Form 3160-3 (August 1999)

UNITED STATES DEPARTMENT OF THE INTERIOR BUREAU OF LAND MANAGEMENT

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

) BUREAU OF LAND MAN	IAGEMEN	TV (S)	FED	₩	Expires: Nov	ember 30, 2000	
APPLICATION FOR PERMIT TO D	DRILL OF	REENTER	RECEIVE		Lease Serial No. SF-078284		
a. Type of Work X DRILL R	REENTER	292	ORT. ST		If Indian, Allotee or	Tribe Name	
b. Type of Well Oil Well Gas Well Other	r 🗆	Single Zone		ne C	Unit or CA Agreem San Juan 29-6	ent Name and No. Unit	
. Name of Operator Phillips Petroleum Company a. Address			الموال المركز المالية		Lease Name and We SJ 29-6 Unit		
5525 Highway 64, NBU 3004, Farmington, NM 8	87401]	No. <i>(include area d</i> 505-599-3454		APLWell No. 30-039	26591	
Location of Well (Report location clearly and in accordance with At surface Unit L, 1860' FSL & 1100' FWL	h any State	equirements)*			Field and Pool, or Basin DK and		
At proposed prod. zone Same as ab	1:	Sec., T., R., M., o Sec. 23, T29N	r Blk. and Survey or				
 Distance in miles and direction from nearest town or post office* 21-1/2 miles east 		nco, NM			County or Parish Arriba	13. State	
5. Distance from proposed* location to nearest					17. Spacing Unit dedicated to this well		
property or lease line, ft. 1100' (Also to nearest drg. unit line, if any)		1273.24 acres			320 W/2		
 Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 	1	19. Proposed Depth 20.			0. BLM/BIA Bond No. on file		
		8099'			ES0048		
1. Elevations (Show whether DF, KDB, RT, GL, etc. 6699' GL		22. Approximate date work will start* 1st Qtr 2001			23. Estimated duration 20 days		
 Well plat certified by a registered surveyor. A Drilling Plan A Surface Use Plan (if the location is on National Forest System SUPO shall be filed with the appropriate Forest Service Office). 		5. Opera 6. Such	20 above). itor certification.		covered by an exist and/or plans as may	ing bond on file (see	
25. Signuature		Name (Printed/Typed)			Date		
Tatsy Clugston		Pa	tsy Clugston			11/30/00	
Sr. Regulatory/Proration Clerk	 			·			
pproved by (Signautre)	Nam	Name (Printed/Typed) Office			Date FEB	- 1 Juni	
itle	Offic				- !		
application approval does not warrant or certify that the applicant hounduct operations thereon. Onditions of approval, if any, are attached.	olds legal o	r equitable title	to those rights in	the subject	lease which would	entitle the applicant to	
itle 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, malnited States any false, fictitious or fraudulent statements or represen	ke it a crim	e for any perso o any matter w	on knowlingly and ithin its jurisdiction	willfully to 1.	make to any depart		
(Instructions on Reverse) This content is an included the footbased and produced purposent to 43 CFR 3165.8 and appeal purposent to 43 CFR 3165.4.	700g (19) 2011 - 201 1922 - 30	a film gave. A Robe Tellae A Basiliae Rob	POTGORIZ VI. VITB 7	ED ARE RITACHED			
					3 G		

District I PO Hox 1900, Hobbs, NM 88241-1980 District II BH South First, Artesia, NM 88210 District III 1000 Rio Brazos Rd., Aztec, NM 87410

860

S89°50'E

5277.36'

State of New Mexico Energy, Minerals & Natural Resources Department

Revised October 18, 1994
Instructions on back
Submit to Appropriate District Office
State Lease - 4 Copies

Date of Survey

Certifica

Signature and Scal of Professional Surveyer:

MOREUSICH

Form C-102

OIL CONSERVATION DIVISION 2040 South Pacheco Santa Fe, NM 87505

Fee Lease - 3 Copies District IV AMENDED REPORT 2040 South Pacheco, Santa Fe, NM 17505 WELL LOCATION AND ACREAGE DEDICATION PLAT 71599 Pool Name Basin Dakota · Well Number ⁴ Property Name ⁴ Property Code 76E 009257 SAN JUAN 29-6 UNIT * Elevation 1 Operator Name OGRID No. 66991 PHILLIPS PETROLEUM COMPANY 017654 10 Surface Location Feet from the North/South line East/West line County Feet from the Lot Ida Section Township Range UL or lot no. RIO ARRIBA 1100' WEST 1860 SOUTH 29N 11 Bottom Hole Location If Different From Surface East/West line Feet from the County Lot Idn Feet from the North/South line UL or lot no. Township Range Section 15 Order No. 12 Dedicated Acres " Joint or Infill " Consolidation Code 320 W/2 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 S89°53'E 5281.32' I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief SF-078284 Patsy Clugstor 1273.24 Acres Regulatory/Proration Clerk 11/30/00 Section 18SURVEYOR CERTIFICATION RECEIVED OIL COIN. DIV I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me NO0003 or under my supervision, and that the same is true and 1100 correct to the best of my belief. 09/19/00

District I PO Box 1968, Hobba, NM 88241-1986 District II 811 South First, Artesia, NM 88210 District III 1000 Rio Brazon Rd., Aztec, NM 87410 District IV

