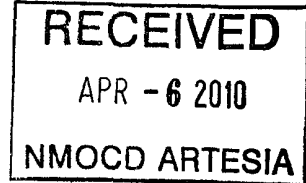




An Operating Unit of Smith International, Inc.



DIRECTIONAL SURVEY REPORT

MARBOB ENERGY CORPORATION

SHOCKER 20 FEDERAL #1H

EDDY COUNTY, NEW MEXICO

PREPARED BY: FRANCISCO SINISTERRA

Pathfinder Energy Services, Inc.
6213 W. Interstate 20 • Midland, TX • 79706
(432) 681-6000



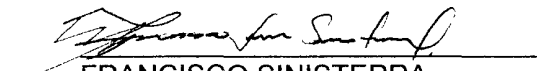
DIRECTIONAL SURVEY COMPANY REPORT:

1. NAME OF SURVEYING COMPANY: PATHFINDER ENERGY SERVICES
2. NAME OF PERSON(S) PERFORMING SURVEY:
A) NICHOLAS TVRDY
3. POSITION OF SAID PERSON(S): (A-F) SURVEYORS (FIELD ENGINEERS)
4. DATE(S) ON WHICH SURVEY WAS PERFORMED: 11/30/09 TO 12/07/09
5. STATE IN WHICH SURVEY WAS PERFORMED: NEW MEXICO
6. LOCATION OF WELL: EDDY COUNTY
7. TYPE OF SURVEY(S) PERFORMED: MWD
8. COMPLETE IDENTIFICATION OF WELL:

MARBOB ENERGY CORPORATION
SHOCKER 20 FEDERAL #1H
EDDY COUNTY, NM
RIG: PATRIOT 3

9. SURVEY CERTIFIED FROM: 6563 TO 11449 FEET MEASURED DEPTH.

THIS IS TO VERIFY THAT ATTACHED DOCUMENTS SHOWING THE WELL TO BE
DISPLACED AT 4668.46 FEET ON A BEARING OF 87.44 DEGREES FROM THE
CENTER OF THE ROTARY TABLE AT A PROJECTED BIT DEPTH OF 11552 FEET,
ARE TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE.


FRANCISCO SINISTERRA
MWD COORDINATOR



PathFinder Energy Services, Inc.

BHL Report

Page 01/01
Tie-in Date: 11/30/2009
Date Completed: 12/07/2009

MARBOB ENERGY CORPORATION
SHOCKER 20 FEDERAL #1H RE-ENTRY
EDDY COUNTY, NM
Rig: PATRIOT 3
PathFinder Office Supervisor: FRANCISCO SINISTERRA
PathFinder Field Engineers: N. TVRDY

Survey Horiz. Reference: WELLHEAD
Ref Coordinates: LAT: 32.646.9024 N LON: 104.049.2481 W
GRID Reference: NAD27 new mexico east Transverse Mercator
Ref GRID Coord: X: 598969.3000 Y: 404989.3000
North Aligned To: GRID NORTH
Total Magnetic Correction: 7.78° EAST TO GRID
Vertical Section Plane: 87.88
Survey Vert. Reference: 22.00' Kelly Bushing To Ground
Altitude: 2973.00' Ground To MSL

Measured Depth	11522.00	(feet)
Inclination	90.84	(deg)
Azimuth	82.73	(deg)
True Vertical Depth	7083.76	(feet)
Vertical Section	4668.32	(feet)
Survey X cord	603633.11	(feet)
Survey Y cord	405197.53	(feet)
Survey Lat	32.11356193 N	(deg)
Survey Lon	103.99861488 W	(deg)
Rectangular Corr. N/S	208.23 N	(feet)
Rectangular Corr. E/W	4663.81 E	(feet)
Closure Distance	4668.46	(feet)
Direction of Closure	87.44	(deg)
Dogleg Severity	0.00	(deg/100ft)

PathFinder Energy Services, Inc.

