

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

RECEIVED

FEB 23 2010

APPLICATION FOR PERMIT TO DRILL, DEEPEN, OR PLUG BACK

Bureau of Land Management
Farmington Field Office

1a. Type of Work DRILL	5. Lease Number SF-079527 Unit Reporting Number	
1b. Type of Well GAS	6. If Indian, All. or Tribe	
2. Operator BURLINGTON RESOURCES Oil & Gas Company, LP	7. Unit Agreement Name San Juan 27-4 Unit	
3. Address & Phone No. of Operator PO Box 4289, Farmington, NM 87499 (505) 326-9700	8. Farm or Lease Name RCVD FEB 1 '11 OIL CONS. DIV. DIST. 3	
4. Location of Well Surf: Unit F (SENW), 1512' FNL & 1503' FWL Bottomhole: Unit D (NWNW), 1020' FNL & 710' FWL Surf: Latitude: 36.532956° N (NAD83) Longitude: 107.206647° W Bottomhole: Latitude: 36.534293° N (NAD83) Longitude: 107.209340° W	10. Field, Pool, Wildcat Blanco MV / Basin DK 11. Sec., Twn, Rge, Mer. (NMPM) Sec. 36, T27N, R4W API # 30-039- 30926	
14. Distance in Miles from Nearest Town 90 miles / Bloomfield	12. County Rio Arriba	13. State NM
15. Distance from Proposed Location to Nearest Property or Lease Line 710'	17. Acres Assigned to Well 320.00 W/2 - MV/DK	
16. Acres in Lease 1,280.00	18. Distance from Proposed Location to Nearest Well, Drig, Compl, or Applied for on this Lease 72' from San Juan 27-4 Unit 36A (MV)	
19. Proposed Depth 8525'	20. Rotary or Cable Tools Rotary	
21. Elevations (DF, FT, GR, Etc.) 7277' GL	22. Approx. Date Work will Start	
23. Proposed Casing and Cementing Program See Operations Plan attached		
24. Authorized by: <u>Crystal Tafoya</u> Crystal Tafoya (Regulatory Tech)	Date	<u>2/23/2010</u>

Hold C104
for Directional Survey
and "As Drilled" plat

PERMIT NO. APPROVAL DATE
APPROVED BY *[Signature]* TITLE AFM DATE 1/28/2011

Archaeological Report attached

Threatened and Endangered Species Report attached

NOTE: This format is issued in lieu of U.S. BLM Form 3160-3

Title 18 U.S.C. Section 1001, makes it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or presentations as to any matter within its jurisdiction.

Example Master Plan Type 3 Bond Numbers NMB-000015 and NMB-000089

FEB 08 2011

[Signature] NMOC

DRILLING OPERATIONS AUTHORIZED ARE
SUBJECT TO COMPLIANCE WITH ATTACHED
GENERAL REQUIREMENTS

Hold C104

for Directional Survey
and "As Drilled" plat

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

District I

1625 N. French Dr., Hobbs, NM 88240

District II

1301 W. Grand Avenue, Artesia, NM 88210

District III

1000 Rio Brazos Rd., Aztec, NM 87410

District IV

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

State of New Mexico
Energy, Minerals & Natural Resources Department
OIL CONSERVATION DIVISION
1220 South St. Francis Dr.
Santa Fe, NM 87505

FEB 23 2010

Form C-102

Revised October 12, 2005

Submit to Appropriate District Office

State Lease - 7 Copies

Fee Lease - 3 Copies

Bureau of Land Management
Farmington Field Office

☐ AMENDED REPORT

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹ API Number 30-039-309260		² Pool Code 71599/72319		³ Pool Name BASIN DAKOTA / BLANCO MESAVERDE	
⁴ Property Code 7452		⁵ Property Name SAN JUAN 27-4 UNIT			⁶ Well Number 150M
⁷ OGRID No. 14538		⁸ Operator Name BURLINGTON RESOURCES OIL & GAS COMPANY LP			⁹ Elevation 7277

¹⁰ SURFACE LOCATION

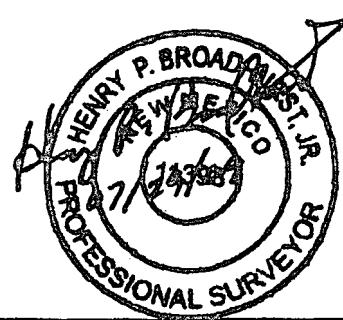
UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
F	36	27-N	4-W		1512	NORTH	1503	WEST	RIO ARriba

