Form 3160-3
(August 1999)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

N.M. Oil Cons. DIV-Dist. 2
1301 W. Grand Avenue
Artesia, NM 88210

FORM APPROVED
OMB NO. 1004-0136
Expires: November 30, 2000

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No.: NMNM-98122

1a. Type of Work: [X] DRILL [ ] REENTER

6. If Indian, Allotee or Tribe Name: N/A

1b. Type of Well: [ ] Oil Well [X] Gas Well [ ] Other [X] Single Zone [ ] Multiple Zone

7. Unit or CA Agreement Name and No.:

2. Name of Operator: Chevron U.S.A. Inc.

8. Lease Name and Well No.: SKELLY UNIT #952

3a. Address: 15 Smith Road, Midland Texas 79705

3b. Phone No. (include area code): (432) 687-7375

9. API Well No.: 30-015-32895

4. Location of Well (*Report location clearly and in accordance with any State equirements*)*

At surface: 990' FNL, & 990' FWL, UNIT LETTER D

10. Field and Pool, or Exploratory: CEDAR LAKE NORTH MORROW

At proposed prod. zone: SAME

11. Sec., T., R., M., or Blk. and Survey or Area: SEC 21, T-17S, R-31E

14. Distance in miles and direction from nearest town or post office*: 5.6 MILES EAST OF LOCO HILLS, NM

12. County or Parish: EDDY

13. State: NM

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drg. unit line, if any)	16. No. of Acres in lease	17. Spacing Unit dedicated to this well
990'	1200	40

18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft.	19. Proposed Depth	20. BLM/BIA Bond No. on file
	11,800'	

21. Elevations (Show whether DF, KDB, RT, GL, etc.)	22. Approximate date work will start*	23. Estimated duration
3740' GL	9-01-03	4 WEEKS

ROSWELL CONTROLLED WATER BASIN

24. Attachments

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

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

25. Signature	Name (*Printed/Typed*)	Date
Denise Pinkerton	DENISE PINKERTON	5-07-03

Title: REGULATORY SPECIALIST

Approved by (Signautre)	Name (*Printed/Typed*)	Date
/s/ Joe G. Lara	/s/ Joe G. Lara	24 JUN 2003

Title	Office
FIELD MANAGER	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 1 YEAR

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowlingly 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 Reverse)

APPROVAL SUBJECT TO
GENERAL REQUIREMENTS
AND SPECIAL STIPULATIONS
ATTACHED

JUN 2003
RECEIVED
OCD - ARTESIA

DISTRICT I
P.O. Box 1980, Hobbs, NM 88241-1980

DISTRICT II
P.O. Drawer DD, Artesia, NM 88211-0719

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

DISTRICT IV
P.O. BOX 2088, SANTA FE, N.M. 87504-2088

State of New Mexico
Energy, Minerals and Natural Resources Department

OIL CONSERVATION DIVISION
P.O. Box 2088
Santa Fe, New Mexico 87504-2088

Form C-102
Revised February 10, 1994
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
	74600	Cedar Lake North Morrow - Gas

Property Code	Property Name	Well Number
	SKELLY UNIT	952

OGRID No.	Operator Name	Elevation
4323	Chevron U.S.A. Inc.	3740'

Surface Location

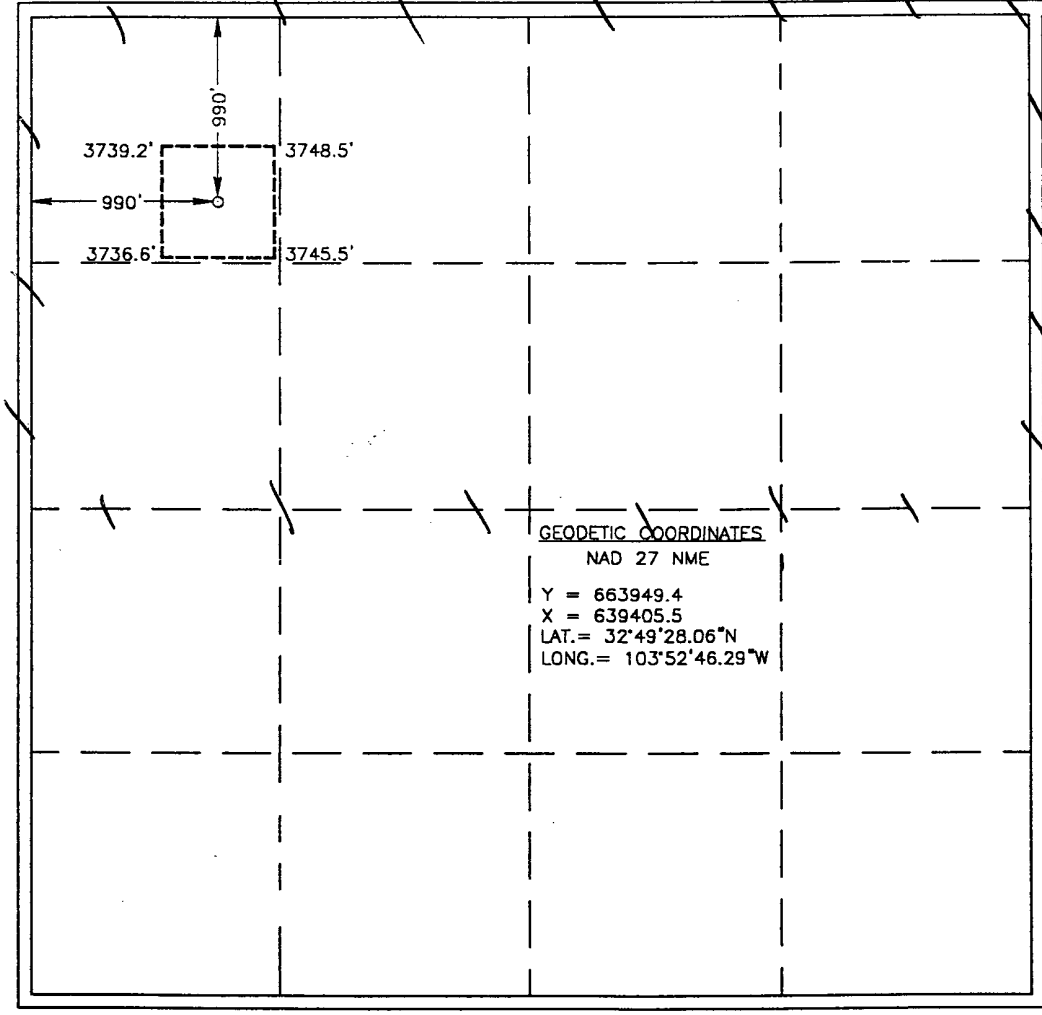
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D	21	17-S	31-E		990'	NORTH	990'	WEST	EDDY

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

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
320			

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.

Denise Pinkerton
Signature

Denise Pinkerton
Printed Name

Regulatory Specialist
Title

5-07-03
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 supervison, and that the same is true and correct to the best of my belief.