Survey Report

MARBOB ENERGY CORPORATION
SHOCKER 20 FEDERAL #1H RE-ENTRY
EDDY COUNTY, NM

Rig: PATRIOT 3

PathFinder Office Supervisor: FRANCISCO SINISTERRA

PathFinder Field Engineers: N. TVRDY

Survey Horiz. Reference: WELLHEAD
Ref Coordinates: LAT: 32.6.46.9024 N LON: 104.0.49.2481 W
Reference: NAD27 new mexico east Transverse Mercator
Ref GRID Coord: X: 598969.3000 Y: 404989.3000
North Aligned To: GRID NORTH
Total Magnetic Correction: 7.78° EAST TO GRID
Vertical Section Plane: 87.88
Survey Vert. Reference: 22.00' Kelly Bushing To Ground
Altitude: 2973.00' Ground To MSL

Survey Calculations by RX5 V6.02A using Minimum Curvature

Measured Depth (ft)	Incl (deg)	Drift Dir. (deg)	TVD (ft)	Course Length (ft)	Vertical Section (ft)	TOTAL Rectangular Offsets (ft) (ft)		Closure Dist Dir (ft) (deg)		DLS (dg/100ft)
TIE IN TO SCIENTIFIC GYRO SURVEY @ 6478' MD.										
6478.00	0.38	233.02	6476.86	0.00	4.75	36.70 S	6.11 E	37.21@	170.55	0.00
THE FOLLOWING ARE PATHFINDER MWD SURVEYS.										
6563.00	0.44	189.38	6561.86	85.00	4.45	37.19 S	5.83 E	37.65@	171.09	0.36
6595.00	2.46	80.57	6593.85	32.00	5.11	37.20 S	6.49 E	37.76@	170.10	8.23
6627.00	9.23	68.76	6625.66	32.00	8.22	36.16 S	9.56 E	37.40@	165.19	21.38
6658.00	15.04	76.99	6655.96	31.00	14.52	34.35 S	15.80 E	37.81@	155.29	19.51
6690.00	19.43	80.31	6686.52	32.00	23.88	32.52 S	25.10 E	41.08@	142.33	14.05
6722.00	21.81	86.53	6716.47	32.00	35.10	31.26 S	36.28 E	47.89@	130.75	10.10
6754.00	25.32	85.21	6745.80	32.00	47.89	30.33 S	49.04 E	57.66@	121.74	11.09
6785.00	27.26	85.70	6773.59	31.00	61.60	29.24 S	62.73 E	69.21@	115.00	6.30
6817.00	29.63	85.96	6801.72	32.00	76.83	28.14 S	77.93 E	82.85@	109.85	7.42
6849.00	32.01	84.59	6829.20	32.00	93.21	26.78 S	94.26 E	97.99@	105.86	7.75
6881.00	33.94	86.34	6856.05	32.00	110.61	25.41 S	111.62 E	114.48@	102.82	6.73
6913.00	37.11	87.36	6882.09	32.00	129.20	24.39 S	130.19 E	132.45@	100.61	10.08
6944.00	40.63	88.04	6906.22	31.00	148.65	23.62 S	149.62 E	151.48@	98.97	11.44
6976.00	44.23	87.46	6929.83	32.00	170.23	22.77 S	171.19 E	172.70@	97.58	11.32
7008.00	47.66	86.36	6952.08	32.00	193.22	21.52 S	194.15 E	195.34@	96.33	11.00
7040.00	51.00	85.92	6972.93	32.00	217.48	19.89 S	218.37 E	219.27@	95.20	10.49
7072.00	54.08	84.56	6992.40	32.00	242.85	17.77 S	243.67 E	244.32@	94.17	10.20
7103.00	57.33	84.49	7009.86	31.00	268.41	15.33 S	269.16 E	269.60@	93.26	10.49
7135.00	60.76	85.73	7026.32	32.00	295.82	12.99 S	296.50 E	296.79@	92.51	11.22
7167.00	65.60	85.54	7040.75	32.00	324.35	10.82 S	324.97 E	325.15@	91.91	15.13
7199.00	70.43	84.04	7052.73	32.00	353.97	8.12 S	354.51 E	354.60@	91.31	15.71
7230.00	75.10	84.31	7061.91	31.00	383.50	5.12 S	383.96 E	383.99@	90.76	15.09
7261.00	77.56	88.63	7069.24	31.00	413.61	3.27 S	414.01 E	414.02@	90.45	15.69

