District I PO Eox 1980, Hobbs, NM 88241-1980 District II 811 S. 1st Street Artesia, NM 88210-1404 District III State of New Mexico Energy, Minerals & Natural Resourses Department

# OIL CONSERVATION DIVISION PO Box 2088 Santa Fe, NM 87504-2088

Form C-101 Revised February 10, 1994 Instructions on back Submit to Appropriate District Office

State Lease - 6 Copies

State Lease - 6 Copies
Fee Lease - 5 Copies

311 S. 1st Street Artesia, NM 88210-1404
District III
1000 Rio Brazos Rd, Aztec, NM 87410
District IV
DO Day 2009 Santa Fe NIM 87504-2088

AMENDED REPORT
JGBACK, OR ADD A ZONE
OGRID Number

<b>APPLICA</b>	TION I	FOR PEI	RMIT	ro dri	LL, RE-EN	TER, DEEPE	N, PLUGBA	ACK, OR A	ADD A ZONE
Operator Name and Address  Mack Energy Corporation P.O. Box 960  Artesia, NM 88211-0960									013837 API Number  025 3575
Proper	rty Code				Pro	perty Name			Well No.
290	719				Wi	Iliams Fee			1
					Surface L	ocation			
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
					000	37. 41.	1.650	Fost	Loc NIM

B	31	173	220			1101111	1030	2001							
	Proposed 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						
		•	ed Pool I Morrow				Propose	ed Pool 2							
		Wildcat	IVIOITOW		L										

Work Type Code	Well Type Code	Lease Type Code	Ground Level Elevation	
N	G	R	P	3999'
Multiple	Proposed Depth	Formation	Contractor	Spud Date
No	13,700	Morrow		11/15/01

Proposed Casing and Cement Program

Hole Size	Casing Size	Casing weight/foot	Setting Depth	Sacks of Cement	Estimated TOC
17 1/2	13 3/8	48	300'	Circulated	Surface
11	8 5/8	32	4450'	Sufficient to Circ	Surface
7 7/8	5 1/2	17	13,700'	Sufficient to Circ	Surface
				esent productive zone and pro	

Describe the proposed program. If this application is to DEEPEN or PLUG BACK give the data on the present productive zone and proposed new productive zone. Describe the blowout prevention program, if any. Use additional sheets if necessary.

Mack Energy Corporation proposes to drill to 300', run 13 3/8" casing and cement. Drill to 4450', run 8 5/8" casing and cement. Drill to 13,700' and test Morrow Zone, run 5 1/2" casing and cement. Put well on production.

Note: On Production string, a fluid caliber will be run and will figure cement with 25% excess, attempt to circulate.

I hereby certify that the information give of my knowledge and belief	n above is true and complete to the be	oIL CO	NSERVATION DIVISION
Signature Matt	Drawer	Approval by:	ORIO MALISIONED BY
Printed name: Matt J.	Brewer	Title:	Frije, Kachz Server in Dugnesa
Title: Geologica	Engineer	Approval Date;	Expintion Date
Date: 11/2/01	Phone: (505)748-1288	Conditions of Approval: Attached	

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

# State of New Mexico

Energy, Minerals and Natural Resources Department

Form C-102 Revised February 10, 1994 Sub

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

DISTRICT III

# OIL CONSERVATION DIVISION

P.O. Box 2088

Santa Fe, New Mexico 87504-2088

mit	to	Appropri	ata Di	ıtr	ict	Office
		State	Lease	-	4	Copies
		Fee	Lease	_	3	Conies

DIS	STR	ICT	IV			
P.O.	BOX	2088,	BANTA	FE,	N.M.	87504-2088

1000 Rio Brazos Rd., Axtec, NM 87410

WELL LOCATION AND ACREAGE DEDICATION PLAT

□ AMENDED REPORT

API Number	nber Pool Code Pool Na					
0.025-35752	u	Wildcat Morrow				
Property Code	Pro	perty Name	Well Number			
29019	WILL	1				
OGRID No.		rator Name	Elevation			
013837	MACK ENERG	Y CORPORATION	3999'			