¹¹ Bottom Hole Location If Different From Surface

UL or lot no.	Section	Township	Range	Lot Idn	Feet from the	North/South line	Feet from the	East/West line	County
D	36	27-N	4-W		1020	NORTH	710	WEST	RIO ARriba

¹² Dedicated Acres 320.00	¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No.
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NO ALLOWABLE WILL BE ASSIGNED TO THIS COMPLETION UNTIL ALL INTERESTS HAVE BEEN
CONSOLIDATED OR A NON-STANDARD UNIT HAS BEEN APPROVED BY THE DIVISION

¹⁶ N 89°14'55" E 5251.9' (R) 1020' 710' 1503' N 58°48'05" W 928.6' N 0°07'45" W	BOTTOM HOLE NAD 83 LAT: 36.534293° N LONG: 107.208340° W NAD 27 LAT: 36°32.056951' N LONG: 107°12.524535' W	5207.7' (R) GLO 1917	¹⁷ OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and that this organization either owns a working interest or unleased mineral interest in the land including the proposed bottom hole location or has a right to drill this well at this location pursuant to a contract with an owner of such a mineral or working interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division. <i>Tracey N. Monroe</i> Signature Tracey N, Monroe Printed Name Staff Reg Tech Title and E-mail Address 8/11/09 Date
	WELL FLAG NAD 83 LAT: 36.532956° N LONG: 107.206647° W NAD 27 LAT: 36°31.976743' N LONG: 107°12.363016' W	Date of Survey: 7/8/08 Signature and Seal of Professional Surveyor:  Certificate Number: NM 11393	
W/2 DEDICATED ACREAGE USA SF-079527 SECTION 36, T-27-N, R-4-W			

GLO
1917

PROJECT PROPOSAL - New Drill / Sidetrack

San Juan Business Unit

SAN JUAN 27-4 UNIT 150M

DEVELOPMENT

Lease:		AFE #: WAN.CDR.9066				AFE \$: 1,013,620.50	
Field Name: SAN JUAN		Rig: H&P Rig 283		State: NM	County: RIO ARRIBA	API #:	
Geologist:		Phone:		Geophysicist:		Phone:	
Geoscientist:		Phone:		Prod. Engineer:		Phone:	
Res. Engineer:		Phone:		Proj. Field Lead:		Phone:	
Primary Objective (Zones):							
Zone	Zone Name						
FRR	BASIN DAKOTA (PRORATED GAS)						
RON	BLANCO MESAVERDE (PRORATED GAS)						
Location: Surface Datum Code: NAD 27 Directional							
Latitude: 36.532845	Longitude: -107.206049	X:	Y:	Section: 36	Range: 004W		
Footage X: 1503 FWL	Footage Y: 1512 FNL	Elevation: 7277	(FT)	Township: 027N			
Tolerance:							
Location: Bottom Hole Datum Code: NAD 27 Directional							
Latitude: 36.534282	Longitude: -107.208742	X:	Y:	Section: 36	Range: 004W		
Footage X: 710 FWL	Footage Y: 1020 FNL	Elevation:	(FT)	Township: 027N			
Tolerance:							
Location Type: Restricted		Start Date (Est.): 1/1/2011		Completion Date:		Date In Operation:	
Formation Data: Assume KB = 7292		Units = FT					
Formation Call & Casing Points	Depth (TVD in Ft)	SS (Ft)	Depletion (Yes/No)	BHP (PSIG)	BHT	Remarks	
Surface Casing	200	7092	☐			12-1/4 hole. 200' 9 5/8" 32.3 ppf, H-40, STC casing. Cement with 121 cuft. Circulate cement to surface.	
NACIMIENTO	2416	4876	☐				
OJO ALAMO	3536	3756	☐				
KIRTLAND	3664	3628	☐				
FRUITLAND	3800	3492	☐			Possible Gas	
PICTURED CLIFFS	4088	3204	☐				
LEWIS	4165	3127	☐				
Intermediate Casing	4265	3027	☐			8 3/4" Hole. 7", 23 ppf, J-55, LTC Casing. Cement with 994 cuft. Circulate cement to surface.	
HUERFANITO BENTONITE	4595	2697	☐				
CHACRA	5056	2236	☐				
UPPER CLIFF HOUSE	5588	1704	☐			Gas; Est. Top Perf - 5590 (1702)	
MASSIVE CLIFF HOUSE	5791	1501	☐	870		Gas; Cliffhouse is dry	
MENEFEE	5917	1375	☐				
POINT LOOKOUT	6218	1074	☐				
MANCOS	6764	528	☐				
UPPER GALLUP	7388	-96	☐				
GREENHORN	8198	-906	☐				
GRANEROS	8261	-969	☐				
TWO WELLS	8294	-1002	☐	3186		Gas	
PAGUATE	8389	-1097	☐				
UPPER CUBERO	8412	-1120	☐				
LOWER CUBERO	8454	-1162	☐			Est. Btm Perf - 8484 (-1192) based on offset wells	

