

123-24743

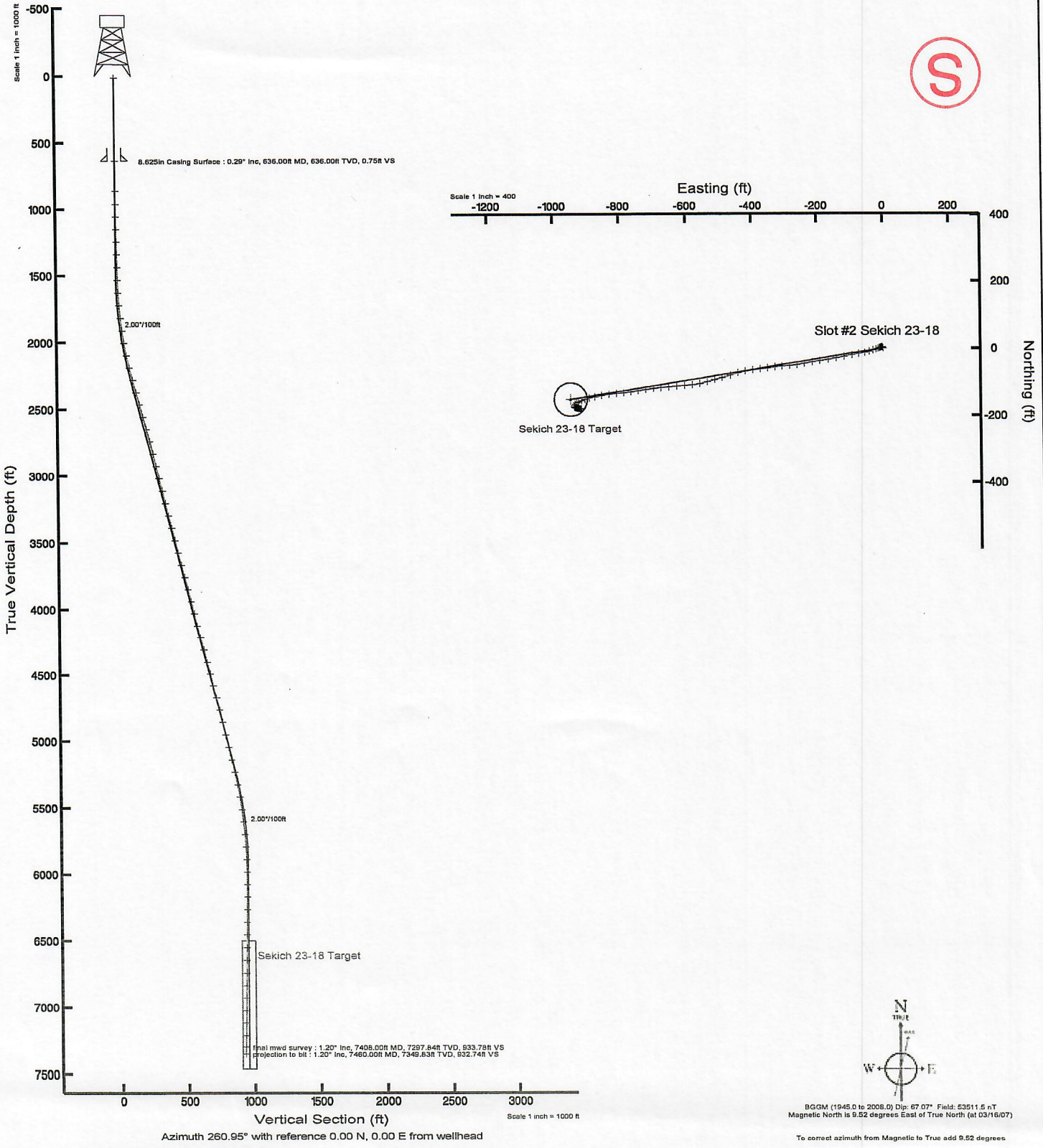


# KERR MCGEE

Location: COLORADO Slot: Slot #2 Sekich 23-18  
 Field: WELD COUNTY (KERR MCGEE) Well: Sekich 23-18  
 Facility: SEC.18-T3N-R67W Wellbore: Sekich 23-18 PWB