#### Surface Location

1	UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
	В	31	17-S	33-E		990	NORTH	1650	EAST	LEA

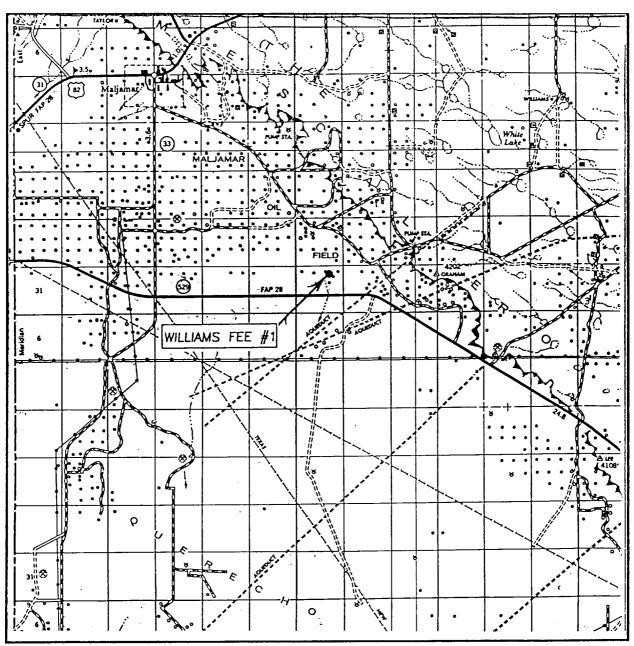
# Bottom Hole Location If Different From Surface

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 o	r Infill (	Consolidation (	Code On	der 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

	OR A NON-STANDARD UNI	I HAS BEEN A	TROVED BI III	
LOT 1		.066		OPERATOR CERTIFICATION  I hereby certify the the information contained herein is true and complete to the best of my knowledge and belief.
42.18 AC LOT 2	EODETIC COORDINATE		1650'	Matt J. Brewer  Printed Name
u	SPC NME NAD 1927 Y=653674.0 X=695000.3 AT. 32*47'43.56"N ONG. 103.41'55.52"W			Geological Engineer Title 11/2/2001 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.
42.19 AC				OCTORBER 08,2001  Date Surveyed AWB Signature & Scal of Professional Surveyor
42.20 AC	 			Certificate No. RONALD J. EDSON 3239  GARY RUSSIN 1264

# VICINITY MAP



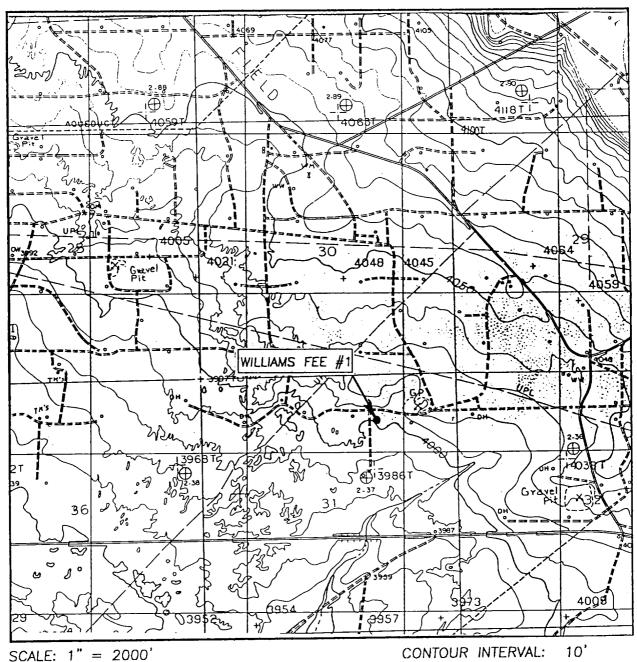
SCALE: 1" = 2 MILES

SEC. 31 TWP.	<u>.17-S</u> RGE. <u>33-E</u>
SURVEY	N.M.P.M.
COUNTY	LEA
DESCRIPTION 99	0' FNL & 1650' FEL
ELEVATION	3999'
OPERATOR <u>MACK</u>	ENERGY CORPORATION
LEACE	WILLIAMS FEE

JOHN WEST SURVEYING HOBBS, NEW MEXICO (505) 393-3117



# LOCATION VERIFICATION MAP



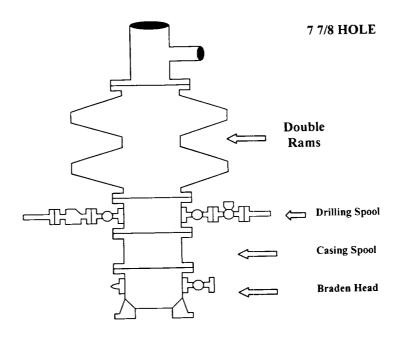
DOG LAKE, N.M.

