

DISTRICT I
1625 N. French Dr., Hobbs, N.M. 88240

DISTRICT II
1301 W. Grand Ave., Artesia, N.M. 88210

DISTRICT III
1000 Rio Brazos Rd., Aztec, N.M. 87410

DISTRICT IV
1220 South St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy, Minerals & Natural Resources Department

OIL CONSERVATION DIVISION

1220 South St. Francis Dr.
Santa Fe, NM 87505

Form C-102
Revised June 10, 2003

Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

2005 AUG 23 PM 2 47 ☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

*API Number 30-045-33309		*Pool Code 71629	*Pool Name BASIN FRUITLAND COAL
*Property Code 4900	*Property Name NICKLES 11		*Well Number 3
*GRID No. 9812	*Operator Name HEC PETROLEUM		*Elevation 5756

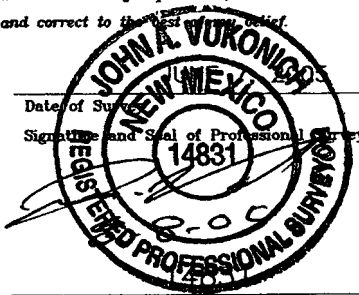
¹⁰ Surface Location

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	1120	East/West line	County
I	11	31-N	13-W	1	1660	SOUTH	1120	EAST	SAN JUAN

¹¹ 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
¹² Dedicated Acres 313.27 ACRES-5/2					¹³ Joint or Infill Y		¹⁴ Consolidation Code		¹⁵ 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

¹⁶		LAT. 36°54'42.0" N (NAD 83) LONG. 108°10'02.7" W (NAD 83)		FD 3 1/4" BC. B.L.M. 1952		¹⁷ OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief. Signature <u>Mike Pippin</u> Printed Name <u>MIKE PIPPIN</u> Title <u>AGENT - PETR. ENGR.</u> Date <u>8-22-05</u>	
FD 3 1/4" BC. B.L.M. 1952		LOT 2		LOT 1		¹⁸ 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 of Survey <u>8-22-05</u> Signature and Seal of Professional Surveyor:  Certificate Number _____	
		LOT 3		LOT 4			

Submit 3 Copies To Appropriate District
Office,
District I
1625 N. French Dr., Hobbs, NM 88240
District II
1301 W. Grand Ave., Artesia, NM 88210
District III
1000 Rio Brazos Rd., Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM
87505

State of New Mexico
Energy, Minerals and Natural Resources

Form C-103
May 27, 2004

OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

WELL API NO. 30-045-33309
5. Indicate Type of Lease: FEDERAL STATE <input type="checkbox"/> FEE <input type="checkbox"/>
6. State Oil & Gas Lease No. FEDERAL: SF 024907

SUNDRY NOTICES AND REPORTS ON WELLS (DO NOT USE THIS FORM FOR PROPOSALS TO DRILL OR TO DEEPEN OR PLUG BACK TO A DIFFERENT RESERVOIR. USE "APPLICATION FOR PERMIT" (FORM C-101) FOR SUCH PROPOSALS.)		7. Lease Name or Unit Agreement Name NICKLES 11
1. Type of Well: Oil Well <input type="checkbox"/> Gas Well <input checked="" type="checkbox"/> Other		8. Well Number: #3
2. Name of Operator HEC PETROLEUM INC.		9. OGRID Number: 009812
3. Address of Operator: c/o Agent, Mike Pippin LLC 3104 N. Sullivan, Farmington, NM 87401 505-327-4573		10. Pool name or Wildcat Basin Fruitland Coal
4. Well Location Unit Letter <u>I</u> : <u>1660</u> feet from the <u>South</u> line and <u>1120</u> feet from the <u>East</u> line Section <u>11</u> Township <u>31N</u> Range <u>13W</u> NMPM San Juan County		
11. Elevation (Show whether DR, RKB, RT, GR, etc.) <u>5756' GL</u>		
Pit or Below-grade Tank Application <input checked="" type="checkbox"/> or Closure <input type="checkbox"/>		
Pit type <u>Drilling</u> Depth to Groundwater <u>>100'</u> Distance from nearest fresh water well <u>>1000'</u> Distance from nearest surface water <u>200'-1000'</u>		
Pit Liner Thickness: <u>12</u> mil Below-Grade Tank: Volume _____ bbls; Construction Material _____		

