

C-104 Submit Electronically Via OCD Permitting	State of New Mexico Energy, Minerals & Natural Resources Department OIL CONSERVATION DIVISION	Revised July 9, 2024
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REQUEST FOR ALLOWABLE AND AUTHORIZATION TO TRANSPORT**Section 1 - Operator and Well Information**

Submittal Type: ☐ Test Allowable (C-104RT) ☒ New Well (C-104NW) ☐ Recomplete (C-104RC) ☐ Pay Add (C-104RC) ☐ Amended	
Operator Name: LOGOS OPERATING, LLC	OGRID: 289408
Property Name and Well Number: ROSA UNIT 700H	Property Code: 320608
Mineral Owner: ☐ State ☐ Fee ☐ Tribal ☒ Federal	API Number: 30-039-31441
Pool Name: BASIN MANCOS	Pool Code: 97232

Section 2 – Surface Location

UL G	Section 7	Township 31N	Range 5W	Lot	Ft. from N/S 2617' FNL	Ft. from E/W 1351' FEL	Latitude 36.914073	Longitude -107.399356	County RIO ARRIBA
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Section 3 – Completion Information

Producing Method Flowing	Ready Date 10/17/2024	Perforations MD 7450' - 17998'	Perforations TVD 6938' - 6932'
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Section 4 – Action IDs for Submissions and Order Numbers

List Action IDs for Drilling Sundries	Was an Order required / needed (Y/N), if yes list Order number:
C-104 RT Action ID (if C-104NW): 386913	Communitization Agreement ☒ Yes ☐ No, Order No. NMNM078407E
Surface Casing Action ID: 335982	Unit: ☒ Yes ☐ No, Order No. R-13457
Intermediate 1 Casing Action ID: 346225	Compulsory Pooling: ☐ Yes ☒ No, Order No.
Intermediate 2 Casing Action ID: 366080	Down Hole Commingling: ☐ Yes ☒ No, Order No.
Production Casing Action ID: 367347	Surface Commingling: ☐ Yes ☒ No, Order No.
All casing was pressure tested in accordance with NMAC ☒ Yes ☐ No	Non-standard Location: ☐ Yes ☒ No ☐ Common ownership Order No.
Liner 1 Action ID: N/A	Non-standard Proration: ☐ Yes ☒ No, Order No.
Casing was installed prior to OCD's Action ID system (Y/N): N	Simultaneous Dedication: ☐ Yes ☒ No, Order No.

Section 5 - Operator Signature and Certification

☒ I hereby certify that the required Water Use Report has been, or will be, submitted for this well's completion.	
☒ I hereby certify that the required Fracfocus disclosure has been, or will be, submitted for this well's completion.	
☒ I hereby certify that the rules of the Oil Conservation Division have been complied with and that the information given above is true and complete to the best of my knowledge and belief.	
Name 	
Title Regulatory Specialist II	Date 11/18/2024



Request for Confidential "Tight Hole" Status

LOGOS Operating, LLC
Rosa Unit 700H
API# 30-039-31441
G Section 7 T31N R05W
Rio Arriba County, New Mexico

Per 19.15.7.16 (C) of the New Mexico Administrative Code (NMAC) regarding the *Well Completion or Recompletion Report and Log (Form C-105)*, LOGOS Operating, LLC respectfully requests the Division to maintain the confidentiality of Form C-105 and all associated documentation as of 10/17/2024 for a period of 90 days following the acceptance of the referenced documents.

Sincerely,

A handwritten signature in blue ink that reads "Etta Trujillo".

Etta Trujillo
Regulatory Specialist II
Email: etrujillo@logosresourcesllc.com
Office: 505-324-4154
Cell: 505-258-2936

C-102 Submit Electronically Via OCD Permitting	State of New Mexico Energy, Minerals & Natural Resources Department OIL CONSERVATION DIVISION	Revised July 9, 2024	
		Submittal Type	☐ Initial Submittal
			☐ Amended Report
		☒ As Drilled	

WELL LOCATION INFORMATION

API Number 30-039-31441	Pool Code 97232	Pool Name BASIN MANCOS
Property Code 320608	Property Name ROSA UNIT	Well Number 700H
OGRID No. 289408	Operator Name LOGOS OPERATING, LLC	Ground Level Elevation 6295'
Surface Owner: ☐ State ☐ Fee ☐ Tribal ☒ Federal		Mineral Owner: ☐ State ☐ Fee ☐ Tribal ☒ Federal

Surface Location

UL G	Section 7	Township 31N	Range 5W	Lot	Feet from N/S Line 2617' NORTH	Feet from E/W Line 1351' EAST	Latitude 36.914073 °N	Longitude -107.399356 °W	County RIO ARRIBA
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Bottom Hole Location

UL E	Section 11	Township 31N	Range 6W	Lot	Feet from N/S Line 1577' NORTH	Feet from E/W Line 1122' WEST	Latitude 36.917081 °N	Longitude -107.437389 °W	County RIO ARRIBA
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Dedicated Acres 823.03	Penetrated Spacing Unit: N/2 - Sections 11, 12, T31N, R6W N/2 - Section 7, T31N, R5W	Infill or Defining Well Infill	Defining Well API	Overlapping Spacing Unit ☐ Yes ☒ No	Consolidation Code Unitization
Order Numbers R-13457			Well setbacks are under Common Ownership: ☐ Yes ☒ No		

Kick Off Point (KOP)

UL H	Section 7	Township 31N	Range 5W	Lot	Feet from N/S Line 1594' NORTH	Feet from E/W Line 1141' EAST	Latitude 36.916880 °N	Longitude -107.398642 °W	County RIO ARRIBA
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First Take Point (FTP)

UL G	Section 7	Township 31N	Range 5W	Lot	Feet from N/S Line 1363' NORTH	Feet from E/W Line 1748' EAST	Latitude 36.917520 °N	Longitude -107.400721 °W	County RIO ARRIBA
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Last Take Point (LTP)

UL E	Section 11	Township 31N	Range 6W	Lot	Feet from N/S Line 1575' NORTH	Feet from E/W Line 1300' WEST	Latitude 36.917087 °N	Longitude -107.436777 °W	County RIO ARRIBA
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Unitized Area or Area of Uniform Interest ROSA UNIT	Spacing Unit Type ☒ Horizontal ☐ Vertical	Ground Floor Elevation
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OPERATOR CERTIFICATION I hereby certify that the information contained herein is true and complete to the best of my knowledge and belief, and, if the well is a vertical or directional well, 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 a working interest or unleased mineral interest, or to a voluntary pooling agreement or a compulsory pooling order heretofore entered by the division. If this well is a horizontal well, I further certify that this organization has received the consent of at least one lessee or owner of a working interest or unleased mineral interest in each tract (in the target pool or formation) in which any part of the well's completed interval will be located or obtained a compulsory pooling order from the division. Etta Trujillo Signature 8/28/2024 Date Etta Trujillo Printed Name etrujillo@logosresourcesllc.com E-mail Address	SURVEYOR CERTIFICATION I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief. JASON C. EDWARDS NEW MEXICO 15269 8/28/2024 REGISTERED PROFESSIONAL SURVEYOR JASON C. EDWARDS Signature and Seal of Professional Surveyor Certificate Number 15269 Date of Survey NOVEMBER 15, 2021
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FIRST TAKE POINT (C)
1363' FNL 1748' FEL
SECTION 7, T31N, R5W
LAT 36.917514°N
LONG -107.400118°W
DATUM: NAD1927

KICK OFF POINT (B)
1594' FNL 1141' FEL
SECTION 7, T31N, R5W
LAT 36.916875°N
LONG -107.398039°W
DATUM: NAD1927

LAT 36.917520°N
LONG -107.400721°W
DATUM: NAD1983

LAT 36.916880°N
LONG -107.398642°W
DATUM: NAD1983

T31N R6W (RECORD)
NORTH 2640.00'
N0°12'07"W 2636.49'
(MEASURED)

T31N R5W (RECORD)
N0°02'W 2642.64'
N0°12'05"W 2632.33'
(MEASURED)

(RECORD)
N89°57'W 1832.82'
(RECORD)
S89°53'00"W 1832.26'
(MEASURED)

(RECORD)
S89°50'E 1185.36'
(RECORD)
N89°57'49"E 1178.25'
(MEASURED)

(RECORD)
N0°03'E 2640.00'
(RECORD)
N0°10'08"W 2659.33'
(MEASURED)

(RECORD)
N89°57'W 2640.00'
(RECORD)
S89°47'35"W 2651.82'
(MEASURED)

(RECORD)
S89°50'E 2640.00'
(RECORD)
N89°51'20"E 2630.31'
(MEASURED)

(RECORD)
S89°54'E 2644.62'
(RECORD)
N89°51'49"E 2646.13'
(MEASURED)

(RECORD)
S89°54'E 2644.62'
(RECORD)
N89°57'35"E 2646.27'
(MEASURED)

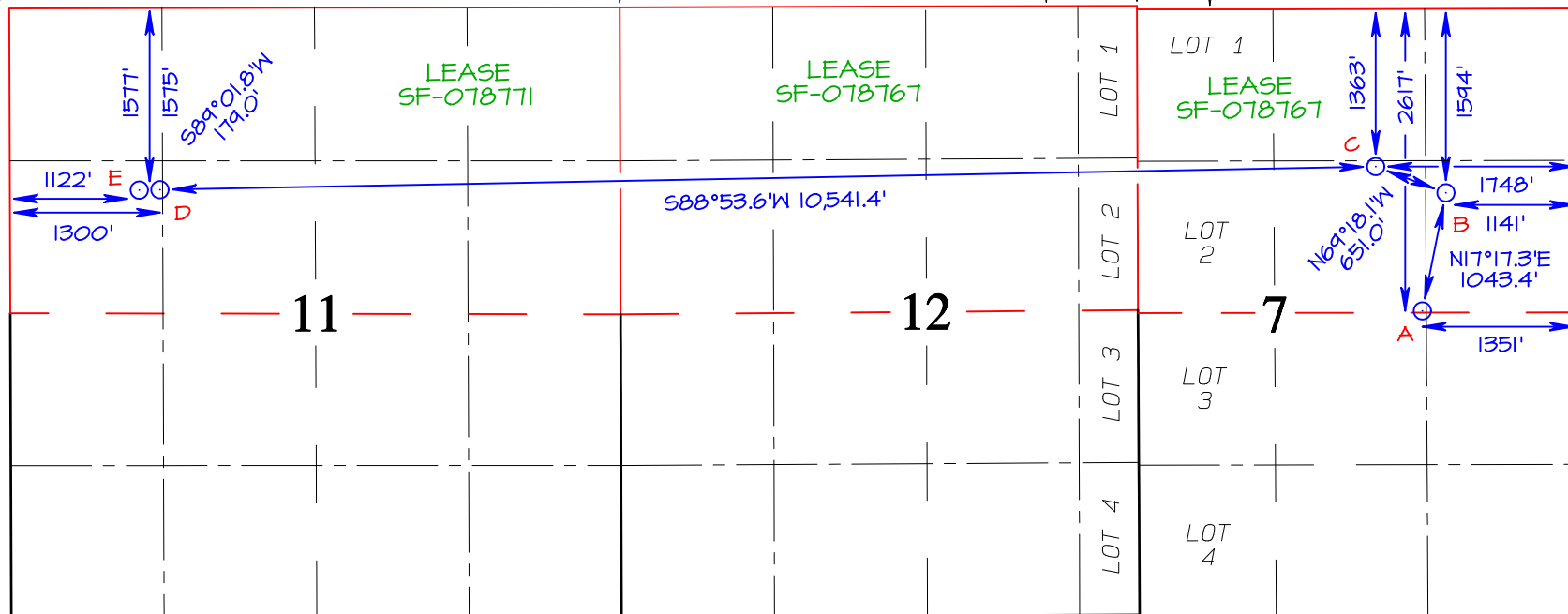
16

(RECORD)
N0°03'E 2640.00'
(RECORD)
N0°12'15"W 2641.61'
(MEASURED)

(RECORD)
N0°03'E 2640.00'
(RECORD)
N0°12'15"W 2641.61'
(MEASURED)

(RECORD)
N0°21'07"W 2633.33'
(RECORD)
N0°03'W 2640.00'
(RECORD)

(RECORD)
N0°18'53"W 2634.41'
(RECORD)
N0°03'W 2640.00'
(RECORD)



BOTTOM HOLE LOCATION (E)
1577' FNL 1122' FWL
SECTION 11, T31N, R6W
LAT 36.917075°N
LONG -107.436785°W
DATUM: NAD1927

LAT 36.917081°N
LONG -107.437389°W
DATUM: NAD1983

LAST TAKE POINT (D)
1575' FNL 1300' FWL
SECTION 11, T31N, R6W
LAT 36.917081°N
LONG -107.436173°W
DATUM: NAD1927

LAT 36.917075°N
LONG -107.436785°W
DATUM: NAD1983

(MEASURED)
N0°09'29"W 2619.66'
(RECORD)
N0°03'E 2640.00'
(RECORD)

(MEASURED)
S89°44'50"W 1839.15'
(RECORD)
N89°59'W 1838.76'
(RECORD)

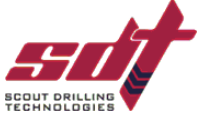
(MEASURED)
N0°17'25"W 2640.85'
(RECORD)
NORTH 2640.00'
T31N R6W (RECORD)

(MEASURED)
S89°50'E 1186.68'
(RECORD)
(MEASURED)
N0°17'37"W 2636.85'
(RECORD)

(MEASURED)
N0°17'37"W 2636.85'
(RECORD)
NORTH 2641.32'
T31N R5W (RECORD)

