Form 3160-3
(June 2015)

FORM APPROVED
OMB No. 1004-0137
Expires: January 31, 2018

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

APPLICATION FOR PERMIT TO DRILL OR REENTER

5. Lease Serial No.

6. If Indian, Allotee or Tribe Name

1a. Type of work: ☐ DRILL ☐ REENTER

1b. Type of Well: ☐ Oil Well ☐ Gas Well ☐ Other

1c. Type of Completion: ☐ Hydraulic Fracturing ☐ Single Zone ☐ Multiple Zone

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

8. Lease Name and Well No. **[330424]**

2. Name of Operator **[373910]**

9. API Well No. **30-025-48596**

3a. Address

3b. Phone No. *(include area code)*

10. Field and Pool, or Exploratory **[98185]**

4. Location of Well *(Report location clearly and in accordance with any State requirements.*)*

At surface

At proposed prod. zone

11. Sec., T. R. M. or Blk. and Survey or Area

14. Distance in miles and direction from nearest town or post office*

12. County or Parish

13. State

15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any)	16. No of acres in lease	17. Spacing Unit dedicated to this well
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft.	19. Proposed Depth	20. BLM/BIA Bond No. in file
21. Elevations (Show whether DF, KDB, RT, GL, etc.)	22. Approximate date work will start*	23. Estimated duration

24. Attachments

The following, completed in accordance with the requirements of Onshore Oil and Gas Order No. 1, and the Hydraulic Fracturing rule per 43 CFR 3162.3-3 (as applicable)

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 must 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 requested by the BLM.

25. Signature	Name *(Printed/Typed)*	Date
Title		
Approved by *(Signature)*	Name *(Printed/Typed)*	Date
Title	Office	

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.

GCP Rec 04/01/2021

KZ
04/06/2021

SL

APPROVED WITH CONDITIONS

(Continued on page 2)

*(Instructions on page 2)

Approval Date: 01/21/2021

INSTRUCTIONS

GENERAL: This form is designed for submitting proposals to perform certain well operations, as indicated on Federal and Indian lands and leases for action by appropriate Federal agencies, pursuant to applicable Federal laws and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from local Federal offices.

ITEM I: If the proposal is to redrill to the same reservoir at a different subsurface location or to a new reservoir, use this form with appropriate notations. Consult applicable Federal regulations concerning subsequent work proposals or reports on the well.

ITEM 4: Locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local Federal offices for specific instructions.

ITEM 14: Needed only when location of well cannot readily be found by road from the land or lease description. A plat, or plats, separate or on the reverse side, showing the roads to, and the surveyed location of, the wen, and any other required information, should be furnished when required by Federal agency offices.

ITEMS 15 AND 18: If well is to be, or has been directionany drilled, give distances for subsurface location of hole in any present or objective productive zone.

ITEM 22: Consult applicable Federal regulations, or appropriate officials, concerning approval of the proposal before operations are started.

ITEM 24: If the proposal will involve hydraulic fracturing operations, you must comply with 43 CFR 3162.3-3, including providing information about the protection of usable water. Operators should provide the best available information about all formations containing water and their depths. This information could include data and interpretation of resistivity logs run on nearby wells. Information may also be obtained from state or tribal regulatory agencies and from local BLM offices.

NOTICES

The Privacy Act of 1974 and regulation in 43 CFR 2.48(d) provide that you be furnished the following information in connection with information required by this application.

AUTHORITY: 30 U.S.C. 181 et seq., 25 U.S.C. 396; 43 CFR 3160

PRINCIPAL PURPOSES: The information will be used to: (1) process and evaluate your application for a permit to drill a new oil, gas, or service wen or to reenter a plugged and abandoned well; and (2) document, for administrative use, information for the management, disposal and use of National Resource Lands and resources including (a) analyzing your proposal to discover and extract the Federal or Indian resources encountered; (b) reviewing procedures and equipment and the projected impact on the land involved; and (c) evaluating the effects of the proposed operation on the surface and subsurface water and other environmental impacts.

ROUTINE USE: Information from the record and/or the record win be transferred to appropriate Federal, State, and local or foreign agencies, when relevant to civil, criminal or regulatory investigations or prosecution, in connection with congressional inquiries and for regulatory responsibilities.

EFFECT OF NOT PROVIDING INFORMATION: Filing of this application and disclosure of the information is mandatory only if you elect to initiate a drilling or reentry operation on an oil and gas lease.

The Paperwork Reduction Act of 1995 requires us to inform you that:
The BLM conects this information to anow evaluation of the technical, safety, and environmental factors involved with drilling for oil and/or gas on Federal and Indian oil and gas leases. This information will be used to analyze and approve applications. Response to this request is mandatory only if the operator elects to initiate drilling or reentry operations on an oil and gas lease. The BLM would like you to know that you do not have to respond to this or any other Federal agency-sponsored information collection unless it displays a currently valid OMB control number.

BURDEN HOURS STATEMENT: Public reporting burden for this form is estimated to average 8 hours per response, including the time for reviewing instructions, gathering and maintaining data, and completing and reviewing the form. Direct comments regarding the burden estimate or any other aspect of this form to U.S. Department of the Interior, Bureau of Land Management (1004-0137), Bureau Information Conection Clearance Officer (WO-630), 1849 C Street, N.W., Mail Stop 401 LS, Washington, D.C. 20240.

Approval Date: 01/21/2021

District I
1625 N. French Dr., Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720
District II
811 S. First St., Artesia, NM 88210
Phone: (575) 748-1283 Fax: (575) 748-9720
District III
1000 Rio Brazos Road, Aztec, NM 87410
Phone: (505) 334-6178 Fax: (505) 334-6170
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505
Phone: (505) 476-3460 Fax: (505) 476-3462

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 August 1, 2011
Submit one copy to appropriate District Office

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

[1] API Number	[2] Pool Code	[3] Pool Name
30-025-48596	98185	WC-025 G-09 S253502B;LWR BONE SPRING
[4] Property Code	**[5] Property Name**	**[6] Well Number**
330424	TRIUMPH FED COM	604H
[7] OGRID No.	**[8] Operator Name**	**[9] Elevation**
373910	FRANKLIN MOUNTAIN ENERGY LLC	3425.5'

[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	14	24S	35E		269	NORTH	1317	EAST	LEA

[11] Bottom Hole Location If Different From Surface

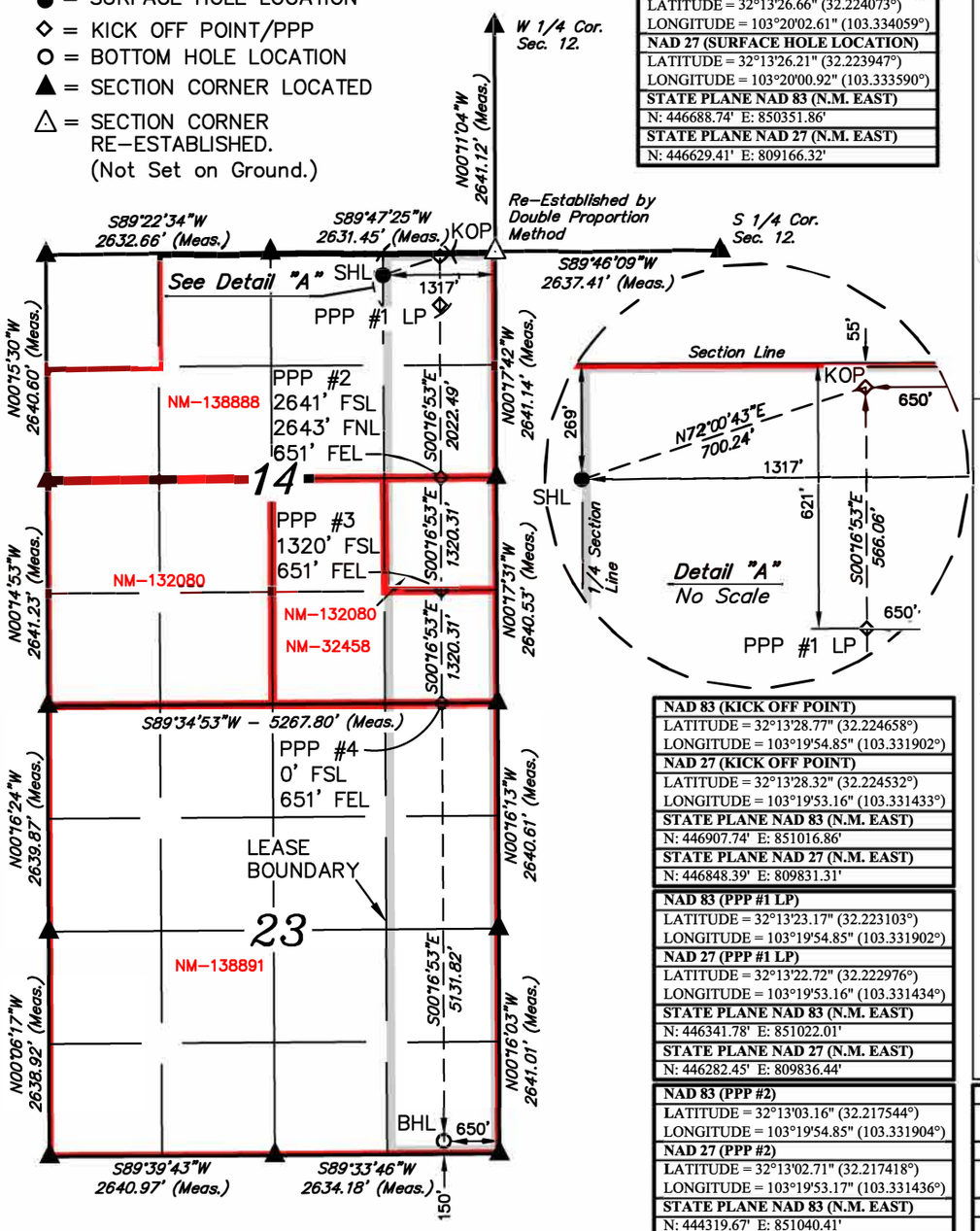
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
P	23	24S	35E		150	SOUTH	650	EAST	LEA

[12] Dedicated Acres	[13] Joint or Infill	[14] Consolidation Code	[15] Order No.
320			

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]

● = SURFACE HOLE LOCATION
◇ = KICK OFF POINT/PPP
○ = BOTTOM HOLE LOCATION
▲ = SECTION CORNER LOCATED
△ = SECTION CORNER RE-ESTABLISHED. (Not Set on Ground.)



2000' 1000' 0' 2000'
SCALE
DRAWN BY: S.S. 02-17-20
REV. 1 D.P. 06-19-20
(ADD PPP POINTS & LEASE INFO.)

NOTE:
- Distances referenced on plat to section lines are perpendicular.
- Basis of Bearing is a Transverse Mercator Projection with a Central Meridian of W103°53'00" (NAD 83)

NAD 83 (SURFACE HOLE LOCATION)
LATITUDE = 32°13'26.66" (32.224073°)
LONGITUDE = 103°20'02.61" (103.334059°)
NAD 27 (SURFACE HOLE LOCATION)
LATITUDE = 32°13'26.21" (32.223947°)
LONGITUDE = 103°20'00.92" (103.333590°)
STATE PLANE NAD 83 (N.M. EAST)
N: 446688.74' E: 850351.86'
STATE PLANE NAD 27 (N.M. EAST)
N: 446629.41' E: 809166.32'

NAD 83 (KICK OFF POINT)
LATITUDE = 32°13'28.77" (32.224658°)
LONGITUDE = 103°19'54.85" (103.331902°)
NAD 27 (KICK OFF POINT)
LATITUDE = 32°13'28.32" (32.224532°)
LONGITUDE = 103°19'53.16" (103.331433°)
STATE PLANE NAD 83 (N.M. EAST)
N: 446907.74' E: 851016.86'
STATE PLANE NAD 27 (N.M. EAST)
N: 446848.39' E: 809831.31'

NAD 83 (PPP #1 LP)
LATITUDE = 32°13'23.17" (32.223103°)
LONGITUDE = 103°19'54.85" (103.331902°)
NAD 27 (PPP #1 LP)
LATITUDE = 32°13'22.72" (32.222976°)
LONGITUDE = 103°19'53.16" (103.331434°)
STATE PLANE NAD 83 (N.M. EAST)
N: 446341.78' E: 851022.01'
STATE PLANE NAD 27 (N.M. EAST)
N: 446282.45' E: 809836.44'

NAD 83 (PPP #2)
LATITUDE = 32°13'03.16" (32.217544°)
LONGITUDE = 103°19'54.85" (103.331904°)
NAD 27 (PPP #2)
LATITUDE = 32°13'02.71" (32.217418°)
LONGITUDE = 103°19'53.17" (103.331436°)
STATE PLANE NAD 83 (N.M. EAST)
N: 444319.67' E: 851040.41'
STATE PLANE NAD 27 (N.M. EAST)
N: 444260.40' E: 809854.76'

NAD 83 (PPP #3)
LATITUDE = 32°12'50.10" (32.213916°)
LONGITUDE = 103°19'54.86" (103.331905°)
NAD 27 (PPP #3)
LATITUDE = 32°12'49.64" (32.213790°)
LONGITUDE = 103°19'53.17" (103.331437°)
STATE PLANE NAD 83 (N.M. EAST)
N: 442999.61' E: 851052.42'
STATE PLANE NAD 27 (N.M. EAST)
N: 442940.37' E: 809866.72'

NAD 83 (PPP #4)
LATITUDE = 32°12'37.04" (32.210288°)
LONGITUDE = 103°19'54.86" (103.331906°)
NAD 27 (PPP #4)
LATITUDE = 32°12'36.58" (32.210161°)
LONGITUDE = 103°19'53.18" (103.331438°)
STATE PLANE NAD 83 (N.M. EAST)
N: 441679.55' E: 851064.43'
STATE PLANE NAD 27 (N.M. EAST)
N: 441620.34' E: 809878.68'

NAD 83 (BOTTOM HOLE LOCATION)
LATITUDE = 32°11'46.26" (32.196184°)
LONGITUDE = 103°19'54.87" (103.331909°)
NAD 27 (BOTTOM HOLE LOCATION)
LATITUDE = 32°11'45.81" (32.196058°)
LONGITUDE = 103°19'53.19" (103.331442°)
STATE PLANE NAD 83 (N.M. EAST)
N: 436548.69' E: 851111.12'
STATE PLANE NAD 27 (N.M. EAST)
N: 436489.62' E: 809925.16'

[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.

6/23/2020
Signature Date

Shelly Albrecht
Printed Name

salbrecht@fmellc.com
E-mail Address

[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.

February 07, 2020
Date of Survey
Signature and Seal of Professional Surveyor:

Certificate Number:

District I
1625 N. French Dr., Hobbs, NM 88240
District II
811 S. First St., Artesia, NM 88210
District III
1000 Rio Brazos Road, Aztec, NM 87410
District IV
1220 S. St. Francis Dr., Santa Fe, NM 87505

State of New Mexico
Energy, Minerals and Natural Resources Department

Oil Conservation Division
1220 South St. Francis Dr.
Santa Fe, NM 87505

Submit Original
to Appropriate
District Office

GAS CAPTURE PLAN

Date: 12/2/2020

☒ Original
☐ Amended - Reason for Amendment:

Operator & OGRID No.: Franklin Mountain Energy, LLC 373910

This Gas Capture Plan outlines actions to be taken by the Operator to reduce well/production facility flaring/venting for new completion (new drill, recomplete to new zone, re-frac) activity.

Note: Form C-129 must be submitted and approved prior to exceeding 60 days allowed by Rule (Subsection A of 19.15.18.12 NMAC).

Well(s)/Production Facility – Name of facility

The well(s) that will be located at the production facility are shown in the table below.

Well Name	API	Well Location (ULSTR)	Footages	Expected MCF/D	Flared or Vented	Comments
Master Fed Com 603H	TBD	B-14-24S-35E	269 FNL 1387 FEL	1100 +/-	Flared	New well; expect to tie-in at IP
Triumph Fed Com 604H	TBD **30-025-48596**	B-14-24S-35E	269 FNL 1317 FEL	1100 +/-	Flared	New well; expect to tie-in at IP
Triumph Fed Com 705H	TBD	B-14-24S-35E	269 FNL 1352 FEL	1100 +/-	Flared	New well; expect to tie-in at IP
Triumph Fed Com 706H	TBD	A-14-24S-35E	269 FNL 1282 FEL	1100 +/-	Flared	New well; expect to tie-in at IP

Gathering System and Pipeline Notification

Well(s) will be connected to a production facility after flowback operations are complete, if gas transporter system is in place. The gas produced from production facility is dedicated to Lucid Energy and will be connected to Lucid Energy's gathering system located in Lea County, New Mexico. It will require 10,000' of pipeline to connect the facility to low/high pressure gathering system. Franklin Mountain Energy, LLC provides (periodically) to Lucid Energy a drilling, completion and estimated first production date for wells that are scheduled to be drilled in the foreseeable future. In addition, Franklin Mountain Energy, LLC and Lucid Energy have periodic conference calls to discuss changes to drilling and completion schedules. Gas from these wells will be processed at Lucid Energy's Red Hills Processing Plant located in Sec.13, Twn. 24S, Rng. 33E, Lea County, New Mexico. The actual flow of the gas will be based on compression operating parameters and gathering system pressures.

Flowback Strategy

After the fracture treatment/completion operations, well(s) will be produced to permanent central tank battery and gas will be sold or flared. Gas sales should start as soon as the wells start producing gas unless there are operational issues on Lucid Energy's system at that time. Based on current information, it is Franklin Mountain Energy's belief the system can take this gas upon completion of the well(s).

Safety requirements during cleanout operations from the use of underbalanced air cleanout systems may necessitate that sand and non-pipeline quality gas be vented and/or flared rather than sold on a temporary basis.

Alternatives to Reduce Flaring

Below are alternatives considered from a conceptual standpoint to reduce the amount of gas flared.

- Power Generation – On lease
  - Only a portion of gas is consumed operating the generator, remainder of gas will be flared
- Compressed Natural Gas – On lease
  - Gas flared would be minimal, but might be uneconomical to operate when gas volume declines
- NGL Removal – On lease
  - Plants are expensive, residue gas is still flared, and uneconomical to operate when gas volume declines

FRANKLIN MOUNTAIN ENERGY

Triumph Fed Com 604H

1. **Geologic name of surface location:** Permian

2. **Estimated tops of important geological markers:**

Formations	PROG SS	PROG TVD	Picked TVD	delta	Potential/Issues
Cenozoic Alluvium (surface)	3,426'	30'	30'	0	Sand/Gravels/unconsolidated
Rustler	2,047'	1,409'			Carbonates
Salado	1,763'	1,693'			Salt, Carbonate & Clastics
Base Salt	444'	3,012'			Shaley Carbonate & Shale
Lamar	-1,966'	5,422'			Carbonate & Clastics
Bell Canyon	-1,986'	5,442'			Sandstone - oil/gas/water
Cherry Canyon	-2,675'	6,131'			Sandstone - oil/gas/water
Brushy Canyon	-3,929'	7,385'			Sand/carb/shales - oil/gas/water
Bone Spring Lime	-5,234'	8,690'			Shale/Carbonates - oil/gas
Avalon	-5,271'	8,727'			Shale/Carbonates - oil/gas
First Bone Spring Sand	-6,263'	9,719'			Sandstone - oil/gas/water
Second Bone Spring Carbonates	-6,450'	9,906'			Shale/Carbonates - oil/gas
Second Bone Spring Sand	-7,004'	10,460'			Sandstone - oil/gas/water
Third Bone Spring Carbonates	-7,520'	10,976'			Shale/Carbonates - oil/gas
Third Bone Spring Sand	-8,043'	11,499'			Sandstone - oil/gas/water
HZ Target at SHL	-8,170'	11,626'			Overpressure shale/sand- Oil/Gas
Wolfcamp	-8,294'	11,750'			Overpressure shale/sand- Oil/Gas
Wolfcamp A	-8,325'	11,781'			Overpressure Shale - Oil/Gas
Wolfcamp B	-8,530'	11,986'			Overpressure Shale - Oil/Gas

3. **Estimated depth of anticipated fresh water, oil or gas:**

Upper Permian Sands	0- 400’	Fresh Water
Delaware Sands	5,442’	Oil
Bone Spring	9,719’	Oil
Wolfcamp	11,750’	Oil

No other formations are expected to give up oil, gas or fresh water in measurable quantities. Surface freshwater sands will be protected by setting 13 3/8” casing at 1,300’and circulating cement back to surface.

4. **Casing Program:**

All casings strings will be run new. Safety factors calculated assuming the well is vertical.

Casing string	Weight	Grade	Burst	Collapse	Tension	Conn	Length	API design factor			
								Burst	Collapse	Tension	Coupling
Surface 13 3/8"	54.5	J-55	2730	1130	853	BTC 909	1300	1.18	1.67	4.99	5.32
Intermediate 9 5/8"	40	HCL-80	7430	4230	916	BTC 1042	5400	1.72	1.67	2.90	3.30
Intermediate 7 5/8"	29.7	HCP-110	8280	7150	827	Stinger 564	11992	1.11	1.27	1.81	1.24
Long string 5 1/2"	23	P-110	14520	14520	729	Anaconda 656	21786	1.32	1.42	1.21	1.09

Cementing Program:
Cementing Stage tool can be placed in the 1st Intermediate string as a contingency to ensure required TOC to surface.

String Type	Hole Size	Casing Size	Setting Depth	Sacks	Lead Type of cmt	Lead Yield ft3/sk	Lead Water gal/sk	Lead TOC ft	Tail Sacks	Tail Type of cmt	Tail Yield ft3/sk	Tail Water gal/sk	Tail TOC	Excess
Surf	17.5	13.375	1300	795	Extenda Cem, 13.5 ppg Class C, 3lb/sk Kol-Seal 0.125pps Poly-E-Flake	1.747	9.06	0	334	HalCem TM, 14.8 ppg, Class C, 1% CaCl2, 0.125pps Celo-Flake	1.349	6.51	1000	100%
Int1	12.25	9.625	5400	1167	Neocem TM, 11.5 ppg, Class C 5% Salt, 0.125 pps Poly-E-Flake, 3lb/sk Kol-Seal	2.444	14.32	0	153	HalCem TM, 14.8 ppg, Class C, 0.1% HR 800 .125 pps Poly-E-Flake	1.334	6.42	5100	100%
Int2	8.75	7.625	11992	340	NeoCem, 11 ppg, Class C 3lb/sk Bridgemaker Gel, 5% Salt, 5pps LCM, 0.25pps Cello-Flake	2.798	17.15	4400	112	NeoCem 13.2 ppg, Class C 0.25 pps Cello-Flake, 2% CaICl2	1.44	7.29	10992	50%
Prod	6.75	5.5	21786	795	NeoCem, 13.5 ppg, Gas Migration Control	1.357	6.65	10992						20%

5. Minimum Specifications for Pressure Control:

The minimum blowout preventer equipment (BOPE) shown in Exhibit #1 will consist of a single ram, mud cross and double ram-type (10,000 psi WP) preventer and an annular preventer (5,000-psi WP). Both units will be hydraulically operated, and the ram-type will
be equipped with blind rams on bottom and 4 ½" x 7" variable pipe rams on top. All BOPE will be tested in accordance with Onshore Oil & Gas order No. 2.
Before drilling out of the surface casing, the ram-type BOP and accessory equipment will be tested to 5,000/250 psig and the annular preventer to 5,000/250 psig. The surface casing will be tested to 1500 psi for 30 minutes.

Before drilling out of the second intermediate casing, the ram-type BOP and accessory equipment will be tested to 10,000/250 psig and the annular preventer to 5,000/250 psig. The second intermediate casing will be tested to 2000 psi for 30 minutes prior to drillout.
Pipe rams will be operationally checked each 24-hour period. Blind rams will be operationally checked on each trip out of the hole. These checks will be noted on the daily tour sheets.

A hydraulically operated choke will be installed prior to drilling out of the intermediate casing shoe.

FRANKLIN MOUNTAIN ENERGY

6. Types and characteristics of the proposed mud system:

During this procedure we plan to use a Closed-Loop System and haul contents to the required disposal. The applicable depths and properties of the drilling fluid systems are as follows.

Depth	Type	Weight (ppg)	Viscosity	Water Loss
0 – 1,300'	Fresh - Gel	8.6-8.8	28-34	N/c
1,300' – 11,992'	Brine	8.8-10.2	28-34	N/c
11,992' – 21,786' Lateral	Oil Base	10.0-11.0	58-68	3 - 6

The highest mud weight needed to balance formation is expected to be 10-11 ppg. In order to maintain hole stability, mud weights up to 12 ppg may be utilized.
An electronic pit volume totalizer (PVT) will be utilized on the circulating system, to monitor pit volume, flow rate, pump pressure and stroke rate.
Sufficient mud materials to maintain mud properties and meet minimum lost circulation and weight increase requirements will be kept at the wellsite at all times.

7. Auxiliary well control and monitoring equipment:

(A) A kelly cock will be kept in the drill string at all times.
(B) A full opening drill pipe-stabbing valve (inside BOP) with proper drill pipe connections will be on the rig floor at all times.
(C) H2S monitoring and detection equipment will be utilized from surface casing point to TD.
(D) A wear bushing will be installed in the wellhead prior to drilling out of the surface casing.

8. Logging, testing and coring program:

GR–CCL-CNL Will be run in cased hole during completions phase of operations.
Open-hole logs are not planned for this well.

9. Abnormal conditions, pressures, temperatures and potential hazards:

The estimated bottom-hole temperature at 11,750' TVD (deepest point of the well) is 195F with an estimated maximum bottom-hole pressure (BHP) at the same point of 7,332 psig (based on 12 ppg MW). Hydrogen sulfate may be present in the area. All necessary precautions will be taken before drilling operations commence. See Hydrogen Sulfide Plan below:

10. Hydrogen Sulfide Plan:

A. All personnel shall receive proper awareness H2S training.
B. Briefing Area: two perpendicular areas will be designated by signs and readily accessible.
C. Required Emergency Equipment
    a. Well Control Equipment
        i. Flare line 150' from wellhead to be ignited by auto ignition sparking system.
        ii. Choke manifold with a remotely operated hydraulic choke.
        iii. Mud/gas separator
    b. Protective equipment for essential personnel
        i. Breathing Apparatus
            1. Rescue packs (SCBA) – 1 unit shall be placed at each briefing area, 2 shall be stored in a safety trailer on site.
            2. Work/Escape packs – 4 packs shall be stored on the rig floor with sufficient air hose not to restrict work activity

3. Emergency Escape Packs – 4 packs shall be stored in the doghouse for emergency evacuation

ii. Auxiliary Rescue Equipment
1. Stretcher
2. Two OSHA full body harnesses
3. 100 feet of 5/8 inches OSHA approved rope
4. 1-20# class ABC fire extinguisher

c. H2S Detection and Monitoring Equipment
i. A stationary detector with three sensors will be placed in the doghouse if equipped, set to visually alarm at 10 ppm and audible at 14 ppm. The detector will be calibrated a minimum of every 30 days or as needed. The sensors will be placed in the following places:
1. Rig Floor
2. Below Rig Floor / Near BOPs
3. End of flow line or where well bore fluid is being discharged (near shakers)
ii. If H2S is encountered, measured values and formations will be provided to the BLM.

d. Visual Warning Systems
i. One color code condition sign will be placed at the entrance to the site reflecting the possible conditions at the site.
ii. A colored condition flag will be on display, reflecting the current condition at the site at the time.
iii. Two windsocks will be placed in strategic locations, visible from all angles.

e. Mud Program
i. The Mud program will be designed to minimize the volume of H2S circulated to surface. The operator will have the necessary mud products to minimize hazards while drilling in H2S bearing zones.

f. Metallurgy
i. All drill strings, casings, tubing, wellhead, blowout preventer, drilling spool, kill lines, choke manifold and lines, and valves shall be suitable for H2S service at the anticipated operating pressures to prevent sour sulfide stress cracking.

g. Communication
i. Communication will be via cell phones and walkie talkies on location.

Franklin Mountain Energy has conducted a review of offset operated wells to determine if an H2S contingency plan is required for the proposed well. Based on concentrations of offset wells, proximity to main roads, and distance to populated areas, the radius of exposure created by a potential release was determined to be minimal and low enough to not necessitate an H2S contingency plan. This will be reevaluated during wellbore construction if H2S is observed and after the well is on production.

11. Anticipated starting date and duration of operations:

The drilling operations on the well should be finished in approximately one month. However, in order to minimize disturbance in the area and to improve efficiency Franklin Mountain is planning to drill all the wells on the pad prior to commence completion operations. To even further reduce the time heavy machinery is used the “batch drilling” method may be used. A batch drilling sequence sundry will be submitted for BLM approval prior to spud. A drilling rig with walking/skidding capabilities will be used.

FRANKLIN MOUNTAIN ENERGY

12. Disposal/environmental concerns:

(A) Drilled cuttings will be hauled to and disposed of in a state-certified disposal site.
(B) Non-hazardous waste mud/cement from the drilling process will be also be hauled to and disposed of in a state-certified disposal site.
(C) Garbage will be hauled to the Pecos City Landfill.
(D) Sewage (grey water) will be hauled to the Carlsbad City Landfill

13. Wellhead:

A multi-bowl wellhead system will be utilized.
After running the 13 3/8" surface casing, a 13-5/8" BOP/BOPE system with a minimum working pressure of 10,000 psi will be installed on the wellhead system and will be pressure tested to 250 psi low followed by a 5,000 psi pressure test. This pressure test will be repeated at least every 21 days, as per Onshore Order No. 2

The minimum working pressure of the BOP and related BOPE required for drilling below the surface casing shoe shall be 5,000 psi.

After running the 2nd intermediate casing, and before drilling out, the wellhead, BOP, and related equipment will be tested to 10,000/250 psig.

The multi-bowl wellhead will be installed by vendor's representative(s). A copy of the installation instructions for the Cameron Multi-Bowl WH system has been sent to the BLM office in Carlsbad.

The wellhead will be installed by a third party welder while being monitored by WH vendor's representative.

All BOP equipment will be tested utilizing a conventional test plug. Not a cup or J-packer type.

A solid steel body pack-off will be utilized after running and cementing the intermediate casing strings. After installation of the first intermediate string the pack-off and lower flanges will be pressure tested to 5000 psi. After installation of the second intermediate string, the pack-off and upper flange will be pressure tested to 10,000 psi.

Both the surface and intermediate casing strings will be tested as per Onshore Order No. 2 to at least 0.22 psi/ft or 1500 psi, whichever is greater.

14. Additional variance requests

A. Casing.
In order to minimize potential environmental and technical hazards, this well is planned with two intermediate strings of casing.

1. Variance is requested to wave the centralizer requirements for the 7 5/8" casing due to the tight clearance with 9 5/8" string.
2. Variance is requested to wave/reduce the centralizer requirements for the 5 ½" casing due to the tight clearance with 6 3/4" hole and 5 ½" casing due to tight clearances.

Franklin Mountain Energy

Project: Lea County, NM (NAD83)
Site: Master/Triumph Fed Com
Well: Triumph Fed Com 604H
Wellbore: OH
Design: Plan #1

3425.5' GE + 30' KB @ 3455.50usft

Azimuths to Grid North
True North: -0.53°
Magnetic North: 6.02°

Magnetic Field
Strength: 47623.5nT
Dip Angle: 59.97°
Date: 6/11/2020
Model: IGRF2020

PROJECT DETAILS: Lea County, NM (NAD83)

Geodetic System: US State Plane 1983
Datum: North American Datum 1983
Ellipsoid: GRS 1980
Zone: New Mexico Eastern Zone

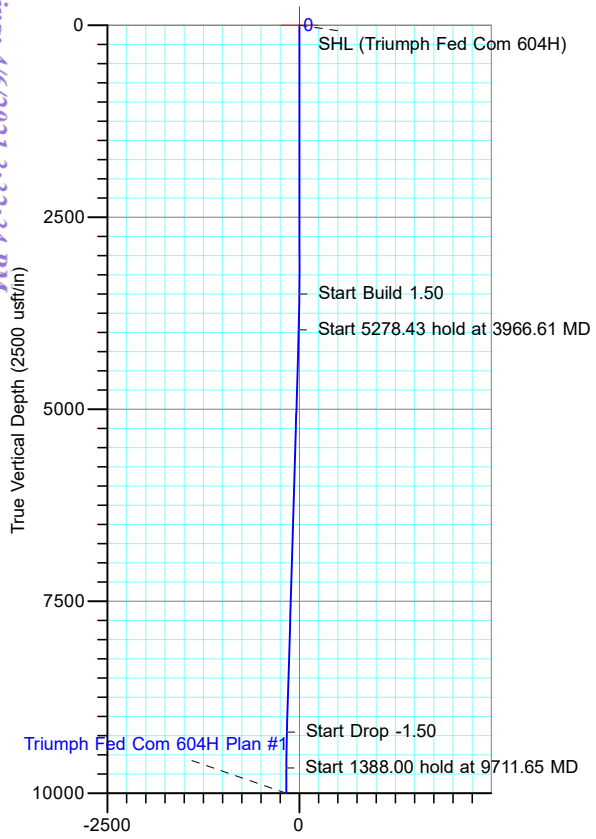
FRANKLIN MOUNTAIN ENERGY

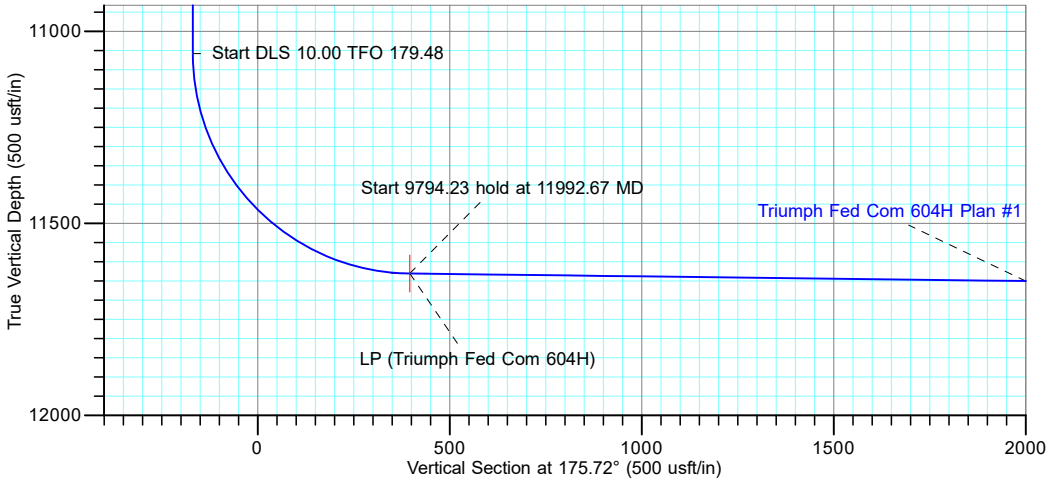
SECTION DETAILS

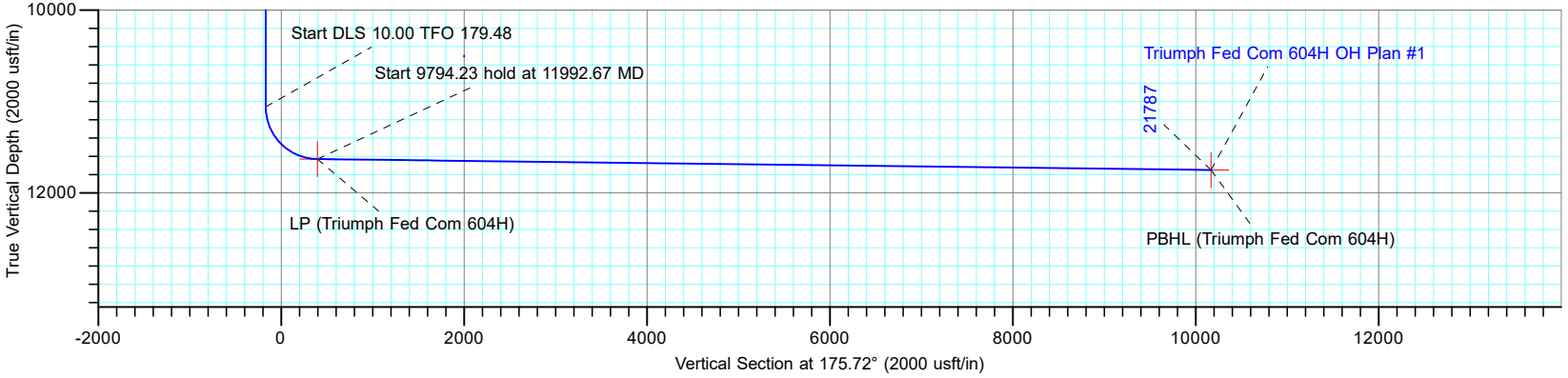
MD	Inc	Azi	TVD	+N/-S	+E/-W	DIeg	TFace	VSect	Annotation
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
3500.00	0.00	0.00	3500.00	0.00	0.00	0.00	0.00	0.00	Start Build 1.50
3966.61	7.00	71.77	3965.45	8.90	27.04	1.50	71.77	-6.86	Start 5278.43 hold at 3966.61 MD
9245.04	7.00	71.77	9204.55	210.10	637.96	0.00	0.00	-161.87	Start Drop -1.50
9711.65	0.00	0.00	9670.00	219.00	665.00	1.50	180.00	-168.73	Start 1388.00 hold at 9711.65 MD
11099.65	0.00	0.00	11058.00	219.00	665.00	0.00	0.00	-168.73	Start DLS 10.00 TFO 179.48
11992.67	89.30	179.48	11630.92	-346.95	670.15	10.00	179.48	396.02	Start 9794.23 hold at 11992.67 MD
21786.90	89.30	179.48	11750.24	-10140.05	759.26	0.00	0.00	10168.44	TD at 21786.90

DESIGN TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Latitude	Longitude
LP (Triumph Fed Com 604H)	11630.92	-346.95	670.15	32.223103	-103.331902
PBHL (Triumph Fed Com 604H)	11750.24	-10140.05	759.26	32.196184	-103.331909
SHL (Triumph Fed Com 604H)	0.00	0.00	0.00	32.224073	-103.334059







TOTAL DIRECTIONAL SERVICES LLC
671 Academy Ct, Windsor, CO 80550
Phone: (970) 460-9402

Plan: Plan #1 (Triumph Fed Com 604H/OH)
Master/Triumph Fed Com
Created By: Dustin Ault Date: 16:11, June 11 2020
Date: _____
Approved: _____ Date: _____

Franklin Mountain Energy

Project: Lea County, NM (NAD83)
Site: Master/Triumph Fed Com
Well: Triumph Fed Com 604H
Wellbore: OH
Design: Plan #1

Azimuths to Grid North
True North: -0.53°
Magnetic North: 6.02°

Magnetic Field
Strength: 47623.5nT
Dip Angle: 59.97°
Date: 6/11/2020
Model: IGRF2020

PROJECT DETAILS: Lea County, NM (NAD83)
Geodetic System: US State Plane 1983
Datum: North American Datum 1983
Ellipsoid: GRS 1980
Zone: New Mexico Eastern Zone