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 United States Drilling  
 BAKER HUGHES  
 INTEQ

|   |  |
|---|--|
| Plot reference wellpath is Sekich 23-18 PWB                     |  |
| True vertical depths are referenced to Ensign 5 (RT)            | Grid System: NAD83 / Lambert Colorado State Planes, Northern Zone (501), US feet |
| Measured depths are referenced to Ensign 5 (RT)                 | North Reference: True north  |
| Ensign 5 (RT) to Mean Sea Level: 4574 feet                      | Scale: True distance   |
| Mean Sea Level to Mud line (Facility - SEC.18-T3N-R67W): 0 feet | Depths are in feet   |
| Coordinates are in feet referenced to Slot                      | Created by: Suzanne Thompson on 4/30/2007  |



BGGM (1945.0 to 2008.0) Dip: 67.07° Field: E3511.5 nT  
 Magnetic North is 9.52 degrees East of True North (at 03/16/07)  
 To correct azimuth from Magnetic to True add 9.52 degrees



KerrMcGee

# Actual Wellpath Report

Sekich 23-18 AWP

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INTEQ

## REFERENCE WELLPATH IDENTIFICATION

|          |                          |          |                      |
|----------|--------------------------|----------|----------------------|
| Operator | KERR MCGEE               | Slot     | Slot #2 Sekich 23-18 |
| Area     | COLORADO                 | Well     | Sekich 23-18         |
| Field    | WELD COUNTY (KERR MCGEE) | Wellbore | Sekich 23-18 AWB     |
| Facility | SEC.18-T3N-R67W          |          |                      |

## REPORT SETUP INFORMATION

|                       |   |                      |                      |
|-----------------------|---|----------------------|----------------------|
| Projection System     | NAD83 / Lambert Colorado State Planes, Northern Zone (501), US feet | Software System      | WellArchitect™ 1.2   |
| North Reference       | True  | User                 | Suzanne Thompson     |
| Scale                 | 0.999957  | Report Generated     | 04/30/07 at 15:50:10 |
| Wellbore last revised | 04/30/07  | Database/Source file | WA_Denver/Sekich_2   |

## WELLPATH LOCATION

|                       | Local coordinates |             | Grid coordinates  |                    | Geographic coordinates |                |
|-----------------------|-------------------|-------------|-------------------|--------------------|------------------------|----------------|
|                       | North [feet]      | East [feet] | Easting [US feet] | Northing [US feet] | Latitude [°]           | Longitude [°]  |
| Slot Location         | -1836.01          | 1795.58     | 3159591.43        | 1324606.22         | 40 13 22.908N          | 104 55 42.492W |
| Facility Reference Pt |                   |             | 3157784.27        | 1326430.67         | 40 13 41.052N          | 104 56 05.640W |
| Field Reference Pt    |                   |             | 3197771.84        | 1268891.29         | 40 04 09.600N          | 104 47 36.000W |

## WELLPATH DATUM

|                          |                   |  |                   |
|--------------------------|-------------------|--|-------------------|
| Calculation method       | Minimum curvature | Ensign 5 (RT) to Installation Vertical Datum       | 4874.00 feet      |
| Horizontal Reference Pt  | Slot              | Ensign 5 (RT) to Mean Sea Level                    | 4874.00 feet      |
| Vertical Reference Pt    | Ensign 5 (RT)     | Installation Vertical Datum to Mud Line (Facility) | 0.00 feet         |
| MD Reference Pt          | Ensign 5 (RT)     | Section Origin                                     | N 0.00, E 0.00 ft |
| Field Vertical Reference | Mean Sea Level    | Section Azimuth                                    | 260.95°           |



KerrMcGee

# Actual Wellpath Report

Sekich 23-18 AWP

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## REFERENCE WELLPATH IDENTIFICATION

|          |                          |          |                      |
|----------|--------------------------|----------|----------------------|
| Operator | KERR MCGEE               | Slot     | Slot #2 Sekich 23-18 |
| Area     | COLORADO                 | Well     | Sekich 23-18         |
| Field    | WELD COUNTY (KERR MCGEE) | Wellbore | Sekich 23-18 AWB     |
| Facility | SEC.18-T3N-R67W          |          |                      |