SURFACE LOCATION (A)
2617' FNL 1351' FEL
SECTION 7, T31N, R5W
LAT 36.914067°N
LONG -107.398753°W
DATUM: NAD1927

LAT 36.914073°N
LONG -107.399356°W
DATUM: NAD1983



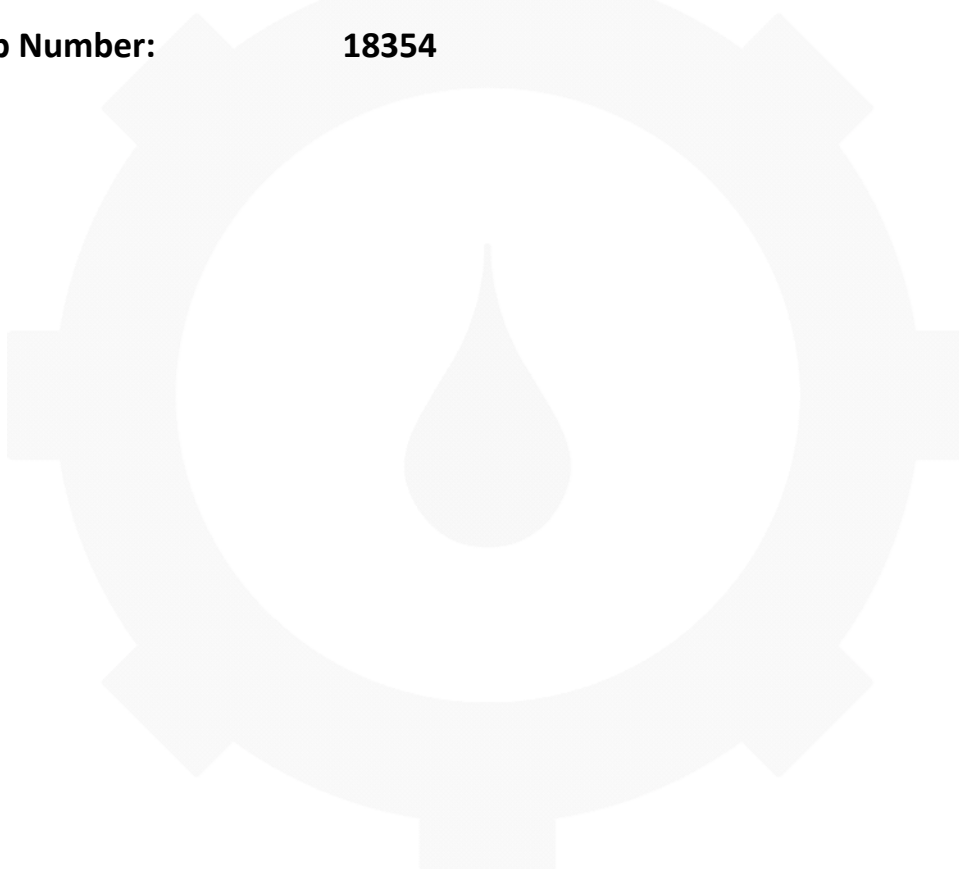
**18354
Logos Operating LLC
Rosa Unit 700H - OH
New Mexico
Rio Arriba
HP 530**

End Of Well Report - 06/28/2024

**Innovative Drilling Solutions
Data-Driven Decision**



Well Name: Rosa Unit 700H
API Number: 3003931441
County: Rio Arriba County, NM
Scout Job Number: 18354



**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

Well Summary

		Rosa Unit 700H - OH - Well Summary			
Job #	18354	Operator	Logos Operating LLC		
API Job# / AFE	/20"240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC		
Rig	HP 530	Well	Rosa Unit 700H		
County	Rio Arriba	State	New Mexico		
Latitude	36° 54' 50.663" N	Longitude	107° 23' 57.682" W		
Start Date	04/13/2024	Start Depth(Usft)	36.00		
End Date	06/28/2024	End Depth(Usft)	18177.00		
Total Days	18	Total Drilled (Usft)	18160.00		
Cost per day	11724.08	Cost per (Usft)	11.62		
Curve Lndg MD / TVD	15536.00 / 6946.01	Formation			
Curve Planned DLS	9.00	Lateral Dip	90.06		

BHA Summary											
BHA #	Bit #	Hole Size (in)	Start (Usft)	End (Usft)	Drilled (Usft)	Avg ROP (Usft/hr)	Slide %	Drig Hrs	Circ Hrs	BRT Hrs	Failed
1	1	26.000	36.00	374.00	338.00	40.56	0.00	8.33	1.38	15.67	
2	2	17.500	374.00	3500.00	3126.00	63.64	20.28	49.12	3.62	65.67	
3	3	12.250	3500.00	6385.00	2885.00	114.64	9.01	25.17	11.32	52.00	
4	4	8.500	0.00	6401.00	16.00	2.99	0.00	5.35	2.38	0.00	
5	4	8.500	6401.00	15536.00	9154.00	147.29	9.78	62.15	9.18	0.00	YES
6	5	8.500	15536.00	18177.00	2641.00	139.74	4.28	18.90	14.53	56.00	

Bit Run Record										
Bit #	Make	Model	Size (in)	Grade In	Grade Out	TFA	Drilled	Drig Hrs	ROP	
1	NOV	TK95	26.000	1-1-WT-A-X-I-NO-TD		0.785	338.00	8.33	40.56	
2	NOV	TK86	17.500	New	1-1-WT-S-X-I-NO-TD	1.571	3126.00	49.12	63.64	
3	Baker Hughes	D506VTX	12.250	New	1-1-WT-A-X-I-NO-TD	1.178	2885.00	25.17	114.64	
4	Smith	XR+	8.500	1-1-CT-N-E-I-NO-BHA		0.920	16.00	5.35	2.99	
4	Baker Hughes	DD406TS	8.500	New	1-1-CT-S-X-I-PN-BHA	0.994	9154.00	62.15	147.29	
5	Baker Hughes	DD406TS	8.500	New	1-1-WT-A-X-I-NO-TD	0.994	2641.00	18.90	139.74	

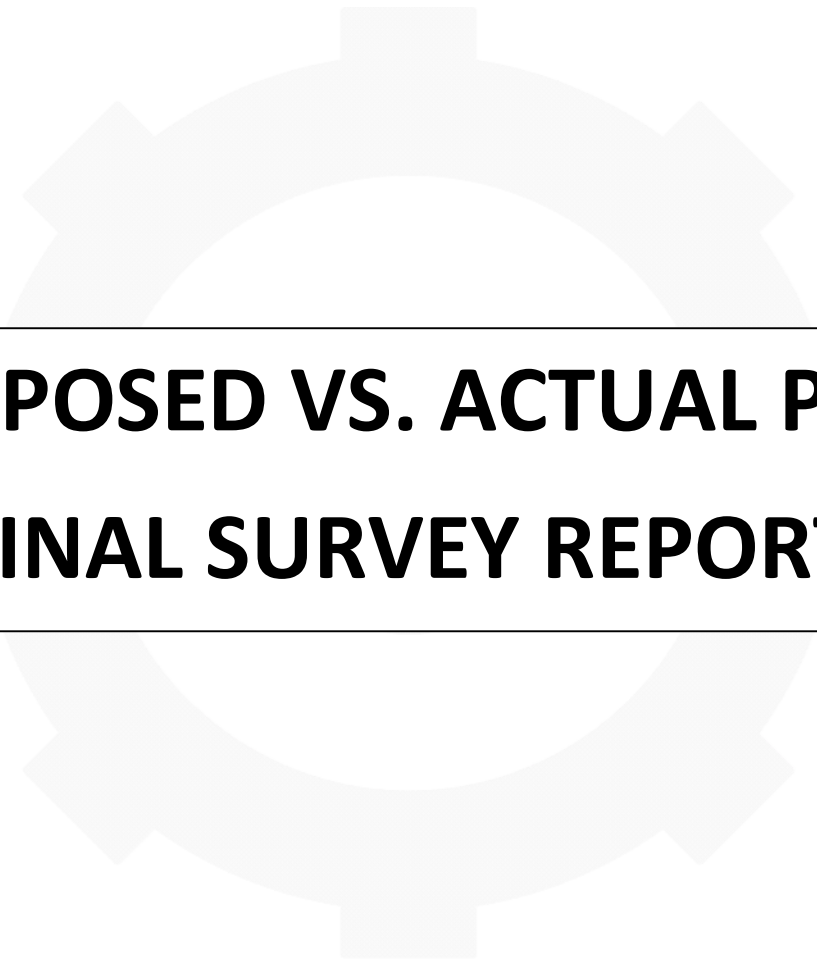
Motor Summary									
BHA #	Make	Model	Lobes	Stages	OD (in)	Bend	Bit to Bend	Drilled (Usft)	ROP (Usft/hr)
1	Scout	Turbo Scout	7/8	3.9	9.620	0.00	0.00	338.00	40.56
2	Scout		7/8	3.9	9.620	2.12	7.51	3126.00	63.64
3	Scout	Turbo Scout	7/8	5.9	9.620	2.12	7.49	2885.00	114.64
5	Scout	CAM	5/6	9.6	7.120	1.75	5.46	9154.00	147.29
6	Scout	Cam	5/6	9.4	7.120	1.25	5.47	2641.00	139.74

Personnel Summary						
Day DD	Night DD	Day MWD	Night MWD	Day Co Man	Night CO Man	Drilling Eng
Chris Hite	Chris Hite	JC Slaton	JC Slaton	Andrew Baltes	Brian Mitchell	
Chris Hiteartin Leafstead	Will Drake	Tyler Sjogren	Marlon Martin	Ryan Buford	John Holland	
Marc Keim						
Martin Leafstedt						

Phase Summary							
Phase	Days	Drilled (Usft)	Avg ROP (Usft/hr)	NPT (Rig/Dir)	# BHA's	Drig Hrs	
SURFACE: SURFACE	0.81	338.00	40.56		1	8.33	
INT-1: INTERMEDIATE 1	3.75	3126.00	60.58	0.50 / 0.00	1	51.60	
STBY: STANDBY	2.50				1	20.50	
INT-2: INTERMEDIATE 2	2.00	407.00	87.21		1	4.67	
CRVLAT: CURVE/LATERAL	4.71	9170.00	135.85	0.70 / 0.00	3	67.50	
LAT: LATERAL	3.04	2641.00	139.74		1	18.90	
Total	16.81	15682.00	91.44	1.20 / 0.00	6	171.50	

Phase Summary - Per BHA											
Phase / BHA	From (Usft)	To(Usft)	Rot ROP	Rot Dist	Slide ROP	Slide Dist	Slide %	Tot Drill	Avg ROP	Tot Hrs	Slide Hrs
SURFACE: SURFACE-BHA #1 (Surface)	36.00	374.00	40.56	338.00	0.00	0.00	0.00	338.00	40.56	8.33	0.00
INT-1: INTERMEDIATE 1-BHA2 Intermediate 1	374.00	3500.00	68.97	2492.00	48.83	634.00	20.28	3126.00	63.64	49.12	12.98
STBY: STANDBY-BHA3 (Intermediate 2)	3500.00	5978.00	123.91	2218.00	100.00	260.00	10.49	2478.00	120.88	20.50	2.60
INT-2: INTERMEDIATE 2-BHA3 (Intermediate 2)	5978.00	6385.00	87.21	407.00	0.00	0.00	0.00	407.00	87.21	4.67	0.00
CRVLAT: CURVE/LATERAL-BHA5 (Curve-Lateral)	6401.00	15536.00	162.10	8259.00	79.91	895.00	9.78	9154.00	147.29	62.15	11.20
CRVLAT: CURVE/LATERAL-BHA4(DV drill out)	6385.00	6401.00	2.99	16.00	0.00	0.00	0.00	16.00	2.99	5.35	0.00
CRVLAT: CURVE/LATERAL-BHA6 (Lateral)	15536.00	15536.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00
LAT: LATERAL-BHA6 (Lateral)	15536.00	18177.00	174.34	2528.00	25.68	113.00	4.28	2641.00	139.74	18.90	4.40

**Innovative Drilling Solutions
Data-Driven Decision**

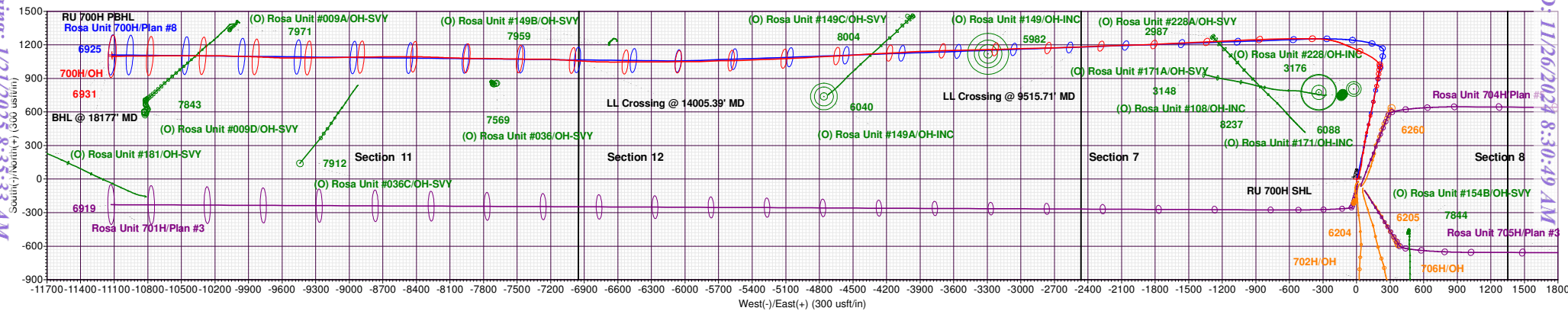
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PROPOSED VS. ACTUAL PLOT FINAL SURVEY REPORT

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

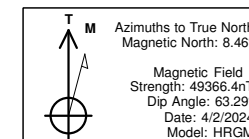
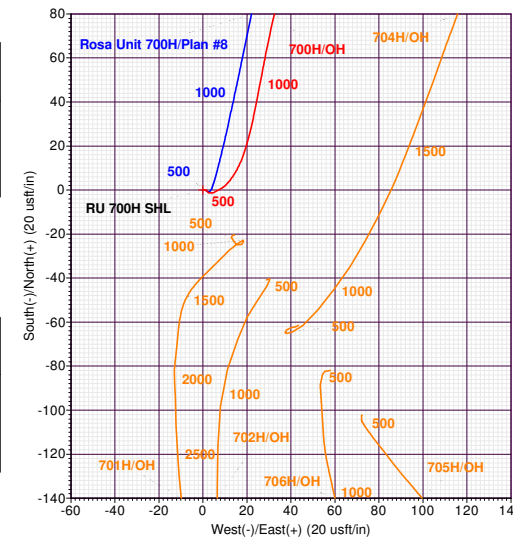


County: Rio Arriba, NM (NAD83)
 Site: Rosa Unit 24
 Well: Rosa Unit 700H
 Depth Reference: 6295+30 @ 6325.00usft (H&P 530)
 Rig: H&P 530
 Plan: OH
 Job #: 18354