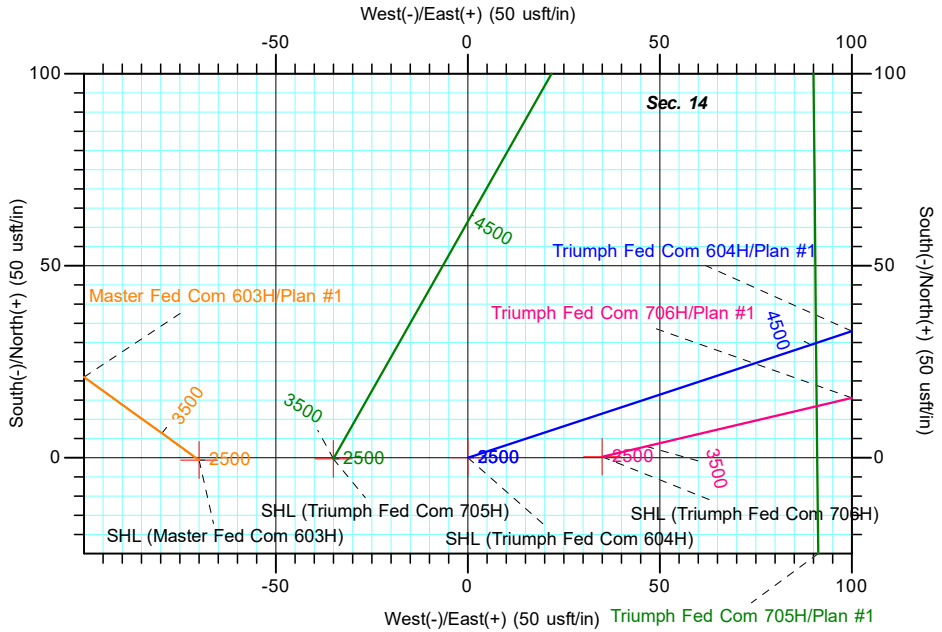
FRANKLIN MOUNTAIN ENERGY

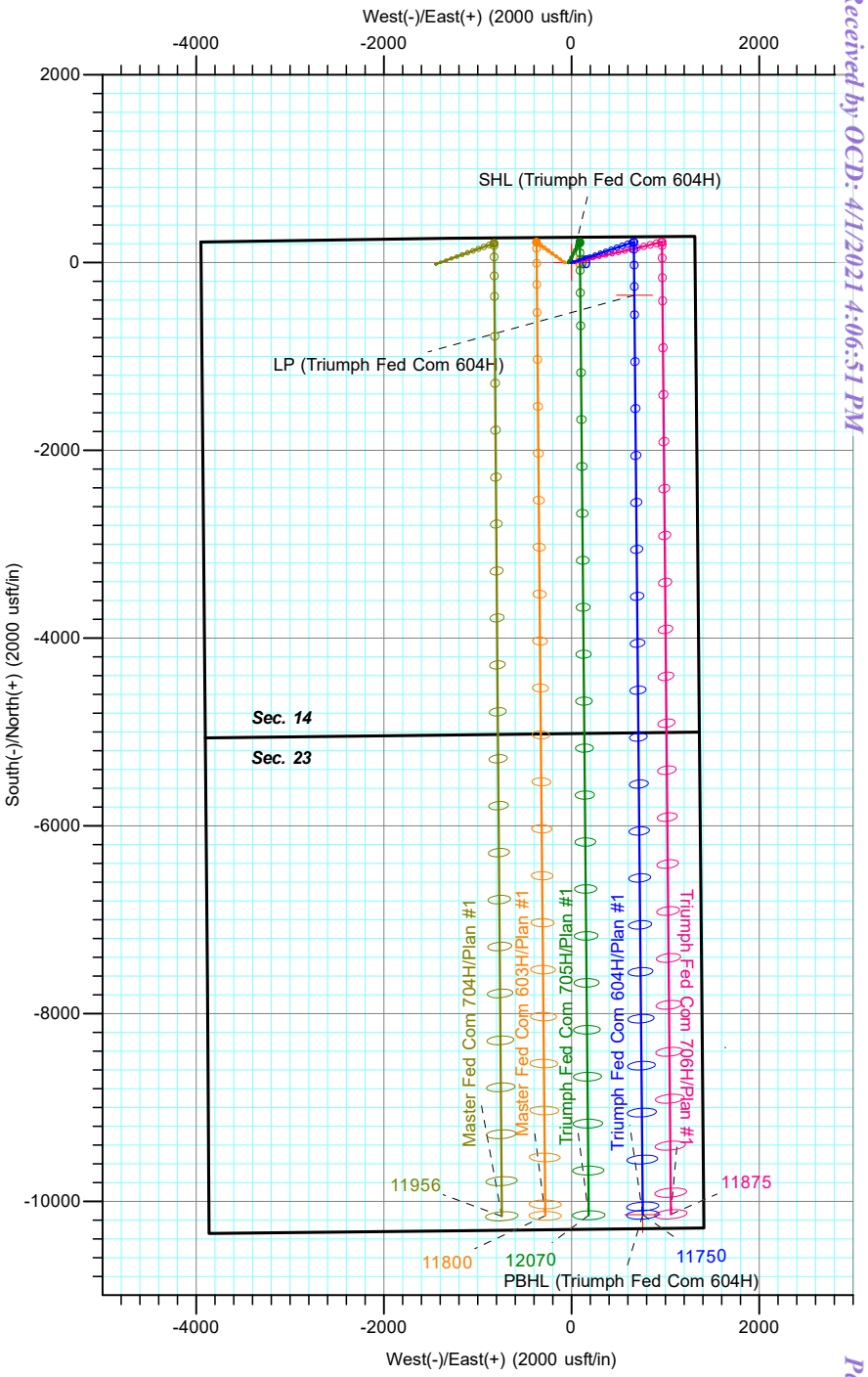
DESIGN TARGET DETAILS

Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
LP (Triumph Fed Com 604H)	11630.92	-346.95	670.15	446341.79	851022.01	32.223103	-103.331902
PBHL (Triumph Fed Com 604H)	11750.24	-10140.05	759.26	436548.69	851111.12	32.196184	-103.331909
SHL (Triumph Fed Com 604H)	0.00	0.00	0.00	446688.74	850351.86	32.224073	-103.334059

SECTION DETAILS

MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	VSect	Annotation
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
3500.00	0.00	0.00	3500.00	0.00	0.00	0.00	0.00	0.00	Start Build 1.50
3966.61	7.00	71.77	3965.45	8.90	27.04	1.50	71.77	-6.86	Start 5278.43 hold at 3966.61 MD
9245.04	7.00	71.77	9204.55	210.10	637.96	0.00	0.00	-161.87	Start Drop -1.50
9711.65	0.00	0.00	9670.00	219.00	665.00	1.50	180.00	-168.73	Start 1388.00 hold at 9711.65 MD
11099.65	0.00	0.00	11058.00	219.00	665.00	0.00	0.00	-168.73	Start DLS 10.00 TFO 179.48
11992.67	89.30	179.48	11630.92	-346.95	670.15	10.00	179.48	396.02	Start 9794.23 hold at 11992.67 MD
21786.90	89.30	179.48	11750.24	-10140.05	759.26	0.00	0.00	10168.44	TD at 21786.90





TOTAL DIRECTIONAL SERVICES LLC
671 Academy Ct, Windsor, CO 80550
Phone: (970) 460-9402

Plan: Plan #1 (Triumph Fed Com 604H/OH)
Master/Triumph Fed Com
Created By: Dustin Ault Date: 16:12, June 11 2020
Date: _____
Approved: _____ Date: _____

Franklin Mountain Energy

Lea County, NM (NAD83)
Master/Triumph Fed Com
Triumph Fed Com 604H

OH

Plan: Plan #1

Standard Planning Report

11 June, 2020

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Project Lea County, NM (NAD83)

Map System:	US State Plane 1983	**System Datum:**	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	New Mexico Eastern Zone		

Site Master/Triumph Fed Com

Site Position:		**Northing:**	446,688.16 usft	**Latitude:**	32.224074
From:	Map	**Easting:**	850,281.87 usft	**Longitude:**	-103.334285
Position Uncertainty:	0.00 usft	**Slot Radius:**	13-3/16 "	**Grid Convergence:**	0.53 °

Well Triumph Fed Com 604H

Well Position	**+N/-S**	0.58 usft	**Northing:**	446,688.74 usft	**Latitude:**	32.224074
	+E/-W	69.99 usft	**Easting:**	850,351.86 usft	**Longitude:**	-103.334059
Position Uncertainty		0.00 usft	**Wellhead Elevation:**		**Ground Level:**	3,425.50 usft

Wellbore OH

Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	IGRF2020	6/11/2020	6.55	59.97	47,623.49144019

Design Plan #1

Audit Notes:

Version:		**Phase:**	PLAN	**Tie On Depth:**	0.00

Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)
	0.00	0.00	0.00	175.72

Plan Survey Tool Program **Date** 6/11/2020

	Depth From (usft)	Depth To (usft)	Survey (Wellbore)	Tool Name	Remarks
1	0.00	21,786.67	Plan #1 (OH)	OWSG (Rev2) MWD	
				OWSG MWD - Standard	

Plan Sections

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	TFO (°)	Target
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
3,500.00	0.00	0.00	3,500.00	0.00	0.00	0.00	0.00	0.00	0.00	
3,966.61	7.00	71.77	3,965.45	8.90	27.04	1.50	1.50	0.00	71.77	
9,245.04	7.00	71.77	9,204.55	210.10	637.96	0.00	0.00	0.00	0.00	
9,711.65	0.00	0.00	9,670.00	219.00	665.00	1.50	-1.50	0.00	180.00	
11,099.65	0.00	0.00	11,058.00	219.00	665.00	0.00	0.00	0.00	0.00	
11,992.67	89.30	179.48	11,630.92	-346.95	670.15	10.00	10.00	20.10	179.48	
21,786.90	89.30	179.48	11,750.24	-10,140.05	759.26	0.00	0.00	0.00	0.00	PBHL (Triumph Fed C

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
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Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
SHL (Triumph Fed Com 604H)									
100.00	0.00	0.00	100.00	0.00	0.00	0.00	0.00	0.00	0.00
200.00	0.00	0.00	200.00	0.00	0.00	0.00	0.00	0.00	0.00
300.00	0.00	0.00	300.00	0.00	0.00	0.00	0.00	0.00	0.00
400.00	0.00	0.00	400.00	0.00	0.00	0.00	0.00	0.00	0.00
500.00	0.00	0.00	500.00	0.00	0.00	0.00	0.00	0.00	0.00
600.00	0.00	0.00	600.00	0.00	0.00	0.00	0.00	0.00	0.00
700.00	0.00	0.00	700.00	0.00	0.00	0.00	0.00	0.00	0.00
800.00	0.00	0.00	800.00	0.00	0.00	0.00	0.00	0.00	0.00
900.00	0.00	0.00	900.00	0.00	0.00	0.00	0.00	0.00	0.00
1,000.00	0.00	0.00	1,000.00	0.00	0.00	0.00	0.00	0.00	0.00
1,100.00	0.00	0.00	1,100.00	0.00	0.00	0.00	0.00	0.00	0.00
1,200.00	0.00	0.00	1,200.00	0.00	0.00	0.00	0.00	0.00	0.00
1,300.00	0.00	0.00	1,300.00	0.00	0.00	0.00	0.00	0.00	0.00
1,400.00	0.00	0.00	1,400.00	0.00	0.00	0.00	0.00	0.00	0.00
1,500.00	0.00	0.00	1,500.00	0.00	0.00	0.00	0.00	0.00	0.00
1,600.00	0.00	0.00	1,600.00	0.00	0.00	0.00	0.00	0.00	0.00
1,700.00	0.00	0.00	1,700.00	0.00	0.00	0.00	0.00	0.00	0.00
1,800.00	0.00	0.00	1,800.00	0.00	0.00	0.00	0.00	0.00	0.00
1,900.00	0.00	0.00	1,900.00	0.00	0.00	0.00	0.00	0.00	0.00
2,000.00	0.00	0.00	2,000.00	0.00	0.00	0.00	0.00	0.00	0.00
2,100.00	0.00	0.00	2,100.00	0.00	0.00	0.00	0.00	0.00	0.00
2,200.00	0.00	0.00	2,200.00	0.00	0.00	0.00	0.00	0.00	0.00
2,300.00	0.00	0.00	2,300.00	0.00	0.00	0.00	0.00	0.00	0.00
2,400.00	0.00	0.00	2,400.00	0.00	0.00	0.00	0.00	0.00	0.00
2,500.00	0.00	0.00	2,500.00	0.00	0.00	0.00	0.00	0.00	0.00
2,600.00	0.00	0.00	2,600.00	0.00	0.00	0.00	0.00	0.00	0.00
2,700.00	0.00	0.00	2,700.00	0.00	0.00	0.00	0.00	0.00	0.00
2,800.00	0.00	0.00	2,800.00	0.00	0.00	0.00	0.00	0.00	0.00
2,900.00	0.00	0.00	2,900.00	0.00	0.00	0.00	0.00	0.00	0.00
3,000.00	0.00	0.00	3,000.00	0.00	0.00	0.00	0.00	0.00	0.00
3,100.00	0.00	0.00	3,100.00	0.00	0.00	0.00	0.00	0.00	0.00
3,200.00	0.00	0.00	3,200.00	0.00	0.00	0.00	0.00	0.00	0.00
3,300.00	0.00	0.00	3,300.00	0.00	0.00	0.00	0.00	0.00	0.00
3,400.00	0.00	0.00	3,400.00	0.00	0.00	0.00	0.00	0.00	0.00
3,500.00	0.00	0.00	3,500.00	0.00	0.00	0.00	0.00	0.00	0.00
Start Build 1.50									
3,600.00	1.50	71.77	3,599.99	0.41	1.24	-0.32	1.50	1.50	0.00
3,700.00	3.00	71.77	3,699.91	1.64	4.97	-1.26	1.50	1.50	0.00
3,800.00	4.50	71.77	3,799.69	3.68	11.18	-2.84	1.50	1.50	0.00
3,900.00	6.00	71.77	3,899.27	6.55	19.87	-5.04	1.50	1.50	0.00
3,966.61	7.00	71.77	3,965.45	8.90	27.04	-6.86	1.50	1.50	0.00
Start 5278.43 hold at 3966.61 MD									
4,000.00	7.00	71.77	3,998.59	10.18	30.90	-7.84	0.00	0.00	0.00
4,100.00	7.00	71.77	4,097.85	13.99	42.47	-10.78	0.00	0.00	0.00
4,200.00	7.00	71.77	4,197.10	17.80	54.05	-13.71	0.00	0.00	0.00
4,300.00	7.00	71.77	4,296.36	21.61	65.62	-16.65	0.00	0.00	0.00
4,400.00	7.00	71.77	4,395.61	25.42	77.20	-19.59	0.00	0.00	0.00
4,500.00	7.00	71.77	4,494.87	29.23	88.77	-22.52	0.00	0.00	0.00
4,600.00	7.00	71.77	4,594.12	33.05	100.35	-25.46	0.00	0.00	0.00
4,700.00	7.00	71.77	4,693.38	36.86	111.92	-28.40	0.00	0.00	0.00
4,800.00	7.00	71.77	4,792.63	40.67	123.49	-31.33	0.00	0.00	0.00

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
4,900.00	7.00	71.77	4,891.88	44.48	135.07	-34.27	0.00	0.00	0.00
5,000.00	7.00	71.77	4,991.14	48.29	146.64	-37.21	0.00	0.00	0.00
5,100.00	7.00	71.77	5,090.39	52.10	158.22	-40.14	0.00	0.00	0.00
5,200.00	7.00	71.77	5,189.65	55.92	169.79	-43.08	0.00	0.00	0.00
5,300.00	7.00	71.77	5,288.90	59.73	181.36	-46.02	0.00	0.00	0.00
5,400.00	7.00	71.77	5,388.16	63.54	192.94	-48.96	0.00	0.00	0.00
5,500.00	7.00	71.77	5,487.41	67.35	204.51	-51.89	0.00	0.00	0.00
5,600.00	7.00	71.77	5,586.67	71.16	216.09	-54.83	0.00	0.00	0.00
5,700.00	7.00	71.77	5,685.92	74.97	227.66	-57.77	0.00	0.00	0.00
5,800.00	7.00	71.77	5,785.18	78.79	239.23	-60.70	0.00	0.00	0.00
5,900.00	7.00	71.77	5,884.43	82.60	250.81	-63.64	0.00	0.00	0.00
6,000.00	7.00	71.77	5,983.69	86.41	262.38	-66.58	0.00	0.00	0.00
6,100.00	7.00	71.77	6,082.94	90.22	273.96	-69.51	0.00	0.00	0.00
6,200.00	7.00	71.77	6,182.20	94.03	285.53	-72.45	0.00	0.00	0.00
6,300.00	7.00	71.77	6,281.45	97.84	297.10	-75.39	0.00	0.00	0.00
6,400.00	7.00	71.77	6,380.71	101.65	308.68	-78.32	0.00	0.00	0.00
6,500.00	7.00	71.77	6,479.96	105.47	320.25	-81.26	0.00	0.00	0.00
6,600.00	7.00	71.77	6,579.22	109.28	331.83	-84.20	0.00	0.00	0.00
6,700.00	7.00	71.77	6,678.47	113.09	343.40	-87.13	0.00	0.00	0.00
6,800.00	7.00	71.77	6,777.73	116.90	354.97	-90.07	0.00	0.00	0.00
6,900.00	7.00	71.77	6,876.98	120.71	366.55	-93.01	0.00	0.00	0.00
7,000.00	7.00	71.77	6,976.24	124.52	378.12	-95.94	0.00	0.00	0.00
7,100.00	7.00	71.77	7,075.49	128.34	389.70	-98.88	0.00	0.00	0.00
7,200.00	7.00	71.77	7,174.75	132.15	401.27	-101.82	0.00	0.00	0.00
7,300.00	7.00	71.77	7,274.00	135.96	412.84	-104.75	0.00	0.00	0.00
7,400.00	7.00	71.77	7,373.25	139.77	424.42	-107.69	0.00	0.00	0.00
7,500.00	7.00	71.77	7,472.51	143.58	435.99	-110.63	0.00	0.00	0.00
7,600.00	7.00	71.77	7,571.76	147.39	447.57	-113.56	0.00	0.00	0.00
7,700.00	7.00	71.77	7,671.02	151.21	459.14	-116.50	0.00	0.00	0.00
7,800.00	7.00	71.77	7,770.27	155.02	470.71	-119.44	0.00	0.00	0.00
7,900.00	7.00	71.77	7,869.53	158.83	482.29	-122.37	0.00	0.00	0.00
8,000.00	7.00	71.77	7,968.78	162.64	493.86	-125.31	0.00	0.00	0.00
8,100.00	7.00	71.77	8,068.04	166.45	505.44	-128.25	0.00	0.00	0.00
8,200.00	7.00	71.77	8,167.29	170.26	517.01	-131.18	0.00	0.00	0.00
8,300.00	7.00	71.77	8,266.55	174.08	528.58	-134.12	0.00	0.00	0.00
8,400.00	7.00	71.77	8,365.80	177.89	540.16	-137.06	0.00	0.00	0.00
8,500.00	7.00	71.77	8,465.06	181.70	551.73	-139.99	0.00	0.00	0.00
8,600.00	7.00	71.77	8,564.31	185.51	563.31	-142.93	0.00	0.00	0.00
8,700.00	7.00	71.77	8,663.57	189.32	574.88	-145.87	0.00	0.00	0.00
8,800.00	7.00	71.77	8,762.82	193.13	586.45	-148.80	0.00	0.00	0.00
8,900.00	7.00	71.77	8,862.08	196.94	598.03	-151.74	0.00	0.00	0.00
9,000.00	7.00	71.77	8,961.33	200.76	609.60	-154.68	0.00	0.00	0.00
9,100.00	7.00	71.77	9,060.59	204.57	621.18	-157.61	0.00	0.00	0.00
9,200.00	7.00	71.77	9,159.84	208.38	632.75	-160.55	0.00	0.00	0.00
9,245.04	7.00	71.77	9,204.55	210.10	637.96	-161.87	0.00	0.00	0.00
Start Drop -1.50									
9,300.00	6.17	71.77	9,259.14	212.07	643.95	-163.39	1.50	-1.50	0.00
9,400.00	4.67	71.77	9,358.69	215.03	652.93	-165.67	1.50	-1.50	0.00
9,500.00	3.17	71.77	9,458.45	217.17	659.43	-167.32	1.50	-1.50	0.00
9,600.00	1.67	71.77	9,558.36	218.49	663.45	-168.34	1.50	-1.50	0.00
9,700.00	0.17	71.77	9,658.35	218.99	664.98	-168.73	1.50	-1.50	0.00
9,711.65	0.00	0.00	9,670.00	219.00	665.00	-168.73	1.50	-1.50	0.00
Start 1388.00 hold at 9711.65 MD									
9,800.00	0.00	0.00	9,758.35	219.00	665.00	-168.73	0.00	0.00	0.00

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
9,900.00	0.00	0.00	9,858.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,000.00	0.00	0.00	9,958.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,100.00	0.00	0.00	10,058.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,200.00	0.00	0.00	10,158.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,300.00	0.00	0.00	10,258.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,400.00	0.00	0.00	10,358.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,500.00	0.00	0.00	10,458.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,600.00	0.00	0.00	10,558.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,700.00	0.00	0.00	10,658.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,800.00	0.00	0.00	10,758.35	219.00	665.00	-168.73	0.00	0.00	0.00
10,900.00	0.00	0.00	10,858.35	219.00	665.00	-168.73	0.00	0.00	0.00
11,000.00	0.00	0.00	10,958.35	219.00	665.00	-168.73	0.00	0.00	0.00
11,099.65	0.00	0.00	11,058.00	219.00	665.00	-168.73	0.00	0.00	0.00
Start DLS 10.00 TFO 179.48									
11,150.00	5.03	179.48	11,108.28	216.79	665.02	-166.53	10.00	10.00	0.00
11,200.00	10.03	179.48	11,157.83	210.24	665.08	-159.99	10.00	10.00	0.00
11,250.00	15.03	179.48	11,206.63	199.39	665.18	-149.16	10.00	10.00	0.00
11,300.00	20.03	179.48	11,254.29	184.33	665.32	-134.14	10.00	10.00	0.00
11,350.00	25.03	179.48	11,300.46	165.17	665.49	-115.02	10.00	10.00	0.00
11,400.00	30.03	179.48	11,344.78	142.07	665.70	-91.97	10.00	10.00	0.00
11,450.00	35.03	179.48	11,386.92	115.19	665.94	-65.14	10.00	10.00	0.00
11,500.00	40.03	179.48	11,426.55	84.74	666.22	-34.75	10.00	10.00	0.00
11,550.00	45.03	179.48	11,463.39	50.95	666.53	-1.04	10.00	10.00	0.00
11,600.00	50.03	179.48	11,497.13	14.08	666.86	35.76	10.00	10.00	0.00
11,650.00	55.03	179.48	11,527.54	-25.60	667.23	75.34	10.00	10.00	0.00
11,700.00	60.03	179.48	11,554.37	-67.77	667.61	117.43	10.00	10.00	0.00
11,750.00	65.03	179.48	11,577.42	-112.11	668.01	161.68	10.00	10.00	0.00
11,800.00	70.03	179.48	11,596.52	-158.30	668.43	207.77	10.00	10.00	0.00
11,850.00	75.03	179.48	11,611.52	-205.98	668.87	255.35	10.00	10.00	0.00
11,900.00	80.03	179.48	11,622.31	-254.79	669.31	304.05	10.00	10.00	0.00
11,950.00	85.03	179.48	11,628.81	-304.34	669.76	353.50	10.00	10.00	0.00
11,992.67	89.30	179.48	11,630.92	-346.95	670.15	396.02	10.00	10.00	0.00
Start 9794.23 hold at 11992.67 MD - LP (Triumph Fed Com 604H)									
12,000.00	89.30	179.48	11,631.00	-354.28	670.22	403.33	0.01	0.01	0.00
12,100.00	89.30	179.48	11,632.22	-454.27	671.13	503.11	0.00	0.00	0.00
12,200.00	89.30	179.48	11,633.44	-554.26	672.04	602.89	0.00	0.00	0.00
12,300.00	89.30	179.48	11,634.66	-654.24	672.95	702.67	0.00	0.00	0.00
12,400.00	89.30	179.48	11,635.88	-754.23	673.86	802.44	0.00	0.00	0.00
12,500.00	89.30	179.48	11,637.10	-854.22	674.77	902.22	0.00	0.00	0.00
12,600.00	89.30	179.48	11,638.31	-954.21	675.68	1,002.00	0.00	0.00	0.00
12,700.00	89.30	179.48	11,639.53	-1,054.20	676.59	1,101.77	0.00	0.00	0.00
12,800.00	89.30	179.48	11,640.75	-1,154.19	677.50	1,201.55	0.00	0.00	0.00
12,900.00	89.30	179.48	11,641.97	-1,254.18	678.40	1,301.33	0.00	0.00	0.00
13,000.00	89.30	179.48	11,643.19	-1,354.16	679.31	1,401.11	0.00	0.00	0.00
13,100.00	89.30	179.48	11,644.41	-1,454.15	680.22	1,500.88	0.00	0.00	0.00
13,200.00	89.30	179.48	11,645.62	-1,554.14	681.13	1,600.66	0.00	0.00	0.00
13,300.00	89.30	179.48	11,646.84	-1,654.13	682.04	1,700.44	0.00	0.00	0.00
13,400.00	89.30	179.48	11,648.06	-1,754.12	682.95	1,800.22	0.00	0.00	0.00
13,500.00	89.30	179.48	11,649.28	-1,854.11	683.86	1,899.99	0.00	0.00	0.00
13,600.00	89.30	179.48	11,650.50	-1,954.09	684.77	1,999.77	0.00	0.00	0.00
13,700.00	89.30	179.48	11,651.72	-2,054.08	685.68	2,099.55	0.00	0.00	0.00
13,800.00	89.30	179.48	11,652.93	-2,154.07	686.59	2,199.32	0.00	0.00	0.00
13,900.00	89.30	179.48	11,654.15	-2,254.06	687.50	2,299.10	0.00	0.00	0.00
14,000.00	89.30	179.48	11,655.37	-2,354.05	688.41	2,398.88	0.00	0.00	0.00

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
14,100.00	89.30	179.48	11,656.59	-2,454.04	689.32	2,498.66	0.00	0.00	0.00
14,200.00	89.30	179.48	11,657.81	-2,554.02	690.23	2,598.43	0.00	0.00	0.00
14,300.00	89.30	179.48	11,659.03	-2,654.01	691.14	2,698.21	0.00	0.00	0.00
14,400.00	89.30	179.48	11,660.24	-2,754.00	692.05	2,797.99	0.00	0.00	0.00
14,500.00	89.30	179.48	11,661.46	-2,853.99	692.96	2,897.77	0.00	0.00	0.00
14,600.00	89.30	179.48	11,662.68	-2,953.98	693.87	2,997.54	0.00	0.00	0.00
14,700.00	89.30	179.48	11,663.90	-3,053.97	694.78	3,097.32	0.00	0.00	0.00
14,800.00	89.30	179.48	11,665.12	-3,153.96	695.69	3,197.10	0.00	0.00	0.00
14,900.00	89.30	179.48	11,666.34	-3,253.94	696.60	3,296.87	0.00	0.00	0.00
15,000.00	89.30	179.48	11,667.55	-3,353.93	697.51	3,396.65	0.00	0.00	0.00
15,100.00	89.30	179.48	11,668.77	-3,453.92	698.42	3,496.43	0.00	0.00	0.00
15,200.00	89.30	179.48	11,669.99	-3,553.91	699.33	3,596.21	0.00	0.00	0.00
15,300.00	89.30	179.48	11,671.21	-3,653.90	700.24	3,695.98	0.00	0.00	0.00
15,400.00	89.30	179.48	11,672.43	-3,753.89	701.15	3,795.76	0.00	0.00	0.00
15,500.00	89.30	179.48	11,673.65	-3,853.87	702.06	3,895.54	0.00	0.00	0.00
15,600.00	89.30	179.48	11,674.86	-3,953.86	702.97	3,995.32	0.00	0.00	0.00
15,700.00	89.30	179.48	11,676.08	-4,053.85	703.88	4,095.09	0.00	0.00	0.00
15,800.00	89.30	179.48	11,677.30	-4,153.84	704.79	4,194.87	0.00	0.00	0.00
15,900.00	89.30	179.48	11,678.52	-4,253.83	705.70	4,294.65	0.00	0.00	0.00
16,000.00	89.30	179.48	11,679.74	-4,353.82	706.61	4,394.42	0.00	0.00	0.00
16,100.00	89.30	179.48	11,680.96	-4,453.81	707.52	4,494.20	0.00	0.00	0.00
16,200.00	89.30	179.48	11,682.17	-4,553.79	708.43	4,593.98	0.00	0.00	0.00
16,300.00	89.30	179.48	11,683.39	-4,653.78	709.34	4,693.76	0.00	0.00	0.00
16,400.00	89.30	179.48	11,684.61	-4,753.77	710.25	4,793.53	0.00	0.00	0.00
16,500.00	89.30	179.48	11,685.83	-4,853.76	711.16	4,893.31	0.00	0.00	0.00
16,600.00	89.30	179.48	11,687.05	-4,953.75	712.07	4,993.09	0.00	0.00	0.00
16,700.00	89.30	179.48	11,688.27	-5,053.74	712.98	5,092.86	0.00	0.00	0.00
16,800.00	89.30	179.48	11,689.48	-5,153.72	713.89	5,192.64	0.00	0.00	0.00
16,900.00	89.30	179.48	11,690.70	-5,253.71	714.80	5,292.42	0.00	0.00	0.00
17,000.00	89.30	179.48	11,691.92	-5,353.70	715.71	5,392.20	0.00	0.00	0.00
17,100.00	89.30	179.48	11,693.14	-5,453.69	716.62	5,491.97	0.00	0.00	0.00
17,200.00	89.30	179.48	11,694.36	-5,553.68	717.53	5,591.75	0.00	0.00	0.00
17,300.00	89.30	179.48	11,695.58	-5,653.67	718.44	5,691.53	0.00	0.00	0.00
17,400.00	89.30	179.48	11,696.79	-5,753.65	719.35	5,791.31	0.00	0.00	0.00
17,500.00	89.30	179.48	11,698.01	-5,853.64	720.26	5,891.08	0.00	0.00	0.00
17,600.00	89.30	179.48	11,699.23	-5,953.63	721.17	5,990.86	0.00	0.00	0.00
17,700.00	89.30	179.48	11,700.45	-6,053.62	722.08	6,090.64	0.00	0.00	0.00
17,800.00	89.30	179.48	11,701.67	-6,153.61	722.99	6,190.41	0.00	0.00	0.00
17,900.00	89.30	179.48	11,702.89	-6,253.60	723.90	6,290.19	0.00	0.00	0.00
18,000.00	89.30	179.48	11,704.10	-6,353.59	724.81	6,389.97	0.00	0.00	0.00
18,100.00	89.30	179.48	11,705.32	-6,453.57	725.72	6,489.75	0.00	0.00	0.00
18,200.00	89.30	179.48	11,706.54	-6,553.56	726.63	6,589.52	0.00	0.00	0.00
18,300.00	89.30	179.48	11,707.76	-6,653.55	727.54	6,689.30	0.00	0.00	0.00
18,400.00	89.30	179.48	11,708.98	-6,753.54	728.45	6,789.08	0.00	0.00	0.00
18,500.00	89.30	179.48	11,710.20	-6,853.53	729.35	6,888.86	0.00	0.00	0.00
18,600.00	89.30	179.48	11,711.41	-6,953.52	730.26	6,988.63	0.00	0.00	0.00
18,700.00	89.30	179.48	11,712.63	-7,053.50	731.17	7,088.41	0.00	0.00	0.00
18,800.00	89.30	179.48	11,713.85	-7,153.49	732.08	7,188.19	0.00	0.00	0.00
18,900.00	89.30	179.48	11,715.07	-7,253.48	732.99	7,287.96	0.00	0.00	0.00
19,000.00	89.30	179.48	11,716.29	-7,353.47	733.90	7,387.74	0.00	0.00	0.00
19,100.00	89.30	179.48	11,717.51	-7,453.46	734.81	7,487.52	0.00	0.00	0.00
19,200.00	89.30	179.48	11,718.72	-7,553.45	735.72	7,587.30	0.00	0.00	0.00
19,300.00	89.30	179.48	11,719.94	-7,653.44	736.63	7,687.07	0.00	0.00	0.00
19,400.00	89.30	179.48	11,721.16	-7,753.42	737.54	7,786.85	0.00	0.00	0.00

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

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total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Planned Survey

Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)
19,500.00	89.30	179.48	11,722.38	-7,853.41	738.45	7,886.63	0.00	0.00	0.00
19,600.00	89.30	179.48	11,723.60	-7,953.40	739.36	7,986.41	0.00	0.00	0.00
19,700.00	89.30	179.48	11,724.82	-8,053.39	740.27	8,086.18	0.00	0.00	0.00
19,800.00	89.30	179.48	11,726.03	-8,153.38	741.18	8,185.96	0.00	0.00	0.00
19,900.00	89.30	179.48	11,727.25	-8,253.37	742.09	8,285.74	0.00	0.00	0.00
20,000.00	89.30	179.48	11,728.47	-8,353.35	743.00	8,385.51	0.00	0.00	0.00
20,100.00	89.30	179.48	11,729.69	-8,453.34	743.91	8,485.29	0.00	0.00	0.00
20,200.00	89.30	179.48	11,730.91	-8,553.33	744.82	8,585.07	0.00	0.00	0.00
20,300.00	89.30	179.48	11,732.13	-8,653.32	745.73	8,684.85	0.00	0.00	0.00
20,400.00	89.30	179.48	11,733.34	-8,753.31	746.64	8,784.62	0.00	0.00	0.00
20,500.00	89.30	179.48	11,734.56	-8,853.30	747.55	8,884.40	0.00	0.00	0.00
20,600.00	89.30	179.48	11,735.78	-8,953.29	748.46	8,984.18	0.00	0.00	0.00
20,700.00	89.30	179.48	11,737.00	-9,053.27	749.37	9,083.95	0.00	0.00	0.00
20,800.00	89.30	179.48	11,738.22	-9,153.26	750.28	9,183.73	0.00	0.00	0.00
20,900.00	89.30	179.48	11,739.43	-9,253.25	751.19	9,283.51	0.00	0.00	0.00
21,000.00	89.30	179.48	11,740.65	-9,353.24	752.10	9,383.29	0.00	0.00	0.00
21,100.00	89.30	179.48	11,741.87	-9,453.23	753.01	9,483.06	0.00	0.00	0.00
21,200.00	89.30	179.48	11,743.09	-9,553.22	753.92	9,582.84	0.00	0.00	0.00
21,300.00	89.30	179.48	11,744.31	-9,653.20	754.83	9,682.62	0.00	0.00	0.00
21,400.00	89.30	179.48	11,745.53	-9,753.19	755.74	9,782.40	0.00	0.00	0.00
21,500.00	89.30	179.48	11,746.74	-9,853.18	756.65	9,882.17	0.00	0.00	0.00
21,600.00	89.30	179.48	11,747.96	-9,953.17	757.56	9,981.95	0.00	0.00	0.00
21,700.00	89.30	179.48	11,749.18	-10,053.16	758.47	10,081.73	0.00	0.00	0.00
21,786.90	89.30	179.48	11,750.24	-10,140.05	759.26	10,168.44	0.00	0.00	0.00

TD at 21786.90 - PBHL (Triumph Fed Com 604H)

Design Targets

Target Name - hit/miss target - Shape	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
SHL (Triumph Fed Com - plan hits target center - Point	0.00	0.00	0.00	0.00	0.00	446,688.74	850,351.86	32.224074	-103.334059
LP (Triumph Fed Com 6 - plan hits target center - Point	0.00	0.00	11,630.92	-346.95	670.15	446,341.79	851,022.01	32.223103	-103.331902
PBHL (Triumph Fed Cor - plan hits target center - Point	0.00	0.00	11,750.24	-10,140.05	759.26	436,548.69	851,111.12	32.196184	-103.331909

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Planning Report

total

Database:	EDM 5000.15 Single User Db	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Company:	Franklin Mountain Energy	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Project:	Lea County, NM (NAD83)	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site:	Master/Triumph Fed Com	**North Reference:**	Grid
Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Wellbore:	OH		
Design:	Plan #1		

Plan Annotations

Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates +N/-S (usft)	Local Coordinates +E/-W (usft)	Comment
3,500.00	3,500.00	0.00	0.00	Start Build 1.50
3,966.61	3,965.45	8.90	27.04	Start 5278.43 hold at 3966.61 MD
9,245.04	9,204.55	210.10	637.96	Start Drop -1.50
9,711.65	9,670.00	219.00	665.00	Start 1388.00 hold at 9711.65 MD
11,099.65	11,058.00	219.00	665.00	Start DLS 10.00 TFO 179.48
11,992.67	11,630.92	-346.95	670.15	Start 9794.23 hold at 11992.67 MD
21,786.90	11,750.24	-10,140.05	759.26	TD at 21786.90

FRANKLIN MOUNTAIN ENERGY

Franklin Mountain Energy

Lea County, NM (NAD83)
Master/Triumph Fed Com
Triumph Fed Com 604H

OH
Plan #1

Anticollision Report

11 June, 2020

total

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Reference Plan #1

Filter type:	NO GLOBAL FILTER: Using user defined selection & filtering criteria		
Interpolation Method:	Stations	**Error Model:**	ISCWSA
Depth Range:	Unlimited	**Scan Method:**	Closest Approach 3D
Results Limited by:	Maximum ellipse separation of 1,000.00 usft	**Error Surface:**	Combined Separation
Warning Levels Evaluated at:	2.00 **Sigma**	**Casing Method:**	Not applied

Survey Tool Program **Date** 6/11/2020

From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
0.00	21,786.67	Plan #1 (OH)	OWSG (Rev2) MWD	OWSG MWD - Standard

Summary

Site Name Offset Well - Wellbore - Design	Reference Measured Depth (usft)	Offset Measured Depth (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Separation Factor	Warning
Master/Triumph Fed Com						
Master Fed Com 603H - OH - Plan #1	3,116.09	3,117.79	69.99	54.52	4.524	CC
Master Fed Com 603H - OH - Plan #1	3,200.00	3,201.68	69.99	54.10	4.403	ES
Master Fed Com 603H - OH - Plan #1	21,786.90	21,818.47	1,040.02	795.20	4.248	SF
Triumph Fed Com 705H - OH - Plan #1	3,501.01	3,501.92	35.00	17.58	2.009	CC, ES
Triumph Fed Com 705H - OH - Plan #1	3,600.00	3,601.35	35.59	17.67	1.986	SF
Triumph Fed Com 706H - OH - Plan #1	3,200.00	3,199.20	34.99	19.10	2.202	CC, ES
Triumph Fed Com 706H - OH - Plan #1	21,786.90	21,930.33	324.97	110.88	1.518	SF
Prevail/Master Fed Com						
Master Fed Com 704H - OH - Plan #1	3,962.84	4,113.37	1,405.52	1,385.57	70.457	CC
Master Fed Com 704H - OH - Plan #1	21,786.90	21,965.76	1,515.76	1,272.17	6.223	ES, SF

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Survey Program: 0-OWSG (Rev2) MWD