State of New Mexico Energy, Minerals & Natural Renutries Department

1

Form C-102 Revised October 18, 1994 Instructions on back

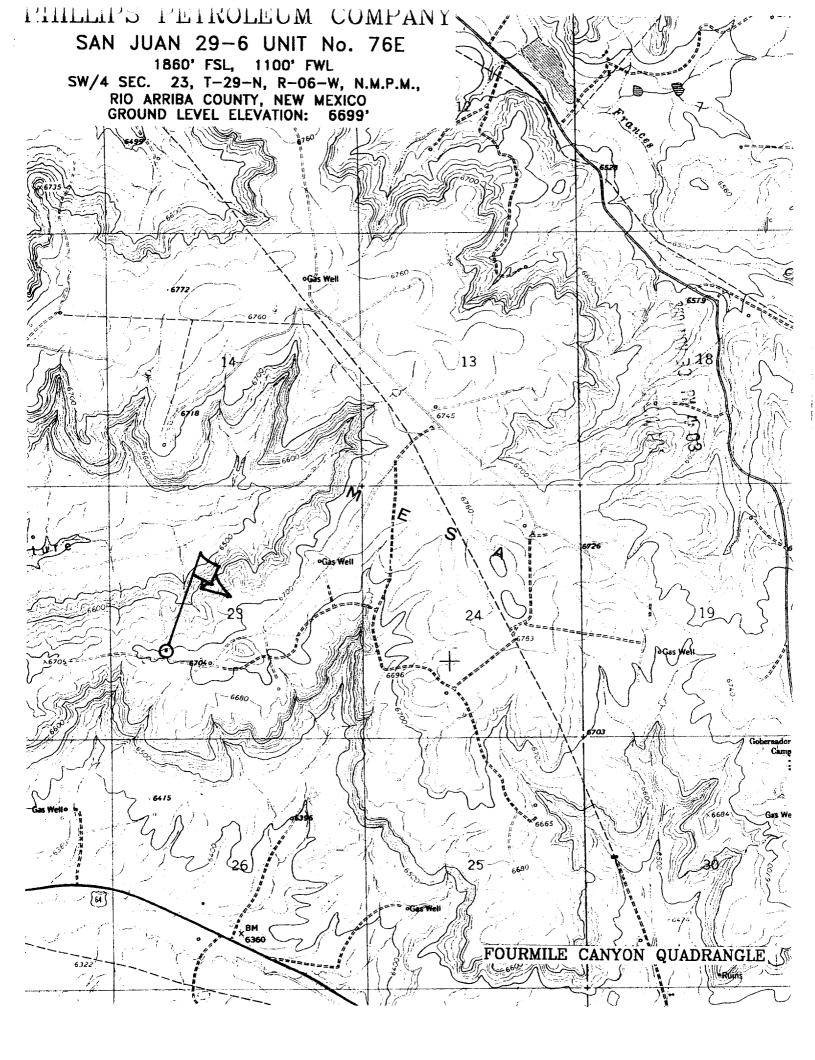
Submit to Appropriate District Office

State Lease - 4 Copies
Fee Lease - 3 Copies

OIL CONSERVATION DIVISION 2040 South Pacheco Santa Fe, NM 87505

AMENDED REPORT

L Dedicated Acres 12 Joint or Infill 14 Consolidation Code 15 Order No.	940 South Pache	co, Santa F									J AME	NDED REPORT
Preparty Code 0.09257 **GORID No. 017654** **PHILLES PETROLEM COMPANY** **ISURFace Location** Ut. or lot no. Section 7.09810 Range 1.00810 Range 1	7. 4	API Humby			1 Pool Cod	e						
Togethy water on the part of t			657	/ 72	2319			rde			• 1	Well Number
PHILIPS PETROLEUM COMPANY 1 Surface Location Ul. or lot ao. Section 1 Township Range Lot Idn Feet from the 1860' SOUTH 1100' WEST RIO ARRIBA 1 Bottom Hole Location If Different From Surface Ul. or lot ao. Section Township Range Lot Idn Feet from the SOUTH 1100' WEST RIO ARRIBA Ul. or lot ao. Section Township Range Lot Idn Feet from the North/South line Feet from the East/West line Company 1 Bottom Hole Location If Different From Surface Ul. or lot ao. Section Township Range Lot Idn Feet from the North/South line 1 Deficiented Acres "Joint or Infill "Consolidation Code "Order No. 320 W/2 Y Y 10 ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION 16 S89*53'E 5281.32' 17 OPERATOR CERTIFICATION Interdept certify that the information consisted form in the lot was and complete to the best of my knowledge and belief Interdept certify that the information consisted form in the plant was planted from the consistent form on this plant was planted from the constitution of the state in true and converted to the best of my belief control to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief control that the same is true and converted to the best of my belief converted to the best of my belief converted to t								· · · · · · · · · · · · · · · · · · ·				
UL or lot no. 23		1			DUTTT							
UL or lot so. 1. Section 23	017654				PRILL							
I BOLLOM Hole Location If Different From Surface UL or lot no. Section Township Range Lot Ida Feet from the North/South Enc Feet from the East/West Enc County Dedicated Acres of Joint or Infill "Consolidation Code "Order No. U" Of ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOL/DATED OR NON-STANDARD UNTI HAS BEEN APPROVED BY THE DIVISION IS SEP-078284 1273.24 Acres Section 28 PEED 2001 Section 28 PEED 2001 FEB 2001 FEB 2001 Back Signature Parsy Critic from the best of my boundage and belight or make my parsy that the use of across the same is true and correct to the best of my blood of the same is true and correct to the best of my blood of survey signature and Scal of Preferational Surveyor: Section 28 PEED 2001 Back Signature Section 29 Per Se	UL or lot no.	Section	Townshi	ip Range	Lot Ida	7		Fee	from the	East/West	line 🗟	County
UL or let ao. Deficient ao. Section Township Range Lot Idn Peet from the North/South Eac Peet from the East/West Eac County		1	1	6W				<u> </u>		WES	r	RIO ARRIBA
Deficated Acres of Section Island Island Section Island Section Island Island Section Island Section Island Island Section Island		-		11 Bot	tom Ho	le Location I	f Different Fro	om S	Surface	2.	ليد	_
"Dedicated Acres 320 W/2 Y NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION 16 S89°53'E 5281.32' SF-078284 1273.24 Acres Section FEB 2001 RECEIVED SECTION DIV DIST. 17 OPERATOR CERTIFICATION Intrudy certify that the information contained herein it true and complete to the best of my knowledge and belief that the same is true and complete from field notes affected unity or under my supervision, and that the same is true and correct to the best of Policy and by my or under my supervision, and that the same is true and correct to the best of my belief. S89°50'E 5277.36' S89°50'E 5277.36' Certificate Spulper Certificate Spulper Certificate Spulper	UL or lot no.	Section	Township	p Range	Lot Idn	Feet from the	North/South line	Fee	t from the	- 2	~ !	County
320 W/2 Y U 10 ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN CONSOLIDATED OR NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION 16 S89°53'E 5281.32' SF-078284 1273.24 Acres SF-078284 1273.24 Acres OLLOW DIV Signature Patsy Clugston Friated Name Friated Name Srangulatory/Proration Cle Title 11/30/00 Date 18 SURVEYOR CERTIFICATION Plots 11 SURVEYOR CERTIFICATION Plots 11 SURVEYOR CERTIFICATION Plots 11 SURVEYOR CERTIFICATION Plots 11 SURVEYOR CERTIFICATION Plots 12 Date 18 SURVEYOR CERTIFICATION Plots 19 Date 18 SURVEYOR CERTIFICATION Plots 10 Date 18 SURVEYOR CERTIFICATION Plots 10 Date of Survey made by war plotted from field notes of exclusion shown on this plat war plotted from field notes of exclusion		cs ¹³ Joint	or Infill	¹⁴ Consolidatio	a Code	Order No.	<u></u>	<u> </u>		Ç		
SECTION SEC	320 W/2											