PathFinder Energy Services, Inc.

Survey Report

MARBOB ENERGY CORPORATION
SHOCKER 20 FEDERAL #1H RE-ENTRY
EDDY COUNTY, NM
RIG:PATRIOT 3

Page 02/03

Measured Depth (ft)	Incl (deg)	Drift Dir. (deg)	TVD (ft)	Course Length (ft)	Vertical Section (ft)	TOTAL Rectangular Offsets (ft) (ft)		Closure Dist Dir (ft) (deg)		DLS (dg/100ft)
7293.00	81.60	90.47	7075.03	32.00	445.06	3.03 S	445.47 E	445.48@	90.39	13.83
7325.00	81.69	90.65	7079.68	32.00	476.68	3.33 S	477.13 E	477.14@	90.40	0.62
7357.00	83.27	90.28	7083.86	32.00	508.37	3.59 S	508.85 E	508.87@	90.40	5.07
7388.00	83.27	89.63	7087.50	31.00	539.14	3.57 S	539.64 E	539.65@	90.38	2.08
7420.00	85.03	88.25	7090.76	32.00	570.97	2.98 S	571.47 E	571.47@	90.30	6.98
7452.00	86.88	86.52	7093.02	32.00	602.88	1.52 S	603.35 E	603.35@	90.14	7.91
7484.00	86.97	84.99	7094.73	32.00	634.81	0.84 N	635.22 E	635.22@	89.92	4.78
7516.00	86.79	84.82	7096.47	32.00	666.72	3.68 N	667.04 E	667.05@	89.68	0.77
7547.00	89.34	85.14	7097.52	31.00	697.66	6.39 N	697.90 E	697.93@	89.48	8.29
7578.00	92.15	84.87	7097.12	31.00	728.62	9.09 N	728.78 E	728.84@	89.29	9.11
7674.00	94.35	85.23	7091.68	96.00	824.34	17.36 N	824.26 E	824.45@	88.79	2.32
7769.00	92.24	85.90	7086.22	95.00	919.10	24.69 N	918.82 E	919.15@	88.46	2.33
7864.00	91.45	86.35	7083.16	95.00	1014.01	31.11 N	1013.55 E	1014.03@	88.24	0.96
7959.00	89.78	87.72	7082.14	95.00	1108.98	36.02 N	1108.41 E	1109.00@	88.14	2.27
8054.00	88.46	87.27	7083.60	95.00	1203.97	40.17 N	1203.31 E	1203.98@	88.09	1.47
8150.00	91.80	88.43	7083.38	96.00	1299.95	43.78 N	1299.22 E	1299.96@	88.07	3.68
8245.00	91.19	88.02	7080.90	95.00	1394.92	46.72 N	1394.14 E	1394.93@	88.08	0.77
8340.00	90.66	85.98	7079.37	95.00	1489.89	51.69 N	1489.00 E	1489.89@	88.01	2.22
8435.00	91.28	86.99	7077.76	95.00	1584.85	57.51 N	1583.80 E	1584.85@	87.92	1.25
8531.00	90.66	86.37	7076.13	96.00	1680.81	63.07 N	1679.63 E	1680.81@	87.85	0.91
8626.00	90.75	87.64	7074.96	95.00	1775.79	68.03 N	1774.49 E	1775.79@	87.80	1.34
8721.00	89.16	88.04	7075.04	95.00	1870.79	71.61 N	1869.42 E	1870.79@	87.81	1.73
8816.00	89.34	86.84	7076.28	95.00	1965.77	75.86 N	1964.31 E	1965.78@	87.79	1.28
8912.00	89.08	88.29	7077.61	96.00	2061.76	79.94 N	2060.21 E	2061.76@	87.78	1.54
9007.00	88.37	88.36	7079.72	95.00	2156.73	82.71 N	2155.15 E	2156.74@	87.80	0.75
9103.00	89.16	87.59	7081.79	96.00	2252.71	86.10 N	2251.07 E	2252.71@	87.81	1.15
9198.00	90.92	89.13	7081.72	95.00	2347.70	88.82 N	2346.02 E	2347.70@	87.83	2.46
9293.00	91.89	88.02	7079.39	95.00	2442.66	91.18 N	2440.96 E	2442.66@	87.86	1.55