12. Check Appropriate Box to Indicate Nature of Notice, Report or Other Data

NOTICE OF INTENTION TO:

PERFORM REMEDIAL WORK ☐ PLUG AND ABANDON ☐
TEMPORARILY ABANDON ☐ CHANGE PLANS ☐
PULL OR ALTER CASING ☐ MULTIPLE COMPL ☐

OTHER: Register Drilling Pit ☒

SUBSEQUENT REPORT OF:

REMEDIAL WORK ☐ ALTERING CASING ☐
COMMENCE DRILLING OPNS. ☐ P AND A ☐
CASING/CEMENT JOB ☐

OTHER: ☐

13. Describe proposed or completed operations. (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work). SEE RULE 1103. For Multiple Completions: Attach wellbore diagram of proposed completion or recompletion.

We intend to drill a new Fruitland Coal well. The drilling pit will be built and lined according to our general pit guidelines on file at the NMOCD in Aztec, NM.

When the drilling pit is closed, it will be closed as per our general pit closing guidelines on file at the NMOCD.

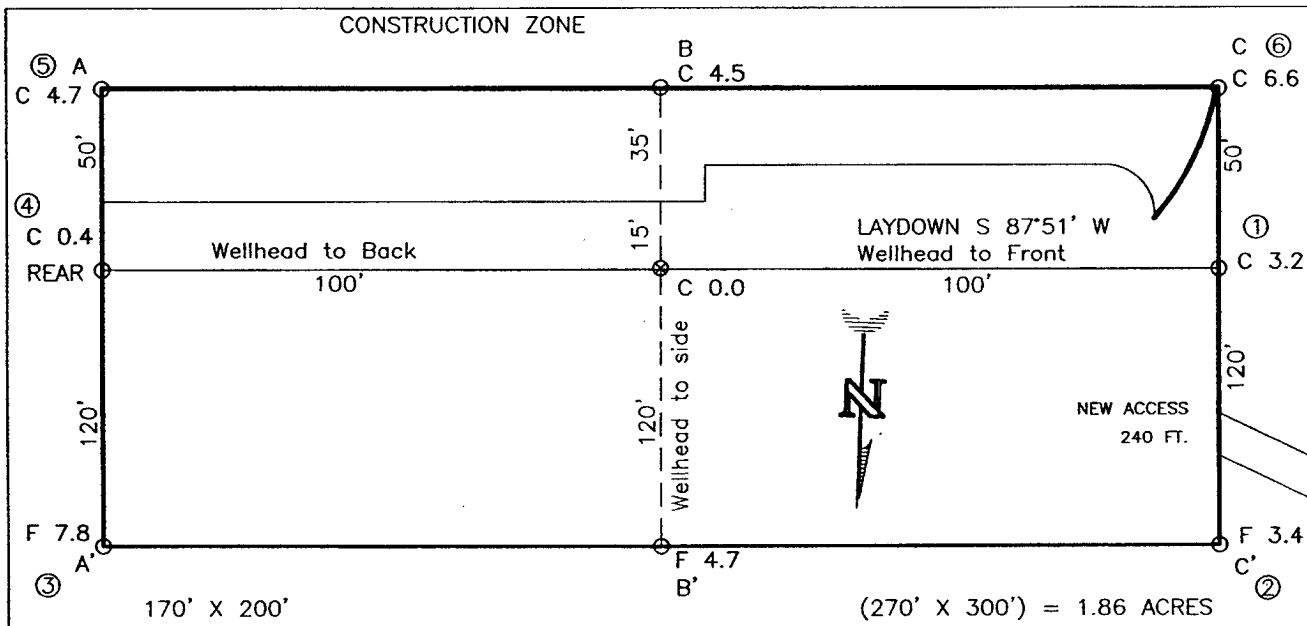
I hereby certify that the information above is true and complete to the best of my knowledge and belief. I further certify that any pit or below-grade tank has been/will be constructed or closed according to NMOCD guidelines ☒, a general permit ☐ or an (attached) alternative OCD-approved plan ☐.