PROJECT PROPOSAL - New Drill / Sidetrack

San Juan Business Unit

SAN JUAN 27-4 UNIT 150M

DEVELOPMENT

OAK CANYON	8486	-1194	☐	6-1/4" hole, 4-1/2" 11.6 ppf, J-55 / L-80, LTC casing. Cement w/ 580 cuft. Circulate cement a minimum of 100' inside the previous casing string. TD - T/ENCN
Total Depth	8525	-1233	☐	
ENCINAL	8525	-1233	☐	

Reference Wells:

Reference Type	Well Name	Comments
Production	Champlin 1E	27N 4W 35 SE NW SE
Production	SJ 27-4 150	27N 4W 36 SE NW SW
Production	Champlin 6-25	27N 4W 25 NW SE NW
Production	Champlin 4E	27N 4W 35 SE NW NE

Logging Program:

Intermediate Logs: ☐ Log only if show ☐ GR/ILD ☐ Triple Combo

TD Logs: ☐ Triple Combo ☐ Dipmeter ☐ RFT ☐ Sonic ☐ VSP ☐ TDT ☒ Other

Cased Hole GR / CBL

Mudlog from 100' above top of GRHN to TD - mudlogger will call TD.

Additional Information:

Log Type	Stage	From (Ft)	To (Ft)	Tool Type/Name	Remarks
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ConocoPhillips or its affiliates

Planning Report

Database:	EDM Central Planning	Local Co-ordinate Reference:	Well SJ 27-4 #150M
Company:	ConocoPhillips SJB	TVD Reference:	RKB @ 7292.0ft (Original Well Elev)
Project:	San Juan Basin - New Mexico Wells	MD Reference:	RKB @ 7292.0ft (Original Well Elev)
Site:	San Juan 27 Wells	North Reference:	True
Well:	SJ 27-4 #150M	Survey Calculation Method:	Minimum Curvature
Wellbore:	Principal Wellbore		
Design:	Plan #1		

Project:	San Juan Basin - New Mexico Wells, New Mexico, Directional "S"		
Map System:	US State Plane 1927 (Exact solution)	System Datum:	Mean Sea Level
Geo Datum:	NAD 1927 (NADCON CONUS)		
Map Zone:	New Mexico West 3003		Using geodetic scale factor

Site	San Juan 27 Wells				
Site Position:		Northing:	2,032,945.19 ft	Latitude:	36° 35' 7.965 N
From:	Lat/Long	Easting:	677,235.72 ft	Longitude:	107° 13' 46.766 W
Position Uncertainty:	15.0 ft	Slot Radius:	"	Grid Convergence:	0.36 °

Well	SJ 27-4 #150M					
Well Position	+N/-S	0.0 ft	Northing:	2,013,841.08 ft	Latitude:	36° 31' 58.605 N
	+E/-W	0.0 ft	Easting:	684,291.51 ft	Longitude:	107° 12' 21.781 W
Position Uncertainty		5.0 ft	Wellhead Elevation:	ft	Ground Level:	7,277.0 ft

Wellbore:	Principal Wellbore				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	BGGM2009	12/22/2009	9.81	63.46	50,852

Design:	Plan #1			
Audit Notes:				
Version:	Phase:	PROTOTYPE	Tie On Depth:	0.0
Vertical Section:	Depth From (TVD) (ft)	+N/-S (ft)	+E/-W (ft)	Direction (°)
	0.0	0.0	0.0	301.61

Plan Sections										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	TFO (°)	Target
0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.00	0.00	
900.0	0.00	0.00	900.0	0.0	0.0	0.00	0.00	0.00	0.00	
1,915.2	20.30	301.61	1,894.1	93.3	-151.6	2.00	2.00	0.00	301.61	
3,736.6	20.30	301.61	3,602.3	424.5	-689.9	0.00	0.00	0.00	0.00	
4,413.4	0.00	0.00	4,265.0	486.7	-790.9	3.00	-3.00	0.00	180.00	SJ 27-4 #150M - ICP
8,673.4	0.00	0.00	8,525.0	486.7	-790.9	0.00	0.00	0.00	0.00	SJ 27-4 #150M - PCP