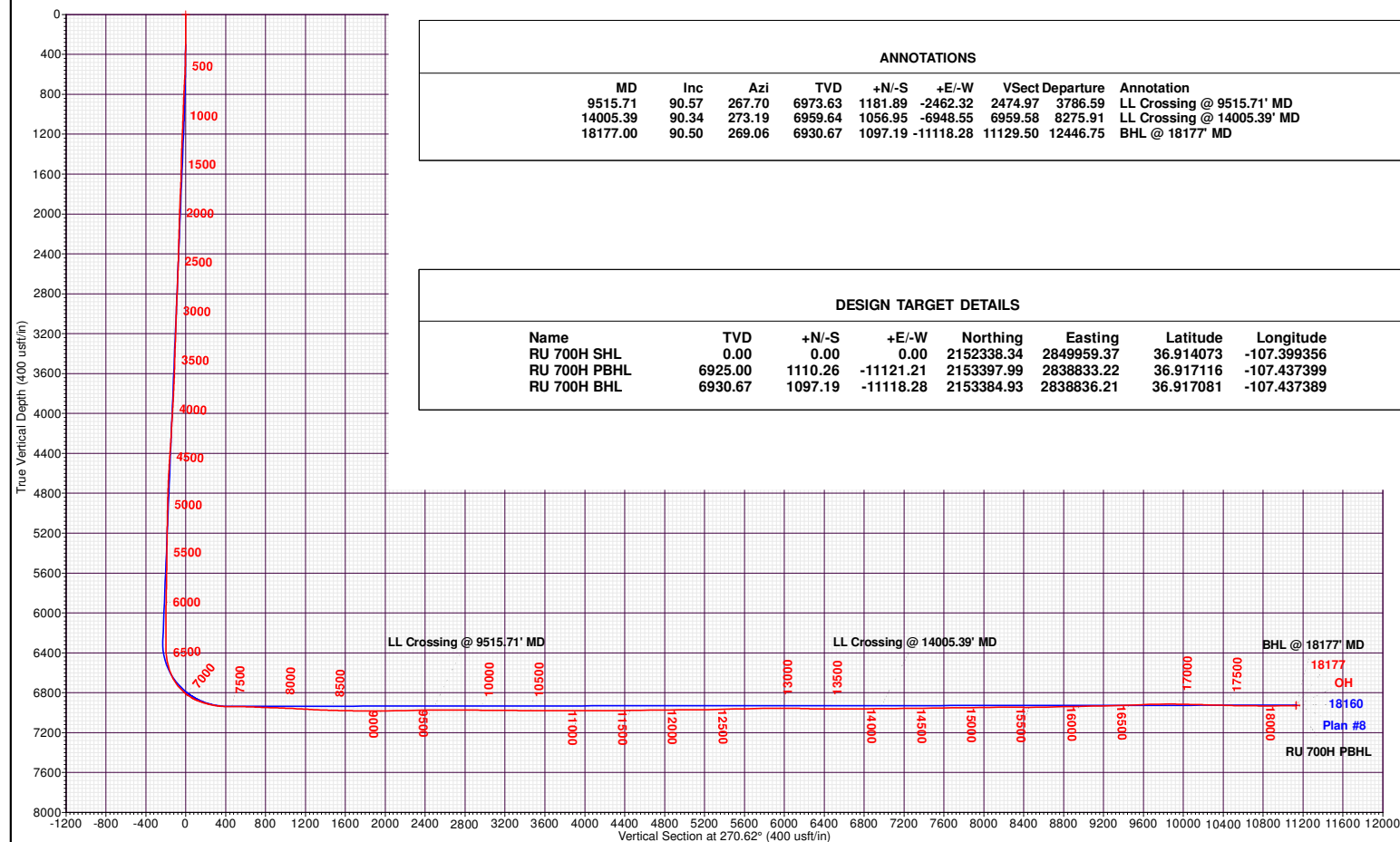


ANNOTATIONS									
MD	Inc	Azi	TVD	+N/-S	+E/-W	Vsect	Departure	Annotation	
9515.71	90.57	267.70	6973.63	1181.89	-2462.32	2474.97	3786.59	LL Crossing @ 9515.71' MD	
14005.39	90.34	273.19	6959.64	1056.95	-6948.55	6959.58	8275.91	LL Crossing @ 14005.39' MD	
18177.00	90.50	269.06	6930.67	1097.19	-11118.28	11129.50	12446.75	BHL @ 18177' MD	

DESIGN TARGET DETAILS							
Name	TVD	+N/-S	+E/-W	Northing	Easting	Latitude	Longitude
RU 700H SHL	0.00	0.00	0.00	2152338.34	2849959.37	36.914073	-107.399356
RU 700H PBHL	6925.00	1110.26	-11121.21	2153397.99	2838833.22	36.917116	-107.437399
RU 700H BHL	6930.67	1097.19	-11118.28	2153384.93	2838836.21	36.917081	-107.437389



TOTAL CORRECTION: 8.46°



Logos Operating LLC

Rio Arriba, NM (NAD83)

Rosa Unit 24

Rosa Unit 700H

OH

Design: OH

Standard Survey Report

28 June, 2024

SDT
Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

Project	Rio Arriba, NM (NAD83)		
Map System:	US State Plane 1983	System Datum:	Mean Sea Level
Geo Datum:	North American Datum 1983		
Map Zone:	New Mexico Western Zone		

Site	Rosa Unit 24				
Site Position:		Northing:	2,152,318.01 usft	Latitude:	36.914017
From:	Lat/Long	Easting:	2,849,973.79 usft	Longitude:	-107.399307
Position Uncertainty:	0.00 usft	Slot Radius:	13-3/16 "		

Well	Rosa Unit 700H					
Well Position	+N/-S	0.00 usft	Northing:	2,152,338.34 usft	Latitude:	36.914073
	+E/-W	0.00 usft	Easting:	2,849,959.38 usft	Longitude:	-107.399356
Position Uncertainty		0.00 usft	Wellhead Elevation:	usft	Ground Level:	6,295.00 usft
Grid Convergence:		0.26 °				

Wellbore	OH				
Magnetics	Model Name	Sample Date	Declination (°)	Dip Angle (°)	Field Strength (nT)
	HRGM	4/2/2024	8.46	63.29	49,366.35403043

Design	OH				
Audit Notes:					
Version:	1.0	Phase:	ACTUAL	Tie On Depth:	0.00
Vertical Section:	Depth From (TVD) (usft)	+N/-S (usft)	+E/-W (usft)	Direction (°)	
	0.00	0.00	0.00	270.62	

Survey Program	Date	6/28/2024			
From (usft)	To (usft)	Survey (Wellbore)	Tool Name	Description	
66.66	299.93	Survey #1 (OH)	Standard Keeper 104	Standard Wireline Keeper ver 1.0.4	
443.00	18,108.00	Survey #2 (OH)	MWD+HRGM+MS	MWD + HRGM + Multi-Station Correction	
18,177.00	18,177.00	Survey #3 (OH)	A026Ua_BLIND	OWSG BLIND	

Survey										
Measured Depth (usft)	Inclination (°)	Azimuth (°)	Vertical Depth (usft)	+N/-S (usft)	+E/-W (usft)	Vertical Section (usft)	Dogleg Rate (°/100usft)	Build Rate (°/100usft)	Turn Rate (°/100usft)	
0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	
66.66	0.29	79.39	66.66	0.03	0.17	-0.17	0.44	0.44	0.00	
130.42	0.30	89.22	130.42	0.06	0.49	-0.49	0.08	0.02	15.42	
219.67	0.34	103.32	219.67	0.01	0.98	-0.98	0.10	0.04	15.80	
299.93	0.47	119.60	299.93	-0.21	1.50	-1.50	0.21	0.16	20.28	
443.00	0.80	142.47	442.99	-1.29	2.62	-2.63	0.29	0.23	15.99	
533.00	2.19	73.31	532.96	-1.30	4.65	-4.66	2.27	1.54	-76.84	
621.00	3.83	55.27	620.84	0.86	8.68	-8.67	2.13	1.86	-20.50	

SDT

Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

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)
744.00	6.30	29.19	743.36	9.09	15.35	-15.25	2.70	2.01	-21.20
838.00	8.50	16.25	836.58	20.27	19.81	-19.58	2.92	2.34	-13.77
930.00	10.87	11.44	927.26	35.30	23.43	-23.05	2.72	2.58	-5.23
1,021.00	10.75	10.55	1,016.65	52.05	26.68	-26.12	0.23	-0.13	-0.98
1,110.00	12.45	12.00	1,103.83	69.60	30.20	-29.44	1.94	1.91	1.63
1,202.00	12.04	13.24	1,193.73	88.64	34.46	-33.50	0.53	-0.45	1.35
1,296.00	12.52	11.66	1,285.58	108.16	38.76	-37.59	0.62	0.51	-1.68
1,391.00	13.05	8.70	1,378.23	128.85	42.47	-41.07	0.89	0.56	-3.12
1,485.00	12.98	6.30	1,469.82	149.83	45.23	-43.61	0.58	-0.07	-2.55
1,580.00	13.42	3.46	1,562.31	171.44	47.07	-45.21	0.82	0.46	-2.99
1,674.00	13.41	9.03	1,653.75	193.10	49.44	-47.34	1.37	-0.01	5.93
1,769.00	12.75	13.02	1,746.28	214.19	53.53	-51.21	1.18	-0.69	4.20
1,863.00	12.46	12.39	1,838.02	234.20	58.04	-55.50	0.34	-0.31	-0.67
1,958.00	12.55	10.86	1,930.76	254.35	62.18	-59.43	0.36	0.09	-1.61
2,052.00	12.18	8.27	2,022.58	274.19	65.53	-62.56	0.71	-0.39	-2.76
2,147.00	12.85	6.68	2,115.33	294.60	68.20	-65.01	0.79	0.71	-1.67
2,241.00	12.33	7.07	2,207.06	314.94	70.66	-67.24	0.56	-0.55	0.41
2,336.00	11.02	11.34	2,300.10	333.91	73.69	-70.07	1.65	-1.38	4.49
2,430.00	9.94	7.68	2,392.53	350.76	76.54	-72.74	1.35	-1.15	-3.89
2,525.00	9.49	7.99	2,486.17	366.64	78.72	-74.75	0.48	-0.47	0.33
2,620.00	10.31	12.36	2,579.75	382.70	81.63	-77.49	1.17	0.86	4.60
2,714.00	10.04	15.12	2,672.28	398.83	85.57	-81.25	0.59	-0.29	2.94
2,809.00	10.04	13.83	2,765.82	414.86	89.71	-85.22	0.24	0.00	-1.36
2,903.00	9.91	16.20	2,858.40	430.59	93.93	-89.26	0.46	-0.14	2.52
2,998.00	9.19	14.23	2,952.08	445.79	98.07	-93.24	0.83	-0.76	-2.07
3,093.00	8.11	13.31	3,046.00	459.67	101.48	-96.50	1.15	-1.14	-0.97
3,187.00	8.19	9.60	3,139.05	472.72	104.12	-99.00	0.57	0.09	-3.95
3,282.00	8.88	15.45	3,233.00	486.46	107.20	-101.93	1.17	0.73	6.16
3,376.00	8.16	16.37	3,325.96	499.85	111.02	-105.60	0.78	-0.77	0.98
3,436.00	8.47	12.47	3,385.33	508.25	113.17	-107.66	1.07	0.52	-6.50
3,575.00	9.44	9.08	3,522.64	529.51	117.18	-111.44	0.79	0.70	-2.44
3,670.00	11.20	11.14	3,616.10	546.25	120.19	-114.28	1.89	1.85	2.17
3,764.00	13.39	12.26	3,707.94	565.85	124.27	-118.14	2.34	2.33	1.19
3,859.00	14.11	12.07	3,800.21	587.92	129.03	-122.66	0.76	0.76	-0.20
3,954.00	14.71	11.90	3,892.23	611.05	133.93	-127.31	0.63	0.63	-0.18
4,049.00	16.07	12.83	3,983.82	635.67	139.34	-132.45	1.45	1.43	0.98
4,143.00	17.62	11.55	4,073.78	662.30	145.08	-137.90	1.70	1.65	-1.36
4,238.00	17.74	9.96	4,164.29	690.64	150.46	-142.98	0.52	0.13	-1.67
4,333.00	18.49	9.74	4,254.59	719.74	155.51	-147.72	0.79	0.79	-0.23
4,427.00	19.33	13.08	4,343.51	749.59	161.56	-153.44	1.46	0.89	3.55
4,522.00	17.44	13.09	4,433.66	778.77	168.34	-159.90	1.99	-1.99	0.01
4,616.00	16.29	11.82	4,523.62	805.40	174.23	-165.51	1.28	-1.22	-1.35
4,710.00	15.85	11.54	4,613.94	830.88	179.50	-170.50	0.48	-0.47	-0.30

SDT

Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

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)	
4,773.00	14.57	10.84	4,674.74	847.09	182.71	-173.53	2.05	-2.03	-1.11	
4,836.00	13.10	9.27	4,735.91	861.92	185.35	-176.01	2.41	-2.33	-2.49	
4,899.00	12.02	8.86	4,797.40	875.45	187.51	-178.03	1.72	-1.71	-0.65	
4,962.00	11.06	9.01	4,859.12	887.90	189.47	-179.85	1.52	-1.52	0.24	
5,025.00	10.06	7.68	4,921.06	899.32	191.15	-181.41	1.63	-1.59	-2.11	
5,087.00	8.89	7.30	4,982.21	909.44	192.48	-182.63	1.89	-1.89	-0.61	
5,150.00	7.71	7.23	5,044.55	918.46	193.63	-183.68	1.87	-1.87	-0.11	
5,213.00	6.88	8.77	5,107.04	926.38	194.74	-184.70	1.35	-1.32	2.44	
5,276.00	6.51	7.88	5,169.61	933.65	195.81	-185.69	0.61	-0.59	-1.41	
5,339.00	5.84	8.51	5,232.24	940.36	196.77	-186.58	1.07	-1.06	1.00	
5,402.00	5.68	9.35	5,294.92	946.60	197.75	-187.50	0.29	-0.25	1.33	
5,464.00	5.52	7.25	5,356.63	952.59	198.62	-188.31	0.42	-0.26	-3.39	
5,590.00	5.49	9.12	5,482.05	964.55	200.34	-189.90	0.14	-0.02	1.48	
5,653.00	5.07	10.05	5,544.78	970.27	201.31	-190.80	0.68	-0.67	1.48	
5,716.00	4.88	11.00	5,607.54	975.64	202.31	-191.74	0.33	-0.30	1.51	
5,779.00	4.86	10.52	5,670.31	980.90	203.30	-192.68	0.07	-0.03	-0.76	
5,841.00	4.88	10.97	5,732.09	986.07	204.29	-193.60	0.07	0.03	0.73	
5,967.00	4.32	12.56	5,857.68	995.96	206.34	-195.55	0.46	-0.44	1.26	
6,093.00	3.33	8.68	5,983.40	1,004.21	207.92	-197.04	0.81	-0.79	-3.08	
6,156.00	3.02	9.10	6,046.31	1,007.66	208.46	-197.54	0.49	-0.49	0.67	
6,220.00	2.81	9.47	6,110.22	1,010.87	208.98	-198.03	0.33	-0.33	0.58	
6,282.00	2.29	7.88	6,172.16	1,013.60	209.40	-198.42	0.85	-0.84	-2.56	
6,318.00	2.23	9.43	6,208.13	1,015.00	209.62	-198.62	0.24	-0.17	4.31	
6,407.00	1.95	10.54	6,297.07	1,018.20	210.18	-199.15	0.32	-0.31	1.25	
6,502.00	6.45	326.56	6,391.81	1,024.24	207.53	-196.44	5.50	4.74	-46.29	
6,596.00	15.59	321.27	6,483.98	1,038.53	196.70	-185.45	9.77	9.72	-5.63	
6,691.00	22.91	310.99	6,573.63	1,060.66	174.72	-163.23	8.46	7.71	-10.82	
6,785.00	32.23	302.64	6,656.90	1,086.24	139.71	-127.95	10.71	9.91	-8.88	
6,880.00	42.44	297.10	6,732.36	1,114.59	89.69	-77.63	11.31	10.75	-5.83	
6,974.00	50.55	294.87	6,797.02	1,144.35	28.43	-16.04	8.80	8.63	-2.37	
7,069.00	62.54	292.91	6,849.30	1,176.31	-43.94	56.67	12.74	12.62	-2.06	
7,163.00	71.54	292.14	6,885.93	1,209.41	-123.82	136.90	9.60	9.57	-0.82	
7,258.00	75.28	283.09	6,913.10	1,236.86	-210.49	223.87	9.94	3.94	-9.53	
7,352.00	82.28	274.61	6,931.41	1,250.94	-301.47	314.99	11.56	7.45	-9.02	
7,447.00	90.10	270.26	6,937.72	1,254.95	-396.08	409.63	9.41	8.23	-4.58	
7,541.00	88.92	269.70	6,938.53	1,254.91	-490.07	503.62	1.39	-1.26	-0.60	
7,636.00	88.89	269.84	6,940.34	1,254.53	-585.05	598.59	0.15	-0.03	0.15	
7,730.00	87.38	268.54	6,943.40	1,253.20	-678.99	692.51	2.12	-1.61	-1.38	
7,825.00	87.88	268.16	6,947.33	1,250.47	-773.87	787.35	0.66	0.53	-0.40	
7,919.00	88.15	268.06	6,950.58	1,247.37	-867.76	881.21	0.31	0.29	-0.11	
8,013.00	87.98	267.44	6,953.76	1,243.68	-961.63	975.03	0.68	-0.18	-0.66	
8,108.00	86.91	267.09	6,957.99	1,239.16	-1,056.43	1,069.78	1.18	-1.13	-0.37	
8,202.00	86.80	267.43	6,963.15	1,234.67	-1,150.18	1,163.47	0.38	-0.12	0.36	
8,297.00	87.24	267.50	6,968.09	1,230.47	-1,244.96	1,258.20	0.47	0.46	0.07	