## WELLPATH DATA (73 stations) † = interpolated/extrapolated station

| MD [feet] | Inclination [°] | Azimuth [°] | TVD [feet] | Vert Sect [feet] | North [feet] | East [feet] | DLS [°/100ft] |
|-----------|-----------------|-------------|------------|------------------|--------------|-------------|---------------|
| 0.00†     | 0.000           | 0.000       | 0.00       | 0.00             | 0.00         | 0.00        | 0.00          |
| 14.00     | 0.000           | 0.000       | 14.00      | 0.00             | 0.00         | 0.00        | 0.00          |
| 860.00    | 0.400           | 322.800     | 859.99     | 1.39             | 2.35         | -1.79       | 0.05          |
| 961.00    | 0.600           | 321.000     | 960.99     | 1.82             | 3.04         | -2.33       | 0.20          |
| 1057.00   | 1.000           | 257.000     | 1056.98    | 2.91             | 3.25         | -3.46       | 0.95          |
| 1152.00   | 1.000           | 247.500     | 1151.97    | 4.54             | 2.74         | -5.04       | 0.17          |
| 1247.00   | 1.300           | 251.400     | 1246.95    | 6.41             | 2.08         | -6.82       | 0.33          |
| 1342.00   | 1.100           | 241.200     | 1341.93    | 8.33             | 1.30         | -8.65       | 0.31          |
| 1437.00   | 0.700           | 243.600     | 1436.92    | 9.75             | 0.60         | -9.96       | 0.42          |
| 1533.00   | 1.700           | 247.900     | 1532.89    | 11.69            | -0.20        | -11.81      | 1.05          |
| 1628.00   | 2.600           | 246.800     | 1627.82    | 15.15            | -1.57        | -15.10      | 0.95          |
| 1723.00   | 5.100           | 253.900     | 1722.60    | 21.44            | -3.59        | -21.13      | 2.67          |
| 1818.00   | 6.400           | 252.600     | 1817.12    | 30.87            | -6.35        | -30.24      | 1.38          |
| 1913.00   | 8.200           | 250.300     | 1911.35    | 42.76            | -10.22       | -41.67      | 1.92          |
| 2008.00   | 9.400           | 261.600     | 2005.24    | 57.18            | -13.63       | -55.73      | 2.21          |
| 2103.00   | 12.500          | 261.200     | 2098.50    | 75.22            | -16.34       | -73.57      | 3.26          |
| 2196.00   | 14.200          | 259.700     | 2188.98    | 96.69            | -19.92       | -94.74      | 1.87          |
| 2291.00   | 15.600          | 258.200     | 2280.78    | 121.10           | -24.62       | -118.71     | 1.53          |
| 2387.00   | 14.400          | 259.100     | 2373.51    | 145.93           | -29.51       | -143.07     | 1.27          |
| 2482.00   | 14.700          | 261.600     | 2465.46    | 169.79           | -33.51       | -166.59     | 0.73          |
| 2578.00   | 15.600          | 261.900     | 2558.13    | 194.87           | -37.11       | -191.42     | 0.94          |
| 2672.00   | 14.400          | 259.500     | 2648.92    | 219.20           | -41.02       | -215.43     | 1.44          |
| 2767.00   | 15.000          | 259.500     | 2740.81    | 243.30           | -45.41       | -239.13     | 0.63          |
| 2863.00   | 13.200          | 260.900     | 2833.92    | 266.68           | -49.41       | -262.17     | 1.91          |
| 2959.00   | 13.200          | 266.500     | 2927.39    | 288.55           | -51.81       | -283.93     | 1.33          |
| 3054.00   | 14.400          | 265.800     | 3019.64    | 311.12           | -53.34       | -306.54     | 1.28          |
| 3149.00   | 13.500          | 262.300     | 3111.84    | 333.97           | -55.69       | -329.31     | 1.30          |
| 3245.00   | 13.500          | 261.600     | 3205.19    | 356.38           | -58.83       | -351.50     | 0.17          |
| 3341.00   | 13.700          | 265.500     | 3298.50    | 378.92           | -61.36       | -373.92     | 0.98          |
| 3436.00   | 15.100          | 262.300     | 3390.51    | 402.50           | -63.90       | -397.40     | 1.69          |
| 3530.00   | 14.100          | 258.800     | 3481.48    | 426.19           | -67.76       | -420.77     | 1.42          |
| 3625.00   | 13.600          | 254.600     | 3573.72    | 448.85           | -72.98       | -442.89     | 1.18          |
| 3721.00   | 16.000          | 253.500     | 3666.53    | 473.19           | -79.73       | -466.46     | 2.52          |
| 3816.00   | 15.000          | 255.300     | 3758.07    | 498.41           | -86.57       | -490.90     | 1.17          |
| 3911.00   | 15.100          | 254.600     | 3849.81    | 522.94           | -92.98       | -514.73     | 0.22          |
| 4004.00   | 13.900          | 254.600     | 3939.85    | 546.08           | -99.16       | -537.17     | 1.29          |
| 4099.00   | 13.400          | 256.800     | 4032.17    | 568.41           | -104.70      | -558.89     | 0.76          |
| 4194.00   | 14.600          | 265.200     | 4124.35    | 591.33           | -108.22      | -581.54     | 2.48          |
| 4287.00   | 14.700          | 265.400     | 4214.33    | 614.78           | -110.15      | -604.99     | 0.12          |
| 4383.00   | 14.800          | 264.400     | 4307.16    | 639.16           | -112.32      | -629.33     | 0.28          |