SEC. 31 IMP. 17-3 RGE. 33-L
SURVEYN.M.P.M.
COUNTYLEA
DESCRIPTION 990' FNL & 1650' FEL
ELEVATION3999'
OPERATOR MACK ENERGY CORPORATION
LEASE WILLIAMS FEE
U.S.G.S. TOPOGRAPHIC MAP DOG LAKE, N.M.

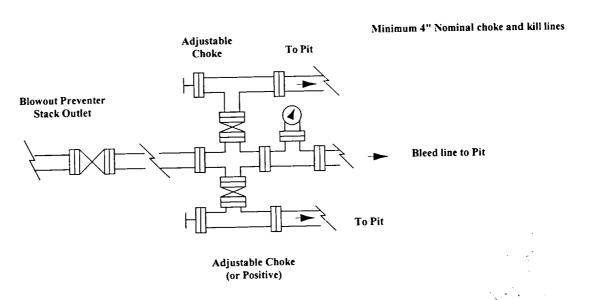
JOHN WEST SURVEYING HOBBS, NEW MEXICO (505) 393-3117

# **Mack Energy Corporation**

# Exhibit #1-A BOPE Schematic



# Choke Manifold Requirement (2000 psi WP) No Annular Required



# **Mack Energy Corporation**

# Minimum Blowout Preventer Requirements

3000 psi Working Pressure 3 MWP EXHIBIT #1-A

**Stack Requirements** 

NO.	Items	Min.	Min.
		I.D.	Nominal
1	Flowline		2"
2	Fill up line	<u> </u>	2"
3	Drilling nipple		
4	Annular preventer		
5	Two single or one dual hydraulically operated rams		
6a	Drilling spool with 2" min. kill line and 3" min choke line outlets		2" Choke
6b	2" min. kill line and 3" min. choke line outlets in ram. (Alternate to 6a above)		
7	Valve Gate Plug	3 1/8	
8	Gate valve-power operated	3 1/8	
9	Line to choke manifold		3"
10	Valve Gate Plug	2 1/16	
11	Check valve	2 1/16	
12	Casing head		
13	Valve Gate Plug	1 13/16	
14	Pressure gauge with needle valve		
15	Kill line to rig mud pump manifold		2"

			OPTIONAL	 	 _
ļ	16	Flanged Valve		1 13/16	

# ANNULAR PREVENTER Blind Rams Pipe Rams Drilling Spool Casing Head

# CONTRACTOR'S OPTION TO FURNISH:

- All equipment and connections above bradenhead or casinghead. Working pressure of preventers to be 3000 psi minimum.
- Automatic accumulator (80 gallon, minimum) capable of closing BOP in 30 seconds or less and, holding them closed against full rated working pressure.
- 3. BOP controls, to be located near drillers' position.
- 4. Kelly equipped with Kelly cock.
- Inside blowout preventer or its equivalent on derrick floor at all times with proper threads to fit pipe being used.
- 6. Kelly saver-sub equipped with rubber casing protector at all times.
- 7. Plug type blowout preventer tester.
- 8. Extra set pipe rams to fit drill pipe in use on location at all times.
- 9. Type RX ring gaskets in place of Type R.

#### MEC TO FURNISH:

- Bradenhead or casing head and side valves.
- 2. Wear bushing. If required.