SIGNATURE Mike Pippin TITLE Agent, Petroleum Engineer DATE 8/22/05
Type or print name Mike Pippin E-mail address: mpippin@ddbroadband.net Telephone No.: 505-327-4573

For State Use Only

APPROVED BY: [Signature] TITLE DEPUTY OIL & GAS INSPECTOR, DIST. 3 DATE FEB 10 2006
Conditions of Approval (if any):

HEC PETROLEUM
 NICKLES 11 No. 3, 1660 FSL 1120 FEL
 SECTION 11, T31N, R13W, N.M.P.M., SAN JUAN COUNTY, N. M.
 GROUND ELEVATION: 5756, DATE: JUNE 7, 2005

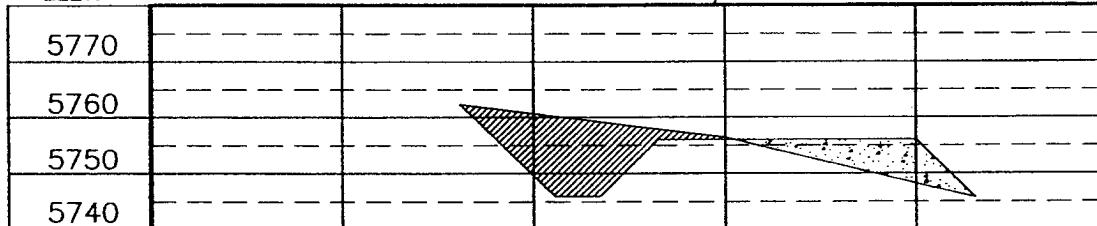


NOTE:

DAGGETT ENTERPRISES, INC. IS NOT LIABLE FOR UNDERGROUND UTILITIES OR PIPELINES. NEW MEXICO ONE CALL TO BE NOTIFIED 48 HOURS PRIOR TO EXCAVATION OR CONSTRUCTION.

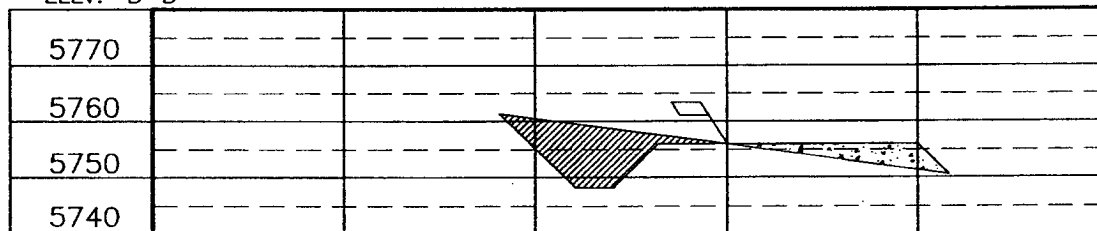
ELEV. A-A'

C/L



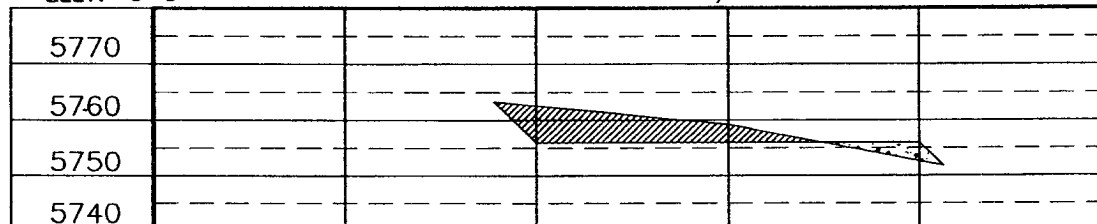
ELEV. B-B'

C/L



ELEV. C-C'

C/L



NOTE: CONTRACTOR SHOULD CALL ONE-CALL FOR LOCATION OF ANY MARKED OR UNMARKED BURIED PIPELINES OR CABLES ON WELL PAD AND OR ACCESS ROAD AT LEAST TWO (2) WORKING DAYS PRIOR TO CONSTRUCTION.