PathFinder Energy Services, Inc.

Survey Report

MARBOB ENERGY CORPORATION
SHOCKER 20 FEDERAL #1H RE-ENTRY
EDDY COUNTY, NM
RIG: PATRIOT 3

Page 03/03

Measured Depth (ft)	Incl (deg)	Drift Dir. (deg)	TVD (ft)	Course Length (ft)	Vertical Section (ft)	TOTAL Rectangular Offsets (ft) (ft)		Closure Dist Dir (ft) (deg)		DLS (dg/100ft)
9389.00	93.30	88.02	7075.05	96.00	2538.56	94.50 N	2536.80 E	2538.56@	87.87	1.47
9484.00	91.89	89.02	7070.75	95.00	2633.45	96.95 N	2631.67 E	2633.45@	87.89	1.82
9579.00	91.45	88.70	7067.98	95.00	2728.40	98.84 N	2726.61 E	2728.40@	87.92	0.57
9674.00	89.69	88.50	7067.03	95.00	2823.38	101.16 N	2821.57 E	2823.39@	87.95	1.87
9770.00	90.31	88.45	7067.03	96.00	2919.38	103.71 N	2917.54 E	2919.38@	87.96	0.65
9865.00	91.80	89.39	7065.28	95.00	3014.34	105.50 N	3012.50 E	3014.35@	87.99	1.85
9961.00	90.66	89.86	7063.22	96.00	3110.27	106.13 N	3108.47 E	3110.29@	88.04	1.28
10056.00	86.88	88.47	7065.26	95.00	3205.21	107.51 N	3203.42 E	3205.23@	88.08	4.24
10151.00	88.02	89.92	7069.49	95.00	3300.08	108.85 N	3298.32 E	3300.11@	88.11	1.94
10247.00	86.70	90.08	7073.91	96.00	3395.92	108.85 N	3394.21 E	3395.96@	88.16	1.38
10342.00	86.61	89.05	7079.45	95.00	3490.71	109.57 N	3489.05 E	3490.77@	88.20	1.09
10437.00	87.32	88.87	7084.48	95.00	3585.56	111.29 N	3583.90 E	3585.62@	88.22	0.77
10533.00	89.16	87.69	7087.43	96.00	3681.51	114.17 N	3679.80 E	3681.57@	88.22	2.28
10628.00	89.16	86.44	7088.82	95.00	3776.48	119.03 N	3774.67 E	3776.54@	88.19	1.32
10724.00	89.96	86.58	7089.56	96.00	3872.45	124.88 N	3870.48 E	3872.50@	88.15	0.85
10819.00	89.16	85.74	7090.29	95.00	3967.41	131.24 N	3965.27 E	3967.44@	88.10	1.22
10915.00	88.90	85.38	7091.92	96.00	4063.31	138.67 N	4060.96 E	4063.33@	88.04	0.46
11007.00	90.48	84.39	7092.41	92.00	4155.18	146.87 N	4152.59 E	4155.19@	87.97	2.03
11101.00	90.92	83.79	7091.26	94.00	4248.97	156.55 N	4246.08 E	4248.97@	87.89	0.79
11196.00	91.28	83.61	7089.44	95.00	4343.70	166.97 N	4340.49 E	4343.70@	87.80	0.42
11290.00	91.10	81.63	7087.49	94.00	4437.28	179.04 N	4433.69 E	4437.30@	87.69	2.11
11385.00	90.92	83.51	7085.81	95.00	4531.85	191.33 N	4527.87 E	4531.91@	87.58	1.99
11449.00	90.84	82.73	7084.83	64.00	4595.62	198.99 N	4591.41 E	4595.72@	87.52	1.22
STRAIGHT LINE PROJECTION TO BIT @ 11522' MD.										
11522.00	90.84	82.73	7083.76	73.00	4668.32	208.23 N	4663.81 E	4668.46@	87.44	0.00