ConocoPhillips or its affiliates

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Site:	San Juan 27 Wells	North Reference:	True
Well:	SJ 27-4 #150M	Survey Calculation Method:	Minimum Curvature
Wellbore:	Principal Wellbore		
Design:	Plan #1		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
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
Surface									
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
900.0	0.00	0.00	900.0	0.0	0.0	0.0	0.00	0.00	0.00
1,000.0	2.00	301.61	1,000.0	0.9	-1.5	1.7	2.00	2.00	0.00
1,100.0	4.00	301.61	1,099.8	3.7	-5.9	7.0	2.00	2.00	0.00
1,200.0	6.00	301.61	1,199.5	8.2	-13.4	15.7	2.00	2.00	0.00
1,300.0	8.00	301.61	1,298.7	14.6	-23.7	27.9	2.00	2.00	0.00
1,400.0	10.00	301.61	1,397.5	22.8	-37.1	43.5	2.00	2.00	0.00
1,500.0	12.00	301.61	1,495.6	32.8	-53.3	62.6	2.00	2.00	0.00
1,600.0	14.00	301.61	1,593.1	44.6	-72.5	85.1	2.00	2.00	0.00
1,700.0	16.00	301.61	1,689.6	58.2	-94.5	111.0	2.00	2.00	0.00
1,800.0	18.00	301.61	1,785.3	73.5	-119.4	140.2	2.00	2.00	0.00
1,900.0	20.00	301.61	1,879.8	90.5	-147.1	172.8	2.00	2.00	0.00
1,915.2	20.30	301.61	1,894.1	93.3	-151.6	178.0	2.00	2.00	0.00
2,000.0	20.30	301.61	1,973.6	108.7	-176.7	207.4	0.00	0.00	0.00
2,100.0	20.30	301.61	2,067.4	126.9	-206.2	242.1	0.00	0.00	0.00
2,200.0	20.30	301.61	2,161.2	145.1	-235.8	276.8	0.00	0.00	0.00
2,300.0	20.30	301.61	2,255.0	163.3	-265.3	311.5	0.00	0.00	0.00
2,400.0	20.30	301.61	2,348.8	181.4	-294.9	346.2	0.00	0.00	0.00
2,471.7	20.30	301.61	2,416.0	194.5	-316.1	371.1	0.00	0.00	0.00
Nacimiento									
2,500.0	20.30	301.61	2,442.5	199.6	-324.4	380.9	0.00	0.00	0.00
2,600.0	20.30	301.61	2,536.3	217.8	-354.0	415.6	0.00	0.00	0.00
2,700.0	20.30	301.61	2,630.1	236.0	-383.5	450.3	0.00	0.00	0.00
2,800.0	20.30	301.61	2,723.9	254.2	-413.1	485.0	0.00	0.00	0.00
2,900.0	20.30	301.61	2,817.7	272.4	-442.6	519.7	0.00	0.00	0.00
3,000.0	20.30	301.61	2,911.5	290.6	-472.2	554.4	0.00	0.00	0.00
3,100.0	20.30	301.61	3,005.3	308.7	-501.7	589.1	0.00	0.00	0.00
3,200.0	20.30	301.61	3,099.1	326.9	-531.3	623.8	0.00	0.00	0.00
3,300.0	20.30	301.61	3,192.8	345.1	-560.9	658.5	0.00	0.00	0.00
3,400.0	20.30	301.61	3,286.6	363.3	-590.4	693.2	0.00	0.00	0.00
3,500.0	20.30	301.61	3,380.4	381.5	-620.0	727.9	0.00	0.00	0.00
3,600.0	20.30	301.61	3,474.2	399.7	-649.5	762.6	0.00	0.00	0.00
3,665.9	20.30	301.61	3,536.0	411.6	-669.0	785.5	0.00	0.00	0.00
Ojo Alamo									
3,700.0	20.30	301.61	3,568.0	417.8	-679.1	797.3	0.00	0.00	0.00
3,736.6	20.30	301.61	3,602.3	424.5	-689.9	810.0	0.00	0.00	0.00
3,800.0	18.40	301.61	3,662.1	435.5	-707.8	831.0	3.00	-3.00	0.00
3,802.0	18.34	301.61	3,664.0	435.8	-708.3	831.7	3.00	-3.00	0.00
Kirtland									
3,900.0	15.40	301.61	3,757.8	450.7	-732.5	860.1	3.00	-3.00	0.00
3,943.6	14.09	301.61	3,800.0	456.6	-742.0	871.2	3.00	-3.00	0.00
Fruitland									
4,000.0	12.40	301.61	3,854.9	463.3	-753.0	884.1	3.00	-3.00	0.00
4,100.0	9.40	301.61	3,953.0	473.2	-769.1	903.0	3.00	-3.00	0.00