PAGE # 12

REVISION:	DATE:	REVISED BY:
Daggett Enterprises, Inc. Surveying and Oil Field Services P. O. Box 15068 • Farmington, NM 87401 Phone (505) 326-1772 • Fax (505) 326-6019 NEW MEXICO L.S. No. 14831 COURTE: PR128CF8 DATE: 07/28/05		
DRAWN BY: B.L. ROW#: PR128		

HEC PETROLEUM INC.
NICKLES 11 #3 FRTC
1660' FSL, 1120' FEL
Unit I Sec. 11 T31N R13W
San Juan County, NM

Drilling Program

1. **ESTIMATED FORMATION TOPS (KB)**

<u>Formation Name</u>	<u>Depth</u>
Ojo Alamo	1028'
Kirtland	1227'
Fruitland	1619'
Pictured Cliffs	2024'
TD (4-1/2")	2100'

2. **NOTABLE ZONES**

<u>Gas or Oil Zones</u>	<u>Water Zones</u>	<u>Coal Zone</u>
Fruitland		Fruitland
Pictured Cliffs	Ojo Alamo Kirtland	

Water zones will be protected with casing, cement, and weighted mud. Fresh water found while drilling will be recorded. Oil or gas shows will be tested for commercial potential based on the engineer's recommendations.

3. **PRESSURE CONTROL**

Maximum expected pressure is ~1000 psi. The drilling contract has not yet been awarded, thus the exact BOP model to be used is not yet known. A typical 7-1/16" 3,000 psi annular is on PAGE #5 & #6.

BOP equipment and all accessories will meet or exceed BLM requirements in 43 CFR Part 3160 for a 3000 psi system. A 3000 psi annular BOP will be used. Accumulator system capacity will be sufficient to close all BOPE with a 50% safety factor. Fill, kill, and choke manifold lines will be 2". Accessories will include an upper Kelly cock with a handle, stabbing valve to fit drill pipe on floor at all times, string float at bit, 3000 psi choke manifold with 2" adjustable and 2" positive chokes, and pressure gauge. BOPs will be tested every 24 hours. Tests will be recorded on IADC log.

HEC PETROLEUM INC.
NICKLES 11 #3 FRTC
 1660' FSL, 1120' FEL
 Unit I Sec. 11 T31N R13W
 San Juan County, NM

4. CASING & CEMENT

<u>Hole Size</u>	<u>O.D.</u>	<u>Weight (lb/ft)</u>	<u>Grade</u>	<u>Age</u>	<u>Connection</u>	<u>GL Setting Depth</u>
12-1/4"	8-5/8"	24#	H-40	New	ST&C	200'
7-7/8"	5-1/2"	15.5#	J-55	New	ST&C	2100'

Surface Casing will be cemented to the surface with ~165 cu. ft. (~140 sx) Class "B" cmt or equivalent (1.18 ft³/sx yield, 15.6 ppg, & 5.2 gps) with 2% CaCl₂ and 1/4#/sx celloflake. Volume based on 100% excess. We plan to run a minimum of at least 3 centralizers. A wooden wiper plug will be displaced to within 20' of the shoe. WOC = 12 hours. Surface casing will be tested to 500 psi for 30 minutes.

Production Casing will be cemented to surface with a single stage. Total cement = ~528 cu. ft. (~266sx). Volumes are calculated at 45% excess in the lead cmt. If cement does not circulate to surface, then a temperature survey or CBL will be run to determine the actual cement top as needed. WOC = 12 hours. Casing will be tested to 3800 psi for 30 minutes during completion operations.

Lead cement will be ~472 cu. ft. (~226 sx) Class "B" cmt or equivalent w/2% SM, 1/4#/sx cello flake, 3#/sx gilsonite mixed at 11.9 gps, 12.5 ppg for a yield of 2.09 cu. ft. per sx.

Tail cement will be ~56 cu. ft. (~40 sx) Class "B" cmt or equivalent w/1% gel, 2% Cacl₂, 1/4#/sx cello flake, 3#/sx gilsonite mixed at 6.8 gps, 14.5 ppg for a yield of 1.4 cu. ft. per sx.

Cementing equipment will include a guide shoe, and autofill float collar will be run 20' off bottom. We plan on running at least 10 centralizers.

5. MUD PROGRAM

<u>Depth</u>	<u>Type</u>	<u>Wt./ppg.</u>	<u>Vis.</u>	<u>Fluid Loss</u>	<u>PH</u>
0'-200'	FW gel/lime spud mud	8.4-8.7	30-50	NC	10
200'-2100'	FW gel/Polymer	8.3-8.6	30-35	<20cc's	9.5

Lost circulation and absorption material will be on location.

6. CORING, TESTING, & LOGGING

No cores, open hole logs, or drill stem tests are planned. A cased hole neutron log will be run during completion operations.