APRIL 1, 2003
Date Surveyed AWB

Signature & Seal of Professional Surveyor

Ronald J. Eidson 4/07/03
03.11.0364

Certificate No. RONALD J. EIDSON 3239
GARY EIDSON 12641

DIRECTIONS

From Loco Hills, go 6 miles east on US Highway 82 to County Road 529. Turn South on CR 529 and drive south for +/-1/2 mile. Turn back to the west. Location is +/-0.5 miles west of intersection with 529.

PROPOSED WORK

SURFACE HOLE:

1. Call the 1-800 dig number and notify BLM (505-234-5972) 3 working days prior to building location. Build location and cellar prior to moving in rotary tools. Have reserve pits lined and filled with water. A fresh water well should be located and utilized for fresh water as opposed to trucking. Set a 20" cemented conductor at ±40'.

2. Move in and rig up rotary tools. Rig up mud/gas separator which will be needed for the lower portion of the hole, if necessary. Conduct safety meeting with rig personnel. Post drilling permit and emergency response plan in the dog house. Notify the BLM and OCD of intent to spud.

3. Pick up a 17-1/2" rental re-tip bit, shock sub, on slick drill collars (minimum of 3-8" collars). Deviation is not expected to be a problem. Inclinations less than one degree are common.

4. Spud well utilizing fresh water as the drilling fluid. Circulate the reserve pit for solids control. It is imperative that brine, oil, or other contaminants not be introduced into the surface hole. The main purpose of this hole is to protect fresh water sands. Lost circulation was encountered on a well in the area at 62' and required drilling without returns to casing point.

5. Drill a 17-1/2" hole to 475' (or 25' into the Rustler, per BLM stips). Run 13-3/8" casing as follows:

WITNESS

a) Guide shoe
b) 1 joint 13-3/8", 48 ppf, H-40, STC casing
c) Insert float
d) ±435', 13-3/8", 48 ppf, H-40, STC casing

Centralize the bottom three joints and every fourth joint thereafter.

Threadlock the field and mill ends of the bottom three joints and all float equipment.

INSPECTION: None

6. Circulate casing capacity or annular volume, whichever is greater. Cement in accordance with attached cementing summary. Displace cement with fresh water utilizing wiper plug. Displace to within ±40' of shoe. Check float. If float fails, shut in for a minimum of four hours. If cement does not circulate, will need to run temperature survey, notify BLM and 1" back to surface.

7. Cut off casing. Install casing (starting) head. Test starting head to ±385 psi (50% of collapse rating).

8. Nipple up 5M BOP stack. Test BOPE to 250 psi low for 5 minutes, 1000 psi high for 30 minutes. Test casing to 1000 psi for 30 minutes. Test choke manifold to 250 psi low for 10 minutes, 3000 psi high for 10 minutes.

9. Install H_2S detection equipment prior to drilling out. This equipment will remain on location until the rig is released. Equipment to include warning signs, windsocks, and detectors at the cellar, at the rotating head, at the flow line and on the floor.

INTERMEDIATE HOLE:

1. Trip in hole with a 12-1/4" bit, with a packed hole BHA (bit, ss, 3-point, sdc, ibs, dc, ibs) and tag cement.

2. Drill a 12-1/4" hole to a TD depth of 4500'. Brine water will be utilized as the drilling fluid, circulating the reserve pit for solids removal to this depth. An offset experienced lost circulation out from under surface casing and had to drill blind to ICP.

3. Take TOTCO single shot surveys every 350' or adjust accordingly in an attempt to keep deviation below 3.0°.

4. Run casing as follows:

   a) Guide shoe
   b) ±45' (1 joint) 8-5/8", 32 ppf, J-55, LTC
   c) Float collar
   d) ±4455', 8-5/8", 32 ppf, J-55, LTC

   Centralize the bottom three joints. Threadlock the field and mill ends of the bottom three joints and all float equipment.

   INSPECTION: BCI and drift

5. Circulate casing capacity or annular volume, whichever is greater. Cement in accordance with attached cementing summary. Displace cement with fresh water utilizing wiper plug. Displace to within ±40' of shoe. Check float. If float fails, shut in for a minimum of four hours. If cement fails to circulate, will need to run temperature survey, notify BLM and 1" back to surface.

6. Cut off casing. Install B-Section casing head. Test head to ±1265 psi (50% of collapse rating).

7. Nipple up BOP stack. Test BOPE to 250 psi low for 10 minutes, 5000 psi high for 10 minutes. Test annular to 250 psi low for 10 minutes, 1500 psi high for 10 minutes. Test casing to 2000 psi for 30 minutes.

PRODUCTION HOLE:

1. Trip in hole with a bit, packed hole BHA (tri collar, IBS, drill collar, IBS) and and tag cement. Rig up mud logger to have ready when drilling out of shoe – Suttles 915-687-3148 or 800-979-9096 (carry $900/day on morning report).

2. Drill a 7-7/8" hole to 11,800'. Fresh water will be utilized as the drilling fluid until 10,650'. At 10,650', mud properties will be adjusted as discussed in the mud program. In this portion of the field, **deviations of 6 degrees may be encountered from 6400' to 9500'**. Past attempts to control deviation with a motor have had mixed results. **Deviation will be monitored closely.** If deviation is encountered, we will drill this section of the hole with a straight hole motor.

3. Condition hole and trip out and run open hole logs.

4. Trip in hole and condition for casing; trip out of hole laying down.

5. Run casing as follows:

   a) Float shoe
   b) ±90' (2 joints) 5-1/2", 17 ppf, N-80, LTC
   c) Float collar
   d) ±3210', 5-1/2", 17 ppf, N-80, LTC
   e) DV tool at ±8500' from surface
   f) ±8500', 5-1/2", 17 ppf, N-80, LTC

   Include short joint in the string at ±11000'. Centralize the bottom three joints and across any potential pay. Threadlock the field and mill ends of the bottom three joints and all float equipment.

INSPECTION: BCI and drift

15. Cement in accordance with attached cementing summary.

16. Set slips with weight as cemented. Cut off casing. Install permanent 11" 5000 psi X 7-1/16" 5000 psi tubing head. Test seal to 50% of collapse rating.

17. Release rig. Rig down and move out rotary tools.

POTENTIAL PROBLEMS

Surface Hole:

Lost circulation encountered on awell in the area.

Intermediate Hole:

Lost circulation was encountered on the Oxy Pistachio offset, not typical.

Water flows from waterflood are possible.

Rig up H2S safety equipment prior to drilling out the 13-3/8" shoe. Maintain pH at 10+ and treat with H2S scavenger.

Production Hole:

Possible lost circulation (less than 10 BPH from 6500' to 9500', 50 BPH from 9500' to 10000', 25 BPH from 10000' to TD).

Deviation to 6 degrees from 6400' to 9500'.

Deviation will be monitored closely.