ConocoPhillips or its affiliates

Planning Report

Database:	EDM Central Planning	Local Co-ordinate Reference:	Well SJ 27-4 #150M
Company:	ConocoPhillips SJB	TVD Reference:	RKB @ 7292.0ft (Original Well Elev)
Project:	San Juan Basin - New Mexico Wells	MD Reference:	RKB @ 7292.0ft (Original Well Elev)
Site:	San Juan 27 Wells	North Reference:	True
Well:	SJ 27-4 #150M	Survey Calculation Method:	Minimum Curvature
Wellbore:	Principal Wellbore		
Design:	Plan #1		

Planned Survey										
Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)	
4,200.0	6.40	301.61	4,052.1	480.4	-780.8	916.8	3.00	-3.00	0.00	
4,236.1	5.32	301.61	4,088.0	482.4	-783.9	920.5	3.00	-3.00	0.00	
Pictured Cliffs										
4,300.0	3.40	301.61	4,151.7	484.9	-788.1	925.3	3.00	-3.00	0.00	
4,313.3	3.00	301.61	4,165.0	485.3	-788.7	926.1	3.00	-3.00	0.00	
Lewis										
4,400.0	0.40	301.61	4,251.6	486.7	-790.9	928.6	3.00	-3.00	0.00	
4,413.4	0.00	0.00	4,265.0	486.7	-790.9	928.7	3.00	-3.00	0.00	
Intermediate - SJ 27-4 #150M - ICP										
4,500.0	0.00	0.00	4,351.6	486.7	-790.9	928.7	0.00	0.00	0.00	
4,600.0	0.00	0.00	4,451.6	486.7	-790.9	928.7	0.00	0.00	0.00	
4,700.0	0.00	0.00	4,551.6	486.7	-790.9	928.7	0.00	0.00	0.00	
4,743.4	0.00	0.00	4,595.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Huerfano Bentonite										
4,800.0	0.00	0.00	4,651.6	486.7	-790.9	928.7	0.00	0.00	0.00	
4,900.0	0.00	0.00	4,751.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,000.0	0.00	0.00	4,851.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,100.0	0.00	0.00	4,951.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,200.0	0.00	0.00	5,051.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,204.4	0.00	0.00	5,056.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Chacra										
5,300.0	0.00	0.00	5,151.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,400.0	0.00	0.00	5,251.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,500.0	0.00	0.00	5,351.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,600.0	0.00	0.00	5,451.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,700.0	0.00	0.00	5,551.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,736.4	0.00	0.00	5,588.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Upper Cliffhouse										
5,800.0	0.00	0.00	5,651.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,900.0	0.00	0.00	5,751.6	486.7	-790.9	928.7	0.00	0.00	0.00	
5,939.4	0.00	0.00	5,791.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Mass. Cliffhouse										
6,000.0	0.00	0.00	5,851.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,065.4	0.00	0.00	5,917.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Menefee										
6,100.0	0.00	0.00	5,951.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,200.0	0.00	0.00	6,051.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,300.0	0.00	0.00	6,151.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,366.4	0.00	0.00	6,218.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Pt. Lookout										
6,400.0	0.00	0.00	6,251.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,500.0	0.00	0.00	6,351.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,600.0	0.00	0.00	6,451.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,700.0	0.00	0.00	6,551.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,800.0	0.00	0.00	6,651.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,900.0	0.00	0.00	6,751.6	486.7	-790.9	928.7	0.00	0.00	0.00	
6,912.4	0.00	0.00	6,764.0	486.7	-790.9	928.7	0.00	0.00	0.00	
Mancos Shale										
7,000.0	0.00	0.00	6,851.6	486.7	-790.9	928.7	0.00	0.00	0.00	
7,100.0	0.00	0.00	6,951.6	486.7	-790.9	928.7	0.00	0.00	0.00	
7,200.0	0.00	0.00	7,051.6	486.7	-790.9	928.7	0.00	0.00	0.00	
7,300.0	0.00	0.00	7,151.6	486.7	-790.9	928.7	0.00	0.00	0.00	

ConocoPhillips or its affiliates
Planning Report

Database:	EDM Central Planning	Local Co-ordinate Reference:	Well SJ 27-4 #150M
Company:	ConocoPhillips SJB	TVD Reference:	RKB @ 7292.0ft (Original Well Elev)
Project:	San Juan Basin - New Mexico Wells	MD Reference:	RKB @ 7292.0ft (Original Well Elev)
Site:	San Juan 27 Wells	North Reference:	True
Well:	SJ 27-4 #150M	Survey Calculation Method:	Minimum Curvature
Wellbore:	Principal Wellbore		
Design:	Plan #1		