SDT Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

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)
8,392.00	87.51	267.42	6,972.44	1,226.27	-1,339.77	1,352.96	0.30	0.28	-0.08
8,486.00	88.29	267.91	6,975.89	1,222.44	-1,433.62	1,446.77	0.98	0.83	0.52
8,581.00	88.59	267.04	6,978.47	1,218.26	-1,528.49	1,541.59	0.97	0.32	-0.92
8,676.00	88.86	267.43	6,980.59	1,213.67	-1,623.36	1,636.40	0.50	0.28	0.41
8,770.00	89.63	266.38	6,981.82	1,208.60	-1,717.21	1,730.19	1.39	0.82	-1.12
8,864.00	89.19	267.90	6,982.79	1,203.91	-1,811.09	1,824.01	1.68	-0.47	1.62
8,959.00	90.61	268.48	6,982.96	1,200.91	-1,906.04	1,918.92	1.61	1.49	0.61
9,053.00	90.50	268.95	6,982.05	1,198.80	-2,000.01	2,012.86	0.51	-0.12	0.50
9,148.00	91.28	267.67	6,980.57	1,196.00	-2,094.95	2,107.77	1.58	0.82	-1.35
9,242.00	91.31	267.79	6,978.45	1,192.28	-2,188.86	2,201.63	0.13	0.03	0.13
9,337.00	91.21	267.94	6,976.36	1,188.74	-2,283.77	2,296.50	0.19	-0.11	0.16
9,431.00	90.84	267.78	6,974.68	1,185.23	-2,377.69	2,390.37	0.43	-0.39	-0.17
9,515.71	90.57	267.70	6,973.63	1,181.89	-2,462.32	2,474.97	0.33	-0.32	-0.09
LL Crossing @ 9515.71' MD									
9,526.00	90.54	267.69	6,973.53	1,181.48	-2,472.61	2,485.25	0.33	-0.32	-0.09
9,621.00	90.24	267.63	6,972.89	1,177.60	-2,567.52	2,580.12	0.32	-0.32	-0.06
9,715.00	89.97	268.29	6,972.71	1,174.25	-2,661.46	2,674.01	0.76	-0.29	0.70
9,810.00	89.56	268.29	6,973.10	1,171.42	-2,756.42	2,768.93	0.43	-0.43	0.00
9,904.00	89.23	268.93	6,974.10	1,169.14	-2,850.39	2,862.87	0.77	-0.35	0.68
9,999.00	88.96	269.03	6,975.60	1,167.45	-2,945.36	2,957.82	0.30	-0.28	0.11
10,093.00	89.87	267.78	6,976.56	1,164.83	-3,039.32	3,051.74	1.64	0.97	-1.33
10,188.00	89.80	268.33	6,976.83	1,161.60	-3,134.26	3,146.65	0.58	-0.07	0.58
10,282.00	89.63	268.67	6,977.30	1,159.14	-3,228.23	3,240.58	0.40	-0.18	0.36
10,377.00	89.36	269.09	6,978.13	1,157.29	-3,323.20	3,335.53	0.53	-0.28	0.44
10,472.00	89.13	269.04	6,979.39	1,155.74	-3,418.18	3,430.49	0.25	-0.24	-0.05
10,566.00	90.10	268.00	6,980.02	1,153.31	-3,512.15	3,524.42	1.51	1.03	-1.11
10,660.00	90.13	267.96	6,979.83	1,150.00	-3,606.09	3,618.32	0.05	0.03	-0.04
10,755.00	89.80	268.31	6,979.89	1,146.90	-3,701.04	3,713.23	0.51	-0.35	0.37
10,849.00	89.56	268.27	6,980.41	1,144.10	-3,794.99	3,807.15	0.26	-0.26	-0.04
10,944.00	90.13	267.89	6,980.67	1,140.92	-3,889.94	3,902.06	0.72	0.60	-0.40
11,038.00	90.03	267.02	6,980.54	1,136.74	-3,983.85	3,995.91	0.93	-0.11	-0.93
11,133.00	90.20	266.85	6,980.35	1,131.66	-4,078.71	4,090.72	0.25	0.18	-0.18
11,227.00	90.34	266.68	6,979.90	1,126.36	-4,172.56	4,184.50	0.23	0.15	-0.18
11,321.00	90.17	267.32	6,979.49	1,121.44	-4,266.43	4,278.31	0.70	-0.18	0.68
11,416.00	91.01	266.55	6,978.51	1,116.36	-4,361.29	4,373.11	1.20	0.88	-0.81
11,510.00	90.64	266.43	6,977.15	1,110.61	-4,455.10	4,466.86	0.41	-0.39	-0.13
11,604.00	90.61	266.58	6,976.13	1,104.88	-4,548.92	4,560.61	0.16	-0.03	0.16
11,699.00	90.60	267.27	6,975.13	1,099.78	-4,643.78	4,655.41	0.73	-0.01	0.73
11,793.00	90.70	267.37	6,974.06	1,095.38	-4,737.67	4,749.24	0.15	0.11	0.11
11,888.00	90.50	267.03	6,973.06	1,090.74	-4,832.55	4,844.07	0.42	-0.21	-0.36
11,982.00	90.71	267.16	6,972.07	1,085.98	-4,926.42	4,937.89	0.26	0.22	0.14
12,077.00	90.64	266.94	6,970.95	1,081.09	-5,021.29	5,032.70	0.24	-0.07	-0.23
12,171.00	90.30	267.20	6,970.18	1,076.29	-5,115.17	5,126.51	0.46	-0.36	0.28

SDT Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

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)
12,265.00	90.03	267.82	6,969.91	1,072.20	-5,209.08	5,220.37	0.72	-0.29	0.66
12,360.00	91.48	267.66	6,968.66	1,068.46	-5,303.99	5,315.24	1.54	1.53	-0.17
12,454.00	91.55	268.14	6,966.17	1,065.01	-5,397.89	5,409.10	0.52	0.07	0.51
12,549.00	91.62	268.14	6,963.55	1,061.93	-5,492.81	5,503.98	0.07	0.07	0.00
12,644.00	91.48	268.92	6,960.98	1,059.50	-5,587.74	5,598.88	0.83	-0.15	0.82
12,738.00	91.14	268.77	6,958.83	1,057.60	-5,681.70	5,692.81	0.40	-0.36	-0.16
12,833.00	91.58	266.63	6,956.57	1,053.79	-5,776.59	5,787.65	2.30	0.46	-2.25
12,927.00	89.50	269.84	6,955.69	1,050.90	-5,870.52	5,881.55	4.07	-2.21	3.41
13,022.00	89.80	269.42	6,956.27	1,050.28	-5,965.52	5,976.53	0.54	0.32	-0.44
13,116.00	89.50	268.99	6,956.84	1,048.98	-6,059.51	6,070.50	0.56	-0.32	-0.46
13,211.00	88.89	269.15	6,958.18	1,047.44	-6,154.48	6,165.46	0.66	-0.64	0.17
13,306.00	88.05	270.26	6,960.71	1,046.95	-6,249.45	6,260.41	1.46	-0.88	1.17
13,400.00	90.03	269.96	6,962.29	1,047.13	-6,343.43	6,354.39	2.13	2.11	-0.32
13,495.00	90.00	269.91	6,962.26	1,047.02	-6,438.43	6,449.38	0.06	-0.03	-0.05
13,590.00	89.93	269.57	6,962.32	1,046.59	-6,533.43	6,544.37	0.37	-0.07	-0.36
13,684.00	90.13	269.98	6,962.27	1,046.22	-6,627.43	6,638.36	0.49	0.21	0.44
13,778.00	90.57	270.62	6,961.70	1,046.71	-6,721.42	6,732.36	0.83	0.47	0.68
13,873.00	90.61	272.91	6,960.72	1,049.64	-6,816.37	6,827.33	2.41	0.04	2.41
13,967.00	90.40	273.34	6,959.89	1,054.76	-6,910.22	6,921.23	0.51	-0.22	0.46
14,005.39	90.34	273.19	6,959.64	1,056.95	-6,948.55	6,959.58	0.41	-0.17	-0.38
LL Crossing @ 14005.39' MD									
14,062.00	90.24	272.98	6,959.36	1,060.00	-7,005.08	7,016.14	0.41	-0.17	-0.38
14,157.00	90.17	273.35	6,959.02	1,065.24	-7,099.93	7,111.04	0.40	-0.07	0.39
14,251.00	91.38	272.45	6,957.75	1,070.00	-7,193.80	7,204.96	1.60	1.29	-0.96
14,346.00	90.71	270.04	6,956.02	1,072.06	-7,288.75	7,299.93	2.63	-0.71	-2.54
14,440.00	90.54	270.14	6,954.99	1,072.21	-7,382.75	7,393.92	0.21	-0.18	0.11
14,535.00	90.81	270.99	6,953.87	1,073.15	-7,477.74	7,488.91	0.94	0.28	0.89
14,630.00	90.57	270.43	6,952.73	1,074.32	-7,572.72	7,583.90	0.64	-0.25	-0.59
14,724.00	90.64	270.97	6,951.73	1,075.47	-7,666.71	7,677.90	0.58	0.07	0.57
14,819.00	90.61	270.91	6,950.70	1,077.03	-7,761.69	7,772.89	0.07	-0.03	-0.06
14,913.00	90.74	270.99	6,949.59	1,078.59	-7,855.67	7,866.88	0.16	0.14	0.09
15,007.00	90.71	270.86	6,948.40	1,080.11	-7,949.65	7,960.87	0.14	-0.03	-0.14
15,101.00	91.08	271.83	6,946.93	1,082.31	-8,043.61	8,054.85	1.10	0.39	1.03
15,196.00	90.30	271.87	6,945.79	1,085.38	-8,138.56	8,149.82	0.82	-0.82	0.04
15,290.00	90.54	272.48	6,945.10	1,088.95	-8,232.48	8,243.79	0.70	0.26	0.65
15,384.00	89.19	271.12	6,945.32	1,091.90	-8,326.43	8,337.76	2.04	-1.44	-1.45
15,479.00	89.83	270.77	6,946.13	1,093.47	-8,421.42	8,432.76	0.77	0.67	-0.37
15,574.00	90.81	270.05	6,945.60	1,094.15	-8,516.41	8,527.75	1.28	1.03	-0.76
15,668.00	90.97	269.69	6,944.14	1,093.93	-8,610.40	8,621.73	0.42	0.17	-0.38
15,763.00	91.18	269.14	6,942.36	1,092.96	-8,705.38	8,716.69	0.62	0.22	-0.58
15,857.00	91.28	269.60	6,940.34	1,091.93	-8,799.35	8,810.65	0.50	0.11	0.49
15,952.00	91.28	268.95	6,938.22	1,090.73	-8,894.32	8,905.60	0.68	0.00	-0.68
16,046.00	91.51	269.00	6,935.93	1,089.05	-8,988.27	8,999.53	0.25	0.24	0.05
16,141.00	90.97	268.86	6,933.88	1,087.27	-9,083.24	9,094.47	0.59	-0.57	-0.15

SDT
Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

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)
16,235.00	91.28	268.86	6,932.03	1,085.40	-9,177.20	9,188.41	0.33	0.33	0.00
16,329.00	91.82	269.32	6,929.49	1,083.91	-9,271.15	9,282.34	0.75	0.57	0.49
16,424.00	91.14	269.76	6,927.03	1,083.15	-9,366.12	9,377.29	0.85	-0.72	0.46
16,518.00	92.02	269.67	6,924.44	1,082.68	-9,460.08	9,471.24	0.94	0.94	-0.10
16,613.00	92.46	270.23	6,920.73	1,082.60	-9,555.01	9,566.16	0.75	0.46	0.59
16,707.00	91.88	272.67	6,917.17	1,084.98	-9,648.90	9,660.08	2.67	-0.62	2.60
16,801.00	91.51	272.50	6,914.39	1,089.21	-9,742.76	9,753.98	0.43	-0.39	-0.18
16,895.00	90.00	272.01	6,913.15	1,092.91	-9,836.68	9,847.93	1.69	-1.61	-0.52
16,990.00	88.62	271.74	6,914.29	1,096.02	-9,931.62	9,942.90	1.48	-1.45	-0.28
17,084.00	88.52	271.50	6,916.64	1,098.68	-10,025.55	10,036.85	0.28	-0.11	-0.26
17,178.00	89.09	271.60	6,918.60	1,101.22	-10,119.50	10,130.82	0.62	0.61	0.11
17,273.00	88.18	269.92	6,920.86	1,102.48	-10,214.46	10,225.79	2.01	-0.96	-1.77
17,367.00	88.25	270.22	6,923.79	1,102.59	-10,308.41	10,319.74	0.33	0.07	0.32
17,462.00	88.49	270.03	6,926.49	1,102.80	-10,403.37	10,414.70	0.32	0.25	-0.20
17,556.00	88.79	269.88	6,928.73	1,102.73	-10,497.35	10,508.66	0.36	0.32	-0.16
17,650.00	89.06	269.79	6,930.49	1,102.46	-10,591.33	10,602.64	0.30	0.29	-0.10
17,745.00	89.50	269.60	6,931.68	1,101.95	-10,686.32	10,697.62	0.50	0.46	-0.20
17,839.00	89.87	269.04	6,932.20	1,100.83	-10,780.31	10,791.59	0.71	0.39	-0.60
17,934.00	90.10	269.68	6,932.22	1,099.77	-10,875.30	10,886.57	0.72	0.24	0.67
18,028.00	90.34	269.65	6,931.86	1,099.22	-10,969.30	10,980.55	0.26	0.26	-0.03
18,108.00	90.50	269.06	6,931.28	1,098.32	-11,049.29	11,060.53	0.76	0.20	-0.74
18,177.00	90.50	269.06	6,930.68	1,097.19	-11,118.28	11,129.50	0.00	0.00	0.00
BHL @ 18177' MD									