MUD PROGRAM

Interval	Type	Weight (ppg)	Vis. (sec/qt)	Fluid Loss (cc)	Remarks
Surf to 475'	Fresh Wtr.	8.6	32	No control	Circulate reserve
475' to 4500'	Brine	10	29	No control	Circulate reserve

4500' to 10650'	Fresh Wtr.	8.5	28 -- 45	No control	Circulate reserve
10650' to TD	Cut Brine	9 to 10.1	29 – 45	LT 12 below 10650' chlorides above 90,000 add XCD polymer 0.5#/bbl PHPA at 10900' visc to 45 by 11650'	

When circulating the reserve, it is a good practice to switch to the steel pits for one hour each tour to monitor gains/losses.

EVALUATION PROGRAM

Mud Logging:

A two man unit will be rigged up at 4500' and utilized to total depth.

Open Hole Logs:

NGT-CNL-LDT, DLL w/ MSFL, BHC Sonic, FMI from TD.

Sidewall cores are a possibility.

SURFACE CEMENTING PROGRAM

Cement with 490 sacks Class "C" with 2% S1.

Minimum waiting on cement time: 12 hours

Cement properties:

Slurry weight: .....14.8 ppg

Slurry yield: ..... 1.34 ft^3 per sack

Cement must circulate to surface. If cement does not circulate, run a temperature survey six to eight hours after cementing. Contact the BLM and OCD and the Midland office for proper procedure to bring cement to surface. Normal procedure is to run one inch tubing down the annulus to top of cement, therefore one inch tubing should be on location or readily available.

Cement volume is based on 17-1/2" by 13-3/8" annular volume plus 100% excess. If drilling without returns, add an additional 100% excess, for a total of 735 sx.

INTERMEDIATE CEMENTING PROGRAM

Cement with 2130 sacks 35/65 pozmix Class "H" with 6% D20, 5% D44, 1/4 lb. cellophane flakes followed by 440 sacks Class "H" neat.

Minimum waiting on cement time: 12 hours

Cement properties:

Slurry weight: (lead).....12.8 ppg
(tail)..... 15.6 ppg

Slurry yield: (lead).....1.94 ft^3 per sack
(tail)..... 1.18 ft^3 per sack

Cement must circulate to surface. If cement does not circulate, run a temperature survey six to eight hours after cementing. Contact the BLM and OCD and the Midland office for proper procedure to bring cement to surface. Normal procedure is to run one inch tubing down the annulus to top of cement, therefore one inch tubing should be on location or readily available.

Cement volume is based on 12-1/4" by 8-5/8" annular volume plus 150% excess.

PRODUCTION CEMENTING PROGRAM

Place bomb type DV tool at ±8500'.

Cement first stage with 1000 sacks of 50/50 pozmix Class "H" with 2% D20, 5% D44 and 1/4 lb. cellophane flakes. Circulate four to six hours between stages unless it is determined that this would be non-productive time considering the lost circulation during drilling operations.

Cement second stage with 860 sacks of 35/65 pozmix Class "H" with 6% D20, 5% D44, 1/4 lb. cellophane flakes followed by 1210 sacks of 50/50 pozmix Class "H" with 2% D20, 5% D44, 1/4 lb. cellophane flakes.

Cement Properties:

First Stage	**All**
Slurry Weight	14.2 ppg
Slurry Yield	1.35 cu-ft/sx

Second Stage	**Lead**	**Tail**
Slurry Weight	12.4 ppg	14.2 ppg

Slurry Yield	2.17 cu-ft/sx	1.35 cu-ft/sx

1st Stage: Cement volume based on 7-7/8" open hole by 5-1/2" annular volume plus 135% excess. Adjust cement volumes to yield caliper plus 35% excess.

2nd Stage: Cement volume based on 7-7/8" open hole by 5-1/2" annular volume plus 135% excess. Adjust lead cement volumes to yield caliper plus 35% excess in open hole and 15% in cased hole.

Cement is designed to circulate to surface. If cement does not circulate, run a temperature survey to determine top of cement.

CASING SUMMARY

SURFACE:

475', 13-3/8", 48 ppf, H-40, STC

INTERMEDIATE:

4500', 8-5/8", 32 ppf, J-55, LTC

PRODUCTION:

11800', 5-1/2", 17 ppf, N-80
DV @ 8500'

TUBING:

11500', 2-3/8", 4.6 ppf, L-80, EUE

CASING PROPERTIES

	BURST		COLLAPSE		Test
	Rated	(80%)	Rated	(80%)	Pressure
13-3/8", 48 ppf, H-40, STC	1730	1380	770	610	500
8-5/8", 32 ppf, J-55, LTC	3930	3140	2530	2020	1500
5-1/2", 17 ppf, N-80, LTC	7740	6190	6280	5020	2000

PARTNER INFORMATION

Mack Energy

CHEVRON U.S.A., Inc.
Well Proposal Data Sheet

Well Name: Skelly Unit #952 Field/Area: Cedar Lake North Morrow Date: 3/12/2003

Surf. Loc. : 990' FNL & 990' FWL, Section 21, T17S R31E County/State: Eddy Co., N.M.

Shot Pt. for Surf. Loc.: na Authorized TD: 12,200' MD

B.H. Target: vertical well @ TVD **Actual Est. TD: 11,800' MD**

Shot Pt. for B.H. Target: na Actual Est. TD: TVD

Estimated Formation Tops (based on 3740' GL est, 3757' KB est. elevations):

Formation	TVD	Subsea
Paddock	4800	-1043
Abo Shale	6900	-3143
Abo Carbonate	7000	-3243
Wolfcamp	8350	-4593
Cisco	10150	-6393
Strawn	10650	-6893

Formation	TVD	Subsea
Atoka	10900	-7143
Morrow	11150	-7393
Morrow Clastics	11400	-7643
Mississippian Lime	11650	-7893
TD (probable)	11800	-8043

Suggested Csg Depths: 13 3/8" @ ~400', 9 5/8" @ ~4500', 5.5" at TD.

Required Mud Parameters: sufficient for samples and well control

Sample, Drilling Time & ML Requirements: 2 man mudlogging unit from 4500' to TD

DST's (incl any special requirements): none anticipated

Cores (incl est. cost for analysis): SWC's included in OH logs below

Anticipated Completion Intervals:

Formation	Depths	Pressures
Morrow	11,400 - 11,650'	normal

Other Potential Pay Zones:

Formation	Depths	Pressures
Atoka	10,900-11,150'	normal
Abo	7000-8000'	normal
Paddock	4800-5000'	normal

Type of Logs (incl sidewall cores) and Est. Total Cost:

Run # 1 (logs & intervals): NGT-CNL-LDT, DLL w/ MSFL, BHC Sonic, SWC's, FMI - Cost est. ~ $35M

Run # 2 (logs & intervals):

Run # 3 (logs & intervals):

Possible Drilling Hazards (High press, lost circ, H2S, deviation, etc.): deviation problems not uncommon in area due to Permian formations bed dip to south. Also, Oxy Pistachio well experienced severe shallow lost circulation @ 964'

Remarks (Special well, production csg size/OH completion or location requirements, etc):

Base Fresh Water: By: Water Board Letter/Other (Specify)

Rule 37/Unorthodox Location?: NO Date Regulatory Approval Expected?:

Required height of tubing spool above GL: Offset Well Data Available? YES

Required Xmas tree size & pressure rating: Completion Type (Flwg/Type Art Lift): flwg gas

Prep by: DRM

3/19/2003

ANTICIPATED DRILLING PROGRAM

Date 3/19/2003 WBS No. Pending

Field Cedar Lake North Morrow

Lease Skelly Unit Well No. 952

Surface Location 990' FNL, 990' FWL, Section 21, T17S, R31E

Bottom Hole Location

Approved Total Depth		Estimated Cost					
11,800	TVD	1,102,200	Dry Hole Cost	42.0	Days Drill	[X] Single	Dev. [ ]
11,800	MD		Completion Cost		Days Compl.	[ ] Dual	Res. [ ]
3,740	GL ELEV	1,102,200	Total	42.0	Days Total	? % Tx. Int.	OSWC [ ]
							RWC [ ]

ANTICIPATED FORMATION TOPS

Sand Name	TVD Expected	Press Grad. (psi/ft)	BHP	P.P.	Gauge	F.L.	Equiv. Mud Wt.	Antcpd. Prod.	Antcpd. SITP
Rustler	?								
Yates	?								
Paddock	4800	Potential Pay #4					8.3	Oil	
Abo Shale	6900								
Abo Carbonate	7000	Potential Pay #3					8.3	Oil	
Wolfcamp	8350								
Cisco	10150								
Strawn	10650								
Atoka Sand Stone	10900	Potential Pay #2					8.3		
Morrow Lime Stone	11150								
Morrow Sand Stone	11400	Primary Pay							
Mississippian Lime	11650								
Barnett Shale	?								
Total Depth	11800								

CASING AND CEMENTING DATA

SIZE Hole	SIZE Csg.	Depth			Sacks		Wt. (PPG)	Instructions
17.5	13.375	475	FW	--Surface	L 0		14.2	Class "C" with 2% gel, 2% CaCl2
					T 490		14.8	Class "C" with 2% CaCl2
12.25	8.625	4500	Brine	--Intermediate	L 2130		12.8	Class "H" 35/65 Poz with 6% gel, 5% salt, 1/4# cell.
					T 440		15.6	Class "H"
7.875	5.5	11800	Brine	--Production	1 A 1000		14.2	Class "H" 50/50 Poz with 2% gel, 5% salt, 1/4# cell.
					2 L 860		12.4	Class "H" 50/50 Poz with 6% gel, 5% salt, 1/4# cell.
					2 T 1210		14.2	Class "H" 50/50 Poz with 2% gel, 5% salt, 1/4# cell.

Prepared by: B. D. Schaneman Phone # 915-687-7402 Reviewed by:

Reviewed by: Approved by:

PRELIMINARY DRILLING PROGRAM

Lease and Well No. Skelly Unit #952

LAND INFORMATION

Distance to Nearest Lease Line

No. Acres in Lease

No. Acres Assigned to Well

Distance to Nearest Well

MUD PROGRAM

Depth	Type	Weight	Remarks
0-475'	Fresh Water	8.4	Circulate pits or reserve, visc. 30
475-4500'	Brine	10	Circulate reserves, Lime pH 9, visc. 29
4500-11800'	Brine/Starch	8.4-10.1	Starch / LCM for seepage as needed.
	Gel (if needed)		visc. 29-40, increase Chlorides to 90,000 by 10,650',
			add XCD polymer by 10,650', add 0.5#/bbl PHPA starting at 10,900'.
			WL below 12 from 10,900 to TD. Increase viscosity to 45 by 11650'

TUBULAR PROGRAM

String Type	Hole Size	Depth	Feet	Casing Diameter	Weight	Grade	Connection Type	ERW/ Seamless	Critical Inspectn
Surface	17-1/2"	475	475	13-3/8"	48	H-40	STC	ERW	NO
Intermed.	11"	4500	4500	8-5/8"	32	J-55	LTC	ERW	NO
Production	7-7/8"	11800	11800	5-1/2"	17	N-80	LTC	ERW	NO
Tubing		11300	11300	2-3/8"	4.7	L-80	EUE 8RD	ERW	NO

Note: Pipe to end up in hole from top to bottom as shown.

CEMENT PROGRAM

String Type	DV Depth	Stage Lead/Tail	Cement Bottom	Cement Top	No Sacks	Cement Type	Cement Yield	Cement Weight
Surface		Lead	0	Surface	0	"C" w/ gel	1.5	14.2
		Tail	475	0	490	"C"	1.34	14.8
Intermed.		Lead	4000	Surface	2130	35/65 Poz	1.94	12.8
		Tail	4500	4000	440	"H"	1.18	15.6
Production	8500	1 All	11800	8500	1000	50/50 Poz	1.35	14.2
		2 Lead	4500	0	860	35/65 Poz	2.14	12.4
		2 Tail	8500	4500	1210	50/50 Poz	1.35	14.2

BOP PROGRAM

Hole Size	Exhibit	Pressure Rating
	Exhibit C, Drilling Manual	5M

Remarks: Lost Circulation Potential from 6500' - 9500' (<10 BPH)
Lost Circulation Potential from 450' - 4500' (Total Losses - Oxy drilled blind)
Lost Circulation Potential from 9500' - 10,000' (>50 BPH)
Lost Circulation Potential from 10,000' - TD (<25 BPH)
Anticipated Morrow Reservoir Pressure is 6000 psi
Active Waterflood from 2000' - 4000'

Prepared By:

B. D. Schaneman Date: 3/18/2003

CEMENT

	Surface Lead	Surface Tail	Int 1 Lead	Int 1 Tail	Prod. 1st Stage	Prod. 2nd Stage Lead	Prod. 2nd Stage Tail
System	C; 2% D20,	C; 2%S1	35/65H; 6%D20,	H Neat	50/50H;2%D20,	35/65H; 6%D20,	50/50H;2%D20,
Skelly Unit No. 905	2%S1		5%D44, 0.25#D29		5%D44,0.25#D29	5%D44, 0.25#D29	5%D44,0.25#D29
Density, ppg	14.2000	14.8000	12.8000	15.6000	14.2000	12.4000	14.2000
Yield, cf/s	1.5000	1.3400	1.9400	1.1800	1.3500	2.1400	1.3500
Water, g/s	7.4500	6.3100	10.5000	5.2000	6.3000	11.9500	6.3000
Class C $/sx	3.0960	3.0960					
Class C # of sx	1.0000	1.0000					
Class H $/sx			2.9600	2.9600	2.9600	2.9600	2.9600
Class H # of sx			0.6500	1.0000	0.5000	0.6500	0.5000
Poz $/sx			1.6520		1.6520	1.6520	1.6520
Poz # of sx			0.3500		0.5000	0.3500	0.5000
S1 $/#	0.1600	0.1600					
S1 #/sx	1.8800	1.8800					
D20 $/#	0.0680		0.0680		0.0680	0.0680	0.0680
D20 #/sx	1.8800		5.3300		1.7300	5.3300	1.7300
D44 $/#			0.0520		0.0520	0.0520	0.0520
D44 #/sx			4.3500		2.6200	4.3500	2.6200
D29 $/#			0.7080		0.7080	0.7080	0.7080
D29 #/sx			0.2500		0.2500	0.2500	0.2500
D79 $/#							
D79 #/sx							
D42 $/#							
D42 #/sx							
Cost $/sx	3.5250	3.3970	3.2680	2.9600	2.7370	3.2680	2.7370
Cost $/cft	2.3500	2.5350	1.6840	2.5080	2.0270	1.5270	2.0270
Feet of fill	0	475	4000	500	3300	4500	4000
Casing Size	13.3750	13.3750	8.6250	8.6250	5.5000	5.5000	5.5000
Hole Size	17.5000	17.5000	12.2500	12.2500	7.8750	7.8750	7.8750
Annular Factor	0.6946	0.6946	0.4127	0.4127	0.1732	0.1732	0.1732
Excess	2.0000	2.0000	2.5000	2.5000	2.3500	2.3500	2.3500
Sacks	**0**	**490**	**2130**	**440**	**1000**	**860**	**1210**
Cost	**0**	**1665**	**6961**	**1302**	**2737**	**2810**	**3312**
Cement Bottom	0	475	4000	4500	11800	4500	8500
Cement Top	0	0	0	4000	8500	0	4500
Placement Time	0	17	105	13	34	47	42
Flush Time	0	12	41	46	49	19	35
Bottom Hole Temp	70	74	100	104	159	104	134
	Surface Lead	Surface Tail	Int 1 Lead	Int 1 Tail	Prod. 1st Stage	Prod. 2nd Stage Lead	Prod. 2nd Stage Tail

H2S DRILLING OPERATIONS PLAN

I. HYDROGEN SULFIDE TRAINING

All contractors and subcontractors employed by Chevron U.S.A. Inc. will receive or have received training from a qualified instructor within the last twelve months in the following areas prior to commencing drilling operations on this well.

1. The hazards and characteristics of hydrogen sulfide (H2S)
2. Safety precautions
3. Operations of safety equipment and life support systems

In addition, Chevron supervisory personnel will be trained or prepared in the following areas:

1. The effect of H2S on metal components in the system. If high tensile tubulars are to be used, personnel will be trained in their special maintenance requirements.

2. Corrective action and shut-down procedures when drilling or working a well, blowout prevention and well control procedures, if the nature of work performed involves these items.

3. The contents and requirements of the contingency plan when such plan is required.

All personnel will be required to carry documentation of the above training on their person.

II. H2S EQUIPMENT AND SYSTEMS

1. Safety Equipment

The following safety equipment will be on location.

A. Wind direction indicators as seen in attached diagram.
B. Automatic H2S detection alarm equipment (both audio and visual).
C. Clearly visible warning signs as seen on the attached diagram. Signs will use the words "POISON GAS" and "CAUTION" with a strong color contrast.
D. Protective breathing equipment will be located in the dog house and at the briefing areas as seen in the attached diagram.

2. Well Control Systems

A. Blowout Prevention Equipment
Equipment includes but is not limited to:

a. pipe rams to accommodate all pipe sizes
b. blind rams
c. choke manifold
d. closing unit

Auxiliary equipment added as appropriate includes:

a. annular preventor NA
b. rotating head NA
c. mud-gas separator NA
d. flare line and means of ignition NA
e. remote operated choke NA

B. Communication

The rig contractor will be required to have a two-way communication capability. Chevron U.S.A. Inc. will have either land-line or mobile telephone capabilities.

C. Mud Program

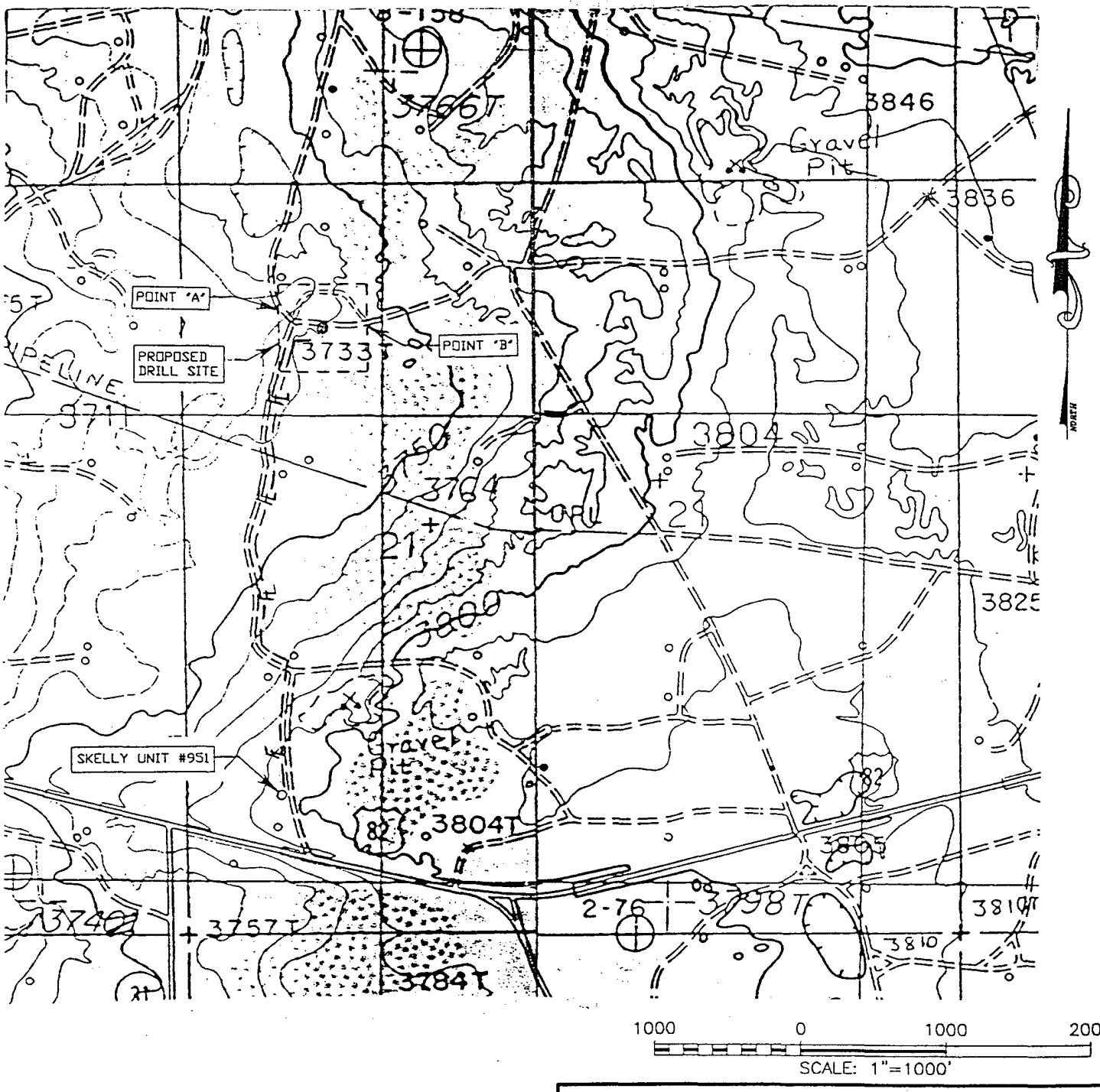
The mud program has been designed to minimize the volume of H2S circulated to surface. Proper mud weight, safe drilling practices, and the use of H2S scavengers when appropriate will minimize hazards when penetrating H2S bearing formations.