Offset Site Error: 0.00 usft

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
0.00	0.00	1.70	1.70	0.00	0.00	-90.47	-0.58	-69.99	69.99				
100.00	100.00	101.70	101.70	0.13	0.13	-90.47	-0.58	-69.99	69.99	69.81	0.18	385.008	
200.00	200.00	201.70	201.70	0.48	0.49	-90.47	-0.58	-69.99	69.99	69.30	0.69	101.628	
300.00	300.00	301.70	301.70	0.84	0.85	-90.47	-0.58	-69.99	69.99	68.80	1.20	58.539	
400.00	400.00	401.70	401.70	1.20	1.21	-90.47	-0.58	-69.99	69.99	68.29	1.70	41.109	
500.00	500.00	501.70	501.70	1.56	1.57	-90.47	-0.58	-69.99	69.99	67.78	2.21	31.677	
600.00	600.00	601.70	601.70	1.92	1.92	-90.47	-0.58	-69.99	69.99	67.28	2.72	25.765	
700.00	700.00	701.70	701.70	2.28	2.28	-90.47	-0.58	-69.99	69.99	66.77	3.22	21.713	
800.00	800.00	801.70	801.70	2.63	2.64	-90.47	-0.58	-69.99	69.99	66.26	3.73	18.763	
900.00	900.00	901.70	901.70	2.99	3.00	-90.47	-0.58	-69.99	69.99	65.76	4.24	16.518	
1,000.00	1,000.00	1,001.70	1,001.70	3.35	3.36	-90.47	-0.58	-69.99	69.99	65.25	4.74	14.753	
1,100.00	1,100.00	1,101.70	1,101.70	3.71	3.72	-90.47	-0.58	-69.99	69.99	64.74	5.25	13.329	
1,200.00	1,200.00	1,201.70	1,201.70	4.07	4.07	-90.47	-0.58	-69.99	69.99	64.23	5.76	12.155	
1,300.00	1,300.00	1,301.70	1,301.70	4.43	4.43	-90.47	-0.58	-69.99	69.99	63.73	6.27	11.172	
1,400.00	1,400.00	1,401.70	1,401.70	4.79	4.79	-90.47	-0.58	-69.99	69.99	63.22	6.77	10.335	
1,500.00	1,500.00	1,501.70	1,501.70	5.14	5.15	-90.47	-0.58	-69.99	69.99	62.71	7.28	9.616	
1,600.00	1,600.00	1,601.70	1,601.70	5.50	5.51	-90.47	-0.58	-69.99	69.99	62.21	7.79	8.989	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
1,700.00	1,700.00	1,701.70	1,701.70	5.86	5.87	-90.47	-0.58	-69.99	69.99	61.70	8.29	8.440	
1,800.00	1,800.00	1,801.70	1,801.70	6.22	6.23	-90.47	-0.58	-69.99	69.99	61.19	8.80	7.954	
1,900.00	1,900.00	1,901.70	1,901.70	6.58	6.58	-90.47	-0.58	-69.99	69.99	60.69	9.31	7.520	
2,000.00	2,000.00	2,001.70	2,001.70	6.94	6.94	-90.47	-0.58	-69.99	69.99	60.18	9.81	7.132	
2,100.00	2,100.00	2,101.70	2,101.70	7.29	7.30	-90.47	-0.58	-69.99	69.99	59.67	10.32	6.782	
2,200.00	2,200.00	2,201.70	2,201.70	7.65	7.66	-90.47	-0.58	-69.99	69.99	59.16	10.83	6.464	
2,300.00	2,300.00	2,301.70	2,301.70	8.01	8.02	-90.47	-0.58	-69.99	69.99	58.66	11.33	6.175	
2,400.00	2,400.00	2,401.70	2,401.70	8.37	8.38	-90.47	-0.58	-69.99	69.99	58.15	11.84	5.911	
2,500.00	2,500.00	2,501.70	2,501.70	8.73	8.73	-90.47	-0.58	-69.99	69.99	57.64	12.35	5.668	
2,600.00	2,600.00	2,601.70	2,601.70	9.09	9.09	-90.47	-0.58	-69.99	69.99	57.14	12.86	5.444	
2,700.00	2,700.00	2,701.70	2,701.70	9.45	9.45	-90.47	-0.58	-69.99	69.99	56.63	13.36	5.238	
2,800.00	2,800.00	2,801.70	2,801.70	9.80	9.81	-90.47	-0.58	-69.99	69.99	56.12	13.87	5.046	
2,900.00	2,900.00	2,901.70	2,901.70	10.16	10.17	-90.47	-0.58	-69.99	69.99	55.62	14.38	4.869	
3,000.00	3,000.00	3,001.70	3,001.70	10.52	10.53	-90.47	-0.58	-69.99	69.99	55.11	14.88	4.703	
3,100.00	3,100.00	3,101.70	3,101.70	10.88	10.89	-90.47	-0.58	-69.99	69.99	54.60	15.39	4.548	
3,116.09	3,116.09	3,117.79	3,117.79	10.94	10.94	-90.47	-0.58	-69.99	69.99	54.52	15.47	4.524	CC
3,200.00	3,200.00	3,201.68	3,201.68	11.24	11.24	-90.47	-0.58	-69.99	69.99	54.10	15.90	4.403	ES
3,300.00	3,300.00	3,300.00	3,299.99	11.60	11.59	-89.85	0.19	-71.05	71.07	54.68	16.39	4.336	
3,400.00	3,400.00	3,398.58	3,398.49	11.96	11.94	-88.12	2.44	-74.18	74.29	57.41	16.88	4.401	
3,500.00	3,500.00	3,496.71	3,496.41	12.31	12.29	-85.57	6.15	-79.34	79.75	62.40	17.35	4.596	
3,600.00	3,599.99	3,594.35	3,593.65	12.67	12.63	-154.62	11.31	-86.49	88.77	70.96	17.81	4.984	
3,700.00	3,699.91	3,693.37	3,692.13	13.01	12.99	-152.67	17.36	-94.89	101.53	83.24	18.30	5.549	
3,800.00	3,799.69	3,792.20	3,790.42	13.36	13.34	-151.73	23.39	-103.27	116.66	97.87	18.79	6.209	
3,900.00	3,899.27	3,890.67	3,888.35	13.71	13.70	-151.51	29.41	-111.62	134.06	114.79	19.28	6.955	
3,966.61	3,965.45	3,956.03	3,953.35	13.95	13.93	-151.64	33.40	-117.16	146.92	127.31	19.60	7.495	
4,000.00	3,998.59	3,988.74	3,985.88	14.07	14.05	-151.79	35.40	-119.94	153.61	133.85	19.77	7.771	
4,100.00	4,097.85	4,086.70	4,083.30	14.42	14.41	-152.17	41.39	-128.25	173.67	153.41	20.26	8.574	
4,200.00	4,197.10	4,184.66	4,180.73	14.78	14.77	-152.47	47.37	-136.56	193.73	172.98	20.75	9.338	
4,300.00	4,296.36	4,282.62	4,278.15	15.15	15.13	-152.72	53.36	-144.87	213.80	192.56	21.24	10.067	
4,400.00	4,395.61	4,380.59	4,375.58	15.51	15.49	-152.93	59.35	-153.17	233.87	212.14	21.73	10.762	
4,500.00	4,494.87	4,478.55	4,473.01	15.88	15.85	-153.10	65.33	-161.48	253.94	231.71	22.23	11.426	
4,600.00	4,594.12	4,576.51	4,570.43	16.24	16.21	-153.24	71.32	-169.79	274.01	251.29	22.72	12.060	
4,700.00	4,693.38	4,674.47	4,667.86	16.61	16.58	-153.37	77.30	-178.10	294.09	270.87	23.22	12.668	
4,800.00	4,792.63	4,772.44	4,765.28	16.98	16.94	-153.48	83.29	-186.41	314.16	290.45	23.71	13.249	
4,900.00	4,891.88	4,870.40	4,862.71	17.36	17.31	-153.58	89.27	-194.72	334.24	310.03	24.21	13.806	
5,000.00	4,991.14	4,968.36	4,960.13	17.73	17.67	-153.66	95.26	-203.03	354.32	329.61	24.71	14.340	
5,100.00	5,090.39	5,066.32	5,057.56	18.11	18.04	-153.74	101.24	-211.33	374.40	349.19	25.21	14.853	
5,200.00	5,189.65	5,164.29	5,154.98	18.48	18.41	-153.81	107.23	-219.64	394.48	368.77	25.71	15.345	
5,300.00	5,288.90	5,262.25	5,252.41	18.86	18.78	-153.87	113.22	-227.95	414.56	388.35	26.21	15.818	
5,400.00	5,388.16	5,360.21	5,349.84	19.24	19.15	-153.93	119.20	-236.26	434.64	407.93	26.71	16.273	
5,500.00	5,487.41	5,458.17	5,447.26	19.62	19.52	-153.98	125.19	-244.57	454.72	427.51	27.21	16.710	
5,600.00	5,586.67	5,556.13	5,544.69	20.00	19.89	-154.03	131.17	-252.88	474.80	447.09	27.71	17.132	
5,700.00	5,685.92	5,654.10	5,642.11	20.39	20.26	-154.07	137.16	-261.19	494.88	466.66	28.22	17.538	
5,800.00	5,785.18	5,752.06	5,739.54	20.77	20.63	-154.11	143.14	-269.50	514.96	486.24	28.72	17.930	
5,900.00	5,884.43	5,850.02	5,836.96	21.15	21.01	-154.15	149.13	-277.80	535.05	505.82	29.23	18.307	
6,000.00	5,983.69	5,947.98	5,934.39	21.54	21.38	-154.18	155.11	-286.11	555.13	525.40	29.73	18.672	
6,100.00	6,082.94	6,045.95	6,031.81	21.93	21.75	-154.22	161.10	-294.42	575.21	544.97	30.24	19.024	
6,200.00	6,182.20	6,143.91	6,129.24	22.31	22.13	-154.25	167.08	-302.73	595.29	564.55	30.74	19.364	
6,300.00	6,281.45	6,241.87	6,226.67	22.70	22.50	-154.27	173.07	-311.04	615.38	584.13	31.25	19.693	
6,400.00	6,380.71	6,339.83	6,324.09	23.09	22.87	-154.30	179.06	-319.35	635.46	603.70	31.75	20.012	
6,500.00	6,479.96	6,437.79	6,421.52	23.48	23.25	-154.32	185.04	-327.66	655.54	623.28	32.26	20.320	
6,600.00	6,579.22	6,535.76	6,518.94	23.87	23.62	-154.35	191.03	-335.97	675.62	642.86	32.77	20.618	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
6,700.00	6,678.47	6,633.72	6,616.37	24.26	24.00	-154.37	197.01	-344.27	695.71	662.43	33.28	20.907	
6,800.00	6,777.73	6,731.68	6,713.79	24.65	24.38	-154.39	203.00	-352.58	715.79	682.01	33.78	21.187	
6,900.00	6,876.98	6,838.94	6,820.51	25.04	24.79	-154.43	209.32	-361.36	735.58	701.24	34.35	21.415	
7,000.00	6,976.24	6,957.66	6,938.89	25.43	25.23	-154.58	214.50	-368.56	753.09	718.13	34.96	21.539	
7,100.00	7,075.49	7,077.37	7,058.48	25.82	25.66	-154.86	217.55	-372.78	767.91	732.35	35.56	21.598	
7,200.00	7,174.75	7,195.35	7,176.45	26.21	26.08	-155.26	218.42	-373.99	780.05	743.93	36.12	21.597	
7,300.00	7,274.00	7,294.60	7,275.70	26.60	26.42	-155.63	218.42	-373.99	791.14	754.52	36.62	21.602	
7,400.00	7,373.25	7,393.86	7,374.95	27.00	26.77	-155.99	218.42	-373.99	802.27	765.14	37.13	21.608	
7,500.00	7,472.51	7,493.11	7,474.21	27.39	27.11	-156.34	218.42	-373.99	813.43	775.80	37.63	21.615	
7,600.00	7,571.76	7,592.37	7,573.46	27.79	27.46	-156.68	218.42	-373.99	824.62	786.48	38.14	21.622	
7,700.00	7,671.02	7,691.62	7,672.72	28.18	27.80	-157.01	218.42	-373.99	835.84	797.19	38.64	21.630	
7,800.00	7,770.27	7,790.88	7,771.97	28.57	28.15	-157.33	218.42	-373.99	847.08	807.93	39.15	21.638	
7,900.00	7,869.53	7,890.13	7,871.23	28.97	28.50	-157.64	218.42	-373.99	858.35	818.70	39.65	21.646	
8,000.00	7,968.78	7,989.39	7,970.48	29.36	28.84	-157.95	218.42	-373.99	869.64	829.48	40.16	21.655	
8,100.00	8,068.04	8,088.64	8,069.74	29.76	29.19	-158.24	218.42	-373.99	880.96	840.30	40.66	21.664	
8,200.00	8,167.29	8,187.90	8,168.99	30.16	29.54	-158.53	218.42	-373.99	892.30	851.13	41.17	21.674	
8,300.00	8,266.55	8,287.15	8,268.25	30.55	29.88	-158.82	218.42	-373.99	903.66	861.99	41.68	21.683	
8,400.00	8,365.80	8,386.41	8,367.50	30.95	30.23	-159.09	218.42	-373.99	915.05	872.86	42.18	21.693	
8,500.00	8,465.06	8,485.66	8,466.76	31.34	30.58	-159.36	218.42	-373.99	926.45	883.76	42.69	21.703	
8,600.00	8,564.31	8,584.92	8,566.01	31.74	30.93	-159.62	218.42	-373.99	937.87	894.68	43.19	21.714	
8,700.00	8,663.57	8,684.17	8,665.27	32.14	31.27	-159.88	218.42	-373.99	949.32	905.62	43.70	21.724	
8,800.00	8,762.82	8,783.43	8,764.52	32.54	31.62	-160.13	218.42	-373.99	960.78	916.57	44.21	21.734	
8,900.00	8,862.08	8,882.68	8,863.78	32.93	31.97	-160.37	218.42	-373.99	972.26	927.54	44.71	21.745	
9,000.00	8,961.33	8,981.94	8,963.03	33.33	32.32	-160.61	218.42	-373.99	983.75	938.53	45.22	21.756	
9,100.00	9,060.59	9,081.19	9,062.29	33.73	32.67	-160.84	218.42	-373.99	995.26	949.54	45.72	21.767	
9,200.00	9,159.84	9,180.45	9,161.54	34.13	33.02	-161.07	218.42	-373.99	1,006.79	960.56	46.23	21.778	
9,245.04	9,204.55	9,225.15	9,206.25	34.31	33.17	-161.17	218.42	-373.99	1,011.99	965.53	46.46	21.783	
9,300.00	9,259.14	9,279.75	9,260.84	34.52	33.37	-161.31	218.42	-373.99	1,017.96	971.22	46.74	21.781	
9,400.00	9,358.69	9,379.30	9,360.39	34.91	33.72	-161.53	218.42	-373.99	1,026.93	979.68	47.24	21.737	
9,500.00	9,458.45	9,479.06	9,460.15	35.28	34.07	-161.68	218.42	-373.99	1,033.42	985.68	47.75	21.644	
9,600.00	9,558.36	9,578.97	9,560.06	35.64	34.42	-161.77	218.42	-373.99	1,037.44	989.19	48.25	21.502	
9,700.00	9,658.35	9,678.95	9,660.05	35.98	34.77	-161.80	218.42	-373.99	1,038.97	990.23	48.75	21.313	
9,711.65	9,670.00	9,690.60	9,671.70	36.02	34.81	-90.03	218.42	-373.99	1,038.99	990.18	48.81	21.288	
9,800.00	9,758.35	9,778.95	9,760.05	36.32	35.12	-90.03	218.42	-373.99	1,038.99	989.75	49.24	21.099	
9,900.00	9,858.35	9,878.95	9,860.05	36.66	35.47	-90.03	218.42	-373.99	1,038.99	989.25	49.74	20.888	
10,000.00	9,958.35	9,978.95	9,960.05	37.00	35.83	-90.03	218.42	-373.99	1,038.99	988.75	50.24	20.681	
10,100.00	10,058.35	10,078.95	10,060.05	37.33	36.18	-90.03	218.42	-373.99	1,038.99	988.26	50.73	20.479	
10,200.00	10,158.35	10,178.95	10,160.05	37.67	36.53	-90.03	218.42	-373.99	1,038.99	987.76	51.23	20.280	
10,300.00	10,258.35	10,278.95	10,260.05	38.01	36.89	-90.03	218.42	-373.99	1,038.99	987.26	51.73	20.085	
10,400.00	10,358.35	10,378.95	10,360.05	38.35	37.24	-90.03	218.42	-373.99	1,038.99	986.76	52.23	19.894	
10,500.00	10,458.35	10,478.95	10,460.05	38.69	37.59	-90.03	218.42	-373.99	1,038.99	986.27	52.72	19.706	
10,600.00	10,558.35	10,578.95	10,560.05	39.03	37.94	-90.03	218.42	-373.99	1,038.99	985.77	53.22	19.522	
10,700.00	10,658.35	10,678.95	10,660.05	39.37	38.30	-90.03	218.42	-373.99	1,038.99	985.27	53.72	19.341	
10,800.00	10,758.35	10,778.95	10,760.05	39.71	38.65	-90.03	218.42	-373.99	1,038.99	984.77	54.22	19.163	
10,900.00	10,858.35	10,878.95	10,860.05	40.05	39.00	-90.03	218.42	-373.99	1,038.99	984.27	54.72	18.989	
11,000.00	10,958.35	10,978.95	10,960.05	40.39	39.36	-90.03	218.42	-373.99	1,038.99	983.78	55.22	18.817	
11,099.65	11,058.00	11,078.60	11,059.70	40.73	39.71	-90.03	218.42	-373.99	1,038.99	983.28	55.71	18.649	
11,150.00	11,108.28	11,129.00	11,110.10	40.89	39.89	90.61	218.39	-373.99	1,039.01	983.05	55.96	18.568	
11,200.00	11,157.83	11,180.01	11,161.01	41.04	40.05	90.82	215.58	-373.96	1,039.06	982.88	56.18	18.494	
11,250.00	11,206.63	11,231.38	11,211.82	41.19	40.21	91.02	208.18	-373.90	1,039.12	982.72	56.40	18.425	
11,300.00	11,254.29	11,283.09	11,262.11	41.32	40.35	91.22	196.17	-373.79	1,039.19	982.59	56.60	18.359	
11,350.00	11,300.46	11,335.14	11,311.42	41.45	40.49	91.41	179.56	-373.64	1,039.27	982.47	56.80	18.298	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
11,400.00	11,344.78	11,387.53	11,359.31	41.56	40.62	91.58	158.39	-373.44	1,039.35	982.37	56.98	18.240	
11,450.00	11,386.92	11,440.23	11,405.35	41.66	40.74	91.75	132.78	-373.21	1,039.44	982.28	57.16	18.185	
11,500.00	11,426.55	11,493.22	11,449.07	41.75	40.85	91.90	102.86	-372.94	1,039.53	982.20	57.33	18.134	
11,550.00	11,463.39	11,546.49	11,490.04	41.83	40.94	92.04	68.85	-372.63	1,039.61	982.12	57.49	18.084	
11,600.00	11,497.13	11,600.01	11,527.85	41.90	41.02	92.16	31.00	-372.28	1,039.69	982.04	57.65	18.036	
11,650.00	11,527.54	11,653.74	11,562.09	41.97	41.08	92.26	-10.38	-371.91	1,039.76	981.96	57.80	17.988	
11,700.00	11,554.37	11,707.66	11,592.40	42.02	41.14	92.35	-54.95	-371.50	1,039.82	981.86	57.96	17.940	
11,750.00	11,577.42	11,761.72	11,618.45	42.08	41.18	92.41	-102.30	-371.07	1,039.87	981.75	58.12	17.892	
11,800.00	11,596.52	11,815.90	11,639.97	42.13	41.27	92.46	-151.99	-370.62	1,039.91	981.62	58.28	17.842	
11,850.00	11,611.52	11,870.15	11,656.72	42.20	41.40	92.48	-203.57	-370.15	1,039.93	981.47	58.45	17.791	
11,900.00	11,622.31	11,924.43	11,668.52	42.28	41.53	92.49	-256.52	-369.66	1,039.93	981.30	58.63	17.738	
11,950.00	11,628.81	11,978.69	11,675.25	42.37	41.67	92.47	-310.35	-369.17	1,039.92	981.11	58.81	17.683	
11,992.52	11,630.91	12,024.09	11,677.02	42.46	41.80	92.45	-355.70	-368.76	1,039.90	980.93	58.97	17.636	
11,992.67	11,630.92	12,024.25	11,677.02	42.46	41.80	92.45	-355.85	-368.76	1,039.90	980.93	58.97	17.636	
12,000.00	11,631.00	12,031.57	11,677.11	42.48	41.82	92.45	-363.18	-368.69	1,039.90	980.90	58.99	17.627	
12,100.00	11,632.22	12,131.57	11,678.38	42.75	42.13	92.45	-463.17	-367.78	1,039.90	980.49	59.41	17.505	
12,200.00	11,633.44	12,231.57	11,679.65	43.09	42.49	92.45	-563.15	-366.87	1,039.90	979.99	59.90	17.360	
12,300.00	11,634.66	12,331.57	11,680.92	43.50	42.91	92.46	-663.14	-365.96	1,039.90	979.41	60.49	17.192	
12,400.00	11,635.88	12,431.57	11,682.19	43.97	43.39	92.46	-763.13	-365.05	1,039.90	978.74	61.16	17.004	
12,500.00	11,637.10	12,531.57	11,683.46	44.50	43.92	92.46	-863.12	-364.14	1,039.90	978.00	61.91	16.798	
12,600.00	11,638.31	12,631.57	11,684.73	45.08	44.51	92.46	-963.11	-363.23	1,039.90	977.17	62.73	16.577	
12,700.00	11,639.53	12,731.57	11,686.00	45.71	45.15	92.47	-1,063.09	-362.32	1,039.90	976.27	63.63	16.342	
12,800.00	11,640.75	12,831.57	11,687.27	46.39	45.84	92.47	-1,163.08	-361.41	1,039.90	975.30	64.61	16.095	
12,900.00	11,641.97	12,931.57	11,688.54	47.12	46.57	92.47	-1,263.07	-360.49	1,039.91	974.25	65.65	15.840	
13,000.00	11,643.19	13,031.57	11,689.81	47.90	47.36	92.48	-1,363.06	-359.58	1,039.91	973.15	66.76	15.577	
13,100.00	11,644.41	13,131.57	11,691.08	48.72	48.18	92.48	-1,463.04	-358.67	1,039.91	971.98	67.93	15.308	
13,200.00	11,645.62	13,231.57	11,692.35	49.58	49.05	92.48	-1,563.03	-357.76	1,039.91	970.75	69.16	15.036	
13,300.00	11,646.84	13,331.57	11,693.61	50.48	49.96	92.48	-1,663.02	-356.85	1,039.91	969.46	70.45	14.762	
13,400.00	11,648.06	13,431.57	11,694.88	51.42	50.91	92.49	-1,763.01	-355.94	1,039.91	968.13	71.79	14.486	
13,500.00	11,649.28	13,531.57	11,696.15	52.40	51.89	92.49	-1,863.00	-355.03	1,039.91	966.74	73.17	14.212	
13,600.00	11,650.50	13,631.57	11,697.42	53.40	52.90	92.49	-1,962.98	-354.12	1,039.91	965.30	74.61	13.938	
13,700.00	11,651.72	13,731.57	11,698.69	54.44	53.95	92.50	-2,062.97	-353.21	1,039.92	963.83	76.09	13.667	
13,800.00	11,652.93	13,831.57	11,699.96	55.51	55.02	92.50	-2,162.96	-352.30	1,039.92	962.30	77.61	13.399	
13,900.00	11,654.15	13,931.57	11,701.23	56.60	56.12	92.50	-2,262.95	-351.39	1,039.92	960.74	79.17	13.134	
14,000.00	11,655.37	14,031.57	11,702.50	57.73	57.25	92.50	-2,362.93	-350.48	1,039.92	959.14	80.77	12.874	
14,100.00	11,656.59	14,131.57	11,703.77	58.87	58.41	92.51	-2,462.92	-349.56	1,039.92	957.51	82.41	12.619	
14,200.00	11,657.81	14,231.57	11,705.04	60.04	59.59	92.51	-2,562.91	-348.65	1,039.92	955.84	84.08	12.369	
14,300.00	11,659.03	14,331.57	11,706.31	61.24	60.79	92.51	-2,662.90	-347.74	1,039.92	954.15	85.78	12.124	
14,400.00	11,660.24	14,431.57	11,707.58	62.45	62.01	92.52	-2,762.89	-346.83	1,039.92	952.42	87.50	11.884	
14,500.00	11,661.46	14,531.57	11,708.85	63.68	63.25	92.52	-2,862.87	-345.92	1,039.93	950.66	89.26	11.650	
14,600.00	11,662.68	14,631.57	11,710.12	64.94	64.51	92.52	-2,962.86	-345.01	1,039.93	948.88	91.04	11.422	
14,700.00	11,663.90	14,731.57	11,711.38	66.21	65.78	92.52	-3,062.85	-344.10	1,039.93	947.08	92.85	11.200	
14,800.00	11,665.12	14,831.57	11,712.65	67.49	67.08	92.53	-3,162.84	-343.19	1,039.93	945.25	94.68	10.984	
14,900.00	11,666.34	14,931.57	11,713.92	68.79	68.38	92.53	-3,262.82	-342.28	1,039.93	943.40	96.53	10.773	
15,000.00	11,667.55	15,031.57	11,715.19	70.11	69.71	92.53	-3,362.81	-341.37	1,039.93	941.53	98.40	10.568	
15,100.00	11,668.77	15,131.57	11,716.46	71.44	71.04	92.53	-3,462.80	-340.46	1,039.93	939.64	100.30	10.369	
15,200.00	11,669.99	15,231.57	11,717.73	72.78	72.39	92.54	-3,562.79	-339.55	1,039.93	937.73	102.21	10.175	
15,300.00	11,671.21	15,331.57	11,719.00	74.14	73.76	92.54	-3,662.78	-338.64	1,039.94	935.80	104.13	9.987	
15,400.00	11,672.43	15,431.57	11,720.27	75.51	75.13	92.54	-3,762.76	-337.72	1,039.94	933.86	106.08	9.804	
15,500.00	11,673.65	15,531.57	11,721.54	76.89	76.51	92.55	-3,862.75	-336.81	1,039.94	931.90	108.04	9.626	
15,600.00	11,674.86	15,631.57	11,722.81	78.28	77.91	92.55	-3,962.74	-335.90	1,039.94	929.93	110.01	9.453	
15,700.00	11,676.08	15,731.57	11,724.08	79.68	79.32	92.55	-4,062.73	-334.99	1,039.94	927.94	112.00	9.285	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
15,800.00	11,677.30	15,831.57	11,725.35	81.09	80.73	92.55	-4,162.71	-334.08	1,039.94	925.94	114.00	9.122	
15,900.00	11,678.52	15,931.57	11,726.62	82.50	82.15	92.56	-4,262.70	-333.17	1,039.94	923.93	116.01	8.964	
16,000.00	11,679.74	16,031.57	11,727.89	83.93	83.59	92.56	-4,362.69	-332.26	1,039.94	921.91	118.04	8.810	
16,100.00	11,680.96	16,131.57	11,729.15	85.37	85.03	92.56	-4,462.68	-331.35	1,039.95	919.87	120.08	8.661	
16,200.00	11,682.17	16,231.57	11,730.42	86.81	86.47	92.57	-4,562.67	-330.44	1,039.95	917.82	122.12	8.516	
16,300.00	11,683.39	16,331.57	11,731.69	88.26	87.93	92.57	-4,662.65	-329.53	1,039.95	915.77	124.18	8.374	
16,400.00	11,684.61	16,431.57	11,732.96	89.72	89.39	92.57	-4,762.64	-328.62	1,039.95	913.70	126.25	8.237	
16,500.00	11,685.83	16,531.57	11,734.23	91.18	90.86	92.57	-4,862.63	-327.71	1,039.95	911.63	128.33	8.104	
16,600.00	11,687.05	16,631.57	11,735.50	92.65	92.33	92.58	-4,962.62	-326.79	1,039.95	909.54	130.41	7.974	
16,700.00	11,688.27	16,731.57	11,736.77	94.13	93.81	92.58	-5,062.60	-325.88	1,039.95	907.45	132.50	7.848	
16,800.00	11,689.48	16,831.57	11,738.04	95.61	95.30	92.58	-5,162.59	-324.97	1,039.95	905.35	134.61	7.726	
16,900.00	11,690.70	16,931.57	11,739.31	97.10	96.79	92.59	-5,262.58	-324.06	1,039.96	903.24	136.72	7.607	
17,000.00	11,691.92	17,031.57	11,740.58	98.59	98.29	92.59	-5,362.57	-323.15	1,039.96	901.13	138.83	7.491	
17,100.00	11,693.14	17,131.57	11,741.85	100.09	99.79	92.59	-5,462.56	-322.24	1,039.96	899.00	140.95	7.378	
17,200.00	11,694.36	17,231.57	11,743.12	101.59	101.30	92.59	-5,562.54	-321.33	1,039.96	896.88	143.08	7.268	
17,300.00	11,695.58	17,331.57	11,744.39	103.10	102.81	92.60	-5,662.53	-320.42	1,039.96	894.74	145.22	7.161	
17,400.00	11,696.79	17,431.57	11,745.65	104.61	104.32	92.60	-5,762.52	-319.51	1,039.96	892.60	147.36	7.057	
17,500.00	11,698.01	17,531.57	11,746.92	106.12	105.84	92.60	-5,862.51	-318.60	1,039.96	890.45	149.51	6.956	
17,600.00	11,699.23	17,631.57	11,748.19	107.64	107.36	92.60	-5,962.50	-317.69	1,039.97	888.30	151.67	6.857	
17,700.00	11,700.45	17,731.57	11,749.46	109.17	108.89	92.61	-6,062.48	-316.78	1,039.97	886.14	153.82	6.761	
17,800.00	11,701.67	17,831.57	11,750.73	110.69	110.42	92.61	-6,162.47	-315.86	1,039.97	883.98	155.99	6.667	
17,900.00	11,702.89	17,931.57	11,752.00	112.23	111.96	92.61	-6,262.46	-314.95	1,039.97	881.81	158.16	6.576	
18,000.00	11,704.10	18,031.57	11,753.27	113.76	113.49	92.62	-6,362.45	-314.04	1,039.97	879.64	160.33	6.486	
18,100.00	11,705.32	18,131.57	11,754.54	115.30	115.03	92.62	-6,462.43	-313.13	1,039.97	877.46	162.51	6.400	
18,200.00	11,706.54	18,231.57	11,755.81	116.84	116.58	92.62	-6,562.42	-312.22	1,039.97	875.28	164.69	6.315	
18,300.00	11,707.76	18,331.57	11,757.08	118.38	118.13	92.62	-6,662.41	-311.31	1,039.97	873.10	166.88	6.232	
18,400.00	11,708.98	18,431.57	11,758.35	119.93	119.68	92.63	-6,762.40	-310.40	1,039.98	870.91	169.07	6.151	
18,500.00	11,710.20	18,531.57	11,759.62	121.48	121.23	92.63	-6,862.39	-309.49	1,039.98	868.72	171.26	6.073	
18,600.00	11,711.41	18,631.57	11,760.89	123.03	122.78	92.63	-6,962.37	-308.58	1,039.98	866.52	173.46	5.996	
18,700.00	11,712.63	18,731.57	11,762.16	124.59	124.34	92.64	-7,062.36	-307.67	1,039.98	864.32	175.66	5.920	
18,800.00	11,713.85	18,831.57	11,763.42	126.14	125.90	92.64	-7,162.35	-306.76	1,039.98	862.12	177.86	5.847	
18,900.00	11,715.07	18,931.57	11,764.69	127.70	127.46	92.64	-7,262.34	-305.85	1,039.98	859.91	180.07	5.775	
19,000.00	11,716.29	19,031.57	11,765.96	129.27	129.03	92.64	-7,362.32	-304.93	1,039.98	857.70	182.28	5.705	
19,100.00	11,717.51	19,131.57	11,767.23	130.83	130.59	92.65	-7,462.31	-304.02	1,039.99	855.49	184.50	5.637	
19,200.00	11,718.72	19,231.57	11,768.50	132.40	132.16	92.65	-7,562.30	-303.11	1,039.99	853.27	186.71	5.570	
19,300.00	11,719.94	19,331.57	11,769.77	133.96	133.73	92.65	-7,662.29	-302.20	1,039.99	851.06	188.93	5.505	
19,400.00	11,721.16	19,431.57	11,771.04	135.54	135.31	92.66	-7,762.28	-301.29	1,039.99	848.83	191.16	5.441	
19,500.00	11,722.38	19,531.57	11,772.31	137.11	136.88	92.66	-7,862.26	-300.38	1,039.99	846.61	193.38	5.378	
19,600.00	11,723.60	19,631.57	11,773.58	138.68	138.46	92.66	-7,962.25	-299.47	1,039.99	844.38	195.61	5.317	
19,700.00	11,724.82	19,731.57	11,774.85	140.26	140.04	92.66	-8,062.24	-298.56	1,039.99	842.15	197.84	5.257	
19,800.00	11,726.03	19,831.57	11,776.12	141.84	141.62	92.67	-8,162.23	-297.65	1,039.99	839.92	200.07	5.198	
19,900.00	11,727.25	19,931.57	11,777.39	143.42	143.20	92.67	-8,262.21	-296.74	1,040.00	837.69	202.31	5.141	
20,000.00	11,728.47	20,031.57	11,778.66	145.00	144.78	92.67	-8,362.20	-295.83	1,040.00	835.45	204.54	5.084	
20,100.00	11,729.69	20,131.57	11,779.93	146.58	146.37	92.68	-8,462.19	-294.92	1,040.00	833.22	206.78	5.029	
20,200.00	11,730.91	20,231.57	11,781.19	148.16	147.95	92.68	-8,562.18	-294.01	1,040.00	830.98	209.02	4.976	
20,300.00	11,732.13	20,331.57	11,782.46	149.75	149.54	92.68	-8,662.17	-293.09	1,040.00	828.73	211.27	4.923	
20,400.00	11,733.34	20,431.57	11,783.73	151.34	151.13	92.68	-8,762.15	-292.18	1,040.00	826.49	213.51	4.871	
20,500.00	11,734.56	20,531.57	11,785.00	152.93	152.72	92.69	-8,862.14	-291.27	1,040.00	824.24	215.76	4.820	
20,600.00	11,735.78	20,631.57	11,786.27	154.52	154.31	92.69	-8,962.13	-290.36	1,040.01	822.00	218.01	4.770	
20,700.00	11,737.00	20,731.57	11,787.54	156.11	155.90	92.69	-9,062.12	-289.45	1,040.01	819.75	220.26	4.722	
20,800.00	11,738.22	20,831.57	11,788.81	157.70	157.50	92.69	-9,162.10	-288.54	1,040.01	817.50	222.51	4.674	
20,900.00	11,739.43	20,931.57	11,790.08	159.29	159.09	92.70	-9,262.09	-287.63	1,040.01	815.24	224.77	4.627	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Master Fed Com 603H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
21,000.00	11,740.65	21,031.57	11,791.35	160.89	160.69	92.70	-9,362.08	-286.72	1,040.01	812.99	227.02	4.581	
21,100.00	11,741.87	21,131.57	11,792.62	162.49	162.29	92.70	-9,462.07	-285.81	1,040.01	810.73	229.28	4.536	
21,200.00	11,743.09	21,231.57	11,793.89	164.08	163.89	92.71	-9,562.06	-284.90	1,040.01	808.48	231.54	4.492	
21,300.00	11,744.31	21,331.57	11,795.16	165.68	165.49	92.71	-9,662.04	-283.99	1,040.02	806.22	233.80	4.448	
21,400.00	11,745.53	21,431.57	11,796.43	167.28	167.09	92.71	-9,762.03	-283.08	1,040.02	803.96	236.06	4.406	
21,500.00	11,746.74	21,531.57	11,797.69	168.88	168.69	92.71	-9,862.02	-282.16	1,040.02	801.69	238.32	4.364	
21,600.00	11,747.96	21,631.57	11,798.96	170.48	170.29	92.72	-9,962.01	-281.25	1,040.02	799.43	240.59	4.323	
21,700.00	11,749.18	21,731.57	11,800.23	172.09	171.90	92.72	-10,061.99	-280.34	1,040.02	797.17	242.85	4.282	
21,786.90	11,750.24	21,818.47	11,801.34	173.48	173.29	92.72	-10,148.89	-279.55	1,040.02	795.20	244.82	4.248	SF

