RECEIVED

NOV 28 2007

Bureau of Land Management
Farmington Field Office

Form 3160-3
(April 2004)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

FORM APPROVED
OMB No. 1004-0137
Expires March 31, 2007

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No. NM-36952

6. If Indian, Allotee or Tribe Name

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

7. If Unit or CA Agreement, Name and No.

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

8. Lease Name and Well No. Flo Jo #92

2. Name of Operator Dugan Production Corp.

9. API Well No. 30-045-34516

3a. Address 709 East Murray Drive, Farmington, NM 87401

3b. Phone No. (include area code) 505-325-1821

10. Field and Pool, or Exploratory Basin Fruitland Coal

4. Location of Well (Report location clearly and in accordance with any State requirements.*)
At surface 1200' FNL & 1850' FEL, Lat. 36.25934 N
At proposed prod. zone Same as above, Long. 107.95217 W

11. Sec., T. R. M. or Blk. and Survey or Area Sec. 1, T23N, R11W NMPM

14. Distance in miles and direction from nearest town or post office* Approx. 35-miles SE of Farmington, New Mexico

12. County or Parish San JUan

13. State NM

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drlg. unit line, if any) 990 Feet

16. No. of acres in lease 1760.28 Acres

17. Spacing Unit dedicated to this well N/2-320.28 Acres

18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. Approx. 1,000'

19. Proposed Depth 1090 Feet

20. BLM/BIA Bond No. On File

21. Elevations (Show whether DF, KDB, RT, GL, etc.) GL-6591' 6566

22. Approximate date work will start* ASAP

23. Estimated duration 5-Days

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 Kurt Fagrelius — Name (Printed/Typed) Kurt Fagrelius — Date Nov. 28, 2007

Title Geologist

Approved by (Signature) — Name (Printed/Typed) — Date 10/8/08

Title AFM — Office FFO

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.

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make 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.

*(Instructions on page 2)

A water based gel-mud will be used to drill surface a nd production casing hole. Standard 2,000 psi BOP will be used to drill production hole. The Fruitland Coal will be completed from approximately 909' - 931'. The interval will be fracture stimulated.

NOTIFY AZTEC OCD 24 HRS. PRIOR TO CASING & CEMENT

DRILLING OPERATIONS AUTHORIZED ARE SUBJECT TO COMPLIANCE WITH ATTACHED "GENERAL REQUIREMENTS".

BLM'S APPROVAL OR ACCEPTANCE OF THIS ACTION DOES NOT RELIEVE THE LESSEE AND OPERATOR FROM OBTAINING ANY OTHER AUTHORIZATION REQUIRED FOR OPERATIONS ON FEDERAL AND INDIAN LANDS

NMOCD

OCT 14 2008

This action is subject to technical and procedural review pursuant to 43 CFR 3165.3 and appeal pursuant to 43 CFR 3165.4

RCVD OCT 9 '08
OIL CONS. DIV.
DIST. 3

District I
1625 N. French Dr., Hobbs, NM 88240

District II
1301 W. Grand Avenue, 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 & Natural Resources Department

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

RECEIVED
NOV 28 2007
Bureau of Land Management

Form C-102
Revised October 12, 2005
Instructions on back
Submit to Appropriate District Office
State Lease - 4 Copies
Fee Lease - 3 Copies

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹API Number	²Pool Code	³Pool Name
30-045-34516	71629	BASIN FRUITLAND COAL

⁴Property Code	⁵Property Name	⁶Well Number
3684	FLO JO	92

⁷OGRID No.	⁸Operator Name	⁹Elevation
006515	DUGAN PRODUCTION CORPORATION	6566'