D. No Drill Stem Tests are planned.

III. WELL SITE DIAGRAM

A complete well site diagram including the following information is attached.

1. Rig orientation
2. Briefing areas
3. Ingress and egress
4. Pits and flare lines
5. Caution and danger signs
6. Wind indicators and prevailing wind direction



LEGEND OF SYMBOLS

- RESOURCE ROAD ON LEASE (YELLOW)
- PLANNED RESOURCE ROAD (BLUE)
- PLANNED FLOWLINE (GREEN)
- PRODUCING WELL
- STAKED WELL
- TANK BATTERY

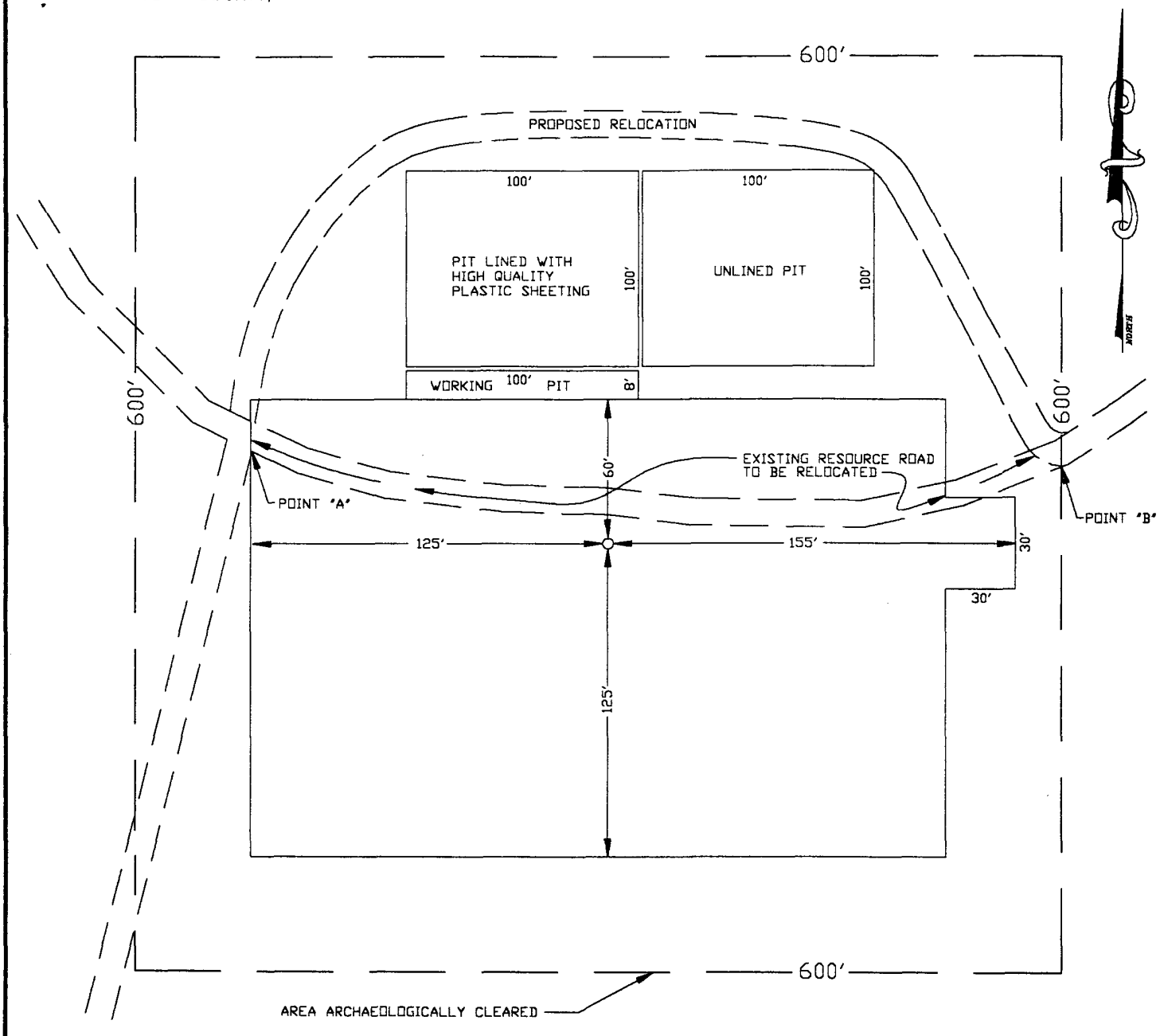
ChevronTexaco Corporation

EXHIBIT "A"
SKELLY UNIT 952
SECTION 21, TOWNSHIP 17 SOUTH, RANGE 31 EAST,
N.M.P.M., EDDY COUNTY, NEW MEXICO.

Survey Date: 4/01/03		Sheet 1 of 1 Sheets	
W.O. Number: 03.11.0364		Drawn By: LMP	
Date: 4/18/03	DISK: CD '03	03110364	

SECTION 21, TOWNSHIP 17 SOUTH, RANGE 31 EAST, N.M.P.M.,

EDDY COUNTY, NEW MEXICO.