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 705H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
0.00	0.00	0.90	0.90	0.00	0.00	-90.47	-0.29	-35.00	35.00				
100.00	100.00	100.90	100.90	0.13	0.13	-90.47	-0.29	-35.00	35.00	34.82	0.18	194.743	
200.00	200.00	200.90	200.90	0.48	0.49	-90.47	-0.29	-35.00	35.00	34.31	0.69	50.972	
300.00	300.00	300.90	300.90	0.84	0.85	-90.47	-0.29	-35.00	35.00	33.81	1.19	29.323	
400.00	400.00	400.90	400.90	1.20	1.20	-90.47	-0.29	-35.00	35.00	33.30	1.70	20.582	
500.00	500.00	500.90	500.90	1.56	1.56	-90.47	-0.29	-35.00	35.00	32.79	2.21	15.855	
600.00	600.00	600.90	600.90	1.92	1.92	-90.47	-0.29	-35.00	35.00	32.29	2.71	12.894	
700.00	700.00	700.90	700.90	2.28	2.28	-90.47	-0.29	-35.00	35.00	31.78	3.22	10.865	
800.00	800.00	800.90	800.90	2.63	2.64	-90.47	-0.29	-35.00	35.00	31.27	3.73	9.388	
900.00	900.00	900.90	900.90	2.99	3.00	-90.47	-0.29	-35.00	35.00	30.77	4.24	8.264	
1,000.00	1,000.00	1,000.90	1,000.90	3.35	3.35	-90.47	-0.29	-35.00	35.00	30.26	4.74	7.381	
1,100.00	1,100.00	1,100.90	1,100.90	3.71	3.71	-90.47	-0.29	-35.00	35.00	29.75	5.25	6.668	
1,200.00	1,200.00	1,200.90	1,200.90	4.07	4.07	-90.47	-0.29	-35.00	35.00	29.24	5.76	6.081	
1,300.00	1,300.00	1,300.90	1,300.90	4.43	4.43	-90.47	-0.29	-35.00	35.00	28.74	6.26	5.588	
1,400.00	1,400.00	1,400.90	1,400.90	4.79	4.79	-90.47	-0.29	-35.00	35.00	28.23	6.77	5.170	
1,500.00	1,500.00	1,500.90	1,500.90	5.14	5.15	-90.47	-0.29	-35.00	35.00	27.72	7.28	4.810	
1,600.00	1,600.00	1,600.90	1,600.90	5.50	5.51	-90.47	-0.29	-35.00	35.00	27.22	7.78	4.497	
1,700.00	1,700.00	1,700.90	1,700.90	5.86	5.86	-90.47	-0.29	-35.00	35.00	26.71	8.29	4.222	
1,800.00	1,800.00	1,800.90	1,800.90	6.22	6.22	-90.47	-0.29	-35.00	35.00	26.20	8.80	3.978	
1,900.00	1,900.00	1,900.90	1,900.90	6.58	6.58	-90.47	-0.29	-35.00	35.00	25.70	9.30	3.762	
2,000.00	2,000.00	2,000.90	2,000.90	6.94	6.94	-90.47	-0.29	-35.00	35.00	25.19	9.81	3.567	
2,100.00	2,100.00	2,100.90	2,100.90	7.29	7.30	-90.47	-0.29	-35.00	35.00	24.68	10.32	3.392	
2,200.00	2,200.00	2,200.90	2,200.90	7.65	7.66	-90.47	-0.29	-35.00	35.00	24.18	10.83	3.233	
2,300.00	2,300.00	2,300.90	2,300.90	8.01	8.02	-90.47	-0.29	-35.00	35.00	23.67	11.33	3.089	
2,400.00	2,400.00	2,400.90	2,400.90	8.37	8.37	-90.47	-0.29	-35.00	35.00	23.16	11.84	2.956	
2,500.00	2,500.00	2,500.90	2,500.90	8.73	8.73	-90.47	-0.29	-35.00	35.00	22.65	12.35	2.835	
2,600.00	2,600.00	2,600.90	2,600.90	9.09	9.09	-90.47	-0.29	-35.00	35.00	22.15	12.85	2.723	
2,700.00	2,700.00	2,700.90	2,700.90	9.45	9.45	-90.47	-0.29	-35.00	35.00	21.64	13.36	2.620	
2,800.00	2,800.00	2,800.90	2,800.90	9.80	9.81	-90.47	-0.29	-35.00	35.00	21.13	13.87	2.524	
2,900.00	2,900.00	2,900.90	2,900.90	10.16	10.17	-90.47	-0.29	-35.00	35.00	20.63	14.37	2.435	
3,000.00	3,000.00	3,000.90	3,000.90	10.52	10.52	-90.47	-0.29	-35.00	35.00	20.12	14.88	2.352	
3,100.00	3,100.00	3,100.90	3,100.90	10.88	10.88	-90.47	-0.29	-35.00	35.00	19.61	15.39	2.275	
3,200.00	3,200.00	3,200.90	3,200.90	11.24	11.24	-90.47	-0.29	-35.00	35.00	19.11	15.90	2.202	
3,300.00	3,300.00	3,300.90	3,300.90	11.60	11.60	-90.47	-0.29	-35.00	35.00	18.60	16.40	2.134	
3,400.00	3,400.00	3,400.90	3,400.90	11.96	11.96	-90.47	-0.29	-35.00	35.00	18.09	16.91	2.070	
3,500.00	3,500.00	3,500.90	3,500.90	12.31	12.32	-90.47	-0.29	-35.00	35.00	17.58	17.42	2.010	
3,501.01	3,501.01	3,501.92	3,501.92	12.32	12.32	-162.25	-0.29	-35.00	35.00	17.58	17.42	2.009	CC, ES
3,600.00	3,599.99	3,601.35	3,601.34	12.67	12.68	-161.01	0.88	-34.34	35.59	17.67	17.92	1.986	SF
3,700.00	3,699.91	3,701.75	3,701.66	13.01	13.03	-157.62	4.35	-32.38	37.46	19.05	18.41	2.035	
3,800.00	3,799.69	3,802.04	3,801.72	13.36	13.39	-152.72	10.10	-29.12	40.83	21.92	18.90	2.160	
3,900.00	3,899.27	3,901.94	3,901.26	13.71	13.75	-147.88	17.56	-24.89	46.12	26.71	19.40	2.377	
3,966.61	3,965.45	3,968.36	3,967.42	13.95	13.98	-146.06	22.60	-22.04	50.96	31.23	19.74	2.582	
4,000.00	3,998.59	4,001.64	4,000.57	14.07	14.10	-145.47	25.12	-20.61	53.65	33.75	19.90	2.696	
4,100.00	4,097.85	4,101.30	4,099.86	14.42	14.46	-144.01	32.68	-16.33	61.72	41.31	20.40	3.025	
4,200.00	4,197.10	4,200.96	4,199.14	14.78	14.82	-142.88	40.24	-12.05	69.81	48.91	20.90	3.340	
4,300.00	4,296.36	4,300.63	4,298.43	15.15	15.18	-141.99	47.80	-7.77	77.94	56.53	21.41	3.640	
4,400.00	4,395.61	4,400.29	4,397.71	15.51	15.54	-141.27	55.36	-3.49	86.07	64.16	21.91	3.928	
4,500.00	4,494.87	4,499.95	4,496.99	15.88	15.90	-140.67	62.92	0.79	94.22	71.80	22.42	4.202	
4,600.00	4,594.12	4,599.62	4,596.28	16.24	16.26	-140.17	70.48	5.07	102.37	79.44	22.93	4.465	
4,700.00	4,693.38	4,699.28	4,695.56	16.61	16.63	-139.74	78.04	9.35	110.53	87.10	23.44	4.716	
4,800.00	4,792.63	4,798.94	4,794.85	16.98	16.99	-139.37	85.60	13.63	118.70	94.75	23.95	4.956	
4,900.00	4,891.88	4,898.61	4,894.13	17.36	17.35	-139.05	93.16	17.91	126.87	102.41	24.46	5.186	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 705H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
5,000.00	4,991.14	4,998.27	4,993.41	17.73	17.72	-138.76	100.71	22.19	135.05	110.07	24.98	5.407	
5,100.00	5,090.39	5,097.93	5,092.70	18.11	18.09	-138.51	108.27	26.47	143.23	117.73	25.49	5.619	
5,200.00	5,189.65	5,197.60	5,191.98	18.48	18.45	-138.29	115.83	30.75	151.41	125.40	26.01	5.822	
5,300.00	5,288.90	5,297.26	5,291.27	18.86	18.82	-138.09	123.39	35.03	159.59	133.06	26.52	6.017	
5,400.00	5,388.16	5,396.92	5,390.55	19.24	19.19	-137.91	130.95	39.31	167.77	140.73	27.04	6.204	
5,500.00	5,487.41	5,496.59	5,489.83	19.62	19.55	-137.74	138.51	43.59	175.96	148.40	27.56	6.384	
5,600.00	5,586.67	5,596.25	5,589.12	20.00	19.92	-137.59	146.07	47.87	184.15	156.06	28.08	6.558	
5,700.00	5,685.92	5,695.91	5,688.40	20.39	20.29	-137.46	153.63	52.15	192.33	163.73	28.60	6.724	
5,800.00	5,785.18	5,795.58	5,787.68	20.77	20.66	-137.33	161.19	56.43	200.52	171.40	29.12	6.885	
5,900.00	5,884.43	5,895.24	5,886.97	21.15	21.03	-137.22	168.75	60.71	208.71	179.07	29.65	7.040	
6,000.00	5,983.69	5,994.90	5,986.25	21.54	21.40	-137.11	176.30	64.99	216.90	186.74	30.17	7.190	
6,100.00	6,082.94	6,094.56	6,085.54	21.93	21.77	-137.01	183.86	69.27	225.10	194.40	30.69	7.334	
6,200.00	6,182.20	6,194.23	6,184.82	22.31	22.14	-136.92	191.42	73.55	233.29	202.07	31.22	7.473	
6,300.00	6,281.45	6,293.89	6,284.10	22.70	22.51	-136.83	198.98	77.83	241.48	209.74	31.74	7.608	
6,400.00	6,380.71	6,393.52	6,383.35	23.09	22.89	-136.75	206.53	82.11	249.67	217.41	32.27	7.738	
6,500.00	6,479.96	6,492.62	6,482.19	23.48	23.25	-137.00	212.79	85.65	257.99	225.21	32.78	7.869	
6,600.00	6,579.22	6,591.56	6,581.01	23.87	23.61	-137.78	216.81	87.93	266.55	233.26	33.29	8.006	
6,700.00	6,678.47	6,690.20	6,679.64	24.26	23.96	-139.04	218.60	88.94	275.47	241.68	33.79	8.152	
6,800.00	6,777.73	6,789.19	6,778.63	24.65	24.31	-140.62	218.71	89.00	284.79	250.51	34.29	8.306	
6,900.00	6,876.98	6,888.45	6,877.88	25.04	24.66	-142.12	218.71	89.00	294.34	259.56	34.78	8.462	
7,000.00	6,976.24	6,987.70	6,977.14	25.43	25.01	-143.52	218.71	89.00	304.08	268.80	35.28	8.619	
7,100.00	7,075.49	7,086.96	7,076.39	25.82	25.37	-144.84	218.71	89.00	313.98	278.21	35.77	8.777	
7,200.00	7,174.75	7,186.21	7,175.65	26.21	25.72	-146.08	218.71	89.00	324.05	287.77	36.27	8.934	
7,300.00	7,274.00	7,285.47	7,274.90	26.60	26.07	-147.24	218.71	89.00	334.25	297.48	36.77	9.091	
7,400.00	7,373.25	7,384.72	7,374.15	27.00	26.42	-148.34	218.71	89.00	344.58	307.32	37.26	9.247	
7,500.00	7,472.51	7,483.97	7,473.41	27.39	26.77	-149.37	218.71	89.00	355.03	317.27	37.76	9.402	
7,600.00	7,571.76	7,583.23	7,572.66	27.79	27.12	-150.34	218.71	89.00	365.59	327.33	38.26	9.555	
7,700.00	7,671.02	7,682.48	7,671.92	28.18	27.47	-151.26	218.71	89.00	376.25	337.49	38.76	9.707	
7,800.00	7,770.27	7,781.74	7,771.17	28.57	27.83	-152.12	218.71	89.00	386.99	347.73	39.26	9.858	
7,900.00	7,869.53	7,880.99	7,870.43	28.97	28.18	-152.94	218.71	89.00	397.82	358.06	39.76	10.006	
8,000.00	7,968.78	7,980.25	7,969.68	29.36	28.53	-153.72	218.71	89.00	408.73	368.47	40.26	10.153	
8,100.00	8,068.04	8,079.50	8,068.94	29.76	28.88	-154.45	218.71	89.00	419.70	378.95	40.76	10.298	
8,200.00	8,167.29	8,178.76	8,168.19	30.16	29.23	-155.15	218.71	89.00	430.74	389.49	41.26	10.441	
8,300.00	8,266.55	8,278.01	8,267.45	30.55	29.59	-155.81	218.71	89.00	441.84	400.09	41.76	10.581	
8,400.00	8,365.80	8,377.27	8,366.70	30.95	29.94	-156.45	218.71	89.00	453.00	410.74	42.26	10.720	
8,500.00	8,465.06	8,476.52	8,465.96	31.34	30.29	-157.05	218.71	89.00	464.21	421.45	42.76	10.856	
8,600.00	8,564.31	8,575.78	8,565.21	31.74	30.64	-157.62	218.71	89.00	475.47	432.20	43.26	10.990	
8,700.00	8,663.57	8,675.03	8,664.47	32.14	30.99	-158.16	218.71	89.00	486.77	443.00	43.76	11.122	
8,800.00	8,762.82	8,774.29	8,763.72	32.54	31.35	-158.68	218.71	89.00	498.11	453.84	44.27	11.252	
8,900.00	8,862.08	8,873.54	8,862.98	32.93	31.70	-159.18	218.71	89.00	509.49	464.72	44.77	11.380	
9,000.00	8,961.33	8,972.80	8,962.23	33.33	32.05	-159.66	218.71	89.00	520.91	475.64	45.27	11.506	
9,100.00	9,060.59	9,072.05	9,061.49	33.73	32.41	-160.11	218.71	89.00	532.36	486.59	45.78	11.630	
9,200.00	9,159.84	9,171.31	9,160.74	34.13	32.76	-160.55	218.71	89.00	543.85	497.57	46.28	11.751	
9,245.04	9,204.55	9,216.01	9,205.45	34.31	32.92	-160.74	218.71	89.00	549.03	502.52	46.51	11.805	
9,300.00	9,259.14	9,270.61	9,260.04	34.52	33.11	-160.98	218.71	89.00	554.99	508.21	46.78	11.863	
9,400.00	9,358.69	9,370.16	9,359.59	34.91	33.47	-161.34	218.71	89.00	563.94	516.66	47.29	11.926	
9,500.00	9,458.45	9,469.92	9,459.35	35.28	33.82	-161.59	218.71	89.00	570.43	522.64	47.79	11.936	
9,600.00	9,558.36	9,569.83	9,559.26	35.64	34.18	-161.74	218.71	89.00	574.45	526.16	48.29	11.895	
9,700.00	9,658.35	9,669.81	9,659.25	35.98	34.53	-161.80	218.71	89.00	575.98	527.19	48.79	11.805	
9,711.65	9,670.00	9,681.47	9,670.90	36.02	34.57	-90.03	218.71	89.00	576.00	527.15	48.85	11.791	
9,800.00	9,758.35	9,769.81	9,759.25	36.32	34.89	-90.03	218.71	89.00	576.00	526.71	49.29	11.686	
9,900.00	9,858.35	9,869.81	9,859.25	36.66	35.24	-90.03	218.71	89.00	576.00	526.21	49.79	11.569	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 705H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
10,000.00	9,958.35	9,969.81	9,959.25	37.00	35.60	-90.03	218.71	89.00	576.00	525.71	50.29	11.455	
10,100.00	10,058.35	10,069.81	10,059.25	37.33	35.96	-90.03	218.71	89.00	576.00	525.22	50.78	11.342	
10,200.00	10,158.35	10,169.81	10,159.25	37.67	36.31	-90.03	218.71	89.00	576.00	524.72	51.28	11.232	
10,300.00	10,258.35	10,269.81	10,259.25	38.01	36.67	-90.03	218.71	89.00	576.00	524.22	51.78	11.124	
10,400.00	10,358.35	10,369.81	10,359.25	38.35	37.02	-90.03	218.71	89.00	576.00	523.72	52.28	11.018	
10,500.00	10,458.35	10,469.81	10,459.25	38.69	37.38	-90.03	218.71	89.00	576.00	523.22	52.78	10.914	
10,600.00	10,558.35	10,569.81	10,559.25	39.03	37.74	-90.03	218.71	89.00	576.00	522.72	53.28	10.812	
10,700.00	10,658.35	10,669.81	10,659.25	39.37	38.09	-90.03	218.71	89.00	576.00	522.22	53.78	10.711	
10,800.00	10,758.35	10,769.81	10,759.25	39.71	38.45	-90.03	218.71	89.00	576.00	521.73	54.27	10.613	
10,900.00	10,858.35	10,869.81	10,859.25	40.05	38.81	-90.03	218.71	89.00	576.00	521.23	54.77	10.516	
11,000.00	10,958.35	10,969.81	10,959.25	40.39	39.16	-90.03	218.71	89.00	576.00	520.73	55.27	10.421	
11,099.65	11,058.00	11,069.47	11,058.90	40.73	39.52	-90.03	218.71	89.00	576.00	520.23	55.77	10.328	
11,150.00	11,108.28	11,119.75	11,109.18	40.89	39.70	90.71	218.71	89.00	576.02	520.00	56.02	10.283	
11,200.00	11,157.83	11,169.30	11,158.73	41.04	39.87	91.34	218.71	89.00	576.14	519.88	56.26	10.241	
11,250.00	11,206.63	11,218.09	11,207.53	41.19	40.05	92.36	218.71	89.00	576.50	520.01	56.50	10.204	
11,300.00	11,254.29	11,265.75	11,255.19	41.32	40.22	93.70	218.71	89.00	577.34	520.61	56.73	10.177	
11,350.00	11,300.46	11,311.92	11,301.36	41.45	40.38	95.28	218.71	89.00	578.97	522.01	56.96	10.165	
11,400.00	11,344.78	11,356.24	11,345.68	41.56	40.54	97.02	218.71	89.00	581.77	524.59	57.18	10.174	
11,450.00	11,386.92	11,402.08	11,391.51	41.66	40.70	98.97	218.38	89.00	586.11	528.70	57.41	10.210	
11,500.00	11,426.55	11,455.43	11,444.66	41.75	40.86	101.21	214.08	89.04	591.75	534.11	57.63	10.268	
11,550.00	11,463.39	11,512.50	11,500.82	41.83	41.03	103.45	204.04	89.13	598.46	540.65	57.82	10.351	
11,600.00	11,497.13	11,574.00	11,559.89	41.90	41.20	105.70	187.03	89.29	606.08	548.15	57.93	10.463	
11,650.00	11,527.54	11,640.71	11,621.50	41.97	41.38	107.94	161.54	89.52	614.35	556.43	57.91	10.608	
11,700.00	11,554.37	11,713.48	11,684.82	42.02	41.54	110.17	125.78	89.85	622.94	565.20	57.74	10.788	
11,750.00	11,577.42	11,793.13	11,748.32	42.08	41.71	112.32	77.80	90.28	631.46	574.06	57.40	11.002	
11,800.00	11,596.52	11,880.29	11,809.44	42.13	41.87	114.34	15.79	90.85	639.43	582.55	56.88	11.242	
11,850.00	11,611.52	11,975.12	11,864.43	42.20	42.06	116.10	-61.34	91.55	646.32	590.03	56.29	11.483	
11,900.00	11,622.31	12,077.02	11,908.48	42.28	42.28	117.47	-153.07	92.39	651.59	595.83	55.76	11.685	
11,950.00	11,628.81	12,184.30	11,936.55	42.37	42.53	118.31	-256.44	93.33	654.77	599.26	55.51	11.795	
11,992.67	11,630.92	12,278.10	11,944.94	42.46	42.75	118.53	-349.76	94.18	655.59	599.95	55.65	11.781	
11,993.83	11,630.93	12,270.78	11,944.76	42.46	42.74	118.52	-342.44	94.11	655.58	599.96	55.63	11.785	
12,000.00	11,631.00	12,283.83	11,945.02	42.48	42.77	118.53	-355.49	94.23	655.60	599.93	55.67	11.777	
12,100.00	11,632.22	12,383.83	11,946.31	42.75	43.05	118.54	-455.48	95.14	655.63	599.57	56.06	11.695	
12,200.00	11,633.44	12,483.83	11,947.60	43.09	43.40	118.54	-555.47	96.05	655.66	599.14	56.52	11.600	
12,300.00	11,634.66	12,583.83	11,948.88	43.50	43.80	118.55	-655.45	96.96	655.69	598.63	57.06	11.491	
12,400.00	11,635.88	12,683.83	11,950.17	43.97	44.26	118.55	-755.44	97.87	655.73	598.06	57.67	11.370	
12,500.00	11,637.10	12,783.83	11,951.46	44.50	44.77	118.56	-855.43	98.78	655.76	597.41	58.35	11.239	
12,600.00	11,638.31	12,883.83	11,952.75	45.08	45.34	118.56	-955.42	99.69	655.79	596.70	59.09	11.097	
12,700.00	11,639.53	12,983.83	11,954.03	45.71	45.96	118.57	-1,055.40	100.60	655.82	595.92	59.90	10.948	
12,800.00	11,640.75	13,083.83	11,955.32	46.39	46.63	118.57	-1,155.39	101.51	655.86	595.08	60.77	10.792	
12,900.00	11,641.97	13,183.83	11,956.61	47.12	47.35	118.58	-1,255.38	102.42	655.89	594.19	61.70	10.630	
13,000.00	11,643.19	13,283.83	11,957.90	47.90	48.12	118.59	-1,355.37	103.33	655.92	593.23	62.69	10.463	
13,100.00	11,644.41	13,383.83	11,959.18	48.72	48.93	118.59	-1,455.36	104.24	655.95	592.23	63.73	10.293	
13,200.00	11,645.62	13,483.83	11,960.47	49.58	49.78	118.60	-1,555.34	105.15	655.99	591.17	64.82	10.121	
13,300.00	11,646.84	13,583.83	11,961.76	50.48	50.67	118.60	-1,655.33	106.06	656.02	590.06	65.95	9.946	
13,400.00	11,648.06	13,683.83	11,963.05	51.42	51.60	118.61	-1,755.32	106.97	656.05	588.91	67.14	9.772	
13,500.00	11,649.28	13,783.83	11,964.33	52.40	52.56	118.61	-1,855.31	107.88	656.08	587.72	68.36	9.597	
13,600.00	11,650.50	13,883.83	11,965.62	53.40	53.56	118.62	-1,955.29	108.79	656.12	586.49	69.63	9.423	
13,700.00	11,651.72	13,983.83	11,966.91	54.44	54.59	118.62	-2,055.28	109.71	656.15	585.21	70.94	9.250	
13,800.00	11,652.93	14,083.83	11,968.19	55.51	55.65	118.63	-2,155.27	110.62	656.18	583.90	72.28	9.079	
13,900.00	11,654.15	14,183.83	11,969.48	56.60	56.73	118.63	-2,255.26	111.53	656.21	582.56	73.65	8.910	
14,000.00	11,655.37	14,283.83	11,970.77	57.73	57.85	118.64	-2,355.24	112.44	656.25	581.19	75.06	8.743	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

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Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 705H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
14,100.00	11,656.59	14,383.83	11,972.06	58.87	58.99	118.64	-2,455.23	113.35	656.28	579.78	76.50	8.579	
14,200.00	11,657.81	14,483.83	11,973.34	60.04	60.15	118.65	-2,555.22	114.26	656.31	578.35	77.96	8.418	
14,300.00	11,659.03	14,583.83	11,974.63	61.24	61.34	118.65	-2,655.21	115.17	656.34	576.89	79.46	8.260	
14,400.00	11,660.24	14,683.83	11,975.92	62.45	62.55	118.66	-2,755.19	116.08	656.38	575.40	80.98	8.106	
14,500.00	11,661.46	14,783.83	11,977.21	63.68	63.77	118.66	-2,855.18	116.99	656.41	573.89	82.52	7.955	
14,600.00	11,662.68	14,883.83	11,978.49	64.94	65.02	118.67	-2,955.17	117.90	656.44	572.36	84.08	7.807	
14,700.00	11,663.90	14,983.83	11,979.78	66.21	66.28	118.68	-3,055.16	118.81	656.48	570.81	85.67	7.663	
14,800.00	11,665.12	15,083.83	11,981.07	67.49	67.56	118.68	-3,155.14	119.72	656.51	569.23	87.27	7.522	
14,900.00	11,666.34	15,183.83	11,982.36	68.79	68.86	118.69	-3,255.13	120.63	656.54	567.64	88.90	7.385	
15,000.00	11,667.55	15,283.83	11,983.64	70.11	70.17	118.69	-3,355.12	121.54	656.57	566.04	90.54	7.252	
15,100.00	11,668.77	15,383.83	11,984.93	71.44	71.50	118.70	-3,455.11	122.45	656.61	564.41	92.19	7.122	
15,200.00	11,669.99	15,483.83	11,986.22	72.78	72.84	118.70	-3,555.09	123.36	656.64	562.77	93.87	6.995	
15,300.00	11,671.21	15,583.83	11,987.51	74.14	74.19	118.71	-3,655.08	124.27	656.67	561.12	95.56	6.872	
15,400.00	11,672.43	15,683.83	11,988.79	75.51	75.55	118.71	-3,755.07	125.18	656.70	559.45	97.26	6.752	
15,500.00	11,673.65	15,783.83	11,990.08	76.89	76.93	118.72	-3,855.06	126.09	656.74	557.77	98.97	6.636	
15,600.00	11,674.86	15,883.83	11,991.37	78.28	78.31	118.72	-3,955.04	127.00	656.77	556.07	100.70	6.522	
15,700.00	11,676.08	15,983.83	11,992.66	79.68	79.71	118.73	-4,055.03	127.91	656.80	554.37	102.43	6.412	
15,800.00	11,677.30	16,083.83	11,993.94	81.09	81.12	118.73	-4,155.02	128.82	656.83	552.65	104.18	6.305	
15,900.00	11,678.52	16,183.83	11,995.23	82.50	82.53	118.74	-4,255.01	129.73	656.87	550.93	105.94	6.200	
16,000.00	11,679.74	16,283.83	11,996.52	83.93	83.96	118.74	-4,354.99	130.64	656.90	549.19	107.71	6.099	
16,100.00	11,680.96	16,383.83	11,997.80	85.37	85.39	118.75	-4,454.98	131.55	656.93	547.45	109.48	6.000	
16,200.00	11,682.17	16,483.83	11,999.09	86.81	86.83	118.76	-4,554.97	132.47	656.97	545.70	111.27	5.904	
16,300.00	11,683.39	16,583.83	12,000.38	88.26	88.27	118.76	-4,654.96	133.38	657.00	543.94	113.06	5.811	
16,400.00	11,684.61	16,683.83	12,001.67	89.72	89.73	118.77	-4,754.94	134.29	657.03	542.17	114.86	5.720	
16,500.00	11,685.83	16,783.83	12,002.95	91.18	91.19	118.77	-4,854.93	135.20	657.06	540.40	116.67	5.632	
16,600.00	11,687.05	16,883.83	12,004.24	92.65	92.66	118.78	-4,954.92	136.11	657.10	538.62	118.48	5.546	
16,700.00	11,688.27	16,983.83	12,005.53	94.13	94.13	118.78	-5,054.91	137.02	657.13	536.83	120.30	5.462	
16,800.00	11,689.48	17,083.83	12,006.82	95.61	95.61	118.79	-5,154.89	137.93	657.16	535.04	122.13	5.381	
16,900.00	11,690.70	17,183.83	12,008.10	97.10	97.10	118.79	-5,254.88	138.84	657.19	533.24	123.96	5.302	
17,000.00	11,691.92	17,283.83	12,009.39	98.59	98.59	118.80	-5,354.87	139.75	657.23	531.43	125.79	5.225	
17,100.00	11,693.14	17,383.83	12,010.68	100.09	100.08	118.80	-5,454.86	140.66	657.26	529.62	127.63	5.150	
17,200.00	11,694.36	17,483.83	12,011.97	101.59	101.58	118.81	-5,554.84	141.57	657.29	527.81	129.48	5.076	
17,300.00	11,695.58	17,583.83	12,013.25	103.10	103.09	118.81	-5,654.83	142.48	657.33	525.99	131.33	5.005	
17,400.00	11,696.79	17,683.83	12,014.54	104.61	104.60	118.82	-5,754.82	143.39	657.36	524.17	133.18	4.936	
17,500.00	11,698.01	17,783.83	12,015.83	106.12	106.11	118.82	-5,854.81	144.30	657.39	522.35	135.04	4.868	
17,600.00	11,699.23	17,883.83	12,017.12	107.64	107.63	118.83	-5,954.79	145.21	657.42	520.52	136.90	4.802	
17,700.00	11,700.45	17,983.83	12,018.40	109.17	109.15	118.83	-6,054.78	146.12	657.46	518.69	138.77	4.738	
17,800.00	11,701.67	18,083.83	12,019.69	110.69	110.68	118.84	-6,154.77	147.03	657.49	516.85	140.64	4.675	
17,900.00	11,702.89	18,183.83	12,020.98	112.23	112.21	118.85	-6,254.76	147.94	657.52	515.02	142.51	4.614	
18,000.00	11,704.10	18,283.83	12,022.27	113.76	113.74	118.85	-6,354.74	148.85	657.56	513.18	144.38	4.554	
18,100.00	11,705.32	18,383.83	12,023.55	115.30	115.28	118.86	-6,454.73	149.76	657.59	511.33	146.25	4.496	
18,200.00	11,706.54	18,483.83	12,024.84	116.84	116.81	118.86	-6,554.72	150.67	657.62	509.49	148.13	4.439	
18,300.00	11,707.76	18,583.83	12,026.13	118.38	118.36	118.87	-6,654.71	151.58	657.65	507.64	150.01	4.384	
18,400.00	11,708.98	18,683.83	12,027.41	119.93	119.90	118.87	-6,754.69	152.49	657.69	505.79	151.89	4.330	
18,500.00	11,710.20	18,783.83	12,028.70	121.48	121.45	118.88	-6,854.68	153.40	657.72	503.94	153.78	4.277	
18,600.00	11,711.41	18,883.83	12,029.99	123.03	123.00	118.88	-6,954.67	154.31	657.75	502.09	155.66	4.226	
18,700.00	11,712.63	18,983.83	12,031.28	124.59	124.56	118.89	-7,054.66	155.23	657.78	500.24	157.55	4.175	
18,800.00	11,713.85	19,083.83	12,032.56	126.14	126.11	118.89	-7,154.65	156.14	657.82	498.38	159.44	4.126	
18,900.00	11,715.07	19,183.83	12,033.85	127.70	127.67	118.90	-7,254.63	157.05	657.85	496.52	161.33	4.078	
19,000.00	11,716.29	19,283.83	12,035.14	129.27	129.23	118.90	-7,354.62	157.96	657.88	494.67	163.22	4.031	
19,100.00	11,717.51	19,383.83	12,036.43	130.83	130.79	118.91	-7,454.61	158.87	657.92	492.81	165.11	3.985	
19,200.00	11,718.72	19,483.83	12,037.71	132.40	132.36	118.91	-7,554.60	159.78	657.95	490.95	167.00	3.940	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 705H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
19,300.00	11,719.94	19,583.83	12,039.00	133.96	133.93	118.92	-7,654.58	160.69	657.98	489.09	168.89	3.896	
19,400.00	11,721.16	19,683.83	12,040.29	135.54	135.50	118.92	-7,754.57	161.60	658.02	487.23	170.79	3.853	
19,500.00	11,722.38	19,783.83	12,041.58	137.11	137.07	118.93	-7,854.56	162.51	658.05	485.37	172.68	3.811	
19,600.00	11,723.60	19,883.83	12,042.86	138.68	138.64	118.94	-7,954.55	163.42	658.08	483.50	174.58	3.770	
19,700.00	11,724.82	19,983.83	12,044.15	140.26	140.22	118.94	-8,054.53	164.33	658.11	481.64	176.47	3.729	
19,800.00	11,726.03	20,083.83	12,045.44	141.84	141.79	118.95	-8,154.52	165.24	658.15	479.78	178.37	3.690	
19,900.00	11,727.25	20,183.83	12,046.73	143.42	143.37	118.95	-8,254.51	166.15	658.18	477.92	180.26	3.651	
20,000.00	11,728.47	20,283.83	12,048.01	145.00	144.95	118.96	-8,354.50	167.06	658.21	476.05	182.16	3.613	
20,100.00	11,729.69	20,383.83	12,049.30	146.58	146.53	118.96	-8,454.48	167.97	658.25	474.19	184.05	3.576	
20,200.00	11,730.91	20,483.83	12,050.59	148.16	148.12	118.97	-8,554.47	168.88	658.28	472.33	185.95	3.540	
20,300.00	11,732.13	20,583.83	12,051.87	149.75	149.70	118.97	-8,654.46	169.79	658.31	470.47	187.85	3.505	
20,400.00	11,733.34	20,683.83	12,053.16	151.34	151.29	118.98	-8,754.45	170.70	658.34	468.60	189.74	3.470	
20,500.00	11,734.56	20,783.83	12,054.45	152.93	152.88	118.98	-8,854.43	171.61	658.38	466.74	191.64	3.436	
20,600.00	11,735.78	20,883.83	12,055.74	154.52	154.47	118.99	-8,954.42	172.52	658.41	464.88	193.53	3.402	
20,700.00	11,737.00	20,983.83	12,057.02	156.11	156.06	118.99	-9,054.41	173.43	658.44	463.02	195.43	3.369	
20,800.00	11,738.22	21,083.83	12,058.31	157.70	157.65	119.00	-9,154.40	174.34	658.48	461.16	197.32	3.337	
20,900.00	11,739.43	21,183.83	12,059.60	159.29	159.24	119.00	-9,254.38	175.25	658.51	459.30	199.21	3.306	
21,000.00	11,740.65	21,283.83	12,060.89	160.89	160.84	119.01	-9,354.37	176.16	658.54	457.44	201.11	3.275	
21,100.00	11,741.87	21,383.83	12,062.17	162.49	162.43	119.01	-9,454.36	177.07	658.58	455.58	203.00	3.244	
21,200.00	11,743.09	21,483.83	12,063.46	164.08	164.03	119.02	-9,554.35	177.99	658.61	453.72	204.89	3.214	
21,300.00	11,744.31	21,583.83	12,064.75	165.68	165.63	119.03	-9,654.33	178.90	658.64	451.86	206.78	3.185	
21,400.00	11,745.53	21,683.83	12,066.04	167.28	167.22	119.03	-9,754.32	179.81	658.67	450.00	208.67	3.157	
21,500.00	11,746.74	21,783.83	12,067.32	168.88	168.82	119.04	-9,854.31	180.72	658.71	448.15	210.56	3.128	
21,600.00	11,747.96	21,883.83	12,068.61	170.48	170.43	119.04	-9,954.30	181.63	658.74	446.29	212.45	3.101	
21,700.00	11,749.18	21,983.83	12,069.90	172.09	172.03	119.05	-10,054.28	182.54	658.77	444.44	214.34	3.074	
21,786.90	11,750.24	22,070.73	12,071.02	173.48	173.42	119.05	-10,141.18	183.33	658.80	442.83	215.98	3.050	