Planned Survey

Measured Depth (ft)	Inclination (°)	Azimuth (°)	Vertical Depth (ft)	+N/-S (ft)	+E/-W (ft)	Vertical Section (ft)	Dogleg Rate (°/100ft)	Build Rate (°/100ft)	Turn Rate (°/100ft)
7,400.0	0.00	0.00	7,251.6	486.7	-790.9	928.7	0.00	0.00	0.00
7,500.0	0.00	0.00	7,351.6	486.7	-790.9	928.7	0.00	0.00	0.00
7,536.4	0.00	0.00	7,388.0	486.7	-790.9	928.7	0.00	0.00	0.00
Gallup									
7,600.0	0.00	0.00	7,451.6	486.7	-790.9	928.7	0.00	0.00	0.00
7,700.0	0.00	0.00	7,551.6	486.7	-790.9	928.7	0.00	0.00	0.00
7,800.0	0.00	0.00	7,651.6	486.7	-790.9	928.7	0.00	0.00	0.00
7,900.0	0.00	0.00	7,751.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,000.0	0.00	0.00	7,851.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,100.0	0.00	0.00	7,951.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,200.0	0.00	0.00	8,051.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,300.0	0.00	0.00	8,151.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,346.4	0.00	0.00	8,198.0	486.7	-790.9	928.7	0.00	0.00	0.00
Greenhorn									
8,400.0	0.00	0.00	8,251.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,409.4	0.00	0.00	8,261.0	486.7	-790.9	928.7	0.00	0.00	0.00
Graneros									
8,442.4	0.00	0.00	8,294.0	486.7	-790.9	928.7	0.00	0.00	0.00
Two Wells									
8,500.0	0.00	0.00	8,351.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,537.4	0.00	0.00	8,389.0	486.7	-790.9	928.7	0.00	0.00	0.00
Paguate									
8,560.4	0.00	0.00	8,412.0	486.7	-790.9	928.7	0.00	0.00	0.00
Upper Cubero									
8,600.0	0.00	0.00	8,451.6	486.7	-790.9	928.7	0.00	0.00	0.00
8,602.4	0.00	0.00	8,454.0	486.7	-790.9	928.7	0.00	0.00	0.00
Lower Cubero									
8,634.4	0.00	0.00	8,486.0	486.7	-790.9	928.7	0.00	0.00	0.00
Oak Canyon									
8,673.4	0.00	0.00	8,525.0	486.7	-790.9	928.7	0.00	0.00	0.00
Encinal - Production - SJ 27-4 #150M - PCP									

Targets

Target Name	hit/miss target	Dip Angle (°)	Dip Dir. (°)	TVD (ft)	+N/-S (ft)	+E/-W (ft)	Northing (ft)	Easting (ft)	Latitude	Longitude
SJ 27-4 #150M - ICP	- plan hits target center	0.00	0.00	4,265.0	486.7	-790.9	2,014,322.58	683,497.46	36° 32' 3.417 N	107° 12' 31.472 W
	- Point									
SJ 27-4 #150M - PCP	- plan hits target center	0.00	0.00	8,525.0	486.7	-790.9	2,014,322.60	683,497.49	36° 32' 3.417 N	107° 12' 31.472 W
	- Point									

ConocoPhillips or its affiliates

Planning Report

Database:	EDM Central Planning	Local Co-ordinate Reference:	Well SJ 27-4 #150M
Company:	ConocoPhillips SJB	TVD Reference:	RKB @ 7292.0ft (Original Well Elev)
Project:	San Juan Basin - New Mexico Wells	MD Reference:	RKB @ 7292.0ft (Original Well Elev)
Site:	San Juan 27 Wells	North Reference:	True
Well:	SJ 27-4 #150M	Survey Calculation Method:	Minimum Curvature
Wellbore:	Principal Wellbore		
Design:	Plan #1		

Casing Points					
Measured Depth (ft)	Vertical Depth (ft)	Name	Casing Diameter (")	Hole Diameter (")	
200.0	200.0	Surface	9-5/8	12-1/4	
4,413.4	4,265.0	Intermediate	7	8-3/4	
8,673.4	8,525.0	Production	4-1/2	6-1/4	