HEC PETROLEUM INC.
NICKLES 11 #3 FRTC
1660' FSL, 1120' FEL
Unit I Sec. 11 T31N R13W
San Juan County, NM

7. **DOWN HOLE CONDITIONS**

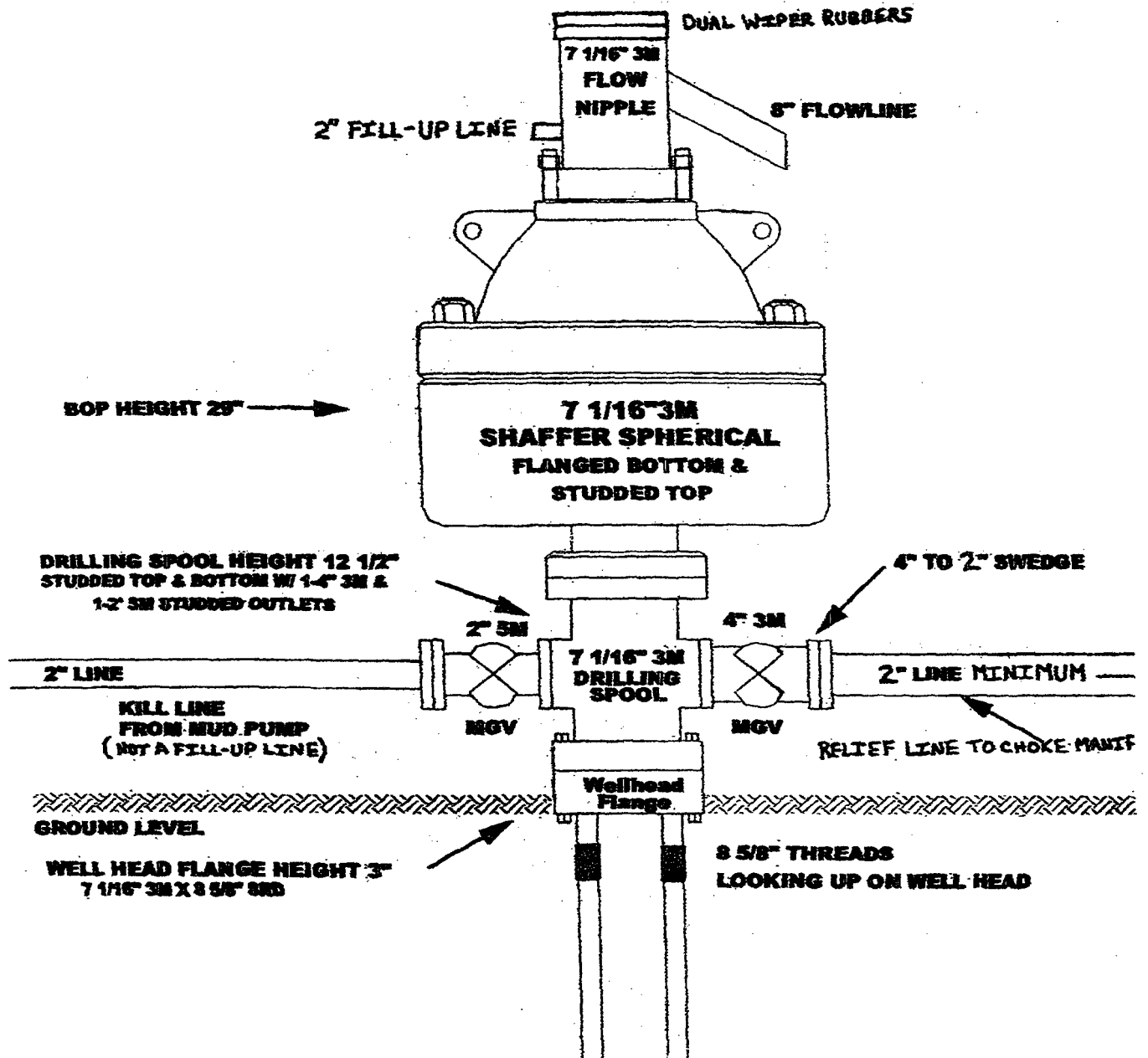
No abnormal pressures, temperatures, nor hydrogen sulfide are expected.
Maximum pressure will be ~1000 psi.