Design Targets									
Target Name	Dip Angle (°)	Dip Dir. (°)	TVD (usft)	+N/-S (usft)	+E/-W (usft)	Northing (usft)	Easting (usft)	Latitude	Longitude
- hit/miss target									
- Shape									
RU 700H SHL	0.00	0.00	0.00	0.00	0.00	2,152,338.34	2,849,959.38	36.914073	-107.399356
- actual wellpath hits target center									
- Point									
RU 700H PBHL	0.00	0.00	6,925.00	1,110.26	-11,121.22	2,153,397.99	2,838,833.22	36.917117	-107.437400
- actual wellpath misses target center by 14.55usft at 18177.00usft MD (6930.67 TVD, 1097.19 N, -11118.28 E)									
- Point									
RU 700H BHL	0.00	0.00	6,930.68	1,097.19	-11,118.28	2,153,384.93	2,838,836.22	36.917081	-107.437390
- actual wellpath hits target center									
- Point									

SDT
Survey Report

Company:	Logos Operating LLC	Local Co-ordinate Reference:	Well Rosa Unit 700H
Project:	Rio Arriba, NM (NAD83)	TVD Reference:	6295+30 @ 6325.00usft (H&P 530)
Site:	Rosa Unit 24	MD Reference:	6295+30 @ 6325.00usft (H&P 530)
Well:	Rosa Unit 700H	North Reference:	True
Wellbore:	OH	Survey Calculation Method:	Minimum Curvature
Design:	OH	Database:	EDM 5000 Multi User Db

Design Annotations					
Measured Depth (usft)	Vertical Depth (usft)	Local Coordinates			
		+N/-S (usft)	+E/-W (usft)	Comment	
9,515.71	6,973.63	1,181.89	-2,462.32	LL Crossing @ 9515.71' MD	
14,005.39	6,959.64	1,056.95	-6,948.55	LL Crossing @ 14005.39' MD	
18,177.00	6,930.68	1,097.19	-11,118.28	BHL @ 18177' MD	

Checked By: _____

Approved By: _____

Date: _____

DISTRICT II
1625 N. French Drive, Hobbs, NM 88240
Phone: (575) 393-6161 Fax: (575) 393-0720

State of New Mexico
Energy, Minerals & Natural Resources Department

Form C-102
Revised August 1, 2011

Submit one copy to
Appropriate District Office

DISTRICT III
811 S. First Street, Artesia, NM 88210
Phone: (575) 748-1283 Fax: (575) 748-9720

OIL CONSERVATION DIVISION

1220 South St. Francis Drive
Santa Fe, NM 87505

☐ AMENDED REPORT

DISTRICT IV
1000 Rio Brazos Road, Aztec, NM 87410
Phone: (505) 334-6178 Fax: (505) 334-6170

DISTRICT IV
1220 S. St. Francis Drive, Santa Fe, NM 87505
Phone: (505) 476-3460 Fax: (505) 476-3462

WELL LOCATION AND ACREAGE DEDICATION PLAT

¹ API Number 30-039-31441	² Pool Code 97232	³ Pool Name BASIN MANCOS
⁴ Property Code 320608	⁵ Property Name ROSA UNIT	⁶ Well Number 700H
⁷ OGRID No. 289408	⁸ Operator Name LOGOS OPERATING, LLC	⁹ Elevation 6295'

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
J	7	31N	5W		2612	SOUTH	1322	EAST	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
L	11	31N	6W		2428	SOUTH	1156	WEST	RIO ARriba
¹² Dedicated Acres 823.25	S/2 - Sections 11, 12, T31N, R6W S/2 - Section 7, T31N, R5W					¹³ Joint or Infill	¹⁴ Consolidation Code	¹⁵ Order No. R-13457	

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

LAST TAKE POINT
2428' FSL 1156' FWL
SECTION 11, T31N, R6W
LAT: 36.913553°N
LONG: 107.436670°W
DATUM: NAD1927

FIRST TAKE POINT
2383' FSL 1979' FEL
SECTION 7, T31N, R5W
LAT: 36.913325°N
LONG: 107.400899°W
DATUM: NAD1927

SURFACE LOCATION
2612' FSL 1322' FEL
SECTION 7, T31N, R5W
LAT: 36.913955°N
LONG: 107.398654°W
DATUM: NAD1927

LAT: 36.913559°N
LONG: 107.437274°W
DATUM: NAD1983

LAT: 36.913331°N
LONG: 107.401502°W
DATUM: NAD1983

LAT: 36.913961°N
LONG: 107.399257°W
DATUM: NAD1983

T31N R6W (RECORD)
NORTH 2640.00'
NO *12'07"W 2636.49'
(MEASURED)

T31N R5W (RECORD)
NO *02'W 2642.64'
NO *12'05"W 2632.33'
(MEASURED)

(RECORD)
N89 *57'W 1832.82'
S89 *53'00"W
1832.26'
(MEASURED)

(RECORD)
S89 *50'E 1185.36'
N89 *57'49"E
1178.25'
(MEASURED)

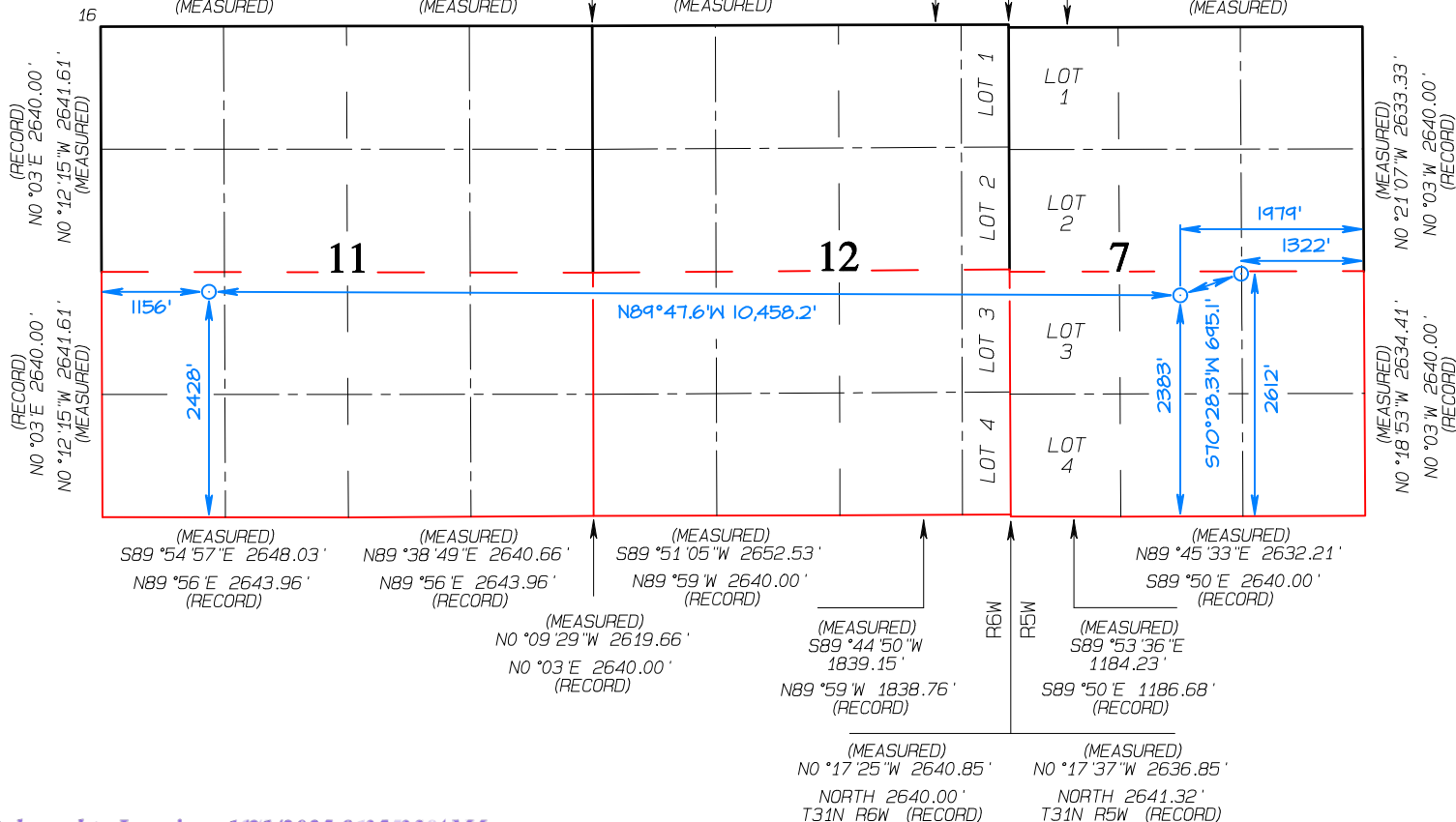
(RECORD)
NO *03'E 2640.00'
NO *10'08"W 2659.33'
(MEASURED)

(RECORD)
S89 *54'E 2644.62'
N89 *51'49"E 2646.13'
(MEASURED)

(RECORD)
S89 *54'E 2644.62'
N89 *57'35"E 2646.27'
(MEASURED)

(RECORD)
N89 *57'W 2640.00'
S89 *47'35"W 2651.82'
(MEASURED)

(RECORD)
S89 *50'E 2640.00'
N89 *51'20"E 2630.31'
(MEASURED)



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.
Marie E. Florez 1/21/2022
Signature Date
Marie E. Florez
Printed Name
mflorez@logosresourcesllc.com
E-mail Address

18 SURVEYOR CERTIFICATION
I hereby certify that the well location shown on this plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my belief.
Date Revised: JANUARY 10, 2022
Survey Date: NOVEMBER 15, 2021
Signature and Seal of Professional Surveyor



JASON C. EDWARDS
Certificate Number 15269

**Innovative Drilling Solutions
Data-Driven Decision**



DAILY DRILLING REPORTS

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

Daily Drilling Report 04/13/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE#	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC									
	Report #	1	Well	Rosa Unit 700H									
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W									
	Rig:	HP 530	County / State	Rio Arriba / New Mexico									
	Date:	04/13/2024	Report Time	00:00-24:00									
	Daily Cost(USD)	10267.50	Well Cost(USD)	10267.50									
24Hr Summary													
Skid rig, R/U, Dill surface,Clean Up Cycle, TOH. L/D BHA, P/U Clean Out BHA													
24Hr Lookahead													
Run Casing on , Skid rig T/701H Make Clean Out Run, Run Casing On All Previous Surface Holes													
Drilling Summary		24Hr (BHA 1)	Run (BHA 1)	Casing Data		Fluids							
Start Depth (Usft)	36.00	36.00	Csg Shoe MD(Usft)		600	%Sand							
End Depth (Usft)	374.00	374.00	OD (in)		300	%Solids							
Total Drilled (Usft)	338	338	Weight (lb/ft)		200	Weight (ppg)							
Slide Drilled (Usft)			Bit Data		100	Fluid Loss							
Rotary Drilled (Usft)	338	338	SN	SK619	6	PH							
Drig/Circ Hrs	8.33 / 1.38	8.33 / 1.38	Bit #	1	3	Mud Type	WBM						
Slide Drilling Hrs			OD (in)	26.000	10s Gel	Oil/Water							
Rotary Drilling Hrs	8.33	8.33	TFA	0.785	Temp(F)								
ROP Rot/Slide (Usft/hr)	40.56 / 0.00	40.56 / 0.00	Grade In	1-1-WT-A-X-I-NO-TD	PV								
BRT Hrs	15.67	15.67	Grade Out		YP								
%Slide			Make	NOV	Viscosity								
%Rotary	100.00	100.00	Model	TK95	Chlorides								
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Andrew Baltas	Martin Leafstedt												
John Holland	Chris Hite												
BHA													
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
26" NOV TK95 jets 12x15's TFA2.071 - 0.79 (4x16)				26.000	3.250			235.00	2.17	2.17			
9 5/8" 7/8 3.9stg staight motor w/slick sleeve				9.620	3.500			236.20	40.50	42.67			
23 3/4" NMStabilizer				8.290	2.875			154.76	8.40	51.07			
8" Spiral NMDC				7.970	3.500			140.47	26.34	77.41			
23 3/4" NMStabilizer				8.270	2.875			152.20	8.87	86.28			
8" Steady Scout				8.000	3.125			142.00	32.24	118.52			
8" Spiral NMDC				8.030	3.500			140.87	28.04	146.56			
8" Spiral NMDC				8.050	3.500			139.80	30.40	176.96			
8" XO - 6 5/8 Reg Pin X 4 1/2 XH				7.780	3.000			118.11	2.54	179.50			
6 1/2" Steel DC (to surface)				6.500	2.810			90.61	1.00	180.50			
										180.50			
Motor Details													
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-962-MLA01-010		Scout	Turbo Scout	7/8	0.00		0.00	0.07		FBH	3.9		
Surveys													
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)		
66.66	0.29	79.39	66.66	0.03	0.17	0.44	79.39	-0.17	0.44	0.00	66.66		
130.42	0.30	89.22	130.42	0.06	0.49	0.08	83.76	-0.49	0.02	0.00	63.76		
219.67	0.34	103.32	219.67	0.01	0.98	0.10	70.24	-0.98	0.04	0.00	89.25		
299.93	0.47	119.60	299.93	-0.21	1.50	0.21	49.85	-1.50	0.16	0.00	80.26		
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	40.56	11.80	39.00	111.00	1062.00	1106.00	825.00	0.00	69000.00	69000.00	69000.00	8940.00	0.00
Run	40.56	11.80	39.00	111.00	1062.00	1106.00	825.00	0.00	69000.00	69000.00	69000.00	8940.00	0.00
MWD Data													
Tool		SN	Type	Version	MWD Details					Battery Details			
Pulser					Orifice					Plug In Date			
Driver					Orifice Type					Plug In Time			
Directional					Pulse Width					Plug Out Date			
Battery 1					Data Rate					Plug Out Time			
Battery 2					EM Power					Plug In Hrs Tot			0.00
Battery 3					EM Freq					Plug In Hrs Day			0.00
Gamma					Fin Size (in)					Circ Hrs Total			14.53
Helix					Non Mag Above/Below					Circ Hours Day			0.00
Magnetics													
Total Field		49366.350		Declination		8.458		Total Correction		8.458			
Dip Angle		63.291		Grid Convergence		0.261		North Ref		TRUE			

