

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

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		5. Lease Serial No. NMNM0138834 6. If Indian, Allottee or Tribe Name 7. If Unit or CA Agreement, Name and No. 8. Lease Name and Well No. ROCK JELLY FEDERAL COM 9. API Well No. 30-015-53479
2. Name of Operator COG OPERATING LLC 3a. Address 600 West Illinois Ave, Midland, TX 79701 3b. Phone No. (include area code) (432) 683-7443		10. Field and Pool, or Exploratory /PURPLE SAGE (WOLFCAMP) GAS 11. Sec., T. R. M. or Blk. and Survey or Area SEC 3/T26S/R29E/NMP
4. Location of Well (Report location clearly and in accordance with any State requirements. *) At surface LOT 3 / 395 FNL / 1470 FWL / LAT 32.07788 / LONG -103.975959 At proposed prod. zone SWSW / 200 FSL / 1170 FWL / LAT 32.035756 / LONG -103.976869		12. County or Parish EDDY 13. State NM
14. Distance in miles and direction from nearest town or post office* 12 miles		15. Distance from proposed* location to nearest property or lease line, ft. (Also to nearest drig. unit line, if any) 330 feet 16. No of acres in lease 17. Spacing Unit dedicated to this well 1920.0
18. Distance from proposed location* to nearest well, drilling, completed, applied for, on this lease, ft. 420 feet 19. Proposed Depth 10013 feet / 25492 feet 20. BLM/BIA Bond No. in file FED:		21. Elevations (Show whether DF, KDB, RT, GL, etc.) 2978 feet 22. Approximate date work will start* 07/01/2022 23. Estimated duration 20 days
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 (Electronic Submission) Title Regulatory Advisor	Name (Printed/Typed) STAN WAGNER / Ph: (432) 683-7443	Date 02/22/2022
Approved by (Signature) (Electronic Submission) Title Assistant Field Manager Lands & Minerals	Name (Printed/Typed) CODY LAYTON / Ph: (575) 234-5959	Date 02/21/2023
Office Carlsbad Field 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.

(Continued on page 2)

*(Instructions on page 2)



Approval Date: 02/21/2023

Additional Operator Remarks

Location of Well

0. SHL: LOT 3 / 395 FNL / 1470 FWL / TWSP: 26S / RANGE: 29E / SECTION: 3 / LAT: 32.07788 / LONG: -103.975959 (TVD: 0 feet, MD: 0 feet)
PPP: NWSW / 1319 FSL / 1170 FWL / TWSP: 26S / RANGE: 29E / SECTION: 10 / LAT: 32.056983 / LONG: -103.976901 (TVD: 10055 feet, MD: 16402 feet)
PPP: NWNW / 1 FNL / 1170 FWL / TWSP: 26S / RANGE: 29E / SECTION: 10 / LAT: 32.064311 / LONG: -103.976913 (TVD: 10067 feet, MD: 13761 feet)
PPP: SWNW / 661 FNL / 1170 FWL / TWSP: 26S / RANGE: 29E / SECTION: 3 / LAT: 32.075263 / LONG: -103.976929 (TVD: 10082 feet, MD: 10460 feet)
PPP: LOT 4 / 330 FNL / 1170 FWL / TWSP: 26S / RANGE: 29E / SECTION: 3 / LAT: 32.078058 / LONG: -103.976933 (TVD: 10006 feet, MD: 10129 feet)
BHL: SWSW / 200 FSL / 1170 FWL / TWSP: 26S / RANGE: 29E / SECTION: 15 / LAT: 32.035756 / LONG: -103.976869 (TVD: 10013 feet, MD: 25492 feet)

BLM Point of Contact

Name: Gavin Mickwee
Title: Land Law Examiner
Phone: (575) 234-5972
Email: gmickwee@blm.gov

CONFIDENTIAL

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 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) 476-3460 Fax: (505) 476-3462

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 SOUTH ST. FRANCIS DR.
Santa Fe, New Mexico 87505

Form C-102
Revised August 1, 2011
Submit one copy to appropriate
District Office

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

API Number 30-015- 53479	Pool Code 98220	Pool Name Purple Sage; Wolfcamp (Gas)
Property Code 329756	Property Name ROCK JELLY FEDERAL COM	Well Number 712H
OGRID No. 229137	Operator Name COG OPERATING, LLC	Elevation 2978.1'

Surface Location

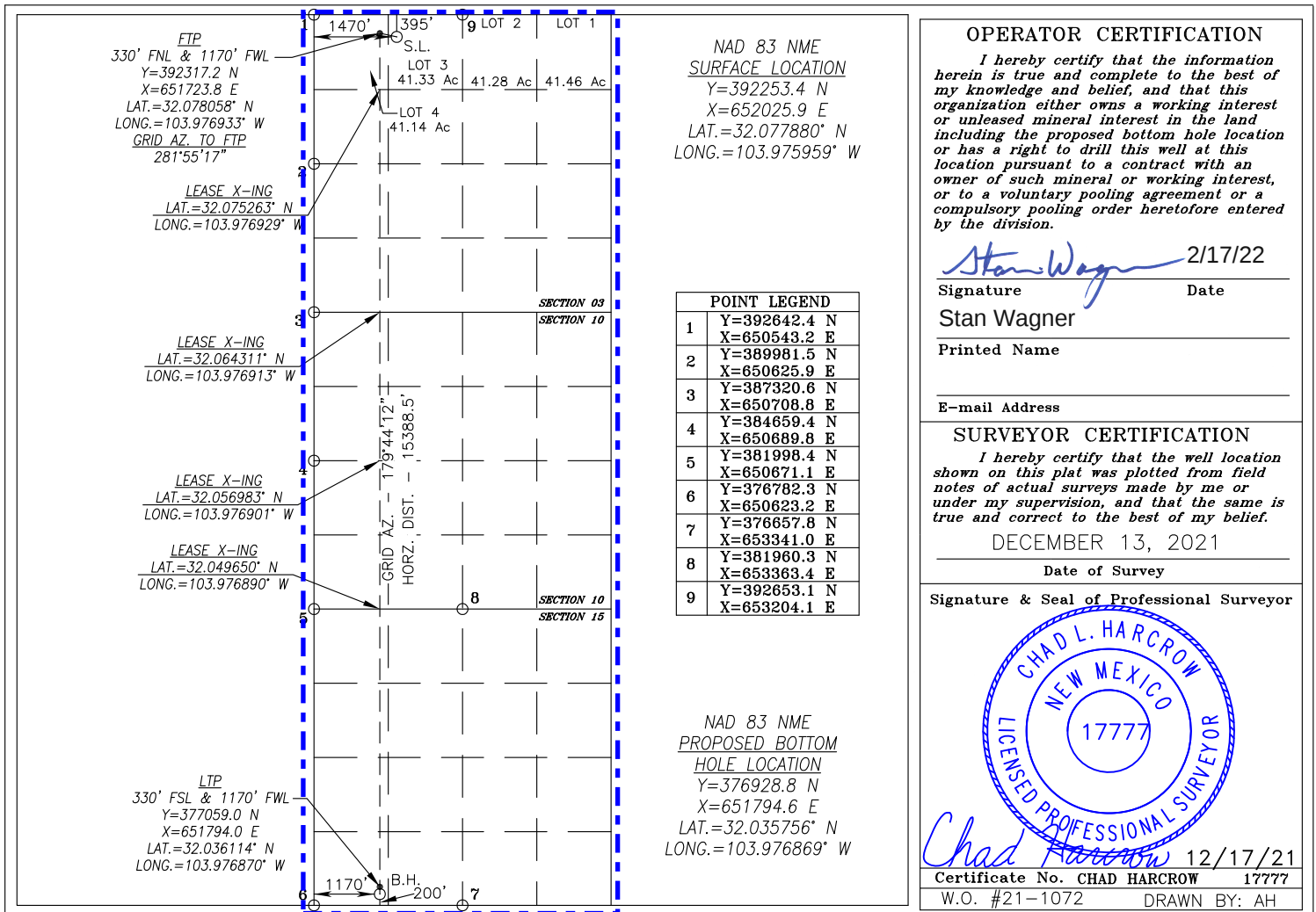
UL or lot No.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
3	3	26-S	29-E		395	NORTH	1470	WEST	EDDY

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
M	15	26-S	29-E		200	SOUTH	1170	WEST	EDDY

Dedicated Acres	Joint or Infill	Consolidation Code	Order No.
1920			

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



State of New Mexico
Energy, Minerals and Natural Resources Department

Submit Electronically
Via E-permitting

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

NATURAL GAS MANAGEMENT PLAN

This Natural Gas Management Plan must be submitted with each Application for Permit to Drill (APD) for a new or recompleted well.

Section 1 – Plan Description Effective May 25, 2021

I. Operator: COG Operating LLC

OGRID: 239137

Date: 02/02/2022

II. Type: ☒ Original ☐ Amendment due to ☐ 19.15.27.9.D(6)(a) NMAC ☐ 19.15.27.9.D(6)(b) NMAC ☐ Other.

If Other, please describe: _____

III. Well(s): Provide the following information for each new or recompleted well or set of wells proposed to be drilled or proposed to be recompleted from a single well pad or connected to a central delivery point.

Well Name	API	ULSTR	Footages	Anticipated Oil BBL/D	Anticipated Gas MCF/D	Anticipated Produced Water BBL/D
Rock Jelly Fed Com 710H	30-015-	3-3-26S-29E	395 FNL & 1530 FWL	± 1260	± 5580	± 5000
Rock Jelly Fed Com 711H	30-015-	3-3-26S-29E	395 FNL & 1500 FWL	± 1260	± 5580	± 5000
Rock Jelly Fed Com 712H	30-015-	3-3-26S-29E	395 FNL & 1470 FEL	± 1260	± 5580	± 5000

IV. Central Delivery Point Name: Rock Jelly Fed Com West CTB 790 FNL & 1495 FWL 3-26S-29E [See 19.15.27.9(D)(1) NMAC]

V. Anticipated Schedule: Provide the following information for each new or recompleted well or set of wells proposed to be drilled or proposed to be recompleted from a single well pad or connected to a central delivery point.

Well Name	API	Spud Date	TD Reached Date	Completion Commencement Date	Initial Flow Back Date	First Production Date
Rock Jelly Fed Com	Pending	± 4/1/2023	± 25 days from spud	TBD	TBD	TBD
710H, 711H, 712H						

VI. Separation Equipment: ☒ Attach a complete description of how Operator will size separation equipment to optimize gas capture.

VII. Operational Practices: ☒ Attach a complete description of the actions Operator will take to comply with the requirements of Subsection A through F of 19.15.27.8 NMAC.

VIII. Best Management Practices: ☒ Attach a complete description of Operator's best management practices to minimize venting during active and planned maintenance.

Section 2 – Enhanced Plan

EFFECTIVE APRIL 1, 2022

Beginning April 1, 2022, an operator that is not in compliance with its statewide natural gas capture requirement for the applicable reporting area must complete this section.

☒ Operator certifies that it is not required to complete this section because Operator is in compliance with its statewide natural gas capture requirement for the applicable reporting area.

IX. Anticipated Natural Gas Production:

Well	API	Anticipated Average Natural Gas Rate MCF/D	Anticipated Volume of Natural Gas for the First Year MCF

X. Natural Gas Gathering System (NGGS):

Operator	System	ULSTR of Tie-in	Anticipated Gathering Start Date	Available Maximum Daily Capacity of System Segment Tie-in

XI. Map. ☐ Attach an accurate and legible map depicting the location of the well(s), the anticipated pipeline route(s) connecting the production operations to the existing or planned interconnect of the natural gas gathering system(s), and the maximum daily capacity of the segment or portion of the natural gas gathering system(s) to which the well(s) will be connected.

XII. Line Capacity. The natural gas gathering system ☐ will ☐ will not have capacity to gather 100% of the anticipated natural gas production volume from the well prior to the date of first production.

XIII. Line Pressure. Operator ☐ does ☐ does not anticipate that its existing well(s) connected to the same segment, or portion, of the natural gas gathering system(s) described above will continue to meet anticipated increases in line pressure caused by the new well(s).

☐ Attach Operator's plan to manage production in response to the increased line pressure.

XIV. Confidentiality: ☐ Operator asserts confidentiality pursuant to Section 71-2-8 NMSA 1978 for the information provided in Section 2 as provided in Paragraph (2) of Subsection D of 19.15.27.9 NMAC, and attaches a full description of the specific information for which confidentiality is asserted and the basis for such assertion.

Section 3 - Certifications

Effective May 25, 2021

Operator certifies that, after reasonable inquiry and based on the available information at the time of submittal:

☒ Operator will be able to connect the well(s) to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline gathering system; or

☐ Operator will not be able to connect to a natural gas gathering system in the general area with sufficient capacity to transport one hundred percent of the anticipated volume of natural gas produced from the well(s) commencing on the date of first production, taking into account the current and anticipated volumes of produced natural gas from other wells connected to the pipeline gathering system.

If Operator checks this box, Operator will select one of the following:

Well Shut-In. ☐ Operator will shut-in and not produce the well until it submits the certification required by Paragraph (4) of Subsection D of 19.15.27.9 NMAC; or

Venting and Flaring Plan. ☐ Operator has attached a venting and flaring plan that evaluates and selects one or more of the potential alternative beneficial uses for the natural gas until a natural gas gathering system is available, including:

- (a) power generation on lease;
- (b) power generation for grid;
- (c) compression on lease;
- (d) liquids removal on lease;
- (e) reinjection for underground storage;
- (f) reinjection for temporary storage;
- (g) reinjection for enhanced oil recovery;
- (h) fuel cell production; and
- (i) other alternative beneficial uses approved by the division.

Section 4 - Notices

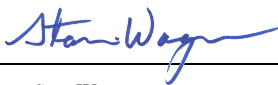
1. If, at any time after Operator submits this Natural Gas Management Plan and before the well is spud:

(a) Operator becomes aware that the natural gas gathering system it planned to connect the well(s) to has become unavailable or will not have capacity to transport one hundred percent of the production from the well(s), no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised venting and flaring plan containing the information specified in Paragraph (5) of Subsection D of 19.15.27.9 NMAC; or

(b) Operator becomes aware that it has, cumulatively for the year, become out of compliance with its baseline natural gas capture rate or natural gas capture requirement, no later than 20 days after becoming aware of such information, Operator shall submit for OCD's approval a new or revised Natural Gas Management Plan for each well it plans to spud during the next 90 days containing the information specified in Paragraph (2) of Subsection D of 19.15.27.9 NMAC, and shall file an update for each Natural Gas Management Plan until Operator is back in compliance with its baseline natural gas capture rate or natural gas capture requirement.

2. OCD may deny or conditionally approve an APD if Operator does not make a certification, fails to submit an adequate venting and flaring plan which includes alternative beneficial uses for the anticipated volume of natural gas produced, or if OCD determines that Operator will not have adequate natural gas takeaway capacity at the time a well will be spud.

I certify that, after reasonable inquiry, the statements in and attached to this Natural Gas Management Plan are true and correct to the best of my knowledge and acknowledge that a false statement may be subject to civil and criminal penalties under the Oil and Gas Act.

Signature: 
Printed Name: Stan Wagner
Title: Regulatory Advisor
E-mail Address: stan.s.wagner@conocophillips.com
Date: 02/02/2022
Phone: 432-253-9685
OIL CONSERVATION DIVISION (Only applicable when submitted as a standalone form)
Approved By:
Title:
Approval Date:
Conditions of Approval:

VI. Separation Equipment

How Operator will size separation equipment to optimize gas capture:

All ConocoPhillips production facility equipment will be sized per industry standards (API 12J) with adequate retention time to effectively separate all phases of production. Each project will take into consideration the number of wells and type curves for each formation pool to ensure adequate facility capacity. Design considerations will also include review of all piping, tanks, VRU's and associated equipment to ensure optimized gas capture minimized risk of release.

VII. Operational Practices

Actions Operator will take to comply with the requirements below:

B. Drilling Operations

- During drilling, flare stacks will be located a minimum of 100 feet from the nearest surface hole location. All gas is captured or combusted. If an emergency or malfunction occurs, gas will be flared or vented for public health, safety, and the environment and be properly reported to the NMOCD pursuant to 19.15.27.8.G.
- Measure or estimate the volume of natural gas that is vented, flared or beneficially used during drilling, completion and production operations, regardless of the reason or authorization for such venting or flaring.

C. Completion Operations

- During completion operations, operator does not produce oil or gas but maintains adequate well control through completion operations.
- Individual well test separators will be set to properly separate gas and liquids. A temporary test separator will be utilized initially to process volumes. In addition, separators will be tied into flowback tanks which will be tied into the gas processing equipment for sales down a pipeline.

D. Venting and flaring during production operations

- During each phase of well life (drilling, completion and production) of a ConocoPhillips well, COP personnel will follow all necessary procedures to ensure both the operation and the equipment are within the NMAC 19.15.27.8 Subsection D guidelines.
- During well operations that require unloading of the well to atmospheric pressure, all reasonable actions will be taken to minimize vented gas
- Through the life of the well all flaring shall be measured, and venting events quantified using the data available and industry best practice.

E. Performance standards for separation, storage tank and flare equipment

- All storage tanks and separation equipment are designed minimize risk of liquid or vapor release and optimize gas capture. This includes automation for automatic gauging and pressure monitoring.

- All flare stacks are equipped with auto ignition devices and/or continuous pilots and are designed to operate at maximum combustion efficiency pursuant NMAC 19.15.27.8 Subsection E. Flares will follow COP spacing guidelines to ensure they are a safe distance from combustibles and operations equipment.
- COP personnel will conduct routine AVO inspections on a regular basis per NMAC 19.15.27.8 Subsection E guidelines.

F. Measurement of vented and flared natural gas.

- Measurement equipment will be installed to quantify gas flared during drilling, completion and production of the well.
- All measurement devices installed will meet accuracy ratings per AGA and API standards.
- Measurement devices will be installed without manifolds that allow diversion of gas around the metering element, except for the sole purpose of inspection of servicing the measurement device.

VIII. Best Management Practices

- Operator will curtail or shut in production, within reasonable limits, during upset conditions to minimize venting and flaring.
- When feasible, Operator will use equipment to capture gas that would otherwise be vented or flared.
- During completions and production operations Operator will minimize blowdowns to atmosphere
- When feasible, Operator will use electric or air actuated equipment to reduce bleed emissions

COG Operating, LLC - Rock Jelly Federal Com 712H

1. Geologic Formations

TVD of target	10,083' EOL	Pilot hole depth	NA
MD at TD:	25,492'	Deepest expected fresh water:	78'

Formation	Depth (TVD) from KB	Water/Mineral Bearing/ Target Zone?	Hazards*
Quaternary Fill	Surface	Water	
Rustler	523	Water	
Top of Salt	668	Salt	
Base of Salt	2791	Salt	
Lamar	3017	Salt Water	
Bell Canyon	3059	Salt Water	
Cherry Canyon	3916	Oil/Gas	
Brushy Canyon	5206	Oil/Gas	
Bone Spring Lime	6773	Oil/Gas	
1st Bone Spring Sand	7711	Oil/Gas	
2nd Bone Spring Sand	8313	Oil/Gas	
3rd Bone Spring Sand	9608	Oil/Gas	
Wolfcamp A	9973	Target	
Wolfcamp B	0	Not Penetrated	
Wolfcamp D	0	Not Penetrated	

2. Casing Program

Hole Size	Casing Interval		Csg. Size	Weight (lbs)	Grade	Conn.	SF Collapse	SF Burst	SF Body	SF Joint
	From	To								
14.75"	0	650	10.75"	45.5	N80	BTC	8.30	2.02	35.16	37.09
9.875"	0	7000	7.625"	29.7	HCL80	BTC	1.90	1.32	3.49	3.53
8.750"	7000	9450	7.625"	29.7	P110 RY	W 513	1.66	1.76	3.35	2.01
6.75"	0	8950	5.5"	23	P110 RY	TXP BTC	2.50	2.95	3.54	3.52
6.75"	8950	25,492	5.5"	23	P110 RY	W 441	2.47	2.98	3.57	3.25
BLM Minimum Safety Factor							1.125	1	1.6 Dry 1.8 Wet	1.6 Dry 1.8 Wet

Intermediate casing will be kept at least 1/3 full while running casing to mitigate collapse. Surface burst based on 0.7 frac gradient at the shoe with Gas Gradient 0.1 psi/ft to surface and
All casing strings will be tested in accordance with Onshore Oil and Gas Order #2 III.B.1.h

The 5 1/2" talon casing will be run back 200' into the intermediate casing to ensure the coupling OD clearance is greater than .422" for the cement bond tie in.

COG Operating, LLC - Rock Jelly Federal Com 712H

	Y or N
Is casing new? If used, attach certification as required in Onshore Order #1	Y
Does casing meet API specifications? If no, attach casing specification sheet.	Y
Is premium or uncommon casing planned? If yes attach casing specification sheet.	Y
Does the above casing design meet or exceed BLM's minimum standards? If not provide justification (loading assumptions, casing design criteria).	Y
Will the intermediate pipe be kept at a minimum 1/3 fluid filled to avoid approaching the collapse pressure rating of the casing?	Y
Is well located within Capitan Reef?	N
If yes, does production casing cement tie back a minimum of 50' above the Reef?	
Is well within the designated 4 string boundary?	
Is well located in SOPA but not in R-111-P?	N
If yes, are the first 2 strings cemented to surface and 3 rd string cement tied back 500' into previous casing?	
Is well located in R-111-P and SOPA?	N
If yes, are the first three strings cemented to surface?	
Is 2 nd string set 100' to 600' below the base of salt?	
Is well located in high Cave/Karst?	N
If yes, are there two strings cemented to surface?	
(For 2 string wells) If yes, is there a contingency casing if lost circulation occurs?	
Is well located in critical Cave/Karst?	N
If yes, are there three strings cemented to surface?	

COG Operating, LLC - Rock Jelly Federal Com 712H

3. Cementing Program

Casing	# Sk	Wt. lb/ gal	Yld ft3/ sack	H ₂ O gal/sk	500# Comp. Strength (hours)	Slurry Description
Surf.	310	13.5	1.75	9	12	Lead: Class C + 4% Gel + 1% CaCl ₂
	250	14.8	1.34	6.34	8	Tail: Class C + 2% CaCl ₂
Inter. Stage 1	680	10.3	3.3	22	24	Halliburton tunded light
	250	14.8	1.35	6.6	8	Tail: Class H
Prod	415	12.7	2	10.7	72	Lead: 50:50:10 H Blend
	1560	14.4	1.24	5.7	19	Tail: 50:50:2 Class H Blend

If losses are encountered in the intermediate section a DV/ECP tool will be run ~50' above the Lamar Lime top, cement will be adjusted accordingly if this contingency is necessary.

Volumes Subject to Observed Hole Conditions and/or Fluid Caliper Results

Lab reports with the 500 psi compressive strength time for the cement will be onsite for review.

Casing String	TOC	% Excess
Surface	0'	50%
1 st Intermediate	0'	50%
Production	8,950'	35% OH in Lateral (KOP to EOL)

COG Operating, LLC - Rock Jelly Federal Com 712H

4. Pressure Control Equipment

N	A variance is requested for the use of a diverter on the surface casing. See attached for schematic.
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BOP installed and tested before drilling which hole?	Size?	Min. Required WP	Type	x	Tested to:
9-7/8"	13-5/8"	5M	Annular	x	2500psi
			Blind Ram	x	5000psi
			Pipe Ram	x	
			Double Ram	x	
			Other*		
6-3/4"	13-5/8"	10M	5M Annular	x	5000psi
			Blind Ram	x	10000psi
			Pipe Ram	x	
			Double Ram	x	
			Other*		

BOP/BOPE will be tested by an independent service company to 250 psi low and the high pressure indicated above per Onshore Order 2 requirements. The System may be upgraded to a higher pressure but still tested to the working pressure listed in the table above. If the system is upgraded all the components installed will be functional and tested.

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. Other accessories to the BOP equipment will include a Kelly cock and floor safety valve (inside BOP) and choke lines and choke manifold. See attached schematics.

Y	Formation integrity test will be performed per Onshore Order #2. On Exploratory wells or 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. Will be tested in accordance with Onshore Oil and Gas Order #2 III.B.1.i.
Y	A variance is requested for the use of a flexible choke line from the BOP to Choke Manifold. See attached for specs and hydrostatic test chart.
N	Are anchors required by manufacturer?
Y	A multibowl wellhead is being used. The BOP will be tested per Onshore Order #2 after installation on the surface casing which will cover testing requirements for a maximum of 30 days. If any seal subject to test pressure is broken the system must be tested.

COG Operating, LLC - Rock Jelly Federal Com 712H

5. Mud Program

Depth		Type	Weight (ppg)	Viscosity	Water Loss
From	To				
0	Surf. Shoe	FW Gel	8.6 - 8.8	28-34	N/C
Surf csg	7-5/8" Int shoe	Brine Diesel Emulsion	8.4 - 9	28-34	N/C
7-5/8" Int shoe	Lateral TD	OBM	9.6 - 12.5	35-45	<20

Sufficient mud materials to maintain mud properties and meet minimum lost circulation and weight increase requirements will be kept on location at all times.

What will be used to monitor the loss or gain of fluid?	PVT/Pason/Visual Monitoring
---	-----------------------------

6. Logging and Testing Procedures

Logging, Coring and Testing.	
Y	Will run GR/CNL from TD to surface (horizontal well – vertical portion of hole). Stated logs run will be in the Completion Report and submitted to the BLM.
Y	No Logs are planned based on well control or offset log information.
N	Drill stem test? If yes, explain.
N	Coring? If yes, explain.

Additional logs planned		Interval
N	Resistivity	Pilot Hole TD to ICP
N	Density	Pilot Hole TD to ICP
Y	CBL	Production casing (If cement not circulated to surface)
Y	Mud log	Intermediate shoe to TD
N	PEX	

COG Operating, LLC - Rock Jelly Federal Com 712H

7. Drilling Conditions

Condition	Specify what type and where?
BH Pressure at deepest TVD	6555 psi at 10083' TVD
Abnormal Temperature	NO 160 Deg. F.

No abnormal pressure or temperature conditions are anticipated. Sufficient mud materials to maintain mud properties and weight increase requirements will be kept on location at all times.

Sufficient supplies of Paper/LCM for periodic sweeps to control seepage and losses will be maintained on location.

Hydrogen Sulfide (H₂S) monitors will be installed prior to drilling out the surface shoe. If H₂S is detected in concentrations greater than 100 ppm, the operator will comply with the provisions of Onshore Oil and Gas Order #6. If Hydrogen Sulfide is encountered, measured values and formations will be provided to the BLM.

N H₂S is present

Y H₂S Plan attached

8. Other Facets of Operation

Y	Is it a walking operation?
Y	Is casing pre-set?

x	H ₂ S Plan.
x	BOP & Choke Schematics.
x	Directional Plan

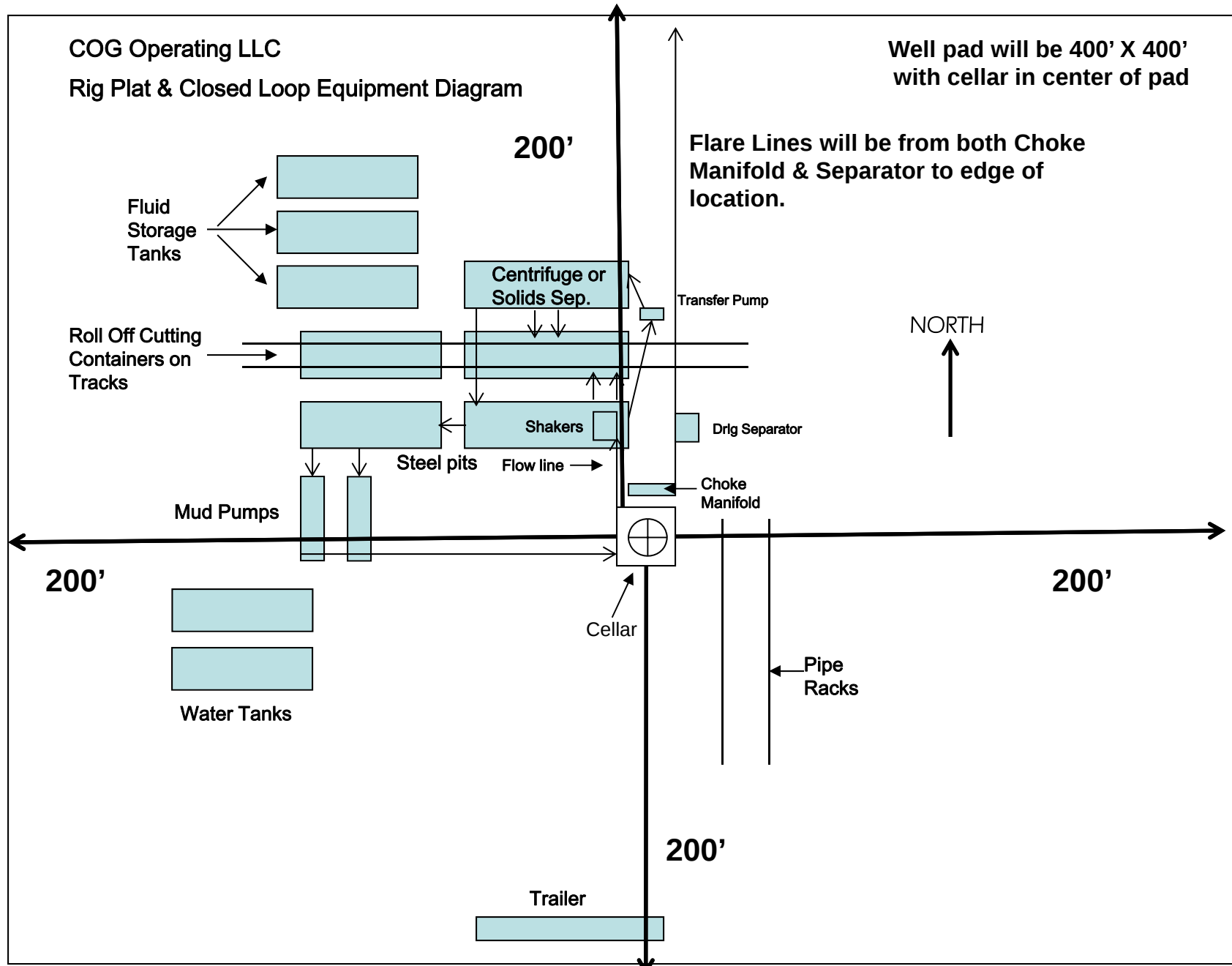


Exhibit 1

"I further certify that COG will comply with Rule 19.15.17 NMAC by using a Closed Loop System."

DELAWARE BASIN WEST

ATLAS PROSPECT (NM-E)

ROCK JELLY FEDERAL PROJECT (ATLAS 2629)

ROCK JELLY FED COM #712H

OWB

PWP1

Anticollision Report

18 January, 2022

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Reference	PWP1		
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 centre distance of 1,000.0usft	Error Surface:	Pedal Curve
Warning Levels Evaluated at:	2.00 Sigma	Casing Method:	Not applied

Survey Tool Program	Date	1/18/2022		
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description
0.0	9,620.0	PWP1 (OWB)	Standard Keeper 104	Standard Wireline Keeper ver 1.0.4
9,620.0	25,492.9	PWP1 (OWB)	MWD+IFR1+FDIR	OWSG MWD + IFR1 + FDIR Correction

Summary						
Site Name	Reference Measured Depth (usft)	Offset Measured Depth (usft)	Distance Between Centres (usft)	Distance Between Ellipses (usft)	Separation Factor	Warning
Offset Well - Wellbore - Design						
ROCK JELLY FEDERAL PROJECT (ATLAS 2629)						
ROCK JELLY FED COM #703H - OWB - PWP1	1,916.5	1,917.0	74.1	67.1	10.579	CC
ROCK JELLY FED COM #703H - OWB - PWP1	2,000.0	2,000.0	74.1	67.1	10.452	ES, SF
ROCK JELLY FED COM #704H - OWB - PWP1	2,261.8	2,262.4	52.0	44.0	6.455	CC, ES
ROCK JELLY FED COM #704H - OWB - PWP1	25,475.7	25,740.9	478.6	214.1	1.810	Advise and Monitor, SF
ROCK JELLY FED COM #705H - OWB - PWP1	1,916.6	1,916.8	45.0	37.3	5.818	CC
ROCK JELLY FED COM #705H - OWB - PWP1	2,000.0	2,000.2	45.0	37.1	5.714	ES
ROCK JELLY FED COM #705H - OWB - PWP1	25,460.6	25,503.4	840.2	571.0	3.122	SF
ROCK JELLY FED COM #710H - OWB - PWP1	2,416.6	2,416.9	60.1	53.3	8.785	CC
ROCK JELLY FED COM #710H - OWB - PWP1	2,500.0	2,500.0	60.1	53.2	8.713	ES
ROCK JELLY FED COM #710H - OWB - PWP1	25,493.4	25,521.5	840.1	570.3	3.114	SF
ROCK JELLY FED COM #711H - OWB - PWP1	2,416.6	2,416.8	30.0	23.2	4.385	CC
ROCK JELLY FED COM #711H - OWB - PWP1	2,500.0	2,500.2	30.0	23.1	4.349	ES
ROCK JELLY FED COM #711H - OWB - PWP1	25,493.4	25,738.7	483.7	219.7	1.832	Advise and Monitor, SF

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

TD 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
ROCK JELLY FEDERAL PROJECT (ATLAS 2629)						
ROCK JELLY FED COM #703H - OWB - PWP1	25,493.4	25,812.2				Out of Range @TD
ROCK JELLY FED COM #704H - OWB - PWP1	25,493.4	25,741.6	478.9	214.6	1.812	Advise and Monitor
ROCK JELLY FED COM #705H - OWB - PWP1	25,493.4	25,505.0	840.7	571.6	3.124	
ROCK JELLY FED COM #710H - OWB - PWP1	25,493.4	25,521.5	840.1	570.3	3.114	SF
ROCK JELLY FED COM #711H - OWB - PWP1	25,493.4	25,738.7	483.7	219.7	1.832	Advise and Monitor, SF