# Actual Wellpath Report

Sekich 23-18 AWP

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## REFERENCE WELLPATH IDENTIFICATION

|          |                          |          |                      |
|----------|--------------------------|----------|----------------------|
| Operator | KERR MCGEE               | Slot     | Slot #2 Sekich 23-18 |
| Area     | COLORADO                 | Well     | Sekich 23-18         |
| Field    | WELD COUNTY (KERR MCGEE) | Wellbore | Sekich 23-18 AWB     |
| Facility | SEC.18-T3N-R67W          |          |                      |

## WELLPATH DATA (73 stations) † = interpolated/extrapolated station

| MD [feet] | Inclination [°] | Azimuth [°] | TVD [feet] | Vert Sect [feet] | North [feet] | East [feet] | DLS [°/100ft] |
|-----------|-----------------|-------------|------------|------------------|--------------|-------------|---------------|
| 4478.00   | 13.400          | 265.400     | 4399.30    | 662.25           | -114.39      | -652.38     | 1.50          |
| 4574.00   | 14.500          | 264.800     | 4492.47    | 685.33           | -116.37      | -675.44     | 1.16          |
| 4668.00   | 13.500          | 264.100     | 4583.67    | 708.03           | -118.56      | -698.07     | 1.08          |
| 4763.00   | 15.300          | 261.200     | 4675.69    | 731.64           | -121.62      | -721.49     | 2.04          |
| 4859.00   | 13.200          | 260.200     | 4768.73    | 755.27           | -125.42      | -744.81     | 2.20          |
| 4954.00   | 12.800          | 261.200     | 4861.29    | 776.64           | -128.88      | -765.90     | 0.48          |
| 5050.00   | 13.000          | 264.400     | 4954.87    | 798.05           | -131.56      | -787.15     | 0.77          |
| 5145.00   | 14.000          | 265.100     | 5047.25    | 820.18           | -133.59      | -809.24     | 1.07          |
| 5241.00   | 13.400          | 263.000     | 5140.51    | 842.88           | -135.93      | -831.85     | 0.81          |
| 5336.00   | 13.900          | 259.100     | 5232.83    | 865.28           | -139.43      | -853.98     | 1.10          |
| 5431.00   | 11.600          | 259.800     | 5325.48    | 886.24           | -143.28      | -874.59     | 2.43          |
| 5526.00   | 9.200           | 256.700     | 5418.92    | 903.36           | -146.72      | -891.38     | 2.59          |
| 5621.00   | 7.600           | 250.300     | 5512.90    | 917.11           | -150.59      | -904.69     | 1.95          |
| 5715.00   | 6.300           | 248.900     | 5606.20    | 928.27           | -154.54      | -915.35     | 1.39          |
| 5809.00   | 5.100           | 245.400     | 5699.74    | 937.34           | -158.13      | -923.96     | 1.33          |
| 5903.00   | 3.700           | 242.300     | 5793.46    | 944.24           | -161.28      | -930.45     | 1.51          |
| 5998.00   | 3.700           | 216.900     | 5888.27    | 949.34           | -165.16      | -935.00     | 1.71          |
| 6093.00   | 3.000           | 192.000     | 5983.11    | 952.44           | -170.04      | -937.36     | 1.68          |
| 6188.00   | 0.700           | 146.300     | 6078.06    | 953.09           | -172.96      | -937.56     | 2.70          |
| 6281.00   | 1.200           | 145.200     | 6171.04    | 952.43           | -174.23      | -936.68     | 0.54          |
| 6376.00   | 0.900           | 129.700     | 6266.03    | 951.51           | -175.52      | -935.54     | 0.43          |
| 6471.00   | 1.100           | 99.900      | 6361.01    | 950.15           | -176.16      | -934.07     | 0.58          |
| 6566.00   | 0.800           | 97.400      | 6456.00    | 948.65           | -176.40      | -932.51     | 0.32          |
| 6662.00   | 0.900           | 112.900     | 6551.99    | 947.37           | -176.78      | -931.16     | 0.26          |
| 6757.00   | 0.900           | 107.300     | 6646.98    | 946.07           | -177.29      | -929.76     | 0.09          |
| 6852.00   | 1.000           | 92.500      | 6741.97    | 944.59           | -177.55      | -928.22     | 0.28          |
| 6947.00   | 1.300           | 97.800      | 6836.95    | 942.74           | -177.73      | -926.32     | 0.33          |
| 7041.00   | 1.000           | 102.300     | 6930.93    | 940.96           | -178.05      | -924.46     | 0.33          |
| 7137.00   | 1.200           | 90.400      | 7026.91    | 939.19           | -178.24      | -922.64     | 0.32          |
| 7231.00   | 1.200           | 104.100     | 7120.89    | 937.31           | -178.48      | -920.70     | 0.30          |
| 7324.00   | 1.400           | 115.000     | 7213.87    | 935.48           | -179.20      | -918.72     | 0.34          |
| 7408.00   | 1.200           | 98.100      | 7297.84    | 933.78           | -179.76      | -916.92     | 0.51          |
| 7460.00†  | 1.200           | 98.100      | 7349.83    | 932.74           | -179.91      | -915.85     | 0.00          |