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 706H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
0.00	0.00	0.00	0.00	0.00	0.00	89.54	0.28	34.99	35.00				
100.00	100.00	99.20	99.20	0.13	0.12	89.54	0.28	34.99	34.99	34.81	0.18	197.996	
200.00	200.00	199.20	199.20	0.48	0.48	89.54	0.28	34.99	34.99	34.31	0.68	51.279	
300.00	300.00	299.20	299.20	0.84	0.84	89.54	0.28	34.99	34.99	33.80	1.19	29.421	
400.00	400.00	399.20	399.20	1.20	1.20	89.54	0.28	34.99	34.99	33.29	1.70	20.628	
500.00	500.00	499.20	499.20	1.56	1.56	89.54	0.28	34.99	34.99	32.79	2.20	15.882	
600.00	600.00	599.20	599.20	1.92	1.91	89.54	0.28	34.99	34.99	32.28	2.71	12.911	
700.00	700.00	699.20	699.20	2.28	2.27	89.54	0.28	34.99	34.99	31.77	3.22	10.876	
800.00	800.00	799.20	799.20	2.63	2.63	89.54	0.28	34.99	34.99	31.27	3.72	9.396	
900.00	900.00	899.20	899.20	2.99	2.99	89.54	0.28	34.99	34.99	30.76	4.23	8.270	
1,000.00	1,000.00	999.20	999.20	3.35	3.35	89.54	0.28	34.99	34.99	30.25	4.74	7.385	
1,100.00	1,100.00	1,099.20	1,099.20	3.71	3.71	89.54	0.28	34.99	34.99	29.75	5.24	6.671	
1,200.00	1,200.00	1,199.20	1,199.20	4.07	4.07	89.54	0.28	34.99	34.99	29.24	5.75	6.083	
1,300.00	1,300.00	1,299.20	1,299.20	4.43	4.42	89.54	0.28	34.99	34.99	28.73	6.26	5.591	
1,400.00	1,400.00	1,399.20	1,399.20	4.79	4.78	89.54	0.28	34.99	34.99	28.23	6.77	5.172	
1,500.00	1,500.00	1,499.20	1,499.20	5.14	5.14	89.54	0.28	34.99	34.99	27.72	7.27	4.811	
1,600.00	1,600.00	1,599.20	1,599.20	5.50	5.50	89.54	0.28	34.99	34.99	27.21	7.78	4.498	
1,700.00	1,700.00	1,699.20	1,699.20	5.86	5.86	89.54	0.28	34.99	34.99	26.70	8.29	4.223	
1,800.00	1,800.00	1,799.20	1,799.20	6.22	6.22	89.54	0.28	34.99	34.99	26.20	8.79	3.979	
1,900.00	1,900.00	1,899.20	1,899.20	6.58	6.58	89.54	0.28	34.99	34.99	25.69	9.30	3.762	
2,000.00	2,000.00	1,999.20	1,999.20	6.94	6.93	89.54	0.28	34.99	34.99	25.18	9.81	3.568	
2,100.00	2,100.00	2,099.20	2,099.20	7.29	7.29	89.54	0.28	34.99	34.99	24.68	10.31	3.392	
2,200.00	2,200.00	2,199.20	2,199.20	7.65	7.65	89.54	0.28	34.99	34.99	24.17	10.82	3.233	
2,300.00	2,300.00	2,299.20	2,299.20	8.01	8.01	89.54	0.28	34.99	34.99	23.66	11.33	3.089	
2,400.00	2,400.00	2,399.20	2,399.20	8.37	8.37	89.54	0.28	34.99	34.99	23.16	11.84	2.956	
2,500.00	2,500.00	2,499.20	2,499.20	8.73	8.73	89.54	0.28	34.99	34.99	22.65	12.34	2.835	
2,600.00	2,600.00	2,599.20	2,599.20	9.09	9.08	89.54	0.28	34.99	34.99	22.14	12.85	2.723	
2,700.00	2,700.00	2,699.20	2,699.20	9.45	9.44	89.54	0.28	34.99	34.99	21.63	13.36	2.620	
2,800.00	2,800.00	2,799.20	2,799.20	9.80	9.80	89.54	0.28	34.99	34.99	21.13	13.86	2.524	
2,900.00	2,900.00	2,899.20	2,899.20	10.16	10.16	89.54	0.28	34.99	34.99	20.62	14.37	2.435	
3,000.00	3,000.00	2,999.20	2,999.20	10.52	10.52	89.54	0.28	34.99	34.99	20.11	14.88	2.352	
3,100.00	3,100.00	3,099.20	3,099.20	10.88	10.88	89.54	0.28	34.99	34.99	19.61	15.38	2.275	
3,200.00	3,200.00	3,199.20	3,199.20	11.24	11.24	89.54	0.28	34.99	34.99	19.10	15.89	2.202	CC, ES
3,300.00	3,300.00	3,298.30	3,298.29	11.60	11.58	89.10	0.57	36.22	36.24	19.85	16.38	2.212	
3,400.00	3,400.00	3,397.26	3,397.17	11.96	11.93	87.93	1.45	39.95	40.02	23.17	16.86	2.374	
3,500.00	3,500.00	3,495.96	3,495.66	12.31	12.27	86.40	2.91	46.14	46.37	29.05	17.32	2.678	
3,600.00	3,599.99	3,594.38	3,593.68	12.67	12.61	13.36	4.94	54.79	54.02	36.26	17.76	3.041	
3,700.00	3,699.91	3,692.61	3,691.25	13.01	12.96	12.61	7.55	65.87	61.68	43.49	18.19	3.391	
3,800.00	3,799.69	3,791.68	3,789.38	13.36	13.32	12.26	10.66	79.07	68.91	50.25	18.65	3.694	
3,900.00	3,899.27	3,891.56	3,888.29	13.71	13.68	12.38	13.85	92.60	73.80	54.65	19.15	3.854	
3,966.61	3,965.45	3,958.14	3,954.23	13.95	13.92	12.69	15.97	101.62	75.64	56.16	19.48	3.884	
4,000.00	3,998.59	3,991.52	3,987.28	14.07	14.04	12.90	17.03	106.14	76.27	56.64	19.64	3.884	
4,100.00	4,097.85	4,091.50	4,086.29	14.42	14.41	13.48	20.22	119.67	78.19	58.06	20.13	3.884	
4,200.00	4,197.10	4,191.48	4,185.30	14.78	14.78	14.04	23.41	133.21	80.12	59.49	20.63	3.884	
4,300.00	4,296.36	4,291.46	4,284.30	15.15	15.15	14.57	26.60	146.75	82.06	60.93	21.13	3.884	
4,400.00	4,395.61	4,391.44	4,383.31	15.51	15.53	15.08	29.79	160.29	84.00	62.37	21.63	3.884	
4,500.00	4,494.87	4,491.42	4,482.31	15.88	15.91	15.56	32.97	173.83	85.95	63.82	22.13	3.884	
4,600.00	4,594.12	4,591.40	4,581.32	16.24	16.29	16.02	36.16	187.37	87.90	65.27	22.63	3.884	
4,700.00	4,693.38	4,691.37	4,680.33	16.61	16.67	16.47	39.35	200.91	89.86	66.73	23.13	3.884	
4,800.00	4,792.63	4,791.35	4,779.33	16.98	17.05	16.89	42.54	214.44	91.83	68.19	23.64	3.885	
4,900.00	4,891.88	4,891.33	4,878.34	17.36	17.44	17.30	45.73	227.98	93.79	69.65	24.14	3.885	
5,000.00	4,991.14	4,991.31	4,977.35	17.73	17.82	17.68	48.91	241.52	95.77	71.12	24.65	3.885	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 706H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
5,100.00	5,090.39	5,091.29	5,076.35	18.11	18.21	18.06	52.10	255.06	97.75	72.59	25.16	3.885	
5,200.00	5,189.65	5,191.27	5,175.36	18.48	18.60	18.42	55.29	268.60	99.73	74.06	25.67	3.886	
5,300.00	5,288.90	5,291.24	5,274.36	18.86	18.99	18.76	58.48	282.14	101.71	75.54	26.18	3.886	
5,400.00	5,388.16	5,391.22	5,373.37	19.24	19.39	19.09	61.67	295.68	103.70	77.02	26.69	3.886	
5,500.00	5,487.41	5,491.20	5,472.38	19.62	19.78	19.41	64.86	309.21	105.70	78.50	27.20	3.886	
5,600.00	5,586.67	5,591.18	5,571.38	20.00	20.17	19.72	68.04	322.75	107.69	79.98	27.71	3.886	
5,700.00	5,685.92	5,691.16	5,670.39	20.39	20.57	20.01	71.23	336.29	109.69	81.47	28.22	3.887	
5,800.00	5,785.18	5,791.14	5,769.39	20.77	20.97	20.30	74.42	349.83	111.69	82.96	28.74	3.887	
5,900.00	5,884.43	5,891.12	5,868.40	21.15	21.37	20.57	77.61	363.37	113.70	84.45	29.25	3.887	
6,000.00	5,983.69	5,991.09	5,967.41	21.54	21.76	20.84	80.80	376.91	115.70	85.94	29.77	3.887	
6,100.00	6,082.94	6,091.07	6,066.41	21.93	22.16	21.10	83.98	390.45	117.71	87.43	30.28	3.887	
6,200.00	6,182.20	6,191.05	6,165.42	22.31	22.56	21.34	87.17	403.98	119.72	88.93	30.80	3.887	
6,300.00	6,281.45	6,291.03	6,264.43	22.70	22.96	21.58	90.36	417.52	121.74	90.42	31.31	3.888	
6,400.00	6,380.71	6,391.01	6,363.43	23.09	23.37	21.82	93.55	431.06	123.75	91.92	31.83	3.888	
6,500.00	6,479.96	6,490.99	6,462.44	23.48	23.77	22.04	96.74	444.60	125.77	93.42	32.35	3.888	
6,600.00	6,579.22	6,590.96	6,561.44	23.87	24.17	22.26	99.92	458.14	127.79	94.92	32.87	3.888	
6,700.00	6,678.47	6,690.94	6,660.45	24.26	24.57	22.47	103.11	471.68	129.81	96.42	33.39	3.888	
6,800.00	6,777.73	6,790.92	6,759.46	24.65	24.98	22.67	106.30	485.22	131.84	97.93	33.91	3.888	
6,900.00	6,876.98	6,890.90	6,858.46	25.04	25.38	22.87	109.49	498.75	133.86	99.43	34.43	3.888	
7,000.00	6,976.24	6,990.88	6,957.47	25.43	25.79	23.06	112.68	512.29	135.89	100.94	34.95	3.888	
7,100.00	7,075.49	7,090.86	7,056.48	25.82	26.19	23.25	115.87	525.83	137.91	102.44	35.47	3.888	
7,200.00	7,174.75	7,190.84	7,155.48	26.21	26.60	23.43	119.05	539.37	139.94	103.95	35.99	3.888	
7,300.00	7,274.00	7,290.81	7,254.49	26.60	27.01	23.61	122.24	552.91	141.97	105.46	36.51	3.888	
7,400.00	7,373.25	7,390.79	7,353.49	27.00	27.41	23.78	125.43	566.45	144.01	106.97	37.04	3.888	
7,500.00	7,472.51	7,490.77	7,452.50	27.39	27.82	23.94	128.62	579.99	146.04	108.48	37.56	3.888	
7,600.00	7,571.76	7,590.75	7,551.51	27.79	28.23	24.10	131.81	593.52	148.07	109.99	38.08	3.888	
7,700.00	7,671.02	7,690.73	7,650.51	28.18	28.64	24.26	134.99	607.06	150.11	111.50	38.61	3.888	
7,800.00	7,770.27	7,790.71	7,749.52	28.57	29.05	24.42	138.18	620.60	152.14	113.01	39.13	3.888	
7,900.00	7,869.53	7,890.68	7,848.53	28.97	29.45	24.56	141.37	634.14	154.18	114.53	39.66	3.888	
8,000.00	7,968.78	7,990.66	7,947.53	29.36	29.86	24.71	144.56	647.68	156.22	116.04	40.18	3.888	
8,100.00	8,068.04	8,090.64	8,046.54	29.76	30.27	24.85	147.75	661.22	158.26	117.55	40.71	3.888	
8,200.00	8,167.29	8,190.62	8,145.54	30.16	30.68	24.99	150.93	674.76	160.30	119.07	41.23	3.888	
8,300.00	8,266.55	8,290.60	8,244.55	30.55	31.09	25.12	154.12	688.29	162.34	120.58	41.76	3.888	
8,400.00	8,365.80	8,390.58	8,343.56	30.95	31.50	25.25	157.31	701.83	164.38	122.10	42.28	3.888	
8,500.00	8,465.06	8,490.56	8,442.56	31.34	31.91	25.38	160.50	715.37	166.43	123.62	42.81	3.888	
8,600.00	8,564.31	8,590.53	8,541.57	31.74	32.33	25.51	163.69	728.91	168.47	125.13	43.34	3.888	
8,700.00	8,663.57	8,690.51	8,640.58	32.14	32.74	25.63	166.87	742.45	170.51	126.65	43.86	3.887	
8,800.00	8,762.82	8,790.49	8,739.58	32.54	33.15	25.75	170.06	755.99	172.56	128.17	44.39	3.887	
8,900.00	8,862.08	8,890.47	8,838.59	32.93	33.56	25.86	173.25	769.53	174.61	129.69	44.92	3.887	
9,000.00	8,961.33	8,990.45	8,937.59	33.33	33.97	25.98	176.44	783.06	176.65	131.21	45.44	3.887	
9,100.00	9,060.59	9,090.43	9,036.60	33.73	34.38	26.09	179.63	796.60	178.70	132.73	45.97	3.887	
9,200.00	9,159.84	9,190.40	9,135.61	34.13	34.80	26.19	182.82	810.14	180.75	134.25	46.50	3.887	
9,245.04	9,204.55	9,235.44	9,180.20	34.31	34.98	26.24	184.25	816.24	181.67	134.93	46.74	3.887	
9,300.00	9,259.14	9,290.37	9,234.60	34.52	35.21	26.25	186.00	823.68	183.15	136.13	47.03	3.895	
9,400.00	9,358.69	9,390.27	9,333.52	34.91	35.62	26.02	189.19	837.21	187.67	140.12	47.54	3.947	
9,500.00	9,458.45	9,490.01	9,432.30	35.28	36.03	25.47	192.37	850.71	194.54	146.50	48.04	4.049	
9,600.00	9,558.36	9,589.53	9,530.85	35.64	36.44	24.67	195.54	864.19	203.80	155.27	48.53	4.199	
9,700.00	9,658.35	9,688.76	9,629.12	35.98	36.85	23.67	198.71	877.63	215.49	166.48	49.01	4.397	
9,711.65	9,670.00	9,700.31	9,640.55	36.02	36.90	95.31	199.08	879.19	217.01	167.94	49.07	4.423	
9,800.00	9,758.35	9,787.79	9,727.19	36.32	37.26	94.34	201.87	891.04	228.71	179.22	49.49	4.621	
9,900.00	9,858.35	9,886.82	9,825.25	36.66	37.67	93.34	205.02	904.45	242.02	192.05	49.97	4.843	
10,000.00	9,958.35	9,985.85	9,923.32	37.00	38.08	92.45	208.18	917.86	255.39	204.94	50.45	5.062	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 706H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
10,100.00	10,058.35	10,086.19	10,022.69	37.33	38.50	91.64	211.37	931.40	268.78	217.82	50.96	5.275	
10,200.00	10,158.35	10,192.89	10,128.61	37.67	38.93	90.96	214.31	943.89	280.42	228.91	51.52	5.444	
10,300.00	10,258.35	10,300.24	10,235.50	38.01	39.34	90.48	216.58	953.54	289.39	237.35	52.05	5.560	
10,400.00	10,358.35	10,408.07	10,343.10	38.35	39.74	90.16	218.17	960.29	295.65	243.10	52.55	5.626	
10,500.00	10,458.35	10,516.20	10,451.15	38.69	40.12	89.99	219.07	964.09	299.16	246.14	53.02	5.643	
10,600.00	10,558.35	10,622.60	10,557.55	39.03	40.47	89.95	219.28	964.99	299.99	246.52	53.47	5.610	
10,700.00	10,658.35	10,722.60	10,657.55	39.37	40.80	89.95	219.28	964.99	299.99	246.03	53.96	5.559	
10,800.00	10,758.35	10,822.60	10,757.55	39.71	41.12	89.95	219.28	964.99	299.99	245.54	54.45	5.509	
10,900.00	10,858.35	10,922.60	10,857.55	40.05	41.45	89.95	219.28	964.99	299.99	245.05	54.94	5.460	
11,000.00	10,958.35	11,022.60	10,957.55	40.39	41.78	89.95	219.28	964.99	299.99	244.56	55.43	5.412	
11,099.65	11,058.00	11,122.25	11,057.20	40.73	42.11	89.95	219.28	964.99	299.99	244.07	55.92	5.365	
11,150.00	11,108.28	11,172.53	11,107.48	40.89	42.27	-89.95	219.28	964.99	299.98	243.83	56.15	5.342	
11,152.66	11,110.93	11,175.18	11,110.13	40.90	42.28	-90.00	219.28	964.99	299.98	243.81	56.17	5.341	
11,200.00	11,157.83	11,222.08	11,157.03	41.04	42.44	-91.19	219.28	964.99	300.05	243.68	56.36	5.324	
11,250.00	11,206.63	11,271.60	11,206.54	41.19	42.59	-93.10	218.75	964.99	300.44	243.89	56.55	5.313	
11,300.00	11,254.29	11,322.36	11,257.09	41.32	42.74	-95.12	214.34	965.03	301.24	244.53	56.71	5.312	
11,350.00	11,300.46	11,374.17	11,308.08	41.45	42.89	-97.10	205.24	965.12	302.41	245.57	56.84	5.320	
11,400.00	11,344.78	11,427.07	11,359.07	41.56	43.03	-99.05	191.23	965.25	303.93	246.99	56.94	5.337	
11,450.00	11,386.92	11,481.09	11,409.59	41.66	43.17	-100.92	172.14	965.42	305.74	248.75	56.99	5.365	
11,500.00	11,426.55	11,536.28	11,459.10	41.75	43.29	-102.71	147.82	965.64	307.80	250.82	56.98	5.402	
11,550.00	11,463.39	11,592.65	11,507.02	41.83	43.41	-104.40	118.18	965.91	310.04	253.15	56.89	5.450	
11,600.00	11,497.13	11,650.18	11,552.69	41.90	43.51	-105.97	83.22	966.23	312.37	255.65	56.72	5.507	
11,650.00	11,527.54	11,708.87	11,595.41	41.97	43.60	-107.41	43.03	966.59	314.72	258.24	56.48	5.572	
11,700.00	11,554.37	11,768.66	11,634.48	42.02	43.68	-108.69	-2.19	967.00	316.99	260.82	56.17	5.643	
11,750.00	11,577.42	11,829.47	11,669.17	42.08	43.76	-109.81	-52.10	967.46	319.12	263.29	55.82	5.717	
11,800.00	11,596.52	11,891.20	11,698.78	42.13	43.82	-110.76	-106.23	967.95	321.00	265.53	55.47	5.787	
11,850.00	11,611.52	11,953.73	11,722.65	42.20	43.89	-111.52	-163.99	968.48	322.58	267.42	55.16	5.848	
11,900.00	11,622.31	12,016.89	11,740.24	42.28	43.97	-112.08	-224.61	969.03	323.78	268.87	54.91	5.896	
11,950.00	11,628.81	12,080.50	11,751.10	42.37	44.07	-112.44	-287.25	969.60	324.57	269.79	54.78	5.925	
11,992.67	11,630.92	12,135.00	11,754.83	42.46	44.16	-112.58	-341.60	970.09	324.88	270.11	54.77	5.932	
12,000.00	11,631.00	12,144.36	11,754.95	42.48	44.18	-112.58	-350.96	970.18	324.88	270.10	54.78	5.930	
12,000.61	11,631.01	12,145.14	11,754.95	42.48	44.18	-112.58	-351.75	970.18	324.88	270.10	54.78	5.930	
12,100.00	11,632.22	12,243.42	11,756.18	42.75	44.41	-112.58	-450.02	971.08	324.89	269.78	55.11	5.896	
12,200.00	11,633.44	12,343.42	11,757.40	43.09	44.71	-112.58	-550.00	971.99	324.89	269.39	55.50	5.853	
12,300.00	11,634.66	12,443.42	11,758.62	43.50	45.08	-112.58	-649.99	972.90	324.89	268.91	55.98	5.803	
12,400.00	11,635.88	12,543.42	11,759.84	43.97	45.51	-112.58	-749.98	973.81	324.89	268.35	56.54	5.746	
12,500.00	11,637.10	12,643.42	11,761.06	44.50	46.01	-112.58	-849.97	974.72	324.89	267.72	57.17	5.683	
12,600.00	11,638.31	12,743.42	11,762.28	45.08	46.56	-112.59	-949.96	975.63	324.89	267.02	57.88	5.613	
12,700.00	11,639.53	12,843.42	11,763.50	45.71	47.16	-112.59	-1,049.95	976.54	324.89	266.24	58.65	5.539	
12,800.00	11,640.75	12,943.42	11,764.73	46.39	47.82	-112.59	-1,149.93	977.44	324.89	265.40	59.50	5.461	
12,900.00	11,641.97	13,043.42	11,765.95	47.12	48.52	-112.59	-1,249.92	978.35	324.90	264.49	60.41	5.379	
13,000.00	11,643.19	13,143.42	11,767.17	47.90	49.27	-112.59	-1,349.91	979.26	324.90	263.52	61.37	5.294	
13,100.00	11,644.41	13,243.42	11,768.39	48.72	50.07	-112.59	-1,449.90	980.17	324.90	262.49	62.40	5.206	
13,200.00	11,645.62	13,343.42	11,769.61	49.58	50.90	-112.59	-1,549.89	981.08	324.90	261.41	63.49	5.118	
13,300.00	11,646.84	13,443.42	11,770.83	50.48	51.78	-112.59	-1,649.88	981.99	324.90	260.28	64.62	5.028	
13,400.00	11,648.06	13,543.42	11,772.05	51.42	52.69	-112.59	-1,749.86	982.90	324.90	259.09	65.81	4.937	
13,500.00	11,649.28	13,643.42	11,773.27	52.40	53.64	-112.59	-1,849.85	983.81	324.90	257.86	67.04	4.846	
13,600.00	11,650.50	13,743.42	11,774.50	53.40	54.63	-112.59	-1,949.84	984.72	324.90	256.58	68.32	4.756	
13,700.00	11,651.72	13,843.42	11,775.72	54.44	55.64	-112.59	-2,049.83	985.63	324.90	255.27	69.64	4.666	
13,800.00	11,652.93	13,943.42	11,776.94	55.51	56.69	-112.59	-2,149.82	986.54	324.90	253.91	70.99	4.576	
13,900.00	11,654.15	14,043.42	11,778.16	56.60	57.76	-112.59	-2,249.81	987.45	324.90	252.51	72.39	4.488	
14,000.00	11,655.37	14,143.42	11,779.38	57.73	58.86	-112.59	-2,349.80	988.36	324.90	251.09	73.82	4.401	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 706H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
14,100.00	11,656.59	14,243.42	11,780.60	58.87	59.99	-112.59	-2,449.78	989.27	324.91	249.62	75.28	4.316	
14,200.00	11,657.81	14,343.42	11,781.82	60.04	61.14	-112.59	-2,549.77	990.18	324.91	248.13	76.77	4.232	
14,300.00	11,659.03	14,443.42	11,783.04	61.24	62.31	-112.59	-2,649.76	991.09	324.91	246.61	78.29	4.150	
14,400.00	11,660.24	14,543.42	11,784.26	62.45	63.50	-112.59	-2,749.75	992.00	324.91	245.07	79.84	4.069	
14,500.00	11,661.46	14,643.42	11,785.49	63.68	64.72	-112.59	-2,849.74	992.91	324.91	243.50	81.41	3.991	
14,600.00	11,662.68	14,743.42	11,786.71	64.94	65.95	-112.60	-2,949.73	993.82	324.91	241.90	83.01	3.914	
14,700.00	11,663.90	14,843.42	11,787.93	66.21	67.20	-112.60	-3,049.71	994.73	324.91	240.29	84.62	3.839	
14,800.00	11,665.12	14,943.42	11,789.15	67.49	68.47	-112.60	-3,149.70	995.64	324.91	238.65	86.26	3.767	
14,900.00	11,666.34	15,043.42	11,790.37	68.79	69.75	-112.60	-3,249.69	996.55	324.91	237.00	87.92	3.696	
15,000.00	11,667.55	15,143.42	11,791.59	70.11	71.05	-112.60	-3,349.68	997.45	324.91	235.32	89.59	3.627	
15,100.00	11,668.77	15,243.42	11,792.81	71.44	72.37	-112.60	-3,449.67	998.36	324.91	233.63	91.28	3.559	
15,200.00	11,669.99	15,343.42	11,794.03	72.78	73.69	-112.60	-3,549.66	999.27	324.91	231.93	92.99	3.494	
15,300.00	11,671.21	15,443.42	11,795.26	74.14	75.03	-112.60	-3,649.64	1,000.18	324.92	230.21	94.71	3.431	
15,400.00	11,672.43	15,543.42	11,796.48	75.51	76.39	-112.60	-3,749.63	1,001.09	324.92	228.47	96.44	3.369	
15,500.00	11,673.65	15,643.42	11,797.70	76.89	77.75	-112.60	-3,849.62	1,002.00	324.92	226.73	98.19	3.309	
15,600.00	11,674.86	15,743.42	11,798.92	78.28	79.12	-112.60	-3,949.61	1,002.91	324.92	224.97	99.95	3.251	
15,700.00	11,676.08	15,843.42	11,800.14	79.68	80.51	-112.60	-4,049.60	1,003.82	324.92	223.20	101.72	3.194	
15,800.00	11,677.30	15,943.42	11,801.36	81.09	81.91	-112.60	-4,149.59	1,004.73	324.92	221.42	103.50	3.139	
15,900.00	11,678.52	16,043.42	11,802.58	82.50	83.31	-112.60	-4,249.57	1,005.64	324.92	219.63	105.29	3.086	
16,000.00	11,679.74	16,143.42	11,803.80	83.93	84.72	-112.60	-4,349.56	1,006.55	324.92	217.83	107.09	3.034	
16,100.00	11,680.96	16,243.42	11,805.02	85.37	86.15	-112.60	-4,449.55	1,007.46	324.92	216.03	108.89	2.984	
16,200.00	11,682.17	16,343.42	11,806.25	86.81	87.58	-112.60	-4,549.54	1,008.37	324.92	214.22	110.71	2.935	
16,300.00	11,683.39	16,443.42	11,807.47	88.26	89.01	-112.60	-4,649.53	1,009.28	324.92	212.40	112.53	2.888	
16,400.00	11,684.61	16,543.42	11,808.69	89.72	90.46	-112.60	-4,749.52	1,010.19	324.92	210.57	114.35	2.841	
16,500.00	11,685.83	16,643.42	11,809.91	91.18	91.91	-112.60	-4,849.51	1,011.10	324.93	208.74	116.19	2.797	
16,600.00	11,687.05	16,743.42	11,811.13	92.65	93.37	-112.60	-4,949.49	1,012.01	324.93	206.90	118.03	2.753	
16,700.00	11,688.27	16,843.42	11,812.35	94.13	94.84	-112.61	-5,049.48	1,012.92	324.93	205.06	119.87	2.711	
16,800.00	11,689.48	16,943.42	11,813.57	95.61	96.31	-112.61	-5,149.47	1,013.83	324.93	203.21	121.72	2.669	
16,900.00	11,690.70	17,043.42	11,814.79	97.10	97.79	-112.61	-5,249.46	1,014.74	324.93	201.36	123.57	2.629	
17,000.00	11,691.92	17,143.42	11,816.02	98.59	99.27	-112.61	-5,349.45	1,015.65	324.93	199.50	125.43	2.591	
17,100.00	11,693.14	17,243.42	11,817.24	100.09	100.76	-112.61	-5,449.44	1,016.55	324.93	197.64	127.29	2.553	
17,200.00	11,694.36	17,343.42	11,818.46	101.59	102.25	-112.61	-5,549.42	1,017.46	324.93	195.78	129.15	2.516	
17,300.00	11,695.58	17,443.42	11,819.68	103.10	103.75	-112.61	-5,649.41	1,018.37	324.93	193.91	131.02	2.480	
17,400.00	11,696.79	17,543.42	11,820.90	104.61	105.25	-112.61	-5,749.40	1,019.28	324.93	192.05	132.89	2.445	
17,500.00	11,698.01	17,643.42	11,822.12	106.12	106.76	-112.61	-5,849.39	1,020.19	324.93	190.18	134.76	2.411	
17,600.00	11,699.23	17,743.42	11,823.34	107.64	108.27	-112.61	-5,949.38	1,021.10	324.93	188.31	136.63	2.378	
17,700.00	11,700.45	17,843.42	11,824.56	109.17	109.78	-112.61	-6,049.37	1,022.01	324.94	186.43	138.50	2.346	
17,800.00	11,701.67	17,943.42	11,825.78	110.69	111.30	-112.61	-6,149.35	1,022.92	324.94	184.56	140.38	2.315	
17,900.00	11,702.89	18,043.42	11,827.01	112.23	112.83	-112.61	-6,249.34	1,023.83	324.94	182.68	142.25	2.284	
18,000.00	11,704.10	18,143.42	11,828.23	113.76	114.35	-112.61	-6,349.33	1,024.74	324.94	180.81	144.13	2.254	
18,100.00	11,705.32	18,243.42	11,829.45	115.30	115.88	-112.61	-6,449.32	1,025.65	324.94	178.93	146.01	2.225	
18,200.00	11,706.54	18,343.42	11,830.67	116.84	117.42	-112.61	-6,549.31	1,026.56	324.94	177.05	147.89	2.197	
18,300.00	11,707.76	18,443.42	11,831.89	118.38	118.95	-112.61	-6,649.30	1,027.47	324.94	175.18	149.76	2.170	
18,400.00	11,708.98	18,543.42	11,833.11	119.93	120.49	-112.61	-6,749.29	1,028.38	324.94	173.30	151.64	2.143	
18,500.00	11,710.20	18,643.42	11,834.33	121.48	122.04	-112.61	-6,849.27	1,029.29	324.94	171.42	153.52	2.117	
18,600.00	11,711.41	18,743.42	11,835.55	123.03	123.58	-112.61	-6,949.26	1,030.20	324.94	169.55	155.40	2.091	
18,700.00	11,712.63	18,843.42	11,836.78	124.59	125.13	-112.61	-7,049.25	1,031.11	324.94	167.67	157.27	2.066	
18,800.00	11,713.85	18,943.42	11,838.00	126.14	126.68	-112.62	-7,149.24	1,032.02	324.94	165.80	159.15	2.042	
18,900.00	11,715.07	19,043.42	11,839.22	127.70	128.23	-112.62	-7,249.23	1,032.93	324.95	163.92	161.02	2.018	
19,000.00	11,716.29	19,143.42	11,840.44	129.27	129.79	-112.62	-7,349.22	1,033.84	324.95	162.05	162.90	1.995	
19,100.00	11,717.51	19,243.42	11,841.66	130.83	131.35	-112.62	-7,449.20	1,034.75	324.95	160.18	164.77	1.972	
19,200.00	11,718.72	19,343.42	11,842.88	132.40	132.91	-112.62	-7,549.19	1,035.65	324.95	158.31	166.64	1.950	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Master/Triumph Fed Com - Triumph Fed Com 706H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
19,300.00	11,719.94	19,443.42	11,844.10	133.96	134.47	-112.62	-7,649.18	1,036.56	324.95	156.44	168.51	1.928	
19,400.00	11,721.16	19,543.42	11,845.32	135.54	136.04	-112.62	-7,749.17	1,037.47	324.95	154.57	170.38	1.907	
19,500.00	11,722.38	19,643.42	11,846.54	137.11	137.60	-112.62	-7,849.16	1,038.38	324.95	152.71	172.24	1.887	
19,600.00	11,723.60	19,743.42	11,847.77	138.68	139.17	-112.62	-7,949.15	1,039.29	324.95	150.85	174.11	1.866	
19,700.00	11,724.82	19,843.42	11,848.99	140.26	140.74	-112.62	-8,049.13	1,040.20	324.95	148.99	175.97	1.847	
19,800.00	11,726.03	19,943.42	11,850.21	141.84	142.32	-112.62	-8,149.12	1,041.11	324.95	147.13	177.82	1.827	
19,900.00	11,727.25	20,043.42	11,851.43	143.42	143.89	-112.62	-8,249.11	1,042.02	324.95	145.27	179.68	1.809	
20,000.00	11,728.47	20,143.42	11,852.65	145.00	145.47	-112.62	-8,349.10	1,042.93	324.95	143.42	181.53	1.790	
20,100.00	11,729.69	20,243.42	11,853.87	146.58	147.05	-112.62	-8,449.09	1,043.84	324.96	141.57	183.38	1.772	
20,200.00	11,730.91	20,343.42	11,855.09	148.16	148.63	-112.62	-8,549.08	1,044.75	324.96	139.72	185.23	1.754	
20,300.00	11,732.13	20,443.42	11,856.31	149.75	150.21	-112.62	-8,649.06	1,045.66	324.96	137.88	187.08	1.737	
20,400.00	11,733.34	20,543.42	11,857.54	151.34	151.79	-112.62	-8,749.05	1,046.57	324.96	136.04	188.92	1.720	
20,500.00	11,734.56	20,643.42	11,858.76	152.93	153.37	-112.62	-8,849.04	1,047.48	324.96	134.20	190.76	1.704	
20,600.00	11,735.78	20,743.42	11,859.98	154.52	154.96	-112.62	-8,949.03	1,048.39	324.96	132.37	192.59	1.687	
20,700.00	11,737.00	20,843.42	11,861.20	156.11	156.55	-112.62	-9,049.02	1,049.30	324.96	130.54	194.43	1.671	
20,800.00	11,738.22	20,943.42	11,862.42	157.70	158.13	-112.63	-9,149.01	1,050.21	324.96	128.71	196.25	1.656	
20,900.00	11,739.43	21,043.42	11,863.64	159.29	159.72	-112.63	-9,249.00	1,051.12	324.96	126.88	198.08	1.641	
21,000.00	11,740.65	21,143.42	11,864.86	160.89	161.32	-112.63	-9,348.98	1,052.03	324.96	125.06	199.90	1.626	
21,100.00	11,741.87	21,243.42	11,866.08	162.49	162.91	-112.63	-9,448.97	1,052.94	324.96	123.25	201.72	1.611	
21,200.00	11,743.09	21,343.42	11,867.30	164.08	164.50	-112.63	-9,548.96	1,053.85	324.96	121.43	203.53	1.597	
21,300.00	11,744.31	21,443.42	11,868.53	165.68	166.10	-112.63	-9,648.95	1,054.75	324.97	119.63	205.34	1.583	
21,400.00	11,745.53	21,543.42	11,869.75	167.28	167.69	-112.63	-9,748.94	1,055.66	324.97	117.82	207.15	1.569	
21,500.00	11,746.74	21,643.42	11,870.97	168.88	169.29	-112.63	-9,848.93	1,056.57	324.97	116.02	208.95	1.555	
21,600.00	11,747.96	21,743.42	11,872.19	170.48	170.89	-112.63	-9,948.91	1,057.48	324.97	114.22	210.74	1.542	
21,700.00	11,749.18	21,843.42	11,873.41	172.09	172.49	-112.63	-10,048.90	1,058.39	324.97	112.43	212.54	1.529	
21,786.90	11,750.24	21,930.33	11,874.47	173.48	173.88	-112.63	-10,135.79	1,059.18	324.97	110.88	214.09	1.518 SF	