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #703H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9730-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Distance	Minimum	Separation	Warning		
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Separation Factor		
0.0	0.0	0.5	0.5	3.0	3.0	52.34	45.3	58.7	74.1				
100.0	100.0	100.5	100.5	3.0	3.0	52.34	45.3	58.7	74.1	68.1	6.00	12.357	
200.0	200.0	200.5	200.5	3.0	3.0	52.34	45.3	58.7	74.1	68.1	6.01	12.345	
300.0	300.0	300.5	300.5	3.0	3.0	52.34	45.3	58.7	74.1	68.1	6.02	12.321	
400.0	400.0	400.5	400.5	3.0	3.0	52.34	45.3	58.7	74.1	68.1	6.04	12.284	
500.0	500.0	500.5	500.5	3.1	3.1	52.34	45.3	58.7	74.1	68.1	6.06	12.234	
600.0	600.0	600.5	600.5	3.1	3.1	52.34	45.3	58.7	74.1	68.1	6.09	12.173	
700.0	700.0	700.5	700.5	3.1	3.1	52.34	45.3	58.7	74.1	68.0	6.13	12.100	
800.0	800.0	800.5	800.5	3.2	3.2	52.34	45.3	58.7	74.1	68.0	6.17	12.016	
900.0	900.0	900.5	900.5	3.2	3.2	52.34	45.3	58.7	74.1	67.9	6.22	11.922	
1,000.0	1,000.0	1,000.5	1,000.5	3.2	3.2	52.34	45.3	58.7	74.1	67.9	6.27	11.819	
1,100.0	1,100.0	1,100.5	1,100.5	3.3	3.3	52.34	45.3	58.7	74.1	67.8	6.33	11.707	
1,200.0	1,200.0	1,200.5	1,200.5	3.4	3.4	52.34	45.3	58.7	74.1	67.7	6.40	11.588	
1,300.0	1,300.0	1,300.5	1,300.5	3.4	3.4	52.34	45.3	58.7	74.1	67.7	6.47	11.462	
1,400.0	1,400.0	1,400.5	1,400.5	3.5	3.5	52.34	45.3	58.7	74.1	67.6	6.54	11.330	
1,500.0	1,500.0	1,500.5	1,500.5	3.5	3.5	52.34	45.3	58.7	74.1	67.5	6.62	11.192	
1,600.0	1,600.0	1,600.5	1,600.5	3.6	3.6	52.34	45.3	58.7	74.1	67.4	6.71	11.050	
1,700.0	1,700.0	1,700.5	1,700.5	3.7	3.7	52.34	45.3	58.7	74.1	67.3	6.80	10.904	
1,800.0	1,800.0	1,800.5	1,800.5	3.8	3.8	52.34	45.3	58.7	74.1	67.3	6.89	10.755	
1,900.0	1,900.0	1,900.5	1,900.5	3.9	3.9	52.34	45.3	58.7	74.1	67.2	6.99	10.604	
1,916.5	1,916.5	1,917.0	1,917.0	3.9	3.9	52.34	45.3	58.7	74.1	67.1	7.01	10.579 CC	
2,000.0	2,000.0	2,000.0	2,000.0	3.9	3.9	52.34	45.3	58.7	74.1	67.1	7.09	10.452 ES, SF	
2,100.0	2,100.0	2,098.1	2,098.1	4.0	4.0	52.79	45.8	60.3	75.8	68.6	7.19	10.533	
2,200.0	2,200.0	2,195.5	2,195.3	4.1	4.0	54.03	47.2	65.1	80.6	73.3	7.28	11.074	
2,300.0	2,300.0	2,292.4	2,291.9	4.2	4.1	55.78	49.6	73.0	88.7	81.3	7.34	12.073	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #703H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program:		0-Standard Keeper 104, 9730-MWD+IFR1+FDIR					Rule Assigned:				Offset Well Error:		3.0 usft	
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Distance					Warning			
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
2,400.0	2,400.0	2,388.6	2,387.4	4.3	4.1	57.75	52.9	83.9	100.0	92.6	7.40	13.517		
2,500.0	2,500.0	2,487.3	2,485.1	4.4	4.2	59.61	56.9	97.0	113.5	106.0	7.47	15.188		
2,600.0	2,600.0	2,586.2	2,583.1	4.5	4.3	106.47	60.9	110.2	127.6	120.0	7.52	16.959		
2,700.0	2,699.8	2,684.7	2,680.6	4.6	4.3	109.30	64.9	123.3	142.9	135.4	7.53	18.968		
2,750.0	2,749.7	2,733.8	2,729.3	4.6	4.3	110.92	66.8	129.9	151.2	143.6	7.54	20.059		
2,800.0	2,799.5	2,782.9	2,777.8	4.6	4.4	112.67	68.8	136.4	159.7	152.2	7.54	21.180		
2,900.0	2,899.1	2,880.9	2,875.0	4.7	4.4	115.65	72.8	149.4	177.2	169.6	7.57	23.403		
3,000.0	2,998.7	2,979.0	2,972.1	4.8	4.5	118.10	76.7	162.5	195.1	187.4	7.62	25.584		
3,100.0	3,098.4	3,077.1	3,069.2	4.9	4.6	120.13	80.7	175.6	213.2	205.5	7.70	27.708		
3,200.0	3,198.0	3,175.2	3,166.3	5.0	4.7	121.84	84.6	188.6	231.6	223.8	7.78	29.766		
3,300.0	3,297.6	3,273.3	3,263.5	5.1	4.7	123.31	88.6	201.7	250.1	242.3	7.88	31.752		
3,400.0	3,397.2	3,371.3	3,360.6	5.2	4.8	124.57	92.5	214.8	268.8	260.8	7.99	33.663		
3,500.0	3,496.8	3,469.4	3,457.7	5.2	4.9	125.66	96.5	227.8	287.6	279.5	8.10	35.497		
3,600.0	3,596.4	3,567.5	3,554.8	5.3	5.0	126.62	100.5	240.9	306.5	298.3	8.23	37.253		
3,700.0	3,696.1	3,665.6	3,652.0	5.4	5.1	127.47	104.4	254.0	325.4	317.1	8.36	38.933		
3,800.0	3,795.7	3,763.7	3,749.1	5.5	5.2	128.23	108.4	267.0	344.5	336.0	8.50	40.537		
3,900.0	3,895.3	3,861.7	3,846.2	5.6	5.3	128.91	112.3	280.1	363.5	354.9	8.64	42.068		
4,000.0	3,994.9	3,959.8	3,943.3	5.7	5.4	129.52	116.3	293.2	382.6	373.8	8.79	43.526		
4,100.0	4,094.5	4,057.9	4,040.5	5.8	5.4	130.07	120.2	306.2	401.8	392.8	8.95	44.915		
4,200.0	4,194.2	4,156.0	4,137.6	5.9	5.5	130.57	124.2	319.3	421.0	411.9	9.10	46.237		
4,300.0	4,293.8	4,254.0	4,234.7	6.0	5.6	131.03	128.1	332.4	440.2	430.9	9.27	47.495		
4,400.0	4,393.4	4,352.1	4,331.8	6.1	5.7	131.45	132.1	345.4	459.4	450.0	9.44	48.691		
4,500.0	4,493.0	4,450.2	4,429.0	6.2	5.8	131.84	136.0	358.5	478.7	469.1	9.61	49.828		
4,600.0	4,592.6	4,548.3	4,526.1	6.4	5.9	132.20	140.0	371.5	497.9	488.2	9.78	50.908		
4,700.0	4,692.3	4,646.4	4,623.2	6.5	6.0	132.52	144.0	384.6	517.2	507.3	9.96	51.935		
4,800.0	4,791.9	4,744.4	4,720.3	6.6	6.1	132.83	147.9	397.7	536.5	526.4	10.14	52.911		
4,900.0	4,891.5	4,842.5	4,817.5	6.7	6.3	133.12	151.9	410.7	555.9	545.5	10.32	53.837		
5,000.0	4,991.1	4,940.6	4,914.6	6.8	6.4	133.38	155.8	423.8	575.2	564.7	10.51	54.718		
5,100.0	5,090.7	5,038.7	5,011.7	6.9	6.5	133.63	159.8	436.9	594.5	583.8	10.70	55.554		
5,200.0	5,190.4	5,136.8	5,108.8	7.0	6.6	133.86	163.7	449.9	613.9	603.0	10.89	56.349		
5,300.0	5,290.0	5,234.8	5,206.0	7.1	6.7	134.08	167.7	463.0	633.3	622.2	11.09	57.104		
5,400.0	5,389.6	5,332.9	5,303.1	7.2	6.8	134.29	171.6	476.1	652.6	641.4	11.29	57.821		
5,500.0	5,489.2	5,431.0	5,400.2	7.3	6.9	134.48	175.6	489.1	672.0	660.5	11.49	58.503		
5,600.0	5,588.8	5,529.1	5,497.3	7.5	7.0	134.66	179.5	502.2	691.4	679.7	11.69	59.151		
5,700.0	5,688.5	5,627.2	5,594.5	7.6	7.1	134.84	183.5	515.3	710.8	698.9	11.89	59.767		
5,800.0	5,788.1	5,725.2	5,691.6	7.7	7.2	135.00	187.4	528.3	730.2	718.1	12.10	60.353		
5,900.0	5,887.7	5,823.3	5,788.7	7.8	7.4	135.16	191.4	541.4	749.6	737.3	12.31	60.909		
6,000.0	5,987.3	5,921.4	5,885.8	7.9	7.5	135.30	195.4	554.5	769.0	756.5	12.52	61.439		
6,100.0	6,086.9	6,019.5	5,983.0	8.0	7.6	135.44	199.3	567.5	788.4	775.7	12.73	61.942		
6,200.0	6,186.6	6,117.6	6,080.1	8.1	7.7	135.58	203.3	580.6	807.9	794.9	12.94	62.421		
6,300.0	6,286.2	6,215.6	6,177.2	8.3	7.8	135.70	207.2	593.6	827.3	814.1	13.16	62.877		
6,400.0	6,385.8	6,313.7	6,274.3	8.4	7.9	135.83	211.2	606.7	846.7	833.3	13.37	63.311		
6,500.0	6,485.4	6,411.8	6,371.5	8.5	8.1	135.94	215.1	619.8	866.1	852.5	13.59	63.723		
6,600.0	6,585.0	6,509.9	6,468.6	8.6	8.2	136.05	219.1	632.8	885.6	871.8	13.81	64.116		
6,700.0	6,684.7	6,608.0	6,565.7	8.7	8.3	136.16	223.0	645.9	905.0	891.0	14.03	64.489		
6,800.0	6,784.3	6,706.0	6,662.8	8.8	8.4	136.26	227.0	659.0	924.4	910.2	14.26	64.845		
6,900.0	6,883.9	6,804.1	6,760.0	9.0	8.5	136.36	230.9	672.0	943.9	929.4	14.48	65.184		
7,000.0	6,983.5	6,902.2	6,857.1	9.1	8.7	136.45	234.9	685.1	963.3	948.6	14.71	65.506		
7,100.0	7,083.1	7,000.3	6,954.2	9.2	8.8	136.54	238.9	698.2	982.8	967.9	14.93	65.813		

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9721-MWD+IFR1+FDIR													Offset Well Error:	3.0 usft
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Distance Between Centres (usft)		Minimum Separation (usft)	Separation Factor	Warning	
							+N/-S (usft)	+E/-W (usft)						
0.0	0.0	0.3	0.3	3.0	3.0	32.38	45.1	28.6	53.4					
100.0	100.0	100.3	100.3	3.0	3.0	32.38	45.1	28.6	53.4	47.4	6.00	8.900		
200.0	200.0	200.3	200.3	3.0	3.0	32.38	45.1	28.6	53.4	47.4	6.01	8.888		
300.0	300.0	300.3	300.3	3.0	3.0	32.38	45.1	28.6	53.4	47.4	6.03	8.862		
400.0	400.0	400.3	400.3	3.0	3.0	32.38	45.1	28.6	53.4	47.4	6.05	8.824		
500.0	500.0	500.3	500.3	3.1	3.1	32.38	45.1	28.6	53.4	47.3	6.09	8.773		
600.0	600.0	600.3	600.3	3.1	3.1	32.38	45.1	28.6	53.4	47.3	6.13	8.710		
700.0	700.0	700.3	700.3	3.1	3.1	32.38	45.1	28.6	53.4	47.2	6.18	8.636		
800.0	800.0	800.3	800.3	3.2	3.2	32.38	45.1	28.6	53.4	47.2	6.25	8.551		
900.0	900.0	900.3	900.3	3.2	3.2	32.38	45.1	28.6	53.4	47.1	6.31	8.457		
1,000.0	1,000.0	1,000.3	1,000.3	3.2	3.2	32.38	45.1	28.6	53.4	47.0	6.39	8.355		
1,100.0	1,100.0	1,100.3	1,100.3	3.3	3.3	32.38	45.1	28.6	53.4	46.9	6.48	8.246		
1,200.0	1,200.0	1,200.3	1,200.3	3.4	3.4	32.38	45.1	28.6	53.4	46.8	6.57	8.131		
1,300.0	1,300.0	1,300.3	1,300.3	3.4	3.4	32.38	45.1	28.6	53.4	46.7	6.67	8.010		
1,400.0	1,400.0	1,400.3	1,400.3	3.5	3.5	32.38	45.1	28.6	53.4	46.6	6.77	7.885		
1,500.0	1,500.0	1,500.3	1,500.3	3.5	3.5	32.38	45.1	28.6	53.4	46.5	6.89	7.756		
1,600.0	1,600.0	1,600.3	1,600.3	3.6	3.6	32.38	45.1	28.6	53.4	46.4	7.00	7.626		
1,700.0	1,700.0	1,700.3	1,700.3	3.7	3.7	32.38	45.1	28.6	53.4	46.3	7.13	7.493		
1,800.0	1,800.0	1,800.3	1,800.3	3.8	3.8	32.38	45.1	28.6	53.4	46.1	7.26	7.359		
1,900.0	1,900.0	1,900.3	1,900.3	3.9	3.9	32.38	45.1	28.6	53.4	46.0	7.39	7.225		
2,000.0	2,000.0	2,000.3	2,000.3	3.9	3.9	32.38	45.1	28.6	53.4	45.9	7.53	7.091		
2,100.0	2,100.0	2,100.7	2,100.7	4.0	4.0	30.52	45.7	26.9	53.0	45.4	7.68	6.901		
2,200.0	2,200.0	2,200.8	2,200.6	4.1	4.1	24.85	47.4	22.0	52.3	44.4	7.89	6.621		
2,261.8	2,261.8	2,262.4	2,262.1	4.2	4.1	19.38	49.1	17.3	52.0	44.0	8.06	6.455 CC, ES		
2,300.0	2,300.0	2,300.5	2,299.9	4.2	4.1	15.28	50.3	13.8	52.2	44.0	8.17	6.385		
2,400.0	2,400.0	2,399.4	2,398.1	4.3	4.2	2.51	54.3	2.4	54.4	46.0	8.43	6.455		
2,500.0	2,500.0	2,498.4	2,496.1	4.4	4.2	-10.22	58.9	-10.6	60.0	51.4	8.58	6.996		
2,600.0	2,600.0	2,597.6	2,594.4	4.5	4.3	25.04	63.5	-23.6	66.4	57.8	8.64	7.690		
2,700.0	2,699.8	2,697.2	2,693.0	4.6	4.3	18.10	68.1	-36.7	71.0	62.4	8.69	8.179		
2,750.0	2,749.7	2,747.0	2,742.3	4.6	4.4	15.25	70.4	-43.3	72.5	63.7	8.71	8.315		
2,800.0	2,799.5	2,796.9	2,791.7	4.6	4.4	12.59	72.7	-49.8	73.6	64.9	8.74	8.420		
2,900.0	2,899.1	2,896.6	2,890.5	4.7	4.5	7.54	77.3	-62.9	76.4	67.6	8.79	8.685		
3,000.0	2,998.7	2,996.4	2,989.3	4.8	4.6	2.87	81.9	-76.0	79.7	70.8	8.84	9.011		
3,100.0	3,098.4	3,096.1	3,088.0	4.9	4.6	-1.40	86.5	-89.1	83.5	74.6	8.89	9.386		
3,200.0	3,198.0	3,195.9	3,186.8	5.0	4.7	-5.28	91.1	-102.2	87.7	78.7	8.94	9.801		
3,300.0	3,297.6	3,295.6	3,285.6	5.1	4.8	-8.79	95.7	-115.3	92.3	83.2	9.00	10.245		
3,400.0	3,397.2	3,395.3	3,384.4	5.2	4.9	-11.96	100.3	-128.4	97.1	88.1	9.07	10.711		
3,500.0	3,496.8	3,495.1	3,483.1	5.2	5.0	-14.81	104.9	-141.5	102.3	93.2	9.14	11.190		
3,600.0	3,596.4	3,594.8	3,581.9	5.3	5.0	-17.39	109.5	-154.6	107.7	98.5	9.22	11.677		
3,700.0	3,696.1	3,694.6	3,680.7	5.4	5.1	-19.72	114.1	-167.7	113.3	104.0	9.31	12.168		
3,800.0	3,795.7	3,794.3	3,779.5	5.5	5.2	-21.83	118.7	-180.8	119.0	109.6	9.40	12.658		
3,900.0	3,895.3	3,894.1	3,878.2	5.6	5.3	-23.74	123.4	-193.9	124.9	115.4	9.51	13.145		
4,000.0	3,994.9	3,993.8	3,977.0	5.7	5.4	-25.48	128.0	-206.9	131.0	121.4	9.61	13.625		
4,100.0	4,094.5	4,093.5	4,075.8	5.8	5.5	-27.06	132.6	-220.0	137.1	127.4	9.73	14.098		
4,200.0	4,194.2	4,193.3	4,174.5	5.9	5.6	-28.51	137.2	-233.1	143.4	133.5	9.85	14.561		
4,300.0	4,293.8	4,293.0	4,273.3	6.0	5.7	-29.83	141.8	-246.2	149.7	139.7	9.97	15.013		
4,400.0	4,393.4	4,392.8	4,372.1	6.1	5.8	-31.05	146.4	-259.3	156.1	146.0	10.10	15.454		
4,500.0	4,493.0	4,492.5	4,470.9	6.2	5.9	-32.17	151.0	-272.4	162.5	152.3	10.23	15.882		
4,600.0	4,592.6	4,592.3	4,569.6	6.4	6.0	-33.20	155.6	-285.5	169.0	158.7	10.37	16.299		
4,700.0	4,692.3	4,692.0	4,668.4	6.5	6.1	-34.16	160.2	-298.6	175.6	165.1	10.51	16.702		
4,800.0	4,791.9	4,791.7	4,767.2	6.6	6.2	-35.05	164.8	-311.7	182.2	171.5	10.66	17.093		

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9721-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Reference	Vertical	Offset	Vertical	Semi Major Axis	Offset	Highside	Offset Wellbore Centre		Rule Assigned:		Minimum	Separation	Warning
Measured Depth (usft)	Depth (usft)	Depth (usft)	Depth (usft)	Reference (usft)	Offset (usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Separation (usft)	Factor	
4,900.0	4,891.5	4,891.5	4,865.9	6.7	6.3	-35.88	169.4	-324.8	188.9	178.0	10.81	17.470	
5,000.0	4,991.1	4,991.2	4,964.7	6.8	6.4	-36.65	174.0	-337.9	195.5	184.6	10.96	17.835	
5,100.0	5,090.7	5,091.0	5,063.5	6.9	6.6	-37.37	178.6	-351.0	202.3	191.1	11.12	18.188	
5,200.0	5,190.4	5,190.7	5,162.3	7.0	6.7	-38.04	183.2	-364.1	209.0	197.7	11.28	18.527	
5,300.0	5,290.0	5,290.5	5,261.0	7.1	6.8	-38.67	187.8	-377.2	215.8	204.3	11.44	18.855	
5,400.0	5,389.6	5,390.2	5,359.8	7.2	6.9	-39.26	192.5	-390.3	222.6	211.0	11.61	19.170	
5,500.0	5,489.2	5,489.9	5,458.6	7.3	7.0	-39.82	197.1	-403.4	229.4	217.6	11.78	19.474	
5,600.0	5,588.8	5,589.7	5,557.4	7.5	7.1	-40.35	201.7	-416.5	236.3	224.3	11.95	19.766	
5,700.0	5,688.5	5,689.4	5,656.1	7.6	7.2	-40.84	206.3	-429.6	243.1	231.0	12.13	20.047	
5,800.0	5,788.1	5,789.2	5,754.9	7.7	7.4	-41.31	210.9	-442.7	250.0	237.7	12.30	20.318	
5,900.0	5,887.7	5,888.9	5,853.7	7.8	7.5	-41.75	215.5	-455.7	256.9	244.4	12.48	20.578	
6,000.0	5,987.3	5,988.7	5,952.4	7.9	7.6	-42.17	220.1	-468.8	263.8	251.1	12.67	20.827	
6,100.0	6,086.9	6,088.4	6,051.2	8.0	7.7	-42.57	224.7	-481.9	270.7	257.9	12.85	21.067	
6,200.0	6,186.6	6,188.1	6,150.0	8.1	7.8	-42.95	229.3	-495.0	277.7	264.6	13.04	21.298	
6,300.0	6,286.2	6,287.9	6,248.8	8.3	7.9	-43.31	233.9	-508.1	284.6	271.4	13.23	21.520	
6,400.0	6,385.8	6,387.6	6,347.5	8.4	8.1	-43.65	238.5	-521.2	291.6	278.1	13.42	21.732	
6,500.0	6,485.4	6,487.4	6,446.3	8.5	8.2	-43.98	243.1	-534.3	298.5	284.9	13.61	21.936	
6,600.0	6,585.0	6,587.1	6,545.1	8.6	8.3	-44.29	247.7	-547.4	305.5	291.7	13.80	22.132	
6,700.0	6,684.7	6,686.9	6,643.8	8.7	8.4	-44.59	252.3	-560.5	312.5	298.5	14.00	22.321	
6,800.0	6,784.3	6,786.6	6,742.6	8.8	8.6	-44.87	256.9	-573.6	319.5	305.3	14.20	22.501	
6,900.0	6,883.9	6,886.3	6,841.4	9.0	8.7	-45.15	261.5	-586.7	326.5	312.1	14.40	22.674	
7,000.0	6,983.5	6,986.1	6,940.2	9.1	8.8	-45.41	266.2	-599.8	333.5	318.9	14.60	22.840	
7,100.0	7,083.1	7,085.8	7,038.9	9.2	8.9	-45.66	270.8	-612.9	340.5	325.7	14.80	23.000	
7,200.0	7,182.7	7,185.6	7,137.7	9.3	9.1	-45.90	275.4	-626.0	347.5	332.5	15.01	23.153	
7,300.0	7,282.4	7,285.3	7,236.5	9.4	9.2	-46.13	280.0	-639.1	354.6	339.3	15.22	23.299	
7,396.8	7,378.8	7,381.9	7,332.1	9.6	9.3	-46.35	284.4	-651.8	361.4	345.9	15.42	23.435	
7,400.0	7,382.0	7,385.1	7,335.3	9.6	9.3	-46.35	284.6	-652.2	361.6	346.2	15.43	23.440	
7,500.0	7,481.7	7,484.8	7,434.0	9.7	9.4	-46.52	289.2	-665.3	369.3	353.6	15.64	23.607	
7,600.0	7,581.5	7,584.6	7,532.9	9.8	9.6	-46.49	293.8	-678.4	378.1	362.3	15.86	23.834	
7,700.0	7,681.4	7,690.8	7,638.2	9.9	9.7	-46.33	298.4	-691.3	387.3	371.2	16.08	24.078	
7,800.0	7,781.4	7,797.3	7,744.0	10.0	9.8	-46.07	303.3	-702.4	395.9	379.6	16.31	24.268	
7,896.8	7,878.2	7,900.5	7,846.7	10.2	10.0	-90.65	305.4	-711.5	403.7	387.2	16.53	24.430	
7,900.0	7,881.4	7,903.9	7,850.1	10.2	10.0	-90.64	305.5	-711.7	404.0	387.5	16.53	24.435	
8,000.0	7,981.4	8,010.8	7,956.7	10.3	10.1	-90.26	308.1	-719.2	410.9	394.2	16.74	24.551	
8,100.0	8,081.4	8,117.9	8,063.7	10.4	10.2	-89.99	310.1	-724.7	416.1	399.2	16.94	24.566	
8,200.0	8,181.4	8,225.2	8,170.9	10.5	10.3	-89.81	311.4	-728.4	419.6	402.4	17.14	24.479	
8,300.0	8,281.4	8,332.7	8,278.4	10.6	10.4	-89.72	312.0	-730.2	421.2	403.9	17.33	24.306	
8,400.0	8,381.4	8,436.0	8,381.7	10.7	10.5	-89.71	312.1	-730.4	421.4	403.9	17.46	24.141	
8,500.0	8,481.4	8,536.0	8,481.7	10.8	10.6	-89.71	312.1	-730.4	421.4	403.9	17.55	24.011	
8,600.0	8,581.4	8,636.0	8,581.7	11.0	10.7	-89.71	312.1	-730.4	421.4	403.8	17.65	23.882	
8,700.0	8,681.4	8,736.0	8,681.7	11.1	10.8	-89.71	312.1	-730.4	421.4	403.7	17.74	23.754	
8,800.0	8,781.4	8,836.0	8,781.7	11.2	10.9	-89.71	312.1	-730.4	421.4	403.6	17.84	23.626	
8,900.0	8,881.4	8,936.0	8,881.7	11.3	11.0	-89.71	312.1	-730.4	421.4	403.5	17.93	23.499	
9,000.0	8,981.4	9,036.0	8,981.7	11.4	11.1	-89.71	312.1	-730.4	421.4	403.4	18.03	23.372	
9,100.0	9,081.4	9,136.0	9,081.7	11.6	11.2	-89.71	312.1	-730.4	421.4	403.3	18.13	23.246	
9,200.0	9,181.4	9,236.0	9,181.7	11.7	11.3	-89.71	312.1	-730.4	421.4	403.2	18.23	23.121	
9,300.0	9,281.4	9,336.0	9,281.7	11.8	11.4	-89.71	312.1	-730.4	421.4	403.1	18.32	22.997	
9,400.0	9,381.4	9,436.0	9,381.7	11.9	11.5	-89.71	312.1	-730.4	421.4	403.0	18.42	22.873	
9,500.0	9,481.4	9,536.0	9,481.7	12.0	11.6	-89.71	312.1	-730.4	421.4	402.9	18.52	22.750	
9,528.6	9,510.0	9,564.6	9,510.3	12.1	11.7	-89.71	312.1	-730.4	421.4	402.9	18.55	22.715	
9,550.0	9,531.4	9,586.0	9,531.7	12.1	11.7	92.10	312.1	-730.4	421.4	402.8	18.58	22.683	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1													Offset Site Error:	0.0 usft	
Survey Program:		0-Standard Keeper 104, 9721-MWD+IFR1+FDIR					Rule Assigned:							Offset Well Error:	3.0 usft
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Distance								Warning	
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor			
9,600.0	9,581.2	9,635.8	9,581.5	12.0	11.7	92.63	312.1	-730.4	421.6	402.9	18.68	22.564			
9,650.0	9,630.5	9,685.1	9,630.8	12.8	11.8	93.70	312.1	-730.4	422.1	403.2	18.86	22.378			
9,700.0	9,678.8	9,733.4	9,679.1	12.9	11.8	95.25	312.1	-730.4	423.1	404.0	19.08	22.170			
9,750.0	9,725.9	9,780.5	9,726.2	12.9	11.9	97.18	312.1	-730.4	425.0	405.6	19.38	21.926			
9,800.0	9,771.3	9,830.9	9,776.5	12.9	11.9	99.54	310.9	-730.4	428.1	408.4	19.72	21.716			
9,850.0	9,814.8	9,885.1	9,830.4	13.0	11.9	101.96	304.9	-730.2	432.1	412.1	20.02	21.581			
9,900.0	9,855.9	9,941.7	9,885.8	13.0	11.9	104.32	293.3	-729.8	436.9	416.6	20.33	21.494			
9,950.0	9,894.4	10,001.2	9,942.4	13.1	11.9	106.61	275.2	-729.3	442.2	421.6	20.64	21.424			
10,000.0	9,930.0	10,063.6	9,999.5	13.1	12.0	108.80	250.1	-728.5	448.0	427.0	21.00	21.332			
10,050.0	9,962.3	10,129.2	10,056.2	13.2	12.0	110.87	217.1	-727.4	453.9	432.5	21.43	21.178			
10,100.0	9,991.3	10,198.2	10,111.3	13.3	12.1	112.78	175.7	-726.2	459.8	437.9	21.97	20.932			
10,150.0	10,016.5	10,270.5	10,163.3	13.4	12.2	114.50	125.5	-724.6	465.4	442.8	22.61	20.580			
10,200.0	10,037.9	10,346.1	10,210.4	13.4	12.3	115.98	66.5	-722.8	470.4	447.0	23.36	20.139			
10,250.0	10,055.3	10,424.7	10,250.7	13.5	12.4	117.17	-0.9	-720.7	474.5	450.4	24.16	19.643			
10,300.0	10,068.6	10,505.7	10,282.3	13.6	12.5	118.04	-75.4	-718.4	477.6	452.7	24.95	19.146			
10,350.0	10,077.6	10,588.4	10,303.3	13.6	12.6	118.55	-155.3	-715.9	479.4	453.8	25.64	18.695			
10,400.0	10,082.2	10,671.9	10,312.6	13.7	12.7	118.67	-238.1	-713.3	479.8	453.7	26.18	18.329			
10,431.3	10,083.0	10,713.3	10,313.0	13.7	12.8	118.62	-279.5	-712.0	479.6	453.2	26.39	18.170			
10,500.0	10,082.6	10,782.0	10,312.7	13.8	12.9	118.62	-348.2	-709.9	479.6	452.7	26.85	17.861			
10,600.0	10,082.2	10,882.0	10,312.2	13.9	13.1	118.62	-448.1	-706.8	479.5	452.0	27.59	17.382			
10,700.0	10,081.7	10,982.0	10,311.7	14.0	13.4	118.62	-548.1	-703.7	479.5	451.1	28.41	16.879			
10,800.0	10,081.2	11,082.0	10,311.3	14.1	13.8	118.63	-648.0	-700.6	479.5	450.2	29.30	16.362			
10,900.0	10,080.8	11,182.0	10,310.8	14.3	14.3	118.63	-748.0	-697.5	479.5	449.2	30.27	15.841			
11,000.0	10,080.3	11,282.0	10,310.3	14.6	14.8	118.63	-847.9	-694.4	479.4	448.1	31.29	15.321			
11,100.0	10,079.8	11,382.0	10,309.8	14.9	15.3	118.63	-947.9	-691.2	479.4	447.0	32.37	14.809			
11,200.0	10,079.4	11,482.0	10,309.4	15.3	15.9	118.63	-1,047.8	-688.1	479.4	445.9	33.51	14.308			
11,300.0	10,078.9	11,582.0	10,308.9	15.9	16.6	118.63	-1,147.8	-685.0	479.4	444.7	34.68	13.822			
11,400.0	10,078.4	11,682.0	10,308.4	16.4	17.2	118.63	-1,247.7	-681.9	479.3	443.4	35.90	13.352			
11,500.0	10,078.0	11,782.0	10,308.0	17.1	17.9	118.64	-1,347.7	-678.8	479.3	442.2	37.16	12.900			
11,600.0	10,077.5	11,882.0	10,307.5	17.8	18.6	118.64	-1,447.6	-675.7	479.3	440.9	38.44	12.467			
11,700.0	10,077.0	11,982.0	10,307.0	18.5	19.3	118.64	-1,547.6	-672.6	479.3	439.5	39.76	12.053			
11,800.0	10,076.6	12,082.0	10,306.6	19.2	20.0	118.64	-1,647.5	-669.5	479.2	438.1	41.11	11.658			
11,900.0	10,076.1	12,182.0	10,306.1	20.0	20.8	118.64	-1,747.5	-666.4	479.2	436.7	42.48	11.282			
12,000.0	10,075.7	12,282.0	10,305.6	20.7	21.5	118.64	-1,847.4	-663.3	479.2	435.3	43.87	10.923			
12,100.0	10,075.2	12,382.0	10,305.2	21.5	22.3	118.64	-1,947.4	-660.2	479.2	433.9	45.28	10.581			
12,200.0	10,074.7	12,482.0	10,304.7	22.3	23.0	118.64	-2,047.3	-657.1	479.2	432.4	46.72	10.257			
12,300.0	10,074.3	12,582.0	10,304.2	23.0	23.8	118.65	-2,147.3	-654.0	479.1	431.0	48.16	9.948			
12,400.0	10,073.8	12,682.0	10,303.8	23.8	24.6	118.65	-2,247.2	-650.9	479.1	429.5	49.63	9.654			
12,500.0	10,073.3	12,782.0	10,303.3	24.6	25.4	118.65	-2,347.2	-647.8	479.1	428.0	51.11	9.374			
12,600.0	10,072.9	12,882.0	10,302.8	25.4	26.2	118.65	-2,447.1	-644.7	479.1	426.5	52.60	9.108			
12,700.0	10,072.4	12,982.0	10,302.4	26.2	27.0	118.65	-2,547.1	-641.6	479.0	424.9	54.10	8.855			
12,800.0	10,071.9	13,082.0	10,301.9	27.1	27.8	118.65	-2,647.0	-638.4	479.0	423.4	55.61	8.614			
12,900.0	10,071.5	13,182.0	10,301.4	27.9	28.6	118.65	-2,747.0	-635.3	479.0	421.8	57.13	8.383			
13,000.0	10,071.0	13,282.0	10,301.0	28.7	29.4	118.65	-2,846.9	-632.2	479.0	420.3	58.67	8.164			
13,100.0	10,070.5	13,382.0	10,300.5	29.5	30.2	118.66	-2,946.9	-629.1	478.9	418.7	60.21	7.955			
13,200.0	10,070.1	13,482.0	10,300.0	30.3	31.0	118.66	-3,046.8	-626.0	478.9	417.2	61.76	7.755			
13,300.0	10,069.6	13,582.0	10,299.6	31.2	31.8	118.66	-3,146.8	-622.9	478.9	415.6	63.31	7.564			
13,400.0	10,069.1	13,682.0	10,299.1	32.0	32.6	118.66	-3,246.7	-619.8	478.9	414.0	64.87	7.381			
13,500.0	10,068.7	13,782.0	10,298.6	32.8	33.4	118.66	-3,346.7	-616.7	478.8	412.4	66.44	7.207			
13,600.0	10,068.2	13,882.0	10,298.2	33.6	34.3	118.66	-3,446.6	-613.6	478.8	410.8	68.02	7.040			
13,700.0	10,067.7	13,982.0	10,297.7	34.5	35.1	118.66	-3,546.6	-610.5	478.8	409.2	69.60	6.879			