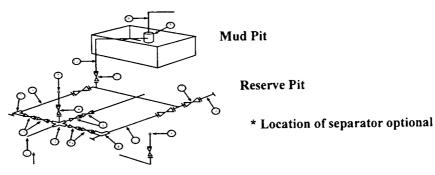
### GENERAL NOTES:

- Deviations from this drawing may be made only with the express permission of MEC's Drilling Manager.
- All connections, valves, fittings, piping, etc., subject to well or pump pressure must be flanged (suitable clamp connections acceptable) and have minimum working pressure equal to rated working pressure of preventers up through choke valves must be full opening and suitable for high pressure mud service.
- Controls to be of standard design and each marked, showing opening and closing position
- 4. Chokes will be positioned so as not to hamper or delay changing of choke beans. Replaceable parts for adjustable choke, or bean sizes, retainers, and choke wrenches to be conveniently located for immediate use.
- All valves to be equipped with handwheels or handles ready for immediate use.
- 6. Choke lines must be suitably anchored.

- Handwheels and extensions to be connected and ready for use.
- Valves adjacent to drilling spool to be kept open. Use outside valves except for emergency.
- All seamless steel control piping (3000 psi working pressure) to have flexible joints to avoid stress. Hoses will be permitted.
- Casinghead connections shall not be used except in case of emergency.
- Do not use kill line for routine fill up operations.

# **Mack Energy Corporation**

Exhibit #1-A MIMIMUM CHOKE MANIFOLD 3,000, 5,000, and 10,000 PSI Working Pressure 2 M will be used or greater 3 MWP - 5 MWP - 10 MWP



## **Below Substructure**

## Mimimum requirements

			3,000 MWP		am roq-	5,000 MWP		10,000 MWP		
		I.D.	NOMINAL	Rating	I.D.	Nominal	Rating	I.D.	Nominal	Rating
No.	Line Come deilling Speed	1.0.	3"	3,000		3"	5,000		3"	10,000
1	Line from drilling Spool			3,000			5,000			
2	Cross 3" x 3" x 3" x 2"			3,000		<del>                                     </del>	<u> </u>			10,000
2 3	Cross 3" x 3" x 3" x 2"  Valve Gate  Plug	3 1/8		3,000	3 1/8		5,000	3 1/8		10,000
ļ	Valve Gate Plug	1 13/16		3,000	1 13/16		5,000	1 13/16		10,000
la	Valves (1)	2 1/16		3,000	2 1/16		5,000	2 1/16		10,000
<u>+a</u>	Pressure Gauge	2 1,10		3,000			5,000			10,000
5 6	Valve Gate Plug	3 1/8		3,000	3 1/8		5,000	3 1/8		10,000
7	Adjustable Choke (3)	2"		3,000	2"		5,000	2"		10,000
	Adjustable Choke	1"		3,000	1"		5,000	2"		10,000
8			3"	3,000	<del></del>	3"	5,000		3"	10,000
9	Line		2"	3,000	<del>                                     </del>	2"	5,000		2"	10,000
10 11	Valve Gate Plug	3 1/8		3,000	3 1/8		5,000	3 1/8		10,000
12	Line		3"	1,000		3"	1,000		3"	2,000
13	Line		3"	1,000		3"	1,000		3"	2,000
14	Remote reading compound Standpipe pressure quage			3,000			5,000			10,000
15	Gas Separator		2' x5'			2' x5'	<u> </u>	<u> </u>	2' x5'	1 2 200
16	Line		4"	1,000		4"	1,000	<u> </u>	4"	2,000
17	Valve Gate	3 1/8		3,000	3 1/8		5,000	3 1/8		10,000

- (1) Only one required in Class 3M
- Gate valves only shall be used for Class 10 M
- (3) Remote operated hydraulic choke required on 5,000 psi and 10,000 psi for drilling.

# EQUIPMENT SPECIFICATIONS AND INSTALLATION INSTRUCTION

- All connections in choke manifold shall be welded, studded, flanged or Cameron clamp of comparable rating.
- All flanges shall be API 6B or 6BX and ring gaskets shall be API RX or BX. Use only BX for 10 MWP.
- All lines shall be securely anchored. 3.
- Chokes shall be equipped with tungsten carbide seats and needles, and replacements shall be available.
- Choke manifold pressure and standpipe pressure gauges shall be available at the choke manifold to assist in regulating chokes. As an alternate with automatic chokes, a choke manifold pressure gauge shall be located on the rig floor in conjunction with the standpipe pressure gauge.
- Line from drilling spool to choke manifold should bee as straight as possible. Lines downstream from chokes shall make turns by large bends or 90 degree bends using bull plugged tees.