Formations						
Measured Depth (ft)	Vertical Depth (ft)	Name	Lithology	Dip (°)	Dip Direction (°)	
2,471.7	2,416.0	Nacimiento		0.00		
8,602.4	8,454.0	Lower Cubero		0.00		
4,313.3	4,165.0	Lewis		0.00		
6,366.4	6,218.0	Pt. Lookout		0.00		
8,634.4	8,486.0	Oak Canyon		0.00		
7,536.4	7,388.0	Gallup		0.00		
5,204.4	5,056.0	Chacra		0.00		
3,802.0	3,664.0	Kirtland		0.00		
8,537.4	8,389.0	Paguate		0.00		
4,236.1	4,088.0	Pictured Cliffs		0.00		
8,560.4	8,412.0	Upper Cubero		0.00		
8,409.4	8,261.0	Graneros		0.00		
8,346.4	8,198.0	Greenhorn		0.00		
5,939.4	5,791.0	Mass. Cliffhouse		0.00		
8,673.4	8,525.0	Encinal		0.00		
4,743.4	4,595.0	Huerfanito Bentonite		0.00		
5,736.4	5,588.0	Upper Cliffhouse		0.00		
3,665.9	3,536.0	Ojo Alamo		0.00		
6,912.4	6,764.0	Mancos Shale		0.00		
3,943.6	3,800.0	Fruitland		0.00		
6,065.4	5,917.0	Menefee		0.00		
8,442.4	8,294.0	Two Wells		0.00		

REFERENCE INFORMATION

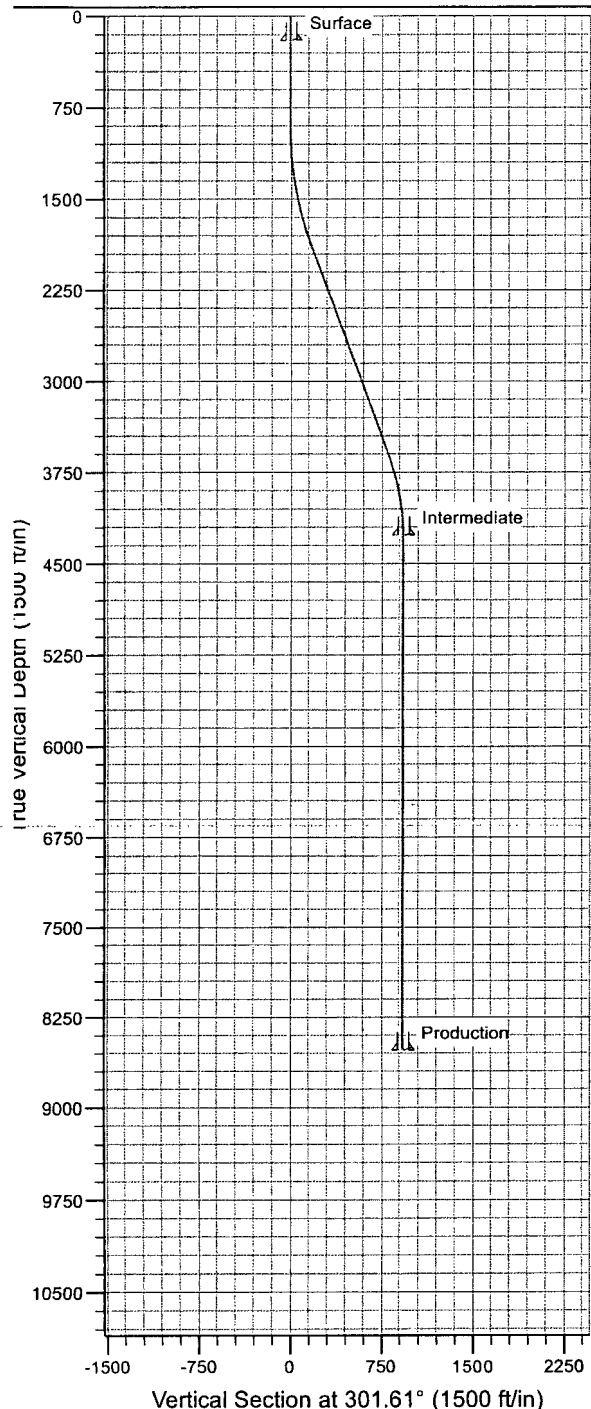
RKB @ 7292.0ft (Original Well Elev)
Ground Elevation 7277.0
Reference Lat: 36° 31' 58.605 N
Reference Long: 107° 12' 21.781 W

Project: San Juan Basin - New Mexico Wells
Site: San Juan 27 Wells
Well: SJ 27-4 #150M
Wellbore: Principal Wellbore
Design: Plan #1