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9721-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference Offset (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Distance Between Centres (usft)		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)					
13,800.0	10,067.3	14,082.0	10,297.2	35.3	35.9	118.66	-3,646.5	-607.4	478.8	407.6	71.18	6.726	
13,900.0	10,066.8	14,182.0	10,296.8	36.1	36.7	118.67	-3,746.5	-604.3	478.7	406.0	72.77	6.579	
14,000.0	10,066.3	14,282.0	10,296.3	37.0	37.6	118.67	-3,846.4	-601.2	478.7	404.3	74.37	6.437	
14,100.0	10,065.9	14,382.0	10,295.8	37.8	38.4	118.67	-3,946.4	-598.1	478.7	402.7	75.96	6.302	
14,200.0	10,065.4	14,482.0	10,295.4	38.7	39.2	118.67	-4,046.3	-595.0	478.7	401.1	77.57	6.171	
14,300.0	10,064.9	14,582.0	10,294.9	39.5	40.1	118.67	-4,146.3	-591.9	478.6	399.5	79.17	6.046	
14,400.0	10,064.5	14,682.0	10,294.4	40.3	40.9	118.67	-4,246.2	-588.8	478.6	397.8	80.78	5.925	
14,500.0	10,064.0	14,782.0	10,294.0	41.2	41.7	118.67	-4,346.2	-585.6	478.6	396.2	82.39	5.809	
14,600.0	10,063.6	14,882.0	10,293.5	42.0	42.6	118.68	-4,446.1	-582.5	478.6	394.6	84.01	5.697	
14,700.0	10,063.1	14,982.0	10,293.0	42.9	43.4	118.68	-4,546.1	-579.4	478.5	392.9	85.63	5.589	
14,800.0	10,062.6	15,082.0	10,292.6	43.7	44.2	118.68	-4,646.0	-576.3	478.5	391.3	87.25	5.484	
14,900.0	10,062.2	15,182.0	10,292.1	44.6	45.1	118.68	-4,746.0	-573.2	478.5	389.6	88.87	5.384	
15,000.0	10,061.7	15,282.0	10,291.6	45.4	45.9	118.68	-4,845.9	-570.1	478.5	388.0	90.50	5.287	
15,090.1	10,061.3	15,372.0	10,291.2	46.2	46.7	118.68	-4,935.9	-567.3	478.4	386.5	91.97	5.202	
15,105.9	10,061.2	15,385.9	10,291.1	46.3	46.8	118.68	-4,949.7	-566.9	478.5	386.3	92.20	5.190	
15,200.0	10,060.8	15,468.0	10,290.8	47.1	47.5	118.67	-5,031.8	-565.9	478.7	385.1	93.55	5.117	
15,215.6	10,060.7	15,482.5	10,290.7	47.2	47.6	118.68	-5,046.4	-566.0	478.7	384.9	93.79	5.104	
15,244.2	10,060.6	15,510.1	10,290.6	47.5	47.8	118.68	-5,073.9	-566.2	478.7	384.4	94.23	5.080	
15,300.0	10,060.3	15,565.8	10,290.3	47.9	48.3	118.68	-5,129.7	-566.6	478.7	383.5	95.14	5.031	
15,400.0	10,059.8	15,665.8	10,289.8	48.8	49.1	118.68	-5,229.7	-567.4	478.7	381.9	96.77	4.946	
15,500.0	10,059.4	15,765.8	10,289.4	49.6	50.0	118.68	-5,329.7	-568.1	478.7	380.3	98.40	4.864	
15,600.0	10,058.9	15,865.8	10,288.9	50.5	50.8	118.68	-5,429.7	-568.9	478.7	378.6	100.04	4.785	
15,700.0	10,058.4	15,965.8	10,288.4	51.3	51.6	118.68	-5,529.7	-569.6	478.7	377.0	101.67	4.708	
15,800.0	10,058.0	16,065.8	10,288.0	52.2	52.5	118.67	-5,629.7	-570.4	478.7	375.4	103.31	4.633	
15,900.0	10,057.5	16,165.8	10,287.5	53.0	53.3	118.67	-5,729.7	-571.2	478.7	373.7	104.95	4.561	
16,000.0	10,057.1	16,265.8	10,287.0	53.8	54.2	118.67	-5,829.7	-571.9	478.7	372.1	106.59	4.491	
16,100.0	10,056.6	16,365.8	10,286.6	54.7	55.0	118.67	-5,929.6	-572.7	478.7	370.4	108.23	4.423	
16,200.0	10,056.1	16,465.8	10,286.1	55.5	55.9	118.67	-6,029.6	-573.4	478.7	368.8	109.87	4.357	
16,300.0	10,055.7	16,565.8	10,285.6	56.4	56.7	118.67	-6,129.6	-574.2	478.7	367.2	111.52	4.292	
16,400.0	10,055.2	16,665.8	10,285.2	57.2	57.5	118.67	-6,229.6	-574.9	478.7	365.5	113.16	4.230	
16,500.0	10,054.7	16,765.8	10,284.7	58.1	58.4	118.67	-6,329.6	-575.7	478.7	363.9	114.81	4.169	
16,600.0	10,054.3	16,865.8	10,284.2	58.9	59.2	118.67	-6,429.6	-576.4	478.7	362.2	116.45	4.110	
16,700.0	10,053.8	16,965.8	10,283.8	59.8	60.1	118.67	-6,529.6	-577.2	478.7	360.6	118.10	4.053	
16,800.0	10,053.4	17,065.8	10,283.3	60.6	60.9	118.67	-6,629.6	-577.9	478.7	358.9	119.75	3.997	
16,900.0	10,052.9	17,165.8	10,282.9	61.5	61.8	118.67	-6,729.6	-578.7	478.7	357.3	121.40	3.943	
17,000.0	10,052.4	17,265.8	10,282.4	62.3	62.6	118.67	-6,829.6	-579.4	478.7	355.6	123.05	3.890	
17,100.0	10,052.0	17,365.8	10,281.9	63.2	63.5	118.67	-6,929.6	-580.2	478.7	354.0	124.71	3.838	
17,200.0	10,051.5	17,465.8	10,281.5	64.0	64.3	118.67	-7,029.6	-580.9	478.7	352.3	126.36	3.788	
17,300.0	10,051.0	17,565.8	10,281.0	64.9	65.1	118.67	-7,129.6	-581.7	478.7	350.7	128.01	3.739	
17,400.0	10,050.6	17,665.8	10,280.5	65.7	66.0	118.67	-7,229.6	-582.4	478.7	349.0	129.67	3.692	
17,500.0	10,050.1	17,765.8	10,280.1	66.6	66.8	118.67	-7,329.6	-583.2	478.7	347.3	131.32	3.645	
17,600.0	10,049.6	17,865.8	10,279.6	67.4	67.7	118.67	-7,429.6	-583.9	478.7	345.7	132.98	3.600	
17,700.0	10,049.2	17,965.8	10,279.1	68.3	68.5	118.67	-7,529.6	-584.7	478.7	344.0	134.64	3.555	
17,800.0	10,048.7	18,065.8	10,278.7	69.1	69.4	118.67	-7,629.6	-585.4	478.7	342.4	136.29	3.512	
17,900.0	10,048.3	18,165.8	10,278.2	70.0	70.2	118.67	-7,729.6	-586.2	478.7	340.7	137.95	3.470	
18,000.0	10,047.8	18,265.8	10,277.7	70.8	71.1	118.67	-7,829.6	-586.9	478.7	339.1	139.61	3.429	
18,100.0	10,047.3	18,365.8	10,277.3	71.7	71.9	118.67	-7,929.6	-587.7	478.7	337.4	141.27	3.388	
18,200.0	10,046.9	18,465.8	10,276.8	72.5	72.8	118.67	-8,029.6	-588.4	478.7	335.7	142.93	3.349	
18,300.0	10,046.4	18,565.8	10,276.3	73.4	73.6	118.67	-8,129.6	-589.2	478.7	334.1	144.59	3.310	
18,400.0	10,045.9	18,665.8	10,275.9	74.2	74.5	118.67	-8,229.6	-589.9	478.7	332.4	146.25	3.273	
18,500.0	10,045.5	18,765.8	10,275.4	75.1	75.3	118.67	-8,329.6	-590.7	478.7	330.7	147.91	3.236	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program:		0-Standard Keeper 104, 9721-MWD+IFR1+FDIR						Rule Assigned:					Offset Well Error:	3.0 usft
Reference	Offset	Semi Major Axis		Offset Wellbore Centre			Distance			Warning				
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning	
18,600.0	10,045.0	18,865.8	10,274.9	75.9	76.2	118.67	-8,429.6	-591.4	478.7	329.1	149.57	3.200		
18,700.0	10,044.6	18,965.8	10,274.5	76.8	77.0	118.67	-8,529.5	-592.2	478.7	327.4	151.24	3.165		
18,800.0	10,044.1	19,065.8	10,274.0	77.6	77.9	118.67	-8,629.5	-592.9	478.7	325.8	152.90	3.131		
18,900.0	10,043.6	19,165.8	10,273.5	78.5	78.7	118.67	-8,729.5	-593.7	478.7	324.1	154.56	3.097		
19,000.0	10,043.2	19,265.8	10,273.1	79.3	79.6	118.67	-8,829.5	-594.4	478.7	322.4	156.23	3.064		
19,100.0	10,042.7	19,365.8	10,272.6	80.2	80.4	118.67	-8,929.5	-595.2	478.7	320.8	157.89	3.032		
19,200.0	10,042.2	19,465.8	10,272.2	81.0	81.3	118.67	-9,029.5	-595.9	478.7	319.1	159.56	3.000		
19,300.0	10,041.8	19,565.8	10,271.7	81.9	82.1	118.67	-9,129.5	-596.7	478.7	317.4	161.22	2.969		
19,400.0	10,041.3	19,665.8	10,271.2	82.8	83.0	118.67	-9,229.5	-597.4	478.7	315.8	162.89	2.939		
19,500.0	10,040.9	19,765.8	10,270.8	83.6	83.8	118.67	-9,329.5	-598.2	478.7	314.1	164.55	2.909		
19,600.0	10,040.4	19,865.8	10,270.3	84.5	84.7	118.66	-9,429.5	-598.9	478.7	312.4	166.22	2.880		
19,700.0	10,039.9	19,965.8	10,269.8	85.3	85.5	118.66	-9,529.5	-599.7	478.7	310.8	167.89	2.851		
19,800.0	10,039.5	20,065.8	10,269.4	86.2	86.4	118.66	-9,629.5	-600.4	478.7	309.1	169.55	2.823		
19,900.0	10,039.0	20,165.8	10,268.9	87.0	87.2	118.66	-9,729.5	-601.2	478.7	307.4	171.22	2.796		
20,000.0	10,038.5	20,265.8	10,268.4	87.9	88.1	118.66	-9,829.5	-601.9	478.7	305.8	172.89	2.769		
20,100.0	10,038.1	20,365.8	10,268.0	88.7	88.9	118.66	-9,929.5	-602.7	478.7	304.1	174.56	2.742		
20,200.0	10,037.6	20,465.8	10,267.5	89.6	89.8	118.66	-10,029.5	-603.4	478.7	302.4	176.23	2.716		
20,300.0	10,037.1	20,565.8	10,267.0	90.4	90.6	118.66	-10,129.5	-604.2	478.7	300.8	177.90	2.691		
20,400.0	10,036.7	20,665.8	10,266.6	91.3	91.5	118.66	-10,229.5	-604.9	478.6	299.1	179.56	2.666		
20,434.7	10,036.5	20,700.6	10,266.4	91.6	91.8	118.66	-10,264.2	-605.2	478.6	298.5	180.14	2.657		
20,439.7	10,036.5	20,705.0	10,266.4	91.6	91.8	118.66	-10,268.7	-605.2	478.7	298.4	180.22	2.656		
20,444.6	10,036.5	20,709.7	10,266.4	91.7	91.9	118.66	-10,273.4	-605.3	478.7	298.4	180.30	2.655		
20,500.0	10,036.2	20,765.1	10,266.1	92.1	92.3	118.66	-10,328.8	-605.8	478.7	297.4	181.22	2.641		
20,600.0	10,035.8	20,865.1	10,265.6	93.0	93.2	118.66	-10,428.8	-606.7	478.7	295.8	182.89	2.617		
20,700.0	10,035.3	20,965.1	10,265.2	93.8	94.1	118.66	-10,528.8	-607.6	478.7	294.1	184.56	2.594		
20,800.0	10,034.8	21,065.1	10,264.7	94.7	94.9	118.66	-10,628.7	-608.6	478.7	292.4	186.23	2.570		
20,900.0	10,034.4	21,165.1	10,264.2	95.6	95.8	118.66	-10,728.7	-609.5	478.7	290.8	187.90	2.547		
21,000.0	10,033.9	21,265.1	10,263.8	96.4	96.6	118.66	-10,828.7	-610.4	478.7	289.1	189.57	2.525		
21,100.0	10,033.4	21,365.1	10,263.3	97.3	97.5	118.66	-10,928.7	-611.3	478.7	287.4	191.24	2.503		
21,200.0	10,033.0	21,465.1	10,262.9	98.1	98.3	118.66	-11,028.7	-612.2	478.7	285.7	192.91	2.481		
21,300.0	10,032.5	21,565.1	10,262.4	99.0	99.2	118.66	-11,128.7	-613.2	478.7	284.1	194.58	2.460		
21,400.0	10,032.0	21,665.1	10,261.9	99.8	100.0	118.66	-11,228.7	-614.1	478.7	282.4	196.25	2.439		
21,500.0	10,031.6	21,765.1	10,261.5	100.7	100.9	118.66	-11,328.7	-615.0	478.7	280.7	197.92	2.418		
21,600.0	10,031.1	21,865.1	10,261.0	101.5	101.7	118.66	-11,428.7	-615.9	478.7	279.1	199.60	2.398		
21,700.0	10,030.6	21,965.1	10,260.5	102.4	102.6	118.66	-11,528.7	-616.8	478.7	277.4	201.27	2.378		
21,800.0	10,030.2	22,065.1	10,260.1	103.2	103.4	118.66	-11,628.7	-617.8	478.7	275.7	202.94	2.359		
21,900.0	10,029.7	22,165.1	10,259.6	104.1	104.3	118.66	-11,728.7	-618.7	478.6	274.0	204.61	2.339		
22,000.0	10,029.2	22,265.1	10,259.1	105.0	105.1	118.66	-11,828.7	-619.6	478.6	272.4	206.29	2.320		
22,100.0	10,028.8	22,365.1	10,258.7	105.8	106.0	118.66	-11,928.7	-620.5	478.6	270.7	207.96	2.302		
22,200.0	10,028.3	22,465.1	10,258.2	106.7	106.8	118.66	-12,028.7	-621.4	478.6	269.0	209.63	2.283		
22,300.0	10,027.8	22,565.1	10,257.7	107.5	107.7	118.67	-12,128.7	-622.4	478.6	267.3	211.30	2.265		
22,400.0	10,027.4	22,665.1	10,257.3	108.4	108.6	118.67	-12,228.7	-623.3	478.6	265.7	212.98	2.247		
22,500.0	10,026.9	22,765.1	10,256.8	109.2	109.4	118.67	-12,328.7	-624.2	478.6	264.0	214.65	2.230		
22,600.0	10,026.5	22,865.1	10,256.4	110.1	110.3	118.67	-12,428.6	-625.1	478.6	262.3	216.32	2.213		
22,700.0	10,026.0	22,965.1	10,255.9	110.9	111.1	118.67	-12,528.6	-626.0	478.6	260.6	218.00	2.196		
22,800.0	10,025.5	23,065.1	10,255.4	111.8	112.0	118.67	-12,628.6	-627.0	478.6	259.0	219.67	2.179		
22,900.0	10,025.1	23,165.1	10,255.0	112.6	112.8	118.67	-12,728.6	-627.9	478.6	257.3	221.35	2.162		
23,000.0	10,024.6	23,265.1	10,254.5	113.5	113.7	118.67	-12,828.6	-628.8	478.6	255.6	223.02	2.146		
23,100.0	10,024.1	23,365.1	10,254.0	114.4	114.5	118.67	-12,928.6	-629.7	478.6	254.0	224.70	2.130		
23,200.0	10,023.7	23,465.1	10,253.6	115.2	115.4	118.67	-13,028.6	-630.6	478.6	252.3	226.37	2.114		
23,300.0	10,023.2	23,565.1	10,253.1	116.1	116.2	118.67	-13,128.6	-631.6	478.6	250.6	228.04	2.099		

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #704H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9721-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Distance Between Centres (usft)	Rule Assigned: Distance Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
23,400.0	10,022.7	23,665.1	10,252.6	116.9	117.1	118.67	-13,228.6	-632.5	478.6	248.9	229.72	2.084	
23,500.0	10,022.3	23,765.1	10,252.2	117.8	118.0	118.67	-13,328.6	-633.4	478.6	247.2	231.39	2.069	
23,600.0	10,021.8	23,865.1	10,251.7	118.6	118.8	118.67	-13,428.6	-634.3	478.6	245.6	233.07	2.054	
23,700.0	10,021.3	23,965.1	10,251.2	119.5	119.7	118.67	-13,528.6	-635.2	478.6	243.9	234.74	2.039	
23,800.0	10,020.9	24,065.1	10,250.8	120.3	120.5	118.67	-13,628.6	-636.2	478.6	242.2	236.42	2.025	
23,900.0	10,020.4	24,165.1	10,250.3	121.2	121.4	118.67	-13,728.6	-637.1	478.6	240.5	238.10	2.010	
24,000.0	10,019.9	24,265.1	10,249.9	122.1	122.2	118.67	-13,828.6	-638.0	478.6	238.9	239.77	1.996 Advise and Monitor	
24,100.0	10,019.5	24,365.1	10,249.4	122.9	123.1	118.67	-13,928.6	-638.9	478.6	237.2	241.45	1.982 Advise and Monitor	
24,200.0	10,019.0	24,465.1	10,248.9	123.8	123.9	118.67	-14,028.6	-639.9	478.6	235.5	243.12	1.969 Advise and Monitor	
24,300.0	10,018.5	24,565.1	10,248.5	124.6	124.8	118.67	-14,128.6	-640.8	478.6	233.8	244.80	1.955 Advise and Monitor	
24,400.0	10,018.1	24,665.1	10,248.0	125.5	125.6	118.67	-14,228.6	-641.7	478.6	232.2	246.48	1.942 Advise and Monitor	
24,500.0	10,017.6	24,765.1	10,247.5	126.3	126.5	118.67	-14,328.5	-642.6	478.6	230.5	248.15	1.929 Advise and Monitor	
24,600.0	10,017.2	24,865.1	10,247.1	127.2	127.4	118.67	-14,428.5	-643.5	478.6	228.8	249.83	1.916 Advise and Monitor	
24,700.0	10,016.7	24,965.1	10,246.6	128.0	128.2	118.67	-14,528.5	-644.5	478.6	227.1	251.50	1.903 Advise and Monitor	
24,800.0	10,016.2	25,065.1	10,246.1	128.9	129.1	118.67	-14,628.5	-645.4	478.6	225.5	253.18	1.891 Advise and Monitor	
24,900.0	10,015.8	25,165.1	10,245.7	129.8	129.9	118.67	-14,728.5	-646.3	478.6	223.8	254.86	1.878 Advise and Monitor	
25,000.0	10,015.3	25,265.1	10,245.2	130.6	130.8	118.67	-14,828.5	-647.2	478.6	222.1	256.53	1.866 Advise and Monitor	
25,100.0	10,014.8	25,365.1	10,244.7	131.5	131.6	118.67	-14,928.5	-648.1	478.6	220.4	258.21	1.854 Advise and Monitor	
25,200.0	10,014.4	25,465.1	10,244.3	132.3	132.5	118.67	-15,028.5	-649.1	478.6	218.8	259.89	1.842 Advise and Monitor	
25,300.0	10,013.9	25,565.1	10,243.8	133.2	133.3	118.67	-15,128.5	-650.0	478.6	217.1	261.56	1.830 Advise and Monitor	
25,400.0	10,013.4	25,665.1	10,243.4	134.0	134.2	118.67	-15,228.5	-650.9	478.6	215.4	263.24	1.818 Advise and Monitor	
25,475.7	10,013.1	25,740.9	10,243.0	134.7	134.8	118.67	-15,304.2	-651.6	478.6	214.1	264.51	1.810 Advise and Monitor, SF	
25,492.9	10,013.0	25,741.6	10,243.0	134.8	134.8	118.67	-15,305.0	-651.6	478.9	214.6	264.34	1.812 Advise and Monitor	
25,493.4	10,013.0	25,741.6	10,243.0	134.8	134.8	118.67	-15,305.0	-651.6	478.9	214.6	264.37	1.812 Advise and Monitor	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1													Offset Site Error:	0.0 usft	
Survey Program: Reference		0-Standard Keeper 104, 9626-MWD+IFR1+FDIR		Offset		Semi Major Axis		Offset Wellbore Centre		Rule Assigned: Distance				Offset Well Error:	3.0 usft
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning		
0.0	0.0	0.2	0.2	3.0	3.0	-1.78	45.0	-1.4	45.0						
100.0	100.0	100.2	100.2	3.0	3.0	-1.78	45.0	-1.4	45.0	39.0	6.00	7.503			
200.0	200.0	200.2	200.2	3.0	3.0	-1.78	45.0	-1.4	45.0	39.0	6.01	7.490			
300.0	300.0	300.2	300.2	3.0	3.0	-1.78	45.0	-1.4	45.0	39.0	6.03	7.463			
400.0	400.0	400.2	400.2	3.0	3.0	-1.78	45.0	-1.4	45.0	39.0	6.07	7.422			
500.0	500.0	500.2	500.2	3.1	3.1	-1.78	45.0	-1.4	45.0	38.9	6.11	7.369			
600.0	600.0	600.2	600.2	3.1	3.1	-1.78	45.0	-1.4	45.0	38.9	6.17	7.303			
700.0	700.0	700.2	700.2	3.1	3.1	-1.78	45.0	-1.4	45.0	38.8	6.23	7.226			
800.0	800.0	800.2	800.2	3.2	3.2	-1.78	45.0	-1.4	45.0	38.7	6.31	7.138			
900.0	900.0	900.2	900.2	3.2	3.2	-1.78	45.0	-1.4	45.0	38.6	6.39	7.042			
1,000.0	1,000.0	1,000.2	1,000.2	3.2	3.2	-1.78	45.0	-1.4	45.0	38.5	6.49	6.938			
1,100.0	1,100.0	1,100.2	1,100.2	3.3	3.3	-1.78	45.0	-1.4	45.0	38.4	6.59	6.828			
1,200.0	1,200.0	1,200.2	1,200.2	3.4	3.4	-1.78	45.0	-1.4	45.0	38.3	6.71	6.712			
1,300.0	1,300.0	1,300.2	1,300.2	3.4	3.4	-1.78	45.0	-1.4	45.0	38.2	6.83	6.592			
1,400.0	1,400.0	1,400.2	1,400.2	3.5	3.5	-1.78	45.0	-1.4	45.0	38.1	6.96	6.469			
1,500.0	1,500.0	1,500.2	1,500.2	3.5	3.5	-1.78	45.0	-1.4	45.0	37.9	7.10	6.344			
1,600.0	1,600.0	1,600.2	1,600.2	3.6	3.6	-1.78	45.0	-1.4	45.0	37.8	7.24	6.218			
1,700.0	1,700.0	1,700.2	1,700.2	3.7	3.7	-1.78	45.0	-1.4	45.0	37.6	7.39	6.091			
1,800.0	1,800.0	1,800.2	1,800.2	3.8	3.8	-1.78	45.0	-1.4	45.0	37.5	7.55	5.964			
1,900.0	1,900.0	1,900.2	1,900.2	3.9	3.9	-1.78	45.0	-1.4	45.0	37.3	7.71	5.839			
1,916.6	1,916.6	1,916.8	1,916.8	3.9	3.9	-1.78	45.0	-1.4	45.0	37.3	7.74	5.818 CC			
2,000.0	2,000.0	2,000.2	2,000.2	3.9	3.9	-1.78	45.0	-1.4	45.0	37.1	7.88	5.714 ES			
2,100.0	2,100.0	2,099.8	2,099.8	4.0	4.0	-3.90	45.4	-3.1	45.5	37.5	8.02	5.668			
2,200.0	2,200.0	2,199.1	2,198.9	4.1	4.0	-9.94	46.5	-8.2	47.2	39.1	8.13	5.809			
2,300.0	2,300.0	2,298.0	2,297.4	4.2	4.1	-18.86	48.4	-16.5	51.2	43.0	8.18	6.256			
2,400.0	2,400.0	2,396.1	2,394.8	4.3	4.1	-28.88	50.9	-28.1	58.4	50.3	8.15	7.166			
2,500.0	2,500.0	2,493.3	2,490.9	4.4	4.2	-38.28	54.2	-42.8	69.6	61.6	8.07	8.635			
2,600.0	2,600.0	2,591.9	2,588.0	4.5	4.2	-0.88	57.9	-59.5	82.2	74.1	8.01	10.258			
2,700.0	2,699.8	2,691.0	2,685.6	4.6	4.3	-6.57	61.6	-76.3	92.3	84.3	8.00	11.535			
2,750.0	2,749.7	2,740.7	2,734.5	4.6	4.3	-9.08	63.5	-84.7	96.3	88.3	8.00	12.040			
2,800.0	2,799.5	2,790.4	2,783.4	4.6	4.4	-11.45	65.4	-93.1	100.1	92.1	8.00	12.508			
2,900.0	2,899.1	2,889.8	2,881.3	4.7	4.4	-15.67	69.1	-110.0	108.1	100.1	8.03	13.476			
3,000.0	2,998.7	2,989.1	2,979.2	4.8	4.5	-19.29	72.8	-126.8	116.7	108.6	8.06	14.471			
3,100.0	3,098.4	3,088.5	3,077.0	4.9	4.6	-22.40	76.6	-143.7	125.7	117.5	8.12	15.477			
3,200.0	3,198.0	3,187.9	3,174.9	5.0	4.6	-25.10	80.3	-160.5	134.9	126.7	8.19	16.482			
3,300.0	3,297.6	3,287.3	3,272.8	5.1	4.7	-27.45	84.0	-177.4	144.5	136.2	8.26	17.479			
3,400.0	3,397.2	3,386.7	3,370.7	5.2	4.8	-29.50	87.8	-194.2	154.2	145.8	8.35	18.460			
3,500.0	3,496.8	3,486.0	3,468.5	5.2	4.9	-31.31	91.5	-211.0	164.1	155.7	8.45	19.422			
3,600.0	3,596.4	3,585.4	3,566.4	5.3	5.0	-32.91	95.3	-227.9	174.2	165.6	8.55	20.359			
3,700.0	3,696.1	3,684.8	3,664.3	5.4	5.1	-34.34	99.0	-244.7	184.3	175.7	8.67	21.271			
3,800.0	3,795.7	3,784.2	3,762.1	5.5	5.2	-35.62	102.7	-261.6	194.6	185.8	8.78	22.155			
3,900.0	3,895.3	3,883.6	3,860.0	5.6	5.3	-36.76	106.5	-278.4	205.0	196.1	8.91	23.010			
4,000.0	3,994.9	3,983.0	3,957.9	5.7	5.4	-37.80	110.2	-295.3	215.4	206.4	9.04	23.837			
4,100.0	4,094.5	4,082.3	4,055.8	5.8	5.5	-38.74	114.0	-312.1	225.9	216.8	9.17	24.633			
4,200.0	4,194.2	4,181.7	4,153.6	5.9	5.6	-39.60	117.7	-329.0	236.5	227.2	9.31	25.400			
4,300.0	4,293.8	4,281.1	4,251.5	6.0	5.7	-40.38	121.4	-345.8	247.1	237.7	9.45	26.137			
4,400.0	4,393.4	4,380.5	4,349.4	6.1	5.8	-41.10	125.2	-362.7	257.8	248.2	9.60	26.845			
4,500.0	4,493.0	4,479.9	4,447.2	6.2	5.9	-41.77	128.9	-379.5	268.4	258.7	9.75	27.525			
4,600.0	4,592.6	4,579.2	4,545.1	6.4	6.0	-42.38	132.7	-396.4	279.2	269.3	9.91	28.177			
4,700.0	4,692.3	4,678.6	4,643.0	6.5	6.1	-42.95	136.4	-413.2	289.9	279.8	10.07	28.802			
4,800.0	4,791.9	4,778.0	4,740.9	6.6	6.2	-43.47	140.1	-430.1	300.7	290.5	10.23	29.400			

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9626-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Rule Assigned:		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Distance Between Ellipses (usft)			
4,900.0	4,891.5	4,877.4	4,838.7	6.7	6.3	-43.96	143.9	-446.9	311.5	301.1	10.39	29.973	
5,000.0	4,991.1	4,976.8	4,936.6	6.8	6.4	-44.42	147.6	-463.8	322.3	311.7	10.56	30.520	
5,100.0	5,090.7	5,076.2	5,034.5	6.9	6.5	-44.84	151.4	-480.6	333.1	322.4	10.73	31.044	
5,200.0	5,190.4	5,175.5	5,132.4	7.0	6.7	-45.24	155.1	-497.5	344.0	333.1	10.90	31.545	
5,300.0	5,290.0	5,274.9	5,230.2	7.1	6.8	-45.62	158.8	-514.3	354.9	343.8	11.08	32.024	
5,400.0	5,389.6	5,374.3	5,328.1	7.2	6.9	-45.97	162.6	-531.1	365.8	354.5	11.26	32.481	
5,500.0	5,489.2	5,473.7	5,426.0	7.3	7.0	-46.31	166.3	-548.0	376.6	365.2	11.44	32.918	
5,600.0	5,588.8	5,573.1	5,523.8	7.5	7.1	-46.62	170.0	-564.8	387.6	375.9	11.63	33.335	
5,700.0	5,688.5	5,672.4	5,621.7	7.6	7.3	-46.92	173.8	-581.7	398.5	386.7	11.81	33.733	
5,800.0	5,788.1	5,771.8	5,719.6	7.7	7.4	-47.20	177.5	-598.5	409.4	397.4	12.00	34.113	
5,900.0	5,887.7	5,871.2	5,817.5	7.8	7.5	-47.47	181.3	-615.4	420.3	408.2	12.19	34.476	
6,000.0	5,987.3	5,970.6	5,915.3	7.9	7.6	-47.72	185.0	-632.2	431.3	418.9	12.39	34.822	
6,100.0	6,086.9	6,070.0	6,013.2	8.0	7.8	-47.96	188.7	-649.1	442.3	429.7	12.58	35.152	
6,200.0	6,186.6	6,169.3	6,111.1	8.1	7.9	-48.19	192.5	-665.9	453.2	440.4	12.78	35.467	
6,300.0	6,286.2	6,268.7	6,208.9	8.3	8.0	-48.41	196.2	-682.8	464.2	451.2	12.98	35.767	
6,400.0	6,385.8	6,368.1	6,306.8	8.4	8.2	-48.61	200.0	-699.6	475.2	462.0	13.18	36.053	
6,500.0	6,485.4	6,467.5	6,404.7	8.5	8.3	-48.81	203.7	-716.5	486.1	472.8	13.38	36.326	
6,600.0	6,585.0	6,566.9	6,502.6	8.6	8.5	-49.00	207.4	-733.3	497.1	483.5	13.59	36.586	
6,700.0	6,684.7	6,666.3	6,600.4	8.7	8.6	-49.18	211.2	-750.2	508.1	494.3	13.79	36.834	
6,800.0	6,784.3	6,765.6	6,698.3	8.8	8.7	-49.36	214.9	-767.0	519.1	505.1	14.00	37.070	
6,900.0	6,883.9	6,865.0	6,796.2	9.0	8.9	-49.52	218.7	-783.9	530.1	515.9	14.21	37.295	
7,000.0	6,983.5	6,964.4	6,894.0	9.1	9.0	-49.68	222.4	-800.7	541.1	526.7	14.43	37.510	
7,100.0	7,083.1	7,063.8	6,991.9	9.2	9.2	-49.84	226.1	-817.6	552.1	537.5	14.64	37.714	
7,200.0	7,182.7	7,163.2	7,089.8	9.3	9.3	-49.99	229.9	-834.4	563.2	548.3	14.86	37.908	
7,300.0	7,282.4	7,262.5	7,187.7	9.4	9.5	-50.13	233.6	-851.3	574.2	559.1	15.07	38.093	
7,396.8	7,378.8	7,358.7	7,282.4	9.6	9.6	-50.26	237.2	-867.6	584.8	569.6	15.28	38.264	
7,400.0	7,382.0	7,361.9	7,285.5	9.6	9.6	-50.27	237.3	-868.1	585.2	569.9	15.29	38.270	
7,500.0	7,481.7	7,461.2	7,383.3	9.7	9.8	-50.42	241.1	-884.9	596.8	581.3	15.51	38.471	
7,600.0	7,581.5	7,560.4	7,481.0	9.8	9.9	-50.45	244.8	-901.7	609.5	593.8	15.73	38.739	
7,700.0	7,681.4	7,659.4	7,578.5	9.9	10.1	-50.37	248.5	-918.5	623.3	607.4	15.96	39.067	
7,800.0	7,781.4	7,758.3	7,675.8	10.0	10.2	-50.18	252.3	-935.3	638.3	622.1	16.18	39.438	
7,896.8	7,878.2	7,853.7	7,769.8	10.2	10.4	-94.82	255.9	-951.5	653.8	637.4	16.40	39.878	
7,900.0	7,881.4	7,856.9	7,772.9	10.2	10.4	-94.80	256.0	-952.0	654.3	637.9	16.40	39.894	
8,000.0	7,981.4	7,955.3	7,869.9	10.3	10.6	-94.36	259.7	-968.7	671.0	654.4	16.61	40.406	
8,100.0	8,081.4	8,053.8	7,966.9	10.4	10.7	-93.94	263.4	-985.4	687.6	670.8	16.81	40.908	
8,200.0	8,181.4	8,152.3	8,063.9	10.5	10.9	-93.54	267.1	-1,002.1	704.3	687.3	17.01	41.400	
8,300.0	8,281.4	8,250.8	8,160.9	10.6	11.1	-93.16	270.8	-1,018.8	721.0	703.8	17.22	41.881	
8,400.0	8,381.4	8,349.3	8,257.9	10.7	11.2	-92.80	274.5	-1,035.5	737.8	720.4	17.42	42.354	
8,500.0	8,481.4	8,447.7	8,354.9	10.8	11.4	-92.45	278.2	-1,052.2	754.6	736.9	17.62	42.816	
8,600.0	8,581.4	8,549.3	8,454.8	11.0	11.6	-92.11	282.0	-1,069.3	771.3	753.5	17.82	43.282	
8,700.0	8,681.4	8,663.0	8,567.1	11.1	11.8	-91.77	285.9	-1,087.1	786.8	768.8	18.00	43.720	
8,800.0	8,781.4	8,777.4	8,680.3	11.2	12.0	-91.49	289.4	-1,102.7	800.4	782.2	18.18	44.033	
8,900.0	8,881.4	8,892.4	8,794.5	11.3	12.1	-91.25	292.4	-1,116.2	812.1	793.7	18.36	44.221	
9,000.0	8,981.4	9,007.9	8,909.4	11.4	12.3	-91.05	294.9	-1,127.6	821.9	803.3	18.56	44.284	
9,100.0	9,081.4	9,123.8	9,025.0	11.6	12.4	-90.90	296.9	-1,136.6	829.7	810.9	18.76	44.223	
9,200.0	9,181.4	9,240.0	9,141.0	11.7	12.5	-90.79	298.5	-1,143.4	835.5	816.5	18.97	44.039	
9,300.0	9,281.4	9,356.5	9,257.4	11.8	12.6	-90.72	299.5	-1,148.0	839.4	820.2	19.19	43.735	
9,400.0	9,381.4	9,473.2	9,374.0	11.9	12.7	-90.68	299.9	-1,150.2	841.3	821.8	19.42	43.309	
9,500.0	9,481.4	9,580.7	9,481.6	12.0	12.7	-90.68	300.0	-1,150.4	841.5	821.9	19.58	42.984	
9,528.6	9,510.0	9,609.9	9,510.8	12.1	12.8	-90.71	299.6	-1,150.4	841.5	821.9	19.60	42.929	
9,550.0	9,531.4	9,631.9	9,532.7	12.1	12.9	91.00	298.4	-1,150.4	841.4	821.8	19.61	42.899	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1													Offset Site Error:	0.0 usft	
Survey Program:		0-Standard Keeper 104, 9626-MWD+IFR1+FDIR					Rule Assigned:							Offset Well Error:	3.0 usft
Measured Reference	Vertical	Measured Offset	Vertical	Reference	Offset	Highside	Offset Wellbore Centre		Distance		Minimum	Separation	Warning		
Depth (usft)	Depth (usft)	Depth (usft)	Depth (usft)	(usft)	(usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Ellipses (usft)	Separation (usft)	Factor			
9,600.0	9,581.2	9,683.1	9,583.5	12.0	12.9	90.87	292.3	-1,150.2	841.4	821.8	19.63	42.858			
9,650.0	9,630.5	9,734.1	9,633.5	12.8	13.0	90.74	281.8	-1,149.8	841.4	821.7	19.64	42.847			
9,700.0	9,678.8	9,785.0	9,682.1	12.9	13.0	90.59	266.9	-1,149.4	841.3	821.7	19.64	42.841			
9,750.0	9,725.9	9,835.7	9,729.0	12.9	13.0	90.45	247.8	-1,148.8	841.3	821.7	19.65	42.807			
9,800.0	9,771.3	9,886.1	9,773.8	12.9	13.0	90.30	224.8	-1,148.1	841.3	821.6	19.68	42.740			
9,850.0	9,814.8	9,936.4	9,816.4	13.0	13.1	90.15	198.0	-1,147.2	841.3	821.5	19.73	42.632			
9,900.0	9,855.9	9,986.4	9,856.2	13.0	13.1	89.99	167.8	-1,146.3	841.3	821.5	19.81	42.476			
9,950.0	9,894.4	10,036.3	9,893.1	13.1	13.2	89.84	134.3	-1,145.2	841.2	821.3	19.90	42.264			
10,000.0	9,930.0	10,086.0	9,926.9	13.1	13.2	89.69	97.9	-1,144.1	841.2	821.2	20.03	41.992			
10,031.3	9,950.6	10,117.0	9,946.3	13.2	13.3	89.60	73.7	-1,143.3	841.2	821.1	20.13	41.784			
10,050.0	9,962.3	10,135.5	9,957.2	13.2	13.3	89.54	58.8	-1,142.9	841.2	821.0	20.20	41.655			
10,100.0	9,991.3	10,184.8	9,984.0	13.3	13.3	89.40	17.5	-1,141.6	841.2	820.9	20.39	41.252			
10,150.0	10,016.5	10,233.9	10,007.0	13.4	13.4	89.26	-25.9	-1,140.2	841.3	820.6	20.63	40.785			
10,200.0	10,037.9	10,282.8	10,026.2	13.4	13.5	89.12	-70.9	-1,138.8	841.3	820.4	20.90	40.260			
10,250.0	10,055.3	10,331.6	10,041.4	13.5	13.5	89.00	-117.2	-1,137.4	841.3	820.1	21.20	39.683			
10,300.0	10,068.6	10,380.3	10,052.6	13.6	13.6	88.88	-164.5	-1,135.9	841.3	819.8	21.54	39.065			
10,350.0	10,077.6	10,428.8	10,059.8	13.6	13.6	88.77	-212.5	-1,134.4	841.3	819.4	21.90	38.417			
10,400.0	10,082.2	10,477.2	10,062.8	13.7	13.6	88.66	-260.7	-1,132.9	841.3	819.0	22.29	37.752			
10,431.3	10,083.0	10,508.0	10,062.9	13.7	13.7	88.62	-291.5	-1,131.9	841.3	818.8	22.54	37.333			
10,500.0	10,082.6	10,576.7	10,062.6	13.8	13.7	88.62	-360.1	-1,129.8	841.3	818.2	23.12	36.388			
10,600.0	10,082.2	10,676.7	10,062.1	13.9	13.8	88.62	-460.1	-1,126.7	841.3	817.2	24.05	34.978			
10,700.0	10,081.7	10,776.7	10,061.6	14.0	14.0	88.62	-560.0	-1,123.6	841.2	816.2	25.07	33.561			
10,800.0	10,081.2	10,876.7	10,061.2	14.1	14.4	88.62	-660.0	-1,120.5	841.2	815.0	26.15	32.162			
10,900.0	10,080.8	10,976.7	10,060.7	14.3	14.8	88.62	-760.0	-1,117.3	841.1	813.8	27.31	30.802			
11,000.0	10,080.3	11,076.7	10,060.2	14.6	15.3	88.62	-859.9	-1,114.2	841.1	812.6	28.52	29.493			
11,100.0	10,079.8	11,176.7	10,059.8	14.9	15.9	88.62	-959.9	-1,111.1	841.1	811.3	29.78	28.242			
11,200.0	10,079.4	11,276.7	10,059.3	15.3	16.5	88.62	-1,059.8	-1,108.0	841.0	809.9	31.09	27.055			
11,300.0	10,078.9	11,376.7	10,058.8	15.9	17.1	88.62	-1,159.8	-1,104.9	841.0	808.6	32.43	25.933			
11,400.0	10,078.4	11,476.7	10,058.4	16.4	17.7	88.62	-1,259.7	-1,101.7	840.9	807.1	33.81	24.875			
11,500.0	10,078.0	11,576.7	10,057.9	17.1	18.4	88.62	-1,359.7	-1,098.6	840.9	805.7	35.22	23.879			
11,600.0	10,077.5	11,676.7	10,057.4	17.8	19.1	88.62	-1,459.6	-1,095.5	840.9	804.2	36.65	22.943			
11,700.0	10,077.0	11,776.7	10,057.0	18.5	19.8	88.62	-1,559.6	-1,092.4	840.8	802.7	38.11	22.064			
11,800.0	10,076.6	11,876.7	10,056.5	19.2	20.5	88.62	-1,659.5	-1,089.3	840.8	801.2	39.59	21.238			
11,900.0	10,076.1	11,976.7	10,056.0	20.0	21.2	88.62	-1,759.5	-1,086.2	840.8	799.7	41.09	20.462			
12,000.0	10,075.7	12,076.7	10,055.6	20.7	22.0	88.62	-1,859.4	-1,083.0	840.7	798.1	42.60	19.734			
12,100.0	10,075.2	12,176.7	10,055.1	21.5	22.7	88.62	-1,959.4	-1,079.9	840.7	796.5	44.13	19.048			
12,200.0	10,074.7	12,276.7	10,054.7	22.3	23.5	88.62	-2,059.3	-1,076.8	840.6	795.0	45.68	18.404			
12,300.0	10,074.3	12,376.7	10,054.2	23.0	24.2	88.62	-2,159.3	-1,073.7	840.6	793.4	47.23	17.796			
12,400.0	10,073.8	12,476.7	10,053.7	23.8	25.0	88.62	-2,259.2	-1,070.6	840.6	791.8	48.80	17.224			
12,500.0	10,073.3	12,576.7	10,053.3	24.6	25.8	88.62	-2,359.2	-1,067.4	840.5	790.1	50.38	16.684			
12,600.0	10,072.9	12,676.7	10,052.8	25.4	26.6	88.62	-2,459.1	-1,064.3	840.5	788.5	51.97	16.173			
12,700.0	10,072.4	12,776.7	10,052.3	26.2	27.3	88.62	-2,559.1	-1,061.2	840.4	786.9	53.56	15.691			
12,800.0	10,071.9	12,876.7	10,051.9	27.1	28.1	88.62	-2,659.0	-1,058.1	840.4	785.2	55.17	15.234			
12,900.0	10,071.5	12,976.7	10,051.4	27.9	28.9	88.62	-2,759.0	-1,055.0	840.4	783.6	56.77	14.802			
13,000.0	10,071.0	13,076.7	10,050.9	28.7	29.7	88.62	-2,858.9	-1,051.9	840.3	781.9	58.39	14.391			
13,100.0	10,070.5	13,176.7	10,050.5	29.5	30.5	88.62	-2,958.9	-1,048.7	840.3	780.3	60.01	14.002			
13,200.0	10,070.1	13,276.7	10,050.0	30.3	31.3	88.62	-3,058.8	-1,045.6	840.3	778.6	61.64	13.631			
13,300.0	10,069.6	13,376.7	10,049.5	31.2	32.1	88.62	-3,158.8	-1,042.5	840.2	776.9	63.27	13.279			
13,400.0	10,069.1	13,476.7	10,049.1	32.0	32.9	88.62	-3,258.7	-1,039.4	840.2	775.3	64.91	12.943			
13,500.0	10,068.7	13,576.7	10,048.6	32.8	33.7	88.62	-3,358.7	-1,036.3	840.1	773.6	66.55	12.624			
13,600.0	10,068.2	13,676.7	10,048.1	33.6	34.6	88.62	-3,458.6	-1,033.1	840.1	771.9	68.20	12.318			