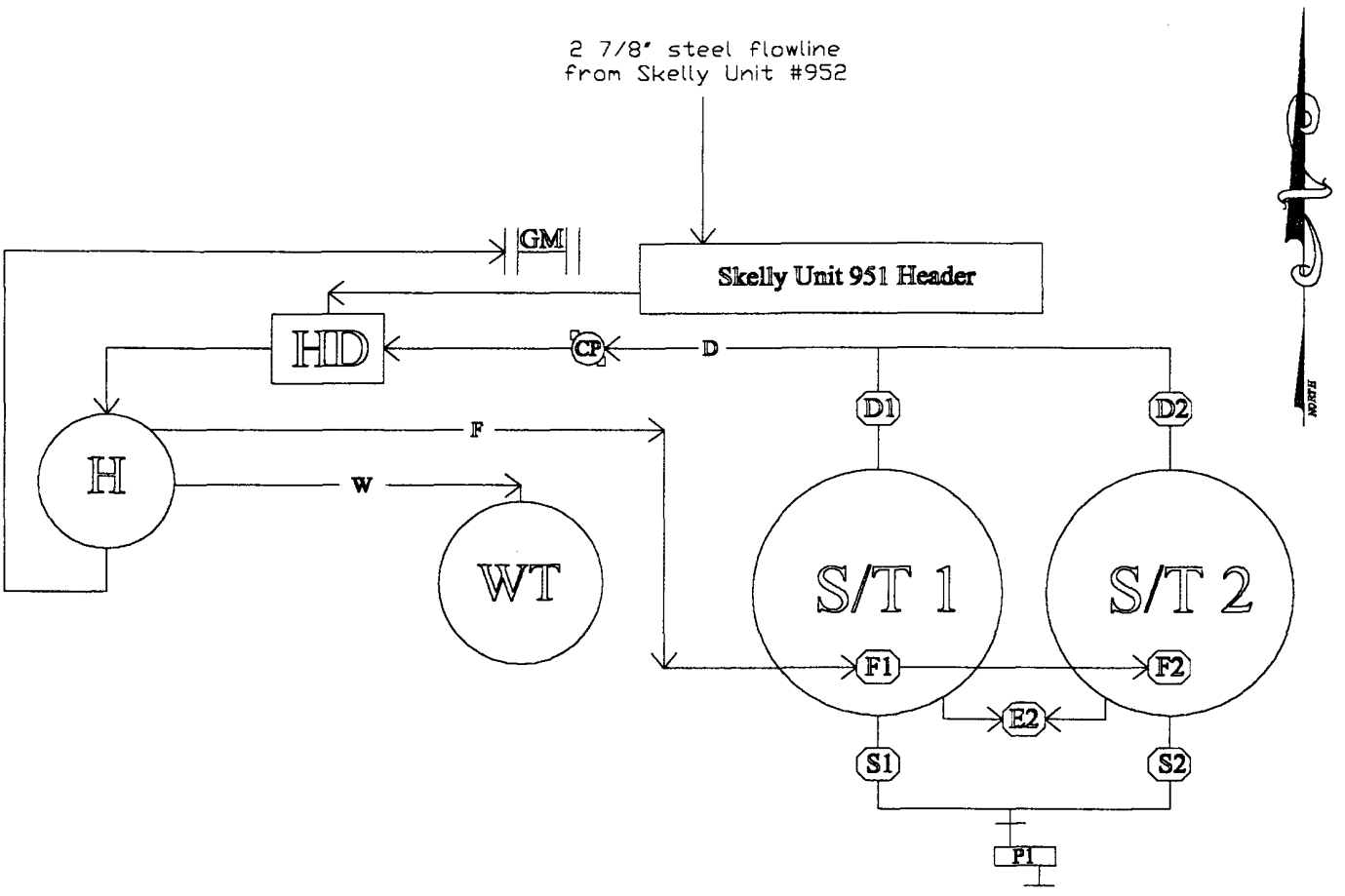


ChevronTexaco Corporation

EXHIBIT "B"
DRILLING RIG LAYOUT
ChevronTexaco Inc.
SKELLY UNIT 952
990' FNL & 990' FWL SECTION 21
T17S, R31E, NMPM., EDDY CO., NM.

Survey Date: 4/01/03		Sheet 1 of 1 Sheets	
W.O. Number: 03.11.0364		Drawn By: LMP	
Date: 7/18/03	DISK: CD '03	03110364	SCALE: NONE

SECTION 21, TOWNSHIP 17 SOUTH, RANGE 31 EAST, N.M.P.M.,
EDDY COUNTY, NEW MEXICO.



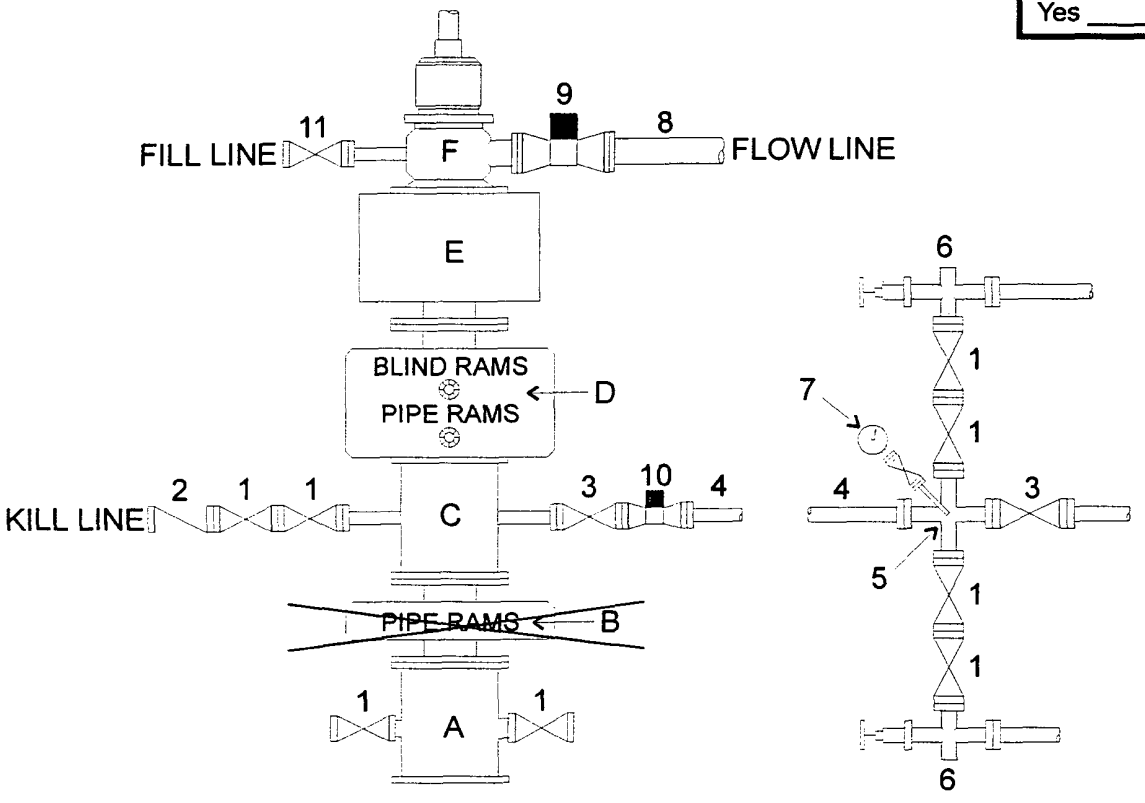
This Lease is subject to the site security plan for southeast New Mexico operations.
The plan is located at:
Mack Energy Corporation
P.O. Box 960
Artesia, N.M. 88211-0960

ChevronTexaco Corporation

EXHIBIT "D"
FACILITY AT THE
MACK ENERGY CORPORATION
SKELLY UNIT 951
990' FSL & 660' FWL SECTION 21
T17S, R31E, NMPM., EDDY CO., NM.

