

DAILY DRILLING REPORT

Project - Hole: 21-30 (ATum) Date: 11/16/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: \_\_\_\_\_  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 2006 to 2006 Mud/Air/ \_\_\_\_\_  
 Footage Cut 0' Temp: In \_\_\_\_\_ Out \_\_\_\_\_  
 Hole Size \_\_\_\_\_ Wt \_\_\_\_\_  
 Dev. Survey @ Vis \_\_\_\_\_  
 Casing \_\_\_\_\_ Ph \_\_\_\_\_  
 Bits, stabs, etc. & ser. # \_\_\_\_\_

Lithology \_\_\_\_\_

Additional Report Birdwell logging crew running logs from 11:30p-1:00p.

Sonic density, SP, gamma, induction and attempted to run temp. log but tool failed at 300 ft. 1 - MRT recorded BHT of 188<sup>0</sup>F. Removed BOPE, ran 2" tubing, built fence around pits and began rigging down.

Well History

Interval	Hole Size	Casing
0-206	10 1/4	7"
206-1734	6 1/4	
1734-2006	5 7/8	
_____	_____	_____
_____	_____	_____
_____	_____	_____

Expenditures

Total to date \$64,000.  
 Projected \_\_\_\_\_  
 Cost/Ft \_\_\_\_\_  
 Budgeted \$80,000.

DAILY DRILLING REPORT

Project - Hole: 21-30 (ATum) Date: 11/15/82  
NE1/4NW1/4NW1/4  
 Location:            of            Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #:             
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1818 to 2006 Mud/Air/ mud  
 Footage Cut 188' Temp: In 96<sup>0</sup>F Out 104<sup>0</sup>F  
 Hole Size 5 7/8 Wt 8.8  
 Dev. Survey @ Vis 30  
 Casing            Ph 10.2

Bits, stabs, etc. & ser. # AD51945 5 7/8 button

Lithology Thinly laminated dark gray shales and minor tan siltstone.

Additional Report Hauled water, dug additional mud pits and mixed low vis mud from 10:00 a.m.-4 p.m. Drilled from 4-7:30 p.m. Penetration from 15-22 ft/hr.

Circulated hole from 7:00-7:30p.m. POH, Birdwell Geophysics began logging hole at 7:30p

Well History

Interval	Hole Size	Casing
0-206	10 1/4	7"
<del>206-1734</del>	<del>6 1/4</del>	<del>          </del>
<del>1734-2006</del>	<del>5 7/8</del>	<del>          </del>
<u>          </u>	<u>          </u>	<u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>

Expenditures

Total to date             
 Projected             
 Cost/Ft             
 Budgeted

DAILY DRILLING REPORT

Project - Hole: 21-30 (A1um) Date: 11/14/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: \_\_\_\_\_  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1734 to 1818 Mud/Air/ mud  
 Footage Cut 84' Temp: In 91<sup>0</sup>F Out 105<sup>0</sup>F  
 Hole Size 5 7/8 Wt 8.7  
 Dev. Survey @ Vis 31  
 Casing \_\_\_\_\_ Ph 10.6

Bits, stabs, etc. & ser. # AD 51945, 5 7/8 button on at 1774'

Lithology Thin, dark gray shales (slightly firm) shales getting harder.

Additional Report POH at 1778' to change to 5 7/8" bit. RIH, drilled to 1818.

Drilling rate at 9-12'/hr.

Well History

Interval	Hole Size	Casing
<u>0-206</u>	<u>10 1/4</u>	<u>7"</u>
<u>206-1734</u>	<u>6 1/4</u>	<u>_____</u>
<u>1734-1818</u>	<u>5 7/8</u>	<u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>

Expenditures

Total to date \$46,000  
 Projected \$60,000  
 Cost/Ft \_\_\_\_\_  
 Budgeted \$80,000

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/13/82  
NET/4NWT/4NWT/4  
 Location:            of            Sec. 30 T IN R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #:             
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1734 to 1734 Mud/Air/             
 Footage Cut 0' Temp: In            Out             
 Hole Size 6 1/4" Wt             
 Dev. Survey @ Vis             
 Casing            Ph             
 Bits, stabs, etc. & ser. #           

Lithology           

Additional Report POH, change to 6 1/4" drag bit, RIH, bearings on Kelly  
swivel went out, shut down until midnight for repairs (total 3 hrs).

Well History

Interval	Hole Size	Casing
0-206	10 1/4	7"
206-1734	6 1/4	

Expenditures

Total to date             
 Projected             
 Cost/Ft             
 Budgeted

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/12/82  
NE1/4NW1/4NW1/4

Location:            of            Sec. 30 T 1N R381/2E Spud Date: 11/5/82

County, State: Esmeralda, Nevada Day #:           

Prog. Depth: 2,000' Contractor: Superior Drilling

Geologist: John Deymonaz Rig.: TKT

Drilled 1650' to 1734' Mud/Air/ mud

Footage Cut 84' Temp: In 90°F Out 105°F

Hole Size 6 1/4" Wt 8.7

Dev. Survey @ Vis 43

Casing            Ph 10.8

Bits, stabs, etc. & ser. # DW 714874 6 1/4 chisel tooth button bit

Lithology Thin, soft shales.