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9626-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Distance Between Centres (usft)		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)					
13,700.0	10,067.7	13,776.7	10,047.7	34.5	35.4	88.62	-3,558.6	-1,030.0	840.1	770.2	69.85	12.027	
13,800.0	10,067.3	13,876.7	10,047.2	35.3	36.2	88.62	-3,658.5	-1,026.9	840.0	768.5	71.50	11.748	
13,900.0	10,066.8	13,976.7	10,046.7	36.1	37.0	88.62	-3,758.5	-1,023.8	840.0	766.8	73.16	11.482	
14,000.0	10,066.3	14,076.7	10,046.3	37.0	37.8	88.62	-3,858.4	-1,020.7	839.9	765.1	74.82	11.227	
14,100.0	10,065.9	14,176.7	10,045.8	37.8	38.7	88.62	-3,958.4	-1,017.6	839.9	763.4	76.48	10.982	
14,200.0	10,065.4	14,276.7	10,045.3	38.7	39.5	88.62	-4,058.3	-1,014.4	839.9	761.7	78.14	10.748	
14,300.0	10,064.9	14,376.7	10,044.9	39.5	40.3	88.62	-4,158.3	-1,011.3	839.8	760.0	79.81	10.523	
14,400.0	10,064.5	14,476.7	10,044.4	40.3	41.1	88.62	-4,258.2	-1,008.2	839.8	758.3	81.48	10.307	
14,500.0	10,064.0	14,576.7	10,044.0	41.2	42.0	88.62	-4,358.2	-1,005.1	839.7	756.6	83.15	10.099	
14,600.0	10,063.6	14,676.7	10,043.5	42.0	42.8	88.62	-4,458.1	-1,002.0	839.7	754.9	84.82	9.899	
14,700.0	10,063.1	14,776.7	10,043.0	42.9	43.6	88.62	-4,558.1	-998.8	839.7	753.2	86.50	9.707	
14,800.0	10,062.6	14,876.7	10,042.6	43.7	44.5	88.62	-4,658.0	-995.7	839.6	751.5	88.18	9.522	
14,900.0	10,062.2	14,976.7	10,042.1	44.6	45.3	88.62	-4,758.0	-992.6	839.6	749.7	89.86	9.344	
15,000.0	10,061.7	15,076.7	10,041.6	45.4	46.1	88.62	-4,857.9	-989.5	839.6	748.0	91.54	9.172	
15,071.1	10,061.4	15,147.5	10,041.3	46.0	46.7	88.62	-4,928.7	-987.3	839.5	746.8	92.73	9.053	
15,105.9	10,061.2	15,174.6	10,041.2	46.3	47.0	88.62	-4,955.8	-986.6	839.7	746.4	93.26	9.004	
15,200.0	10,060.8	15,247.4	10,040.8	47.1	47.6	88.63	-5,028.6	-985.9	840.2	745.5	94.64	8.878	
15,215.6	10,060.7	15,259.8	10,040.8	47.2	47.7	88.63	-5,041.0	-986.0	840.2	745.3	94.87	8.856	
15,300.0	10,060.3	15,344.2	10,040.4	47.9	48.4	88.63	-5,125.4	-986.6	840.2	743.9	96.28	8.726	
15,400.0	10,059.8	15,444.2	10,039.9	48.8	49.2	88.63	-5,225.4	-987.4	840.2	742.2	97.96	8.577	
15,500.0	10,059.4	15,544.2	10,039.5	49.6	50.0	88.63	-5,325.4	-988.1	840.2	740.6	99.64	8.433	
15,600.0	10,058.9	15,644.2	10,039.0	50.5	50.9	88.63	-5,425.3	-988.9	840.2	738.9	101.32	8.293	
15,700.0	10,058.4	15,744.2	10,038.5	51.3	51.7	88.63	-5,525.3	-989.6	840.2	737.2	103.00	8.157	
15,800.0	10,058.0	15,844.2	10,038.1	52.2	52.6	88.63	-5,625.3	-990.4	840.2	735.5	104.68	8.026	
15,900.0	10,057.5	15,944.2	10,037.6	53.0	53.4	88.63	-5,725.3	-991.1	840.2	733.8	106.36	7.899	
16,000.0	10,057.1	16,044.2	10,037.1	53.8	54.2	88.63	-5,825.3	-991.9	840.2	732.2	108.05	7.776	
16,100.0	10,056.6	16,144.2	10,036.7	54.7	55.1	88.63	-5,925.3	-992.6	840.2	730.5	109.73	7.657	
16,200.0	10,056.1	16,244.2	10,036.2	55.5	55.9	88.63	-6,025.3	-993.4	840.2	728.8	111.42	7.541	
16,300.0	10,055.7	16,344.2	10,035.7	56.4	56.7	88.63	-6,125.3	-994.1	840.2	727.1	113.10	7.429	
16,400.0	10,055.2	16,444.2	10,035.3	57.2	57.6	88.63	-6,225.3	-994.9	840.2	725.4	114.79	7.319	
16,500.0	10,054.7	16,544.2	10,034.8	58.1	58.4	88.63	-6,325.3	-995.6	840.2	723.7	116.48	7.213	
16,600.0	10,054.3	16,644.2	10,034.3	58.9	59.3	88.63	-6,425.3	-996.4	840.2	722.0	118.17	7.110	
16,700.0	10,053.8	16,744.2	10,033.9	59.8	60.1	88.63	-6,525.3	-997.1	840.2	720.3	119.86	7.010	
16,800.0	10,053.4	16,844.2	10,033.4	60.6	61.0	88.63	-6,625.3	-997.9	840.2	718.7	121.55	6.912	
16,900.0	10,052.9	16,944.2	10,032.9	61.5	61.8	88.63	-6,725.3	-998.6	840.2	717.0	123.24	6.818	
17,000.0	10,052.4	17,044.2	10,032.5	62.3	62.6	88.63	-6,825.3	-999.4	840.2	715.3	124.94	6.725	
17,100.0	10,052.0	17,144.2	10,032.0	63.2	63.5	88.63	-6,925.3	-1,000.1	840.2	713.6	126.63	6.635	
17,200.0	10,051.5	17,244.2	10,031.5	64.0	64.3	88.63	-7,025.3	-1,000.9	840.2	711.9	128.32	6.548	
17,300.0	10,051.0	17,344.2	10,031.1	64.9	65.2	88.63	-7,125.3	-1,001.6	840.2	710.2	130.02	6.462	
17,400.0	10,050.6	17,444.2	10,030.6	65.7	66.0	88.63	-7,225.3	-1,002.4	840.2	708.5	131.71	6.379	
17,500.0	10,050.1	17,544.2	10,030.2	66.6	66.9	88.62	-7,325.3	-1,003.1	840.2	706.8	133.41	6.298	
17,600.0	10,049.6	17,644.2	10,029.7	67.4	67.7	88.62	-7,425.3	-1,003.9	840.2	705.1	135.10	6.219	
17,700.0	10,049.2	17,744.2	10,029.2	68.3	68.6	88.62	-7,525.3	-1,004.6	840.2	703.4	136.80	6.142	
17,800.0	10,048.7	17,844.2	10,028.8	69.1	69.4	88.62	-7,625.3	-1,005.4	840.2	701.7	138.49	6.067	
17,900.0	10,048.3	17,944.2	10,028.3	70.0	70.2	88.62	-7,725.3	-1,006.1	840.2	700.0	140.19	5.993	
18,000.0	10,047.8	18,044.2	10,027.8	70.8	71.1	88.62	-7,825.3	-1,006.9	840.2	698.3	141.89	5.922	
18,100.0	10,047.3	18,144.2	10,027.4	71.7	71.9	88.62	-7,925.3	-1,007.6	840.2	696.6	143.59	5.852	
18,200.0	10,046.9	18,244.2	10,026.9	72.5	72.8	88.62	-8,025.2	-1,008.4	840.2	694.9	145.28	5.783	
18,300.0	10,046.4	18,344.2	10,026.4	73.4	73.6	88.62	-8,125.2	-1,009.1	840.2	693.2	146.98	5.716	
18,400.0	10,045.9	18,444.2	10,026.0	74.2	74.5	88.62	-8,225.2	-1,009.9	840.2	691.5	148.68	5.651	
18,500.0	10,045.5	18,544.2	10,025.5	75.1	75.3	88.62	-8,325.2	-1,010.6	840.2	689.8	150.38	5.587	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9626-MWD+IFR1+FDIR													Offset Well Error:	3.0 usft
Reference	Vertical	Measured	Vertical	Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Minimum	Separation	Warning
Depth	Depth	Depth	Depth	Reference	Offset	Offset	Toolface	+N/-S	+E/-W	Between	Between	Separation	Factor	
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Centres	Ellipses	(usft)		
18,600.0	10,045.0	18,644.2	10,025.0	75.9	76.2	88.62	88.62	-8,425.2	-1,011.4	840.2	688.1	152.08	5.525	
18,700.0	10,044.6	18,744.2	10,024.6	76.8	77.0	88.62	88.62	-8,525.2	-1,012.2	840.2	686.4	153.78	5.464	
18,800.0	10,044.1	18,844.2	10,024.1	77.6	77.9	88.62	88.62	-8,625.2	-1,012.9	840.2	684.7	155.48	5.404	
18,900.0	10,043.6	18,944.2	10,023.6	78.5	78.7	88.62	88.62	-8,725.2	-1,013.7	840.2	683.0	157.18	5.345	
19,000.0	10,043.2	19,044.2	10,023.2	79.3	79.6	88.62	88.62	-8,825.2	-1,014.4	840.2	681.3	158.89	5.288	
19,100.0	10,042.7	19,144.2	10,022.7	80.2	80.4	88.62	88.62	-8,925.2	-1,015.2	840.2	679.6	160.59	5.232	
19,200.0	10,042.2	19,244.2	10,022.2	81.0	81.3	88.62	88.62	-9,025.2	-1,015.9	840.2	677.9	162.29	5.177	
19,300.0	10,041.8	19,344.2	10,021.8	81.9	82.1	88.62	88.62	-9,125.2	-1,016.7	840.2	676.2	163.99	5.124	
19,400.0	10,041.3	19,444.2	10,021.3	82.8	83.0	88.62	88.62	-9,225.2	-1,017.4	840.2	674.5	165.69	5.071	
19,500.0	10,040.9	19,544.2	10,020.8	83.6	83.8	88.62	88.62	-9,325.2	-1,018.2	840.2	672.8	167.40	5.019	
19,600.0	10,040.4	19,644.2	10,020.4	84.5	84.7	88.62	88.62	-9,425.2	-1,018.9	840.2	671.1	169.10	4.969	
19,700.0	10,039.9	19,744.2	10,019.9	85.3	85.5	88.62	88.62	-9,525.2	-1,019.7	840.2	669.4	170.80	4.919	
19,800.0	10,039.5	19,844.2	10,019.5	86.2	86.4	88.62	88.62	-9,625.2	-1,020.4	840.2	667.7	172.51	4.871	
19,900.0	10,039.0	19,944.2	10,019.0	87.0	87.2	88.62	88.62	-9,725.2	-1,021.2	840.2	666.0	174.21	4.823	
20,000.0	10,038.5	20,044.2	10,018.5	87.9	88.1	88.62	88.62	-9,825.2	-1,021.9	840.2	664.3	175.91	4.776	
20,100.0	10,038.1	20,144.2	10,018.1	88.7	88.9	88.62	88.62	-9,925.2	-1,022.7	840.2	662.6	177.62	4.731	
20,200.0	10,037.6	20,244.2	10,017.6	89.6	89.8	88.62	88.62	-10,025.2	-1,023.4	840.2	660.9	179.32	4.686	
20,300.0	10,037.1	20,344.2	10,017.1	90.4	90.6	88.62	88.62	-10,125.2	-1,024.2	840.2	659.2	181.03	4.642	
20,400.0	10,036.7	20,444.2	10,016.7	91.3	91.5	88.62	88.62	-10,225.2	-1,024.9	840.2	657.5	182.73	4.598	
20,402.2	10,036.7	20,446.4	10,016.6	91.3	91.5	88.62	88.62	-10,227.4	-1,024.9	840.2	657.5	182.77	4.597	
20,439.7	10,036.5	20,482.6	10,016.5	91.6	91.8	88.62	88.62	-10,263.6	-1,025.2	840.2	656.8	183.39	4.582	
20,444.6	10,036.5	20,487.4	10,016.5	91.7	91.8	88.62	88.62	-10,268.3	-1,025.3	840.2	656.8	183.47	4.580	
20,500.0	10,036.2	20,542.8	10,016.2	92.1	92.3	88.62	88.62	-10,323.7	-1,025.8	840.2	655.8	184.42	4.556	
20,600.0	10,035.8	20,642.8	10,015.7	93.0	93.2	88.62	88.62	-10,423.7	-1,026.7	840.2	654.1	186.12	4.514	
20,700.0	10,035.3	20,742.8	10,015.3	93.8	94.0	88.62	88.62	-10,523.7	-1,027.6	840.2	652.4	187.83	4.473	
20,800.0	10,034.8	20,842.8	10,014.8	94.7	94.9	88.62	88.62	-10,623.7	-1,028.5	840.2	650.7	189.53	4.433	
20,900.0	10,034.4	20,942.8	10,014.3	95.6	95.7	88.62	88.62	-10,723.7	-1,029.4	840.2	649.0	191.24	4.394	
21,000.0	10,033.9	21,042.8	10,013.9	96.4	96.6	88.62	88.62	-10,823.7	-1,030.4	840.2	647.3	192.94	4.355	
21,100.0	10,033.4	21,142.8	10,013.4	97.3	97.4	88.62	88.62	-10,923.7	-1,031.3	840.2	645.6	194.65	4.317	
21,200.0	10,033.0	21,242.8	10,012.9	98.1	98.3	88.62	88.62	-11,023.7	-1,032.2	840.2	643.9	196.36	4.279	
21,300.0	10,032.5	21,342.8	10,012.5	99.0	99.1	88.62	88.62	-11,123.7	-1,033.1	840.2	642.2	198.06	4.242	
21,400.0	10,032.0	21,442.8	10,012.0	99.8	100.0	88.62	88.62	-11,223.7	-1,034.0	840.2	640.5	199.77	4.206	
21,500.0	10,031.6	21,542.8	10,011.5	100.7	100.8	88.62	88.62	-11,323.7	-1,035.0	840.2	638.8	201.47	4.170	
21,600.0	10,031.1	21,642.8	10,011.1	101.5	101.7	88.62	88.62	-11,423.7	-1,035.9	840.2	637.0	203.18	4.135	
21,700.0	10,030.6	21,742.8	10,010.6	102.4	102.5	88.62	88.62	-11,523.7	-1,036.8	840.2	635.3	204.89	4.101	
21,800.0	10,030.2	21,842.8	10,010.1	103.2	103.4	88.62	88.62	-11,623.7	-1,037.7	840.2	633.6	206.59	4.067	
21,900.0	10,029.7	21,942.8	10,009.7	104.1	104.2	88.62	88.62	-11,723.7	-1,038.6	840.2	631.9	208.30	4.034	
22,000.0	10,029.2	22,042.8	10,009.2	105.0	105.1	88.62	88.62	-11,823.7	-1,039.6	840.2	630.2	210.01	4.001	
22,100.0	10,028.8	22,142.8	10,008.7	105.8	105.9	88.62	88.62	-11,923.7	-1,040.5	840.2	628.5	211.72	3.969	
22,200.0	10,028.3	22,242.8	10,008.3	106.7	106.8	88.62	88.62	-12,023.7	-1,041.4	840.2	626.8	213.42	3.937	
22,300.0	10,027.8	22,342.8	10,007.8	107.5	107.7	88.62	88.62	-12,123.6	-1,042.3	840.2	625.1	215.13	3.906	
22,400.0	10,027.4	22,442.8	10,007.3	108.4	108.5	88.62	88.62	-12,223.6	-1,043.2	840.2	623.4	216.84	3.875	
22,500.0	10,026.9	22,542.8	10,006.8	109.2	109.4	88.62	88.62	-12,323.6	-1,044.2	840.2	621.7	218.55	3.845	
22,600.0	10,026.5	22,642.8	10,006.4	110.1	110.2	88.62	88.62	-12,423.6	-1,045.1	840.2	620.0	220.25	3.815	
22,700.0	10,026.0	22,742.8	10,005.9	110.9	111.1	88.62	88.62	-12,523.6	-1,046.0	840.2	618.2	221.96	3.785	
22,800.0	10,025.5	22,842.8	10,005.4	111.8	111.9	88.62	88.62	-12,623.6	-1,046.9	840.2	616.5	223.67	3.756	
22,900.0	10,025.1	22,942.8	10,005.0	112.6	112.8	88.62	88.62	-12,723.6	-1,047.8	840.2	614.8	225.38	3.728	
23,000.0	10,024.6	23,042.8	10,004.5	113.5	113.6	88.62	88.62	-12,823.6	-1,048.8	840.2	613.1	227.09	3.700	
23,100.0	10,024.1	23,142.8	10,004.0	114.4	114.5	88.62	88.62	-12,923.6	-1,049.7	840.2	611.4	228.80	3.672	
23,200.0	10,023.7	23,242.8	10,003.6	115.2	115.3	88.62	88.62	-13,023.6	-1,050.6	840.2	609.7	230.50	3.645	
23,300.0	10,023.2	23,342.8	10,003.1	116.1	116.2	88.62	88.62	-13,123.6	-1,051.5	840.2	608.0	232.21	3.618	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #705H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program:		0-Standard Keeper 104, 9626-MWD+IFR1+FDIR					Rule Assigned:				Offset Well Error:		3.0 usft	
Reference	Offset	Semi Major Axis		Offset Wellbore Centre		Distance		Warning						
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor		
23,400.0	10,022.7	23,442.8	10,002.6	116.9	117.0	88.62	-13,223.6	-1,052.4	840.2	606.3	233.92	3.592		
23,500.0	10,022.3	23,542.8	10,002.2	117.8	117.9	88.62	-13,323.6	-1,053.4	840.2	604.6	235.63	3.566		
23,600.0	10,021.8	23,642.8	10,001.7	118.6	118.7	88.62	-13,423.6	-1,054.3	840.2	602.9	237.34	3.540		
23,700.0	10,021.3	23,742.8	10,001.2	119.5	119.6	88.62	-13,523.6	-1,055.2	840.2	601.1	239.05	3.515		
23,800.0	10,020.9	23,842.8	10,000.8	120.3	120.5	88.62	-13,623.6	-1,056.1	840.2	599.4	240.76	3.490		
23,900.0	10,020.4	23,942.8	10,000.3	121.2	121.3	88.62	-13,723.6	-1,057.0	840.2	597.7	242.47	3.465		
24,000.0	10,019.9	24,042.8	9,999.8	122.1	122.2	88.62	-13,823.6	-1,058.0	840.2	596.0	244.18	3.441		
24,100.0	10,019.5	24,142.8	9,999.4	122.9	123.0	88.61	-13,923.6	-1,058.9	840.2	594.3	245.89	3.417		
24,200.0	10,019.0	24,242.8	9,998.9	123.8	123.9	88.61	-14,023.5	-1,059.8	840.2	592.6	247.60	3.393		
24,300.0	10,018.5	24,342.8	9,998.4	124.6	124.7	88.61	-14,123.5	-1,060.7	840.2	590.9	249.31	3.370		
24,400.0	10,018.1	24,442.8	9,998.0	125.5	125.6	88.61	-14,223.5	-1,061.6	840.2	589.2	251.01	3.347		
24,500.0	10,017.6	24,542.8	9,997.5	126.3	126.4	88.61	-14,323.5	-1,062.6	840.2	587.5	252.72	3.324		
24,600.0	10,017.2	24,642.8	9,997.0	127.2	127.3	88.61	-14,423.5	-1,063.5	840.2	585.7	254.43	3.302		
24,700.0	10,016.7	24,742.8	9,996.6	128.0	128.1	88.61	-14,523.5	-1,064.4	840.2	584.0	256.14	3.280		
24,800.0	10,016.2	24,842.8	9,996.1	128.9	129.0	88.61	-14,623.5	-1,065.3	840.2	582.3	257.85	3.258		
24,900.0	10,015.8	24,942.8	9,995.6	129.8	129.9	88.61	-14,723.5	-1,066.2	840.2	580.6	259.56	3.237		
25,000.0	10,015.3	25,042.8	9,995.2	130.6	130.7	88.61	-14,823.5	-1,067.1	840.2	578.9	261.27	3.216		
25,100.0	10,014.8	25,142.8	9,994.7	131.5	131.6	88.61	-14,923.5	-1,068.1	840.2	577.2	262.98	3.195		
25,200.0	10,014.4	25,242.8	9,994.2	132.3	132.4	88.61	-15,023.5	-1,069.0	840.2	575.5	264.69	3.174		
25,300.0	10,013.9	25,342.8	9,993.8	133.2	133.3	88.61	-15,123.5	-1,069.9	840.2	573.8	266.41	3.154		
25,400.0	10,013.4	25,442.8	9,993.3	134.0	134.1	88.61	-15,223.5	-1,070.8	840.2	572.1	268.12	3.134		
25,460.6	10,013.1	25,503.4	9,993.0	134.6	134.6	88.61	-15,284.1	-1,071.4	840.2	571.0	269.15	3.122 SF		
25,492.9	10,013.0	25,505.0	9,993.0	134.8	134.7	88.61	-15,285.7	-1,071.4	840.7	571.6	269.16	3.123		
25,493.4	10,013.0	25,505.0	9,993.0	134.8	134.7	88.61	-15,285.7	-1,071.4	840.7	571.6	269.16	3.124		

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

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Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9550-MWD+IFR1+FDIR													Offset Well Error:	3.0 usft
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Semi Major Axis Offset	Highside Toolface (°)	Offset Wellbore Centre		Distance Between Centres (usft)	Rule Assigned: Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
0.0	0.0	0.3	0.3	3.0	3.0		89.81	0.2	60.1	60.1				
100.0	100.0	100.3	100.3	3.0	3.0		89.81	0.2	60.1	60.1	54.1	6.00	10.016	
200.0	200.0	200.3	200.3	3.0	3.0		89.81	0.2	60.1	60.1	54.1	6.00	10.012	
300.0	300.0	300.3	300.3	3.0	3.0		89.81	0.2	60.1	60.1	54.1	6.01	10.001	
400.0	400.0	400.3	400.3	3.0	3.0		89.81	0.2	60.1	60.1	54.1	6.02	9.986	
500.0	500.0	500.3	500.3	3.1	3.1		89.81	0.2	60.1	60.1	54.1	6.03	9.965	
600.0	600.0	600.3	600.3	3.1	3.1		89.81	0.2	60.1	60.1	54.1	6.05	9.939	
700.0	700.0	700.3	700.3	3.1	3.1		89.81	0.2	60.1	60.1	54.0	6.07	9.908	
800.0	800.0	800.3	800.3	3.2	3.2		89.81	0.2	60.1	60.1	54.0	6.09	9.872	
900.0	900.0	900.3	900.3	3.2	3.2		89.81	0.2	60.1	60.1	54.0	6.11	9.832	
1,000.0	1,000.0	1,000.3	1,000.3	3.2	3.2		89.81	0.2	60.1	60.1	54.0	6.14	9.786	
1,100.0	1,100.0	1,100.3	1,100.3	3.3	3.3		89.81	0.2	60.1	60.1	53.9	6.17	9.737	
1,200.0	1,200.0	1,200.3	1,200.3	3.4	3.4		89.81	0.2	60.1	60.1	53.9	6.21	9.683	
1,300.0	1,300.0	1,300.3	1,300.3	3.4	3.4		89.81	0.2	60.1	60.1	53.9	6.24	9.625	
1,400.0	1,400.0	1,400.3	1,400.3	3.5	3.5		89.81	0.2	60.1	60.1	53.8	6.28	9.564	
1,500.0	1,500.0	1,500.3	1,500.3	3.5	3.5		89.81	0.2	60.1	60.1	53.8	6.33	9.499	
1,600.0	1,600.0	1,600.3	1,600.3	3.6	3.6		89.81	0.2	60.1	60.1	53.7	6.37	9.431	
1,700.0	1,700.0	1,700.3	1,700.3	3.7	3.7		89.81	0.2	60.1	60.1	53.7	6.42	9.360	
1,800.0	1,800.0	1,800.3	1,800.3	3.8	3.8		89.81	0.2	60.1	60.1	53.6	6.47	9.286	
1,900.0	1,900.0	1,900.3	1,900.3	3.9	3.9		89.81	0.2	60.1	60.1	53.6	6.53	9.210	
2,000.0	2,000.0	2,000.3	2,000.3	3.9	3.9		89.81	0.2	60.1	60.1	53.5	6.58	9.131	
2,100.0	2,100.0	2,100.3	2,100.3	4.0	4.0		89.81	0.2	60.1	60.1	53.5	6.64	9.051	
2,200.0	2,200.0	2,200.3	2,200.3	4.1	4.1		89.81	0.2	60.1	60.1	53.4	6.70	8.968	
2,300.0	2,300.0	2,300.3	2,300.3	4.2	4.2		89.81	0.2	60.1	60.1	53.3	6.76	8.884	
2,400.0	2,400.0	2,400.3	2,400.3	4.3	4.3		89.81	0.2	60.1	60.1	53.3	6.83	8.799	
2,416.6	2,416.6	2,416.9	2,416.9	4.3	4.3		89.81	0.2	60.1	60.1	53.3	6.84	8.785 CC	
2,500.0	2,500.0	2,500.0	2,500.0	4.4	4.4		89.81	0.2	60.1	60.1	53.2	6.90	8.713 ES	
2,600.0	2,600.0	2,598.5	2,598.5	4.5	4.5		134.95	1.1	61.5	62.8	55.8	6.97	9.010	
2,700.0	2,699.8	2,696.3	2,696.1	4.6	4.5		135.53	3.9	65.7	70.8	63.7	7.04	10.050	
2,750.0	2,749.7	2,744.9	2,744.6	4.6	4.6		135.88	5.9	68.8	76.7	69.7	7.08	10.839	
2,800.0	2,799.5	2,793.3	2,792.8	4.6	4.6		136.14	8.4	72.6	83.7	76.6	7.12	11.758	
2,900.0	2,899.1	2,892.0	2,891.0	4.7	4.7		136.18	14.1	81.3	98.6	91.4	7.21	13.675	
3,000.0	2,998.7	2,990.9	2,989.3	4.8	4.8		136.22	19.8	89.9	113.4	106.1	7.30	15.533	
3,100.0	3,098.4	3,089.8	3,087.7	4.9	4.8		136.24	25.4	98.5	128.3	120.9	7.40	17.332	
3,200.0	3,198.0	3,188.7	3,186.0	5.0	4.9		136.26	31.1	107.2	143.2	135.6	7.51	19.069	
3,300.0	3,297.6	3,287.6	3,284.3	5.1	5.0		136.28	36.8	115.8	158.0	150.4	7.62	20.743	
3,400.0	3,397.2	3,386.5	3,382.7	5.2	5.1		136.29	42.5	124.5	172.9	165.1	7.73	22.356	
3,500.0	3,496.8	3,485.3	3,481.0	5.2	5.1		136.30	48.1	133.1	187.7	179.9	7.85	23.906	
3,600.0	3,596.4	3,584.2	3,579.4	5.3	5.2		136.31	53.8	141.7	202.6	194.6	7.98	25.394	
3,700.0	3,696.1	3,683.1	3,677.7	5.4	5.3		136.32	59.5	150.4	217.4	209.3	8.11	26.821	
3,800.0	3,795.7	3,782.0	3,776.1	5.5	5.4		136.33	65.2	159.0	232.3	224.0	8.24	28.189	
3,900.0	3,895.3	3,880.9	3,874.4	5.6	5.5		136.33	70.8	167.7	247.1	238.8	8.38	29.498	
4,000.0	3,994.9	3,979.8	3,972.8	5.7	5.6		136.34	76.5	176.3	262.0	253.5	8.52	30.749	
4,100.0	4,094.5	4,078.7	4,071.1	5.8	5.7		136.34	82.2	184.9	276.9	268.2	8.67	31.946	
4,200.0	4,194.2	4,177.6	4,169.5	5.9	5.8		136.35	87.9	193.6	291.7	282.9	8.82	33.089	
4,300.0	4,293.8	4,276.5	4,267.8	6.0	5.9		136.35	93.5	202.2	306.6	297.6	8.97	34.179	
4,400.0	4,393.4	4,375.4	4,366.2	6.1	6.0		136.36	99.2	210.9	321.4	312.3	9.13	35.220	
4,500.0	4,493.0	4,474.3	4,464.5	6.2	6.1		136.36	104.9	219.5	336.3	327.0	9.29	36.213	
4,600.0	4,592.6	4,573.1	4,562.9	6.4	6.2		136.36	110.6	228.1	351.1	341.7	9.45	37.160	
4,700.0	4,692.3	4,672.0	4,661.2	6.5	6.3		136.36	116.2	236.8	366.0	356.4	9.62	38.062	
4,800.0	4,791.9	4,770.9	4,759.6	6.6	6.4		136.37	121.9	245.4	380.8	371.1	9.78	38.922	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1													Offset Site Error:	0.0 usft	
Survey Program:		0-Standard Keeper 104, 9550-MWD+IFR1+FDIR					Rule Assigned:							Offset Well Error:	3.0 usft
Measured Reference	Vertical	Measured Offset	Vertical	Reference	Offset	Highside	Offset Wellbore Centre		Distance		Minimum	Separation	Warning		
Depth (usft)	Depth (usft)	Depth (usft)	Depth (usft)	(usft)	(usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Ellipses (usft)	Separation (usft)	Factor			
4,900.0	4,891.5	4,869.8	4,857.9	6.7	6.5	136.37	127.6	254.1	395.7	385.7	9.96	39.741			
5,000.0	4,991.1	4,968.7	4,956.3	6.8	6.6	136.37	133.3	262.7	410.6	400.4	10.13	40.521			
5,100.0	5,090.7	5,067.6	5,054.6	6.9	6.7	136.37	138.9	271.3	425.4	415.1	10.31	41.265			
5,200.0	5,190.4	5,166.5	5,153.0	7.0	6.8	136.38	144.6	280.0	440.3	429.8	10.49	41.973			
5,300.0	5,290.0	5,265.4	5,251.3	7.1	6.9	136.38	150.3	288.6	455.1	444.5	10.67	42.648			
5,400.0	5,389.6	5,364.3	5,349.7	7.2	7.0	136.38	156.0	297.3	470.0	459.1	10.86	43.290			
5,500.0	5,489.2	5,463.2	5,448.0	7.3	7.1	136.38	161.6	305.9	484.8	473.8	11.04	43.902			
5,600.0	5,588.8	5,562.0	5,546.4	7.5	7.2	136.38	167.3	314.5	499.7	488.5	11.23	44.485			
5,700.0	5,688.5	5,660.9	5,644.7	7.6	7.3	136.38	173.0	323.2	514.5	503.1	11.42	45.041			
5,800.0	5,788.1	5,759.8	5,743.1	7.7	7.4	136.39	178.7	331.8	529.4	517.8	11.62	45.570			
5,900.0	5,887.7	5,858.7	5,841.4	7.8	7.6	136.39	184.3	340.5	544.3	532.4	11.81	46.074			
6,000.0	5,987.3	5,957.6	5,939.8	7.9	7.7	136.39	190.0	349.1	559.1	547.1	12.01	46.554			
6,100.0	6,086.9	6,056.5	6,038.1	8.0	7.8	136.39	195.7	357.7	574.0	561.8	12.21	47.012			
6,200.0	6,186.6	6,155.4	6,136.5	8.1	7.9	136.39	201.4	366.4	588.8	576.4	12.41	47.448			
6,300.0	6,286.2	6,254.3	6,234.8	8.3	8.0	136.39	207.0	375.0	603.7	591.1	12.61	47.863			
6,400.0	6,385.8	6,353.2	6,333.2	8.4	8.1	136.39	212.7	383.7	618.5	605.7	12.82	48.259			
6,500.0	6,485.4	6,452.1	6,431.5	8.5	8.2	136.39	218.4	392.3	633.4	620.4	13.02	48.637			
6,600.0	6,585.0	6,550.9	6,529.9	8.6	8.4	136.39	224.1	400.9	648.2	635.0	13.23	48.996			
6,700.0	6,684.7	6,649.8	6,628.2	8.7	8.5	136.39	229.7	409.6	663.1	649.7	13.44	49.339			
6,800.0	6,784.3	6,748.7	6,726.6	8.8	8.6	136.40	235.4	418.2	678.0	664.3	13.65	49.666			
6,900.0	6,883.9	6,847.6	6,824.9	9.0	8.7	136.40	241.1	426.9	692.8	679.0	13.86	49.978			
7,000.0	6,983.5	6,946.5	6,923.2	9.1	8.8	136.40	246.8	435.5	707.7	693.6	14.08	50.275			
7,100.0	7,083.1	7,045.4	7,021.6	9.2	8.9	136.40	252.4	444.1	722.5	708.2	14.29	50.558			
7,200.0	7,182.7	7,144.3	7,119.9	9.3	9.0	136.40	258.1	452.8	737.4	722.9	14.51	50.828			
7,300.0	7,282.4	7,243.2	7,218.3	9.4	9.2	136.40	263.8	461.4	752.2	737.5	14.72	51.086			
7,396.8	7,378.8	7,338.9	7,313.5	9.6	9.3	136.40	269.3	469.8	766.6	751.7	14.94	51.324			
7,400.0	7,382.0	7,342.1	7,316.6	9.6	9.3	136.40	269.5	470.1	767.1	752.1	14.94	51.331			
7,500.0	7,481.7	7,441.1	7,415.1	9.7	9.4	136.45	275.1	478.7	781.3	766.1	15.16	51.528			
7,600.0	7,581.5	7,540.2	7,513.7	9.8	9.5	136.41	280.8	487.4	794.2	778.8	15.37	51.661			
7,700.0	7,681.4	7,639.5	7,612.4	9.9	9.6	136.28	286.5	496.0	805.9	790.3	15.58	51.729			
7,800.0	7,781.4	7,738.8	7,711.2	10.0	9.8	136.06	292.2	504.7	816.4	800.6	15.78	51.718			
7,896.8	7,878.2	7,846.3	7,818.2	10.2	9.9	90.84	298.0	513.5	824.8	808.8	15.95	51.708			
7,900.0	7,881.4	7,850.0	7,821.8	10.2	9.9	90.83	298.1	513.7	825.0	809.0	15.96	51.707			
8,000.0	7,981.4	7,963.3	7,934.8	10.3	10.0	90.49	303.0	521.1	831.4	815.3	16.11	51.620			
8,100.0	8,081.4	8,076.9	8,048.2	10.4	10.2	90.23	306.6	526.6	836.3	820.0	16.26	51.431			
8,200.0	8,181.4	8,190.7	8,161.9	10.5	10.3	90.07	309.0	530.2	839.4	823.0	16.41	51.140			
8,300.0	8,281.4	8,304.6	8,275.9	10.6	10.4	89.99	310.1	531.9	841.0	824.4	16.58	50.735			
8,400.0	8,381.4	8,410.4	8,381.7	10.7	10.5	89.99	310.2	532.1	841.1	824.4	16.69	50.398			
8,500.0	8,481.4	8,510.4	8,481.7	10.8	10.7	89.99	310.2	532.1	841.1	824.3	16.79	50.105			
8,600.0	8,581.4	8,610.4	8,581.7	11.0	10.8	89.99	310.2	532.1	841.1	824.2	16.88	49.814			
8,700.0	8,681.4	8,710.4	8,681.7	11.1	10.9	89.99	310.2	532.1	841.1	824.1	16.98	49.525			
8,800.0	8,781.4	8,810.4	8,781.7	11.2	11.0	89.99	310.2	532.1	841.1	824.0	17.08	49.237			
8,900.0	8,881.4	8,910.4	8,881.7	11.3	11.1	89.99	310.2	532.1	841.1	823.9	17.18	48.952			
9,000.0	8,981.4	9,010.4	8,981.7	11.4	11.2	89.99	310.2	532.1	841.1	823.8	17.28	48.667			
9,100.0	9,081.4	9,110.4	9,081.7	11.6	11.3	89.99	310.2	532.1	841.1	823.7	17.38	48.385			
9,200.0	9,181.4	9,210.4	9,181.7	11.7	11.4	89.99	310.2	532.1	841.1	823.6	17.48	48.104			
9,300.0	9,281.4	9,310.4	9,281.7	11.8	11.5	89.99	310.2	532.1	841.1	823.5	17.59	47.826			
9,400.0	9,381.4	9,410.4	9,381.7	11.9	11.7	89.99	310.2	532.1	841.1	823.4	17.69	47.549			
9,500.0	9,481.4	9,510.4	9,481.7	12.0	11.8	89.99	310.2	532.1	841.1	823.3	17.79	47.274			
9,528.6	9,510.0	9,539.1	9,510.3	12.1	11.8	89.99	310.2	532.1	841.1	823.3	17.82	47.195			
9,550.0	9,531.4	9,559.9	9,531.2	12.1	11.8	-88.27	310.1	532.1	841.1	823.3	17.84	47.149			