## HOLE & CASING SECTIONS Ref Wellbore: Sekich 23-18 AWB Ref Wellpath: Sekich 23-18 AWP

| String/Diameter        | Start MD [feet] | End MD [feet] | Interval [feet] | Start TVD [feet] | End TVD [feet] | Start N/S [feet] | Start E/W [feet] | End N/S [feet] | End E/W [feet] |
|------------------------|-----------------|---------------|-----------------|------------------|----------------|------------------|------------------|----------------|----------------|
| 12.25in Open Hole      | 14.00           | 636.00        | 622.00          | 14.00            | 636.00         | 0.00             | 0.00             | 1.27           | -0.97          |
| 8.625in Casing Surface | 14.00           | 636.00        | 622.00          | 14.00            | 636.00         | 0.00             | 0.00             | 1.27           | -0.97          |
| 7.78in Open Hole       | 636.00          | 7460.00       | 6824.00         | 636.00           | 7349.83        | 1.27             | -0.97            | -179.91        | -915.85        |

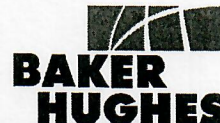


KerrMcGee

# Actual Wellpath Report

Sekich 23-18 AWP

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INTEQ

## REFERENCE WELLPATH IDENTIFICATION

|          |                          |          |                      |
|----------|--------------------------|----------|----------------------|
| Operator | KERR MCGEE               | Slot     | Slot #2 Sekich 23-18 |
| Area     | COLORADO                 | Well     | Sekich 23-18         |
| Field    | WELD COUNTY (KERR MCGEE) | Wellbore | Sekich 23-18 AWB     |
| Facility | SEC.18-T3N-R67W          |          |                      |

## TARGETS

| Name                    | MD [feet] | TVD [feet] | North [feet] | East [feet] | Grid East [us survey feet] | Grid North [us survey feet] | Latitude [°]  | Longitude [°]  | Shape  |
|-------------------------|-----------|------------|--------------|-------------|----------------------------|-----------------------------|---------------|----------------|--------|
| Existing Well (Unnamed) |           | 0.00       | 96.00        | 0.00        | 3159590.81                 | 1324702.21                  | 40 13 23.857N | 104 55 42.492W | circle |
| Sekich 20-18 Existing   |           | 0.00       | 44.00        | 12.00       | 3159603.15                 | 1324650.29                  | 40 13 23.343N | 104 55 42.337W | circle |
| Sekich 23-18 Target     |           | 6500.00    | -151.00      | -948.05     | 3158644.42                 | 1324449.12                  | 40 13 21.416N | 104 55 54.714W | circle |

## WELLPATH COMPOSITION Ref Wellbore: Sekich 23-18 AWB Ref Wellpath: Sekich 23-18 AWP

| Start MD [feet] | End MD [feet] | Positional Uncertainty Model | Log Name/Comment   | Wellbore         |
|-----------------|---------------|------------------------------|--------------------|------------------|
| 14.00           | 7408.00       | NaviTrak (Standard)          | BHI MWD <860-7460> | Sekich 23-18 AWB |
| 7408.00         | 7460.00       | Blind Drilling (std)         | Projection to bit  | Sekich 23-18 AWB |

## WELLPATH COMMENTS

| MD [feet] | Inclination [degrees] | Azimuth [degrees] | TVD [feet] | Comment           |
|-----------|-----------------------|-------------------|------------|-------------------|
| 7408.00   | 1.200                 | 98.100            | 7297.84    | final mwd survey  |
| 7460.00   | 1.200                 | 98.100            | 7349.83    | projection to bit |