Additional Report Drilling 3-6'/hour; rig down for repairs to swivel

(11a.m. to 4:30 p.m.), POH at end of shift for drag bit.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4</u>	<u>7"</u>	Total to date <u>          </u>
<u>206-1734</u>	<u>6 1/4</u>	<u>          </u>	Projected <u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>	Cost/Ft <u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>	Budgeted <u>          </u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/11/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: \_\_\_\_\_  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1587 to 1650 Mud/Air/ mud  
 Footage Cut 63' Temp: In 85<sup>0</sup>F Out 102<sup>0</sup>F  
 Hole Size 6 1/4" Wt 8.6  
 Dev. Survey @ Vis 32  
 Casing \_\_\_\_\_ Ph 10.5

Bits, stabs, etc. & ser. # 6 1/4" chisel tooth button #DW 714874

Lithology Shales and clays.

Additional Report Shut down drilling at 9 a.m.; dug additional mud pits, mixed  
low vis polymer mud, conditioned hole, resumed drilling at 6 p.m. Occasional  
hard zones encountered below 1635' and penetration increasing to about  
5-10 ft/hr.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4</u>	<u>_____</u>	Total to date <u>_____</u>
<u>206-1650</u>	<u>6 1/4</u>	<u>_____</u>	Projected <u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Cost/Ft <u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Budgeted <u>_____</u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/10/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: \_\_\_\_\_  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1486' to 1587' Mud/Air/ mud  
 Footage Cut 101' Temp: In 89°F Out 104°F  
 Hole Size 6 1/4" Wt \_\_\_\_\_  
 Dev. Survey @ Vis 60  
 Casing \_\_\_\_\_ Ph 11

Bits, stabs, etc. & ser. # 6 1/4" chisel tooth button #DW714874

Lithology Soft shales (?). Unable to retrieve any cuttings.

Additional Report Penetration 3-6' per hour in shales. Clay rings building behind bit, stuck pipe twice during the day. Drillers now pulling Kelly up to Icean hole every 5 feet.

(Percy Wicklund on site from 11:00 a.m. - 4:00 p.m.).

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4"</u>	<u>_____</u>	<u>Total to date _____</u>
<u>206-1587</u>	<u>6 1/4"</u>	<u>_____</u>	<u>Projected _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Cost/Ft _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Budgeted _____</u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (ATum) Date: 11/9/82  
NET/4NW1/4NW1/4  
 Location:            of            Sec. 30 T IN R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: 7  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 1256' to 1486' Mud/Air/ mud  
 Footage Cut 230' Temp: In 86<sup>0</sup>F Out 160<sup>0</sup>F  
 Hole Size 6 1/4" Wt                       
 Dev. Survey @ Vis 38  
 Casing                      Ph 104

Bits, stabs, etc. & ser. # 6 1/4" chisel tooth button #DW714874

Lithology 0-1436' Esmeralda Fm., 1436-1486' shales and silt, hard.

Additional Report 1256-1436' penetration 20-30'/hr., formation change, penetration rate 3'/hr., POH to change bit, mixed mud, haul water, RIH, drilled 1436-1486', penetration 5-10'/hr.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4"</u>	<u>7"</u>	<u>Total to date \$32,250.</u>
<u>206-1486</u>	<u>6 1/4"</u>	<u>                    </u>	<u>Projected 80,000.</u>
<u>                    </u>	<u>                    </u>	<u>                    </u>	<u>Cost/Ft</u>
<u>                    </u>	<u>                    </u>	<u>                    </u>	<u>Budgeted</u>



**DAILY DRILLING REPORT**

Project - Hole: 21-30 (Alum) Date: 11/8/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: 6  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 880 to 1256 Mud/Air/ mud  
 Footage Cut 376 Temp: In 81°F Out 92°F  
 Hole Size 6 1/4" Wt \_\_\_\_\_  
 Dev. Survey @ Vis 35  
 Casing \_\_\_\_\_ Ph 10.0

Bits, stabs, etc. & ser. # 6 1/4" soft formation mill tooth bit.

Lithology Esmeralda formation; soft shale and siltstone.

Additional Report Encountered increasing amounts of water to 946'. Unable to  
unload hole with air at 946' at 2 a.m. Spent most of morning mixing mud and  
trying to control lost circulation. Resumed drilling at 10 a.m.; drilled with  
mud from 946-1226'. POH to change bit; RIH, mixed mud, drilled 1226-1256'.  
Penetration 20-30 ft/hr.

**Well History**

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4</u>	<u>_____</u>	<u>Total to date _____</u>
<u>206-1256</u>	<u>6 1/4</u>	<u>_____</u>	<u>Projected _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Cost/Ft _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Budgeted _____</u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (ATum) Date: 11/7/82  
NE1/4NW1/4NW1/4

Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82

County, State: Esmeralda, Nevada Day #: 5

Prog. Depth: 2,000' Contractor: Superior Drilling

Geologist: John Deymonaz Rig.: TKT

Drilled 206 to 880 Mud/Air/ air/foam injection

Footage Cut 674' Temp: In \_\_\_\_\_ Out \_\_\_\_\_

Hole Size 6 1/4 Wt \_\_\_\_\_

Dev. Survey @ Vis \_\_\_\_\_

Casing \_\_\_\_\_ Ph \_\_\_\_\_

Bits, stabs, etc. & ser. # Soft formation mill tooth bit.