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9550-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference Offset (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Rule Assigned: Distance Between Centres (usft)		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)			
9,600.0	9,581.2	9,607.9	9,579.0	12.0	11.8	-88.34	307.2	532.2	841.1	823.2	17.87	47.068	
9,650.0	9,630.5	9,655.9	9,626.5	12.8	11.8	-88.41	300.2	532.4	841.0	823.1	17.89	47.013	
9,700.0	9,678.8	9,704.0	9,673.3	12.9	11.8	-88.51	289.3	532.7	841.0	823.1	17.90	46.971	
9,750.0	9,725.9	9,752.2	9,719.2	12.9	11.9	-88.61	274.5	533.2	840.9	823.0	17.93	46.900	
9,800.0	9,771.3	9,800.0	9,763.3	12.9	11.9	-88.72	256.0	533.8	840.9	822.9	17.97	46.794	
9,850.0	9,814.8	9,849.0	9,806.7	13.0	11.9	-88.84	233.4	534.4	840.9	822.8	18.03	46.644	
9,900.0	9,855.9	9,897.6	9,847.7	13.0	11.9	-88.97	207.3	535.2	840.8	822.7	18.10	46.444	
9,950.0	9,894.4	9,946.4	9,886.4	13.1	12.0	-89.11	177.8	536.1	840.8	822.6	18.20	46.184	
10,000.0	9,930.0	9,995.3	9,922.7	13.1	12.0	-89.26	144.9	537.2	840.7	822.4	18.33	45.858	
10,050.0	9,962.3	10,044.4	9,956.1	13.2	12.1	-89.41	108.9	538.3	840.7	822.2	18.49	45.460	
10,100.0	9,991.3	10,093.7	9,986.4	13.3	12.2	-89.56	70.1	539.4	840.7	822.0	18.69	44.987	
10,150.0	10,016.5	10,143.2	10,013.4	13.4	12.2	-89.72	28.6	540.7	840.7	821.7	18.92	44.439	
10,200.0	10,037.9	10,192.9	10,036.8	13.4	12.3	-89.88	-15.2	542.0	840.6	821.4	19.18	43.819	
10,250.0	10,055.3	10,242.8	10,056.3	13.5	12.3	-90.05	-61.1	543.5	840.6	821.1	19.49	43.136	
10,300.0	10,068.6	10,293.0	10,071.9	13.6	12.4	-90.21	-108.7	544.9	840.6	820.8	19.83	42.398	
10,319.5	10,072.6	10,312.6	10,076.8	13.6	12.4	-90.27	-127.6	545.5	840.6	820.6	19.97	42.094	
10,350.0	10,077.6	10,343.3	10,083.3	13.6	12.5	-90.37	-157.6	546.4	840.6	820.4	20.20	41.621	
10,400.0	10,082.2	10,393.8	10,090.3	13.7	12.6	-90.53	-207.6	547.9	840.6	820.0	20.59	40.817	
10,431.3	10,083.0	10,425.6	10,092.5	13.7	12.6	-90.63	-239.3	548.9	840.6	819.8	20.86	40.308	
10,500.0	10,082.6	10,494.7	10,092.8	13.8	12.7	-90.67	-308.4	551.0	840.6	819.2	21.46	39.177	
10,600.0	10,082.2	10,594.7	10,092.3	13.9	12.9	-90.67	-408.3	554.1	840.6	818.2	22.42	37.487	
10,700.0	10,081.7	10,694.7	10,091.8	14.0	13.2	-90.67	-508.3	557.1	840.6	817.1	23.48	35.803	
10,800.0	10,081.2	10,794.7	10,091.4	14.1	13.5	-90.67	-608.2	560.2	840.6	815.9	24.61	34.159	
10,900.0	10,080.8	10,894.7	10,090.9	14.3	13.9	-90.67	-708.2	563.2	840.5	814.7	25.80	32.577	
11,000.0	10,080.3	10,994.7	10,090.4	14.6	14.3	-90.67	-808.1	566.3	840.5	813.5	27.05	31.068	
11,100.0	10,079.8	11,094.7	10,090.0	14.9	14.8	-90.67	-908.1	569.4	840.5	812.1	28.35	29.642	
11,200.0	10,079.4	11,194.7	10,089.5	15.3	15.4	-90.67	-1,008.0	572.4	840.5	810.8	29.70	28.299	
11,300.0	10,078.9	11,294.7	10,089.0	15.9	16.0	-90.67	-1,108.0	575.5	840.4	809.4	31.08	27.041	
11,400.0	10,078.4	11,394.7	10,088.6	16.4	16.7	-90.67	-1,207.9	578.5	840.4	807.9	32.49	25.863	
11,500.0	10,078.0	11,494.7	10,088.1	17.1	17.3	-90.67	-1,307.9	581.6	840.4	806.5	33.94	24.763	
11,600.0	10,077.5	11,594.7	10,087.7	17.8	18.0	-90.67	-1,407.8	584.6	840.4	805.0	35.41	23.736	
11,700.0	10,077.0	11,694.7	10,087.2	18.5	18.7	-90.67	-1,507.8	587.7	840.3	803.4	36.90	22.777	
11,800.0	10,076.6	11,794.7	10,086.7	19.2	19.5	-90.67	-1,607.8	590.7	840.3	801.9	38.40	21.881	
11,900.0	10,076.1	11,894.7	10,086.3	20.0	20.2	-90.67	-1,707.7	593.8	840.3	800.4	39.93	21.044	
12,000.0	10,075.7	11,994.7	10,085.8	20.7	20.9	-90.67	-1,807.7	596.9	840.3	798.8	41.47	20.261	
12,100.0	10,075.2	12,094.7	10,085.3	21.5	21.7	-90.67	-1,907.6	599.9	840.2	797.2	43.03	19.528	
12,200.0	10,074.7	12,194.7	10,084.9	22.3	22.5	-90.67	-2,007.6	603.0	840.2	795.6	44.60	18.840	
12,300.0	10,074.3	12,294.7	10,084.4	23.0	23.2	-90.67	-2,107.5	606.0	840.2	794.0	46.18	18.196	
12,400.0	10,073.8	12,394.7	10,084.0	23.8	24.0	-90.67	-2,207.5	609.1	840.2	792.4	47.77	17.590	
12,500.0	10,073.3	12,494.7	10,083.5	24.6	24.8	-90.67	-2,307.4	612.1	840.2	790.8	49.36	17.020	
12,600.0	10,072.9	12,594.7	10,083.0	25.4	25.6	-90.67	-2,407.4	615.2	840.1	789.2	50.97	16.483	
12,700.0	10,072.4	12,694.7	10,082.6	26.2	26.4	-90.67	-2,507.3	618.3	840.1	787.5	52.58	15.977	
12,800.0	10,071.9	12,794.7	10,082.1	27.1	27.2	-90.67	-2,607.3	621.3	840.1	785.9	54.20	15.499	
12,900.0	10,071.5	12,894.7	10,081.6	27.9	28.0	-90.67	-2,707.2	624.4	840.1	784.2	55.83	15.047	
13,000.0	10,071.0	12,994.7	10,081.2	28.7	28.8	-90.67	-2,807.2	627.4	840.0	782.6	57.46	14.619	
13,100.0	10,070.5	13,094.7	10,080.7	29.5	29.6	-90.67	-2,907.1	630.5	840.0	780.9	59.10	14.214	
13,200.0	10,070.1	13,194.7	10,080.3	30.3	30.5	-90.67	-3,007.1	633.5	840.0	779.3	60.74	13.829	
13,300.0	10,069.6	13,294.7	10,079.8	31.2	31.3	-90.67	-3,107.0	636.6	840.0	777.6	62.39	13.464	
13,400.0	10,069.1	13,394.7	10,079.3	32.0	32.1	-90.67	-3,207.0	639.6	839.9	775.9	64.04	13.116	
13,500.0	10,068.7	13,494.7	10,078.9	32.8	32.9	-90.68	-3,306.9	642.7	839.9	774.2	65.69	12.786	
13,600.0	10,068.2	13,594.7	10,078.4	33.6	33.7	-90.68	-3,406.9	645.8	839.9	772.6	67.35	12.471	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9550-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Distance Between Centres (usft)		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)					
13,700.0	10,067.7	13,694.7	10,077.9	34.5	34.6	-90.68	-3,506.8	648.8	839.9	770.9	69.01	12.170	
13,800.0	10,067.3	13,794.7	10,077.5	35.3	35.4	-90.68	-3,606.8	651.9	839.9	769.2	70.68	11.883	
13,900.0	10,066.8	13,894.7	10,077.0	36.1	36.2	-90.68	-3,706.7	654.9	839.8	767.5	72.34	11.609	
14,000.0	10,066.3	13,994.7	10,076.6	37.0	37.1	-90.68	-3,806.7	658.0	839.8	765.8	74.01	11.347	
14,100.0	10,065.9	14,094.7	10,076.1	37.8	37.9	-90.68	-3,906.7	661.0	839.8	764.1	75.68	11.096	
14,200.0	10,065.4	14,194.7	10,075.6	38.7	38.7	-90.68	-4,006.6	664.1	839.8	762.4	77.36	10.856	
14,300.0	10,064.9	14,294.7	10,075.2	39.5	39.6	-90.68	-4,106.6	667.1	839.7	760.7	79.03	10.625	
14,400.0	10,064.5	14,394.7	10,074.7	40.3	40.4	-90.68	-4,206.5	670.2	839.7	759.0	80.71	10.404	
14,500.0	10,064.0	14,494.7	10,074.2	41.2	41.2	-90.68	-4,306.5	673.3	839.7	757.3	82.39	10.192	
14,600.0	10,063.6	14,594.7	10,073.8	42.0	42.1	-90.68	-4,406.4	676.3	839.7	755.6	84.07	9.987	
14,700.0	10,063.1	14,694.7	10,073.3	42.9	42.9	-90.68	-4,506.4	679.4	839.6	753.9	85.76	9.791	
14,800.0	10,062.6	14,794.7	10,072.9	43.7	43.7	-90.68	-4,606.3	682.4	839.6	752.2	87.44	9.602	
14,900.0	10,062.2	14,894.7	10,072.4	44.6	44.6	-90.68	-4,706.3	685.5	839.6	750.5	89.13	9.420	
15,000.0	10,061.7	14,994.7	10,071.9	45.4	45.4	-90.68	-4,806.2	688.5	839.6	748.8	90.81	9.245	
15,105.9	10,061.2	15,100.6	10,071.4	46.3	46.3	-90.68	-4,912.1	691.8	839.6	746.9	92.60	9.066	
15,106.5	10,061.2	15,101.2	10,071.4	46.3	46.3	-90.68	-4,912.7	691.8	839.6	746.9	92.61	9.065	
15,200.0	10,060.8	15,221.6	10,070.9	47.1	47.3	-90.67	-5,033.0	694.0	840.0	745.7	94.37	8.901	
15,215.6	10,060.7	15,243.7	10,070.8	47.2	47.5	-90.67	-5,055.1	693.9	840.0	745.4	94.67	8.873	
15,217.3	10,060.7	15,246.0	10,070.8	47.2	47.5	-90.67	-5,057.5	693.9	840.0	745.3	94.70	8.870	
15,300.0	10,060.3	15,326.6	10,070.4	47.9	48.2	-90.67	-5,138.1	693.3	840.0	743.9	96.08	8.743	
15,400.0	10,059.8	15,426.6	10,069.9	48.8	49.1	-90.67	-5,238.1	692.5	840.0	742.3	97.77	8.592	
15,500.0	10,059.4	15,526.6	10,069.5	49.6	49.9	-90.67	-5,338.1	691.8	840.0	740.6	99.45	8.447	
15,600.0	10,058.9	15,626.6	10,069.0	50.5	50.7	-90.67	-5,438.1	691.0	840.0	738.9	101.14	8.306	
15,700.0	10,058.4	15,726.6	10,068.5	51.3	51.6	-90.67	-5,538.1	690.3	840.0	737.2	102.83	8.170	
15,800.0	10,058.0	15,826.6	10,068.1	52.2	52.4	-90.67	-5,638.1	689.5	840.0	735.5	104.51	8.038	
15,900.0	10,057.5	15,926.6	10,067.6	53.0	53.3	-90.67	-5,738.1	688.8	840.0	733.8	106.20	7.910	
16,000.0	10,057.1	16,026.6	10,067.1	53.8	54.1	-90.67	-5,838.1	688.0	840.0	732.1	107.89	7.786	
16,100.0	10,056.6	16,126.6	10,066.7	54.7	55.0	-90.67	-5,938.1	687.3	840.0	730.4	109.58	7.666	
16,200.0	10,056.1	16,226.6	10,066.2	55.5	55.8	-90.67	-6,038.1	686.5	840.0	728.8	111.28	7.549	
16,300.0	10,055.7	16,326.6	10,065.7	56.4	56.6	-90.67	-6,138.1	685.8	840.0	727.1	112.97	7.436	
16,400.0	10,055.2	16,426.6	10,065.3	57.2	57.5	-90.67	-6,238.1	685.0	840.0	725.4	114.66	7.326	
16,500.0	10,054.7	16,526.6	10,064.8	58.1	58.3	-90.67	-6,338.1	684.3	840.0	723.7	116.35	7.220	
16,600.0	10,054.3	16,626.6	10,064.4	58.9	59.2	-90.67	-6,438.1	683.5	840.0	722.0	118.05	7.116	
16,700.0	10,053.8	16,726.6	10,063.9	59.8	60.0	-90.67	-6,538.1	682.8	840.0	720.3	119.74	7.015	
16,800.0	10,053.4	16,826.6	10,063.4	60.6	60.9	-90.67	-6,638.1	682.0	840.0	718.6	121.44	6.917	
16,900.0	10,052.9	16,926.6	10,063.0	61.5	61.7	-90.67	-6,738.0	681.3	840.0	716.9	123.14	6.822	
17,000.0	10,052.4	17,026.6	10,062.5	62.3	62.6	-90.67	-6,838.0	680.5	840.0	715.2	124.83	6.729	
17,100.0	10,052.0	17,126.6	10,062.0	63.2	63.4	-90.67	-6,938.0	679.8	840.0	713.5	126.53	6.639	
17,200.0	10,051.5	17,226.6	10,061.6	64.0	64.3	-90.67	-7,038.0	679.0	840.0	711.8	128.23	6.551	
17,300.0	10,051.0	17,326.6	10,061.1	64.9	65.1	-90.67	-7,138.0	678.3	840.0	710.1	129.93	6.466	
17,400.0	10,050.6	17,426.6	10,060.6	65.7	66.0	-90.67	-7,238.0	677.5	840.0	708.4	131.62	6.382	
17,500.0	10,050.1	17,526.6	10,060.2	66.6	66.8	-90.67	-7,338.0	676.8	840.0	706.7	133.32	6.301	
17,600.0	10,049.6	17,626.6	10,059.7	67.4	67.7	-90.67	-7,438.0	676.0	840.0	705.0	135.02	6.221	
17,700.0	10,049.2	17,726.6	10,059.2	68.3	68.5	-90.67	-7,538.0	675.3	840.0	703.3	136.72	6.144	
17,800.0	10,048.7	17,826.6	10,058.8	69.1	69.3	-90.67	-7,638.0	674.5	840.0	701.6	138.42	6.069	
17,900.0	10,048.3	17,926.6	10,058.3	70.0	70.2	-90.67	-7,738.0	673.8	840.0	699.9	140.12	5.995	
18,000.0	10,047.8	18,026.6	10,057.9	70.8	71.0	-90.67	-7,838.0	673.0	840.0	698.2	141.82	5.923	
18,100.0	10,047.3	18,126.6	10,057.4	71.7	71.9	-90.67	-7,938.0	672.3	840.0	696.5	143.53	5.853	
18,200.0	10,046.9	18,226.6	10,056.9	72.5	72.7	-90.67	-8,038.0	671.5	840.0	694.8	145.23	5.784	
18,300.0	10,046.4	18,326.6	10,056.5	73.4	73.6	-90.67	-8,138.0	670.8	840.0	693.1	146.93	5.717	
18,400.0	10,045.9	18,426.6	10,056.0	74.2	74.4	-90.67	-8,238.0	670.0	840.0	691.4	148.63	5.652	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9550-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Reference	Vertical	Measured	Vertical	Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Warning	
Depth	Depth	Depth	Depth	Reference	Offset	Offset	Toolface	+N/-S	+E/-W	Distance	Minimum	Separation	
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Between	Separation	Factor	
										Centres	Ellipses		
										(usft)	(usft)		
18,500.0	10,045.5	18,526.6	10,055.5	75.1	75.3	-90.66	-8,338.0	669.3	840.0	689.7	150.33	5.588	
18,600.0	10,045.0	18,626.6	10,055.1	75.9	76.1	-90.66	-8,438.0	668.5	840.0	688.0	152.04	5.525	
18,700.0	10,044.6	18,726.6	10,054.6	76.8	77.0	-90.66	-8,538.0	667.8	840.0	686.3	153.74	5.464	
18,800.0	10,044.1	18,826.6	10,054.1	77.6	77.9	-90.66	-8,638.0	667.0	840.0	684.6	155.44	5.404	
18,900.0	10,043.6	18,926.6	10,053.7	78.5	78.7	-90.66	-8,738.0	666.3	840.0	682.9	157.15	5.346	
19,000.0	10,043.2	19,026.6	10,053.2	79.3	79.6	-90.66	-8,838.0	665.5	840.0	681.2	158.85	5.288	
19,100.0	10,042.7	19,126.6	10,052.7	80.2	80.4	-90.66	-8,938.0	664.8	840.0	679.5	160.56	5.232	
19,200.0	10,042.2	19,226.6	10,052.3	81.0	81.3	-90.66	-9,038.0	664.0	840.0	677.8	162.26	5.177	
19,300.0	10,041.8	19,326.6	10,051.8	81.9	82.1	-90.66	-9,138.0	663.3	840.0	676.1	163.97	5.123	
19,400.0	10,041.3	19,426.6	10,051.4	82.8	83.0	-90.66	-9,238.0	662.5	840.0	674.4	165.67	5.071	
19,500.0	10,040.9	19,526.6	10,050.9	83.6	83.8	-90.66	-9,337.9	661.8	840.0	672.7	167.38	5.019	
19,600.0	10,040.4	19,626.6	10,050.4	84.5	84.7	-90.66	-9,437.9	661.0	840.0	671.0	169.08	4.968	
19,700.0	10,039.9	19,726.6	10,050.0	85.3	85.5	-90.66	-9,537.9	660.3	840.0	669.3	170.79	4.919	
19,800.0	10,039.5	19,826.6	10,049.5	86.2	86.4	-90.66	-9,637.9	659.5	840.0	667.6	172.49	4.870	
19,900.0	10,039.0	19,926.6	10,049.0	87.0	87.2	-90.66	-9,737.9	658.8	840.0	665.8	174.20	4.822	
20,000.0	10,038.5	20,026.6	10,048.6	87.9	88.1	-90.66	-9,837.9	658.0	840.0	664.1	175.91	4.776	
20,100.0	10,038.1	20,126.6	10,048.1	88.7	88.9	-90.66	-9,937.9	657.3	840.0	662.4	177.61	4.730	
20,200.0	10,037.6	20,226.6	10,047.6	89.6	89.8	-90.66	-10,037.9	656.5	840.0	660.7	179.32	4.685	
20,300.0	10,037.1	20,326.6	10,047.2	90.4	90.6	-90.66	-10,137.9	655.8	840.0	659.0	181.03	4.640	
20,400.0	10,036.7	20,426.6	10,046.7	91.3	91.5	-90.66	-10,237.9	655.0	840.0	657.3	182.73	4.597	
20,439.7	10,036.5	20,466.4	10,046.5	91.6	91.8	-90.66	-10,277.6	654.7	840.0	656.6	183.41	4.580	
20,444.6	10,036.5	20,471.2	10,046.5	91.7	91.9	-90.66	-10,282.5	654.7	840.1	656.6	183.49	4.578	
20,500.0	10,036.2	20,528.1	10,046.2	92.1	92.3	-90.66	-10,339.3	654.2	840.1	655.6	184.44	4.555	
20,600.0	10,035.8	20,628.1	10,045.8	93.0	93.2	-90.66	-10,439.3	653.2	840.1	653.9	186.15	4.513	
20,700.0	10,035.3	20,728.1	10,045.3	93.8	94.1	-90.66	-10,539.3	652.3	840.1	652.2	187.86	4.472	
20,800.0	10,034.8	20,828.1	10,044.9	94.7	94.9	-90.66	-10,639.3	651.4	840.1	650.5	189.57	4.431	
20,900.0	10,034.4	20,928.1	10,044.4	95.6	95.8	-90.66	-10,739.3	650.5	840.1	648.8	191.27	4.392	
21,000.0	10,033.9	21,028.1	10,043.9	96.4	96.6	-90.66	-10,839.3	649.6	840.1	647.1	192.98	4.353	
21,100.0	10,033.4	21,128.1	10,043.5	97.3	97.5	-90.66	-10,939.3	648.6	840.1	645.4	194.69	4.315	
21,200.0	10,033.0	21,228.1	10,043.0	98.1	98.3	-90.66	-11,039.3	647.7	840.1	643.7	196.40	4.277	
21,300.0	10,032.5	21,328.1	10,042.5	99.0	99.2	-90.66	-11,139.3	646.8	840.1	642.0	198.10	4.240	
21,400.0	10,032.0	21,428.1	10,042.1	99.8	100.0	-90.66	-11,239.3	645.9	840.1	640.2	199.81	4.204	
21,500.0	10,031.6	21,528.1	10,041.6	100.7	100.9	-90.66	-11,339.3	645.0	840.1	638.5	201.52	4.169	
21,600.0	10,031.1	21,628.1	10,041.2	101.5	101.7	-90.66	-11,439.3	644.0	840.1	636.8	203.23	4.134	
21,700.0	10,030.6	21,728.1	10,040.7	102.4	102.6	-90.66	-11,539.3	643.1	840.1	635.1	204.94	4.099	
21,800.0	10,030.2	21,828.1	10,040.2	103.2	103.4	-90.67	-11,639.3	642.2	840.1	633.4	206.65	4.065	
21,900.0	10,029.7	21,928.1	10,039.8	104.1	104.3	-90.67	-11,739.3	641.3	840.1	631.7	208.36	4.032	
22,000.0	10,029.2	22,028.1	10,039.3	105.0	105.2	-90.67	-11,839.3	640.3	840.1	630.0	210.06	3.999	
22,100.0	10,028.8	22,128.1	10,038.8	105.8	106.0	-90.67	-11,939.3	639.4	840.1	628.3	211.77	3.967	
22,200.0	10,028.3	22,228.1	10,038.4	106.7	106.9	-90.67	-12,039.3	638.5	840.1	626.6	213.48	3.935	
22,300.0	10,027.8	22,328.1	10,037.9	107.5	107.7	-90.67	-12,139.2	637.6	840.1	624.9	215.19	3.904	
22,400.0	10,027.4	22,428.1	10,037.5	108.4	108.6	-90.67	-12,239.2	636.7	840.1	623.2	216.90	3.873	
22,500.0	10,026.9	22,528.1	10,037.0	109.2	109.4	-90.67	-12,339.2	635.7	840.1	621.5	218.61	3.843	
22,600.0	10,026.5	22,628.1	10,036.5	110.1	110.3	-90.67	-12,439.2	634.8	840.1	619.7	220.32	3.813	
22,700.0	10,026.0	22,728.1	10,036.1	110.9	111.1	-90.67	-12,539.2	633.9	840.1	618.0	222.03	3.784	
22,800.0	10,025.5	22,828.1	10,035.6	111.8	112.0	-90.67	-12,639.2	633.0	840.1	616.3	223.74	3.755	
22,900.0	10,025.1	22,928.1	10,035.1	112.6	112.8	-90.67	-12,739.2	632.1	840.1	614.6	225.45	3.726	
23,000.0	10,024.6	23,028.1	10,034.7	113.5	113.7	-90.67	-12,839.2	631.1	840.1	612.9	227.16	3.698	
23,100.0	10,024.1	23,128.1	10,034.2	114.4	114.6	-90.67	-12,939.2	630.2	840.1	611.2	228.87	3.671	
23,200.0	10,023.7	23,228.1	10,033.7	115.2	115.4	-90.67	-13,039.2	629.3	840.1	609.5	230.58	3.643	
23,300.0	10,023.2	23,328.1	10,033.3	116.1	116.3	-90.67	-13,139.2	628.4	840.1	607.8	232.29	3.616	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #710H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9550-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre +N/-S (usft)	+E/-W (usft)	Distance Between Centres (usft)	Rule Assigned: Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning
23,400.0	10,022.7	23,428.1	10,032.8	116.9	117.1	-90.67	-13,239.2	627.5	840.1	606.1	234.00	3.590	
23,500.0	10,022.3	23,528.1	10,032.4	117.8	118.0	-90.67	-13,339.2	626.5	840.1	604.4	235.71	3.564	
23,600.0	10,021.8	23,628.1	10,031.9	118.6	118.8	-90.67	-13,439.2	625.6	840.1	602.7	237.42	3.538	
23,700.0	10,021.3	23,728.1	10,031.4	119.5	119.7	-90.67	-13,539.2	624.7	840.1	600.9	239.13	3.513	
23,800.0	10,020.9	23,828.1	10,031.0	120.3	120.5	-90.67	-13,639.2	623.8	840.1	599.2	240.84	3.488	
23,900.0	10,020.4	23,928.1	10,030.5	121.2	121.4	-90.67	-13,739.2	622.9	840.1	597.5	242.55	3.463	
24,000.0	10,019.9	24,028.1	10,030.0	122.1	122.2	-90.67	-13,839.2	621.9	840.1	595.8	244.26	3.439	
24,100.0	10,019.5	24,128.1	10,029.6	122.9	123.1	-90.67	-13,939.2	621.0	840.1	594.1	245.97	3.415	
24,200.0	10,019.0	24,228.1	10,029.1	123.8	124.0	-90.67	-14,039.1	620.1	840.1	592.4	247.68	3.392	
24,300.0	10,018.5	24,328.1	10,028.7	124.6	124.8	-90.67	-14,139.1	619.2	840.1	590.7	249.39	3.368	
24,400.0	10,018.1	24,428.1	10,028.2	125.5	125.7	-90.67	-14,239.1	618.2	840.1	589.0	251.10	3.346	
24,500.0	10,017.6	24,528.1	10,027.7	126.3	126.5	-90.67	-14,339.1	617.3	840.1	587.3	252.81	3.323	
24,600.0	10,017.2	24,628.1	10,027.3	127.2	127.4	-90.67	-14,439.1	616.4	840.1	585.5	254.53	3.301	
24,700.0	10,016.7	24,728.1	10,026.8	128.0	128.2	-90.67	-14,539.1	615.5	840.1	583.8	256.24	3.279	
24,800.0	10,016.2	24,828.1	10,026.3	128.9	129.1	-90.67	-14,639.1	614.6	840.1	582.1	257.95	3.257	
24,900.0	10,015.8	24,928.1	10,025.9	129.8	129.9	-90.67	-14,739.1	613.6	840.1	580.4	259.66	3.235	
25,000.0	10,015.3	25,028.1	10,025.4	130.6	130.8	-90.67	-14,839.1	612.7	840.1	578.7	261.37	3.214	
25,100.0	10,014.8	25,128.1	10,025.0	131.5	131.7	-90.67	-14,939.1	611.8	840.1	577.0	263.08	3.193	
25,200.0	10,014.4	25,228.1	10,024.5	132.3	132.5	-90.67	-15,039.1	610.9	840.1	575.3	264.79	3.173	
25,300.0	10,013.9	25,328.1	10,024.0	133.2	133.4	-90.67	-15,139.1	610.0	840.1	573.6	266.50	3.152	
25,400.0	10,013.4	25,428.1	10,023.6	134.0	134.2	-90.67	-15,239.1	609.0	840.1	571.9	268.22	3.132	
25,492.9	10,013.0	25,521.0	10,023.1	134.8	135.0	-90.67	-15,332.0	608.2	840.1	570.3	269.81	3.114	
25,493.4	10,013.0	25,521.5	10,023.1	134.8	135.0	-90.67	-15,332.5	608.2	840.1	570.3	269.81	3.114 SF	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9714-MWD+IFR1+FDIR													Offset Well Error:	3.0 usft
Reference	Vertical	Offset	Vertical	Semi Major Axis	Offset	Highside	Offset Wellbore Centre		Rule Assigned:		Distance	Minimum	Separation	Warning
Measured Depth (usft)	Depth (usft)	Measured Depth (usft)	Depth (usft)	Reference (usft)	Offset (usft)	Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Separation (usft)	Factor		
0.0	0.0	0.2	0.2	3.0	3.0	89.62	0.2	30.0	30.0					
100.0	100.0	100.2	100.2	3.0	3.0	89.62	0.2	30.0	30.0	24.0	6.00	5.000		
200.0	200.0	200.2	200.2	3.0	3.0	89.62	0.2	30.0	30.0	24.0	6.00	4.998		
300.0	300.0	300.2	300.2	3.0	3.0	89.62	0.2	30.0	30.0	24.0	6.01	4.992		
400.0	400.0	400.2	400.2	3.0	3.0	89.62	0.2	30.0	30.0	24.0	6.02	4.985		
500.0	500.0	500.2	500.2	3.1	3.1	89.62	0.2	30.0	30.0	24.0	6.03	4.974		
600.0	600.0	600.2	600.2	3.1	3.1	89.62	0.2	30.0	30.0	24.0	6.05	4.961		
700.0	700.0	700.2	700.2	3.1	3.1	89.62	0.2	30.0	30.0	23.9	6.07	4.946		
800.0	800.0	800.2	800.2	3.2	3.2	89.62	0.2	30.0	30.0	23.9	6.09	4.928		
900.0	900.0	900.2	900.2	3.2	3.2	89.62	0.2	30.0	30.0	23.9	6.11	4.908		
1,000.0	1,000.0	1,000.2	1,000.2	3.2	3.2	89.62	0.2	30.0	30.0	23.9	6.14	4.885		
1,100.0	1,100.0	1,100.2	1,100.2	3.3	3.3	89.62	0.2	30.0	30.0	23.8	6.17	4.860		
1,200.0	1,200.0	1,200.2	1,200.2	3.4	3.4	89.62	0.2	30.0	30.0	23.8	6.21	4.834		
1,300.0	1,300.0	1,300.2	1,300.2	3.4	3.4	89.62	0.2	30.0	30.0	23.8	6.24	4.805		
1,400.0	1,400.0	1,400.2	1,400.2	3.5	3.5	89.62	0.2	30.0	30.0	23.7	6.28	4.774		
1,500.0	1,500.0	1,500.2	1,500.2	3.5	3.5	89.62	0.2	30.0	30.0	23.7	6.33	4.742		
1,600.0	1,600.0	1,600.2	1,600.2	3.6	3.6	89.62	0.2	30.0	30.0	23.6	6.37	4.708		
1,700.0	1,700.0	1,700.2	1,700.2	3.7	3.7	89.62	0.2	30.0	30.0	23.6	6.42	4.672		
1,800.0	1,800.0	1,800.2	1,800.2	3.8	3.8	89.62	0.2	30.0	30.0	23.5	6.47	4.635		
1,900.0	1,900.0	1,900.2	1,900.2	3.9	3.9	89.62	0.2	30.0	30.0	23.5	6.53	4.597		
2,000.0	2,000.0	2,000.2	2,000.2	3.9	3.9	89.62	0.2	30.0	30.0	23.4	6.58	4.558		
2,100.0	2,100.0	2,100.2	2,100.2	4.0	4.0	89.62	0.2	30.0	30.0	23.4	6.64	4.518		
2,200.0	2,200.0	2,200.2	2,200.2	4.1	4.1	89.62	0.2	30.0	30.0	23.3	6.70	4.477		
2,300.0	2,300.0	2,300.2	2,300.2	4.2	4.2	89.62	0.2	30.0	30.0	23.2	6.76	4.435		
2,400.0	2,400.0	2,400.2	2,400.2	4.3	4.3	89.62	0.2	30.0	30.0	23.2	6.83	4.392		
2,416.6	2,416.6	2,416.8	2,416.8	4.3	4.3	89.62	0.2	30.0	30.0	23.2	6.84	4.385 CC		
2,500.0	2,500.0	2,500.2	2,500.2	4.4	4.4	89.62	0.2	30.0	30.0	23.1	6.90	4.349 ES		
2,600.0	2,600.0	2,600.0	2,600.0	4.5	4.5	133.70	1.9	30.4	31.7	24.7	6.97	4.546		
2,700.0	2,699.8	2,699.4	2,699.3	4.6	4.6	131.70	6.9	31.7	36.7	29.7	7.05	5.214		
2,750.0	2,749.7	2,749.1	2,748.7	4.6	4.6	130.52	10.7	32.7	40.5	33.5	7.09	5.721		
2,800.0	2,799.5	2,798.9	2,798.4	4.6	4.7	129.48	14.9	33.8	44.8	37.7	7.13	6.282		
2,900.0	2,899.1	2,898.5	2,897.6	4.7	4.8	127.89	23.3	36.0	53.3	46.1	7.22	7.385		
3,000.0	2,998.7	2,998.1	2,996.9	4.8	4.9	126.75	31.7	38.2	61.9	54.6	7.32	8.461		
3,100.0	3,098.4	3,097.7	3,096.1	4.9	5.0	125.88	40.1	40.4	70.5	63.1	7.41	9.509		
3,200.0	3,198.0	3,197.4	3,195.4	5.0	5.1	125.20	48.5	42.6	79.1	71.6	7.51	10.529		
3,300.0	3,297.6	3,297.0	3,294.6	5.1	5.2	124.66	56.9	44.8	87.7	80.1	7.61	11.519		
3,400.0	3,397.2	3,396.6	3,393.8	5.2	5.3	124.21	65.3	46.9	96.3	88.6	7.72	12.479		
3,500.0	3,496.8	3,496.3	3,493.1	5.2	5.4	123.83	73.7	49.1	104.9	97.1	7.82	13.409		
3,600.0	3,596.4	3,595.9	3,592.3	5.3	5.5	123.52	82.1	51.3	113.5	105.6	7.93	14.310		
3,700.0	3,696.1	3,695.5	3,691.6	5.4	5.6	123.24	90.5	53.5	122.2	114.1	8.05	15.180		
3,800.0	3,795.7	3,795.1	3,790.8	5.5	5.7	123.01	98.9	55.7	130.8	122.6	8.16	16.020		
3,900.0	3,895.3	3,894.8	3,890.1	5.6	5.8	122.80	107.3	57.9	139.4	131.1	8.28	16.832		
4,000.0	3,994.9	3,994.4	3,989.3	5.7	5.9	122.61	115.7	60.1	148.0	139.6	8.40	17.614		
4,100.0	4,094.5	4,094.0	4,088.6	5.8	6.0	122.45	124.1	62.3	156.7	148.1	8.53	18.368		
4,200.0	4,194.2	4,193.6	4,187.8	5.9	6.1	122.31	132.5	64.4	165.3	156.6	8.66	19.093		
4,300.0	4,293.8	4,293.3	4,287.1	6.0	6.2	122.17	140.9	66.6	173.9	165.1	8.79	19.792		
4,400.0	4,393.4	4,392.9	4,386.3	6.1	6.4	122.05	149.3	68.8	182.6	173.6	8.92	20.464		
4,500.0	4,493.0	4,492.5	4,485.6	6.2	6.5	121.95	157.7	71.0	191.2	182.1	9.06	21.109		
4,600.0	4,592.6	4,592.1	4,584.8	6.4	6.6	121.85	166.1	73.2	199.8	190.6	9.20	21.729		
4,700.0	4,692.3	4,691.8	4,684.1	6.5	6.7	121.76	174.5	75.4	208.5	199.1	9.34	22.325		
4,800.0	4,791.9	4,791.4	4,783.3	6.6	6.8	121.67	182.9	77.6	217.1	207.6	9.48	22.897		