¹⁰ Surface Location

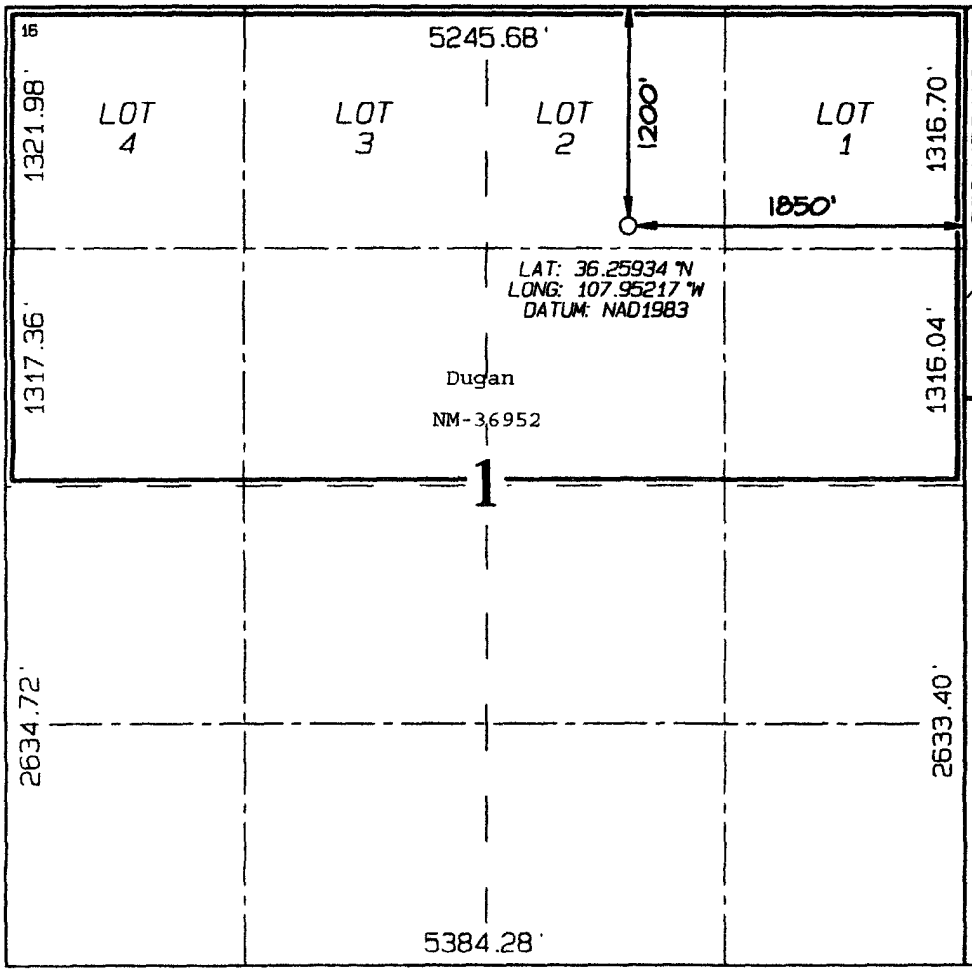
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
B	1	23N	11W		1200	NORTH	1850	EAST	SAN JUAN

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	¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No.
320.28 Acres - (N/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



¹⁷ OPERATOR CERTIFICATION

I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom-hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division.

Kurt Fagrelius — 11/26/2007
Signature — Date

Kurt Fagrelius
Printed Name

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

Survey Date: OCTOBER 23, 2007

Signature and Seal of Professional Surveyor

JASON C. EDWARDS
NEW MEXICO
15269
REGISTERED PROFESSIONAL SURVEYOR

JASON C. EDWARDS
Certificate Number 15269

EXHIBIT B
OPERATIONS PLAN
Flo Jo #92

APPROXIMATE FORMATION TOPS:

Ojo Alamo	Surface
Kirtland	Less than 80'
Fruitland	585'
Pictured Cliffs	935'
Total Depth	**1090'**

Catch samples every 10 feet from 850 feet to total depth.

LOGGING PROGRAM:

Run cased hole GR-CCL-CNL from total depth to surface.

