.06                 |
| 13,265.0     | 90.00      | 178.80               | 11,990.0      | -1,561.0      | 52.4          | 1,561.9                    | 178.08                 |
| 13,360.0     | 88.70      | 179.10               | 11,991.0      | -1,655.9      | 54.1          | 1,656.8                    | 178.13                 |
| 13,455.0     | 90.60      | 180.50               | 11,991.6      | -1,750.9      | 54.5          | 1,751.8                    | 178.22                 |
| 13,551.0     | 88.10      | 177.60               | 11,992.7      | -1,846.9      | 56.1          | 1,847.8                    | 178.26                 |
| 13,646.0     | 88.50      | 178.60               | 11,995.5      | -1,941.8      | 59.2          | 1,942.7                    | 178.25                 |
| 13,741.0     | 88.10      | 179.10               | 11,998.3      | -2,036.7      | 61.1          | 2,037.7                    | 178.28                 |
| 13,836.0     | 87.20      | 179.80               | 12,002.2      | -2,131.7      | 62.0          | 2,132.6                    | 178.33                 |
| 13,931.0     | 91.20      | 179.70               | 12,003.6      | -2,226.6      | 62.4          | 2,227.5                    | 178.39                 |
| 14,027.0     | 87.80      | 178.40               | 12,004.4      | -2,322.6      | 64.0          | 2,323.5                    | 178.42                 |
| 14,121.0     | 87.20      | 178.40               | 12,008.5      | -2,416.5      | 66.7          | 2,417.4                    | 178.42                 |
| 14,217.0     | 90.40      | 178.30               | 12,010.5      | -2,512.4      | 69.4          | 2,513.4                    | 178.42                 |
| 14,312.0     | 88.50      | 176.90               | 12,011.4      | -2,607.3      | 73.4          | 2,608.3                    | 178.39                 |
| 14,407.0     | 89.00      | 176.20               | 12,013.5      | -2,702.1      | 79.1          | 2,703.3                    | 178.32                 |
| 14,502.0     | 87.70      | 176.90               | 12,016.2      | -2,796.9      | 84.8          | 2,798.2                    | 178.26                 |
| 14,597.0     | 88.20      | 178.90               | 12,019.6      | -2,891.8      | 88.3          | 2,893.1                    | 178.25                 |
| 14,691.0     | 89.20      | 178.20               | 12,021.8      | -2,985.7      | 90.7          | 2,987.1                    | 178.26                 |



# Microsoft MWD Surveys



**Company:** Mewbourne Oil Company  
**Project:** Lea County N.M.  
**Site:** Section27-25S-32E Jennings 27 W1AP Fed Com  
**Well:** Jennings 27 W1AP Fed Com #3H  
**Wellbore:** Original Hole  
**Design:** Original Hole

**Local Co-ordinate Reference:** Well Jennings 27 W1AP Fed Com #3H  
**TVD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**MD Reference:** 3401 + 27 @ 3428.0usft (Patterson #231)  
**North Reference:** Grid  
**Survey Calculation Method:** Minimum Curvature  
**Database:** Stryker\_EDM

## Survey

| MD<br>(usft) | Inc<br>(°) | Azi (azimuth)<br>(°) | TVD<br>(usft) | N/S<br>(usft) | E/W<br>(usft) | Closure Distance<br>(usft) | Closure Azimuth<br>(°) |
|--------------|------------|----------------------|---------------|---------------|---------------|----------------------------|------------------------|
| 14,786.0     | 86.20      | 177.30               | 12,025.6      | -3,080.5      | 94.4          | 3,082.0                    | 178.24                 |
| 14,881.0     | 87.60      | 178.40               | 12,030.7      | -3,175.3      | 98.0          | 3,176.8                    | 178.23                 |
| 14,977.0     | 87.40      | 181.40               | 12,034.9      | -3,271.2      | 98.1          | 3,272.7                    | 178.28                 |
| 15,072.0     | 90.90      | 182.00               | 12,036.3      | -3,366.2      | 95.3          | 3,367.5                    | 178.38                 |
| 15,167.0     | 85.50      | 178.70               | 12,039.3      | -3,461.1      | 94.7          | 3,462.4                    | 178.43                 |
| 15,263.0     | 89.00      | 180.30               | 12,043.9      | -3,556.9      | 95.6          | 3,558.2                    | 178.46                 |
| 15,358.0     | 88.00      | 180.20               | 12,046.4      | -3,651.9      | 95.2          | 3,653.1                    | 178.51                 |
| 15,454.0     | 86.70      | 178.40               | 12,050.8      | -3,747.8      | 96.3          | 3,749.0                    | 178.53                 |
| 15,549.0     | 85.00      | 176.20               | 12,057.7      | -3,842.4      | 100.8         | 3,843.7                    | 178.50                 |
| 15,644.0     | 87.00      | 175.80               | 12,064.3      | -3,937.0      | 107.4         | 3,938.4                    | 178.44                 |
| 15,740.0     | 87.40      | 175.90               | 12,069.0      | -4,032.6      | 114.3         | 4,034.2                    | 178.38                 |
| 15,835.0     | 88.20      | 172.20               | 12,072.7      | -4,127.0      | 124.2         | 4,128.9                    | 178.28                 |
| 15,930.0     | 88.20      | 170.70               | 12,075.7      | -4,220.9      | 138.3         | 4,223.2                    | 178.12                 |
| 16,026.0     | 89.40      | 172.10               | 12,077.7      | -4,315.8      | 152.6         | 4,318.5                    | 177.97                 |
| 16,121.0     | 88.30      | 171.60               | 12,079.6      | -4,409.8      | 166.1         | 4,412.9                    | 177.84                 |
| 16,217.0     | 85.50      | 172.10               | 12,084.8      | -4,504.7      | 179.7         | 4,508.3                    | 177.72                 |
| 16,311.0     | 88.60      | 173.50               | 12,089.6      | -4,597.8      | 191.5         | 4,601.8                    | 177.62                 |
| 16,411.0     | 89.60      | 174.00               | 12,091.2      | -4,697.2      | 202.3         | 4,701.6                    | 177.53                 |
| 16,460.0     | 89.60      | 174.00               | 12,091.5      | -4,745.9      | 207.5         | 4,750.5                    | 177.50                 |

16460' MD Projected to Bit

## Survey Annotations

| Measured<br>Depth<br>(usft) | Vertical<br>Depth<br>(usft) | Local Coordinates |                 | Comment                    |
|-----------------------------|-----------------------------|-------------------|-----------------|----------------------------|
|                             |                             | +N/-S<br>(usft)   | +E/-W<br>(usft) |                            |
| 16,460.0                    | 12,091.5                    | -4,745.9          | 207.5           | 16460' MD Projected to Bit |