Aggitator Details												
Agitator SN				Make		Model		Description			Agitator->Bit (Usft)	
Z0328				TTS		XRV		6 1/2" XRVagitator (ball drop)			5332.14	
Daily Activity												
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description		
04/13/2024	00:00	06:00	6.00	36.00	36.00	0.00	STBY		24B	On well 701H		
04/13/2024	06:00	08:00	2.00	36.00	36.00	0.00	SURFACE		1B	Rig up		
04/13/2024	08:00	08:20	0.33	36.00	36.00	0.00	SURFACE	1: BHA#1 (Surface)	6O	PU BHA 1		
04/13/2024	08:20	08:24	0.07	36.00	36.00	0.00	SURFACE	1: BHA#1 (Surface)	6A	TIH		
04/13/2024	08:24	09:37	1.22	36.00	86.00	50.00	SURFACE	1: BHA#1 (Surface)	2K	Rotary Drill f36.00 t86.00, wWOB 10.00,Flow 910.00, RPM20.00, Press 800.00, Tq 7400.00, ROP 41.10, Diff 175.00		
04/13/2024	09:37	10:30	0.88	86.00	86.00	0.00	SURFACE	1: BHA#1 (Surface)	10D	Survey & Connection		
04/13/2024	10:30	11:32	1.03	86.00	131.00	45.00	SURFACE	1: BHA#1 (Surface)	2K	Rotary Drill f86.00 t131.00, wWOB 12.00,Flow 1100.00, RPM40.00, Press 1200.00, Tq 9800.00, ROP 43.55, Diff 300.00		
04/13/2024	11:32	11:53	0.35	131.00	131.00	0.00	SURFACE	1: BHA#1 (Surface)	10D	Survey & Connection		
04/13/2024	11:53	13:47	1.90	131.00	206.00	75.00	SURFACE	1: BHA#1 (Surface)	2K	Rotary Drill f131.00 t206.00, wWOB 13.00,Flow 1200.00, RPM45.00, Press 1330.00, Tq 8700.0, ROP 39.47, Diff 330.00		
04/13/2024	13:47	14:31	0.73	206.00	206.00	0.00	SURFACE	1: BHA#1 (Surface)	8P	Fix Hobbble, Complete Rough Drilling Inspection		
04/13/2024	14:31	17:15	2.73	206.00	284.00	78.00	SURFACE	1: BHA#1 (Surface)	2K	Rotary Drill f206.00 t284.00, wWOB 12.00,Flow 1050.00, RPM45.00, Press 1100.00, Tq 9400.00, ROP 28.54, Diff 300.00		
04/13/2024	17:15	17:22	0.12	284.00	284.00	0.00	SURFACE	1: BHA#1 (Surface)	10D	Survey & Connection		
04/13/2024	17:22	18:49	1.45	284.00	374.00	90.00	SURFACE	1: BHA#1 (Surface)	2K	Rotary Drill f284.00 t374.00, wWOB 12.00,Flow 1050.00, RPM45.00, Press 1100.00, Tq 9400.00, ROP 62.07, Diff 300.00		
04/13/2024	18:49	19:20	0.52	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	5A	Circulate Hole Clean For TOH		
04/13/2024	19:20	19:47	0.45	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	6G	TOH		
04/13/2024	19:47	20:08	0.35	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	6F	TIH		
04/13/2024	20:08	21:00	0.87	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	5A	Circulate Hole Clean For TOH		
04/13/2024	21:00	22:00	1.00	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	6B	TOH		
04/13/2024	22:00	24:00	2.00	374.00	374.00	0.00	SURFACE	1: BHA#1 (Surface)	6P	L/D BHA		

Daily Drilling Report 04/14/2024

	Job #	18354				Operator	Logos Operating LLC						
	API Job # / AFE #	30-039-31441 / 20*240102				Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						
	Report #	2				Well	Rosa Unit 700H						
	Latitude:	36° 54' 50.663" N				Longitude	107° 23' 57.682" W						
	Rig:	HP 530				County / State	Rio Arriba / New Mexico						
	Date:	04/14/2024				Report Time	00:00-01:31						
	Daily Cost(USD)					Well Cost(USD)	10267.50						
Drilling Summary		24Hr ()	Run ()	Casing Data				Fluids					
Start Depth (Usft)		374.00		Csg Shoe MD(Usft)				600		%Sand			
End Depth (Usft)		374.00	374.00	OD (in)				300		%Solids			
Total Drilled (Usft)				Weight (lb/ft)				200		Weight (ppg)			
Slide Drilled (Usft)				Bit Data				100		Fluid Loss			
Rotary Drilled (Usft)				SN				6		PH			
Drig/Circ Hrs				Bit #				3		Mud Type	WBM		
Slide Drilling Hrs				OD (in)				10s Gel		Oil/Water			
Rotary Drilling Hrs				TFA				Temp(F)					
ROP Rot/Slide (Usft/hr)				Grade In				PV					
BRT Hrs				Grade Out				YP					
%Slide				Make				Viscosity					
%Rotary				Model				Chlorides					
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Andrew Baltas	Martin Leafstedt												
John Holland	Chris Hite												
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	0.00	11.80	39.00	111.00	1062.00	1106.00	825.00	0.00	69000.00	69000.00	69000.00	8940.00	0.00
Run	0.00	11.80	39.00	111.00	1062.00	1106.00	825.00	0.00	69000.00	69000.00	69000.00	8940.00	0.00
MWD Data													
Tool	SN	Type	Version	MWD Details						Battery Details			
Pulser				Orifice					Plug In Date				
Driver				Orifice Type					Plug In Time				
Directional				Pulse Width					Plug Out Date				
Battery 1				Data Rate					Plug Out Time				
Battery 2				EM Power					Plug In Hrs Tot		0.00		
Battery 3				EM Freq					Plug In Hrs Day		0.00		
Gamma				Fin Size (in)					Circ Hrs Total		14.53		
Helix				Non Mag Above/Below				58.17 / 31.19		Circ Hours Day		0.00	
Magnetics													
Total Field		49366.350		Declination				8.458	Total Correction			8.458	
Dip Angle		63.291		Grid Convergence				0.261	North Ref			TRUE	
Aggitator Details													
Agitator SN		Make	Model	Description						Agitator->Bit (Usft)			
Z0328		TTS	XRV	6 1/2" XRV agitator (ball drop)						5332.14			
Daily Activity													
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description			
04/14/2024	00:00	01:15	1.25	374.00	374.00	0.00	SURFACE		6O	P/U Cleanout BHA			
04/14/2024	01:15	01:30	0.25	374.00	374.00	0.00	SURFACE		6P	Stand Cleanout BHA Back			
04/14/2024	01:30	01:31	0.02	374.00	374.00	0.00	SURFACE		1A				

Daily Drilling Report 04/27/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC									
	Report #	3	Well	Rosa Unit 700H									
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W									
	Rig:	HP 530	County / State	Rio Arriba / New Mexico									
	Date:	04/27/2024	Report Time	00:00-24:00									
	Daily Cost(USD)	20093.00	Well Cost(USD)	30360.50									
24Hr Summary													
Casing Ops 701H, Walk Rig to 700H, Cleanout Run, P/U BHA#2, Drill INT #1													
24Hr Lookahead													
Drill INT #1													
Drilling Summary	24Hr (BHA 2)	Run (BHA 2)	Casing Data			Fluids							
Start Depth (Usft)	374.00	374.00	Csg Shoe MD(Usft)		600	5.00	%Sand	0.25					
End Depth (Usft)	952.00	952.00	OD (in)		300	3.00	%Solids	4.00					
Total Drilled (Usft)	578	578	Weight (lb/ft)		200	2.00	Weight (ppg)	9.00					
Slide Drilled (Usft)	293	293	Bit Data		100	1.00	Fluid Loss	100.00					
Rotary Drilled (Usft)	285	285	SN	A291711	6	1.00	PH	10.40					
Drig/Circ Hrs	6.17 / 1.08	6.17 / 1.08	Bit #	2	3	1.00	Mud Type	WBM					
Slide Drilling Hrs	3.35	3.35	OD (in)	17.500	10s Gel	1.00	Oil/Water	0/100					
Rotary Drilling Hrs	2.82	2.82	TFA	1.571	Temp(F)	120.00							
ROP Rot/Slide (Usft/hr)	101.18 / 87.46	101.18 / 87.46	Grade In	New	PV	2.00							
BRT Hrs	8.50	8.50	Grade Out	1-1-WT-S-X-I-NO-TD	YP	1.00							
%Slide	50.69	50.69	Make	NOV	Viscosity	30.00							
%Rotary	49.31	49.31	Model	TK86	Chlorides	300.00							
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Andrew Baltas	Chris Hite	Tyler Sjogren											
John Holland	Will Drake	JC Slaton											
BHA													
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
17 1/2" NOV TK86 jets 8x16 TFA 1.571 - 1.57 (8x16)				17.500	3.000			200.00	1.45	1.45			
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve				9.620	3.000			236.44	40.18	41.63			
8 Pony NMDC				7.900	3.500			156.78	11.80	53.43			
8 Spiral NMDC				7.960	3.625			139.69	27.56	80.99			
8" MMD GAP sub APS				7.960	3.438			101.42	4.93	85.92			
8 Spiral NMDC				7.980	3.500			139.19	27.66	113.58			
8 Steady Scout				8.000	3.125			155.09	32.24	145.82			
8 XO - 6 5/8 Reg Pin X4 1/2 XH				8.050	2.875			131.97	3.41	149.23			
6 1/2 DC (18 joints)				6.500	3.000			92.00	536.12	685.35			
6 1/2" Cougar jars				6.500	3.000			89.00	34.25	719.60			
6 1/2" DC (3 jts)				6.500	3.000			92.00	88.85	808.45			
6 1/2" XO - 4 1/2 XH pin X4 1/2 IF box				6.660	2.875			79.36	3.15	811.60			
5" HWDP (15 jts)				5.000	3.000		6.500	51.10	454.64	1266.24			
										1266.24			
Motor Details													
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-OSA-962-01-017		Scout		7/8	7.51		2.12	0.07		ADJ	3.9		
Surveys													
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)		
443.00	0.80	142.47	442.99	-1.29	2.62	0.29	49.33	-2.63	0.23	0.00	143.07		
533.00	2.19	73.31	532.96	-1.30	4.65	2.27	-90.58	-4.66	1.54	0.00	90.00		
621.00	3.83	55.27	620.84	0.86	8.68	2.13	-39.23	-8.67	1.86	-20.50	88.00		
744.00	6.30	29.19	743.36	9.09	15.35	2.70	-56.49	-15.25	2.01	-21.20	123.00		
838.00	8.50	16.25	836.58	20.27	19.81	2.92	-43.68	-19.58	2.34	-13.77	94.00		
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	93.73	23.33	40.00	108.00	1000.00	1433.33	1133.33	0.00	93.33	91.67	90.00	11142.86	0.00
Run	93.73	23.33	40.00	108.00	1000.00	1433.33	1133.33	0.00	93.33	91.67	90.00	11142.86	0.00
MWD Data													
Tool	SN	Type	Version	MWD Details					Battery Details				
Pulser				Orifice					Plug In Date				
Driver				Orifice Type					Plug In Time				
Directional				Pulse Width					Plug Out Date				
Battery 1				Data Rate					Plug Out Time				
Battery 2				EM Power					Plug In Hrs Tot				0.00
Battery 3				EM Freq					Plug In Hrs Day				0.00
Gamma				Fin Size (in)					Circ Hrs Total				14.53
Helix				Non Mag Above/Below					Circ Hours Day				0.00

Magnetics											
Total Field		49366.350		Declination			8.458		Total Correction		8.458
Dip Angle		63.291		Grid Convergence			0.261		North Ref		TRUE
Aggitator Details											
Agitator SN		Make		Model		Description				Agitator->Bit (Usft)	
Z0328		TTS		XRV		6 1/2" XRV agitator (ball drop)				5332.14	
Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
04/27/2024	00:00	02:00	2.00	374.00	374.00	0.00	STBY		12B	INT #1 Casing Ops on the 701H	
04/27/2024	02:00	03:00	1.00	374.00	374.00	0.00	STBY		24A	Rig Down Casing Crew and Rig up Cementers 701H	
04/27/2024	03:00	06:00	3.00	374.00	374.00	0.00	STBY		1C	Walk Rig from the 701H to the 700H	
04/27/2024	06:00	08:30	2.50	374.00	374.00	0.00	INT-1		1B	Prep For Clean Out	
04/27/2024	08:30	09:00	0.50	374.00	374.00	0.00	INT-1		8A	Rig Service	
04/27/2024	09:00	09:30	0.50	374.00	374.00	0.00	INT-1		6O	PU Dumb iron Clean Out BHA	
04/27/2024	09:30	10:10	0.67	374.00	374.00	0.00	INT-1		6A	TIH	
04/27/2024	10:10	12:39	2.48	374.00	374.00	0.00	INT-1		2A	Drill Shoe Track	
04/27/2024	12:39	13:30	0.85	374.00	374.00	0.00	INT-1		6B	TOH	
04/27/2024	13:30	15:30	2.00	374.00	374.00	0.00	INT-1	2: BHA2 Intermediate 1	6O	PU BHA#2	
04/27/2024	15:30	15:45	0.25	374.00	374.00	0.00	INT-1	2: BHA2 Intermediate 1	6A	TIH	
04/27/2024	15:45	16:30	0.75	374.00	374.00	0.00	INT-1	2: BHA2 Intermediate 1	5A	Work On Cellar Pumps	
04/27/2024	16:30	16:50	0.33	374.00	418.00	44.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/374.00 t/418.00, w/WOB 20.00,Flow 1000.00, RPM40.00, Press 1200.00, Tq 10800.00, ROP 132.00, Diff 200.00	
04/27/2024	16:50	16:56	0.10	418.00	418.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	16:56	18:00	1.07	418.00	507.00	89.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/418.00 t/507.00, w/WOB 20.00,Flow 1000.00, RPM40.00, Press 1200.00, Tq 10800.00, ROP 83.44, Diff 200.00	
04/27/2024	18:00	18:10	0.17	507.00	507.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	18:10	19:05	0.92	507.00	567.00	60.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f/507.00 t/567.00, TF 10.00M, w/WOB 20.00,Flow 1000.00, Press 1200.00, Tq 10800.00, ROP 65.45, Diff 200.00	
04/27/2024	19:05	19:21	0.27	567.00	597.00	30.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/567.00 t/597.00, w/WOB 20.00,Flow 1000.00, RPM40.00, Press 1200.00, Tq 10800.00, ROP 112.50, Diff 200.00	
04/27/2024	19:21	19:32	0.18	597.00	597.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	19:32	20:04	0.53	597.00	642.00	45.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f/597.00 t/642.00, TF 355.00M, w/WOB 20.00,Flow 1000.00, Press 1200.00, Tq 10800.00, ROP 84.37, Diff 200.00	
04/27/2024	20:04	20:24	0.33	642.00	685.00	43.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/642.00 t/685.00, w/WOB 20.00,Flow 1000.00, RPM40.00, Press 1200.00, Tq 10800.00, ROP 129.00, Diff 200.00	
04/27/2024	20:24	20:35	0.18	685.00	685.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	20:35	20:48	0.22	685.00	700.00	15.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/685.00 t/700.00, w/WOB 20.00,Flow 1000.00, RPM40.00, Press 1200.00, Tq 10800.00, ROP 0.00, Diff 200.00	
04/27/2024	20:48	21:42	0.90	700.00	778.00	78.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f/700.00 t/778.00, TF 325M, w/WOB 20.00,Flow 1000.00, Press 1200.00, Tq 10800.00, ROP 69.85, Diff 200.00	
04/27/2024	21:42	22:02	0.33	778.00	778.00	0.00	INT-1	2: BHA2 Intermediate 1	10C	PIU Jars	
04/27/2024	22:02	22:23	0.35	778.00	808.00	30.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/778.00 t/808.00, w/WOB 30,Flow 1000.00, RPM40.00, Press 1900, Tq 12000, ROP 85.71, Diff 500.00	
04/27/2024	22:23	22:35	0.20	808.00	808.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	22:35	23:05	0.50	808.00	868.00	60.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f/808.00 t/868.00, TF 315M, w/WOB 30,Flow 1000.00, Press 1900, Tq 12000, ROP 120.00, Diff 500.00	
04/27/2024	23:05	23:20	0.25	868.00	902.00	34.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/868.00 t/902.00, w/WOB 30,Flow 1000.00, RPM40.00, Press 1900, Tq 12000, ROP 136.00, Diff 500.00	
04/27/2024	23:20	23:30	0.17	902.00	902.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/27/2024	23:30	24:00	0.50	902.00	952.00	50.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f/902.00 t/952.00, TF 350M, w/WOB 30,Flow 1000.00, Press 1900, Tq 12000, ROP 100.00, Diff 500.00	