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Prevail/Master Fed Com - Master Fed Com 704H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
0.00	0.00	0.00	0.00	0.00	0.00	-90.64	-16.15	-1,447.72	1,447.88				
100.00	100.00	85.80	85.80	0.13	0.11	-90.64	-16.15	-1,447.72	1,447.81	1,447.64	0.17	8,757.756	
200.00	200.00	185.80	185.80	0.48	0.43	-90.64	-16.15	-1,447.72	1,447.81	1,447.16	0.65	2,229.477	
300.00	300.00	285.80	285.80	0.84	0.79	-90.64	-16.15	-1,447.72	1,447.81	1,446.65	1.16	1,252.526	
400.00	400.00	385.80	385.80	1.20	1.15	-90.64	-16.15	-1,447.72	1,447.81	1,446.15	1.66	870.760	
500.00	500.00	485.80	485.80	1.56	1.51	-90.64	-16.15	-1,447.72	1,447.81	1,445.64	2.17	667.329	
600.00	600.00	585.80	585.80	1.92	1.87	-90.64	-16.15	-1,447.72	1,447.81	1,445.13	2.68	540.942	
700.00	700.00	685.80	685.80	2.28	2.23	-90.64	-16.15	-1,447.72	1,447.81	1,444.63	3.18	454.803	
800.00	800.00	785.80	785.80	2.63	2.58	-90.64	-16.15	-1,447.72	1,447.81	1,444.12	3.69	392.328	
900.00	900.00	885.80	885.80	2.99	2.94	-90.64	-16.15	-1,447.72	1,447.81	1,443.61	4.20	344.944	
1,000.00	1,000.00	985.80	985.80	3.35	3.30	-90.64	-16.15	-1,447.72	1,447.81	1,443.11	4.70	307.771	
1,100.00	1,100.00	1,085.80	1,085.80	3.71	3.66	-90.64	-16.15	-1,447.72	1,447.81	1,442.60	5.21	277.831	
1,200.00	1,200.00	1,185.80	1,185.80	4.07	4.02	-90.64	-16.15	-1,447.72	1,447.81	1,442.09	5.72	253.199	
1,300.00	1,300.00	1,285.80	1,285.80	4.43	4.38	-90.64	-16.15	-1,447.72	1,447.81	1,441.59	6.23	232.580	
1,400.00	1,400.00	1,385.80	1,385.80	4.79	4.73	-90.64	-16.15	-1,447.72	1,447.81	1,441.08	6.73	215.065	
1,500.00	1,500.00	1,485.80	1,485.80	5.14	5.09	-90.64	-16.15	-1,447.72	1,447.81	1,440.57	7.24	200.004	
1,600.00	1,600.00	1,585.80	1,585.80	5.50	5.45	-90.64	-16.15	-1,447.72	1,447.81	1,440.06	7.75	186.914	
1,700.00	1,700.00	1,685.80	1,685.80	5.86	5.81	-90.64	-16.15	-1,447.72	1,447.81	1,439.56	8.25	175.433	
1,800.00	1,800.00	1,785.80	1,785.80	6.22	6.17	-90.64	-16.15	-1,447.72	1,447.81	1,439.05	8.76	165.280	
1,900.00	1,900.00	1,885.80	1,885.80	6.58	6.53	-90.64	-16.15	-1,447.72	1,447.81	1,438.54	9.27	156.238	
2,000.00	2,000.00	1,985.80	1,985.80	6.94	6.89	-90.64	-16.15	-1,447.72	1,447.81	1,438.04	9.77	148.134	
2,100.00	2,100.00	2,085.80	2,085.80	7.29	7.24	-90.64	-16.15	-1,447.72	1,447.81	1,437.53	10.28	140.829	
2,200.00	2,200.00	2,185.80	2,185.80	7.65	7.60	-90.64	-16.15	-1,447.72	1,447.81	1,437.02	10.79	134.211	
2,300.00	2,300.00	2,285.80	2,285.80	8.01	7.96	-90.64	-16.15	-1,447.72	1,447.81	1,436.52	11.29	128.187	
2,400.00	2,400.00	2,385.80	2,385.80	8.37	8.32	-90.64	-16.15	-1,447.72	1,447.81	1,436.01	11.80	122.681	
2,500.00	2,500.00	2,485.80	2,485.80	8.73	8.68	-90.64	-16.15	-1,447.72	1,447.81	1,435.50	12.31	117.628	
2,600.00	2,600.00	2,585.80	2,585.80	9.09	9.04	-90.64	-16.15	-1,447.72	1,447.81	1,434.99	12.82	112.974	
2,700.00	2,700.00	2,685.80	2,685.80	9.45	9.39	-90.64	-16.15	-1,447.72	1,447.81	1,434.49	13.32	108.675	
2,800.00	2,800.00	2,785.80	2,785.80	9.80	9.75	-90.64	-16.15	-1,447.72	1,447.81	1,433.98	13.83	104.692	
2,900.00	2,900.00	2,885.80	2,885.80	10.16	10.11	-90.64	-16.15	-1,447.72	1,447.81	1,433.47	14.34	100.990	
3,000.00	3,000.00	2,985.80	2,985.80	10.52	10.47	-90.64	-16.15	-1,447.72	1,447.81	1,432.97	14.84	97.540	
3,100.00	3,100.00	3,085.80	3,085.80	10.88	10.83	-90.64	-16.15	-1,447.72	1,447.81	1,432.46	15.35	94.319	
3,200.00	3,200.00	3,185.80	3,185.80	11.24	11.19	-90.64	-16.15	-1,447.72	1,447.81	1,431.95	15.86	91.304	
3,300.00	3,300.00	3,333.67	3,333.64	11.60	11.71	-90.61	-15.36	-1,445.52	1,446.39	1,429.92	16.47	87.816	
3,400.00	3,400.00	3,489.03	3,488.75	11.96	12.25	-90.50	-12.48	-1,437.43	1,441.16	1,424.09	17.08	84.391	
3,500.00	3,500.00	3,643.43	3,642.44	12.31	12.79	-90.30	-7.51	-1,423.51	1,432.12	1,414.46	17.66	81.091	
3,600.00	3,599.99	3,751.09	3,749.30	12.67	13.18	-161.96	-3.12	-1,411.21	1,421.89	1,403.73	18.16	78.282	
3,700.00	3,699.91	3,850.75	3,848.21	13.01	13.54	-161.88	0.96	-1,399.77	1,414.11	1,395.46	18.65	75.810	
3,800.00	3,799.69	3,950.58	3,947.31	13.36	13.90	-161.83	5.05	-1,388.31	1,408.82	1,389.67	19.14	73.587	
3,900.00	3,899.27	4,050.53	4,046.51	13.71	14.26	-161.79	9.15	-1,376.84	1,406.01	1,386.38	19.64	71.596	
3,962.84	3,961.71	4,113.37	4,108.88	13.94	14.49	-161.78	11.72	-1,369.62	1,405.52	1,385.57	19.95	70.457	CC
3,966.61	3,965.45	4,117.14	4,112.62	13.95	14.50	-161.78	11.88	-1,369.19	1,405.52	1,385.56	19.97	70.391	
4,000.00	3,998.59	4,150.53	4,145.76	14.07	14.63	-161.77	13.25	-1,365.36	1,405.56	1,385.42	20.13	69.815	
4,100.00	4,097.85	4,250.53	4,245.02	14.42	15.00	-161.76	17.34	-1,353.88	1,405.65	1,385.02	20.63	68.141	
4,200.00	4,197.10	4,350.53	4,344.27	14.78	15.37	-161.75	21.44	-1,342.40	1,405.74	1,384.62	21.13	66.541	
4,300.00	4,296.36	4,450.53	4,443.52	15.15	15.74	-161.74	25.54	-1,330.92	1,405.84	1,384.21	21.62	65.011	
4,400.00	4,395.61	4,550.53	4,542.78	15.51	16.11	-161.73	29.64	-1,319.44	1,405.93	1,383.81	22.12	63.546	
4,500.00	4,494.87	4,650.53	4,642.03	15.88	16.49	-161.71	33.73	-1,307.96	1,406.03	1,383.40	22.63	62.143	
4,600.00	4,594.12	4,750.53	4,741.28	16.24	16.86	-161.70	37.83	-1,296.48	1,406.12	1,382.99	23.13	60.797	
4,700.00	4,693.38	4,850.53	4,840.54	16.61	17.24	-161.69	41.93	-1,285.00	1,406.21	1,382.58	23.63	59.506	
4,800.00	4,792.63	4,950.53	4,939.79	16.98	17.62	-161.68	46.03	-1,273.52	1,406.31	1,382.17	24.14	58.267	
4,900.00	4,891.88	5,050.53	5,039.05	17.36	18.00	-161.67	50.12	-1,262.04	1,406.40	1,381.76	24.64	57.076	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Prevail/Master Fed Com - Master Fed Com 704H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
5,000.00	4,991.14	5,150.53	5,138.30	17.73	18.38	-161.66	54.22	-1,250.56	1,406.50	1,381.35	25.15	55.931	
5,100.00	5,090.39	5,250.52	5,237.55	18.11	18.77	-161.64	58.32	-1,239.08	1,406.59	1,380.94	25.65	54.830	
5,200.00	5,189.65	5,350.52	5,336.81	18.48	19.15	-161.63	62.42	-1,227.60	1,406.69	1,380.52	26.16	53.770	
5,300.00	5,288.90	5,450.52	5,436.06	18.86	19.53	-161.62	66.51	-1,216.12	1,406.78	1,380.11	26.67	52.748	
5,400.00	5,388.16	5,550.52	5,535.32	19.24	19.92	-161.61	70.61	-1,204.64	1,406.87	1,379.70	27.18	51.764	
5,500.00	5,487.41	5,650.52	5,634.57	19.62	20.31	-161.60	74.71	-1,193.16	1,406.97	1,379.28	27.69	50.815	
5,600.00	5,586.67	5,750.52	5,733.82	20.00	20.69	-161.59	78.80	-1,181.68	1,407.06	1,378.87	28.20	49.898	
5,700.00	5,685.92	5,850.52	5,833.08	20.39	21.08	-161.57	82.90	-1,170.20	1,407.16	1,378.45	28.71	49.014	
5,800.00	5,785.18	5,950.52	5,932.33	20.77	21.47	-161.56	87.00	-1,158.72	1,407.25	1,378.03	29.22	48.159	
5,900.00	5,884.43	6,050.52	6,031.58	21.15	21.86	-161.55	91.10	-1,147.24	1,407.35	1,377.62	29.73	47.333	
6,000.00	5,983.69	6,150.52	6,130.84	21.54	22.25	-161.54	95.19	-1,135.76	1,407.44	1,377.20	30.25	46.535	
6,100.00	6,082.94	6,250.52	6,230.09	21.93	22.64	-161.53	99.29	-1,124.28	1,407.54	1,376.78	30.76	45.762	
6,200.00	6,182.20	6,350.52	6,329.35	22.31	23.03	-161.52	103.39	-1,112.80	1,407.63	1,376.36	31.27	45.014	
6,300.00	6,281.45	6,450.52	6,428.60	22.70	23.42	-161.50	107.49	-1,101.32	1,407.73	1,375.94	31.78	44.289	
6,400.00	6,380.71	6,550.52	6,527.85	23.09	23.81	-161.49	111.58	-1,089.84	1,407.82	1,375.53	32.30	43.587	
6,500.00	6,479.96	6,650.52	6,627.11	23.48	24.21	-161.48	115.68	-1,078.36	1,407.92	1,375.11	32.81	42.907	
6,600.00	6,579.22	6,750.52	6,726.36	23.87	24.60	-161.47	119.78	-1,066.88	1,408.01	1,374.69	33.33	42.247	
6,700.00	6,678.47	6,850.52	6,825.62	24.26	24.99	-161.46	123.88	-1,055.40	1,408.11	1,374.27	33.84	41.606	
6,800.00	6,777.73	6,950.52	6,924.87	24.65	25.39	-161.45	127.97	-1,043.91	1,408.21	1,373.85	34.36	40.985	
6,900.00	6,876.98	7,050.52	7,024.12	25.04	25.78	-161.43	132.07	-1,032.43	1,408.30	1,373.43	34.88	40.381	
7,000.00	6,976.24	7,150.52	7,123.38	25.43	26.17	-161.42	136.17	-1,020.95	1,408.40	1,373.01	35.39	39.795	
7,100.00	7,075.49	7,250.52	7,222.63	25.82	26.57	-161.41	140.27	-1,009.47	1,408.49	1,372.58	35.91	39.225	
7,200.00	7,174.75	7,350.52	7,321.88	26.21	26.96	-161.40	144.36	-997.99	1,408.59	1,372.16	36.42	38.671	
7,300.00	7,274.00	7,450.51	7,421.14	26.60	27.36	-161.39	148.46	-986.51	1,408.68	1,371.74	36.94	38.132	
7,400.00	7,373.25	7,550.51	7,520.39	27.00	27.76	-161.38	152.56	-975.03	1,408.78	1,371.32	37.46	37.608	
7,500.00	7,472.51	7,650.51	7,619.65	27.39	28.15	-161.36	156.66	-963.55	1,408.88	1,370.90	37.98	37.098	
7,600.00	7,571.76	7,750.51	7,718.90	27.79	28.55	-161.35	160.75	-952.07	1,408.97	1,370.48	38.49	36.602	
7,700.00	7,671.02	7,850.51	7,818.15	28.18	28.94	-161.34	164.85	-940.59	1,409.07	1,370.05	39.01	36.118	
7,800.00	7,770.27	7,950.51	7,917.41	28.57	29.34	-161.33	168.95	-929.11	1,409.16	1,369.63	39.53	35.647	
7,900.00	7,869.53	8,050.51	8,016.66	28.97	29.74	-161.32	173.04	-917.63	1,409.26	1,369.21	40.05	35.188	
8,000.00	7,968.78	8,150.51	8,115.92	29.36	30.14	-161.31	177.14	-906.15	1,409.36	1,368.79	40.57	34.740	
8,100.00	8,068.04	8,250.51	8,215.17	29.76	30.53	-161.30	181.24	-894.67	1,409.45	1,368.36	41.09	34.304	
8,200.00	8,167.29	8,350.51	8,314.42	30.16	30.93	-161.28	185.34	-883.19	1,409.55	1,367.94	41.61	33.878	
8,300.00	8,266.55	8,450.51	8,413.68	30.55	31.33	-161.27	189.43	-871.71	1,409.64	1,367.52	42.13	33.463	
8,400.00	8,365.80	8,550.51	8,512.93	30.95	31.73	-161.26	193.53	-860.23	1,409.74	1,367.10	42.65	33.057	
8,500.00	8,465.06	8,642.01	8,603.76	31.34	32.09	-161.25	197.25	-849.80	1,409.94	1,366.78	43.15	32.674	
8,600.00	8,564.31	8,716.25	8,677.58	31.74	32.38	-161.26	199.90	-842.40	1,411.55	1,367.92	43.62	32.357	
8,700.00	8,663.57	8,800.00	8,761.02	32.14	32.70	-161.29	202.30	-835.68	1,415.03	1,370.92	44.11	32.083	
8,800.00	8,762.82	8,864.47	8,825.35	32.54	32.94	-161.34	203.73	-831.67	1,420.24	1,375.71	44.53	31.895	
8,900.00	8,862.08	8,938.32	8,899.12	32.93	33.21	-161.40	204.91	-828.34	1,427.32	1,382.35	44.96	31.746	
9,000.00	8,961.33	9,011.94	8,972.70	33.33	33.47	-161.49	205.62	-826.36	1,436.20	1,390.82	45.38	31.649	
9,100.00	9,060.59	9,085.62	9,046.39	33.73	33.72	-161.59	205.85	-825.72	1,446.90	1,401.11	45.78	31.603	
9,200.00	9,159.84	9,184.88	9,145.64	34.13	34.05	-161.74	205.85	-825.72	1,458.47	1,412.19	46.28	31.512	
9,245.04	9,204.55	9,229.59	9,190.35	34.31	34.20	-161.81	205.85	-825.72	1,463.69	1,417.18	46.51	31.472	
9,300.00	9,259.14	9,284.18	9,244.94	34.52	34.39	-161.92	205.85	-825.72	1,469.68	1,422.90	46.78	31.415	
9,400.00	9,358.69	9,383.73	9,344.49	34.91	34.72	-162.07	205.85	-825.72	1,478.68	1,431.40	47.28	31.274	
9,500.00	9,458.45	9,483.49	9,444.25	35.28	35.06	-162.18	205.85	-825.72	1,485.19	1,437.41	47.78	31.084	
9,600.00	9,558.36	9,583.40	9,544.16	35.64	35.40	-162.25	205.85	-825.72	1,489.22	1,440.95	48.28	30.847	
9,700.00	9,658.35	9,683.38	9,644.15	35.98	35.74	-162.28	205.85	-825.72	1,490.76	1,441.99	48.77	30.565	
9,711.65	9,670.00	9,695.04	9,655.80	36.02	35.78	-90.51	205.85	-825.72	1,490.78	1,441.95	48.83	30.530	
9,800.00	9,758.35	9,783.38	9,744.15	36.32	36.08	-90.51	205.85	-825.72	1,490.78	1,441.51	49.27	30.260	
9,900.00	9,858.35	9,883.38	9,844.15	36.66	36.41	-90.51	205.85	-825.72	1,490.78	1,441.02	49.76	29.961	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Prevail/Master Fed Com - Master Fed Com 704H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
10,000.00	9,958.35	9,983.38	9,944.15	37.00	36.75	-90.51	205.85	-825.72	1,490.78	1,440.53	50.25	29.667	
10,100.00	10,058.35	10,083.38	10,044.15	37.33	37.09	-90.51	205.85	-825.72	1,490.78	1,440.03	50.74	29.379	
10,200.00	10,158.35	10,183.38	10,144.15	37.67	37.44	-90.51	205.85	-825.72	1,490.78	1,439.54	51.24	29.096	
10,300.00	10,258.35	10,283.38	10,244.15	38.01	37.78	-90.51	205.85	-825.72	1,490.78	1,439.05	51.73	28.818	
10,400.00	10,358.35	10,383.38	10,344.15	38.35	38.12	-90.51	205.85	-825.72	1,490.78	1,438.55	52.22	28.546	
10,500.00	10,458.35	10,483.38	10,444.15	38.69	38.46	-90.51	205.85	-825.72	1,490.78	1,438.06	52.72	28.278	
10,600.00	10,558.35	10,583.38	10,544.15	39.03	38.80	-90.51	205.85	-825.72	1,490.78	1,437.57	53.21	28.016	
10,700.00	10,658.35	10,683.38	10,644.15	39.37	39.14	-90.51	205.85	-825.72	1,490.78	1,437.07	53.71	27.758	
10,800.00	10,758.35	10,783.38	10,744.15	39.71	39.48	-90.51	205.85	-825.72	1,490.78	1,436.58	54.20	27.504	
10,900.00	10,858.35	10,883.38	10,844.15	40.05	39.83	-90.51	205.85	-825.72	1,490.78	1,436.08	54.70	27.256	
11,000.00	10,958.35	10,983.38	10,944.15	40.39	40.17	-90.51	205.85	-825.72	1,490.78	1,435.59	55.19	27.011	
11,099.65	11,058.00	11,083.04	11,043.80	40.73	40.51	-90.51	205.85	-825.72	1,490.78	1,435.09	55.69	26.772	
11,099.79	11,058.13	11,083.17	11,043.93	40.73	40.51	-90.51	205.85	-825.72	1,490.78	1,435.09	55.69	26.771	
11,150.00	11,108.28	11,133.32	11,094.08	40.89	40.69	90.10	205.85	-825.72	1,490.78	1,434.85	55.93	26.655	
11,200.00	11,157.83	11,182.87	11,143.63	41.04	40.86	90.35	205.85	-825.72	1,490.81	1,434.64	56.17	26.543	
11,250.00	11,206.63	11,231.66	11,192.43	41.19	41.02	90.74	205.85	-825.72	1,490.91	1,434.52	56.40	26.436	
11,300.00	11,254.29	11,279.33	11,240.09	41.32	41.19	91.27	205.85	-825.72	1,491.19	1,434.57	56.62	26.335	
11,350.00	11,300.46	11,329.76	11,290.47	41.45	41.35	91.89	203.88	-825.70	1,491.70	1,434.85	56.85	26.240	
11,400.00	11,344.78	11,382.14	11,342.39	41.56	41.51	92.51	197.16	-825.65	1,492.41	1,435.34	57.07	26.151	
11,450.00	11,386.92	11,436.43	11,395.34	41.66	41.66	93.13	185.23	-825.55	1,493.31	1,436.03	57.28	26.068	
11,500.00	11,426.55	11,492.82	11,448.87	41.75	41.81	93.73	167.59	-825.41	1,494.38	1,436.89	57.49	25.993	
11,550.00	11,463.39	11,551.44	11,502.40	41.83	41.95	94.33	143.77	-825.22	1,495.58	1,437.89	57.69	25.924	
11,600.00	11,497.13	11,612.43	11,555.22	41.90	42.08	94.90	113.31	-824.98	1,496.88	1,439.01	57.88	25.863	
11,650.00	11,527.54	11,675.89	11,606.41	41.97	42.20	95.45	75.86	-824.68	1,498.24	1,440.19	58.05	25.809	
11,700.00	11,554.37	11,741.86	11,654.89	42.02	42.31	95.96	31.18	-824.32	1,499.60	1,441.38	58.22	25.758	
11,750.00	11,577.42	11,810.31	11,699.42	42.08	42.40	96.42	-20.75	-823.90	1,500.90	1,442.52	58.38	25.709	
11,800.00	11,596.52	11,881.10	11,738.63	42.13	42.48	96.82	-79.64	-823.43	1,502.09	1,443.54	58.55	25.656	
11,850.00	11,611.52	11,953.99	11,771.09	42.20	42.56	97.15	-144.83	-822.90	1,503.10	1,444.38	58.72	25.597	
11,900.00	11,622.31	12,028.60	11,795.48	42.28	42.65	97.40	-215.29	-822.34	1,503.89	1,444.97	58.92	25.526	
11,950.00	11,628.81	12,104.46	11,810.69	42.37	42.77	97.56	-289.55	-821.74	1,504.41	1,445.27	59.13	25.441	
11,992.67	11,630.92	12,169.75	11,815.82	42.46	42.90	97.61	-354.60	-821.22	1,504.62	1,445.28	59.34	25.356	
12,000.00	11,631.00	12,178.86	11,815.96	42.48	42.92	97.61	-363.71	-821.14	1,504.63	1,445.26	59.37	25.343	
12,100.00	11,632.22	12,278.86	11,817.24	42.75	43.19	97.61	-463.70	-820.34	1,504.74	1,444.95	59.79	25.168	
12,200.00	11,633.44	12,378.86	11,818.53	43.09	43.53	97.61	-563.69	-819.53	1,504.85	1,444.57	60.29	24.961	
12,300.00	11,634.66	12,478.86	11,819.81	43.50	43.93	97.61	-663.68	-818.73	1,504.97	1,444.09	60.88	24.722	
12,400.00	11,635.88	12,578.86	11,821.09	43.97	44.39	97.62	-763.67	-817.93	1,505.08	1,443.54	61.54	24.456	
12,500.00	11,637.10	12,678.86	11,822.37	44.50	44.91	97.62	-863.66	-817.12	1,505.20	1,442.91	62.29	24.165	
12,600.00	11,638.31	12,778.86	11,823.65	45.08	45.48	97.62	-963.64	-816.32	1,505.31	1,442.20	63.11	23.852	
12,700.00	11,639.53	12,878.86	11,824.94	45.71	46.11	97.62	-1,063.63	-815.52	1,505.42	1,441.42	64.01	23.520	
12,800.00	11,640.75	12,978.86	11,826.22	46.39	46.78	97.62	-1,163.62	-814.71	1,505.54	1,440.56	64.97	23.172	
12,900.00	11,641.97	13,078.86	11,827.50	47.12	47.50	97.62	-1,263.61	-813.91	1,505.65	1,439.64	66.01	22.810	
13,000.00	11,643.19	13,178.86	11,828.78	47.90	48.27	97.63	-1,363.60	-813.11	1,505.76	1,438.66	67.11	22.439	
13,100.00	11,644.41	13,278.86	11,830.06	48.72	49.08	97.63	-1,463.59	-812.30	1,505.88	1,437.61	68.27	22.059	
13,200.00	11,645.62	13,378.86	11,831.35	49.58	49.93	97.63	-1,563.57	-811.50	1,505.99	1,436.51	69.48	21.674	
13,300.00	11,646.84	13,478.86	11,832.63	50.48	50.82	97.63	-1,663.56	-810.69	1,506.10	1,435.35	70.76	21.285	
13,400.00	11,648.06	13,578.86	11,833.91	51.42	51.75	97.63	-1,763.55	-809.89	1,506.22	1,434.14	72.08	20.896	
13,500.00	11,649.28	13,678.86	11,835.19	52.40	52.71	97.64	-1,863.54	-809.09	1,506.33	1,432.87	73.46	20.506	
13,600.00	11,650.50	13,778.86	11,836.47	53.40	53.70	97.64	-1,963.53	-808.28	1,506.45	1,431.57	74.88	20.118	
13,700.00	11,651.72	13,878.86	11,837.75	54.44	54.73	97.64	-2,063.52	-807.48	1,506.56	1,430.21	76.35	19.733	
13,800.00	11,652.93	13,978.86	11,839.04	55.51	55.79	97.64	-2,163.51	-806.68	1,506.67	1,428.82	77.85	19.353	
13,900.00	11,654.15	14,078.86	11,840.32	56.60	56.88	97.64	-2,263.49	-805.87	1,506.79	1,427.39	79.40	18.977	
14,000.00	11,655.37	14,178.86	11,841.60	57.73	57.99	97.64	-2,363.48	-805.07	1,506.90	1,425.92	80.98	18.607	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Prevail/Master Fed Com - Master Fed Com 704H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
14,100.00	11,656.59	14,278.86	11,842.88	58.87	59.13	97.65	-2,463.47	-804.26	1,507.01	1,424.41	82.60	18.244	
14,200.00	11,657.81	14,378.86	11,844.16	60.04	60.29	97.65	-2,563.46	-803.46	1,507.13	1,422.87	84.25	17.888	
14,300.00	11,659.03	14,478.86	11,845.45	61.24	61.47	97.65	-2,663.45	-802.66	1,507.24	1,421.31	85.93	17.539	
14,400.00	11,660.24	14,578.86	11,846.73	62.45	62.68	97.65	-2,763.44	-801.85	1,507.35	1,419.71	87.65	17.198	
14,500.00	11,661.46	14,678.86	11,848.01	63.68	63.90	97.65	-2,863.42	-801.05	1,507.47	1,418.08	89.38	16.865	
14,600.00	11,662.68	14,778.86	11,849.29	64.94	65.15	97.66	-2,963.41	-800.25	1,507.58	1,416.43	91.15	16.540	
14,700.00	11,663.90	14,878.86	11,850.57	66.21	66.41	97.66	-3,063.40	-799.44	1,507.70	1,414.76	92.94	16.223	
14,800.00	11,665.12	14,978.86	11,851.86	67.49	67.69	97.66	-3,163.39	-798.64	1,507.81	1,413.06	94.75	15.914	
14,900.00	11,666.34	15,078.86	11,853.14	68.79	68.98	97.66	-3,263.38	-797.84	1,507.92	1,411.34	96.58	15.613	
15,000.00	11,667.55	15,178.86	11,854.42	70.11	70.29	97.66	-3,363.37	-797.03	1,508.04	1,409.60	98.44	15.320	
15,100.00	11,668.77	15,278.86	11,855.70	71.44	71.61	97.67	-3,463.36	-796.23	1,508.15	1,407.84	100.31	15.035	
15,200.00	11,669.99	15,378.86	11,856.98	72.78	72.95	97.67	-3,563.34	-795.42	1,508.26	1,406.06	102.20	14.758	
15,300.00	11,671.21	15,478.86	11,858.27	74.14	74.30	97.67	-3,663.33	-794.62	1,508.38	1,404.27	104.11	14.488	
15,400.00	11,672.43	15,578.86	11,859.55	75.51	75.66	97.67	-3,763.32	-793.82	1,508.49	1,402.45	106.04	14.226	
15,500.00	11,673.65	15,678.86	11,860.83	76.89	77.03	97.67	-3,863.31	-793.01	1,508.61	1,400.63	107.98	13.971	
15,600.00	11,674.86	15,778.86	11,862.11	78.28	78.42	97.67	-3,963.30	-792.21	1,508.72	1,398.79	109.93	13.724	
15,700.00	11,676.08	15,878.86	11,863.39	79.68	79.81	97.68	-4,063.29	-791.41	1,508.83	1,396.93	111.90	13.483	
15,800.00	11,677.30	15,978.86	11,864.68	81.09	81.22	97.68	-4,163.28	-790.60	1,508.95	1,395.06	113.89	13.250	
15,900.00	11,678.52	16,078.86	11,865.96	82.50	82.63	97.68	-4,263.26	-789.80	1,509.06	1,393.18	115.88	13.023	
16,000.00	11,679.74	16,178.86	11,867.24	83.93	84.05	97.68	-4,363.25	-788.99	1,509.17	1,391.29	117.89	12.802	
16,100.00	11,680.96	16,278.86	11,868.52	85.37	85.48	97.68	-4,463.24	-788.19	1,509.29	1,389.38	119.91	12.587	
16,200.00	11,682.17	16,378.86	11,869.80	86.81	86.92	97.69	-4,563.23	-787.39	1,509.40	1,387.47	121.93	12.379	
16,300.00	11,683.39	16,478.86	11,871.09	88.26	88.36	97.69	-4,663.22	-786.58	1,509.51	1,385.54	123.97	12.176	
16,400.00	11,684.61	16,578.86	11,872.37	89.72	89.82	97.69	-4,763.21	-785.78	1,509.63	1,383.61	126.02	11.979	
16,500.00	11,685.83	16,678.86	11,873.65	91.18	91.28	97.69	-4,863.19	-784.98	1,509.74	1,381.66	128.08	11.787	
16,600.00	11,687.05	16,778.86	11,874.93	92.65	92.74	97.69	-4,963.18	-784.17	1,509.86	1,379.71	130.15	11.601	
16,700.00	11,688.27	16,878.86	11,876.21	94.13	94.21	97.69	-5,063.17	-783.37	1,509.97	1,377.75	132.22	11.420	
16,800.00	11,689.48	16,978.86	11,877.49	95.61	95.69	97.70	-5,163.16	-782.57	1,510.08	1,375.78	134.31	11.244	
16,900.00	11,690.70	17,078.86	11,878.78	97.10	97.18	97.70	-5,263.15	-781.76	1,510.20	1,373.80	136.40	11.072	
17,000.00	11,691.92	17,178.86	11,880.06	98.59	98.66	97.70	-5,363.14	-780.96	1,510.31	1,371.82	138.49	10.905	
17,100.00	11,693.14	17,278.86	11,881.34	100.09	100.16	97.70	-5,463.13	-780.15	1,510.42	1,369.83	140.60	10.743	
17,200.00	11,694.36	17,378.86	11,882.62	101.59	101.66	97.70	-5,563.11	-779.35	1,510.54	1,367.83	142.71	10.585	
17,300.00	11,695.58	17,478.86	11,883.90	103.10	103.16	97.71	-5,663.10	-778.55	1,510.65	1,365.83	144.83	10.431	
17,400.00	11,696.79	17,578.86	11,885.19	104.61	104.67	97.71	-5,763.09	-777.74	1,510.77	1,363.82	146.95	10.281	
17,500.00	11,698.01	17,678.86	11,886.47	106.12	106.18	97.71	-5,863.08	-776.94	1,510.88	1,361.80	149.08	10.135	
17,600.00	11,699.23	17,778.86	11,887.75	107.64	107.70	97.71	-5,963.07	-776.14	1,510.99	1,359.78	151.21	9.992	
17,700.00	11,700.45	17,878.86	11,889.03	109.17	109.22	97.71	-6,063.06	-775.33	1,511.11	1,357.75	153.35	9.854	
17,800.00	11,701.67	17,978.86	11,890.31	110.69	110.74	97.72	-6,163.04	-774.53	1,511.22	1,355.72	155.50	9.719	
17,900.00	11,702.89	18,078.86	11,891.60	112.23	112.27	97.72	-6,263.03	-773.73	1,511.33	1,353.69	157.65	9.587	
18,000.00	11,704.10	18,178.86	11,892.88	113.76	113.80	97.72	-6,363.02	-772.92	1,511.45	1,351.64	159.80	9.458	
18,100.00	11,705.32	18,278.86	11,894.16	115.30	115.34	97.72	-6,463.01	-772.12	1,511.56	1,349.60	161.96	9.333	
18,200.00	11,706.54	18,378.86	11,895.44	116.84	116.87	97.72	-6,563.00	-771.31	1,511.68	1,347.55	164.13	9.210	
18,300.00	11,707.76	18,478.86	11,896.72	118.38	118.42	97.72	-6,662.99	-770.51	1,511.79	1,345.50	166.29	9.091	
18,400.00	11,708.98	18,578.86	11,898.01	119.93	119.96	97.73	-6,762.98	-769.71	1,511.90	1,343.44	168.47	8.975	
18,500.00	11,710.20	18,678.86	11,899.29	121.48	121.51	97.73	-6,862.96	-768.90	1,512.02	1,341.38	170.64	8.861	
18,600.00	11,711.41	18,778.86	11,900.57	123.03	123.06	97.73	-6,962.95	-768.10	1,512.13	1,339.31	172.82	8.750	
18,700.00	11,712.63	18,878.86	11,901.85	124.59	124.61	97.73	-7,062.94	-767.30	1,512.24	1,337.24	175.00	8.641	
18,800.00	11,713.85	18,978.86	11,903.13	126.14	126.16	97.73	-7,162.93	-766.49	1,512.36	1,335.17	177.19	8.535	
18,900.00	11,715.07	19,078.86	11,904.42	127.70	127.72	97.74	-7,262.92	-765.69	1,512.47	1,333.09	179.38	8.432	
19,000.00	11,716.29	19,178.86	11,905.70	129.27	129.28	97.74	-7,362.91	-764.88	1,512.59	1,331.01	181.57	8.331	
19,100.00	11,717.51	19,278.86	11,906.98	130.83	130.84	97.74	-7,462.89	-764.08	1,512.70	1,328.93	183.77	8.232	
19,200.00	11,718.72	19,378.86	11,908.26	132.40	132.41	97.74	-7,562.88	-763.28	1,512.81	1,326.85	185.96	8.135	

CC - Min centre to center distance or covergent point, SF - min separation factor, ES - min ellipse separation

FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Offset Design Prevail/Master Fed Com - Master Fed Com 704H - OH - Plan #1

Offset Site Error: 0.00 usft

Survey Program: 0-OWSG (Rev2) MWD

Offset Well Error: 0.00 usft

Reference Measured Depth (usft)	Reference Vertical Depth (usft)	Offset Measured Depth (usft)	Offset Vertical Depth (usft)	Semi Major Axis Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	Offset Wellbore Centre +E/-W (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
19,300.00	11,719.94	19,478.86	11,909.54	133.96	133.97	97.74	-7,662.87	-762.47	1,512.93	1,324.76	188.17	8.040	
19,400.00	11,721.16	19,578.86	11,910.83	135.54	135.54	97.74	-7,762.86	-761.67	1,513.04	1,322.67	190.37	7.948	
19,500.00	11,722.38	19,678.86	11,912.11	137.11	137.11	97.75	-7,862.85	-760.87	1,513.15	1,320.58	192.58	7.857	
19,600.00	11,723.60	19,778.86	11,913.39	138.68	138.68	97.75	-7,962.84	-760.06	1,513.27	1,318.48	194.79	7.769	
19,700.00	11,724.82	19,878.86	11,914.67	140.26	140.26	97.75	-8,062.83	-759.26	1,513.38	1,316.38	197.00	7.682	
19,800.00	11,726.03	19,978.86	11,915.95	141.84	141.83	97.75	-8,162.81	-758.46	1,513.50	1,314.28	199.21	7.597	
19,900.00	11,727.25	20,078.86	11,917.23	143.42	143.41	97.75	-8,262.80	-757.65	1,513.61	1,312.18	201.43	7.514	
20,000.00	11,728.47	20,178.86	11,918.52	145.00	144.99	97.76	-8,362.79	-756.85	1,513.72	1,310.08	203.64	7.433	
20,100.00	11,729.69	20,278.86	11,919.80	146.58	146.57	97.76	-8,462.78	-756.04	1,513.84	1,307.97	205.86	7.354	
20,200.00	11,730.91	20,378.86	11,921.08	148.16	148.15	97.76	-8,562.77	-755.24	1,513.95	1,305.86	208.09	7.276	
20,300.00	11,732.13	20,478.86	11,922.36	149.75	149.74	97.76	-8,662.76	-754.44	1,514.06	1,303.75	210.31	7.199	
20,400.00	11,733.34	20,578.86	11,923.64	151.34	151.32	97.76	-8,762.75	-753.63	1,514.18	1,301.64	212.54	7.124	
20,500.00	11,734.56	20,678.86	11,924.93	152.93	152.91	97.77	-8,862.73	-752.83	1,514.29	1,299.53	214.77	7.051	
20,600.00	11,735.78	20,778.86	11,926.21	154.52	154.50	97.77	-8,962.72	-752.03	1,514.41	1,297.41	217.00	6.979	
20,700.00	11,737.00	20,878.86	11,927.49	156.11	156.09	97.77	-9,062.71	-751.22	1,514.52	1,295.29	219.23	6.908	
20,800.00	11,738.22	20,978.86	11,928.77	157.70	157.68	97.77	-9,162.70	-750.42	1,514.63	1,293.17	221.46	6.839	
20,900.00	11,739.43	21,078.86	11,930.05	159.29	159.27	97.77	-9,262.69	-749.61	1,514.75	1,291.05	223.70	6.771	
21,000.00	11,740.65	21,178.86	11,931.34	160.89	160.87	97.77	-9,362.68	-748.81	1,514.86	1,288.93	225.93	6.705	
21,100.00	11,741.87	21,278.86	11,932.62	162.49	162.46	97.78	-9,462.66	-748.01	1,514.97	1,286.80	228.17	6.640	
21,200.00	11,743.09	21,378.86	11,933.90	164.08	164.06	97.78	-9,562.65	-747.20	1,515.09	1,284.68	230.41	6.576	
21,300.00	11,744.31	21,478.86	11,935.18	165.68	165.65	97.78	-9,662.64	-746.40	1,515.20	1,282.55	232.65	6.513	
21,400.00	11,745.53	21,578.86	11,936.46	167.28	167.25	97.78	-9,762.63	-745.60	1,515.32	1,280.42	234.89	6.451	
21,500.00	11,746.74	21,678.86	11,937.75	168.88	168.85	97.78	-9,862.62	-744.79	1,515.43	1,278.29	237.14	6.391	
21,600.00	11,747.96	21,778.86	11,939.03	170.48	170.45	97.79	-9,962.61	-743.99	1,515.54	1,276.16	239.38	6.331	
21,700.00	11,749.18	21,878.86	11,940.31	172.09	172.05	97.79	-10,062.60	-743.19	1,515.66	1,274.03	241.63	6.273	
21,786.90	11,750.24	21,965.76	11,941.42	173.48	173.44	97.79	-10,149.49	-742.49	1,515.76	1,272.17	243.58	6.223	ES, SF

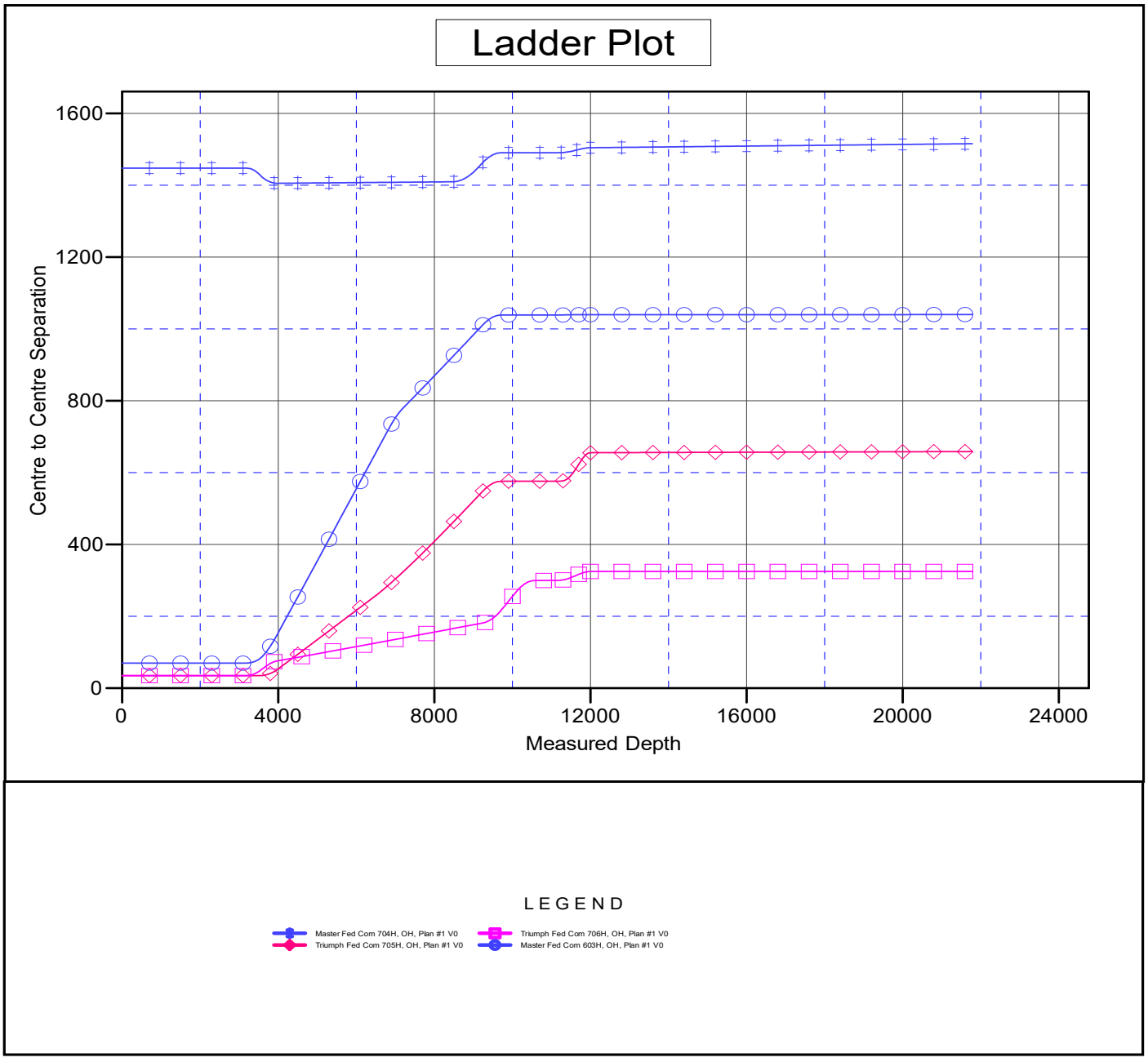
Total Directional Services

Anticollision Report

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Reference Depths are relative to 3425.5' GE + 30' KB @ 3455.50usft
Offset Depths are relative to Offset Datum
Central Meridian is -104.333334

Coordinates are relative to: Triumph Fed Com 604H
Coordinate System is US State Plane 1983, New Mexico Eastern Zone
Grid Convergence at Surface is: 0.53°



FRANKLIN MOUNTAIN ENERGY

Total Directional Services

Anticollision Report

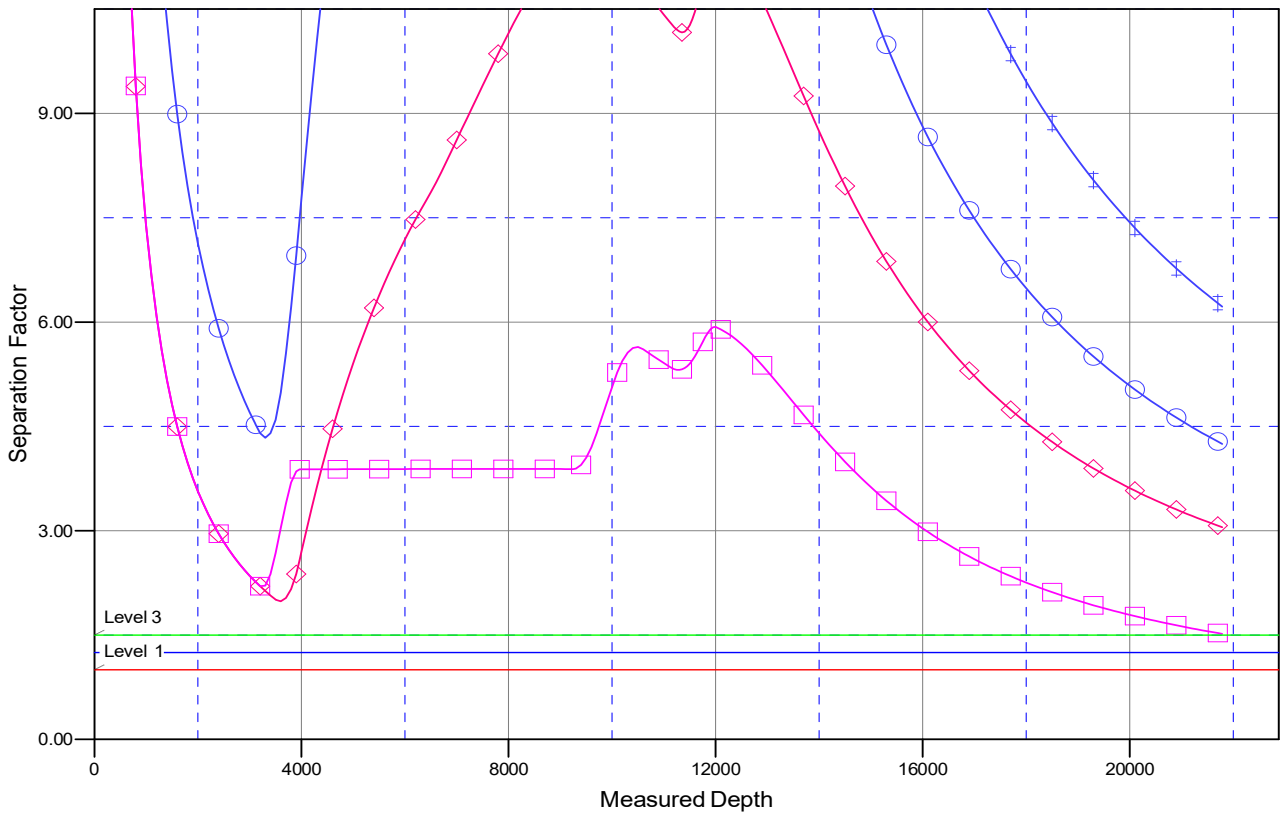
total

Company:	Franklin Mountain Energy	**Local Co-ordinate Reference:**	Well Triumph Fed Com 604H
Project:	Lea County, NM (NAD83)	**TVD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Reference Site:	Master/Triumph Fed Com	**MD Reference:**	3425.5' GE + 30' KB @ 3455.50usft
Site Error:	0.00 usft	**North Reference:**	Grid
Reference Well:	Triumph Fed Com 604H	**Survey Calculation Method:**	Minimum Curvature
Well Error:	0.00 usft	**Output errors are at**	2.00 sigma
Reference Wellbore	OH	**Database:**	EDM 5000.15 Single User Db
Reference Design:	Plan #1	**Offset TVD Reference:**	Offset Datum

Reference Depths are relative to 3425.5' GE + 30' KB @ 3455.50usft
Offset Depths are relative to Offset Datum
Central Meridian is -104.333334

Coordinates are relative to: Triumph Fed Com 604H
Coordinate System is US State Plane 1983, New Mexico Eastern Zone
Grid Convergence at Surface is: 0.53°

Separation Factor Plot



LEGEND

Master Fed Com 704H, OH, Plan #1 V0
Triumph Fed Com 705H, OH, Plan #1 V0
Triumph Fed Com 706H, OH, Plan #1 V0
Master Fed Com 603H, OH, Plan #1 V0

PECOS DISTRICT
SURFACE USE
CONDITIONS OF APPROVAL

OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	PREVAIL FED COM 602H
SURFACE HOLE FOOTAGE:	273'/N & 2429'/W
BOTTOM HOLE FOOTAGE	150'/S & 1800'/W
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	PREVAIL FED COM 703H
SURFACE HOLE FOOTAGE:	273'/N & 2464'/W
BOTTOM HOLE FOOTAGE	150'/S & 2202'/W
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	MASTER FED COM 704H
SURFACE HOLE FOOTAGE:	272'/N & 2499'/W
BOTTOM HOLE FOOTAGE	150'/S & 2152'/E
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	MASTER FED COM 603H
SURFACE HOLE FOOTAGE:	269'/N & 1387'/E
BOTTOM HOLE FOOTAGE	150'/S & 1689'/E
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	TRIUMPH FED COM 604H
SURFACE HOLE FOOTAGE:	269'/N & 1317'/E
BOTTOM HOLE FOOTAGE	150'/S & 650'/E
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	TRIUMPH FED COM 705H
SURFACE HOLE FOOTAGE:	269'/N & 1352'/E
BOTTOM HOLE FOOTAGE	150'/S & 1226'/E
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico
OPERATOR'S NAME:	FRANKLIN MOUNTAIN ENERGY LLC
WELL NAME & NO.:	TRIUMPH FED COM 706H
SURFACE HOLE FOOTAGE:	269'/N & 1282'/E
BOTTOM HOLE FOOTAGE	150'/S & 350'/E
LOCATION:	Section 14, T.24 S., R.35 E., NMP
COUNTY:	Lea County, New Mexico

Approval Date: 01/21/2021

TABLE OF CONTENTS

Standard Conditions of Approval (COA) apply to this APD. If any deviations to these standards exist or special COAs are required, the section with the deviation or requirement will be checked below.

I. GENERAL PROVISIONS

The approval of the Application For Permit To Drill (APD) is in compliance with all applicable laws and regulations: 43 Code of Federal Regulations 3160, the lease terms, Onshore Oil and Gas Orders, Notices To Lessees, New Mexico Oil Conservation Division (NMOCD) Rules, National Historical Preservation Act As Amended, and instructions and orders of the Authorized Officer. Any request for a variance shall be submitted to the Authorized Officer on Form 3160-5, Sundry Notices and Report on Wells.