CASING PROGRAM:

Hole Size	Casing Size	Wt./ft.	Setting Depth	Grade and Condition
12-1/4"	8-5/8"	24#	120'	J-55
7"	5-1/2"	14#	1090'	J-55

Plan to drill a 12-1/4" hole and set 120' of 8-5/8" OD, 24#, J-55 surface casing. Then plan to drill a 7" hole to total depth with gel-water mud program to test the Fruitland Coal. 5-1/2", 14#, J-55 production casing will be run and cemented. Cased hole GR-CCL-CNL log will be run. Productive zone will be perforated and fractured. After frac, the well will be cleaned out and production equipment will be installed.

CEMENTING PROGRAM:

Surface: Cement to surface with 70 cf Class B + 2% $CaCl_2$.
Circulate to surface.

Production Stage-Cement with 105 cf 2%lodense with
¼# celloflake/sx followed by 65 cf Class "B" with
¼# celloflake/sx.
Total cement slurry for production stage is 170 cf
Circulate cement to surface.

An adequate spacer will be pumped ahead of the cement slurry to help prevent mud contamination of the cement. An adequate number of casing centralizers will be run through usable water zones to ensure that casing is centralized through these zones. The adequate number of centralizers will be determined based on

API standards. Centralizers to impart a swirling action around the casing will be used just below and into the base of the lowest usable water zone. These devices will assist mud displacement, increase cement bonding potential and create an effective hydraulic seal. A chronological log will be kept which records the pump rate, pump pressure, slurry density, and slurry volume for the cement job. The log will be sent to the BLM after completion of the job.

Maximum Anticipated Bottom Hole Pressure - 300 psi.

Drilling Fluid - will be fresh water with bentonite (8.9#/gal).

WELLHEAD EQUIPMENT:

Huber 8-5/8"x5-1/2" casing head, 1000# WP, tested to 2000#.
Huber 5-1/2"x2-7/8" tubing head, 1000# WP, tested to 2000#.

BOP and Related Equipment will include for a 2000 psi system: (Exhibit D)

Annular preventer, double ram, or 2 rams with one being blind and one being a pipe ram.
Kill line (2" minimum)
1 kill line valve (2" minimum)
1 choke line valve
2 chokes
Upper kelly cock valve with handle available
Safety valve and subs to fit all drill string connections in use.
Pressure gauge on choke manifold.
2" minimum choke line.
Fill-up line.

Contacts:

Dugan Prod.Corp. Office & Radio Dispatch: 325-1821

Mark Brown	327-3632	(H)
	320-8247	(M)
Kurt Fagrelius	325-4327	(H)
	320-8248	(M)
John Alexander	325-6927	(H)
	320-1935	(M)

Form 3160-5
(June 1990)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

RECEIVED
MAY 09 2008
Bureau of Land Management
Farmington Field Office

FORM APPROVED
Budget Bureau No. 1004-0135
Expires: March 31,1993

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to deepen or reentry to a different reservoir.
Use "APPLICATION FOR PERMIT -" for such proposals

SUBMIT IN TRIPLICATE

5 Lease Designation and Serial No.
NM-36952

6. If Indian, Allotted or Tribe Name

1 Type of Well
☐ Oil Well ☒ Gas Well ☐ Other

7 If Unit or CA, Agreement Designation

2 Name of Operator
Dugan Production Corp.

8 Well Name and No
Flo Jo #92

3. Address and Telephone No.
P.O. Box 420 , Farmington, NM 87499 (505) 325 - 1821

9. API Well No
30 045 - 34516

Location of Well (Footage, Sec., T., R., M., or Survey Description)