SF-078284 1273.24 Acres Section RECEIVED OLOON, Drv DIST. DIST. S89°50'E S89°50'E S281.32' 17 OPERATOR CERTIFICATION I hardry certify that the information contained herein is true and complete to the best of my browledge and belief Lugatory Patsy Clugatory Patsy Clugatory Patsy Clugatory Patsy Clugatory Printed Name Sr. Regulatory/Proration Cle Tile 11/30/00 Date 18 SURVEYOR CERTIFICATION I hereby certify that the vell location strong made by my or under my supervision, and that the same is true and correct to the best of my belief. 09/19/00 Date OSURVEYOR SRCADSHIP OP/19/00 Date OSURVEYOR Certificate Phyther Certificate Phyther Certificate Phyther	NO ALLOW	ABLE W	ILL BE A	ASSIGNED	TO THIS	COMPLETION	I UNTIL ALL IN' N APPROVED RY	TERE Y TH	ESTS HAVI E DIVISIO	E BEEN (N	CONSO	EHDATED OR A
SF-078284 1273.24 Acres FEB 2001 RECEIVED Section Sec		/					I ALL ROYLL D	ij			CERT	CIFICATION
SF-078284 1273.24 Acres FEB 2001 RECEIVED OL.ON. DIV DIST. 5 Signature Patsy Clugston Printed Name Sr. Regulatory/Proration Cle 11/30/00 Date 18SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat war plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belief. 09/19/00 Date of Survey Signature and Seal of Professional Surveyer: RROADING RROADING Certifice Parker Certifice Parker	16	-	589	. 23. E	520	01.34	I hereby certify that the information contained I				contained herein is	
SF-078284 1273.24 Acres Section Section RECEIVED RECEIVED DIST. B BURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belig. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: RECEIVED RECEIVED BY OP 1100' CETIFICATION Description of the dest of my belig. OP 19/00 Date of Survey Signature and Scal of Professional Surveyer: CETIFICATION CONTROL Description of the dest of my belig. CETIFICATION CONTROL CETIFICATION CETIFICATION CETIFICATION CETIFICATION CONTROL CETIFICATION CETIFICATIO									true and com	plete to the b	est of my k	nowledge and belief
SF-078284 1273.24 Acres Section Section RECEIVED RECEIVED DIST. B BURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belig. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: RECEIVED RECEIVED BY OP 1100' CETIFICATION Description of the dest of my belig. OP 19/00 Date of Survey Signature and Scal of Professional Surveyer: CETIFICATION CONTROL Description of the dest of my belig. CETIFICATION CONTROL CETIFICATION CETIFICATION CETIFICATION CETIFICATION CONTROL CETIFICATION CETIFICATIO					ļ			İ				
SF-078284 1273.24 Acres Section Section RECEIVED RECEIVED DIST. B BURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belig. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: RECEIVED RECEIVED BY OP 1100' CETIFICATION Description of the dest of my belig. OP 19/00 Date of Survey Signature and Scal of Professional Surveyer: CETIFICATION CONTROL Description of the dest of my belig. CETIFICATION CONTROL CETIFICATION CETIFICATION CETIFICATION CETIFICATION CONTROL CETIFICATION CETIFICATIO		·	h)	\bigcirc	
SF-078284 1273.24 Acres Section Section RECEIVED RECEIVED DIST. B BURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belig. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: RECEIVED RECEIVED BY OP 1100' CETIFICATION Description of the dest of my belig. OP 19/00 Date of Survey Signature and Scal of Professional Surveyer: CETIFICATION CONTROL Description of the dest of my belig. CETIFICATION CONTROL CETIFICATION CETIFICATION CETIFICATION CETIFICATION CONTROL CETIFICATION CETIFICATIO				7					Ta	lse-	("lle	uston
Thiad Name Sr. Regulatory/Proration Cle Title 11/30/00 Date 18/SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from pletd notes of actual surveys made by more under my supervision, and that the same is true and correct to the best of my belief. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: 8RCAD: 8RCAD: 98 Certificate Marker Certificate Marker			 SE-07	78284	ما					610		
Section Sectio	•		1		s	515	e -	•)11	
Section Sectio	0					1345	1/3	00		gulatoı	cy/Pro	ration Cle
Section Sectio	280	Ĺ	h					280		0/00		
S89°50'E S100' OLCON. DIV DIST. S DI	γ·ν			C = ==	48	DECEN	Ven S	5		<u></u>		
hereby certify that the well location shown on this plant was plotted from field notes of actual surveys made by m or under my supervision, and that the same is true and correct to the best of my belief. 09/19/00 Date of Survey Signature and Scal of Professional Surveyer: 889°50'E 5277.36' Certificale Number		2	 	Sec	T		IDM/ [~]		18SIIR	VEYOR	CER'	TIFICATION
Date of Survey Signature and Seal of Professional Surveyer: BRUADAR Certificate Number S89°50'E 5277.36'						يَّ DIST.		न्त	l hereby cen	tife that the w	rell locatio	n shown on this plat
Date of Survey Signature and Seal of Professional Surveyer: BRUADAR Certificate Number S89°50'E 5277.36'	- m	_	h		1		01 1/2	031	was plotted j or under my	supervision,	and that t	ul surveys made by m he same is true and
Date of Survey Signature and Seal of Professional Surveyer: BRUADAR Certificate Number S89°50'E 5277.36'	1100	φ`				EC 15.05	Al Wie	00	correct to th	-		
Signature and Seal of Professional Surveyor: Signature and Seal of Professional Surveyor: Signature and Seal of Professional Surveyor: Certifical Runber S89°50'E S277.36'	, 2				1			N			00	
S89°50'E 5277.36' S89°50'E 5277.36' Certificate Marker				7			<u> </u>		il	•	ofessional :	Surveyer:
S89°50'E 5277.36' Certificale Hyelber		09		•								
		2			٠					(C)	MEN	\$2X>
			t							¥ (#)[
					ما				LA	DI KI	13M	18
	1 ,		S8	9°50'E	52	277.36			Certificate	<u> </u>	ツ	[] E
										18/	Name of Street	×/