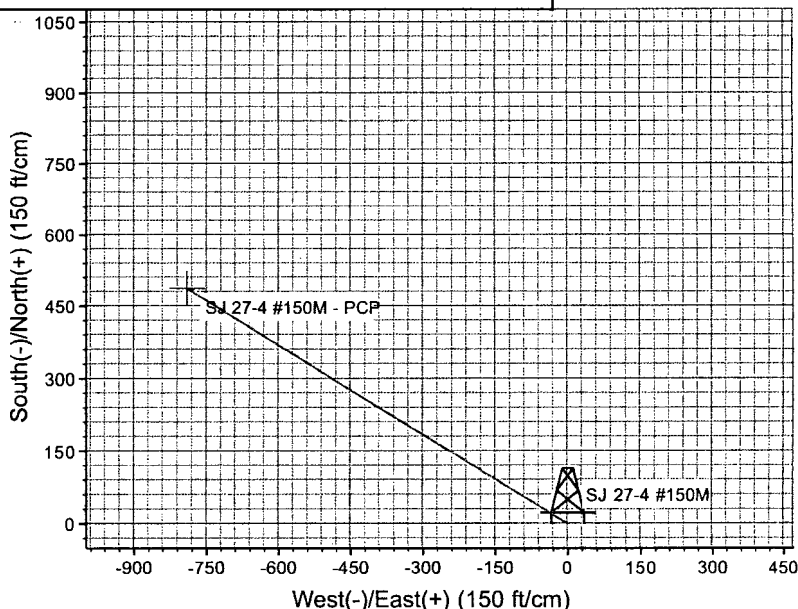
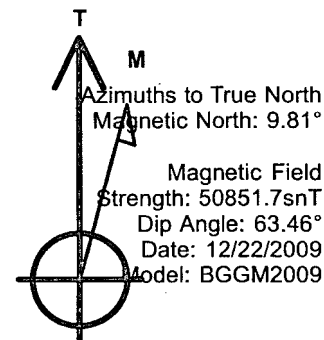
SECTION DETAILS

Sec	MD	Inc	Azi	TVD	+N/-S	+E/-W	DLeg	TFace	VSec	Target
1	0.0	0.00	0.00	0.0	0.0	0.0	0.00	0.00	0.0	
2	900.0	0.00	0.00	900.0	0.0	0.0	0.00	0.00	0.0	
3	1915.2	20.30	301.61	1894.1	93.3	-151.6	2.00	301.61	178.0	
4	3736.6	20.30	301.61	3602.3	424.5	-689.9	0.00	0.00	810.0	
5	4413.4	0.00	0.00	4265.0	486.7	-790.9	3.00	180.00	928.7	SJ 27-4 #150M - ICP
6	8673.4	0.00	0.00	8525.0	486.7	-790.9	0.00	0.00	928.7	SJ 27-4 #150M - PCP



FORMATION TOP DETAILS

TVDPath	MDPath	Formation
1075.0	2471.7	Nacimiento
2195.0	3665.9	Ojo Alamo
2323.0	3802.0	Kirtland
2459.0	3943.6	Fruitland
2747.0	4236.1	Pictured Cliffs
2824.0	4313.3	Lewis
3254.0	4743.4	Huerfano Bentonite
3715.0	5204.4	Chacra
4247.0	5736.4	Upper Cliffhouse
4450.0	5939.4	Mass. Cliffhouse
4576.0	6065.4	Menefee
4877.0	6366.4	Pt. Lookout
5423.0	6912.4	Mancos Shale
6047.0	7536.4	Gallup
6857.0	8346.4	Greenhorn
6920.0	8409.4	Graneros
6953.0	8442.4	Two Wells
7048.0	8537.4	Paguate
7071.0	8560.4	Upper Cubero
7113.0	8602.4	Lower Cubero
7145.0	8634.4	Oak Canyon
7184.0	8673.4	Encinal



SAN JUAN 27-4 UNIT #150M

1512' FNL, 1503' FWL

SECTION 36, T-27-N, R-4-W, N.M.P.M.,

RIO ARriba COUNTY, NEW MEXICO

ELEV.: 7277 NAVD88 DATE: JULY 8, 2009

NO NEW ACCESS



1. RESERVE PIT DIKE: TO BE 8' ABOVE DEEP SIDE (OVERFLOW-3' WIDE AND 1' ABOVE SHALLOW SIDE).
2. C.C.I. SURVEYS IS NOT LIABLE FOR UNDERGROUND UTILITIES OR PIPELINES.
CONTRACTOR SHOULD CALL ONE-CALL FOR LOCATION OF ANY MARKED OR UNMARKED BURIED
PIPELINES OR CABLES ON WELL PAD AND OR ACCESS ROAD AT LEAST TWO (2) WORKING DAYS PRIOR TO CONSTRUCTION.