II. PERMIT EXPIRATION

If the permit terminates prior to drilling and drilling cannot be commenced within 60 days after expiration, an operator is required to submit Form 3160-5, Sundry Notices and Reports on Wells, requesting surface reclamation requirements for any surface disturbance. However, if the operator will be able to initiate drilling within 60 days after the expiration of the permit, the operator must have set the conductor pipe in order to allow for an extension of 60 days beyond the expiration date of the APD. (Filing of a Sundry Notice is required for this 60 day extension.)

III. ARCHAEOLOGICAL, PALEONTOLOGY & HISTORICAL SITES

Any cultural and/or paleontological resource discovered by the operator or by any person working on the operator's behalf shall immediately report such findings to the Authorized Officer. The operator is fully accountable for the actions of their contractors and subcontractors. The operator shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery shall be made by the Authorized Officer to determine the appropriate actions that shall be required to prevent the loss of significant cultural or scientific values of the discovery. The operator shall be held responsible for the cost of the proper mitigation measures that the Authorized Officer assesses after consultation with the operator on the evaluation and decisions of the discovery. Any unauthorized collection or disturbance of cultural or paleontological resources may result in a shutdown order by the Authorized Officer.

IV. NOXIOUS WEEDS

The operator shall be held responsible if noxious weeds become established within the areas of operations. Weed control shall be required on the disturbed land where noxious weeds exist, which includes the roads, pads, associated pipeline corridor, and adjacent land affected by the establishment of weeds due to this action. The operator shall consult with the Authorized Officer for acceptable weed control methods, which include following EPA and BLM requirements and policies.

V. SPECIAL REQUIREMENT(S)

Timing Limitation Stipulation / Condition of Approval for lesser prairie-chicken: Oil and gas activities including 3-D geophysical exploration, and drilling will not be allowed in lesser prairie-chicken habitat during the period from March 1st through June 15th annually. During that period, other activities that produce noise or involve human activity, such as the maintenance of oil and gas facilities, pipeline, road, and well pad construction, will be allowed except between 3:00 am and 9:00 am. The 3:00 am to 9:00 am restriction will not apply to normal, around-the-clock operations, such as venting, flaring, or pumping, which do not require a human presence during this period. Additionally, no new drilling will be allowed within up to 200 meters of leks known at the time of permitting. Normal vehicle use on existing roads will not be restricted. Exhaust noise from pump jack engines must be muffled or otherwise controlled so as not to exceed 75 db measured at 30 feet from the source of the noise.

Ground-level Abandoned Well Marker to avoid raptor perching: Upon the plugging and subsequent abandonment of the well, the well marker will be installed at ground level on a plate containing the pertinent information for the plugged well. For more installation details, contact the Carlsbad Field Office at 575-234-5972.

Timing Limitation Exceptions:
The Carlsbad Field Office will publish an annual map of where the LPC timing and noise stipulations and conditions of approval (Limitations) will apply for the identified year (between March 1 and June 15) based on the latest survey information. The LPC Timing Area map will identify areas which are Habitat Areas (HA), Isolated Population Area (IPA), and Primary Population Area (PPA). The LPC Timing Area map will also have an area in red crosshatch. The red crosshatch area is the only area where an operator is required to submit a request for exception to the LPC Limitations. If an operator is operating outside the red crosshatch area, the LPC Limitations do not apply for that year and an exception to LPC Limitations is not required.

Hydrology

The entire well pad(s) will be bermed to prevent oil, salt, and other chemical contaminants from leaving the well pad. The compacted berm shall be constructed at a minimum of 12 inches with impermeable mineral material (e.g. caliche). Topsoil shall not be used to construct the berm. No water flow from the uphill side(s) of the pad shall be allowed to enter the well pad. The integrity of the berm shall be maintained around the surfaced pad throughout the life of the well and around the downsized pad after interim reclamation has been completed. Any water erosion that may occur due to the construction of the well pad during the life of the well will be quickly corrected and proper measures will be taken to prevent future erosion. Stockpiling of topsoil is required. The top soil shall be stockpiled in an appropriate location to prevent loss of soil due to water or wind erosion and not used for berming or erosion control. If fluid collects within the bermed area, the fluid must be vacuumed into a safe container and disposed of properly at a state approved facility.

Tank battery locations will be lined and bermed. A 20 mil permanent liner will be installed with a 4 oz. felt backing to prevent tears or punctures. Tank battery berms must be large enough to contain 1 ½ times the content of the largest tank or 24 hour production, whichever is greater. Automatic shut off, check valves, or similar systems will be installed for tanks to minimize the effects of catastrophic line failures used in production or drilling.

Any water erosion that may occur due to the construction of overhead electric line and during the life of the power line will be quickly corrected and proper measures will be taken to prevent future erosion. A power pole should not be placed in drainages, playas, wetlands, riparian areas, or floodplains and must span across the features at a distance away that would not promote further erosion.

VI. CONSTRUCTION

A. NOTIFICATION

The BLM shall administer compliance and monitor construction of the access road and well pad. Notify the Carlsbad Field Office at (575) 234-5909 at least 3 working days prior to commencing construction of the access road and/or well pad.

When construction operations are being conducted on this well, the operator shall have the approved APD and Conditions of Approval (COA) on the well site and they shall be made available upon request by the Authorized Officer.

B. TOPSOIL

The operator shall strip the top portion of the soil (root zone) from the entire well pad area and stockpile the topsoil along the edge of the well pad as depicted in the APD. The root zone is typically six (6) inches in depth. All the stockpiled topsoil will be redistributed over the interim reclamation areas. Topsoil shall not be used for berming the pad or facilities. For final reclamation, the topsoil shall be spread over the entire pad area for seeding preparation.

Other subsoil (below six inches) stockpiles must be completely segregated from the topsoil stockpile. Large rocks or subsoil clods (not evident in the surrounding terrain) must be buried within the approved area for interim and final reclamation.

C. CLOSED LOOP SYSTEM

Tanks are required for drilling operations: No Pits.

The operator shall properly dispose of drilling contents at an authorized disposal site.

D. FEDERAL MINERAL MATERIALS PIT

Payment shall be made to the BLM prior to removal of any federal mineral materials. Call the Carlsbad Field Office at (575) 234-5972.

E. WELL PAD SURFACING

Surfacing of the well pad is not required.

If the operator elects to surface the well pad, the surfacing material may be required to be removed at the time of reclamation. The well pad shall be constructed in a manner which creates the smallest possible surface disturbance, consistent with safety and operational needs.

F. EXCLOSURE FENCING (CELLARS & PITS)

Exclosure Fencing
The operator will install and maintain exclosure fencing for all open well cellars to prevent access to public, livestock, and large forms of wildlife before and after drilling operations until the pit is free of fluids and the operator initiates backfilling. (For examples of exclosure fencing design, refer to BLM's Oil and Gas Gold Book, Exclosure Fence Illustrations, Figure 1, Page 18.)

G. ON LEASE ACCESS ROADS

Road Width
The access road shall have a driving surface that creates the smallest possible surface disturbance and does not exceed fourteen (14) feet in width. The maximum width of surface disturbance, when constructing the access road, shall not exceed thirty (30) feet.

Surfacing
Surfacing material is not required on the new access road driving surface. If the operator elects to surface the new access road or pad, the surfacing material may be required to be removed at the time of reclamation.

Where possible, no improvements should be made on the unsurfaced access road other than to remove vegetation as necessary, road irregularities, safety issues, or to fill low areas that may sustain standing water.

The Authorized Officer reserves the right to require surfacing of any portion of the access road at any time deemed necessary. Surfacing may be required in the event the road deteriorates, erodes, road traffic increases, or it is determined to be beneficial for future field development. The surfacing depth and type of material will be determined at the time of notification.

Crowning
Crowning shall be done on the access road driving surface. The road crown shall have a grade of approximately 2% (i.e., a 1" crown on a 14' wide road). The road shall conform to Figure 1; cross section and plans for typical road construction.

Ditching
Ditching shall be required on both sides of the road.

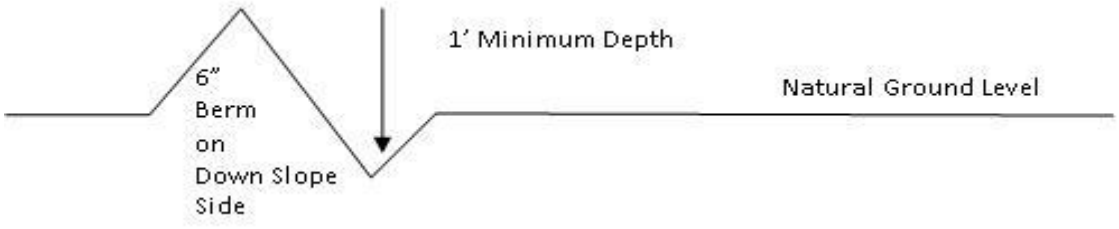
Turnouts
Vehicle turnouts shall be constructed on the road. Turnouts shall be intervisible with interval spacing distance less than 1000 feet. Turnouts shall conform to Figure 1; cross section and plans for typical road construction.

Drainage

Drainage control systems shall be constructed on the entire length of road (e.g. ditches, sidehill outsloping and insloping, lead-off ditches, culvert installation, and low water crossings).

A typical lead-off ditch has a minimum depth of 1 foot below and a berm of 6 inches above natural ground level. The berm shall be on the down-slope side of the lead-off ditch.

Cross Section of a Typical Lead-off Ditch



All lead-off ditches shall be graded to drain water with a 1 percent minimum to 3 percent maximum ditch slope. The spacing interval are variable for lead-off ditches and shall be determined according to the formula for spacing intervals of lead-off ditches, but may be amended depending upon existing soil types and centerline road slope (in %);

Formula for Spacing Interval of Lead-off Ditches

Example - On a 4% road slope that is 400 feet long, the water flow shall drain water into a lead-off ditch. Spacing interval shall be determined by the following formula:

400 foot road with 4% road slope: $\frac{400'}{4\%}$ + 100' = 200' lead-off ditch interval

Cattle guards

An appropriately sized cattle guard sufficient to carry out the project shall be installed and maintained at fence/road crossings. Any existing cattle guards on the access road route shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattle guards that are in place and are utilized during lease operations.

Fence Requirement

Where entry is granted across a fence line, the fence shall be braced and tied off on both sides of the passageway prior to cutting. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fences.

Public Access

Public access on this road shall not be restricted by the operator without specific written approval granted by the Authorized Officer.

Construction Steps

1. Salvage topsoil
2. Construct road
3. Redistribute topsoil
4. Revegetate slopes

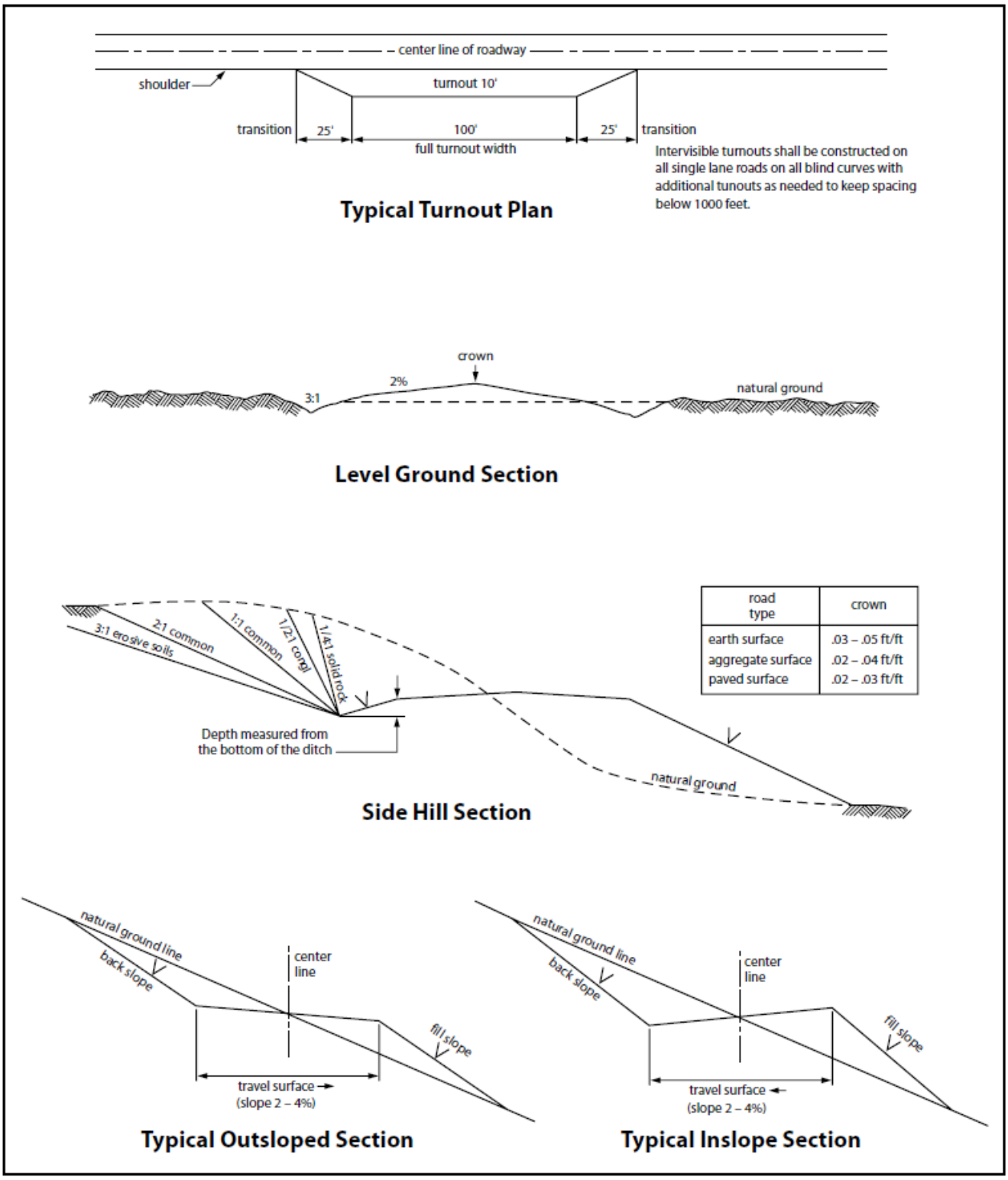


Figure 1. Cross-sections and plans for typical road sections representative of BLM resource or FS local and higher-class roads.

Approval Date: 01/21/2021

VII. PRODUCTION (POST DRILLING)

A. WELL STRUCTURES & FACILITIES

Placement of Production Facilities
Production facilities should be placed on the well pad to allow for maximum interim recontouring and revegetation of the well location.

Exclosure Netting (Open-top Tanks)
Immediately following active drilling or completion operations, the operator will take actions necessary to prevent wildlife and livestock access, including avian wildlife, to all open-topped tanks that contain or have the potential to contain salinity sufficient to cause harm to wildlife or livestock, hydrocarbons, or Resource Conservation and Recovery Act of 1976-exempt hazardous substances. At a minimum, the operator will net, screen, or cover open-topped tanks to exclude wildlife and livestock and prevent mortality. If the operator uses netting, the operator will cover and secure the open portion of the tank to prevent wildlife entry. The operator will net, screen, or cover the tanks until the operator removes the tanks from the location or the tanks no longer contain substances that could be harmful to wildlife or livestock. Use a maximum netting mesh size of 1 ½ inches. The netting must not be in contact with fluids and must not have holes or gaps.

Chemical and Fuel Secondary Containment and Exclosure Screening
The operator will prevent all hazardous, poisonous, flammable, and toxic substances from coming into contact with soil and water. At a minimum, the operator will install and maintain an impervious secondary containment system for any tank or barrel containing hazardous, poisonous, flammable, or toxic substances sufficient to contain the contents of the tank or barrel and any drips, leaks, and anticipated precipitation. The operator will dispose of fluids within the containment system that do not meet applicable state or U. S. Environmental Protection Agency livestock water standards in accordance with state law; the operator must not drain the fluids to the soil or ground. The operator will design, construct, and maintain all secondary containment systems to prevent wildlife and livestock exposure to harmful substances. At a minimum, the operator will install effective wildlife and livestock exclosure systems such as fencing, netting, expanded metal mesh, lids, and grate covers. Use a maximum netting mesh size of 1 ½ inches.

Open-Vent Exhaust Stack Exclosures
The operator will construct, modify, equip, and maintain all open-vent exhaust stacks on production equipment to prevent birds and bats from entering, and to discourage perching, roosting, and nesting. (*Recommended exclosure structures on open-vent exhaust stacks are in the shape of a cone*.) Production equipment includes, but may not be limited to, tanks, heater-treaters, separators, dehydrators, flare stacks, in-line units, and compressor mufflers.

Containment Structures

Proposed production facilities such as storage tanks and other vessels will have a secondary containment structure that is constructed to hold the capacity of 1.5 times the largest tank, plus freeboard to account for precipitation, unless more stringent protective requirements are deemed necessary.

Painting Requirement
All above-ground structures including meter housing that are not subject to safety requirements shall be painted a flat non-reflective paint color, **Shale Green** from the BLM Standard Environmental Color Chart (CC-001: June 2008).

B. BURIED PIPELINE STIPULATIONS

A copy of the application (Grant, APD, or Sundry Notice) and attachments, including conditions of approval, survey plat and/or map, will be on location during construction. BLM personnel may request to you a copy of your permit during construction to ensure compliance with all stipulations.

Holder agrees to comply with the following stipulations to the satisfaction of the Authorized Officer:

1. The Holder shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this grant.

2. The Holder shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, the holder shall comply with the Toxic Substances Control Act of 1976 as amended, 15 USC 2601 et seq. (1982) with regards to any toxic substances that are used, generated by or stored on the right-of-way or on facilities authorized under this right-of-way grant. (See 40 CFR Part 702-799 and especially, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193.) Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR Part 117 shall be reported as required by the Comprehensive Environmental Response, Compensation, and Liability Act, section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the authorized officer concurrent with the filing of the reports to the involved Federal agency or State government.

3. The holder agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. 9601, et seq. or the Resource Conservation and Recovery Act, 42 U.S.C.6901, et seq.) on the Right-of-Way (unless the release or threatened release is wholly unrelated to the Right-of-Way holder's activity on the Right-of-Way), or resulting from the activity of the Right-of-Way holder on the Right-of-Way. This agreement applies without regard to whether a release is caused by the holder, its agent, or unrelated third parties.

4. If, during any phase of the construction, operation, maintenance, or termination of the pipeline, any oil or other pollutant should be discharged from the pipeline system, impacting

Federal lands, the control and total removal, disposal, and cleaning up of such oil or other pollutant, wherever found, shall be the responsibility of holder, regardless of fault. Upon failure of holder to control, dispose of, or clean up such discharge on or affecting Federal lands, or to repair all damages resulting therefrom, on the Federal lands, the Authorized Officer may take such measures as he deems necessary to control and clean up the discharge and restore the area, including where appropriate, the aquatic environment and fish and wildlife habitats, at the full expense of the holder. Such action by the Authorized Officer shall not relieve holder of any responsibility as provided herein.

5. All construction and maintenance activity will be confined to the authorized right-of-way.

6. The pipeline will be buried with a minimum cover of **36** inches between the top of the pipe and ground level.

7. The maximum allowable disturbance for construction in this right-of-way will be **30** feet:

- Blading of vegetation within the right-of-way will be allowed: maximum width of blading operations will not exceed **20** feet. The trench is included in this area. (*Blading is defined as the complete removal of brush and ground vegetation*.)

- Clearing of brush species within the right-of-way will be allowed: maximum width of clearing operations will not exceed **30** feet. The trench and bladed area are included in this area. (*Clearing is defined as the removal of brush while leaving ground vegetation (grasses, weeds, etc.) intact. Clearing is best accomplished by holding the blade 4 to 6 inches above the ground surface.*)

- The remaining area of the right-of-way (if any) shall only be disturbed by compressing the vegetation. (*Compressing can be caused by vehicle tires, placement of equipment, etc.*)

8. The holder shall stockpile an adequate amount of topsoil where blading is allowed. The topsoil to be stripped is approximately ___6___ inches in depth. The topsoil will be segregated from other spoil piles from trench construction. The topsoil will be evenly distributed over the bladed area for the preparation of seeding.

9. The holder shall minimize disturbance to existing fences and other improvements on public lands. The holder is required to promptly repair improvements to at least their former state. Functional use of these improvements will be maintained at all times. The holder will contact the owner of any improvements prior to disturbing them. When necessary to pass through a fence line, the fence shall be braced on both sides of the passageway prior to cutting of the fence. No permanent gates will be allowed unless approved by the Authorized Officer.

10. Vegetation, soil, and rocks left as a result of construction or maintenance activity will be randomly scattered on this right-of-way and will not be left in rows, piles, or berms, unless

otherwise approved by the Authorized Officer. The entire right-of-way shall be recontoured to match the surrounding landscape. The backfilled soil shall be compacted and a 6 inch berm will be left over the ditch line to allow for settling back to grade.

11. In those areas where erosion control structures are required to stabilize soil conditions, the holder will install such structures as are suitable for the specific soil conditions being encountered and which are in accordance with sound resource management practices.

12. The holder will reseed all disturbed areas. Seeding will be done according to the attached seeding requirements, using the following seed mix.

( ) seed mixture 1	( ) seed mixture 3
(X) seed mixture 2	( ) seed mixture 4
( ) seed mixture 2/LPC	( ) Aplomado Falcon Mixture

13. All above-ground structures not subject to safety requirements shall be painted by the holder to blend with the natural color of the landscape. The paint used shall be color which simulates "Standard Environmental Colors" – **Shale Green**, Munsell Soil Color No. 5Y 4/2.

14. The pipeline will be identified by signs at the point of origin and completion of the right-of-way and at all road crossings. At a minimum, signs will state the holder's name, BLM serial number, and the product being transported. All signs and information thereon will be posted in a permanent, conspicuous manner, and will be maintained in a legible condition for the life of the pipeline.

15. The holder shall not use the pipeline route as a road for purposes other than routine maintenance as determined necessary by the Authorized Officer in consultation with the holder before maintenance begins. The holder will take whatever steps are necessary to ensure that the pipeline route is not used as a roadway. As determined necessary during the life of the pipeline, the Authorized Officer may ask the holder to construct temporary deterrence structures.

16. Any cultural and/or paleontological resources (historic or prehistoric site or object) discovered by the holder, or any person working on his behalf, on public or Federal land shall be immediately reported to the Authorized Officer. Holder shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery will be made by the Authorized Officer to determine appropriate actions to prevent the loss of significant cultural or scientific values. The holder will be responsible for the cost of evaluation and any decision as to proper mitigation measures will be made by the Authorized Officer after consulting with the holder.

17. The operator shall be held responsible if noxious weeds become established within the areas of operations. Weed control shall be required on the disturbed land where noxious weeds exist,

which includes associated roads, pipeline corridor and adjacent land affected by the establishment of weeds due to this action. The operator shall consult with the Authorized Officer for acceptable weed control methods, which include following EPA and BLM requirements and policies.

18. Escape Ramps - The operator will construct and maintain pipeline/utility trenches that are not otherwise fenced, screened, or netted to prevent livestock, wildlife, and humans from becoming entrapped. At a minimum, the operator will construct and maintain escape ramps, ladders, or other methods of avian and terrestrial wildlife escape in the trenches according to the following criteria:

a. Any trench left open for eight (8) hours or less is not required to have escape ramps; however, before the trench is backfilled, the contractor/operator shall inspect the trench for wildlife, remove all trapped wildlife, and release them at least 100 yards from the trench.
b. For trenches left open for eight (8) hours or more, earthen escape ramps (built at no more than a 30 degree slope and spaced no more than 500 feet apart) shall be placed in the trench.

19. Special Stipulations:

Wildlife:

Lesser Prairie-Chicken

Oil and gas activities will not be allowed in lesser prairie-chicken habitat during the period from March 1st through June 15th annually. During that period, other activities that produce noise or involve human activity, such as the maintenance of oil and gas facilities, geophysical exploration other than 3-D operations, and pipeline, road, and well pad construction, will be allowed except between 3:00 am and 9:00 am. The 3:00 am to 9:00 am restriction will not apply to normal, around-the-clock operations, such as venting, flaring, or pumping, which do not require a human presence during this period. Normal vehicle use on existing roads will not be restricted. Exhaust noise from pump jack engines must be muffled or otherwise controlled so as not to exceed 75 db measured at 30 ft. from the source of the noise.

This authorization is subject to your Certificate of Participation and/or Certificate of Inclusion under the New Mexico Candidate Conservation Agreement. Because it involves surface disturbing activities covered under your Certificate, your Habitat Conservation Fund Account with the Center of Excellence for Hazardous Materials Management (CEHMM) will be debited according to Exhibit B Part 2 of the Certificate of Participation.

Range:

Cattleguards
Where a permanent cattleguard is approved, an appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at fence crossing(s). Any existing cattleguard(s) on the access road shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattleguard(s) that are in place and are utilized during lease operations. A gate shall be constructed on one side of the cattleguard and fastened securely to H-braces.

Fence Requirement

Where entry granted across a fence line, the fence must be braced and tied off on both sides of the passageway prior to cutting. Once the work is completed, the fence will be restored to its prior condition, or better. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fence(s).

Livestock Watering Requirement
Any damage to structures that provide water to livestock throughout the life of the well, caused by operations from the well site, must be immediately corrected by the operator. The operator must notify the BLM office (575-234-5972) and the private surface landowner or the grazing allotment holder if any damage occurs to structures that provide water to livestock.

C. STIPULATIONS FOR OVERHEAD ELECTRIC LINES

A copy of the grant and attachments, including stipulations, survey plat and/or map, will be on location during construction. BLM personnel may request to you a copy of your permit during construction to ensure compliance with all stipulations.

Holder agrees to comply with the following stipulations to the satisfaction of the Authorized Officer:

1. The holder shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this grant.

2. The holder shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, the holder shall comply with the Toxic Substances Control Act of 1976 as amended, 15 USC 2601 et seq. (1982) with regards to any toxic substances that are used, generated by or stored on the right-of-way or on facilities authorized under this right-of-way grant. (See 40 CFR, Part 702-799 and especially, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193.) Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR, Part 117 shall be reported as required by the Comprehensive Environmental Response, Compensation, and Liability Act, section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the authorized officer concurrent with the filing of the reports to the involved Federal agency or State government.

3. The holder agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. 9601, et seq. or the Resource Conservation and Recovery Act, 42 U.S.C. 6901, et seq.) on the Right-of-Way (unless the release or threatened release is wholly unrelated to the Right-of-Way holder's activity on the Right-of-Way), or resulting from the activity of the Right-of-Way holder on the Right-of-Way. This agreement applies without regard to whether a release is caused by the holder, its agent, or unrelated third parties.

4. There will be no clearing or blading of the right-of-way unless otherwise agreed to in writing by the Authorized Officer.

5. Power lines shall be constructed and designed in accordance to standards outlined in "Suggested Practices for Avian Protection on Power lines: The State of the Art in 2006" Edison Electric Institute, APLIC, and the California Energy Commission 2006 . The holder shall assume the burden and expense of proving that pole designs not shown in the above publication deter raptor perching, roosting, and nesting. Such proof shall be provided by a raptor expert approved by the Authorized Officer. The BLM reserves the right to require modification or additions to all powerline structures placed on this right-of-way, should they be necessary to ensure the safety of large perching birds. Such modifications and/or additions shall be made by the holder without liability or expense to the United States.

Raptor deterrence will consist of but not limited to the following: triangle perch discouragers shall be placed on each side of the cross arms and a nonconductive perching deterrence shall be placed on all vertical poles that extend past the cross arms.

6. The holder shall minimize disturbance to existing fences and other improvements on public lands. The holder is required to promptly repair improvements to at least their former state. Functional use of these improvements will be maintained at all times. The holder will contact the owner of any improvements prior to disturbing them. When necessary to pass through a fence line, the fence shall be braced on both sides of the passageway prior to cutting the fence. No permanent gates will be allowed unless approved by the Authorized Officer.

7. The BLM serial number assigned to this authorization shall be posted in a permanent, conspicuous manner where the power line crosses roads and at all serviced facilities. Numbers will be at least two inches high and will be affixed to the pole nearest the road crossing and at the facilities served.

8. Upon cancellation, relinquishment, or expiration of this grant, the holder shall comply with those abandonment procedures as prescribed by the Authorized Officer.

9. All surface structures (poles, lines, transformers, etc.) shall be removed within 180 days of abandonment, relinquishment, or termination of use of the serviced facility or facilities or within 180 days of abandonment, relinquishment, cancellation, or expiration of this grant, whichever comes first. This will not apply where the power line extends service to an active, adjoining facility or facilities.

10. Any cultural and/or paleontological resource (historic or prehistoric site or object) discovered by the holder, or any person working on his behalf, on public or Federal land shall be immediately reported to the Authorized Officer. Holder shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery will be made by the Authorized Officer to determine appropriate actions to prevent the loss of significant cultural or scientific values. The holder will be responsible for the cost of evaluation and any decision as to proper mitigation measures will be made by the Authorized Officer

after consulting with the holder.

11. Special Stipulations:

Wildlife:

Lesser Prairie-Chicken

Oil and gas activities will not be allowed in lesser prairie-chicken habitat during the period from March 1st through June 15th annually. During that period, other activities that produce noise or involve human activity, such as the maintenance of oil and gas facilities, geophysical exploration other than 3-D operations, and pipeline, road, and well pad construction, will be allowed except between 3:00 am and 9:00 am. The 3:00 am to 9:00 am restriction will not apply to normal, around-the-clock operations, such as venting, flaring, or pumping, which do not require a human presence during this period. Normal vehicle use on existing roads will not be restricted. Exhaust noise from pump jack engines must be muffled or otherwise controlled so as not to exceed 75 db measured at 30 ft. from the source of the noise.

This authorization is subject to your Certificate of Participation and/or Certificate of Inclusion under the New Mexico Candidate Conservation Agreement. Because it involves surface disturbing activities covered under your Certificate, your Habitat Conservation Fund Account with the Center of Excellence for Hazardous Materials Management (CEHMM) will be debited according to Exhibit B Part 2 of the Certificate of Participation.

Hydrology:

Any water erosion that may occur due to the construction of overhead electric line and during the life of the power line will be quickly corrected and proper measures will be taken to prevent future erosion. A power pole should not be placed in drainages, playas, wetlands, riparian areas, or floodplains and must span across the features at a distance away that would not promote further erosion.

Range:

Cattleguards
Where a permanent cattleguard is approved, an appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at fence crossing(s). Any existing cattleguard(s) on the access road shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattleguard(s) that are in place and are utilized during lease operations. A gate shall be constructed on one side of the cattleguard and fastened securely to H-braces.

Fence Requirement
Where entry granted across a fence line, the fence must be braced and tied off on both sides of the passageway prior to cutting. Once the work is completed, the fence will be restored to its prior condition, or better. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fence(s).

Livestock Watering Requirement
Any damage to structures that provide water to livestock throughout the life of the well, caused by operations from the well site, must be immediately corrected by the operator. The operator

Approval Date: 01/21/2021

must notify the BLM office (575-234-5972) and the private surface landowner or the grazing allotment holder if any damage occurs to structures that provide water to livestock.

D. STIPULATIONS FOR OIL AND GAS RELATED SITES

A copy of the application (Grant/Sundry Notice) and attachments, including stipulations and map, will be on location during construction. BLM personnel may request to view a copy of your permit during construction to ensure compliance with all stipulations.

The holder agrees to comply with the following stipulations to the satisfaction of the Authorized Officer, BLM.

1. The holder shall indemnify the United States against any liability for damage to life or property arising from the occupancy or use of public lands under this grant and for all response costs, penalties, damages, claims, and other costs arising from the provisions of the Resource Conservation and Recovery Act (RCRA), 42 U.S.C. Chap. 82, Section 6901 et. seq., from the Comprehensive Environmental Response, Compensation and Liability Act (CERCLA), 42 U.S.C. Chap. 109, Section 9601 et. seq., and from other applicable environmental statues.

2. The holder shall comply with all applicable Federal laws and regulations existing or hereafter enacted or promulgated. In any event, the holder shall comply with the Toxic Substances Control Act of 1976, as amended (15 U.S.C. 2601, et. seq.) with regard to any toxic substances that are used, generated by or stored on the right-of-way or on facilities authorized by this grant. (See 40 CFR, Part 702-799 and especially, provisions on polychlorinated biphenyls, 40 CFR 761.1-761.193.) Additionally, any release of toxic substances (leaks, spills, etc.) in excess of the reportable quantity established by 40 CFR, Part 117 shall be reported as required by the Comprehensive Environmental Response, Compensation and Liability Act, Section 102b. A copy of any report required or requested by any Federal agency or State government as a result of a reportable release or spill of any toxic substances shall be furnished to the Authorized Officer concurrent with the filing of the reports to the involved Federal agency or State government.

3. The holder agrees to indemnify the United States against any liability arising from the release of any hazardous substance or hazardous waste (as these terms are defined in the Comprehensive Environmental Response, Compensation and Liability Act of 1980, 42 U.S.C. 9601, et. seq. or the Resource Conservation and Recovery Act, 42 U.S.C. 6901, et. seq.) on the right-of-way (unless the release or threatened release is wholly unrelated to the right-of-way holder's activity on the right-of-way). This agreement applies without regard to whether a release is caused by the holder, its agent, or unrelated third parties.

4. If, during any phase of the construction, operation, maintenance, or termination of the site or related pipeline(s), any oil or other pollutant should be discharged from site facilities, the pipeline(s) or from containers or vehicles impacting Federal lands, the control and total removal, disposal, and cleanup of such oil of other pollutant, wherever

found, shall be the responsibility of the holder, regardless of fault. Upon failure of the holder to control, dispose of, or clean up such discharge on or affecting Federal lands, or to repair all damages to Federal lands resulting therefrom, the Authorized Officer may take such measures as deemed necessary to control and cleanup the discharge and restore the area, including, where appropriate, the aquatic environment and fish and wildlife habitats, at the full expense of the holder. Such action by the Authorized Officer shall not relieve the holder of any liability or responsibility.

5. Sites shall be maintained in an orderly, sanitary condition at all times. Waste materials, both liquid and solid, shall be disposed of promptly at an appropriate, authorized waste disposal facility in accordance with all applicable State and Federal laws. "Waste" means all discarded matter including, but not limited to, human waste, trash, garbage, refuse, petroleum products, brines, chemicals, oil drums, ashes, and equipment.

6. The operator will notify the Bureau of Land Management (BLM) authorized officer and nearest Fish and Wildlife Service (FWS) Law Enforcement office within 24 hours, if the operator discovers a dead or injured federally protected species (i.e., migratory bird species, bald or golden eagle, or species listed by the FWS as threatened or endangered) in or adjacent to a pit, trench, tank, exhaust stack, or fence. (If the operator is unable to contact the FWS Law Enforcement office, the operator must contact the nearest FWS Ecological Services office.)

7. All above-ground structures not subject to safety requirements shall be painted by the holder to blend with the natural color of the landscape. The paint used shall be a color which simulates "Standard Environmental Colors" designated by the Rocky Mountain Five-State Interagency Committee. The color selected for this project is **Shale Green**, Munsell Soil Color Chart Number 5Y 4/2.

8. Any cultural and/or paleontological resource (historic or prehistoric site or object) discovered by the holder, or any person working on the holder's behalf, on public or Federal land shall be immediately reported to the Authorized Officer. The holder shall suspend all operations in the immediate area of such discovery until written authorization to proceed is issued by the Authorized Officer. An evaluation of the discovery will be made by the Authorized Officer to determine appropriate actions to prevent the loss of significant cultural or scientific values. The holder will be responsible for the cost of evaluation and any decision as to the proper mitigation measures will be made by the Authorized Officer after consulting with the holder.

9. A sales contract for removal of mineral material (caliche, sand, gravel, fill dirt) from an authorized pit, site, or on location must be obtained from the BLM prior to commencing construction. There are several options available for purchasing mineral material: contact the BLM office (575-234-5972).

10. The operator shall be held responsible if noxious weeds become established within the areas of operations. Weed control shall be required on the disturbed land where noxious weeds exist, which includes the roads, pads, associated pipeline corridor, and adjacent land affected by the establishment of weeds due to this action. The operator shall consult with the Authorized Officer for acceptable weed control methods, which include following EPA and BLM requirements and policies.

11. Once the site is no longer in service or use, the site must undergo final abandonment. At final abandonment, the site and access roads must undergo "final" reclamation so that the character and productivity of the land are restored. Earthwork for final reclamation must be completed within six (6) months of the abandonment of the site. All pads and facility locations and roads must be reclaimed to a satisfactory revegetated, safe, and stable condition, unless an agreement is made with the landowner or BLM to keep the road and/or pad intact. After all disturbed areas have been satisfactorily prepared, these areas need to be revegetated with the seed mixture provided. Seeding should be accomplished by drilling on the contour whenever practical or by other approved methods. Seeding may need to be repeated until revegetation is successful, as determined by the BLM.

Operators shall contact a BLM surface protection specialist prior to surface abandonment operations for site specific objectives (Jim Amos: 575-234-5909).

12. The holder shall stockpile an adequate amount of topsoil where blading occurs. The topsoil to be stripped is approximately ___6___ inches in depth. The topsoil will be segregated from other spoil piles. The topsoil will be used for final reclamation.

13. The holder will reseed all disturbed areas. Seeding will be done according to the attached seeding requirements, using the following seed mix.

( ) seed mixture 1	( ) seed mixture 3
(X) seed mixture 2	( ) seed mixture 4
( ) seed mixture 2/LPC	( ) Aplomado Falcon Mixture

14. In those areas where erosion control structures are required to stabilize soil conditions, the holder shall install such structures as are suitable for the specific soil conditions being encountered and which are in accordance with sound management practices. Any earth work will require prior approval by the Authorized Officer.

15. Open-topped Tanks - The operator will take actions necessary to prevent wildlife and livestock access, including avian wildlife, to all open-topped tanks that contain or have the potential to contain salinity sufficient to cause harm to wildlife or livestock, hydrocarbons, or Resource Conservation and Recovery Act of 1976-exempt hazardous substances. At a minimum, the operator will net, screen, or cover open-topped tanks to

exclude wildlife and livestock and prevent mortality. If the operator uses netting, the operator will cover and secure the open portion of the tank to prevent wildlife entry. The operator will net, screen, or cover the tanks until the operator removes the tanks from the location or the tanks no longer contain substances that could be harmful to wildlife or livestock. Use a maximum netting mesh size of 1 ½ inches. The netting must not be in contact with fluids and must not have holes or gaps

16. The operator will prevent all hazardous, poisonous, flammable, and toxic substances from coming into contact with soil and water. At a minimum, the operator will install and maintain an

impervious secondary containment system for any tank or barrel containing hazardous, poisonous, flammable, or toxic substances sufficient to contain the contents of the tank or barrel and any drips, leaks, and anticipated precipitation. The operator will dispose of fluids within the containment system that do not meet applicable state or U. S. Environmental Protection Agency livestock water standards in accordance with state law; the operator must not drain the fluids to the soil or ground. The operator will design, construct, and maintain all secondary containment systems to prevent wildlife and livestock exposure to harmful substances. At a minimum, the operator will install effective wildlife and livestock exclosure systems such as fencing, netting, expanded metal mesh, lids, and grate covers. Use a maximum netting mesh size of 1 ½ inches.