PHILLIPS PETROLEUM COMPANY

WE]	LL NAME: <u>San Juan 29-6 U</u>	nit #76E_MV/DK							
DDI	LLING PROGNOSIS								
1.		Unit L, 1860' FSL & 1100' FWL							
1.		Section 23, T29N, R6W							
	<u>-</u>	500000 B3, 12311, 110 W							
2.	Unprepared Ground Elevation	(<u>@ 6699' (unprepared)</u> .							
3.	The geological name of the sur	rface formation is <u>San Jose</u> .	5-S						
4.	Type of drilling tools will be <u>rotary</u> .								
5.	Proposed drilling depth is 8099'—								
6.	The estimated tops of importan	nt geologic markers are as follows:	107 30 PM 4: 07						
	Naciamento - 1491'	Menefee Fm 5496'	75 O						
	Ojo Alamo - 2751'	Pt. Lookout - 5779'	<u></u>						
	Kirtland Sh - 2904'	Mancos Sh - 5956'							
	Fruitland Fm 3319'	Gallup Ss 6817'							
	Pictured Cliffs - 3581'	Greenhorn Ls 7761'							
	Lewis Shale - 3711'	Graneros Sh 7811'							
	Cliff House Ss - 5399'	Dakota Ss - 7949'							
7.	The estimated depths at white formations are expected to be	ich anticipated water, oil, gas or other rencountered are as follows:	nineral bearing						
	Water: Ojo Ala	<u>mo - 2751' - 2904'</u>							
	Gas & Water: Fruitland								
	Gas: Mesaver								
	Dakota ·								
8.	The proposed casing program	is as follows:							
	Surface String: 9-5/8", 32.3#, H-40 @ 320'								
	Intermediate String: 7", 20#, J/K-55 @ 3836'								
	Production String: 4-1/2", 11	.6#, I-80 or N-80 @ 8099 <u>'</u> (TD)							
9.	Cement Program:								
	Surface String: 158.5 s	sx Type III cement with 2% bwoc CaCl2	+ 1/4#/sx Cello-						
		xed at 14.5 ppg with a 1.41 ft3/sx yield w/4							

Note: Cement slurry calculations based on cement to surface with 110% excess hole volume.

sufficient to circulate to surface – 223 cf.