1200' FNL & 1850' FEL (NW/4 NE/4)
Unit B, Sec. 1, T23N, R11W, NMPM

10 Field and Pool, or Exploratory Area
Basin Fruitland Coal

11. County or Parish, State
San Juan, NM

12. CHECK APPROPRIATE BOX(s) TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

TYPE OF SUBMISSION	TYPE OF ACTION		
☒ Notice of Intent	☐ Abandonment		☐ Change of Plans
	☐ Recompletion		☐ New Construction
☐ Subsequent Report	☐ Plugging Back		☐ Non-Routine Fracturing
	☐ Casing Repair		☐ Water Shut-Off
☐ Final Abandonment Notice	☐ Altering Casing		☐ Conversion to Injection
	☒ Other	Additional APD info	☐ Dispose Water

(Note. Report results of multiple completion on Well Completion or Recompletion Report and Log form)

13 Describe Proposed or Completed Operations (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work)*

RCVD OCT 9 '08
OIL CONS. DIV.
DIST. 3

Blow-out Preventor Equipment (BOPE) tests will be performed without using a test plug.

Will test the BOPE and surface casing together. The test will include a low pressure test to 250 psig held for five minutes and a high pressure test to 800 psig held for thirty minutes (with no more than a 10 percent pressure drop during the duration of the tests). If a 10 percent or greater pressure drop occurs, a packer will be run to isolate the surface casing and BOPE to locate the source of the leak.

RCVD MAY 28 '08
OIL CONS. DIV.
DIST. 3

14 I hereby certify that the foregoing is true and correct

Signed Kurt Fagrelius Title Vice-President, Exploration Date 5/6/2008
Kurt Fagrelius

(This space for Federal or State office use)

Approved by Matt Kade Title Engineering Tech Date 5-27-08

Conditions of approval, if any:

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

*See Instruction on Reverse Side

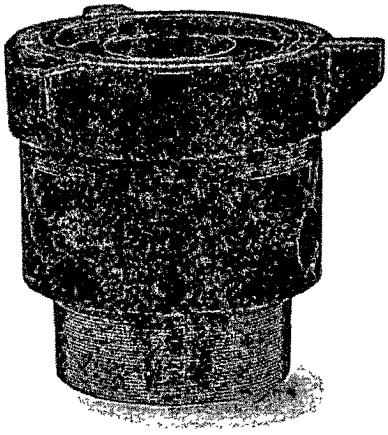
NMOCD

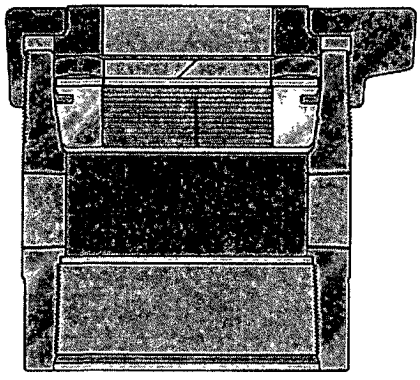
Dugan Production Corp. is asking for consent to pressure test the Blow-out Preventor Equipment (BOPE) without using a test plug because of the following reason:

Dugan uses a Gardner Denver 2000 drilling rig to drill shallow coal wells. The largest BOP that will fit under this rig is a Schafer 6" 2000 series that has an internal diameter of 7.0625". This BOP is screwed on to a Hercules LM85 casing head (1500 psi working pressure, 3000 psi test pressure, bottom thread 8-5/8" 8rd, cap thread 9-5/8" 8rd) that has an internal minimum bore of 7.920". The casing head is screwed onto 8-5/8" surface casing (24#, J-55 and 8rd thread) that has an internal diameter of 8.097".

Currently Dugan is unable to get a test plug for the casing head (7.920" ID) or surface casing (8.097" ID) that will pass through the BOP (7.0625").

Dugan will test the BOPE and surface casing together. The test will include a low pressure test to 250 psig held for five minutes and a high pressure test to 800 psig held for thirty minutes (with no more than a 10 percent pressure drop during the duration of the tests). If a 10 percent or greater pressure drop occurs, a packer will be run to isolate the surface casing and BOPE to locate the source of the leak.





Patented Positive Mechanical Stop Slip Design
- Limits slip travel.
- Reduces hoop stress in wellhead body.
- Slip load capacity equals thread joint capacity.
- Will not crush pipe ID below API drift.
- Non-restrictive to side outlet flow.