17. Open-Vent Exhaust Stack Exclosures – The operator will construct, modify, equip, and maintain all open-vent exhaust stacks on production equipment to prevent birds and bats from entering, and to discourage perching, roosting, and nesting. (Recommended exclosure structures on open-vent exhaust stacks are in the shape of a cone.) Production equipment includes, but may not be limited to, tanks, heater-treaters, separators, dehydrators, flare stacks, in-line units, and compressor mufflers.

18. Containment Structures - Proposed production facilities such as storage tanks and other vessels will have a secondary containment structure that is constructed to hold the capacity of 1.5 times the largest tank, plus freeboard to account for precipitation, unless more stringent protective requirements are deemed necessary.

19. Special Stipulations:

Wildlife:

Lesser Prairie-Chicken

Oil and gas activities will not be allowed in lesser prairie-chicken habitat during the period from March 1st through June 15th annually. During that period, other activities that produce noise or involve human activity, such as the maintenance of oil and gas facilities, geophysical exploration other than 3-D operations, and pipeline, road, and well pad construction, will be allowed except between 3:00 am and 9:00 am. The 3:00 am to 9:00 am restriction will not apply to normal, around-the-clock operations, such as venting, flaring, or pumping, which do not require a human presence during this period. Normal vehicle use on existing roads will not be restricted. Exhaust

noise from pump jack engines must be muffled or otherwise controlled so as not to exceed 75 db measured at 30 ft. from the source of the noise.

This authorization is subject to your Certificate of Participation and/or Certificate of Inclusion under the New Mexico Candidate Conservation Agreement. Because it involves surface disturbing activities covered under your Certificate, your Habitat Conservation Fund Account with the Center of Excellence for Hazardous Materials Management (CEHMM) will be debited according to Exhibit B Part 2 of the Certificate of Participation.

Hydrology:

The entire well pad(s) will be bermed to prevent oil, salt, and other chemical contaminants from leaving the well pad. The compacted berm shall be constructed at a minimum of 12 inches with impermeable mineral material (e.g. caliche). Topsoil shall not be used to construct the berm. No water flow from the uphill side(s) of the pad shall be allowed to enter the well pad. The integrity of the berm shall be maintained around the surfaced pad throughout the life of the well and around the downsized pad after interim reclamation has been completed. Any water erosion that may occur due to the construction of the well pad during the life of the well will be quickly corrected and proper measures will be taken to prevent future erosion. Stockpiling of topsoil is required. The top soil shall be stockpiled in an appropriate location to prevent loss of soil due to water or wind erosion and not used for berming or erosion control. If fluid collects within the bermed area, the fluid must be vacuumed into a safe container and disposed of properly at a state approved facility.

Tank battery locations will be lined and bermed. A 20 mil permanent liner will be installed with a 4 oz. felt backing to prevent tears or punctures. Tank battery berms must be large enough to contain 1 ½ times the content of the largest tank or 24 hour production, whichever is greater. Automatic shut off, check valves, or similar systems will be installed for tanks to minimize the effects of catastrophic line failures used in production or drilling.

Range:

Cattleguards
Where a permanent cattleguard is approved, an appropriately sized cattleguard(s) sufficient to carry out the project shall be installed and maintained at fence crossing(s). Any existing cattleguard(s) on the access road shall be repaired or replaced if they are damaged or have deteriorated beyond practical use. The operator shall be responsible for the condition of the existing cattleguard(s) that are in place and are utilized during lease operations. A gate shall be constructed on one side of the cattleguard and fastened securely to H-braces.

Fence Requirement
Where entry granted across a fence line, the fence must be braced and tied off on both sides of the passageway prior to cutting. Once the work is completed, the fence will be restored to its prior condition, or better. The operator shall notify the private surface landowner or the grazing allotment holder prior to crossing any fence(s).

Livestock Watering Requirement
Any damage to structures that provide water to livestock throughout the life of the well, caused by operations from the well site, must be immediately corrected by the operator. The operator must notify the BLM office (575-234-5972) and the private surface landowner or the grazing allotment holder if any damage occurs to structures that provide water to livestock.

Approval Date: 01/21/2021

VIII. INTERIM RECLAMATION

During the life of the development, all disturbed areas not needed for active support of production operations should undergo interim reclamation in order to minimize the environmental impacts of development on other resources and uses.

Within six (6) months of well completion, operators should work with BLM surface management specialists (Jim Amos: 575-234-5909) to devise the best strategies to reduce the size of the location. Interim reclamation should allow for remedial well operations, as well as safe and efficient removal of oil and gas.

During reclamation, the removal of caliche is important to increasing the success of revegetating the site. Removed caliche that is free of contaminants may be used for road repairs, fire walls or for building other roads and locations. In order to operate the well or complete workover operations, it may be necessary to drive, park and operate on restored interim vegetation within the previously disturbed area. Disturbing revegetated areas for production or workover operations will be allowed. If there is significant disturbance and loss of vegetation, the area will need to be revegetated. Communicate with the appropriate BLM office for any exceptions/exemptions if needed.

All disturbed areas after they have been satisfactorily prepared need to be reseeded with the seed mixture provided below.

Upon completion of interim reclamation, the operator shall submit a Sundry Notices and Reports on Wells, Subsequent Report of Reclamation (Form 3160-5).

IX. FINAL ABANDONMENT & RECLAMATION

At final abandonment, well locations, production facilities, and access roads must undergo "final" reclamation so that the character and productivity of the land are restored.

Earthwork for final reclamation must be completed within six (6) months of well plugging. All pads, pits, facility locations and roads must be reclaimed to a satisfactory revegetated, safe, and stable condition, unless an agreement is made with the landowner or BLM to keep the road and/or pad intact.

After all disturbed areas have been satisfactorily prepared, these areas need to be revegetated with the seed mixture provided below. Seeding should be accomplished by drilling on the contour whenever practical or by other approved methods. Seeding may need to be repeated until revegetation is successful, as determined by the BLM.

Operators shall contact a BLM surface protection specialist prior to surface abandonment operations for site specific objectives (Jim Amos: 575-234-5909).

Ground-level Abandoned Well Marker to avoid raptor perching: Upon the plugging and subsequent abandonment of the well, the well marker will be installed at ground level on a plate containing the pertinent information for the plugged well.

Seed Mixture 2, for Sandy Sites

The holder shall seed all disturbed areas with the seed mixture listed below. The seed mixture shall be planted in the amounts specified in pounds of pure live seed (PLS)* per acre. There shall be no primary or secondary noxious weeds in the seed mixture. Seed will be tested and the viability testing of seed will be done in accordance with State law (s) and within nine (9) months prior to purchase. Commercial seed will be either certified or registered seed. The seed container will be tagged in accordance with State law(s) and available for inspection by the authorized officer.

Seed will be planted using a drill equipped with a depth regulator to ensure proper depth of planting where drilling is possible. The seed mixture will be evenly and uniformly planted over the disturbed area (smaller/heavier seeds have a tendency to drop the bottom of the drill and are planted first). The holder shall take appropriate measures to ensure this does not occur. Where drilling is not possible, seed will be broadcast and the area shall be raked or chained to cover the seed. When broadcasting the seed, the pounds per acre are to be doubled. The seeding will be repeated until a satisfactory stand is established as determined by the authorized officer. Evaluation of growth will not be made before completion of at least one full growing season after seeding.

Species to be planted in pounds of pure live seed* per acre:

Species	lb/acre
Sand dropseed (Sporobolus cryptandrus)	1.0
Sand love grass (Eragrostis trichodes)	1.0
Plains bristlegrass (Setaria macrostachya)	2.0

*Pounds of pure live seed:

Pounds of seed **x** percent purity **x** percent germination = pounds pure live seed

PECOS DISTRICT
DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME:	**Franklin Mountain Energy LLC**
LEASE NO.:	**NMNM138888**
LOCATION:	Section 14, T.24 S., R.35 E., NMPM
COUNTY:	Lea County, New Mexico

WELL NAME & NO.:	Triumph Fed Com 604H
SURFACE HOLE FOOTAGE:	269'/N & 1317'/E
BOTTOM HOLE FOOTAGE	150'/S & 650'/E

WELL NAME & NO.:	Triumph Fed Com 705H
SURFACE HOLE FOOTAGE:	269'/N & 1352'/E
BOTTOM HOLE FOOTAGE	150'/S & 1226'/E

WELL NAME & NO.:	Triumph Fed Com 706H
SURFACE HOLE FOOTAGE:	269'/N & 1282'/E
BOTTOM HOLE FOOTAGE	150'/S & 350'/E

COA

H2S	☐ Yes	☉ No	
Potash	☉ None	☐ Secretary	☐ R-111-P
Cave/Karst Potential	☉ Low	☐ Medium	☐ High
Cave/Karst Potential	☐ Critical		
Variance	☐ None	☉ Flex Hose	☐ Other
Wellhead	☐ Conventional	☉ Multibowl	☐ Both
Other	☑ 4 String Area	☑ Capitan Reef	☐ WIPP
Other	☑ Fluid Filled	☐ Cement Squeeze	☐ Pilot Hole
Special Requirements	☐ Water Disposal	☑ COM	☐ Unit

A. HYDROGEN SULFIDE

Hydrogen Sulfide (H2S) monitors shall be installed prior to drilling out the surface shoe. If H2S is detected in concentrations greater than 100 ppm, the Hydrogen Sulfide area shall meet Onshore Order 6 requirements, which includes equipment and personnel/public protection items. If Hydrogen Sulfide is encountered, provide measured values and formations to the BLM.

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B. CASING

1. The **13-3/8** inch surface casing shall be set at approximately **1225 feet** (a minimum of **25 feet (Lea County)** into the Rustler Anhydrite and above the salt) and cemented to the surface.

    a. If cement does not circulate to the surface, the appropriate BLM office shall be notified and a temperature survey utilizing an electronic type temperature survey with surface log readout will be used or a cement bond log shall be run to verify the top of the cement. Temperature survey will be run a minimum of six hours after pumping cement and ideally between 8-10 hours after completing the cement job.
    b. Wait on cement (WOC) time for a primary cement job will be a minimum of **8 hours** or 500 pounds compressive strength, whichever is greater. (This is to include the lead cement)
    c. Wait on cement (WOC) time for a remedial job will be a minimum of 4 hours after bringing cement to surface or 500 pounds compressive strength, whichever is greater.
    d. If cement falls back, remedial cementing will be done prior to drilling out that string.

2. The minimum required fill of cement behind the **9-5/8** inch intermediate casing is:

    - Cement to surface. If cement does not circulate see B.1.a, c-d above. **Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst, potash or capitan reef.**

    Intermediate casing must be kept fluid filled to meet BLM minimum collapse requirement.

3. The minimum required fill of cement behind the **7-5/8** inch intermediate casing shall be set at approximately **5400 feet** is:

    - Cement should tie-back at least **50 feet** on top of Capitan Reef top **or 200 feet** into the previous casing, whichever is greater. If cement does not circulate see B.1.a, c-d above.
      Wait on cement (WOC) time for a primary cement job is to include the lead cement slurry due to cave/karst, potash or capitan reef.

    ❖ In Capitan Reef Areas if cement does not circulate to surface on the first two casing strings, the cement on the 3rd casing string must come to surface.

    ❖ **Special Capitan Reef requirements.** If lost circulation (50% or greater) occurs below the Base of the Salt, the operator shall do the following:

- Switch to fresh water mud to protect the Capitan Reef and use fresh water mud until setting the intermediate casing. The appropriate BLM office is to be notified for a PET to witness the switch to fresh water.

- Daily drilling reports from the Base of the Salt to the setting of the intermediate casing are to be submitted to the BLM CFO engineering staff via e-mail by 0800 hours each morning. Any lost circulation encountered is to be recorded on these drilling reports. The daily drilling report should show mud volume per shift/tour. Failure to submit these reports will result in an Incidence of Non-Compliance being issued for failure to comply with the Conditions of Approval. If not already planned, the operator shall run a caliper survey for the intermediate well bore and submit to the appropriate BLM office.

4. The minimum required fill of cement behind the **5-1/2** inch production casing is:

    - Cement should tie-back at least **200 feet** into previous casing string. Operator shall provide method of verification.
      Cement excess is less than 25%, more cement might be required.

C. PRESSURE CONTROL

1. Operator has proposed a multi-bowl wellhead assembly. This assembly will only be tested when installed on the surface casing. Minimum working pressure of the blowout preventer (BOP) and related equipment (BOPE) required for drilling below the surface casing shoe shall be **5000 (5M)** psi.

    a. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
    b. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
    c. Manufacturer representative shall install the test plug for the initial BOP test.
    d. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.
    e. Whenever any seal subject to test pressure is broken, all the tests in OOGO2.III.A.2.i must be followed.

D. SPECIAL REQUIREMENT (S)

Communitization Agreement

- The operator will submit a Communitization Agreement to the Santa Fe Office, 301 Dinosaur Trail Santa Fe, New Mexico 87508, at least 90 days before the anticipated date of first production from a well subject to a spacing order issued by the New Mexico Oil Conservation Division. The Communitization Agreement will include the signatures of all working interest owners in all Federal and Indian leases subject to

the Communitization Agreement (i.e., operating rights owners and lessees of record), or certification that the operator has obtained the written signatures of all such owners and will make those signatures available to the BLM immediately upon request.

- If the operator does not comply with this condition of approval, the BLM may take enforcement actions that include, but are not limited to, those specified in 43 CFR 3163.1.
- In addition, the well sign shall include the surface and bottom hole lease numbers. When the Communitization Agreement number is known, it shall also be on the sign.

GENERAL REQUIREMENTS

The BLM is to be notified in advance for a representative to witness:

a. Spudding well (minimum of 24 hours)
b. Setting and/or Cementing of all casing strings (minimum of 4 hours)
c. BOPE tests (minimum of 4 hours)

☒ Eddy County
Call the Carlsbad Field Office, 620 East Greene St., Carlsbad, NM 88220, (575) 361-2822

☒ Lea County
Call the Hobbs Field Station, 414 West Taylor, Hobbs NM 88240, (575) 393-3612

1. Unless the production casing has been run and cemented or the well has been properly plugged, the drilling rig shall not be removed from over the hole without prior approval.

   a. In the event the operator has proposed to drill multiple wells utilizing a skid/walking rig. Operator shall secure the wellbore on the current well, after installing and testing the wellhead, by installing a blind flange of like pressure rating to the wellhead and a pressure gauge that can be monitored while drilling is performed on the other well(s).
   b. When the operator proposes to set surface casing with Spudder Rig
      - Notify the BLM when moving in and removing the Spudder Rig.
      - Notify the BLM when moving in the 2nd Rig. Rig to be moved in within 90 days of notification that Spudder Rig has left the location.
      - BOP/BOPE test to be conducted per Onshore Oil and Gas Order No. 2 as soon as 2nd Rig is rigged up on well.

2. Floor controls are required for 3M or Greater systems. These controls will be on the rig floor, unobstructed, readily accessible to the driller and will be operational at all times during drilling and/or completion activities. Rig floor is defined as the area immediately around the rotary table; the area immediately above the substructure on which the draw works are located, this does not include the dog house or stairway area.

3. The record of the drilling rate along with the GR/N well log run from TD to surface (horizontal well – vertical portion of hole) shall be submitted to the BLM office as well as all other logs run on the borehole 30 days from completion. If available, a digital copy of the logs is to be submitted in addition to the paper copies. The Rustler top and top and bottom of Salt are to be recorded on the Completion Report.

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A. CASING

1. Changes to the approved APD casing program need prior approval if the items substituted are of lesser grade or different casing size or are Non-API. The Operator can exchange the components of the proposal with that of superior strength (i.e. changing from J-55 to N-80, or from 36# to 40#). Changes to the approved cement program need prior approval if the altered cement plan has less volume or strength or if the changes are substantial (i.e. Multistage tool, ECP, etc.). The initial wellhead installed on the well will remain on the well with spools used as needed.

2. Wait on cement (WOC) for Potash Areas: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi for all cement blends, 2) until cement has been in place at least 24 hours. WOC time will be recorded in the driller's log. The casing intergrity test can be done (prior to the cement setting up) immediately after bumping the plug.

3. Wait on cement (WOC) for Water Basin: After cementing but before commencing any tests, the casing string shall stand cemented under pressure until both of the following conditions have been met: 1) cement reaches a minimum compressive strength of 500 psi at the shoe, 2) until cement has been in place at least 8 hours. WOC time will be recorded in the driller's log. See individual casing strings for details regarding lead cement slurry requirements. The casing intergrity test can be done (prior to the cement setting up) immediately after bumping the plug.

4. Provide compressive strengths including hours to reach required 500 pounds compressive strength prior to cementing each casing string. Have well specific cement details onsite prior to pumping the cement for each casing string.

5. No pea gravel permitted for remedial or fall back remedial without prior authorization from the BLM engineer.

6. On that portion of any well approved for a 5M BOPE system or greater, a pressure integrity test of each casing shoe shall be performed. Formation at the shoe shall be tested to a minimum of the mud weight equivalent anticipated to control the formation pressure to the next casing depth or at total depth of the well. This test shall be performed before drilling more than 20 feet of new hole.

7. If hardband drill pipe is rotated inside casing, returns will be monitored for metal. If metal is found in samples, drill pipe will be pulled and rubber protectors which have a larger diameter than the tool joints of the drill pipe will be installed prior to continuing drilling operations.
8. Whenever a casing string is cemented in the R-111-P potash area, the NMOCD requirements shall be followed.

B. PRESSURE CONTROL

1. All blowout preventer (BOP) and related equipment (BOPE) shall comply with well control requirements as described in Onshore Oil and Gas Order No. 2 and API RP 53 Sec. 17.

2. If a variance is approved for a flexible hose to be installed from the BOP to the choke manifold, the following requirements apply: The flex line must meet the requirements of API 16C. Check condition of flexible line from BOP to choke manifold, replace if exterior is damaged or if line fails test. Line to be as straight as possible with no hard bends and is to be anchored according to Manufacturer's requirements. The flexible hose can be exchanged with a hose of equal size and equal or greater pressure rating. Anchor requirements, specification sheet and hydrostatic pressure test certification matching the hose in service, to be onsite for review. These documents shall be posted in the company man's trailer and on the rig floor.

3. 5M or higher system requires an HCR valve, remote kill line and annular to match. The remote kill line is to be installed prior to testing the system and tested to stack pressure.

4. If the operator has proposed a multi-bowl wellhead assembly in the APD. The following requirements must be met:

    a. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
    b. If the welding is performed by a third party, the manufacturer's representative shall monitor the temperature to verify that it does not exceed the maximum temperature of the seal.
    c. Manufacturer representative shall install the test plug for the initial BOP test.
    d. Whenever any seal subject to test pressure is broken, all the tests in OOGO2.III.A.2.i must be followed.
    e. If the cement does not circulate and one inch operations would have been possible with a standard wellhead, the well head shall be cut off, cementing operations performed and another wellhead installed.

5. The appropriate BLM office shall be notified a minimum of 4 hours in advance for a representative to witness the tests.

    a. In a water basin, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. The casing cut-off and BOP installation can be initiated four hours after installing the slips, which will be approximately six hours after bumping the plug. For those casing strings not using slips, the minimum wait time before cut-off is eight hours after bumping the plug. BOP/BOPE testing can begin after cut-off or once cement reaches 500 psi compressive strength (including lead when specified), whichever is greater. However, if the float does not

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hold, cut-off cannot be initiated until cement reaches 500 psi compressive strength (including lead when specified).

b. In potash areas, for all casing strings utilizing slips, these are to be set as soon as the crew and rig are ready and any fallback cement remediation has been done. For all casing strings, casing cut-off and BOP installation can be initiated at twelve hours after bumping the plug. However, **no tests** shall commence until the cement has had a minimum of 24 hours setup time, except the casing pressure test can be initiated immediately after bumping the plug (only applies to single stage cement jobs).

c. The tests shall be done by an independent service company utilizing a test plug not a cup or J-packer. The operator also has the option of utilizing an independent tester to test without a plug (i.e. against the casing) pursuant to Onshore Order 2 with the pressure not to exceed 70% of the burst rating for the casing. Any test against the casing must meet the WOC time for water basin (8 hours) or potash (24 hours) or 500 pounds compressive strength, whichever is greater, prior to initiating the test (see casing segment as lead cement may be critical item).

d. The test shall be run on a 5000 psi chart for a 2-3M BOP/BOP, on a 10000 psi chart for a 5M BOP/BOPE and on a 15000 psi chart for a 10M BOP/BOPE. If a linear chart is used, it shall be a one hour chart. A circular chart shall have a maximum 2 hour clock. If a twelve hour or twenty-four hour chart is used, tester shall make a notation that it is run with a two hour clock.

e. The results of the test shall be reported to the appropriate BLM office.

f. All tests are required to be recorded on a calibrated test chart. A copy of the BOP/BOPE test chart and a copy of independent service company test will be submitted to the appropriate BLM office.

g. The BOP/BOPE test shall include a low pressure test from 250 to 300 psi. The test will be held for a minimum of 10 minutes if test is done with a test plug and 30 minutes without a test plug. This test shall be performed prior to the test at full stack pressure.

h. BOP/BOPE must be tested by an independent service company within 500 feet of the top of the Wolfcamp formation if the time between the setting of the intermediate casing and reaching this depth exceeds 20 days. This test does not exclude the test prior to drilling out the casing shoe as per Onshore Order No. 2.

C. DRILLING MUD

Mud system monitoring equipment, with derrick floor indicators and visual and audio alarms, shall be operating before drilling into the Wolfcamp formation, and shall be used until production casing is run and cemented.

D. WASTE MATERIAL AND FLUIDS

All waste (i.e. drilling fluids, trash, salts, chemicals, sewage, gray water, etc.) created as a result of drilling operations and completion operations shall be safely contained and disposed of properly at a waste disposal facility. No waste material or fluid shall be disposed of on the well location or surrounding area.

Porto-johns and trash containers will be on-location during fracturing operations or any other crew-intensive operations.

FRANKLIN MOUNTAIN ENERGY

Hydrogen Sulfide Plan

A. All personnel shall receive proper awareness H_2S training.
B. Briefing Area: two perpendicular areas will be designated by signs and readily accessible.
C. Required Emergency Equipment
    a. Well Control Equipment
        i. Flare line 150' from wellhead to be ignited by auto ignition sparking system.
        ii. Choke manifold with a remotely operated hydraulic choke.
        iii. Mud/gas separator
    b. Protective equipment for essential personnel
        i. Breathing Apparatus
            1. Rescue packs (SCBA) – 1 unit shall be placed at each briefing area, 2 shall be stored in a safety trailer on site.
            2. Work/Escape packs – 4 packs shall be stored on the rig floor with sufficient air hose not to restrict work activity
            3. Emergency Escape Packs – 4 packs shall be stored in the doghouse for emergency evacuation
        ii. Auxiliary Rescue Equipment
            1. Stretcher
            2. Two OSHA full body harnesses
            3. 100 feet of 5/8 inches OSHA approved rope
            4. 1-20# class ABC fire extinguisher
    c. H_2S Detection and Monitoring Equipment
        i. A stationary detector with three sensors will be placed in the doghouse if equipped, set to visually alarm at 10 ppm and audible at 14 ppm. The detector will be calibrated a minimum of every 30 days or as needed. The sensors will be placed in the following places:
            1. Rig Floor
            2. Below Rig Floor / Near BOPs
            3. End of flow line or where well bore fluid is being discharged (near shakers)
        ii. If H_2S is encountered, measured values and formations will be provided to the BLM.
    d. Visual Warning Systems
        i. One color code condition sign will be placed at the entrance to the site reflecting the possible conditions at the site.
        ii. A colored condition flag will be on display, reflecting the current condition at the site at the time.
        iii. Two windsocks will be placed in strategic locations, visible from all angles.
    e. Mud Program
        i. The Mud program will be designed to minimize the volume of H_2S circulated to surface. The operator will have the necessary mud products to minimize hazards while drilling in H_2S bearing zones.

f. Metallurgy
    i. All drill strings, casings, tubing, wellhead, blowout preventer, drilling spool, kill lines, choke manifold and lines, and valves shall be suitable for H_2S service at the anticipated operating pressures to prevent sour sulfide stress cracking.
g. Communication
    i. Communication will be via cell phones and walkie talkies on location.

Franklin Mountain Energy has conducted a review of offset operated wells to determine if an H_2S contingency plan is required for the proposed well. Based on concentrations of offset wells, proximity to main roads, and distance to populated areas, the radius of exposure created by a potential release was determined to be minimal and low enough to not necessitate an H_2S contingency plan. This will be reevaluated during wellbore construction if H_2S is observed and after the well is on production.

FRANKLIN MOUNTAIN ENERGY

Emergency Contact List:

Vladimir Roudakov, Drilling Engineer	**Cell 720 933 9784**
Rachael Overbey, Project and Regulatory Director	**Cell 303 570 4057**
Franklin Mountain Energy Afterhours Emergency Call Tree:	**720-640-7517**

EMERGENCY NUMBERS:

Agency	Telephone Number
BLM – Carlsbad Mainline	**575-234-5972**
BLM – Spill Emergency	**575-234-6235**
BLM – Engineering Emergency	**575-361-2822**
NMOCD District 1 – Hobbs Mainline	**575-393-6161**
NMOCD Emergency Line	**575-370-3186**
Wild Well Control	**281-784-4700**
H2S Emergency response:	
Air Ambulance New Mexico – Lea Co Reginal	**575-391-2934**
Lea County Sheriff's Department	**575-396-3611**
Fire Department:	
Carlsbad	**575-885-3125**
Artesia	**575-746-5050**
Lea County Regional Medical Center	**575-492-5000**
Jal Community Hospital	**505-395-2511**
Lea County Emergency Management	**575-396-8602**
Poison Control Center	**800-222-1222**

FRANKLIN MOUNTAIN ENERGY

Triumph Fed Com 604H

1. **Geologic name of surface location:** Permian

2. **Estimated tops of important geological markers:**

Formations	PROG SS	PROG TVD	Picked TVD	delta	Potential/Issues
Cenozoic Alluvium (surface)	3,426'	30'	30'	0	Sand/Gravels/unconsolidated
Rustler	2,047'	1,409'			Carbonates
Salado	1,763'	1,693'			Salt, Carbonate & Clastics
Base Salt	444'	3,012'			Shaley Carbonate & Shale
Lamar	-1,966'	5,422'			Carbonate & Clastics
Bell Canyon	-1,986'	5,442'			Sandstone - oil/gas/water
Cherry Canyon	-2,675'	6,131'			Sandstone - oil/gas/water
Brushy Canyon	-3,929'	7,385'			Sand/carb/shales - oil/gas/water
Bone Spring Lime	-5,234'	8,690'			Shale/Carbonates - oil/gas
Avalon	-5,271'	8,727'			Shale/Carbonates - oil/gas
First Bone Spring Sand	-6,263'	9,719'			Sandstone - oil/gas/water
Second Bone Spring Carbonates	-6,450'	9,906'			Shale/Carbonates - oil/gas
Second Bone Spring Sand	-7,004'	10,460'			Sandstone - oil/gas/water
Third Bone Spring Carbonates	-7,520'	10,976'			Shale/Carbonates - oil/gas
Third Bone Spring Sand	-8,043'	11,499'			Sandstone - oil/gas/water
HZ Target at SHL	-8,170'	11,626'			Overpressure shale/sand- Oil/Gas
Wolfcamp	-8,294'	11,750'			Overpressure shale/sand- Oil/Gas
Wolfcamp A	-8,325'	11,781'			Overpressure Shale - Oil/Gas
Wolfcamp B	-8,530'	11,986'			Overpressure Shale - Oil/Gas

3. **Estimated depth of anticipated fresh water, oil or gas:**

Upper Permian Sands	0- 400’	Fresh Water
Delaware Sands	5,442’	Oil
Bone Spring	9,719’	Oil
Wolfcamp	11,750’	Oil

No other formations are expected to give up oil, gas or fresh water in measurable quantities. Surface freshwater sands will be protected by setting 13 3/8” casing at 1,300’and circulating cement back to surface.

4. **Casing Program:**

All casings strings will be run new. Safety factors calculated assuming the well is vertical.

Casing string	Weight	Grade	Burst	Collapse	Tension	Conn	Length	API design factor			
								Burst	Collapse	Tension	Coupling
Surface 13 3/8"	54.5	J-55	2730	1130	853	BTC 909	1300	1.18	1.67	4.99	5.32
Intermediate 9 5/8"	40	HCL-80	7430	4230	916	BTC 1042	5400	1.72	1.67	2.90	3.30
Intermediate 7 5/8"	29.7	HCP-110	8280	7150	827	Stinger 564	11992	1.11	1.27	1.81	1.24
Long string 5 1/2"	23	P-110	14520	14520	729	Anaconda 656	21786	1.32	1.42	1.21	1.09

Cementing Program:
Cementing Stage tool can be placed in the 1st Intermediate string as a contingency to ensure required TOC to surface.

String Type	Hole Size	Casing Size	Setting Depth	Sacks	Lead Type of cmt	Lead Yield ft3/sk	Lead Water gal/sk	Lead TOC ft	Tail Sacks	Tail Type of cmt	Tail Yield ft3/sk	Tail Water gal/sk	Tail TOC	Excess
Surf	17.5	13.375	1300	795	Extenda Cem, 13.5 ppg Class C, 3lb/sk Kol-Seal 0.125pps Poly-E-Flake	1.747	9.06	0	334	HalCem TM, 14.8 ppg, Class C, 1% CaCl2, 0.125pps Celo-Flake	1.349	6.51	1000	100%
Int1	12.25	9.625	5400	1167	Neocem TM, 11.5 ppg, Class C 5% Salt, 0.125 pps Poly-E-Flake, 3lb/sk Kol-Seal	2.444	14.32	0	153	HalCem TM, 14.8 ppg, Class C, 0.1% HR 800 .125 pps Poly-E-Flake	1.334	6.42	5100	100%
Int2	8.75	7.625	11992	340	NeoCem, 11 ppg, Class C 3lb/sk Bridgemaker Gel, 5% Salt, 5pps LCM, 0.25pps Cello-Flake	2.798	17.15	4400	112	NeoCem 13.2 ppg, Class C 0.25 pps Cello-Flake, 2% CalCl2	1.44	7.29	10992	50%
Prod	6.75	5.5	21786	795	NeoCem, 13.5 ppg, Gas Migration Control	1.357	6.65	10992						20%

5. Minimum Specifications for Pressure Control:

The minimum blowout preventer equipment (BOPE) shown in Exhibit #1 will consist of a single ram, mud cross and double ram-type (10,000 psi WP) preventer and an annular preventer (5,000-psi WP). Both units will be hydraulically operated, and the ram-type will
be equipped with blind rams on bottom and 4 ½" x 7" variable pipe rams on top. All BOPE will be tested in accordance with Onshore Oil & Gas order No. 2.
Before drilling out of the surface casing, the ram-type BOP and accessory equipment will be tested to 5,000/250 psig and the annular preventer to 5,000/250 psig. The surface casing will be tested to 1500 psi for 30 minutes.

Before drilling out of the second intermediate casing, the ram-type BOP and accessory equipment will be tested to 10,000/250 psig and the annular preventer to 5,000/250 psig. The second intermediate casing will be tested to 2000 psi for 30 minutes prior to drillout.
Pipe rams will be operationally checked each 24-hour period. Blind rams will be operationally checked on each trip out of the hole. These checks will be noted on the daily tour sheets.

A hydraulically operated choke will be installed prior to drilling out of the intermediate casing shoe.

FRANKLIN MOUNTAIN ENERGY

6. Types and characteristics of the proposed mud system:

During this procedure we plan to use a Closed-Loop System and haul contents to the required disposal. The applicable depths and properties of the drilling fluid systems are as follows.

Depth	Type	Weight (ppg)	Viscosity	Water Loss
0 – 1,300'	Fresh - Gel	8.6-8.8	28-34	N/c
1,300' – 11,992'	Brine	8.8-10.2	28-34	N/c
11,992' – 21,786' Lateral	Oil Base	10.0-11.0	58-68	3 - 6

The highest mud weight needed to balance formation is expected to be 10-11 ppg. In order to maintain hole stability, mud weights up to 12 ppg may be utilized.
An electronic pit volume totalizer (PVT) will be utilized on the circulating system, to monitor pit volume, flow rate, pump pressure and stroke rate.
Sufficient mud materials to maintain mud properties and meet minimum lost circulation and weight increase requirements will be kept at the wellsite at all times.

7. Auxiliary well control and monitoring equipment:

(A) A kelly cock will be kept in the drill string at all times.
(B) A full opening drill pipe-stabbing valve (inside BOP) with proper drill pipe connections will be on the rig floor at all times.
(C) H2S monitoring and detection equipment will be utilized from surface casing point to TD.
(D) A wear bushing will be installed in the wellhead prior to drilling out of the surface casing.

8. Logging, testing and coring program:

GR–CCL-CNL Will be run in cased hole during completions phase of operations.
Open-hole logs are not planned for this well.

9. Abnormal conditions, pressures, temperatures and potential hazards:

The estimated bottom-hole temperature at 11,750' TVD (deepest point of the well) is 195F with an estimated maximum bottom-hole pressure (BHP) at the same point of 7,332 psig (based on 12 ppg MW). Hydrogen sulfate may be present in the area. All necessary precautions will be taken before drilling operations commence. See Hydrogen Sulfide Plan below:

10. Hydrogen Sulfide Plan:

A. All personnel shall receive proper awareness H2S training.
B. Briefing Area: two perpendicular areas will be designated by signs and readily accessible.
C. Required Emergency Equipment
    a. Well Control Equipment
        i. Flare line 150' from wellhead to be ignited by auto ignition sparking system.
        ii. Choke manifold with a remotely operated hydraulic choke.
        iii. Mud/gas separator
    b. Protective equipment for essential personnel
        i. Breathing Apparatus
            1. Rescue packs (SCBA) – 1 unit shall be placed at each briefing area, 2 shall be stored in a safety trailer on site.
            2. Work/Escape packs – 4 packs shall be stored on the rig floor with sufficient air hose not to restrict work activity

3. Emergency Escape Packs – 4 packs shall be stored in the doghouse for emergency evacuation

ii. Auxiliary Rescue Equipment
1. Stretcher
2. Two OSHA full body harnesses
3. 100 feet of 5/8 inches OSHA approved rope
4. 1-20# class ABC fire extinguisher

c. H2S Detection and Monitoring Equipment
i. A stationary detector with three sensors will be placed in the doghouse if equipped, set to visually alarm at 10 ppm and audible at 14 ppm. The detector will be calibrated a minimum of every 30 days or as needed. The sensors will be placed in the following places:
1. Rig Floor
2. Below Rig Floor / Near BOPs
3. End of flow line or where well bore fluid is being discharged (near shakers)
ii. If H2S is encountered, measured values and formations will be provided to the BLM.

d. Visual Warning Systems
i. One color code condition sign will be placed at the entrance to the site reflecting the possible conditions at the site.
ii. A colored condition flag will be on display, reflecting the current condition at the site at the time.
iii. Two windsocks will be placed in strategic locations, visible from all angles.

e. Mud Program
i. The Mud program will be designed to minimize the volume of H2S circulated to surface. The operator will have the necessary mud products to minimize hazards while drilling in H2S bearing zones.

f. Metallurgy
i. All drill strings, casings, tubing, wellhead, blowout preventer, drilling spool, kill lines, choke manifold and lines, and valves shall be suitable for H2S service at the anticipated operating pressures to prevent sour sulfide stress cracking.

g. Communication
i. Communication will be via cell phones and walkie talkies on location.

Franklin Mountain Energy has conducted a review of offset operated wells to determine if an H2S contingency plan is required for the proposed well. Based on concentrations of offset wells, proximity to main roads, and distance to populated areas, the radius of exposure created by a potential release was determined to be minimal and low enough to not necessitate an H2S contingency plan. This will be reevaluated during wellbore construction if H2S is observed and after the well is on production.

11. Anticipated starting date and duration of operations:

The drilling operations on the well should be finished in approximately one month. However, in order to minimize disturbance in the area and to improve efficiency Franklin Mountain is planning to drill all the wells on the pad prior to commence completion operations. To even further reduce the time heavy machinery is used the “batch drilling” method may be used. A batch drilling sequence sundry will be submitted for BLM approval prior to spud. A drilling rig with walking/skidding capabilities will be used.

FRANKLIN MOUNTAIN ENERGY

12. Disposal/environmental concerns:

(A) Drilled cuttings will be hauled to and disposed of in a state-certified disposal site.
(B) Non-hazardous waste mud/cement from the drilling process will be also be hauled to and disposed of in a state-certified disposal site.
(C) Garbage will be hauled to the Pecos City Landfill.
(D) Sewage (grey water) will be hauled to the Carlsbad City Landfill

13. Wellhead:

A multi-bowl wellhead system will be utilized.
After running the 13 3/8" surface casing, a 13-5/8" BOP/BOPE system with a minimum working pressure of 10,000 psi will be installed on the wellhead system and will be pressure tested to 250 psi low followed by a 5,000 psi pressure test. This pressure test will be repeated at least every 21 days, as per Onshore Order No. 2

The minimum working pressure of the BOP and related BOPE required for drilling below the surface casing shoe shall be 5,000 psi.

After running the 2nd intermediate casing, and before drilling out, the wellhead, BOP, and related equipment will be tested to 10,000/250 psig.

The multi-bowl wellhead will be installed by vendor's representative(s). A copy of the installation instructions for the Cameron Multi-Bowl WH system has been sent to the BLM office in Carlsbad.

The wellhead will be installed by a third party welder while being monitored by WH vendor's representative.

All BOP equipment will be tested utilizing a conventional test plug. Not a cup or J-packer type.

A solid steel body pack-off will be utilized after running and cementing the intermediate casing strings. After installation of the first intermediate string the pack-off and lower flanges will be pressure tested to 5000 psi. After installation of the second intermediate string, the pack-off and upper flange will be pressure tested to 10,000 psi.

Both the surface and intermediate casing strings will be tested as per Onshore Order No. 2 to at least 0.22 psi/ft or 1500 psi, whichever is greater.

14. Additional variance requests

A. Casing.
In order to minimize potential environmental and technical hazards, this well is planned with two intermediate strings of casing.

1. Variance is requested to wave the centralizer requirements for the 7 5/8" casing due to the tight clearance with 9 5/8" string.
2. Variance is requested to wave/reduce the centralizer requirements for the 5 ½" casing due to the tight clearance with 6 3/4" hole and 5 ½" casing due to tight clearances.

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1625 N. French Dr., Hobbs, NM 88240
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District II
811 S. First St., Artesia, NM 88210
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District III
1000 Rio Brazos Rd., Aztec, NM 87410
Phone:(505) 334-6178 Fax:(505) 334-6170
District IV
1220 S. St Francis Dr., Santa Fe, NM 87505
Phone:(505) 476-3470 Fax:(505) 476-3462

State of New Mexico
Energy, Minerals and Natural Resources
Oil Conservation Division
1220 S. St Francis Dr.
Santa Fe, NM 87505

CONDITIONS

Action 22633

CONDITIONS OF APPROVAL

Operator:	OGRID:	Action Number:	Action Type:
FRANKLIN MOUNTAIN ENERGY LLC 44 Cook Street Suite 1000 Denver, CO80206	373910	22633	FORM 3160-3

OCD Reviewer	Condition
pkautz	Will require a File As Drilled C-102 and a Directional Survey with the C-104
pkautz	Once the well is spud, to prevent ground water contamination through whole or partial conduits from the surface, the operator shall drill without interruption through the fresh water zone or zones and shall immediately set in cement the water protection string