ENERGY SERVICES

TIE-IN SURVEY INFORMATION SHEET

CLIENT INFORMATION

CLIENT:	MARBOB ENERGY CORPORATION		
LEASE / WELL No.:	SHOCKER 20 FED	#1 RE-ENTRY	
WELL LOCATION:	EDDY COUNTY		
COUNTY / STATE / COUNTRY:	EDDY	NM	USA
RIG:	PATRIOT #3		
API WELL No:	30-015-36430		
JOB No:	101009344 WT-WT		
P.O. / AFE No.			
DIRECTIONAL COMPANY:	PATHFINDER ENERGY SERVICES		

WELL SITE INFORMATION

TOTAL MAGNETIC CORRECTION (TMC):			
On Wall Plat.	7.78	LWD Calculated:	7.78451
Agreed Upon:		7.78	
X =	598969.300000	Feet	Y = 404989.300000
		Feet	
SITE LATITUDE:	32.113028 N	SITE LONGITUDE:	104.0113680 W
GRID SYSTEM:	TRUE ☐ UTM ☒ LAMBERT ☐	ZONE:	NEW MEXICO EAST
PROPOSED DRIFT DIRECTION:	87.46 87.38		
KELLY BUSHING ELEVATION:	22		
ALTITUDE:	2973	Feet	WATER DEPTH:
		Feet	

TIE-IN SURVEY

MEASURED DEPTH:	6478
DRIFT ANGLE:	0.38
DRIFT DIRECTION:	233.02
TRUE VERTICAL DEPTH:	6476.86
VERTICAL SECTION:	4.75
RECTANGULAR COORDINATE (N / S) :	-36.7
RECTANGULAR COORDINATE (E / W) :	6.11
CLOSURE DISTANCE / DIRECTION:	
SURVEY CALCULATION METHOD:	AA ☐ MC ☒ RC ☐ BT ☐
SOURCE OF TIE-IN DATA (COMPANY):	SCIENTIFIC
COPY OF TIE-IN SURVEY REPORT	☒ YES ☐ NO

WELL PLAN

KICKOFF DEPTH:	6596.5	TOTAL DEPTH:	11542.03
KICKOFF ANGLE:	0.91	MAX ANGLE:	87.46

PES Engineers:

**Signature of both field engineers required if applicable

Directional Driller:

DATE: 29-Nov-09

PathFinder Energy Services, Inc.

Magnetic & Grid Calculations

MARBOB ENERGY
SHOCKER 20 FED #1 - RE-ENTRY
EDDY COUNTY, NEW MEXICO
Rig: PATRIOT 3

Wed Nov 25 12:50:52 2009

Coordinates

Latitude: 32.113028 N (32 deg. 6 min. 46.9024 sec.)
Longitude: 104.013680 W (-104 deg. 0 min. 49.2481 sec.)
Elevation: 2995.00 feet.
Calculation Date: Nov/25/2009

Magnetic Calculations

Model: IGRF2005
Dip Angle: 60.0610 degrees
Total Magnetic Field: 0.48711 gauss
Magnetic Declination: 7.954436 degrees
Horizontal Intensity: 0.243106 gauss
To Convert a Magnetic Dir. to a TRUE North Dir. Add 7.954436 Degr.