Contoured Packing Design
- For improved seal.

Improved Top Metal Ring Design
- Prevents packing extrusion.

Interchangeable Parts
- All internal parts on 1500, 2000 & 3000 PSI WP LM85 models are interchangeable.

SPECIFICATIONS

Bottom Thread	8-5/8" 8rd API*	8-5/8" 8rd API*	8-5/8" 8rd API*
Bottom Connection	Male Short or Fem. Short	Male Short, Fem. Short or Fem. Slip Joint	Fem. Short or Fem. Slip Joint
Working Pressure	1500 PSI	2000 PSI	3000 PSI
Test Pressure	3000 PSI	4000 PSI	6000 PSI
Max. Body Load (2:1 SF)	90,000 lbs.	180,000 lbs.	180,000 lbs.
Cap Thread	9-5/8" 8rd API mod.**	10-3/4" 8rd API mod.**	10-3/4" 8rd API mod.**
Cap Material	Ductile Iron	Ductile Iron	Carbon Steel
Inner String	2", 2-1/2", 3", 4-1/2", 5-1/2", 7"	2", 2-1/2", 3", 4-1/2", 5-1/2", 7"	2", 2-1/2", 3", 4-1/2", 5-1/2", 7"
Suspension	Slip or Mandrel	Slip or Mandrel	Slip or Mandrel
Side Outlet	2" LP	2" LP & 3" LP***	2" LP & 3" LP***
Minimum Bore	7.920"	7.920"	7.920"
Body Material	Ductile Iron	Carbon Steel	Carbon Steel
Height	12-1/2"	11-3/4"	11-3/4"
Weight	142 lbs.	200 lbs.	220 lbs.

* Other thread styles available.
** Caution: R&M Energy Systems recommends using only API modified threaded Hercules flanges. See pg 22
*** 3" LP special order only. Contact Customer Service.

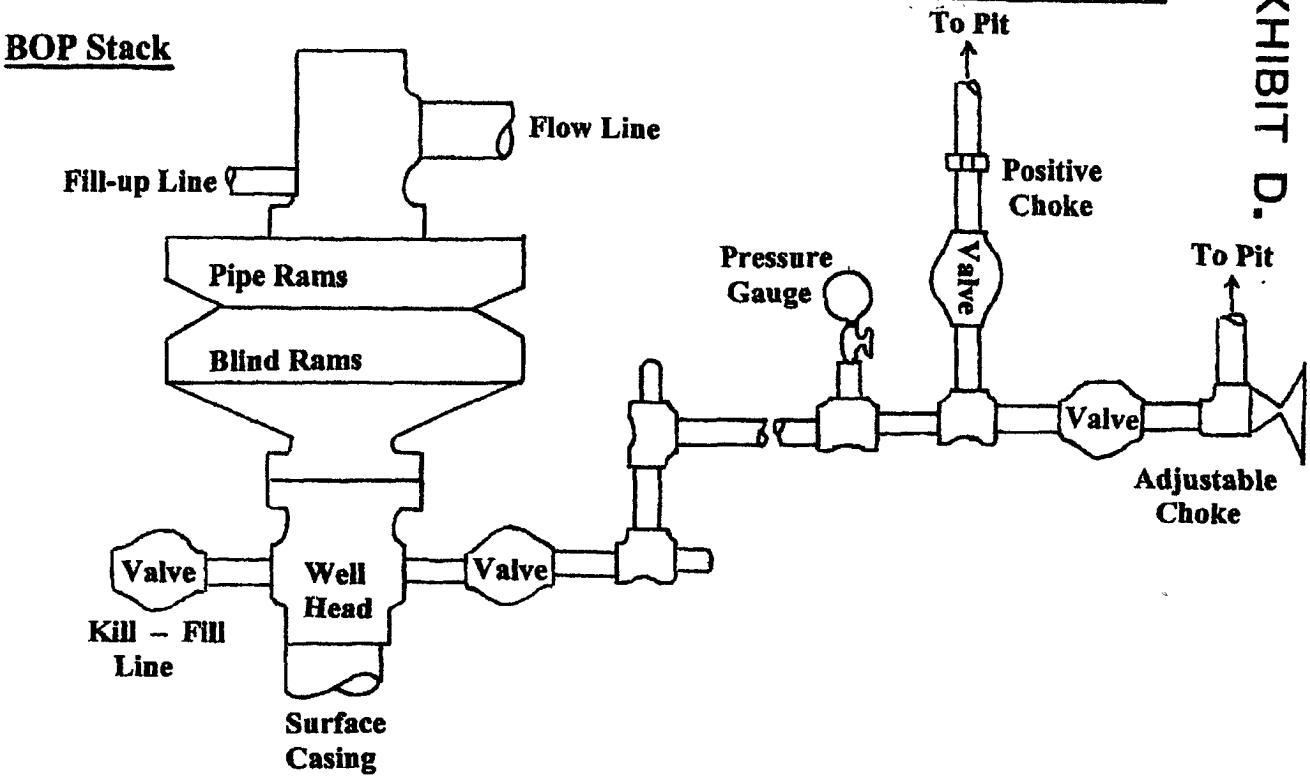
R&M ENERGY SYSTEMS
A Unit of Robbins & Myers, Inc.