Daily Drilling Report 04/28/2024

	Job #	18354	Operator	Logos Operating LLC								
	API Job # / AFE #	30-039-31441 / 20*240102		Field	Rio Arriba, NM(NAD83) - Logos Operating LLC							
	Report #	4		Well	Rosa Unit 700H							
	Latitude:	36° 54' 50.663" N		Longitude	107° 23' 57.682" W							
	Rig:	HP 530		County / State	Rio Arriba / New Mexico							
	Date:	04/28/2024		Report Time	00:00-24:00							
	Daily Cost(USD)	8300.00		Well Cost(USD)	38660.50							
24Hr Summary												
Drill Int#1												
24Hr Lookahead												
Drill Int#1												
Drilling Summary		24Hr (BHA 2)	Run (BHA 2)	Casing Data			Fluids					
Start Depth (Usft)	952.00	374.00	Csg Shoe MD(Usft)			600	5.00	%Sand	0.25			
End Depth (Usft)	2557.00	2557.00	OD (in)			300	3.00	%Solids	6.00			
Total Drilled (Usft)	1605	2183	Weight (lb/ft)			200	2.00	Weight (ppg)	9.50			
Slide Drilled (Usft)	168	461	Bit Data			100	1.00	Fluid Loss	100.00			
Rotary Drilled (Usft)	1437	1722	SN			A291711	6	1.00	PH	9.60		
Drig/Circ Hrs	20.70 / 0.13	26.87 / 1.22	Bit #			2	3	1.00	Mud Type	WBM		
Slide Drilling Hrs	3.53	6.88	OD (in)			17.500	10s Gel	1.00	Oil/Water	0/100		
Rotary Drilling Hrs	17.17	19.98	TFA			1.571	Temp(F)	120.00				
ROP Rot/Slide (Usft/hr)	83.71 / 47.55	86.17 / 66.97	Grade In			New	PV	2.00				
BRT Hrs	24.00	32.50	Grade Out			1-1-WT-S-X-I-NO-TD	YP	1.00				
%Slide	10.47	21.12	Make			NOV	Viscosity	31.00				
%Rotary	89.53	78.88	Model			TK86	Chlorides	320.00				
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Andrew Baltas	Chris Hite	Tyler Sjogren										
John Holland	Will Drake	JC Slaton										
BHA												
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)		
17 1/2" NOV TK86 jets 8x16 TFA 1.571 - 1.57 (8x16)				17.500	3.000			200.00	1.45	1.45		
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve				9.620	3.000			236.44	40.18	41.63		
8 Pony NMDC				7.900	3.500			156.78	11.80	53.43		
8 Spiral NMDC				7.960	3.625			139.69	27.56	80.99		
8" MMD GAP sub APS				7.960	3.438			101.42	4.93	85.92		
8 Spiral NMDC				7.980	3.500			139.19	27.66	113.58		
8 Steady Scout				8.000	3.125			155.09	32.24	145.82		
8 XO - 6 5/8 Reg Pin X4 1/2 XH				8.050	2.875			131.97	3.41	149.23		
6 1/2 DC (18 joints)				6.500	3.000			92.00	536.12	685.35		
6 1/2" Cougar jars				6.500	3.000			89.00	34.25	719.60		
6 1/2" DC (3 jts)				6.500	3.000			92.00	88.85	808.45		
6 1/2" XO - 4 1/2 XH pin X4 1/2 IF box				6.660	2.875			79.36	3.15	811.60		
5" HWDP (15 jts)				5.000	3.000		6.500	51.10	454.64	1266.24		
										1266.24		
Motor Details												
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages	
TDI-OSA-962-01-017		Scout		7/8	7.51		2.12	0.07		ADJ	3.9	
Surveys												
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)	
930.00	10.87	11.44	927.26	35.30	23.43	2.72	-21.23	-23.05	2.58	-5.23	92.00	
1021.00	10.75	10.55	1016.65	52.05	26.68	0.23	-126.15	-26.12	-0.13	-0.98	91.00	
1110.00	12.45	12.00	1103.83	69.60	30.20	1.94	10.44	-29.44	1.91	1.63	89.00	
1202.00	12.04	13.24	1193.73	88.64	34.46	0.53	147.93	-33.50	-0.45	1.35	92.00	
1296.00	12.52	11.66	1285.58	108.16	38.76	0.62	-35.77	-37.59	0.51	-1.68	94.00	
1391.00	13.05	8.70	1378.23	128.85	42.47	0.89	-52.47	-41.07	0.56	-3.12	95.00	
1485.00	12.98	6.30	1469.82	149.83	45.23	0.58	-98.55	-43.61	-0.07	-2.55	94.00	
1580.00	13.42	3.46	1562.31	171.44	47.07	0.82	-57.23	-45.21	0.46	-2.99	95.00	
1674.00	13.41	9.03	1653.75	193.10	49.44	1.37	93.15	-47.34	-0.01	5.93	94.00	
1769.00	12.75	13.02	1746.28	214.19	53.53	1.18	128.10	-51.21	-0.69	4.20	95.00	
1863.00	12.46	12.39	1838.02	234.20	58.04	0.34	-154.94	-55.50	-0.31	-0.67	94.00	
1958.00	12.55	10.86	1930.76	254.35	62.18	0.36	-75.55	-59.43	0.09	-1.61	95.00	
2052.00	12.18	8.27	2022.58	274.19	65.53	0.71	-124.97	-62.56	-0.39	-2.76	94.00	
2147.00	12.85	6.68	2115.33	294.60	68.20	0.79	-27.99	-65.01	0.71	-1.67	95.00	
2241.00	12.33	7.07	2207.06	314.94	70.66	0.56	170.91	-67.24	-0.55	0.41	94.00	
2336.00	11.02	11.34	2300.10	333.91	73.69	1.65	148.67	-70.07	-1.38	4.49	95.00	
2430.00	9.94	7.68	2392.53	350.76	76.54	1.35	-150.14	-72.74	-1.15	-3.89	94.00	

Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	77.54	34.33	44.50	112.00	1000.00	2381.25	1675.00	0.00	129.54	125.04	117.71	20100.00	0.00
Run	81.25	30.67	43.33	111.00	1000.00	2065.28	1494.44	0.00	117.47	113.92	108.47	17777.78	0.00

MWD Data									
Tool	SN	Type	Version	MWD Details				Battery Details	
Pulser				Orifice				Plug In Date	
Driver				Orifice Type				Plug In Time	
Directional				Pulse Width				Plug Out Date	
Battery 1				Data Rate				Plug Out Time	
Battery 2				EM Power				Plug In Hrs Tot	0.00
Battery 3				EM Freq				Plug In Hrs Day	0.00
Gamma				Fin Size (in)				Circ Hrs Total	14.53
Helix				Non Mag Above/Below				Circ Hours Day	0.00

Magnetics					
Total Field	49366.350	Declination	8.458	Total Correction	8.458
Dip Angle	63.291	Grid Convergence	0.261	North Ref	TRUE

Aggitator Details					
Agitator SN	Make	Model	Description	Agitator->Bit (Usft)	
Z0328	TTS	XRV	6 1/2" XRV agitator (ball drop)	5332.14	

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
04/28/2024	00:00	00:28	0.47	952.00	994.00	42.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f952.00 t994.00, w/WOB 30,Flow 1000.00, RPM40.00, Press 1900, Tq 12000, ROP 90.00, Diff 500.00	
04/28/2024	00:28	00:40	0.20	994.00	994.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	00:40	01:26	0.77	994.00	1085.00	91.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f994.00 t1085.00, w/WOB 30,Flow 1000.00, RPM40.00, Press 1900, Tq 12000, ROP 118.70, Diff 500.00	
04/28/2024	01:26	01:37	0.18	1085.00	1085.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	01:37	02:10	0.55	1085.00	1135.00	50.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f1085.00 t1135.00, TF 0G, w/WOB 30,Flow 1000.00, Press 1900, Tq 12000, ROP 90.91, Diff 500.00	
04/28/2024	02:10	02:31	0.35	1135.00	1174.00	39.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1135.00 t1174.00, w/WOB 32,Flow 1000.00, RPM45, Press 2250, Tq 16000, ROP 111.43, Diff 550.00	
04/28/2024	02:31	02:42	0.18	1174.00	1174.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	02:42	03:32	0.83	1174.00	1266.00	92.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1174.00 t1266.00, w/WOB 32,Flow 1000.00, RPM45, Press 2250, Tq 16000, ROP 110.40, Diff 550.00	
04/28/2024	03:32	03:39	0.12	1266.00	1266.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	03:39	04:22	0.72	1266.00	1360.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1266.00 t1360.00, w/WOB 32,Flow 1000.00, RPM45, Press 2250, Tq 16000, ROP 131.16, Diff 550.00	
04/28/2024	04:22	04:32	0.17	1360.00	1360.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	04:32	05:21	0.82	1360.00	1455.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1360.00 t1455.00, w/WOB 35,Flow 1000.00, RPM45, Press 2350, Tq 18000, ROP 116.33, Diff 650.00	
04/28/2024	05:21	05:30	0.15	1455.00	1455.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	05:30	06:12	0.70	1455.00	1549.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1455.00 t1549.00, w/WOB 35,Flow 1000.00, RPM45, Press 2350, Tq 18000, ROP 134.29, Diff 650.00	
04/28/2024	06:12	06:19	0.12	1549.00	1549.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	06:19	06:58	0.65	1549.00	1644.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1549.00 t1644.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 146.15, Diff 800.00	
04/28/2024	06:58	07:06	0.13	1644.00	1644.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	07:06	07:10	0.07	1644.00	1648.00	4.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1644.00 t1648.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 60.00, Diff 800.00	
04/28/2024	07:10	07:49	0.65	1648.00	1700.00	52.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f1648.00 t1700.00, TF 100G, w/WOB 35,Flow 1000.00, Press 2500, Tq 23000, ROP 80.00, Diff 800.00	
04/28/2024	07:49	08:12	0.38	1700.00	1738.00	38.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1700.00 t1738.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 99.13, Diff 800.00	
04/28/2024	08:12	08:51	0.65	1738.00	1738.00	0.00	INT-1	2: BHA2 Intermediate 1	8P	Rig Service	
04/28/2024	08:51	08:54	0.05	1738.00	1738.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	08:54	09:56	1.03	1738.00	1833.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1738.00 t1833.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 91.94, Diff 800.00	
04/28/2024	09:56	10:04	0.13	1833.00	1833.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	10:04	11:08	1.07	1833.00	1927.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1833.00 t1927.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 88.12, Diff 800.00	
04/28/2024	11:08	11:16	0.13	1927.00	1927.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	11:16	12:56	1.67	1927.00	2022.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f1927.00 t2022.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 57.00, Diff 800.00	
04/28/2024	12:56	13:03	0.12	2022.00	2022.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	13:03	14:34	1.52	2022.00	2116.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2022.00 t2116.00, w/WOB 35,Flow 1000.00, RPM45, Press 2500, Tq 23000, ROP 61.98, Diff 800.00	
04/28/2024	14:34	14:43	0.15	2116.00	2116.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	14:43	16:25	1.70	2116.00	2211.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2116.00 t2211.00, w/WOB 35.00,Flow 1000.00, RPM45.00, Press 2500.00, Tq 23000.00, ROP 55.88, Diff 800.00	
04/28/2024	16:25	16:33	0.13	2211.00	2211.00	0.00	INT-1	2: BHA2 Intermediate 1	5A	Work On Cellar Pumps	
04/28/2024	16:33	16:39	0.10	2211.00	2211.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	16:39	16:40	0.02	2211.00	2215.00	4.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2211.00 t2215.00, w/WOB 35.00,Flow 1000.00, RPM45.00, Press 2500.00, Tq 23000.00, ROP 240.00, Diff 800.00	
04/28/2024	16:40	17:25	0.75	2215.00	2228.00	13.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f2215.00 t2228.00, TF 120G, w/WOB 35.00,Flow 1000.00, Press 2500.00, Tq 23000.00, ROP 17.33, Diff 800.00	
04/28/2024	17:25	19:11	1.77	2228.00	2305.00	77.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2228.00 t2305.00, w/WOB 35.00,Flow 1000.00, RPM45.00, Press 2500.00, Tq 23000.00, ROP 43.58, Diff 800.00	
04/28/2024	19:11	19:25	0.23	2305.00	2305.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	19:25	21:00	1.58	2305.00	2358.00	53.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f2305.00 t2358.00, TF 120G, w/WOB 35.00,Flow 1000.00, Press 2500.00, Tq 23000.00, ROP 33.47, Diff 800.00	
04/28/2024	21:00	21:35	0.58	2358.00	2400.00	42.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2358.00 t2400.00, w/WOB 35.00,Flow 1000.00, RPM45.00, Press 2500.00, Tq 23000.00, ROP 72.00, Diff 800.00	
04/28/2024	21:35	21:47	0.20	2400.00	2400.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	21:47	23:02	1.25	2400.00	2494.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2400.00 t2494.00, w/WOB 35.00,Flow 1000.00, RPM45.00, Press 2500.00, Tq 23000.00, ROP 75.20, Diff 800.00	
04/28/2024	23:02	23:11	0.15	2494.00	2494.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection	
04/28/2024	23:11	24:00	0.82	2494.00	2557.00	63.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2494.00 t2554.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 73.47, Diff 500.00	