Transverse Mercator Grid Calculations NAD27

Grid System: Transverse Mercator: new mexico east
Ellipsoid: Clarke 1866
X: 598969.3000 feet
Y: 404989.3000 feet
True to Grid: (convergence) -0.169926 degrees
Magnetic to Grid: 7.784510 degrees
To Convert a Magnetic Dir. to a GRID dir. Add 7.784510 Degr.

Gyro #1.txt

H HEADER INFORMATION -----
 H COMPANY : Marbob
 H FIELD : Eddy County
 H SITE : Shocker 20 Federal
 H WELL : #1H
 H WELLPATH: OH
 H DEPTHUNT: ft
 H SURVDATE: 10/22/2008
 H-----

H WELL INFORMATION
 H WELL EW MAP : 598969.30
 H WELL NS MAP : 404989.30
 H DATUM ELEVN : 2995.00
 H VSECT ANGLE : 0.91
 H VSECT NORTH : 0.00
 H VSECT EAST : 0.00
 H-----

H SURVEY TYPE INFORMATION
 H 78.00 - 8173.00 GYRO #1 : CB-GYRO-MS
 H-----

H SURVEY LIST

H MD	INC	AZI	TVD	NS	EW
0.00	0.00	0.00	0.00	0.00	0.00
78.00	0.76	208.51	78.00	-0.45	-0.25
178.00	1.34	206.51	177.98	-2.08	-1.09
278.00	2.00	192.58	277.94	-4.83	-1.99
378.00	2.21	195.22	377.87	-8.40	-2.87
478.00	2.04	203.72	477.80	-11.89	-4.10
578.00	2.17	216.44	577.73	-15.04	-5.94
678.00	1.97	216.25	677.67	-17.95	-8.08
778.00	1.64	222.51	777.62	-20.39	-10.06
878.00	1.69	238.17	877.58	-22.22	-12.28
978.00	1.62	242.90	977.54	-23.64	-14.79
1078.00	1.60	245.72	1077.50	-24.86	-17.32
1178.00	0.68	260.15	1177.48	-25.54	-19.18
1278.00	0.48	277.68	1277.47	-25.58	-20.18
1378.00	0.44	293.64	1377.47	-25.37	-20.95
1478.00	0.64	261.08	1477.46	-25.31	-21.85
1578.00	0.67	254.30	1577.46	-25.55	-22.96
1678.00	0.63	246.62	1677.45	-25.93	-24.03
1778.00	0.62	260.41	1777.44	-26.23	-25.07
1878.00	0.79	255.69	1877.44	-26.50	-26.27
1978.00	0.88	258.19	1977.43	-26.82	-27.69
2078.00	0.62	248.31	2077.42	-27.18	-28.95
2178.00	0.18	87.77	2177.42	-27.37	-29.29
2278.00	0.52	118.94	2277.41	-27.59	-28.74
2378.00	1.09	92.61	2377.40	-27.85	-27.39
2478.00	1.78	90.88	2477.37	-27.92	-24.89
2578.00	2.36	95.09	2577.31	-28.12	-21.28
2678.00	2.50	92.60	2677.22	-28.41	-17.05
2778.00	2.04	91.62	2777.14	-28.55	-13.10
2878.00	1.64	90.07	2877.09	-28.61	-9.89
2978.00	1.58	90.24	2977.05	-28.61	-7.08
3078.00	1.33	89.83	3077.01	-28.62	-4.54
3178.00	1.26	89.05	3176.99	-28.60	-2.28
3278.00	1.27	81.90	3276.96	-28.42	-0.08
3378.00	1.04	79.40	3376.94	-28.10	1.91
3478.00	0.99	81.24	3476.93	-27.80	3.65
3578.00	0.69	87.51	3576.92	-27.64	5.11
3678.00	0.43	87.97	3676.91	-27.60	6.09
3778.00	0.46	80.68	3776.91	-27.52	6.86
3878.00	0.43	78.78	3876.91	-27.39	7.62
3978.00	0.43	88.92	3976.90	-27.31	8.37