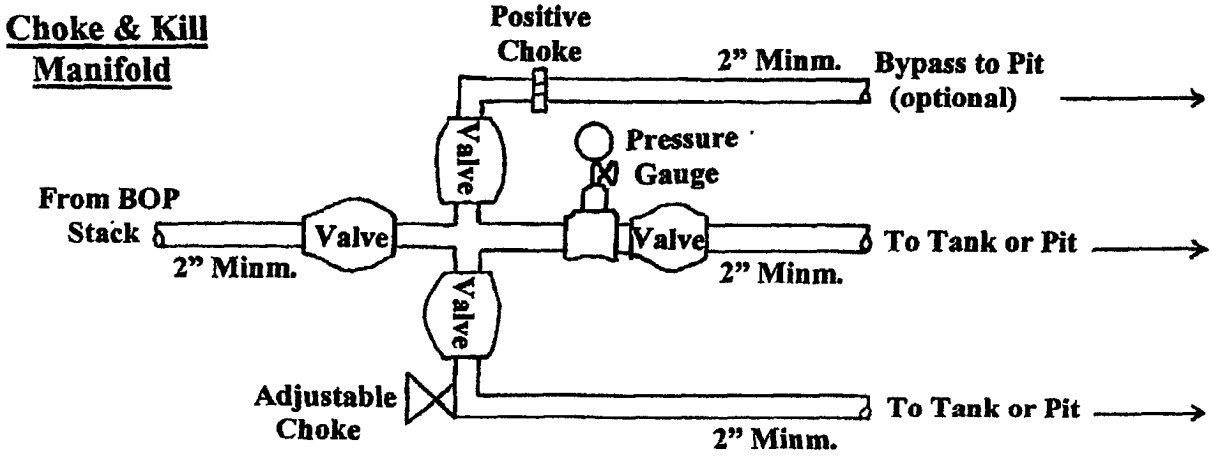
R&M Energy Systems
P.O. Box 2871
Borger, Texas, U.S.A. 79008-2871
(800) 858-4158
(806) 274-5293 • Fax (806) 274-3418

R&M Energy Systems Canada
9830 - 45th Avenue
Edmonton, Alberta, Canada T6E 5C5
(800) 661-5659
(780) 437-6316 • Fax (780) 435-3074

EXHIBIT D.

Well Control Equipment Schematic for 2,000 psi BOP





Working Pressure for all equipment is 2,000 psi or greater

DUGAN PRODUCTION CORP.
Flo Jo #92