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9714-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Measured Reference Depth (usft)	Vertical Depth (usft)	Measured Offset Depth (usft)	Vertical Depth (usft)	Reference Offset (usft)	Semi Major Axis Offset (usft)	Highside Toolface (°)	Offset Wellbore Centre		Rule Assigned:		Minimum Separation (usft)	Separation Factor	Warning
							+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)			
4,900.0	4,891.5	4,891.0	4,882.5	6.7	6.9	121.60	191.3	79.8	225.7	216.1	9.63	23.446	
5,000.0	4,991.1	4,990.6	4,981.8	6.8	7.0	121.52	199.7	81.9	234.4	224.6	9.78	23.972	
5,100.0	5,090.7	5,090.3	5,081.0	6.9	7.1	121.46	208.1	84.1	243.0	233.1	9.93	24.476	
5,200.0	5,190.4	5,189.9	5,180.3	7.0	7.3	121.40	216.5	86.3	251.7	241.6	10.08	24.960	
5,300.0	5,290.0	5,289.5	5,279.5	7.1	7.4	121.34	224.9	88.5	260.3	250.1	10.24	25.423	
5,400.0	5,389.6	5,389.1	5,378.8	7.2	7.5	121.28	233.3	90.7	268.9	258.5	10.40	25.867	
5,500.0	5,489.2	5,488.8	5,478.0	7.3	7.6	121.23	241.8	92.9	277.6	267.0	10.56	26.292	
5,600.0	5,588.8	5,588.4	5,577.3	7.5	7.7	121.19	250.2	95.1	286.2	275.5	10.72	26.699	
5,700.0	5,688.5	5,688.0	5,676.5	7.6	7.8	121.14	258.6	97.3	294.8	284.0	10.88	27.088	
5,800.0	5,788.1	5,787.6	5,775.8	7.7	8.0	121.10	267.0	99.4	303.5	292.4	11.05	27.461	
5,900.0	5,887.7	5,887.3	5,875.0	7.8	8.1	121.06	275.4	101.6	312.1	300.9	11.22	27.818	
6,000.0	5,987.3	5,986.9	5,974.3	7.9	8.2	121.02	283.8	103.8	320.8	309.4	11.39	28.159	
6,100.0	6,086.9	6,086.5	6,073.5	8.0	8.3	120.98	292.2	106.0	329.4	317.8	11.56	28.485	
6,200.0	6,186.6	6,186.4	6,175.0	8.1	8.4	121.03	300.2	108.1	337.8	326.1	11.73	28.788	
6,300.0	6,286.2	6,286.0	6,277.4	8.3	8.6	121.34	306.6	109.8	345.4	333.5	11.90	29.030	
6,400.0	6,385.8	6,385.6	6,379.9	8.4	8.7	121.90	311.3	111.0	352.1	340.1	12.05	29.220	
6,500.0	6,485.4	6,485.2	6,482.4	8.5	8.8	122.69	314.1	111.7	358.1	345.9	12.20	29.358	
6,600.0	6,585.0	6,584.7	6,584.9	8.6	8.9	123.72	315.2	112.0	363.4	351.0	12.34	29.448	
6,700.0	6,684.7	6,684.6	6,684.9	8.7	9.1	124.85	315.2	112.0	368.3	355.8	12.48	29.515	
6,800.0	6,784.3	6,784.2	6,784.5	8.8	9.2	125.95	315.2	112.0	373.3	360.7	12.62	29.579	
6,900.0	6,883.9	6,883.8	6,884.1	9.0	9.3	127.01	315.2	112.0	378.5	365.8	12.77	29.641	
7,000.0	6,983.5	6,983.4	6,983.7	9.1	9.4	128.05	315.2	112.0	383.9	370.9	12.92	29.699	
7,100.0	7,083.1	7,083.0	7,083.3	9.2	9.6	129.06	315.2	112.0	389.3	376.2	13.08	29.754	
7,200.0	7,182.7	7,182.6	7,182.9	9.3	9.7	130.04	315.2	112.0	394.9	381.6	13.25	29.806	
7,300.0	7,282.3	7,282.2	7,282.6	9.4	9.8	130.99	315.2	112.0	400.5	387.1	13.42	29.856	
7,396.8	7,378.8	7,378.7	7,379.0	9.6	9.9	131.89	315.2	112.0	406.1	392.6	13.58	29.901	
7,400.0	7,382.0	7,381.9	7,382.2	9.6	9.9	131.92	315.2	112.0	406.3	392.7	13.59	29.903	
7,500.0	7,481.7	7,481.6	7,481.9	9.7	10.0	132.76	315.2	112.0	411.6	397.8	13.76	29.910	
7,600.0	7,581.5	7,581.4	7,581.7	9.8	10.2	133.40	315.2	112.0	415.7	401.8	13.92	29.955	
7,700.0	7,681.4	7,681.3	7,681.6	9.9	10.3	133.85	315.2	112.0	418.7	404.6	14.08	29.973	
7,800.0	7,781.4	7,781.3	7,781.6	10.0	10.4	134.12	315.2	112.0	420.5	406.2	14.23	29.944	
7,896.8	7,878.2	7,878.1	7,878.4	10.2	10.5	89.29	315.2	112.0	421.0	406.7	14.36	29.928	
7,900.0	7,881.4	7,881.3	7,881.6	10.2	10.5	89.29	315.2	112.0	421.0	406.7	14.36	29.921	
8,000.0	7,981.4	7,981.3	7,981.6	10.3	10.7	89.29	315.2	112.0	421.0	406.6	14.47	29.905	
8,100.0	8,081.4	8,081.3	8,081.6	10.4	10.8	89.29	315.2	112.0	421.0	406.5	14.57	28.891	
8,200.0	8,181.4	8,181.3	8,181.6	10.5	10.9	89.29	315.2	112.0	421.0	406.4	14.68	28.679	
8,300.0	8,281.4	8,281.3	8,281.6	10.6	11.0	89.29	315.2	112.0	421.0	406.2	14.79	28.470	
8,400.0	8,381.4	8,381.3	8,381.6	10.7	11.2	89.29	315.2	112.0	421.0	406.1	14.90	28.262	
8,500.0	8,481.4	8,481.3	8,481.6	10.8	11.3	89.29	315.2	112.0	421.0	406.0	15.01	28.056	
8,600.0	8,581.4	8,581.3	8,581.6	11.0	11.4	89.29	315.2	112.0	421.0	405.9	15.12	27.853	
8,700.0	8,681.4	8,681.3	8,681.6	11.1	11.6	89.29	315.2	112.0	421.0	405.8	15.23	27.652	
8,800.0	8,781.4	8,781.3	8,781.6	11.2	11.7	89.29	315.2	112.0	421.0	405.7	15.34	27.452	
8,900.0	8,881.4	8,881.3	8,881.6	11.3	11.8	89.29	315.2	112.0	421.0	405.6	15.45	27.255	
9,000.0	8,981.4	8,981.3	8,981.6	11.4	11.9	89.29	315.2	112.0	421.0	405.5	15.56	27.060	
9,100.0	9,081.4	9,081.3	9,081.6	11.6	12.1	89.29	315.2	112.0	421.0	405.4	15.67	26.866	
9,200.0	9,181.4	9,181.3	9,181.6	11.7	12.2	89.29	315.2	112.0	421.0	405.2	15.78	26.675	
9,300.0	9,281.4	9,281.3	9,281.6	11.8	12.3	89.29	315.2	112.0	421.0	405.1	15.90	26.486	
9,400.0	9,381.4	9,381.3	9,381.6	11.9	12.4	89.29	315.2	112.0	421.0	405.0	16.01	26.299	
9,500.0	9,481.4	9,481.3	9,481.6	12.0	12.6	89.29	315.2	112.0	421.0	404.9	16.12	26.113	
9,528.6	9,510.0	9,509.9	9,510.2	12.1	12.6	89.29	315.2	112.0	421.0	404.9	16.16	26.060	
9,550.0	9,531.4	9,531.3	9,531.6	12.1	12.6	-89.00	315.2	112.0	421.0	404.8	16.18	26.024	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9714-MWD+IFR1+FDIR													Offset Well Error:	3.0 usft
Reference	Vertical	Measured	Vertical	Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Minimum	Separation	Warning
Depth	Depth	Depth	Depth	Depth	Depth	Depth	Toolface	+N/-S	+E/-W	Between	Between	Separation	Factor	
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Centres	Ellipses	(usft)		
9,600.0	9,581.2	9,595.1	9,581.4	12.0	12.7	-89.55		315.2	112.0	421.0	404.8	16.22	25.961	
9,623.1	9,604.0	9,618.0	9,604.2	12.4	12.7	-90.00		315.2	112.0	421.0	404.7	16.22	25.950	
9,650.0	9,630.5	9,644.4	9,630.7	12.8	12.8	-90.67		315.2	112.0	421.0	404.8	16.23	25.947	
9,700.0	9,678.8	9,692.8	9,679.0	12.9	12.8	-92.30		315.2	112.0	421.3	405.1	16.22	25.969	
9,750.0	9,725.9	9,739.8	9,726.1	12.9	12.9	-94.34		315.2	112.0	422.4	406.1	16.24	26.012	
9,800.0	9,771.3	9,787.6	9,773.8	12.9	12.9	-96.75		314.7	112.0	424.5	408.2	16.29	26.059	
9,850.0	9,814.8	9,838.8	9,824.9	13.0	12.9	-99.29		310.3	112.2	427.7	411.3	16.39	26.089	
9,900.0	9,855.9	9,892.4	9,877.6	13.0	12.9	-101.80		300.8	112.4	431.9	415.3	16.57	26.063	
9,950.0	9,894.4	9,948.6	9,931.7	13.1	12.9	-104.26		285.7	112.9	436.9	420.0	16.84	25.946	
10,000.0	9,930.0	10,007.6	9,986.6	13.1	13.0	-106.65		264.1	113.6	442.5	425.3	17.23	25.689	
10,050.0	9,962.3	10,069.8	10,041.7	13.2	13.0	-108.95		235.4	114.4	448.7	430.9	17.77	25.251	
10,100.0	9,991.3	10,135.3	10,096.1	13.3	13.0	-111.14		198.9	115.6	455.1	436.7	18.49	24.611	
10,150.0	10,016.5	10,204.5	10,148.6	13.4	13.1	-113.17		153.9	116.9	461.6	442.2	19.41	23.782	
10,200.0	10,037.9	10,277.4	10,197.6	13.4	13.2	-115.01		100.0	118.6	467.8	447.3	20.50	22.814	
10,250.0	10,055.3	10,354.0	10,241.2	13.5	13.3	-116.62		37.3	120.5	473.3	451.6	21.72	21.788	
10,300.0	10,068.6	10,433.9	10,277.5	13.6	13.3	-117.93		-33.8	122.7	478.0	455.0	23.00	20.780	
10,350.0	10,077.6	10,516.6	10,304.2	13.6	13.4	-118.91		-112.1	125.1	481.6	457.3	24.24	19.865	
10,400.0	10,082.2	10,601.4	10,319.6	13.7	13.5	-119.50		-195.3	127.6	483.7	458.4	25.34	19.091	
10,431.3	10,083.0	10,655.1	10,322.9	13.7	13.5	-119.67		-248.9	129.2	484.3	458.4	25.91	18.690	
10,500.0	10,082.6	10,728.5	10,322.7	13.8	13.5	-119.68		-322.3	131.5	484.4	457.9	26.43	18.325	
10,600.0	10,082.2	10,828.5	10,322.2	13.9	13.5	-119.68		-422.2	134.5	484.3	457.2	27.16	17.831	
10,700.0	10,081.7	10,928.5	10,321.7	14.0	13.6	-119.68		-522.2	137.6	484.3	456.3	27.98	17.312	
10,800.0	10,081.2	11,028.5	10,321.3	14.1	13.6	-119.69		-622.1	140.7	484.3	455.4	28.87	16.778	
10,900.0	10,080.8	11,128.5	10,320.8	14.3	13.7	-119.69		-722.1	143.7	484.3	454.5	29.82	16.239	
11,000.0	10,080.3	11,228.5	10,320.4	14.6	13.8	-119.69		-822.0	146.8	484.3	453.4	30.84	15.701	
11,100.0	10,079.8	11,328.5	10,319.9	14.9	14.1	-119.69		-922.0	149.8	484.2	452.3	31.92	15.171	
11,200.0	10,079.4	11,428.5	10,319.4	15.3	14.5	-119.69		-1,021.9	152.9	484.2	451.2	33.05	14.652	
11,300.0	10,078.9	11,528.5	10,319.0	15.9	15.2	-119.69		-1,121.9	155.9	484.2	450.0	34.22	14.149	
11,400.0	10,078.4	11,628.5	10,318.5	16.4	15.8	-119.70		-1,221.8	159.0	484.2	448.8	35.44	13.664	
11,500.0	10,078.0	11,728.5	10,318.0	17.1	16.6	-119.70		-1,321.8	162.1	484.2	447.5	36.69	13.197	
11,600.0	10,077.5	11,828.5	10,317.6	17.8	17.3	-119.70		-1,421.7	165.1	484.2	446.2	37.97	12.750	
11,700.0	10,077.0	11,928.5	10,317.1	18.5	18.1	-119.70		-1,521.7	168.2	484.1	444.8	39.29	12.322	
11,800.0	10,076.6	12,028.5	10,316.7	19.2	18.8	-119.70		-1,621.6	171.2	484.1	443.5	40.63	11.915	
11,900.0	10,076.1	12,128.5	10,316.2	20.0	19.6	-119.70		-1,721.6	174.3	484.1	442.1	42.00	11.526	
12,000.0	10,075.7	12,228.5	10,315.7	20.7	20.4	-119.70		-1,821.5	177.3	484.1	440.7	43.39	11.157	
12,100.0	10,075.2	12,328.5	10,315.3	21.5	21.2	-119.71		-1,921.5	180.4	484.1	439.3	44.80	10.805	
12,200.0	10,074.7	12,428.5	10,314.8	22.3	22.0	-119.71		-2,021.5	183.4	484.0	437.8	46.23	10.471	
12,300.0	10,074.3	12,528.5	10,314.3	23.0	22.8	-119.71		-2,121.4	186.5	484.0	436.3	47.67	10.153	
12,400.0	10,073.8	12,628.5	10,313.9	23.8	23.6	-119.71		-2,221.4	189.6	484.0	434.9	49.13	9.851	
12,500.0	10,073.3	12,728.5	10,313.4	24.6	24.4	-119.71		-2,321.3	192.6	484.0	433.4	50.61	9.563	
12,600.0	10,072.9	12,828.5	10,313.0	25.4	25.2	-119.71		-2,421.3	195.7	484.0	431.9	52.10	9.290	
12,700.0	10,072.4	12,928.5	10,312.5	26.2	26.0	-119.72		-2,521.2	198.7	483.9	430.4	53.60	9.030	
12,800.0	10,071.9	13,028.5	10,312.0	27.1	26.8	-119.72		-2,621.2	201.8	483.9	428.8	55.11	8.782	
12,900.0	10,071.5	13,128.5	10,311.6	27.9	27.7	-119.72		-2,721.1	204.8	483.9	427.3	56.63	8.546	
13,000.0	10,071.0	13,228.5	10,311.1	28.7	28.5	-119.72		-2,821.1	207.9	483.9	425.7	58.15	8.321	
13,100.0	10,070.5	13,328.5	10,310.6	29.5	29.3	-119.72		-2,921.0	211.0	483.9	424.2	59.69	8.106	
13,200.0	10,070.1	13,428.5	10,310.2	30.3	30.1	-119.72		-3,021.0	214.0	483.9	422.6	61.24	7.901	
13,300.0	10,069.6	13,528.5	10,309.7	31.2	31.0	-119.73		-3,120.9	217.1	483.8	421.0	62.79	7.706	
13,400.0	10,069.1	13,628.5	10,309.3	32.0	31.8	-119.73		-3,220.9	220.1	483.8	419.5	64.35	7.519	
13,500.0	10,068.7	13,728.5	10,308.8	32.8	32.6	-119.73		-3,320.8	223.2	483.8	417.9	65.91	7.340	
13,600.0	10,068.2	13,828.5	10,308.3	33.6	33.5	-119.73		-3,420.8	226.2	483.8	416.3	67.48	7.169	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9714-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Reference	Vertical	Measured	Vertical	Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Warning	
Depth	Depth	Depth	Depth	Reference	Offset	Offset	Toolface	+N/-S	+E/-W	Distance	Minimum	Separation	
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Between	Separation	Factor	
										Centres	Ellipses		
										(usft)	(usft)		
13,700.0	10,067.7	13,928.5	10,307.9	34.5	34.3	-119.73	-3,520.7	229.3	483.8	414.7	69.06	7.005	
13,800.0	10,067.3	14,028.5	10,307.4	35.3	35.2	-119.73	-3,620.7	232.3	483.7	413.1	70.64	6.848	
13,900.0	10,066.8	14,128.5	10,306.9	36.1	36.0	-119.74	-3,720.6	235.4	483.7	411.5	72.23	6.697	
14,000.0	10,066.3	14,228.5	10,306.5	37.0	36.8	-119.74	-3,820.6	238.5	483.7	409.9	73.82	6.553	
14,100.0	10,065.9	14,328.5	10,306.0	37.8	37.7	-119.74	-3,920.5	241.5	483.7	408.3	75.41	6.414	
14,200.0	10,065.4	14,428.5	10,305.6	38.7	38.5	-119.74	-4,020.5	244.6	483.7	406.7	77.01	6.281	
14,300.0	10,064.9	14,528.5	10,305.1	39.5	39.4	-119.74	-4,120.4	247.6	483.6	405.0	78.61	6.152	
14,400.0	10,064.5	14,628.5	10,304.6	40.3	40.2	-119.74	-4,220.4	250.7	483.6	403.4	80.22	6.029	
14,500.0	10,064.0	14,728.5	10,304.2	41.2	41.1	-119.75	-4,320.4	253.7	483.6	401.8	81.82	5.910	
14,600.0	10,063.6	14,828.5	10,303.7	42.0	41.9	-119.75	-4,420.3	256.8	483.6	400.2	83.44	5.796	
14,700.0	10,063.1	14,928.5	10,303.2	42.9	42.7	-119.75	-4,520.3	259.9	483.6	398.5	85.05	5.686	
14,800.0	10,062.6	15,028.5	10,302.8	43.7	43.6	-119.75	-4,620.2	262.9	483.6	396.9	86.67	5.580	
14,900.0	10,062.2	15,128.5	10,302.3	44.6	44.4	-119.75	-4,720.2	266.0	483.5	395.3	88.29	5.477	
15,000.0	10,061.7	15,228.5	10,301.9	45.4	45.3	-119.75	-4,820.1	269.0	483.5	393.6	89.91	5.378	
15,105.9	10,061.2	15,334.4	10,301.4	46.3	46.2	-119.76	-4,926.0	272.3	483.5	391.9	91.63	5.277	
15,106.5	10,061.2	15,335.0	10,301.4	46.3	46.2	-119.76	-4,926.6	272.3	483.5	391.9	91.64	5.276	
15,200.0	10,060.8	15,442.4	10,300.9	47.1	47.1	-119.74	-5,033.9	274.0	483.7	390.3	93.33	5.182	
15,215.6	10,060.7	15,460.7	10,300.8	47.2	47.2	-119.74	-5,052.2	273.9	483.7	390.1	93.61	5.167	
15,242.9	10,060.6	15,487.4	10,300.7	47.5	47.5	-119.74	-5,078.9	273.7	483.7	389.6	94.04	5.143	
15,300.0	10,060.3	15,544.5	10,300.4	47.9	48.0	-119.74	-5,136.0	273.3	483.7	388.7	94.97	5.093	
15,400.0	10,059.8	15,644.5	10,299.9	48.8	48.8	-119.73	-5,236.0	272.5	483.7	387.1	96.59	5.007	
15,500.0	10,059.4	15,744.5	10,299.5	49.6	49.6	-119.73	-5,336.0	271.8	483.7	385.4	98.21	4.925	
15,600.0	10,058.9	15,844.5	10,299.0	50.5	50.5	-119.73	-5,436.0	271.0	483.7	383.8	99.84	4.844	
15,700.0	10,058.4	15,944.5	10,298.5	51.3	51.3	-119.73	-5,536.0	270.3	483.7	382.2	101.47	4.767	
15,800.0	10,058.0	16,044.5	10,298.1	52.2	52.2	-119.73	-5,636.0	269.5	483.7	380.6	103.09	4.691	
15,900.0	10,057.5	16,144.5	10,297.6	53.0	53.0	-119.73	-5,736.0	268.8	483.7	378.9	104.72	4.618	
16,000.0	10,057.1	16,244.5	10,297.1	53.8	53.9	-119.73	-5,836.0	268.0	483.7	377.3	106.36	4.547	
16,100.0	10,056.6	16,344.5	10,296.7	54.7	54.7	-119.73	-5,936.0	267.3	483.7	375.7	107.99	4.479	
16,200.0	10,056.1	16,444.5	10,296.2	55.5	55.6	-119.73	-6,036.0	266.5	483.7	374.0	109.63	4.412	
16,300.0	10,055.7	16,544.5	10,295.7	56.4	56.4	-119.73	-6,136.0	265.8	483.7	372.4	111.26	4.347	
16,400.0	10,055.2	16,644.5	10,295.3	57.2	57.3	-119.73	-6,236.0	265.0	483.7	370.8	112.90	4.284	
16,500.0	10,054.7	16,744.5	10,294.8	58.1	58.1	-119.73	-6,336.0	264.3	483.7	369.1	114.54	4.223	
16,600.0	10,054.3	16,844.5	10,294.3	58.9	59.0	-119.73	-6,436.0	263.5	483.7	367.5	116.18	4.163	
16,700.0	10,053.8	16,944.5	10,293.9	59.8	59.8	-119.73	-6,536.0	262.8	483.7	365.8	117.82	4.105	
16,800.0	10,053.4	17,044.5	10,293.4	60.6	60.7	-119.73	-6,636.0	262.0	483.7	364.2	119.46	4.049	
16,900.0	10,052.9	17,144.5	10,293.0	61.5	61.5	-119.73	-6,736.0	261.3	483.7	362.5	121.10	3.994	
17,000.0	10,052.4	17,244.5	10,292.5	62.3	62.4	-119.73	-6,836.0	260.5	483.7	360.9	122.75	3.940	
17,100.0	10,052.0	17,344.5	10,292.0	63.2	63.2	-119.73	-6,936.0	259.8	483.7	359.3	124.39	3.888	
17,200.0	10,051.5	17,444.5	10,291.6	64.0	64.1	-119.73	-7,036.0	259.0	483.7	357.6	126.04	3.837	
17,300.0	10,051.0	17,544.5	10,291.1	64.9	64.9	-119.73	-7,136.0	258.3	483.7	356.0	127.69	3.788	
17,400.0	10,050.6	17,644.5	10,290.6	65.7	65.8	-119.73	-7,235.9	257.5	483.7	354.3	129.33	3.740	
17,500.0	10,050.1	17,744.5	10,290.2	66.6	66.6	-119.73	-7,335.9	256.8	483.6	352.7	130.98	3.692	
17,600.0	10,049.6	17,844.5	10,289.7	67.4	67.5	-119.73	-7,435.9	256.0	483.6	351.0	132.63	3.647	
17,700.0	10,049.2	17,944.5	10,289.2	68.3	68.3	-119.73	-7,535.9	255.3	483.6	349.4	134.28	3.602	
17,800.0	10,048.7	18,044.5	10,288.8	69.1	69.2	-119.73	-7,635.9	254.5	483.6	347.7	135.93	3.558	
17,900.0	10,048.3	18,144.5	10,288.3	70.0	70.0	-119.73	-7,735.9	253.8	483.6	346.1	137.59	3.515	
18,000.0	10,047.8	18,244.5	10,287.8	70.8	70.9	-119.73	-7,835.9	253.0	483.6	344.4	139.24	3.474	
18,100.0	10,047.3	18,344.5	10,287.4	71.7	71.7	-119.73	-7,935.9	252.3	483.6	342.8	140.89	3.433	
18,200.0	10,046.9	18,444.5	10,286.9	72.5	72.6	-119.73	-8,035.9	251.5	483.6	341.1	142.54	3.393	
18,300.0	10,046.4	18,544.5	10,286.4	73.4	73.4	-119.73	-8,135.9	250.8	483.6	339.4	144.20	3.354	
18,400.0	10,045.9	18,644.5	10,286.0	74.2	74.3	-119.73	-8,235.9	250.0	483.6	337.8	145.85	3.316	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1												Offset Site Error:	0.0 usft
Survey Program: 0-Standard Keeper 104, 9714-MWD+IFR1+FDIR												Offset Well Error:	3.0 usft
Reference	Vertical	Measured	Vertical	Reference	Offset	Semi Major Axis	Highside	Offset Wellbore Centre		Rule Assigned:		Warning	
Depth	Depth	Depth	Depth	Depth	Depth	Depth	Toolface	+N/-S	+E/-W	Between	Between	Minimum	Separation
(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(usft)	(°)	(usft)	(usft)	Centres	Ellipses	Separation	Factor
										(usft)	(usft)	(usft)	
18,500.0	10,045.5	18,744.5	10,285.5	75.1	75.1	-119.73	-8,335.9	249.3	483.6	336.1	147.51	3.279	
18,600.0	10,045.0	18,844.5	10,285.1	75.9	76.0	-119.73	-8,435.9	248.5	483.6	334.5	149.16	3.242	
18,700.0	10,044.6	18,944.5	10,284.6	76.8	76.8	-119.73	-8,535.9	247.8	483.6	332.8	150.82	3.207	
18,800.0	10,044.1	19,044.5	10,284.1	77.6	77.7	-119.73	-8,635.9	247.0	483.6	331.2	152.48	3.172	
18,900.0	10,043.6	19,144.5	10,283.7	78.5	78.6	-119.73	-8,735.9	246.3	483.6	329.5	154.13	3.138	
19,000.0	10,043.2	19,244.5	10,283.2	79.3	79.4	-119.73	-8,835.9	245.5	483.6	327.9	155.79	3.104	
19,100.0	10,042.7	19,344.5	10,282.7	80.2	80.3	-119.73	-8,935.9	244.8	483.6	326.2	157.45	3.072	
19,200.0	10,042.2	19,444.5	10,282.3	81.0	81.1	-119.73	-9,035.9	244.0	483.6	324.5	159.11	3.040	
19,300.0	10,041.8	19,544.5	10,281.8	81.9	82.0	-119.73	-9,135.9	243.3	483.6	322.9	160.77	3.008	
19,400.0	10,041.3	19,644.5	10,281.3	82.8	82.8	-119.73	-9,235.9	242.5	483.6	321.2	162.43	2.978	
19,500.0	10,040.9	19,744.5	10,280.9	83.6	83.7	-119.73	-9,335.9	241.8	483.6	319.6	164.09	2.947	
19,600.0	10,040.4	19,844.5	10,280.4	84.5	84.5	-119.73	-9,435.9	241.0	483.6	317.9	165.75	2.918	
19,700.0	10,039.9	19,944.5	10,279.9	85.3	85.4	-119.73	-9,535.9	240.3	483.6	316.2	167.41	2.889	
19,800.0	10,039.5	20,044.5	10,279.5	86.2	86.2	-119.73	-9,635.9	239.5	483.6	314.6	169.07	2.861	
19,900.0	10,039.0	20,144.5	10,279.0	87.0	87.1	-119.73	-9,735.9	238.8	483.6	312.9	170.73	2.833	
20,000.0	10,038.5	20,244.5	10,278.6	87.9	87.9	-119.73	-9,835.8	238.0	483.6	311.2	172.40	2.805	
20,100.0	10,038.1	20,344.5	10,278.1	88.7	88.8	-119.73	-9,935.8	237.3	483.6	309.6	174.06	2.779	
20,200.0	10,037.6	20,444.5	10,277.6	89.6	89.6	-119.73	-10,035.8	236.5	483.6	307.9	175.72	2.752	
20,300.0	10,037.1	20,544.5	10,277.2	90.4	90.5	-119.73	-10,135.8	235.8	483.6	306.3	177.38	2.727	
20,400.0	10,036.7	20,644.5	10,276.7	91.3	91.4	-119.73	-10,235.8	235.0	483.6	304.6	179.05	2.701	
20,439.7	10,036.5	20,684.2	10,276.5	91.6	91.7	-119.73	-10,275.5	234.7	483.6	303.9	179.71	2.691	
20,439.7	10,036.5	20,684.3	10,276.5	91.6	91.7	-119.73	-10,275.6	234.7	483.6	303.9	179.71	2.691	
20,444.6	10,036.5	20,689.7	10,276.5	91.7	91.7	-119.73	-10,281.0	234.7	483.6	303.8	179.79	2.690	
20,500.0	10,036.2	20,745.2	10,276.2	92.1	92.2	-119.73	-10,336.5	234.2	483.6	302.9	180.71	2.676	
20,600.0	10,035.8	20,845.2	10,275.8	93.0	93.1	-119.73	-10,436.5	233.2	483.6	301.3	182.38	2.652	
20,700.0	10,035.3	20,945.2	10,275.3	93.8	93.9	-119.73	-10,536.5	232.3	483.6	299.6	184.04	2.628	
20,800.0	10,034.8	21,045.2	10,274.8	94.7	94.8	-119.73	-10,636.5	231.4	483.6	297.9	185.71	2.604	
20,900.0	10,034.4	21,145.2	10,274.4	95.6	95.6	-119.73	-10,736.5	230.5	483.6	296.3	187.37	2.581	
21,000.0	10,033.9	21,245.2	10,273.9	96.4	96.5	-119.73	-10,836.5	229.6	483.6	294.6	189.04	2.559	
21,100.0	10,033.4	21,345.2	10,273.4	97.3	97.3	-119.73	-10,936.5	228.6	483.7	293.0	190.70	2.536	
21,200.0	10,033.0	21,445.2	10,273.0	98.1	98.2	-119.73	-11,036.5	227.7	483.7	291.3	192.37	2.514	
21,300.0	10,032.5	21,545.2	10,272.5	99.0	99.1	-119.73	-11,136.5	226.8	483.7	289.6	194.03	2.493	
21,400.0	10,032.0	21,645.2	10,272.1	99.8	99.9	-119.73	-11,236.5	225.9	483.7	288.0	195.70	2.471	
21,500.0	10,031.6	21,745.2	10,271.6	100.7	100.8	-119.73	-11,336.5	225.0	483.7	286.3	197.36	2.451	
21,600.0	10,031.1	21,845.2	10,271.1	101.5	101.6	-119.73	-11,436.5	224.0	483.7	284.6	199.03	2.430	
21,700.0	10,030.6	21,945.2	10,270.7	102.4	102.5	-119.73	-11,536.5	223.1	483.7	283.0	200.70	2.410	
21,800.0	10,030.2	22,045.2	10,270.2	103.2	103.3	-119.73	-11,636.5	222.2	483.7	281.3	202.36	2.390	
21,900.0	10,029.7	22,145.2	10,269.7	104.1	104.2	-119.73	-11,736.5	221.3	483.7	279.6	204.03	2.371	
22,000.0	10,029.2	22,245.2	10,269.3	105.0	105.0	-119.73	-11,836.5	220.4	483.7	278.0	205.70	2.351	
22,100.0	10,028.8	22,345.2	10,268.8	105.8	105.9	-119.73	-11,936.5	219.4	483.7	276.3	207.36	2.332	
22,200.0	10,028.3	22,445.2	10,268.3	106.7	106.7	-119.73	-12,036.4	218.5	483.7	274.6	209.03	2.314	
22,300.0	10,027.8	22,545.2	10,267.9	107.5	107.6	-119.73	-12,136.4	217.6	483.7	273.0	210.70	2.296	
22,400.0	10,027.4	22,645.2	10,267.4	108.4	108.5	-119.73	-12,236.4	216.7	483.7	271.3	212.37	2.278	
22,500.0	10,026.9	22,745.2	10,266.9	109.2	109.3	-119.73	-12,336.4	215.8	483.7	269.6	214.03	2.260	
22,600.0	10,026.5	22,845.2	10,266.5	110.1	110.2	-119.73	-12,436.4	214.8	483.7	268.0	215.70	2.242	
22,700.0	10,026.0	22,945.2	10,266.0	110.9	111.0	-119.73	-12,536.4	213.9	483.7	266.3	217.37	2.225	
22,800.0	10,025.5	23,045.2	10,265.6	111.8	111.9	-119.73	-12,636.4	213.0	483.7	264.6	219.04	2.208	
22,900.0	10,025.1	23,145.2	10,265.1	112.6	112.7	-119.73	-12,736.4	212.1	483.7	263.0	220.71	2.191	
23,000.0	10,024.6	23,245.2	10,264.6	113.5	113.6	-119.73	-12,836.4	211.2	483.7	261.3	222.38	2.175	
23,100.0	10,024.1	23,345.2	10,264.2	114.4	114.4	-119.73	-12,936.4	210.2	483.7	259.6	224.05	2.159	
23,200.0	10,023.7	23,445.2	10,263.7	115.2	115.3	-119.73	-13,036.4	209.3	483.7	258.0	225.71	2.143	

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

ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Offset Design: ROCK JELLY FEDERAL PROJECT (ATLAS 2629) - ROCK JELLY FED COM #711H - OWB - PWP1													Offset Site Error:	0.0 usft
Survey Program:		0-Standard Keeper 104, 9714-MWD+IFR1+FDIR						Rule Assigned:				Offset Well Error:	3.0 usft	
Reference	Offset	Semi Major Axis		Offset		Offset Wellbore Centre		Distance		Offset Well Error:		Warning		
Measured Depth (usft)	Vertical Depth (usft)	Measured Depth (usft)	Vertical Depth (usft)	Reference (usft)	Offset (usft)	Highside Toolface (°)	+N/-S (usft)	+E/-W (usft)	Between Centres (usft)	Between Ellipses (usft)	Minimum Separation (usft)	Separation Factor	Warning	
23,300.0	10,023.2	23,545.2	10,263.2	116.1	116.2	-119.73	-13,136.4	208.4	483.7	256.3	227.38	2.127		
23,400.0	10,022.7	23,645.2	10,262.8	116.9	117.0	-119.73	-13,236.4	207.5	483.7	254.6	229.05	2.112		
23,500.0	10,022.3	23,745.2	10,262.3	117.8	117.9	-119.73	-13,336.4	206.6	483.7	253.0	230.72	2.096		
23,600.0	10,021.8	23,845.2	10,261.8	118.6	118.7	-119.73	-13,436.4	205.6	483.7	251.3	232.39	2.081		
23,700.0	10,021.3	23,945.2	10,261.4	119.5	119.6	-119.73	-13,536.4	204.7	483.7	249.6	234.06	2.067		
23,800.0	10,020.9	24,045.2	10,260.9	120.3	120.4	-119.73	-13,636.4	203.8	483.7	248.0	235.73	2.052		
23,900.0	10,020.4	24,145.2	10,260.5	121.2	121.3	-119.73	-13,736.4	202.9	483.7	246.3	237.40	2.037		
24,000.0	10,019.9	24,245.2	10,260.0	122.1	122.1	-119.73	-13,836.4	202.0	483.7	244.6	239.07	2.023		
24,100.0	10,019.5	24,345.2	10,259.5	122.9	123.0	-119.73	-13,936.3	201.0	483.7	243.0	240.74	2.009		
24,200.0	10,019.0	24,445.2	10,259.1	123.8	123.9	-119.73	-14,036.3	200.1	483.7	241.3	242.41	1.995 Advise and Monitor		
24,300.0	10,018.5	24,545.2	10,258.6	124.6	124.7	-119.73	-14,136.3	199.2	483.7	239.6	244.08	1.982 Advise and Monitor		
24,400.0	10,018.1	24,645.2	10,258.1	125.5	125.6	-119.73	-14,236.3	198.3	483.7	237.9	245.76	1.968 Advise and Monitor		
24,500.0	10,017.6	24,745.2	10,257.7	126.3	126.4	-119.73	-14,336.3	197.4	483.7	236.3	247.43	1.955 Advise and Monitor		
24,600.0	10,017.2	24,845.2	10,257.2	127.2	127.3	-119.73	-14,436.3	196.4	483.7	234.6	249.10	1.942 Advise and Monitor		
24,700.0	10,016.7	24,945.2	10,256.7	128.0	128.1	-119.73	-14,536.3	195.5	483.7	232.9	250.77	1.929 Advise and Monitor		
24,800.0	10,016.2	25,045.2	10,256.3	128.9	129.0	-119.73	-14,636.3	194.6	483.7	231.3	252.44	1.916 Advise and Monitor		
24,900.0	10,015.8	25,145.2	10,255.8	129.8	129.9	-119.73	-14,736.3	193.7	483.7	229.6	254.11	1.904 Advise and Monitor		
25,000.0	10,015.3	25,245.2	10,255.4	130.6	130.7	-119.73	-14,836.3	192.8	483.7	227.9	255.78	1.891 Advise and Monitor		
25,100.0	10,014.8	25,345.2	10,254.9	131.5	131.6	-119.73	-14,936.3	191.8	483.7	226.3	257.45	1.879 Advise and Monitor		
25,200.0	10,014.4	25,445.2	10,254.4	132.3	132.4	-119.73	-15,036.3	190.9	483.7	224.6	259.13	1.867 Advise and Monitor		
25,300.0	10,013.9	25,545.2	10,254.0	133.2	133.3	-119.73	-15,136.3	190.0	483.7	222.9	260.80	1.855 Advise and Monitor		
25,400.0	10,013.4	25,645.2	10,253.5	134.0	134.1	-119.73	-15,236.3	189.1	483.7	221.2	262.47	1.843 Advise and Monitor		
25,492.9	10,013.0	25,738.1	10,253.1	134.8	134.9	-119.73	-15,329.2	188.2	483.7	219.7	264.02	1.832 Advise and Monitor		
25,493.4	10,013.0	25,738.7	10,253.1	134.8	134.9	-119.73	-15,329.7	188.2	483.7	219.7	264.03	1.832 Advise and Monitor, SF		