Lithology Esmeralda formation; soft shales & siltstone with occasionally small hard silicified sandstone.

Additional Report Installed BOP equipment, tested pipe rams at

250 psi for 20 minutes. Blind rams at 200 psi for 20 minutes. Fixed rig lights

and strung new drawworks cable. Drilling rate 120 ft. per hour.

Encountered small amount of water at 800 ft.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206</u>	<u>10 1/4</u>	<u>_____</u>	<u>Total to date _____</u>
<u>206-880</u>	<u>6 1/4</u>	<u>_____</u>	<u>Projected _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Cost/Ft _____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	<u>Budgeted _____</u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/6/82  
NE1/4NW1/4NW1/4  
 Location: of Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: 4  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 0 to 206' Mud/Air/ air/foam injection  
 Footage Cut 0' Temp: In          Out           
 Hole Size 10 1/4" Wt           
 Dev. Survey @ Vis           
 Casing          Ph         

Bits, stabs, etc. & ser. #         

Lithology         

Additional Report Set 206' of 7" casing and cemented with 2.7 yards of 7 sack sand mix. Dug 2' cellar.

Well History

Interval	Hole Size	Casing
<u>0-206</u>	<u>10 1/4"</u>	<u>        </u>
<u>        </u>	<u>        </u>	<u>        </u>
<u>        </u>	<u>        </u>	<u>        </u>
<u>        </u>	<u>        </u>	<u>        </u>
<u>        </u>	<u>        </u>	<u>        </u>
<u>        </u>	<u>        </u>	<u>        </u>

Expenditures

Total to date           
 Projected           
 Cost/Ft           
 Budgeted

DAILY DRILLING REPORT

Project - Hole: 21-30 (ATum) Date: 11/5/82  
NET/4NW1/4NW1/4  
 Location:            of            Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: 3  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled 0' to 206' Mud/Air/ air/foam injection  
 Footage Cut 206' Temp: In            Out             
 Hole Size 10 1/4" Wt             
 Dev. Survey @ Vis             
 Casing            Ph           

Bits, stabs, etc. & ser. #           

Lithology           

Additional Report Completed moving trucks and equipment to drill site.

Started drilling at 7:00 p.m.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>0-206'</u>	<u>10 1/4"</u>	<u>          </u>	Total to date <u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>	Projected <u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>	Cost/Ft <u>          </u>
<u>          </u>	<u>          </u>	<u>          </u>	Budgeted <u>          </u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (Alum) Date: 11/4/82  
NET/4NW1/4NW1/4  
 Location:      of      Sec. 30 T 1N R381/2E Spud Date: 11/5/82  
 County, State: Esmeralda, Nevada Day #: 2  
 Prog. Depth: 2,000' Contractor: Superior Drilling  
 Geologist: John Deymonaz Rig.: TKT

Drilled      --      to      --      Mud/Air/       
 Footage Cut 0' Temp: In      Out       
 Hole Size      Wt       
 Dev. Survey      @      Vis       
 Casing      Ph     

Bits, stabs, etc. & ser. #     

Lithology     

Additional Report Moved drilling rig and equipment to location at 1900 hours.  
Unloaded trucks and set up equipment.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>    </u>	<u>    </u>	<u>    </u>	Total to date <u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>	Projected <u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>	Cost/Ft <u>    </u>
<u>    </u>	<u>    </u>	<u>    </u>	Budgeted <u>    </u>

DAILY DRILLING REPORT

Project - Hole: 21-30 (Atum) Date: 11/3/82

Location: NE1/4NW1/4NW1/4 of Sec. 30 T 1N R 381/2E Spud Date: 11/5/82

County, State: Esmeralda, NV Day #: 1

Prog. Depth: 2,000' Contractor: Superior Drilling

Geologist: John Deymonaz Rig.: TKT

Drilled -- to -- Mud/Air/ \_\_\_\_\_

Footage Cut 0' Temp: In \_\_\_\_\_ Out \_\_\_\_\_

Hole Size \_\_\_\_\_ Wt \_\_\_\_\_

Dev. Survey @ Vis \_\_\_\_\_

Casing \_\_\_\_\_ Ph \_\_\_\_\_

Bits, stabs, etc. & ser. # \_\_\_\_\_

Lithology \_\_\_\_\_

Additional Report H&H Oil Tool delivered BOP equipment. Parsons Construction  
built drill pad and blated access road. Vega Trucking delivered mud van.

Well History

<u>Interval</u>	<u>Hole Size</u>	<u>Casing</u>	<u>Expenditures</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Total to date <u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Projected <u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Cost/Ft <u>_____</u>
<u>_____</u>	<u>_____</u>	<u>_____</u>	Budgeted <u>_____</u>