Gyro #1.txt					
4078.00	0.44	113.26	4076.90	-27.45	9.09
4178.00	0.45	111.92	4176.90	-27.75	9.81
4278.00	0.21	149.06	4276.90	-28.05	10.27
4378.00	0.15	80.77	4376.90	-28.19	10.49
4478.00	0.37	195.57	4476.90	-28.48	10.53
4578.00	0.17	253.50	4576.89	-28.83	10.31
4678.00	0.03	304.65	4676.89	-28.86	10.14
4778.00	0.10	158.15	4776.89	-28.92	10.15
4878.00	0.09	175.47	4876.89	-29.08	10.19
4978.00	0.18	187.26	4976.89	-29.32	10.18
5078.00	0.22	239.86	5076.89	-29.57	9.99
5178.00	0.24	271.06	5176.89	-29.66	9.62
5278.00	0.35	250.98	5276.89	-29.76	9.12
5378.00	0.22	268.04	5376.89	-29.86	8.64
5478.00	0.21	247.77	5476.89	-29.94	8.28
5578.00	0.24	223.09	5576.89	-30.16	7.96
5678.00	0.39	198.89	5676.89	-30.64	7.71
5778.00	0.49	200.22	5776.88	-31.36	7.45
5878.00	0.52	214.31	5876.88	-32.14	7.05
5978.00	0.46	206.75	5976.88	-32.87	6.61
6078.00	0.49	202.06	6076.87	-33.63	6.27
6178.00	0.44	176.71	6176.87	-34.41	6.13
6278.00	0.62	171.58	6276.87	-35.32	6.23
6378.00	0.37	174.12	6376.86	-36.18	6.35
6478.00	0.38	233.02	6476.86	-36.70	6.11
6578.00	0.68	278.04	6576.86	-36.82	5.26
6678.00	1.91	285.14	6676.83	-36.30	3.07
6778.00	2.62	289.61	6776.75	-35.10	-0.70
6878.00	2.37	290.88	6876.66	-33.59	-4.78
6978.00	2.03	289.20	6976.58	-32.27	-8.39
7078.00	1.80	285.13	7076.53	-31.28	-11.57
7178.00	1.09	274.36	7176.49	-30.80	-14.04
7278.00	1.21	284.20	7276.47	-30.47	-16.01
7378.00	0.98	289.26	7376.46	-29.93	-17.84
7478.00	0.70	261.73	7476.44	-29.73	-19.25
7578.00	0.59	244.20	7576.44	-30.04	-20.32
7678.00	0.54	255.30	7676.43	-30.39	-21.24
7778.00	0.58	269.39	7776.43	-30.51	-22.20
7878.00	0.36	250.33	7876.43	-30.62	-23.00
7978.00	0.26	273.23	7976.42	-30.72	-23.53
8078.00	0.40	257.85	8076.42	-30.78	-24.09
8173.00	0.68	247.23	8171.42	-31.07	-24.94

Form 3160-3
(February 2005)