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

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Page 28

COMPASS 5000.15 Build 91E

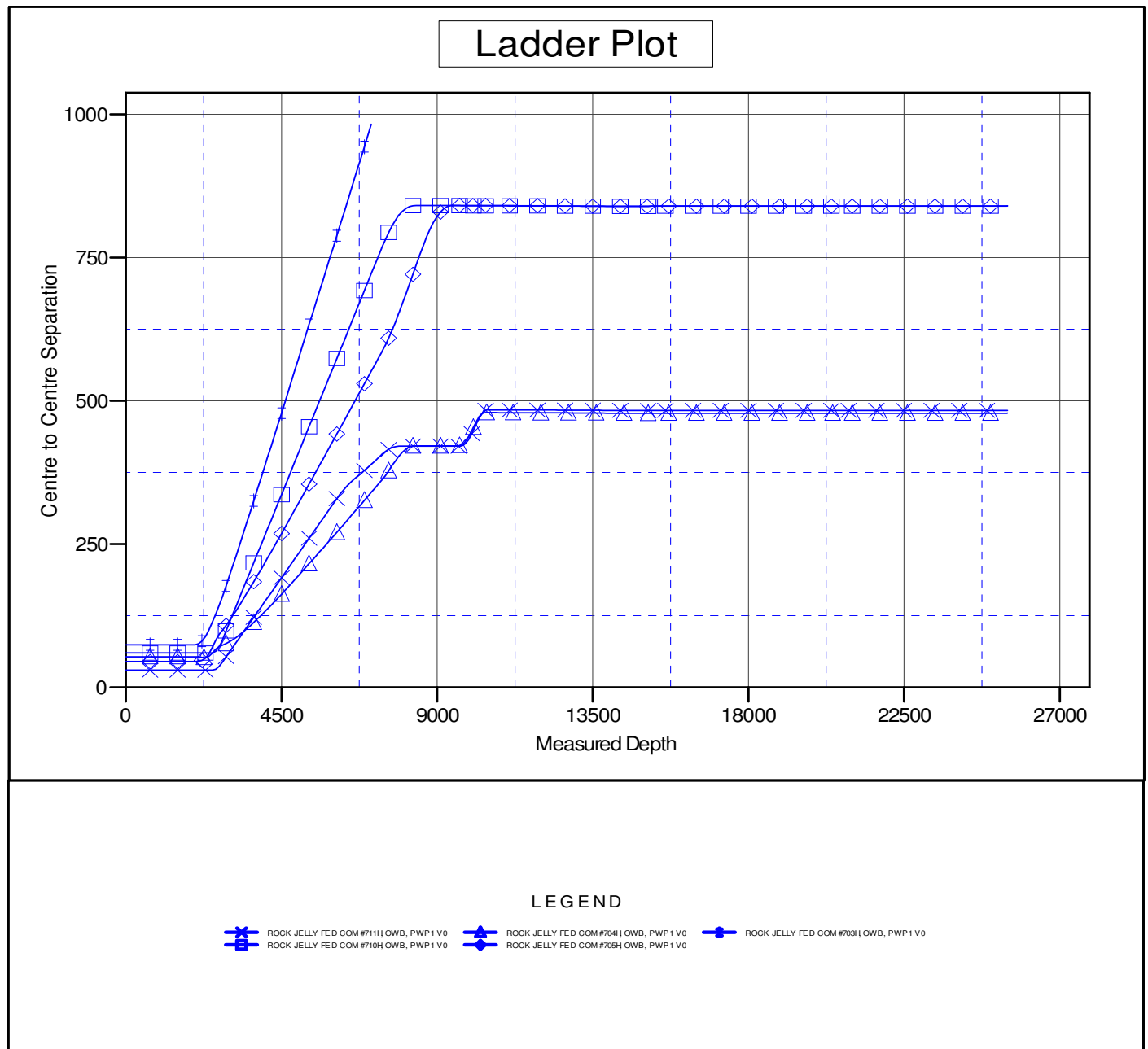
ConocoPhillips

Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to KB=25' @ 3003.1usft (P84)
 Offset Depths are relative to Offset Datum
 Central Meridian is 104° 20' 0.000 W

Coordinates are relative to: ROCK JELLY FED COM #712H
 Coordinate System is US State Plane 1927 (Exact solution), New Mexico East 30
 Grid Convergence at Surface is: 0.19°



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

ConocoPhillips

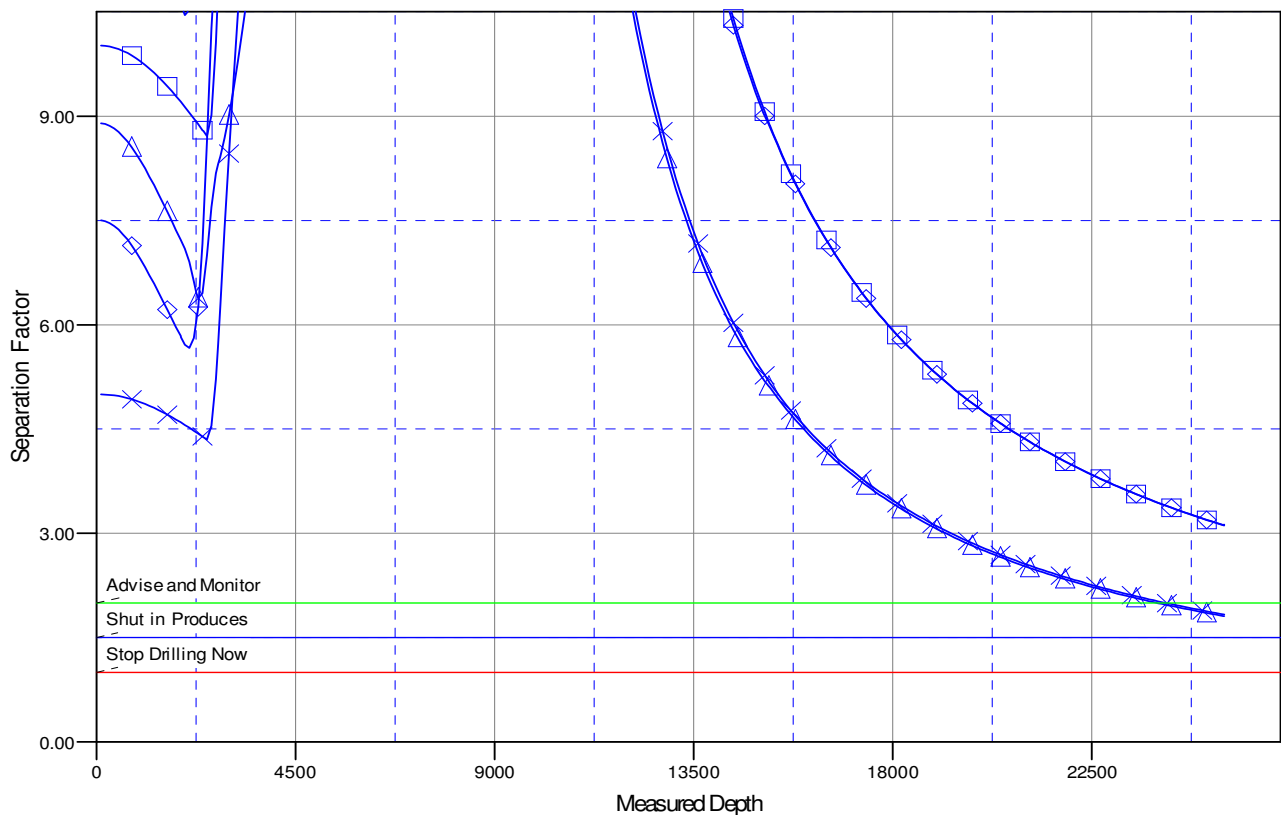
Anticollision Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Reference Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Site Error:	0.0 usft	North Reference:	Grid
Reference Well:	ROCK JELLY FED COM #712H	Survey Calculation Method:	Minimum Curvature
Well Error:	3.0 usft	Output errors are at	2.00 sigma
Reference Wellbore	OWB	Database:	EDT 15 Central Prod
Reference Design:	PWP1	Offset TVD Reference:	Offset Datum

Reference Depths are relative to KB=25' @ 3003.1usft (P84)
 Offset Depths are relative to Offset Datum
 Central Meridian is 104° 20' 0.000 W

Coordinates are relative to: ROCK JELLY FED COM #712H
 Coordinate System is US State Plane 1927 (Exact solution), New Mexico East 30
 Grid Convergence at Surface is: 0.19°

Separation Factor Plot



LEGEND

ROCK JELLY FED COM #711H OWB, PWP1 V0
 ROCK JELLY FED COM #710H OWB, PWP1 V0
 ROCK JELLY FED COM #703H OWB, PWP1 V0

DELAWARE BASIN WEST

ATLAS PROSPECT (NM-E)

ROCK JELLY FEDERAL PROJECT (ATLAS 2629)

ROCK JELLY FED COM #712H

OWB

Plan: PWP1

Standard Survey Report

18 January, 2022

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

Project	ATLAS PROSPECT (NM-E)		
Map System:	US State Plane 1927 (Exact solution)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	New Mexico East 3001		

Site	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)		
Site Position:		Northing:	392,391.50 usft
From:	Map	Easting:	613,615.50 usft
Position Uncertainty:	0.0 usft	Slot Radius:	13-3/16 "
		Latitude:	32° 4' 41.768 N
		Longitude:	103° 57' 59.453 W
		Grid Convergence:	0.19 °

Well	ROCK JELLY FED COM #712H					
Well Position	+N/-S	0.0 usft	Northing:	392,195.50 usft	Latitude:	32° 4' 39.921 N
	+E/-W	0.0 usft	Easting:	610,840.70 usft	Longitude:	103° 58' 31.711 W
Position Uncertainty		3.0 usft	Wellhead Elevation:	usft	Ground Level:	2,978.1 usft

Wellbore	OWB				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	BGGM2021	12/13/2021	6.65	59.69	47,531.29676163

Design	PWP1				
Audit Notes:					
Version:		Phase:	PLAN	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)	
	0.0	0.0	0.0	180.87	

Survey Tool Program	Date	1/18/2022			
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description	
0.0	9,620.0	PWP1 (OWB)	Standard Keeper 104	Standard Wireline Keeper ver 1.0.4	
9,620.0	25,492.9	PWP1 (OWB)	MWD+IFR1+FDIR	OWSG MWD + IFR1 + FDIR Correction	

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)	
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.00	0.00	
100.0	0.00	0.00	100.0	0.0	0.0	0.0	0.00	0.00	0.00	
200.0	0.00	0.00	200.0	0.0	0.0	0.0	0.00	0.00	0.00	
300.0	0.00	0.00	300.0	0.0	0.0	0.0	0.00	0.00	0.00	
400.0	0.00	0.00	400.0	0.0	0.0	0.0	0.00	0.00	0.00	
500.0	0.00	0.00	500.0	0.0	0.0	0.0	0.00	0.00	0.00	
600.0	0.00	0.00	600.0	0.0	0.0	0.0	0.00	0.00	0.00	
700.0	0.00	0.00	700.0	0.0	0.0	0.0	0.00	0.00	0.00	
800.0	0.00	0.00	800.0	0.0	0.0	0.0	0.00	0.00	0.00	

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
900.0	0.00	0.00	900.0	0.0	0.0	0.0	0.00	0.00	0.00
1,000.0	0.00	0.00	1,000.0	0.0	0.0	0.0	0.00	0.00	0.00
1,100.0	0.00	0.00	1,100.0	0.0	0.0	0.0	0.00	0.00	0.00
1,200.0	0.00	0.00	1,200.0	0.0	0.0	0.0	0.00	0.00	0.00
1,300.0	0.00	0.00	1,300.0	0.0	0.0	0.0	0.00	0.00	0.00
1,400.0	0.00	0.00	1,400.0	0.0	0.0	0.0	0.00	0.00	0.00
1,500.0	0.00	0.00	1,500.0	0.0	0.0	0.0	0.00	0.00	0.00
1,600.0	0.00	0.00	1,600.0	0.0	0.0	0.0	0.00	0.00	0.00
1,700.0	0.00	0.00	1,700.0	0.0	0.0	0.0	0.00	0.00	0.00
1,800.0	0.00	0.00	1,800.0	0.0	0.0	0.0	0.00	0.00	0.00
1,900.0	0.00	0.00	1,900.0	0.0	0.0	0.0	0.00	0.00	0.00
2,000.0	0.00	0.00	2,000.0	0.0	0.0	0.0	0.00	0.00	0.00
2,100.0	0.00	0.00	2,100.0	0.0	0.0	0.0	0.00	0.00	0.00
2,200.0	0.00	0.00	2,200.0	0.0	0.0	0.0	0.00	0.00	0.00
2,300.0	0.00	0.00	2,300.0	0.0	0.0	0.0	0.00	0.00	0.00
2,400.0	0.00	0.00	2,400.0	0.0	0.0	0.0	0.00	0.00	0.00
2,500.0	0.00	0.00	2,500.0	0.0	0.0	0.0	0.00	0.00	0.00
Start Build 2.00									
2,600.0	2.00	315.09	2,600.0	1.2	-1.2	-1.2	2.00	2.00	0.00
2,700.0	4.00	315.09	2,699.8	4.9	-4.9	-4.9	2.00	2.00	0.00
2,750.0	5.00	315.09	2,749.7	7.7	-7.7	-7.6	2.00	2.00	0.00
Start 4646.8 hold at 2750.0 MD									
2,800.0	5.00	315.09	2,799.5	10.8	-10.8	-10.6	0.00	0.00	0.00
2,900.0	5.00	315.09	2,899.1	17.0	-16.9	-16.7	0.00	0.00	0.00
3,000.0	5.00	315.09	2,998.7	23.2	-23.1	-22.8	0.00	0.00	0.00
3,100.0	5.00	315.09	3,098.4	29.3	-29.2	-28.9	0.00	0.00	0.00
3,200.0	5.00	315.09	3,198.0	35.5	-35.4	-35.0	0.00	0.00	0.00
3,300.0	5.00	315.09	3,297.6	41.7	-41.5	-41.0	0.00	0.00	0.00
3,400.0	5.00	315.09	3,397.2	47.8	-47.7	-47.1	0.00	0.00	0.00
3,500.0	5.00	315.09	3,496.8	54.0	-53.8	-53.2	0.00	0.00	0.00
3,600.0	5.00	315.09	3,596.4	60.2	-60.0	-59.3	0.00	0.00	0.00
3,700.0	5.00	315.09	3,696.1	66.4	-66.1	-65.4	0.00	0.00	0.00
3,800.0	5.00	315.09	3,795.7	72.5	-72.3	-71.4	0.00	0.00	0.00
3,900.0	5.00	315.09	3,895.3	78.7	-78.5	-77.5	0.00	0.00	0.00
4,000.0	5.00	315.09	3,994.9	84.9	-84.6	-83.6	0.00	0.00	0.00
4,100.0	5.00	315.09	4,094.5	91.1	-90.8	-89.7	0.00	0.00	0.00
4,200.0	5.00	315.09	4,194.2	97.2	-96.9	-95.7	0.00	0.00	0.00
4,300.0	5.00	315.09	4,293.8	103.4	-103.1	-101.8	0.00	0.00	0.00
4,400.0	5.00	315.09	4,393.4	109.6	-109.2	-107.9	0.00	0.00	0.00
4,500.0	5.00	315.09	4,493.0	115.7	-115.4	-114.0	0.00	0.00	0.00
4,600.0	5.00	315.09	4,592.6	121.9	-121.5	-120.1	0.00	0.00	0.00
4,700.0	5.00	315.09	4,692.3	128.1	-127.7	-126.1	0.00	0.00	0.00
4,800.0	5.00	315.09	4,791.9	134.3	-133.8	-132.2	0.00	0.00	0.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
4,900.0	5.00	315.09	4,891.5	140.4	-140.0	-138.3	0.00	0.00	0.00
5,000.0	5.00	315.09	4,991.1	146.6	-146.1	-144.4	0.00	0.00	0.00
5,100.0	5.00	315.09	5,090.7	152.8	-152.3	-150.5	0.00	0.00	0.00
5,200.0	5.00	315.09	5,190.4	159.0	-158.4	-156.5	0.00	0.00	0.00
5,300.0	5.00	315.09	5,290.0	165.1	-164.6	-162.6	0.00	0.00	0.00
5,400.0	5.00	315.09	5,389.6	171.3	-170.7	-168.7	0.00	0.00	0.00
5,500.0	5.00	315.09	5,489.2	177.5	-176.9	-174.8	0.00	0.00	0.00
5,600.0	5.00	315.09	5,588.8	183.6	-183.1	-180.9	0.00	0.00	0.00
5,700.0	5.00	315.09	5,688.5	189.8	-189.2	-186.9	0.00	0.00	0.00
5,800.0	5.00	315.09	5,788.1	196.0	-195.4	-193.0	0.00	0.00	0.00
5,900.0	5.00	315.09	5,887.7	202.2	-201.5	-199.1	0.00	0.00	0.00
6,000.0	5.00	315.09	5,987.3	208.3	-207.7	-205.2	0.00	0.00	0.00
6,100.0	5.00	315.09	6,086.9	214.5	-213.8	-211.3	0.00	0.00	0.00
6,200.0	5.00	315.09	6,186.6	220.7	-220.0	-217.3	0.00	0.00	0.00
6,300.0	5.00	315.09	6,286.2	226.9	-226.1	-223.4	0.00	0.00	0.00
6,400.0	5.00	315.09	6,385.8	233.0	-232.3	-229.5	0.00	0.00	0.00
6,500.0	5.00	315.09	6,485.4	239.2	-238.4	-235.6	0.00	0.00	0.00
6,600.0	5.00	315.09	6,585.0	245.4	-244.6	-241.6	0.00	0.00	0.00
6,700.0	5.00	315.09	6,684.7	251.5	-250.7	-247.7	0.00	0.00	0.00
6,800.0	5.00	315.09	6,784.3	257.7	-256.9	-253.8	0.00	0.00	0.00
6,900.0	5.00	315.09	6,883.9	263.9	-263.0	-259.9	0.00	0.00	0.00
7,000.0	5.00	315.09	6,983.5	270.1	-269.2	-266.0	0.00	0.00	0.00
7,100.0	5.00	315.09	7,083.1	276.2	-275.3	-272.0	0.00	0.00	0.00
7,200.0	5.00	315.09	7,182.7	282.4	-281.5	-278.1	0.00	0.00	0.00
7,300.0	5.00	315.09	7,282.4	288.6	-287.7	-284.2	0.00	0.00	0.00
7,396.8	5.00	315.09	7,378.8	294.6	-293.6	-290.1	0.00	0.00	0.00
Start Drop -1.00									
7,400.0	4.97	315.09	7,382.0	294.8	-293.8	-290.3	1.00	-1.00	0.00
7,500.0	3.97	315.09	7,481.7	300.3	-299.3	-295.7	1.00	-1.00	0.00
7,600.0	2.97	315.09	7,581.5	304.6	-303.6	-299.9	1.00	-1.00	0.00
7,700.0	1.97	315.09	7,681.4	307.6	-306.6	-302.9	1.00	-1.00	0.00
7,800.0	0.97	315.09	7,781.4	309.4	-308.4	-304.7	1.00	-1.00	0.00
7,896.8	0.00	0.00	7,878.2	310.0	-309.0	-305.3	1.00	-1.00	0.00
Start 1631.8 hold at 7896.8 MD									
7,900.0	0.00	0.00	7,881.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,000.0	0.00	0.00	7,981.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,100.0	0.00	0.00	8,081.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,200.0	0.00	0.00	8,181.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,300.0	0.00	0.00	8,281.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,400.0	0.00	0.00	8,381.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,500.0	0.00	0.00	8,481.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,600.0	0.00	0.00	8,581.4	310.0	-309.0	-305.3	0.00	0.00	0.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
8,700.0	0.00	0.00	8,681.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,800.0	0.00	0.00	8,781.4	310.0	-309.0	-305.3	0.00	0.00	0.00
8,900.0	0.00	0.00	8,881.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,000.0	0.00	0.00	8,981.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,100.0	0.00	0.00	9,081.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,200.0	0.00	0.00	9,181.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,300.0	0.00	0.00	9,281.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,400.0	0.00	0.00	9,381.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,500.0	0.00	0.00	9,481.4	310.0	-309.0	-305.3	0.00	0.00	0.00
9,528.6	0.00	0.00	9,510.0	310.0	-309.0	-305.3	0.00	0.00	0.00
Start DLS 10.00 TFO 178.24									
9,600.0	7.14	178.24	9,581.2	305.6	-308.9	-300.9	10.00	10.00	0.00
9,700.0	17.14	178.24	9,678.8	284.6	-308.2	-279.9	10.00	10.00	0.00
9,800.0	27.14	178.24	9,771.3	247.0	-307.1	-242.3	10.00	10.00	0.00
9,900.0	37.14	178.24	9,855.9	193.9	-305.4	-189.2	10.00	10.00	0.00
10,000.0	47.14	178.24	9,930.0	126.9	-303.4	-122.3	10.00	10.00	0.00
10,100.0	57.14	178.24	9,991.3	48.1	-300.9	-43.5	10.00	10.00	0.00
10,200.0	67.14	178.24	10,037.9	-40.2	-298.2	44.7	10.00	10.00	0.00
10,300.0	77.14	178.24	10,068.6	-135.2	-295.3	139.6	10.00	10.00	0.00
10,400.0	87.14	178.24	10,082.2	-234.1	-292.2	238.5	10.00	10.00	0.00
10,431.3	90.27	178.24	10,083.0	-265.4	-291.3	269.7	10.00	10.00	0.00
Start 4674.6 hold at 10431.3 MD									
10,500.0	90.27	178.24	10,082.6	-334.0	-289.2	338.4	0.00	0.00	0.00
10,600.0	90.27	178.24	10,082.2	-434.0	-286.1	438.2	0.00	0.00	0.00
10,700.0	90.27	178.24	10,081.7	-533.9	-283.0	538.1	0.00	0.00	0.00
10,800.0	90.27	178.24	10,081.2	-633.9	-279.9	638.0	0.00	0.00	0.00
10,900.0	90.27	178.24	10,080.8	-733.8	-276.8	737.9	0.00	0.00	0.00
11,000.0	90.27	178.24	10,080.3	-833.8	-273.8	837.8	0.00	0.00	0.00
11,100.0	90.27	178.24	10,079.8	-933.7	-270.7	937.7	0.00	0.00	0.00
11,200.0	90.27	178.24	10,079.4	-1,033.7	-267.6	1,037.6	0.00	0.00	0.00
11,300.0	90.27	178.24	10,078.9	-1,133.6	-264.5	1,137.5	0.00	0.00	0.00
11,400.0	90.27	178.24	10,078.4	-1,233.6	-261.4	1,237.4	0.00	0.00	0.00
11,500.0	90.27	178.24	10,078.0	-1,333.5	-258.4	1,337.3	0.00	0.00	0.00
11,600.0	90.27	178.24	10,077.5	-1,433.5	-255.3	1,437.2	0.00	0.00	0.00
11,700.0	90.27	178.24	10,077.0	-1,533.4	-252.2	1,537.1	0.00	0.00	0.00
11,800.0	90.27	178.24	10,076.6	-1,633.4	-249.1	1,637.0	0.00	0.00	0.00
11,900.0	90.27	178.24	10,076.1	-1,733.3	-246.0	1,736.9	0.00	0.00	0.00
12,000.0	90.27	178.24	10,075.7	-1,833.3	-243.0	1,836.8	0.00	0.00	0.00
12,100.0	90.27	178.24	10,075.2	-1,933.2	-239.9	1,936.6	0.00	0.00	0.00
12,200.0	90.27	178.24	10,074.7	-2,033.2	-236.8	2,036.5	0.00	0.00	0.00
12,300.0	90.27	178.24	10,074.3	-2,133.1	-233.7	2,136.4	0.00	0.00	0.00
12,400.0	90.27	178.24	10,073.8	-2,233.1	-230.6	2,236.3	0.00	0.00	0.00
12,500.0	90.27	178.24	10,073.3	-2,333.0	-227.6	2,336.2	0.00	0.00	0.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
12,600.0	90.27	178.24	10,072.9	-2,433.0	-224.5	2,436.1	0.00	0.00	0.00
12,700.0	90.27	178.24	10,072.4	-2,533.0	-221.4	2,536.0	0.00	0.00	0.00
12,800.0	90.27	178.24	10,071.9	-2,632.9	-218.3	2,635.9	0.00	0.00	0.00
12,900.0	90.27	178.24	10,071.5	-2,732.9	-215.3	2,735.8	0.00	0.00	0.00
13,000.0	90.27	178.24	10,071.0	-2,832.8	-212.2	2,835.7	0.00	0.00	0.00
13,100.0	90.27	178.24	10,070.5	-2,932.8	-209.1	2,935.6	0.00	0.00	0.00
13,200.0	90.27	178.24	10,070.1	-3,032.7	-206.0	3,035.5	0.00	0.00	0.00
13,300.0	90.27	178.24	10,069.6	-3,132.7	-202.9	3,135.4	0.00	0.00	0.00
13,400.0	90.27	178.24	10,069.1	-3,232.6	-199.9	3,235.3	0.00	0.00	0.00
13,500.0	90.27	178.24	10,068.7	-3,332.6	-196.8	3,335.2	0.00	0.00	0.00
13,600.0	90.27	178.24	10,068.2	-3,432.5	-193.7	3,435.1	0.00	0.00	0.00
13,700.0	90.27	178.24	10,067.7	-3,532.5	-190.6	3,534.9	0.00	0.00	0.00
13,800.0	90.27	178.24	10,067.3	-3,632.4	-187.5	3,634.8	0.00	0.00	0.00
13,900.0	90.27	178.24	10,066.8	-3,732.4	-184.5	3,734.7	0.00	0.00	0.00
14,000.0	90.27	178.24	10,066.3	-3,832.3	-181.4	3,834.6	0.00	0.00	0.00
14,100.0	90.27	178.24	10,065.9	-3,932.3	-178.3	3,934.5	0.00	0.00	0.00
14,200.0	90.27	178.24	10,065.4	-4,032.2	-175.2	4,034.4	0.00	0.00	0.00
14,300.0	90.27	178.24	10,064.9	-4,132.2	-172.1	4,134.3	0.00	0.00	0.00
14,400.0	90.27	178.24	10,064.5	-4,232.1	-169.1	4,234.2	0.00	0.00	0.00
14,500.0	90.27	178.24	10,064.0	-4,332.1	-166.0	4,334.1	0.00	0.00	0.00
14,600.0	90.27	178.24	10,063.6	-4,432.0	-162.9	4,434.0	0.00	0.00	0.00
14,700.0	90.27	178.24	10,063.1	-4,532.0	-159.8	4,533.9	0.00	0.00	0.00
14,800.0	90.27	178.24	10,062.6	-4,631.9	-156.7	4,633.8	0.00	0.00	0.00
14,900.0	90.27	178.24	10,062.2	-4,731.9	-153.7	4,733.7	0.00	0.00	0.00
15,000.0	90.27	178.24	10,061.7	-4,831.8	-150.6	4,833.6	0.00	0.00	0.00
15,100.0	90.27	178.24	10,061.2	-4,931.8	-147.5	4,933.5	0.00	0.00	0.00
15,105.9	90.27	178.24	10,061.2	-4,937.7	-147.3	4,939.3	0.00	0.00	0.00
Start DLS 2.00 TFO 90.03									
15,200.0	90.27	180.12	10,060.8	-5,031.8	-146.0	5,033.4	2.00	0.00	2.00
15,215.6	90.27	180.43	10,060.7	-5,047.4	-146.0	5,049.0	2.00	0.00	2.00
Start 5224.1 hold at 15215.6 MD									
15,300.0	90.27	180.43	10,060.3	-5,131.8	-146.7	5,133.4	0.00	0.00	0.00
15,400.0	90.27	180.43	10,059.8	-5,231.8	-147.4	5,233.4	0.00	0.00	0.00
15,500.0	90.27	180.43	10,059.4	-5,331.8	-148.2	5,333.4	0.00	0.00	0.00
15,600.0	90.27	180.43	10,058.9	-5,431.8	-148.9	5,433.4	0.00	0.00	0.00
15,700.0	90.27	180.43	10,058.4	-5,531.7	-149.7	5,533.4	0.00	0.00	0.00
15,800.0	90.27	180.43	10,058.0	-5,631.7	-150.4	5,633.4	0.00	0.00	0.00
15,900.0	90.27	180.43	10,057.5	-5,731.7	-151.2	5,733.4	0.00	0.00	0.00
16,000.0	90.27	180.43	10,057.1	-5,831.7	-151.9	5,833.4	0.00	0.00	0.00
16,100.0	90.27	180.43	10,056.6	-5,931.7	-152.7	5,933.4	0.00	0.00	0.00
16,200.0	90.27	180.43	10,056.1	-6,031.7	-153.4	6,033.4	0.00	0.00	0.00
16,300.0	90.27	180.43	10,055.7	-6,131.7	-154.2	6,133.4	0.00	0.00	0.00
16,400.0	90.27	180.43	10,055.2	-6,231.7	-154.9	6,233.4	0.00	0.00	0.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
16,500.0	90.27	180.43	10,054.7	-6,331.7	-155.7	6,333.3	0.00	0.00	0.00
16,600.0	90.27	180.43	10,054.3	-6,431.7	-156.4	6,433.3	0.00	0.00	0.00
16,700.0	90.27	180.43	10,053.8	-6,531.7	-157.2	6,533.3	0.00	0.00	0.00
16,800.0	90.27	180.43	10,053.4	-6,631.7	-157.9	6,633.3	0.00	0.00	0.00
16,900.0	90.27	180.43	10,052.9	-6,731.7	-158.7	6,733.3	0.00	0.00	0.00
17,000.0	90.27	180.43	10,052.4	-6,831.7	-159.4	6,833.3	0.00	0.00	0.00
17,100.0	90.27	180.43	10,052.0	-6,931.7	-160.2	6,933.3	0.00	0.00	0.00
17,200.0	90.27	180.43	10,051.5	-7,031.7	-160.9	7,033.3	0.00	0.00	0.00
17,300.0	90.27	180.43	10,051.0	-7,131.7	-161.7	7,133.3	0.00	0.00	0.00
17,400.0	90.27	180.43	10,050.6	-7,231.7	-162.4	7,233.3	0.00	0.00	0.00
17,500.0	90.27	180.43	10,050.1	-7,331.7	-163.2	7,333.3	0.00	0.00	0.00
17,600.0	90.27	180.43	10,049.6	-7,431.7	-163.9	7,433.3	0.00	0.00	0.00
17,700.0	90.27	180.43	10,049.2	-7,531.7	-164.7	7,533.3	0.00	0.00	0.00
17,800.0	90.27	180.43	10,048.7	-7,631.7	-165.4	7,633.3	0.00	0.00	0.00
17,900.0	90.27	180.43	10,048.3	-7,731.7	-166.2	7,733.3	0.00	0.00	0.00
18,000.0	90.27	180.43	10,047.8	-7,831.7	-166.9	7,833.3	0.00	0.00	0.00
18,100.0	90.27	180.43	10,047.3	-7,931.7	-167.7	7,933.3	0.00	0.00	0.00
18,200.0	90.27	180.43	10,046.9	-8,031.7	-168.4	8,033.3	0.00	0.00	0.00
18,300.0	90.27	180.43	10,046.4	-8,131.6	-169.2	8,133.3	0.00	0.00	0.00
18,400.0	90.27	180.43	10,045.9	-8,231.6	-169.9	8,233.3	0.00	0.00	0.00
18,500.0	90.27	180.43	10,045.5	-8,331.6	-170.7	8,333.3	0.00	0.00	0.00
18,600.0	90.27	180.43	10,045.0	-8,431.6	-171.4	8,433.3	0.00	0.00	0.00
18,700.0	90.27	180.43	10,044.6	-8,531.6	-172.2	8,533.3	0.00	0.00	0.00
18,800.0	90.27	180.43	10,044.1	-8,631.6	-172.9	8,633.3	0.00	0.00	0.00
18,900.0	90.27	180.43	10,043.6	-8,731.6	-173.7	8,733.3	0.00	0.00	0.00
19,000.0	90.27	180.43	10,043.2	-8,831.6	-174.4	8,833.2	0.00	0.00	0.00
19,100.0	90.27	180.43	10,042.7	-8,931.6	-175.2	8,933.2	0.00	0.00	0.00
19,200.0	90.27	180.43	10,042.2	-9,031.6	-175.9	9,033.2	0.00	0.00	0.00
19,300.0	90.27	180.43	10,041.8	-9,131.6	-176.7	9,133.2	0.00	0.00	0.00
19,400.0	90.27	180.43	10,041.3	-9,231.6	-177.4	9,233.2	0.00	0.00	0.00
19,500.0	90.27	180.43	10,040.9	-9,331.6	-178.2	9,333.2	0.00	0.00	0.00
19,600.0	90.27	180.43	10,040.4	-9,431.6	-179.0	9,433.2	0.00	0.00	0.00
19,700.0	90.27	180.43	10,039.9	-9,531.6	-179.7	9,533.2	0.00	0.00	0.00
19,800.0	90.27	180.43	10,039.5	-9,631.6	-180.5	9,633.2	0.00	0.00	0.00
19,900.0	90.27	180.43	10,039.0	-9,731.6	-181.2	9,733.2	0.00	0.00	0.00
20,000.0	90.27	180.43	10,038.5	-9,831.6	-182.0	9,833.2	0.00	0.00	0.00
20,100.0	90.27	180.43	10,038.1	-9,931.6	-182.7	9,933.2	0.00	0.00	0.00
20,200.0	90.27	180.43	10,037.6	-10,031.6	-183.5	10,033.2	0.00	0.00	0.00
20,300.0	90.27	180.43	10,037.1	-10,131.6	-184.2	10,133.2	0.00	0.00	0.00
20,400.0	90.27	180.43	10,036.7	-10,231.6	-185.0	10,233.2	0.00	0.00	0.00
20,439.7	90.27	180.43	10,036.5	-10,271.3	-185.3	10,272.9	0.00	0.00	0.00
Start DLS 2.00 TFO 89.33									
20,444.6	90.27	180.53	10,036.5	-10,276.2	-185.3	10,277.8	2.00	0.02	2.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
Start 5048.3 hold at 20444.6 MD									
20,500.0	90.27	180.53	10,036.2	-10,331.6	-185.8	10,333.2	0.00	0.00	0.00
20,600.0	90.27	180.53	10,035.8	-10,431.6	-186.7	10,433.2	0.00	0.00	0.00
20,700.0	90.27	180.53	10,035.3	-10,531.6	-187.6	10,533.2	0.00	0.00	0.00
20,800.0	90.27	180.53	10,034.8	-10,631.5	-188.6	10,633.2	0.00	0.00	0.00
20,900.0	90.27	180.53	10,034.4	-10,731.5	-189.5	10,733.2	0.00	0.00	0.00
21,000.0	90.27	180.53	10,033.9	-10,831.5	-190.4	10,833.2	0.00	0.00	0.00
21,100.0	90.27	180.53	10,033.4	-10,931.5	-191.3	10,933.2	0.00	0.00	0.00
21,200.0	90.27	180.53	10,033.0	-11,031.5	-192.3	11,033.2	0.00	0.00	0.00
21,300.0	90.27	180.53	10,032.5	-11,131.5	-193.2	11,133.2	0.00	0.00	0.00
21,400.0	90.27	180.53	10,032.0	-11,231.5	-194.1	11,233.2	0.00	0.00	0.00
21,500.0	90.27	180.53	10,031.6	-11,331.5	-195.0	11,333.2	0.00	0.00	0.00
21,600.0	90.27	180.53	10,031.1	-11,431.5	-195.9	11,433.2	0.00	0.00	0.00
21,700.0	90.27	180.53	10,030.6	-11,531.5	-196.9	11,533.2	0.00	0.00	0.00
21,800.0	90.27	180.53	10,030.2	-11,631.5	-197.8	11,633.2	0.00	0.00	0.00
21,900.0	90.27	180.53	10,029.7	-11,731.5	-198.7	11,733.2	0.00	0.00	0.00
22,000.0	90.27	180.53	10,029.2	-11,831.5	-199.6	11,833.1	0.00	0.00	0.00
22,100.0	90.27	180.53	10,028.8	-11,931.5	-200.5	11,933.1	0.00	0.00	0.00
22,200.0	90.27	180.53	10,028.3	-12,031.5	-201.5	12,033.1	0.00	0.00	0.00
22,300.0	90.27	180.53	10,027.8	-12,131.5	-202.4	12,133.1	0.00	0.00	0.00
22,400.0	90.27	180.53	10,027.4	-12,231.5	-203.3	12,233.1	0.00	0.00	0.00
22,500.0	90.27	180.53	10,026.9	-12,331.5	-204.2	12,333.1	0.00	0.00	0.00
22,600.0	90.27	180.53	10,026.5	-12,431.4	-205.1	12,433.1	0.00	0.00	0.00
22,700.0	90.27	180.53	10,026.0	-12,531.4	-206.1	12,533.1	0.00	0.00	0.00
22,800.0	90.27	180.53	10,025.5	-12,631.4	-207.0	12,633.1	0.00	0.00	0.00
22,900.0	90.27	180.53	10,025.1	-12,731.4	-207.9	12,733.1	0.00	0.00	0.00
23,000.0	90.27	180.53	10,024.6	-12,831.4	-208.8	12,833.1	0.00	0.00	0.00
23,100.0	90.27	180.53	10,024.1	-12,931.4	-209.8	12,933.1	0.00	0.00	0.00
23,200.0	90.27	180.53	10,023.7	-13,031.4	-210.7	13,033.1	0.00	0.00	0.00
23,300.0	90.27	180.53	10,023.2	-13,131.4	-211.6	13,133.1	0.00	0.00	0.00
23,400.0	90.27	180.53	10,022.7	-13,231.4	-212.5	13,233.1	0.00	0.00	0.00
23,500.0	90.27	180.53	10,022.3	-13,331.4	-213.4	13,333.1	0.00	0.00	0.00
23,600.0	90.27	180.53	10,021.8	-13,431.4	-214.4	13,433.1	0.00	0.00	0.00
23,700.0	90.27	180.53	10,021.3	-13,531.4	-215.3	13,533.1	0.00	0.00	0.00
23,800.0	90.27	180.53	10,020.9	-13,631.4	-216.2	13,633.1	0.00	0.00	0.00
23,900.0	90.27	180.53	10,020.4	-13,731.4	-217.1	13,733.1	0.00	0.00	0.00
24,000.0	90.27	180.53	10,019.9	-13,831.4	-218.0	13,833.1	0.00	0.00	0.00
24,100.0	90.27	180.53	10,019.5	-13,931.4	-219.0	13,933.1	0.00	0.00	0.00
24,200.0	90.27	180.53	10,019.0	-14,031.4	-219.9	14,033.1	0.00	0.00	0.00
24,300.0	90.27	180.53	10,018.5	-14,131.4	-220.8	14,133.1	0.00	0.00	0.00
24,400.0	90.27	180.53	10,018.1	-14,231.4	-221.7	14,233.1	0.00	0.00	0.00
24,500.0	90.27	180.53	10,017.6	-14,331.3	-222.7	14,333.1	0.00	0.00	0.00