Intermediate String: Lead Cement: 462.2 sx Type III cement (35:65) POZ with 5#/sx

Gilsonite, 1/4#/sx Cello-flake, 6% bwoc gel (bentonite), 10#/sx CSE, 3% bwow KCL, 0.4% bwoc FL-25 mixed and 0.02#/sx Static

Free mixed at 12.0 ppg with a yield of 2.37 ft3/sx - 1095 cf.

Tail Cement: 50 sx – Type III cement with ½#/sx Cello-flake and 1% CaCl2 mixed at 14.5 ppg with a 1.40 ft3/sx yield (70 cf).

In the event we encounter fluid loss during drilling operations, a contingency plan for cementing the intermediate casing may require a stage collar. Phillips cannot predict exact volumes. However the 1st stage will be Cl H cement w/5#/sx Gilsonite, 0.25#/sx Cello-flake, 0.3% FL-25 & 2% CaCl2 mixed at 15.2 ppg 1.28 yield. Stage 2 - lead slurry: 65 % Class H & 35% POZ w/6% Bentonite mixed at 12.6 ppg 1.79 cf/sx Tail Slurry - Class H w/2% CaCl2 mixed at 15.6 ppg 1.20 yield. All attempt to be circulated to surface.

Production String

Lead: 334.9 sx Type III (35/65 POZ (Fly Ash) with 6% bwoc Bentonite, 10#/sx CSE, 0.2#/sx Static Free, 1% bwoc FL-52, 0.3% bwoc CD-32, 0.3% bwoc R-3 & 0.25#/sx Cello-Flake mixed at 12.3 ppg with a yield of 2.13 ft3/sx -713 cf.

Note: The Production String casing cement is designed to cover openhole section (with 40% excess) and 100' inside the 7" shoe.

Note: Phillips Petroleum continually works to improve the cement slurries on our wells. BJ Services is currently trying to improve what we are using now and before we would use a new cement program it would have to have stronger properties than we are currently using.

Centralizer Program:

Surface: Total four (4) 1 @ 10' above shoe & top of 2nd, 4th & 6th joint

Intermediate: Total seven (7) – 10' above shoe, top of 1st, 2nd, 4th, 6th, & 8th jts &

1 jt. Above surface casing.

Production: None planned.

Turbulators: Total Three (3) – on intermediate casing at 1st jt. Below the Ojo

Alamo and next 2 its up.

10. The minimum specifications for pressure control equipment which are to be used, a schematic diagram thereof showing sizes, pressure ratings (or) API series and the testing procedure and testing frequency are enclosed within the APD packet.

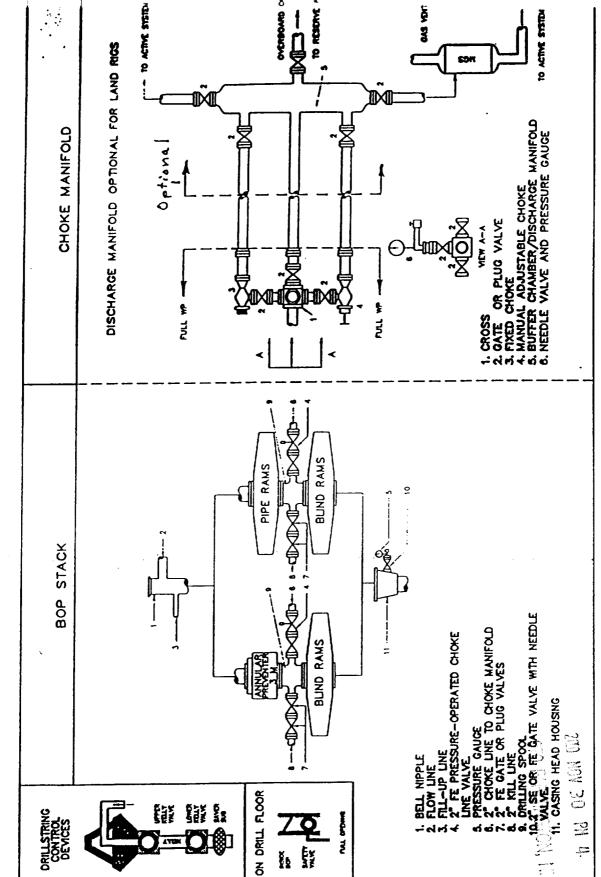


Fig. 2.4. Class 2 BOP and Choke Manifold.