OCD-ARTESIA
JUL 11 2008

OCD-ARTESIA
JUL 14 2008
902

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

FORM APPROVED
OMB No. 1004-0137
Expires March 31, 2007

1a. Type of work ☒ DRILL ☐ REENTER		5. Lease Serial No. NMNM 102031
1b. Type of Well ☒ Oil Well ☐ Gas Well ☐ Other ☒ Single Zone ☐ Multiple Zone		6. If Indian, Allottee or Tribe Name
2. Name of Operator Marbob Energy Corporation		7. If Unit or CA Agreement, Name and No
3a. Address P.O. Box 227, Artesia, NM 88211-0228		8. Lease Name and Well No. Shocker 20 Federal #1H
3b. Phone No (include area code) 505-748-3303		9. API Well No. 30-015-36430
4. Location of Well (Report location clearly and in accordance with any State requirements *) At surface 1750' FSL & 330' FWL At proposed prod. zone BHL: 1750' FSL & 2310' FWL		10. Field and Pool, or Exploratory Willow Lake; Bone Spring, SE
14. Distance in miles and direction from nearest town or post office* About 11 miles from Malaga, NM		11. Sec., T R M or Bk and Survey or Area Section 20, T25S - R29E
15. Distance from proposed* location to nearest property or lease line, ft (Also to nearest drg. unit line, if any) 330'	16. No. of acres in lease 640.00	17. Spacing Unit dedicated to this well 80
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft	19. Proposed Depth 9400'	20. BLM/BIA Bond No. on file NMB000412
21. Elevations (Show whether DF, KDB, RT, GL, etc) 2973' GL	22. Approximate date work will start* 06/13/2008	23. Estimated duration 35 Days

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No 1, must be attached to this form

- | | |
|---|--|
| 1. Well plat certified by a registered surveyor | 4. Bond to cover the operations unless covered by an existing bond on file (see Item 20 above) |
| 2. A Drilling Plan | 5. Operator certification |
| 3. A Surface Use Plan (if the location is on National Forest System Lands, the SUPO must be filed with the appropriate Forest Service Office) | 6. Such other site specific information and/or plans as may be required by the BLM. |

25. Signature <i>Nancy T. Agnew</i>	Name (Printed/Typed) Nancy T. Agnew	Date 05/13/2008
Title Land Department		

Approved by (Signature) <i>/s/ Don Peterson</i>	Name (Printed/Typed) /s/ Don Peterson	Date JUL 11 2008
Title FIELD MANAGER		Office CARLSBAD FIELD OFFICE

Application approval does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Conditions of approval, if any, are attached

APPROVAL FOR TWO YEARS

Title 18 USC Section 1001 and Title 43 USC Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction

*(Instructions on page 2)

Carlsbad Controlled Water Basin

**SEE ATTACHED FOR
CONDITIONS OF APPROVAL**

**Approval Subject to General Requirements
& Special Stipulations Attached**

[Handwritten signature]

State of New Mexico

NOV 16 2009

DISTRICT I

1025 N. PENNY DR., DODGE, NM 86240

Energy, Minerals and Natural Resources Department

Form C-102

DISTRICT II

1501 W. GRAND AVENUE, ARTESIA, NM 86210

OIL CONSERVATION DIVISION

Revised October 12, 2005

Submit to Appropriate District Office

State EDDYee - 4 Copies

Fee EDDYee - 3 Copies

DISTRICT III

1000 Rio Brazos Rd., Atec, NM 87410

1220 SOUTH ST. FRANCIS DR.

Santa Fe, New Mexico 87505

DISTRICT IV

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

WELL LOCATION AND ACREAGE DEDICATION PLAT

☐ AMENDED REPORT

API Number	Pool Code	Pool Name
Property Code	Property Name SHOCKER 20 FEDERAL	Well Number 1H
OGRID No.	Operator Name MARBOB ENERGY CORPORATION	Elevation 2973'

Surface Location

UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
L	20	25-S	29-E		1750	SOUTH	330	WEST	EDDY

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
I	20	25-S	29-E		1980	SOUTH	330	EAST	EDDY
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

	OPERATOR CERTIFICATION I hereby certify that the information herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division. Signature _____ Date _____ Printed Name _____
	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. Date Surveyed _____ Signature & Seal of Professional Surveyor _____ Certificate No. GARY C. EIDSON 12041 RONALD J. EIDSON 3239