ConocoPhillips

Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

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)
24,600.0	90.27	180.53	10,017.2	-14,431.3	-223.6	14,433.1	0.00	0.00	0.00
24,700.0	90.27	180.53	10,016.7	-14,531.3	-224.5	14,533.1	0.00	0.00	0.00
24,800.0	90.27	180.53	10,016.2	-14,631.3	-225.4	14,633.1	0.00	0.00	0.00
24,900.0	90.27	180.53	10,015.8	-14,731.3	-226.3	14,733.1	0.00	0.00	0.00
25,000.0	90.27	180.53	10,015.3	-14,831.3	-227.3	14,833.1	0.00	0.00	0.00
25,100.0	90.27	180.53	10,014.8	-14,931.3	-228.2	14,933.1	0.00	0.00	0.00
25,200.0	90.27	180.53	10,014.4	-15,031.3	-229.1	15,033.1	0.00	0.00	0.00
25,300.0	90.27	180.53	10,013.9	-15,131.3	-230.0	15,133.1	0.00	0.00	0.00
25,400.0	90.27	180.53	10,013.4	-15,231.3	-230.9	15,233.1	0.00	0.00	0.00
25,492.9	90.27	180.53	10,013.0	-15,324.2	-231.8	15,326.0	0.00	0.00	0.00
TD at 25492.9									

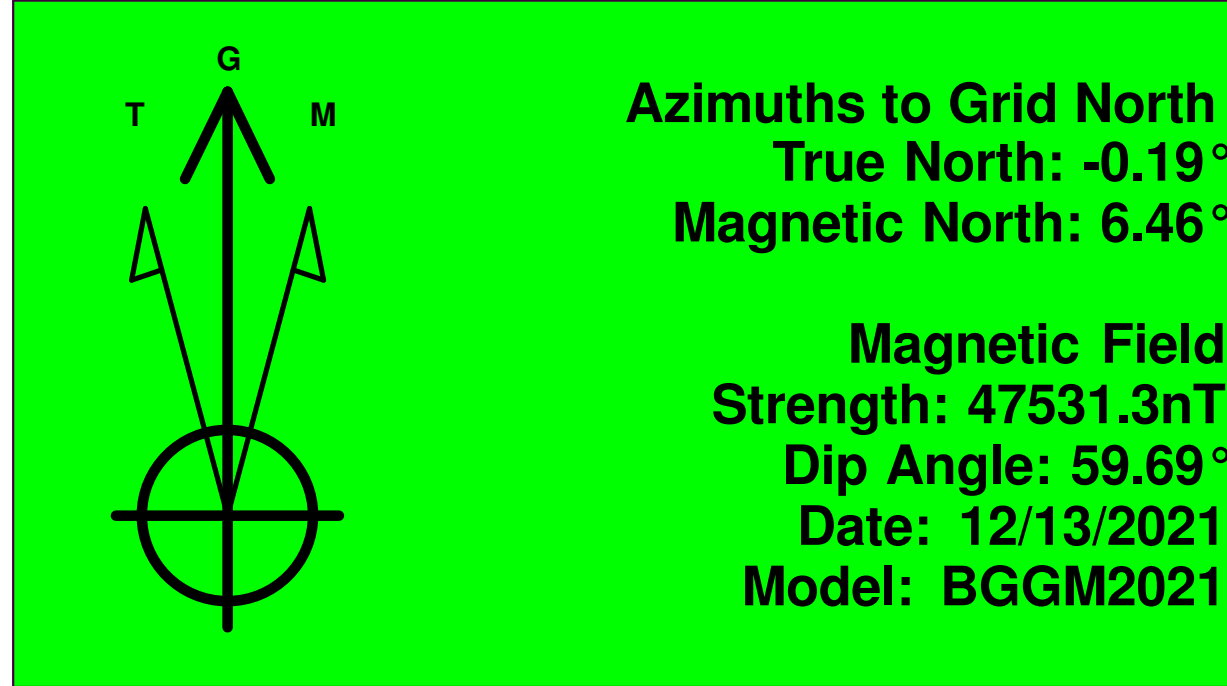
Design Targets									
Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
PBHL(ROCK JELLY F - hit/miss target - Shape - plan hits target center - Rectangle (sides W100.0 H5,050.0 D20.0)	0.27	0.53	10,013.0	-15,324.2	-231.8	376,871.30	610,608.90	32° 2' 8.273 N	103° 58' 34.994 W
LTP(ROCK JELLY FE - plan misses target center by 1.9usft at 25362.7usft MD (10013.6 TVD, -15194.0 N, -230.6 E) - Point	0.00	0.00	10,013.0	-15,194.0	-232.4	377,001.50	610,608.30	32° 2' 9.561 N	103° 58' 34.996 W
POI#2(ROCK JELLY I - plan hits target center - Rectangle (sides W100.0 H5,335.0 D20.0)	0.27	0.43	10,036.5	-10,271.3	-185.3	381,924.22	610,655.45	32° 2' 58.278 N	103° 58' 34.259 W
POI#1(ROCK JELLY I - plan hits target center - Rectangle (sides W100.0 H5,252.0 D20.0)	0.27	358.24	10,061.2	-4,937.7	-147.3	387,257.83	610,693.38	32° 3' 51.060 N	103° 58' 33.613 W
FTP(ROCK JELLY FE - plan misses target center by 86.7usft at 10129.0usft MD (10006.4 TVD, 23.4 N, -300.2 E) - Circle (radius 50.0)	0.00	0.00	10,083.0	63.8	-302.1	392,259.30	610,538.60	32° 4' 40.562 N	103° 58' 35.220 W

Plan Annotations				
Measured Depth (usft)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Comment
2500	2500	0	0	Start Build 2.00
2750	2750	8	-8	Start 4646.8 hold at 2750.0 MD
7397	7379	295	-294	Start Drop -1.00
7897	7878	310	-309	Start 1631.8 hold at 7896.8 MD
9529	9510	310	-309	Start DLS 10.00 TFO 178.24
10,431	10,083	-265	-291	Start 4674.6 hold at 10431.3 MD
15,106	10,061	-4938	-147	Start DLS 2.00 TFO 90.03
15,216	10,061	-5047	-146	Start 5224.1 hold at 15215.6 MD
20,440	10,037	-10,271	-185	Start DLS 2.00 TFO 89.33
20,445	10,036	-10,276	-185	Start 5048.3 hold at 20444.6 MD
25,493	10,013	-15,324	-232	TD at 25492.9

ConocoPhillips
Survey Report

Company:	DELAWARE BASIN WEST	Local Co-ordinate Reference:	Well ROCK JELLY FED COM #712H
Project:	ATLAS PROSPECT (NM-E)	TVD Reference:	KB=25' @ 3003.1usft (P84)
Site:	ROCK JELLY FEDERAL PROJECT (ATLAS 2629)	MD Reference:	KB=25' @ 3003.1usft (P84)
Well:	ROCK JELLY FED COM #712H	North Reference:	Grid
Wellbore:	OWB	Survey Calculation Method:	Minimum Curvature
Design:	PWP1	Database:	EDT 15 Central Prod

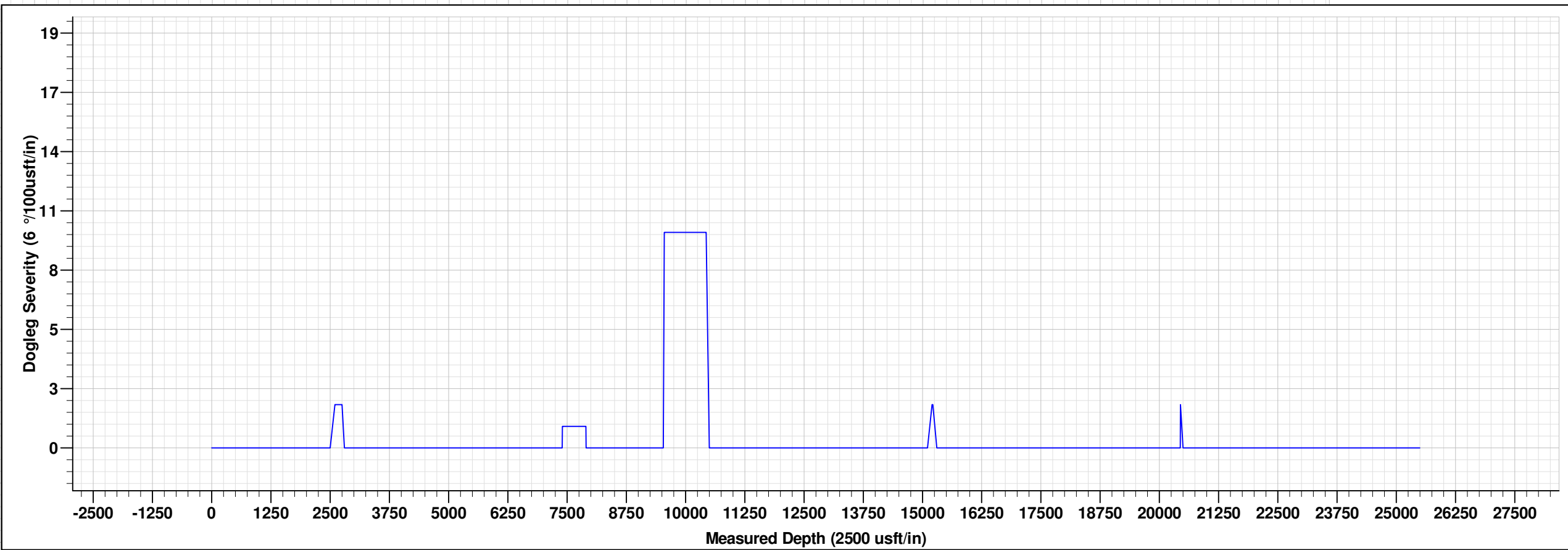
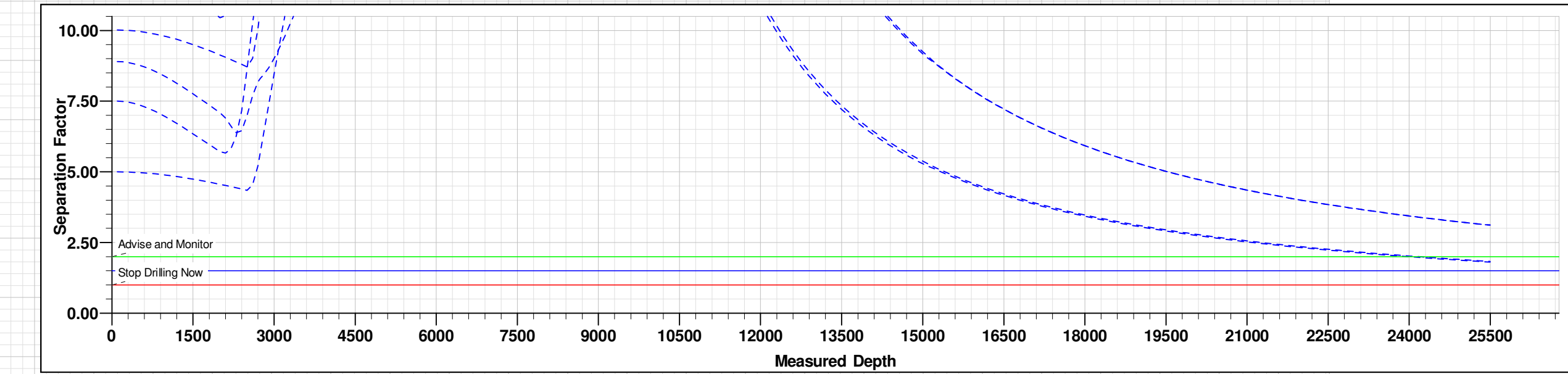
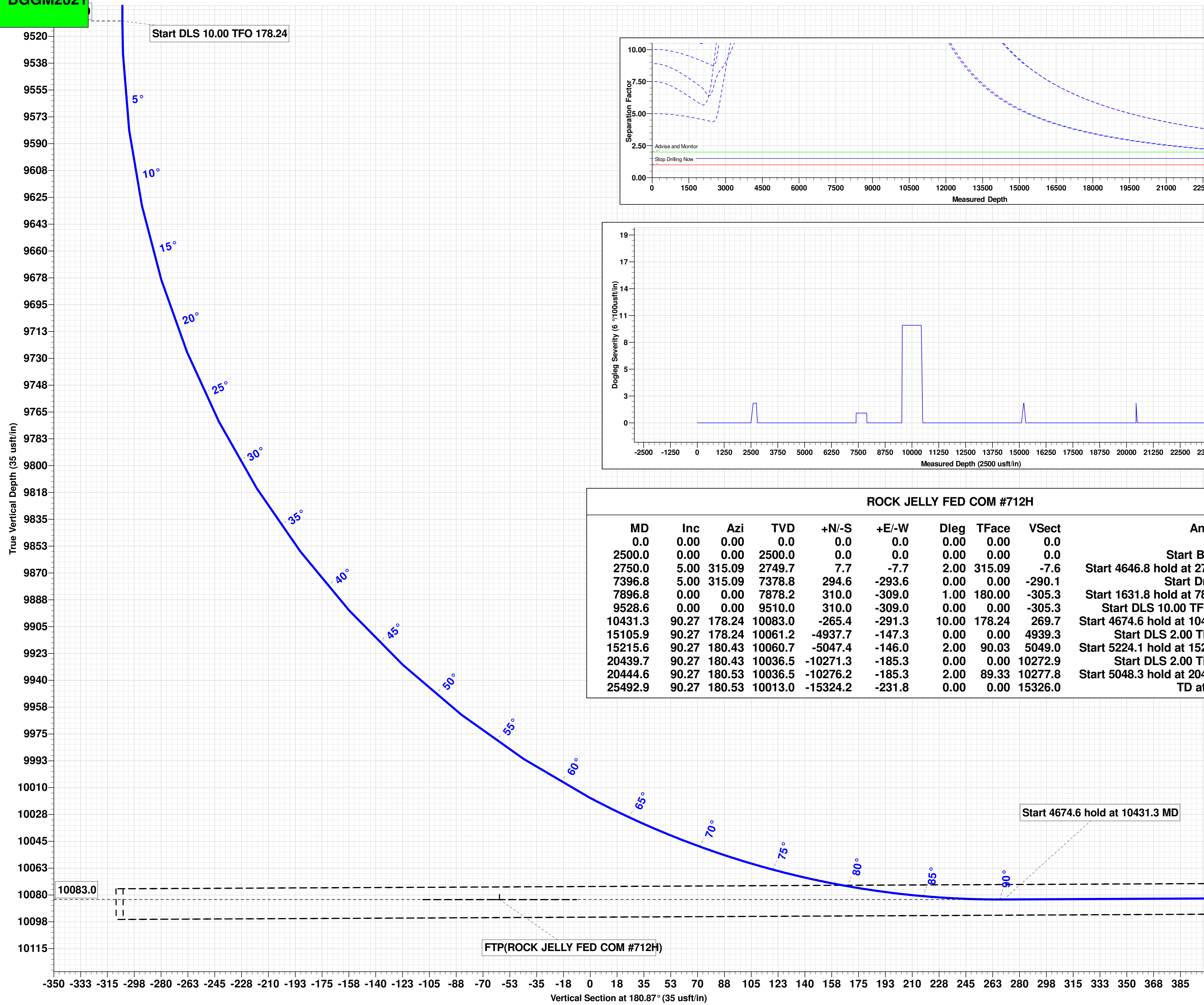
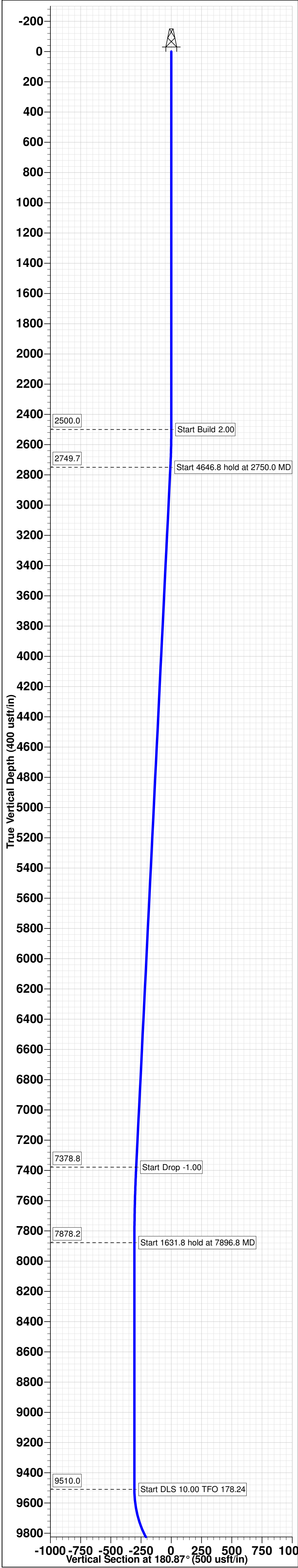
Checked By: _____	Approved By: _____	Date: _____
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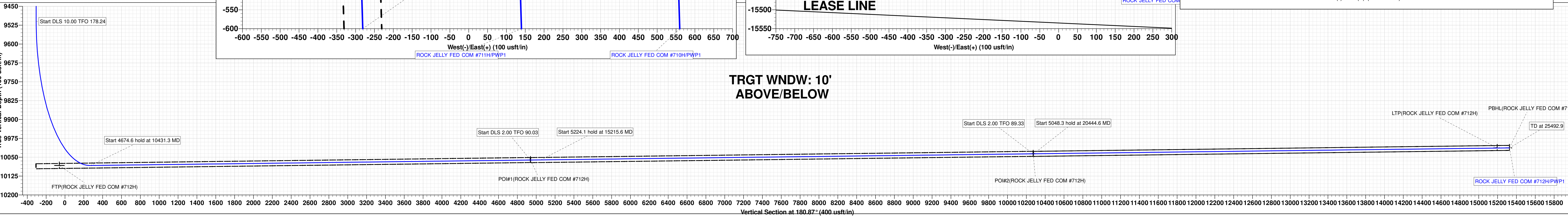
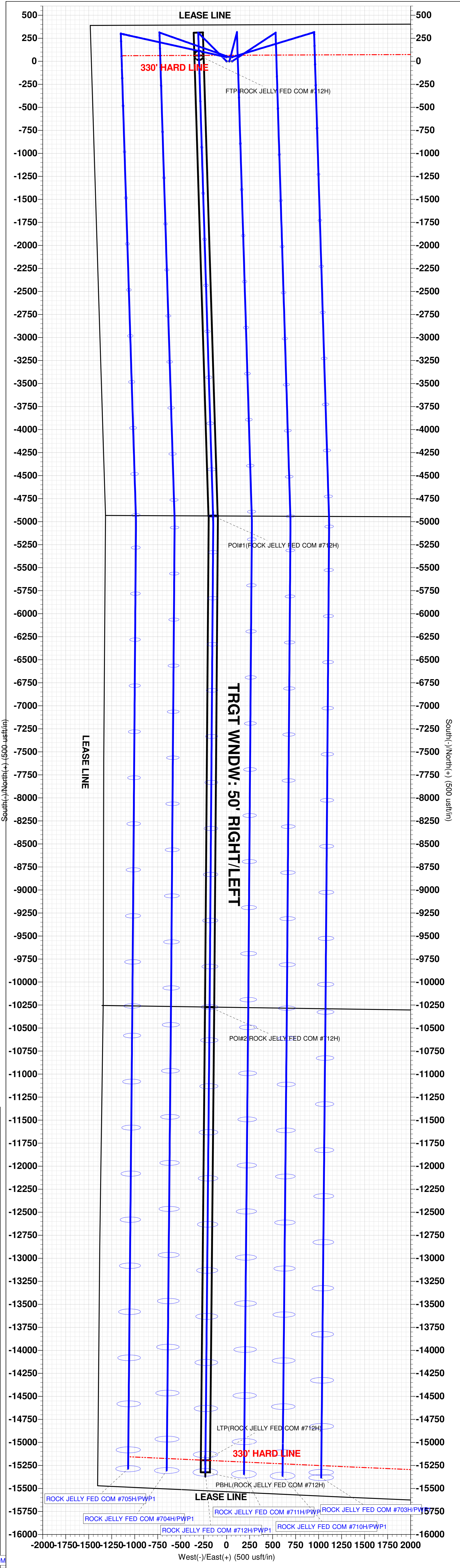
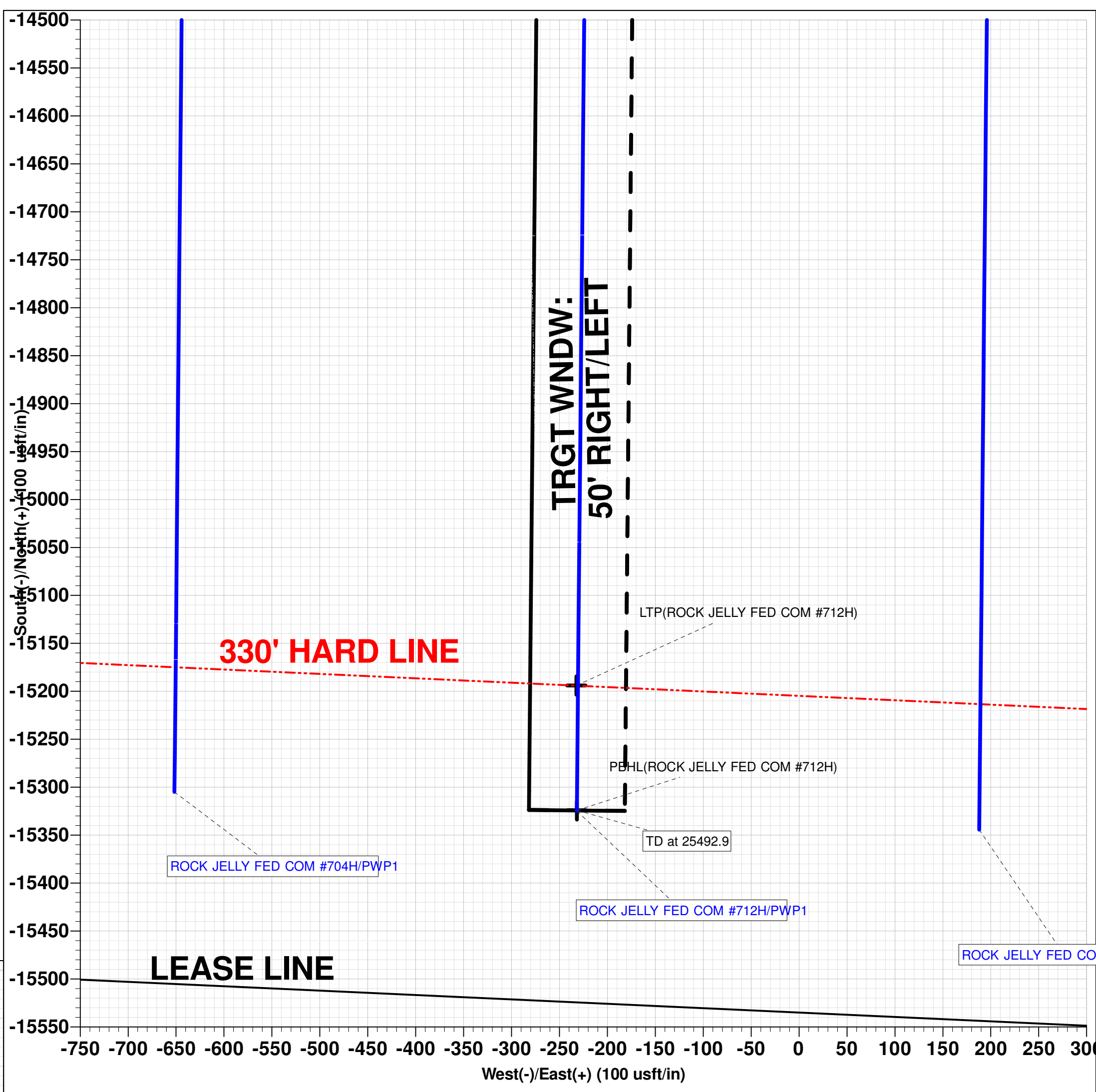
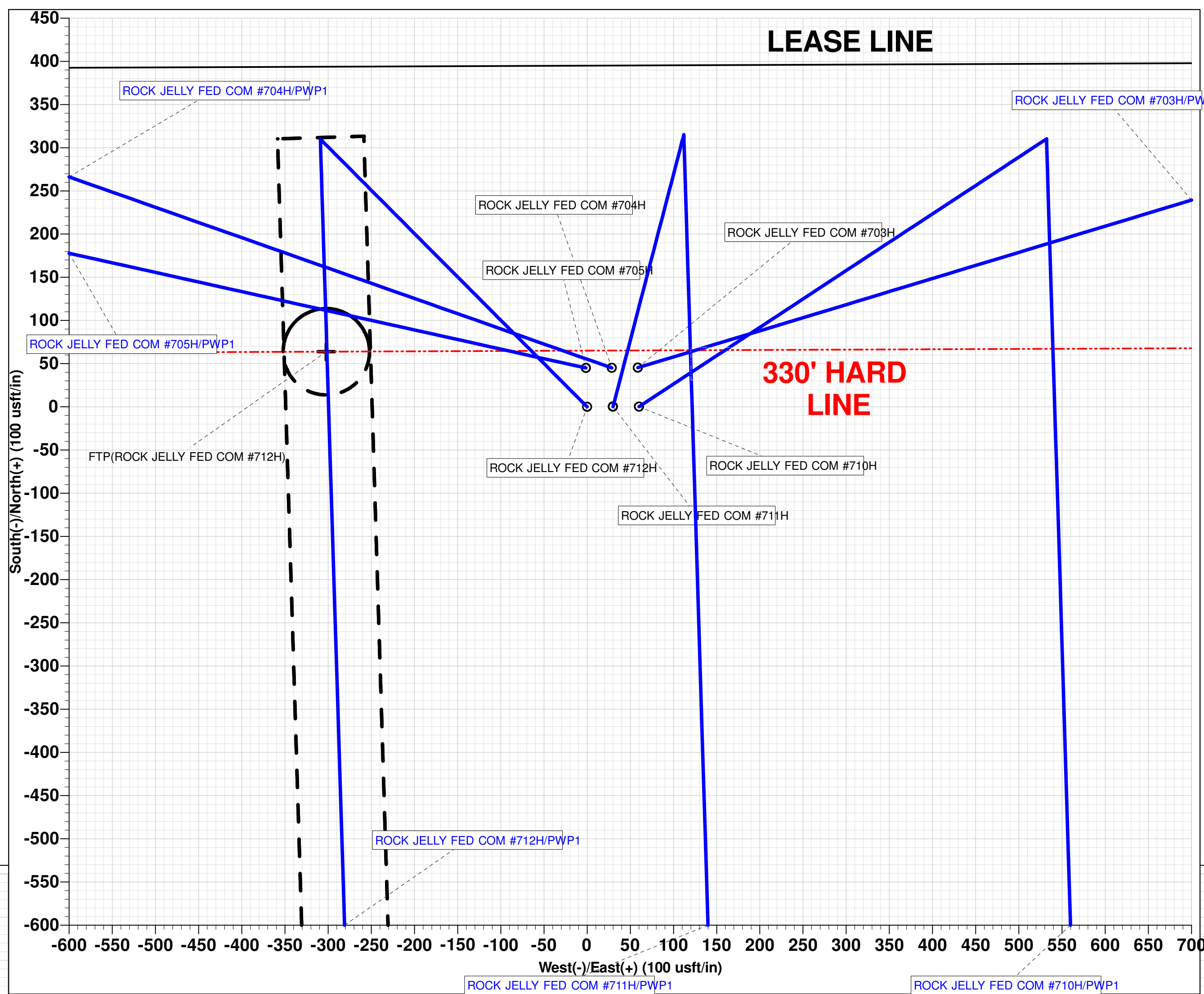
Project: ATLAS PROSPECT (NM-E)
Site: ROCK JELLY FEDERAL PROJECT (ATLAS 2629)
Well: ROCK JELLY FED COM #712H
Wellbore: OWB
Design: PWP1
GL: 2978.1
KB=25' @ 3003.1usft (P84)

WELL DETAILS: ROCK JELLY FED COM #712H					
+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
0.0	0.0	392195.50	610840.70	32° 4' 39.921 N	103° 58' 31.711 W

DESIGN TARGET DETAILS							
Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
LTP(ROCK JELLY FED COM #712H)	10013.0	-15194.0	-232.4	377001.50	610608.30	32° 2' 9.561 N	103° 58' 34.996 W
PBHL(ROCK JELLY FED COM #712H)	10013.0	-15324.2	-231.8	376871.30	610608.90	32° 2' 8.273 N	103° 58' 34.994 W
POI#2(ROCK JELLY FED COM #712H)	10036.5	-10271.3	-185.3	381924.22	610655.45	32° 2' 58.278 N	103° 58' 34.259 W
POI#1(ROCK JELLY FED COM #712H)	10061.2	-4937.7	-147.3	387257.83	610693.38	32° 3' 51.060 N	103° 58' 33.613 W
FTP(ROCK JELLY FED COM #712H)	10083.0	63.8	-302.1	392259.30	610538.60	32° 4' 40.562 N	103° 58' 35.220 W



ROCK JELLY FED COM #712H									
MD	Inc	Azi	TVD	+N/-S	+E/-W	Dleg	TFace	Vsect	Annotation
0.0	0.00	0.00	0.0	0.0	0.0	0.0	0.00	0.0	
2500.0	0.00	0.00	2500.0	0.0	0.0	0.0	0.00	0.0	Start Build 2.00
2750.0	5.00	315.09	2749.7	7.7	-7.7	2.00	315.09	-7.6	Start 4646.8 hold at 2750.0 MD
7396.8	5.00	315.09	7378.8	294.6	-293.6	0.00	0.00	-290.1	Start Drop -1.00
7896.8	0.00	0.00	7878.2	310.0	-309.0	1.00	180.00	-305.3	Start 1631.8 hold at 7896.8 MD
9528.6	0.00	0.00	9510.0	310.0	-309.0	0.00	0.00	-305.3	Start DLS 10.00 TFO 178.24
10431.3	90.27	178.24	10083.0	-265.4	-291.3	10.00	178.24	269.7	Start 4674.6 hold at 10431.3 MD
15105.9	90.27	178.24	10061.2	-4937.7	-147.3	0.00	0.00	4939.3	Start DLS 2.00 TFO 90.03
15215.6	90.27	180.43	10060.7	-5047.4	-146.0	2.00	90.03	5049.9	Start 5224.1 hold at 15215.6 MD
20439.7	90.27	180.43	10036.5	-10271.3	-185.3	0.00	0.00	10272.9	Start DLS 2.00 TFO 89.33
20444.6	90.27	180.53	10036.5	-10276.2	-185.3	2.00	89.33	10277.8	Start 5048.3 hold at 20444.6 MD
25492.9	90.27	180.53	10013.0	-15324.2	-231.8	0.00	0.00	15326.0	TD at 25492.9



PECOS DISTRICT DRILLING CONDITIONS OF APPROVAL

OPERATOR'S NAME:	COG
LEASE NO.:	NMNM0138834
LOCATION:	Section 3, T.26 S., R.29 E., NMPM
COUNTY:	Eddy County, New Mexico

WELL NAME & NO.:	Rock Jelly Fed Com 712H
SURFACE HOLE FOOTAGE:	395'N & 1470'W
BOTTOM HOLE FOOTAGE:	200'S & 1170'W

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.

B. CASING

1. The **10-3/4** inch surface casing shall be set at approximately **535** feet (a minimum of **70 feet (Eddy 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 7-5/8 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.**
- ❖ In Medium Cave/Karst 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.
3. 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.

C. PRESSURE CONTROL

1. **Variance approved to use flex line from BOP to choke manifold. Manufacturer's specification to be readily available. No external damage to flex line. Flex line to be installed as straight as possible (no hard bends).**
2. 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**.
3. Wellhead shall be installed by manufacturer's representatives, submit documentation with subsequent sundry.
 - a. 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.
 - b. Manufacturer representative shall install the test plug for the initial BOP test.
 - c. 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.
 - d. 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)
689-5981

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.

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 integrity 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 integrity 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 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.

ZS 102522

COG OPERATING LLC
HYDROGEN SULFIDE DRILLING OPERATIONS PLAN

1. HYDROGEN SULFIDE TRAINING

All personnel, whether regularly assigned, contracted, or employed on an unscheduled basis, will receive training from a qualified instructor in the following areas prior to commencing drilling operations on this well:

- a. The hazards and characteristics of hydrogen sulfide (H₂S).
- b. The proper use and maintenance of personal protective equipment and life support systems.
- c. The proper use of H₂S detectors, alarms, warning systems, briefing areas, evacuation procedures, and prevailing winds.
- d. The proper techniques for first aid and rescue procedures.

In addition, supervisory personnel will be trained in the following areas:

- a. The effects of H₂S on metal components. If high tensile tubulars are to be used, personnel will be trained in their special maintenance requirements.
- b. Corrective action and shut-in procedures when drilling or reworking a well and blowout prevention and well control procedures.
- c. The contents and requirements of the H₂S Drilling Operations Plan and the Public Protection Plan.

There will be an initial training session just prior to encountering a known or probable H₂S zone (within 3 days or 500 feet) and weekly H₂S and well control drills for all personnel in each crew. The initial training session shall include a review of the site specific H₂S Drilling Operations Plan and the Public Protection Plan. This plan shall be available at the well site. All personnel will be required to carry documentation that they have received the proper training.

2. H₂S SAFETY EQUIPMENT AND SYSTEMS

Note: All H₂S safety equipment and systems will be installed, tested, and operational when drilling reaches a depth of 500 feet above, or three days prior to penetrating the first zone containing or reasonably expected to contain H₂S. If H₂S greater than 100 ppm is encountered in the gas stream we will shut in and install H₂S equipment.

- a. Well Control Equipment:
 - Flare line.
 - Choke manifold with remotely operated choke.
 - Blind rams and pipe rams to accommodate all pipe sizes with properly sized closing unit.
 - Auxiliary equipment to include: annular preventer, mud-gas separator, rotating head.

- b. Protective equipment for essential personnel:
Mark II Surviveair 30-minute units located in the dog house and at briefing areas.
- c. H2S detection and monitoring equipment:
2 - portable H2S monitor positioned on location for best coverage and response. These units have warning lights and audible sirens when H2S levels of 20 ppm are reached.
- d. Visual warning systems:
Caution/Danger signs shall be posted on roads providing direct access to location. Signs will be painted a high visibility yellow with black lettering of sufficient size to be readable at a reasonable distance from the immediate location. Bilingual signs will be used, when appropriate. See example attached.
- e. Mud Program:
The mud program has been designed to minimize the volume of H2S circulated to the surface.
- f. Metallurgy:
All drill strings, casings, tubing, wellhead, blowout preventers, drilling spool, kill lines, choke manifold and lines, and valves shall be suitable for H2S service.
- g. Communication:
Company vehicles equipped with cellular telephone.

COG OPERATING LLC has conducted a review to determine if an H2S contingency plan is required for the above referenced well. We were able to conclude that any potential hazardous volume would be minimal. H2S concentrations of wells in this area from surface to TD are low enough; therefore, we do not believe that an H2S contingency plan is necessary.

W A R N I N G

**YOU ARE ENTERING AN H₂S AREA
AUTHORIZED PERSONNEL ONLY**

- 1. BEARDS OR CONTACT LENSES NOT ALLOWED***
- 2. HARD HATS REQUIRED***
- 3. SMOKING IN DESIGNATED AREAS ONLY***
- 4. BE WIND CONSCIOUS AT ALL TIMES***
- 5. CK WITH COG OPERATING LLC FOREMAN AT MAIN OFFICE***

COG OPERATING LLC

1-575-748-6940

EMERGENCY CALL LIST

	<u>OFFICE</u>	<u>MOBILE</u>
COG OPERATING LLC OFFICE	575-748-6940	
Dallas Daley	432-818-2329	432-631-6977

EMERGENCY RESPONSE NUMBERS

	<u>OFFICE</u>
STATE POLICE	575-748-9718
EDDY COUNTY SHERIFF	575-746-2701
EMERGENCY MEDICAL SERVICES (AMBULANCE)	911 or 575-746-2701
EDDY COUNTY EMERGENCY MANAGEMENT (HARRY BURGESS)	575-887-9511
STATE EMERGENCY RESPONSE CENTER (SERC)	575-476-9620
CARLSBAD POLICE DEPARTMENT	575-885-2111
CARLSBAD FIRE DEPARTMENT	575-885-3125
NEW MEXICO OIL CONSERVATION DIVISION	575-748-1283
INDIAN FIRE & SAFETY	800-530-8693
HALLIBURTON SERVICES	800-844-8451

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 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 190766

CONDITIONS

Operator: COG OPERATING LLC 600 W Illinois Ave Midland, TX 79701	OGRID: 229137
	Action Number: 190766
	Action Type: [C-101] BLM - Federal/Indian Land Lease (Form 3160-3)

CONDITIONS

Created By	Condition	Condition Date
kpickford	Will require administrative order for non-standard spacing unit	3/7/2023
kpickford	Notify OCD 24 hours prior to casing & cement	3/7/2023
kpickford	Will require a File As Drilled C-102 and a Directional Survey with the C-104	3/7/2023
kpickford	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	3/7/2023
kpickford	Cement is required to circulate on both surface and intermediate1 strings of casing	3/7/2023
kpickford	Oil base muds are not to be used until fresh water zones are cased and cemented providing isolation from the oil or diesel. This includes synthetic oils. Oil based mud, drilling fluids and solids must be contained in a steel closed loop system	3/7/2023