Survey Date: 4/01/03		Sheet 1 of 1 Sheets	
W.O. Number: 03.11.0364		Drawn By: LMP	
Date: 7/18/03	DISK: CD '03	03110364	SCALE: NONE

H2S Trim Required
Yes ____ No____



MATERIALS LIST

Item	Description	Qty.
A	Texaco wellhead.	1
~~B~~	~~5000# W.P. single ram type preventer, hydraulic operated with 1" steel, 5000# W.P. control lines.~~	~~1~~
C	5000# W.P. drilling spool with a 2" minimum flanged outlet for kill line and 3" minimum flanged outlet for choke line.	1
D	5000# W.P. dual ram type preventer, hydraulic operated with 1" steel, 5000# W.P. control lines.	1
E	5000# W.P. annular preventer, hydraulic operated with 1" steel, 3000# W.P. control lines.	1
F	Rotating head with fill-up outlet and flow line.	1
1	2" minimum 5000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc plug valve.	8
2	2" minimum 5000# W.P. back pressure valve.	1
3	3" minimum 5000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc plug valve.	2
4	3" minimum schedule 160, Grade "B", seamless line pipe.	
5	2" minimum x 3" minimum 5000# W.P. flanged cross.	1
6	2" minimum 5000# W.P. adjustable choke with carbide trim.	2
7	Cameron Mud Gauge or equivalent (location optional in choke line).	1
8	8" minimum steel flow line.	
9	6" minimum 1000# W.P. flanged hydraulic valve.	1
10	3" minimum 5000# W.P. flanged hydraulic gate valve.	1
11	2" minimum 3000# W.P. flanged or threaded full opening steel gate valve, or Halliburton Lo Torc plug valve.	1

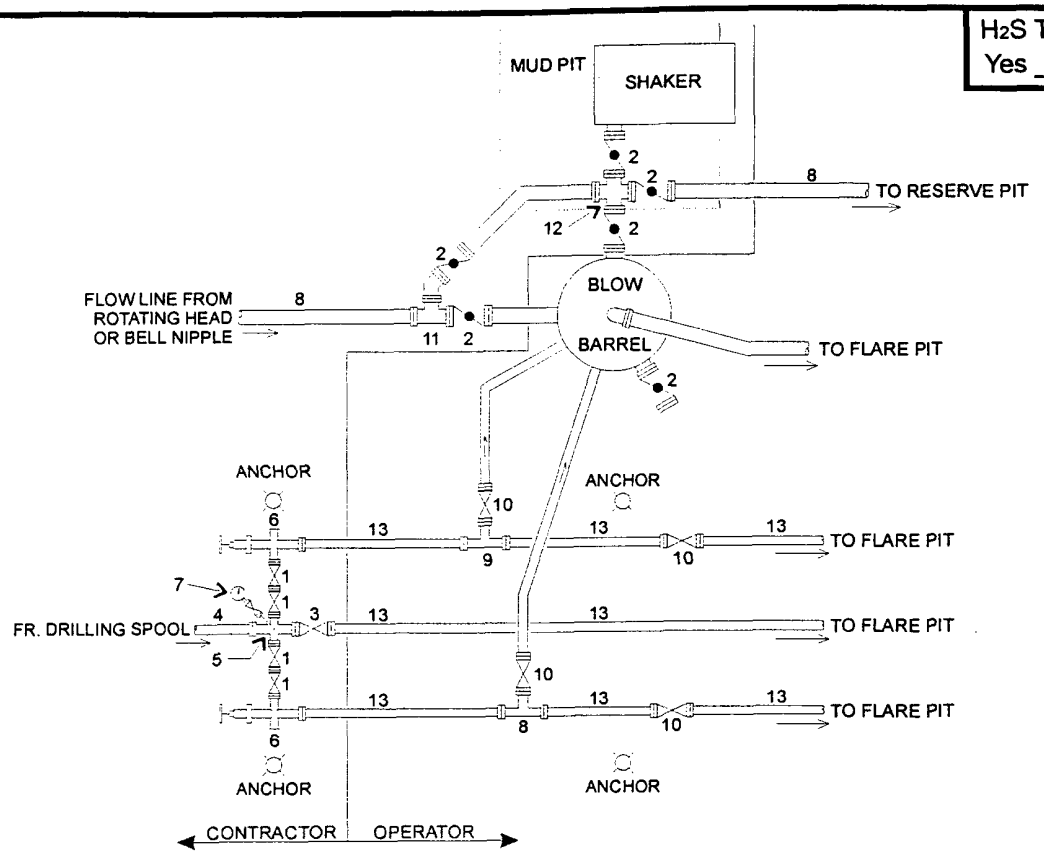
Drilling Control
Condition IV - 5000# W.P.

Rev. 11/16/98

Exhibit F

Texaco
Denver Region
Denver, Colorado

H2S Trim Required
Yes ____ No____



MATERIALS LIST

Item	Description	Qty.
1	2" minimum 3000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc plug valve.	4
2	8-5/8" minimum low pressure butterfly valve.	6
3	3" minimum 3000# W.P. flanged full opening steel gate valve, or Halliburton Lo Torc plug valve.	1
4	3" minimum schedule 80, Grade "B", seamless line pipe.	
5	2" minimum x 3" minimum 3000# W.P. flanged cross with 3000# W.P. needle valve.	1
6	2" minimum 3000# W.P. flanged adjustable choke.	1
7	Cameron Mud Gauge or equivalent (location optional in choke line).	1
8	8-5/8" minimum steel flow line.	
9	2" minimum 1000# W.P. flanged tee.	2
10	2" minimum 1000# W.P. flanged or threaded full opening steel mud valves.	4
11	8-5/8" minimum flanged tee.	1
12	8-5/8" minimum flanged cross.	1
13	2" minimum 1000# W.P. tubing.	

Supplemental Manifold for
Drilling Control Conditions
IV & IV-B
5,000# W.P.

Rev. 10/1/27

Exhibit M

Texaco
Denver Region
Denver, Colorado

North America Upstream
Permian Business Unit
15 Smith Road
Midland, Texas 79705

Office (432) 687-7212
Fax (432) 687-7905
scottingram@chevrontexaco.com

Scott Ingram
Carlsbad Technical Team Leader

ChevronTexaco

July 24, 2003

Mr. Bryan Arrant

New Mexico Oil Conservation Division
District 2 – Artesia
1301 W. Grand Avenue
Artesia, NM. 88210

Re: Skelly Unit #952
990' FNL & 990' FWL
Section 21, T17S S31E
Eddy County, NM

Dear Bryan,

I enjoyed our conversation today; it was nice talking with you again. Per our discussion regarding the proposed Skelly Unit #952 well, we have made the determination in compliance with 19.15.3.118 NMAC, that the drilling of this well will not subject the public to "Potentially Hazardous Volumes", therefore, the proposed well does not require a Hydrogen Sulfide Contingency Plan.

Our determination is based on the following calculations:

- H2S concentration of the Paddock gas ~ 20,000 ppm (0.02 decimal equivalent volume fraction)
- Q "escape rate" ~ 1,000,000 SCFPD
- The calculated 100 ppm ROE for this well is 657'
- There are no "public areas" within this 100 ppm ROE
- The calculated 500 ppm ROE for this well is 300'
- There are no public roads within the 500 ppm ROE (actual nearest public road is ~3500' away).

Thank you for your assistance in this matter and please let me know if you need any additional data.

Sincerely,

Scott M. Ingram

Scott M. Ingram

cc: D. Pinkerton
B. Schaneman