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8 5/8"	32#	. 4500		Sufficient to <u>Cir</u>	culate
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	and stimulate See attached BED PROGRAM : If deepen directions techne, Jr. State office use)	and stimulated as necessary. See attached for: Supplementa BOP Sketche Surface Use surface Use to deepen directionally, give pertinent data to file, Jr. State office use) TITLE	and stimulated as necessary. See attached for: Supplemental Drilling Data BOP Sketches Surface Use and Operations Plan Surface Use and Operations Plan attached is to deepen or plug back, give data on pr deepen directionally, give pertinent data on subsurface locations at the first state office use) Agent Ag	and stimulated as necessary. See attached for: Supplemental Drilling Data BOP Sketches Surface Use and Operations Plan BED PROGRAM : If proposal is to deepen or plug back, give data on present produce deepen directionally, give pertinent data on subsurface locations and measured a <u>torine, Jr.</u> <u>torine, Jr.</u> State office use) Approval Date TITLE Acting S.D.	See attached for: Supplemental Drilling Data BOP Sketches Surface Use and Operations Plan JUL 13 1 JUL 13 1 JUL 13 1 deepen directionally, give pertinent data on plug back, give data on present productive data and proposed deepen directionally, give pertinent data on subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the full for the subsurface locations and measured and true Very diewed the subsurface use (for the subsurface locations and measured and true very diewed

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#### \*See Instructions On Reverse Side

ATTACHED Title 18 U.S.C. Section 1001, makes 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.

brit to Appropriate-\_istrict Office State Lease - 4 copies Fee Lease - 3 copies 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 1-1-89

#### DISTRICT I P.O. Box 1980, Hobbs, NM 58240

.

P.O. Box 1950, Hobbs, NM 58240

DISTRICT II P.O. Drawer DD, Artesia, NM 88210

WELL LOCATION AND ACREAGE DEDICATION PLAT

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

All Distances must be from the outer boundaries of the section

Operator		DUCING CO.	Le	ase	FEDERAL	₹1"		Well No.
Unit Letter					FEVERAL	JI	B	
P	Section 31	Township 21 SC		nge	32 EAST	NMPM	County	LEA
Actual Footage Loc					02 0.01	NMPM	L	
	t from the	SOUTH line and		660		feet from	the EAST	line
Ground Level Elev	. Producin	g Formation	Po					Dedicated Acreage:
3658.2'	Tease dedicate	Delaware d to the subject well	ha colored acad	-	ignated Lost		aware I	40 Acres
		-				1		
2. If more than	one lease is d	edicated to the well.	outline each and	i identify th	he ownership the	eof (both	as to workin.	g interest and royalty).
3. If more than one lease of different ownership is dedicated to the well, have the interest of all owners been consolidated by communitization, unitization, force-pooling, etc.?								
🔲 Yes	א 🔲 א	0 If answer is	"yes" type of co	nsolidation				
		rs and tract descript	ions which have	actually be	en consolidated.	(Use reve	rse side of	
this form necess No allowable w		d to the well unit	all interests ha	ve been c	onsolidated (by	commun	itization, un	itization, forced-pooling,
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							James	M.C. Ritchie, Jr.
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## SUPPLEMENTAL DRILLING DATA

otis. Arts

#### POGO PRODUCING COMPANY FEDERAL "31" WELL NO. 8

1. <u>SURFACE FORMATION:</u> Quaternary.

#### 2. ESTIMATED TOPS OF GEOLOGIC MARKERS:

Rustler Anhydrite	800'
Delaware Lime	4600'
Cherry Canyon	5600'
Brushy Canyon	7300'

#### 3. ANTICIPATED POSSIBLE HYDROCARBON BEARING ZONE:

Delaware Oil

#### 4. PROPOSED CASING AND CEMENTING PROGRAM:

	SETTING DEPTH						
CASING SIZE	FROM	<u> </u>	WEIGHT	GRADE	JOINT		
13 3/8"	0	850'	54.5#	J-55	STC		
8 5/8*	0	1000'	32#	J-55	STC		
H	1000'	2200'	24#	J-55	STC		
60	2200'	4500'	32#	J-55	STC		
5 1/2"	0	1000'	17#	J-55	LTC		
•	1000'	6000'	15.5#	J-55	LTC		
HP	6000'	8700'	17#	N-80	LTC		

MINIMUM DESIGN FACTORS: Collapse 1.125 Burst 1.1 Tension 1.7

13 3/8" casing is to be set at approximately 850' in 17-1/2" hole. Casing to be cemented with 500 sacks of Light cement tailed in with 200 sacks of Class "C". Cement to circulate.

8 5/8" casing is to be set at approximately 4500' in 11" hole. Casing is to be cemented with 1200 sacks of Light cement tailed in with 200 sacks of Class "C". Cement to circulate.

5 1/2" casing is to be set at 8700' in 7 7/8" hole. Casing is to be cemented with 600 sacks of Class "H" cement tailed in with 700 sx Class "C". Cement to tie back to 8 5/8" casing.

#### 5. PRESSURE CONTROL EQUIPMENT;

Blowout prevention equipment, while drilling the 11" hole, will be either a 3000 psi working pressure double ram type preventer or a 3000 psi working pressure annular type preventer.

#### 6. CIRCULATING MEDIUM:

Surface to 850 feet:	Fresh water spud mud. Viscosity 30 to 36 hole cleaning.	as required for
850 feet to 4500 feet:	Brine conditioned as necessary for contro 10.0. PH 9 to 10. Viscosity 32 to 36.	ol of viscosity. Weight 9.8 to
4500 feet to T.D.:	Water based drilling fluid conditioned as n of weight, viscosity, ph and water-loss. W 38 - 45. ph 9-10. Filtrate while drilling pay	eight 9 to 10. Visocity

#### 7. AUXILIARY EQUIPMENT:

A mudlogging trailer will be used while drilling below Intermediate casing.

### 8. TESTING, LOGGING, AND CORING PROGRAMS:

Drill Stem tests will be made when well data indicate a test is warranted.

It is planned that electric logs will include GR-CNL- Density logs ans GR-DLL logs.

No coring is planned.

#### 9 ABNORMAL PRESSURES, TEMPERTURES, OR HYDROGEN SULFIFE GAS:

None anticipated. Expected bottom hole pressure is approximately 3700 psi. Expected bottom hole temperture is approximately 130 degrees Fahr

#### 10. ANTICIPATED STARTING DATE:

It is planned that operations will commence upon approval of this application, with drilling and completion operations lasting about 30 days.

FLOW LINE ٠ĥ FILL LINE E ANNULAR TYPE PREVENTER POSITIVE. RAMS RAMS Q 3"\_\_\_\_ 3" DRILLING SPDDL 2" 2" J KILL LINE CASING 2" 2" HANGER BLIND FLANGE 



BOP STACK

3000 PSI WORKING PRESSURE

BOP ARRANGEMENT