8. **OTHER INFORMATION**

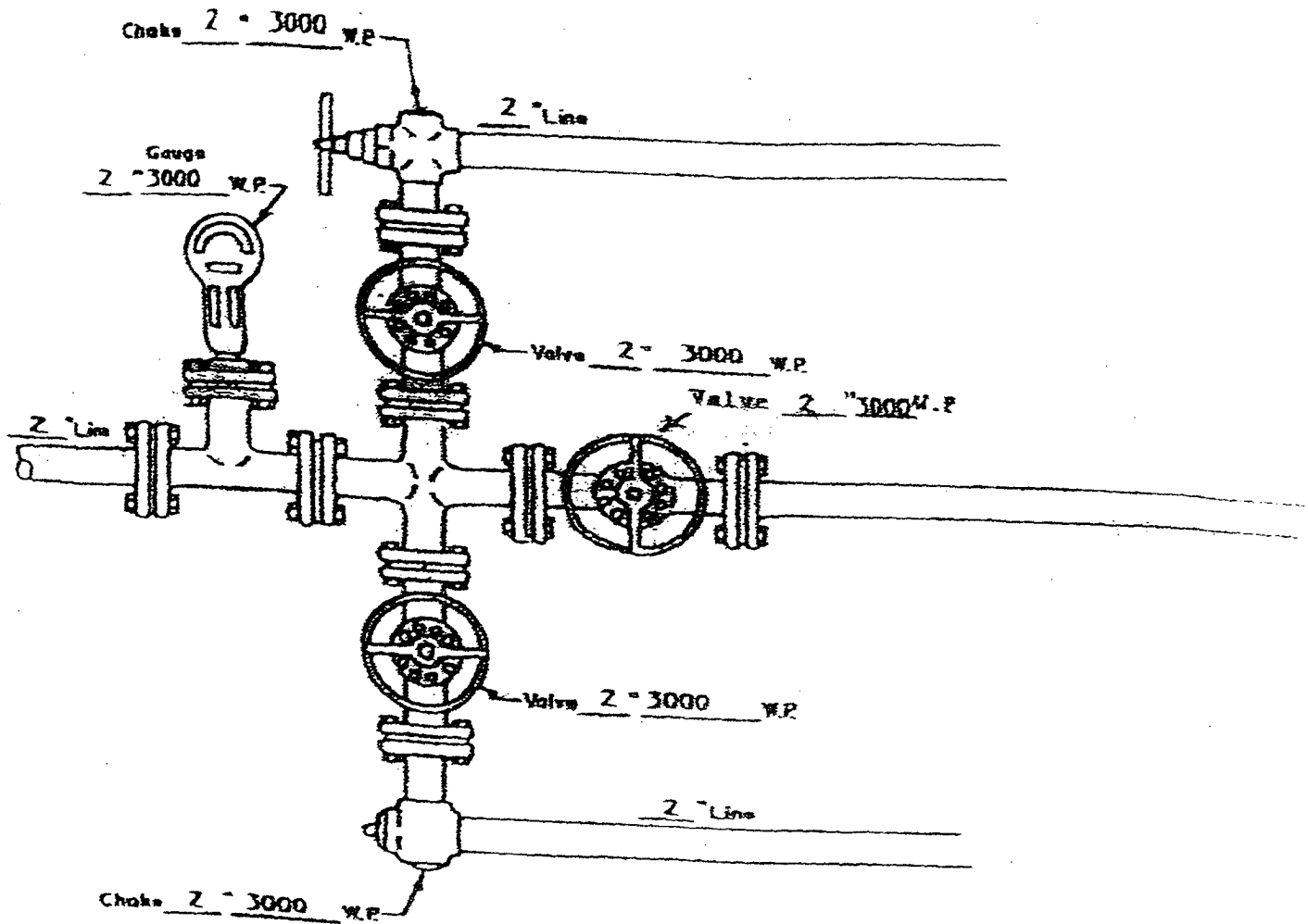
The anticipated spud date is March 1, 2006. It is expected it will take ~7 days to drill and ~7 days to complete the well. Completion will start about one month after the spud and will include hydraulic fracturing.

Drilling Rig

3000 psi BOP System



DRILLING RIG



MANIFOLD

3000 #W.P.

☒ Manual

☐ Hydraulic

ATTACHMENT NO. 2

PAGE #6