Daily Drilling Report 04/29/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE #	30-039-31441 / 20*240102			Field	Rio Arriba, NM(NAD83) - Logos Operating LLC							
	Report #	5			Well	Rosa Unit 700H							
	Latitude:	36° 54' 50.663" N			Longitude	107° 23' 57.682" W							
	Rig:	HP 530			County / State	Rio Arriba / New Mexico							
	Date:	04/29/2024			Report Time	00:00-24:00							
	Daily Cost(USD)	8300.00			Well Cost(USD)	46960.50							
24Hr Summary													
Drill Int#1, Short Trip, Drill Int#1													
24Hr Lookahead													
Drill to TD, Circ, POOH, L/D BHA, Casing Ops													
Drilling Summary		24Hr (BHA2)	Run (BHA2)	Casing Data				Fluids					
Start Depth (Usft)	2557.00	374.00	Csg Shoe MD(Usft)			600	10.00	%Sand	0.25				
End Depth (Usft)	3338.00	3338.00	OD (in)			300	7.00	%Solids	5.00				
Total Drilled (Usft)	781	2964	Weight (lb/ft)			200	5.00	Weight (ppg)	9.30				
Slide Drilled (Usft)	173	634	Bit Data			100	3.00	Fluid Loss					
Rotary Drilled (Usft)	608	2330	SN		A291711	6	2.00	PH	8.80				
Drig/Circ Hrs	20.00 / 0.53	46.87 / 1.75	Bit #		2	3	1.00	Mud Type	WBM				
Slide Drilling Hrs	6.10	12.98	OD (in)		17.500	10s Gel	3.00	Oil/Water	0/100				
Rotary Drilling Hrs	13.90	33.88	TFA		1.571	Temp(F)	120.00						
ROP Rot/Slide (Usft/hr)	43.74 / 28.36	68.77 / 48.83	Grade In		New	PV	3.00						
BRT Hrs	24.00	56.50	Grade Out		1-1-WT-S-X-I-NO-TD	YP	4.00						
%Slide	22.15	21.39	Make		NOV	Viscosity	33.00						
%Rotary	77.85	78.61	Model		TK86	Chlorides	310.00						
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Andrew Baltes	Chris Hite	Tyler Sjogren											
John Holland	Will Drake	JC Slaton											
BHA													
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)				
17 1/2" NOV/TK86 jets 8x16 TFA 1.571 - 1.57 (8x16)			17.500	3.000			200.00	1.45	1.45				
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve			9.620	3.000			236.44	40.18	41.63				
8 Pony NMDC			7.900	3.500			156.78	11.80	53.43				
8 Spiral NMDC			7.960	3.625			139.69	27.56	80.99				
8" MWD GAP sub APS			7.960	3.438			101.42	4.93	85.92				
8 Spiral NMDC			7.980	3.500			139.19	27.66	113.58				
8 Steady Scout			8.000	3.125			155.09	32.24	145.82				
8 XO - 6 5/8 Reg Pin X4 1/2 XH			8.050	2.875			131.97	3.41	149.23				
6 1/2 DC (18 joints)			6.500	3.000			92.00	536.12	685.35				
6 1/2" Cougar jars			6.500	3.000			89.00	34.25	719.60				
6 1/2" DC (3 jts)			6.500	3.000			92.00	88.85	808.45				
6 1/2" XO - 4 1/2 XH pin X4 1/2 IF box			6.660	2.875			79.36	3.15	811.60				
5" HWDP (15 jts)			5.000	3.000		6.500	51.10	454.64	1266.24				
									1266.24				
Motor Details													
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-OSA-962-01-017		Scout		7/8	7.51		2.12	0.07		ADJ	3.9		
Surveys													
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)		
2525.00	9.49	7.99	2486.17	366.64	78.72	0.48	173.52	-74.75	-0.47	0.33	95.00		
2620.00	10.31	12.36	2579.75	382.70	81.63	1.17	44.66	-77.49	0.86	4.60	95.00		
2714.00	10.04	15.12	2672.28	398.83	85.57	0.59	120.33	-81.25	-0.29	2.94	94.00		
2809.00	10.04	13.83	2765.82	414.86	89.71	0.24	-90.64	-85.22	0.00	-1.36	95.00		
2903.00	9.91	16.20	2858.40	430.59	93.93	0.46	108.74	-89.26	-0.14	2.52	94.00		
2998.00	9.19	14.23	2952.08	445.79	98.07	0.83	-156.55	-93.24	-0.76	-2.07	95.00		
3093.00	8.11	13.31	3046.00	459.67	101.48	1.15	-173.15	-96.50	-1.14	-0.97	95.00		
3187.00	8.19	9.60	3139.05	472.72	104.12	0.57	-83.19	-99.00	0.09	-3.95	94.00		
Drilling Parameters													
	ROP (Usft/hr)	WOB (kilbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (kilbs)	ROT (kilbs)	SO (kilbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	39.05	43.00	45.00	113.00	1000.00	2500.00	2000.00	0.00	160.00	150.00	140.00	18000.00	0.00
Run	63.24	33.75	43.75	112.00	1000.00	2173.96	1620.83	0.00	128.10	122.94	116.35	17833.33	0.00

MWD Data														
Tool		SN	Type	Version		MWD Details					Battery Details			
Pulser						Orifice					Plug In Date			
Driver						Orifice Type					Plug In Time			
Directional						Pulse Width					Plug Out Date			
Battery 1						Data Rate					Plug Out Time			
Battery 2						EM Power					Plug In Hrs Tot		0.00	
Battery 3						EM Freq					Plug In Hrs Day		0.00	
Gamma						Fin Size (in)					Circ Hrs Total		14.53	
Helix						Non Mag Above/Below				58.17 / 31.19		Circ Hours Day		0.00
Magnetics														
Total Field		49366.350			Declination			8.458		Total Correction			8.458	
Dip Angle		63.291			Grid Convergence			0.261		North Ref			TRUE	
Aggitator Details														
Agitator SN		Make		Model		Description					Agitator->Bit (Usft)			
Z0328		TTS		XRV		6 1/2" XRV agitator (ball drop)					5332.14			
Daily Activity														
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description				
04/29/2024	00:00	00:25	0.42	2557.00	2589.00	32.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2557.00 t2589.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 76.80, Diff 500.00				
04/29/2024	00:25	00:35	0.17	2589.00	2589.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	00:35	02:25	1.83	2589.00	2639.00	50.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f2589.00 t2639.00, TF 50G, w/WOB 43,Flow 1000.00, Press 2500, Tq 18000, ROP 27.27, Diff 500.00				
04/29/2024	02:25	03:06	0.68	2639.00	2684.00	45.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2639.00 t2684.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 65.85, Diff 500.00				
04/29/2024	03:06	03:16	0.17	2684.00	2684.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	03:16	04:43	1.45	2684.00	2778.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2684.00 t2778.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 64.83, Diff 500.00				
04/29/2024	04:43	05:15	0.53	2778.00	2778.00	0.00	INT-1	2: BHA2 Intermediate 1	5B	Circulate and Clean Hole				
04/29/2024	05:15	06:30	1.25	2778.00	2778.00	0.00	INT-1	2: BHA2 Intermediate 1	6G	Wiper Trip				
04/29/2024	06:30	07:45	1.25	2778.00	2778.00	0.00	INT-1	2: BHA2 Intermediate 1	6F	TIH				
04/29/2024	07:45	11:15	3.50	2778.00	2873.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2778.00 t2873.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 27.14, Diff 500.00				
04/29/2024	11:15	11:21	0.10	2873.00	2873.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	11:21	14:57	3.60	2873.00	2967.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2873.00 t2967.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 26.11, Diff 500.00				
04/29/2024	14:57	15:01	0.07	2967.00	2967.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	15:01	17:11	2.17	2967.00	3062.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f2967.00 t3062.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 43.85, Diff 500.00				
04/29/2024	17:11	17:16	0.08	3062.00	3062.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	17:16	18:30	1.23	3062.00	3157.00	95.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f3062.00 t3157.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 77.03, Diff 500.00				
04/29/2024	18:30	18:42	0.20	3157.00	3157.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	18:42	21:13	2.52	3157.00	3220.00	63.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f3157.00 t3220.00, TF 0G, w/WOB 43,Flow 1000.00, Press 2500, Tq 18000, ROP 25.03, Diff 500.00				
04/29/2024	21:13	21:42	0.48	3220.00	3251.00	31.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f3220.00 t3251.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 64.14, Diff 500.00				
04/29/2024	21:42	21:53	0.18	3251.00	3251.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection				
04/29/2024	21:53	23:38	1.75	3251.00	3311.00	60.00	INT-1	2: BHA2 Intermediate 1	2J	Slide Drill f3251.00 t3311.00, TF 10G, w/WOB 43,Flow 1000.00, Press 2500, Tq 18000, ROP 34.29, Diff 500.00				
04/29/2024	23:38	24:00	0.37	3311.00	3338.00	27.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f3311.00 t3338.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 73.64, Diff 500.00				

Daily Drilling Report 04/30/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC									
	Report #	6	Well	Rosa Unit 700H									
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W									
	Rig:	HP 530	County / State	Rio Arriba / New Mexico									
	Date:	04/30/2024	Report Time	00:00-24:00									
	Daily Cost(USD)	8300.00	Well Cost(USD)	55260.50									
24Hr Summary													
Drill to TD, Circ, POOH, L/D BHA, Casing Ops													
24Hr Lookahead													
Int #2 Ops on RU 701H													
Drilling Summary		24Hr (BHA 2)	Run (BHA 2)	Casing Data		Fluids							
Start Depth (Usft)	3338.00	374.00	Csg Shoe MD(Usft)			600	10.00	%Sand	0.25				
End Depth (Usft)	3500.00	3500.00	OD (in)			300	7.00	%Solids	5.00				
Total Drilled (Usft)	162	3126	Weight (lb/ft)			200	5.00	Weight (ppg)	9.30				
Slide Drilled (Usft)		634	Bit Data			100	3.00	Fluid Loss					
Rotary Drilled (Usft)	162	2492	SN		A291711	6	2.00	PH	8.80				
Drig/Circ Hrs	2.25 / 1.87	49.12 / 3.62	Bit #		2	3	1.00	Mud Type	WBM				
Slide Drilling Hrs		12.98	OD (in)		17.500	10s Gel	3.00	Oil/Water	0/100				
Rotary Drilling Hrs	2.25	36.13	TFA		1.571	Temp(F)	120.00						
ROP Rot/Slide (Usft/hr)	72.00 / 0.00	68.97 / 48.83	Grade In		New	PV	3.00						
BRT Hrs	9.17	65.67	Grade Out		1-1-WT-S-X-I-NO-TD	YP	4.00						
%Slide		20.28	Make		NOV	Viscosity	33.00						
%Rotary	100.00	79.72	Model		TK86	Chlorides	310.00						
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Andrew Baltes	Chris Hite	Tyler Sjogren											
John Holland	Will Drake	JC Slaton											
BHA													
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
17 1/2" NOV/TK86 jets 8x16 TFA 1.571 - 1.57 (8x16)				17.500	3.000			200.00	1.45	1.45			
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve				9.620	3.000			236.44	40.18	41.63			
8 Pony NMDC				7.900	3.500			156.78	11.80	53.43			
8 Spiral NMDC				7.960	3.625			139.69	27.56	80.99			
8" MMD GAP sub APS				7.960	3.438			101.42	4.93	85.92			
8 Spiral NMDC				7.980	3.500			139.19	27.66	113.58			
8 Steady Scout				8.000	3.125			155.09	32.24	145.82			
8 XO - 6 5/8 Reg Pin X4 1/2 XH				8.050	2.875			131.97	3.41	149.23			
6 1/2 DC (18 joints)				6.500	3.000			92.00	536.12	685.35			
6 1/2" Cougar jars				6.500	3.000			89.00	34.25	719.60			
6 1/2" DC (3 jts)				6.500	3.000			92.00	88.85	808.45			
6 1/2" XO - 4 1/2 XH pin X4 1/2 IF box				6.660	2.875			79.36	3.15	811.60			
5" HWDP (15 jts)				5.000	3.000		6.500	51.10	454.64	1266.24			
										1266.24			
Motor Details													
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-OSA-962-01-017		Scout		7/8	7.51		2.12	0.07		ADJ	3.9		
Surveys													
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)		
3282.00	8.88	15.45	3233.00	486.46	107.20	1.17	54.44	-101.93	0.73	6.16	95.00		
3376.00	8.16	16.37	3325.96	499.85	111.02	0.78	169.73	-105.60	-0.77	0.98	94.00		
3436.00	8.47	12.47	3385.33	508.25	113.17	1.07	-63.14	-107.66	0.52	-6.50	60.00		
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	72.00	43.00	45.00	113.00	1000.00	2500.00	2000.00	0.00	160.00	150.00	140.00	18000.00	0.00
Run	63.64	33.75	43.75	112.00	1000.00	2173.96	1620.83	0.00	128.10	122.94	116.35	17833.33	0.00
MWD Data													
Tool	SN	Type	Version	MWD Details						Battery Details			
Pulser				Orifice						Plug In Date			
Driver				Orifice Type						Plug In Time			
Directional				Pulse Width						Plug Out Date			
Battery 1				Data Rate						Plug Out Time			
Battery 2				EM Power						Plug In Hrs Tot		0.00	
Battery 3				EM Freq						Plug In Hrs Day		0.00	
Gamma				Fin Size (in)						Circ Hrs Total		14.53	
Helix				Non Mag Above/Below						Circ Hours Day		0.00	
Magnetics													
Total Field		49366.350		Declination		8.458		Total Correction		8.458			
Dip Angle		63.291		Grid Convergence		0.261		North Ref		TRUE			

Aggitator Details												
Agitator SN			Make		Model		Description				Agitator->Bit (Usft)	
Z0328			TTS		XRV		6 1/2" XRV agitator (ball drop)				5332.14	
Daily Activity												
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description		
04/30/2024	00:00	00:06	0.10	3338.00	3346.00	8.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/3338.00 t/3346.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 80.00, Diff 500.00		
04/30/2024	00:06	00:16	0.17	3346.00	3346.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection		
04/30/2024	00:16	01:18	1.03	3346.00	3440.00	94.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/3346.00 t/3440.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 90.97, Diff 500.00		
04/30/2024	01:18	01:26	0.13	3440.00	3440.00	0.00	INT-1	2: BHA2 Intermediate 1	10D	Survey & Connection		
04/30/2024	01:26	01:36	0.17	3440.00	3452.00	12.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/3440.00 t/3452.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 72.00, Diff 500.00		
04/30/2024	01:36	02:53	1.28	3452.00	3452.00	0.00	INT-1	2: BHA2 Intermediate 1	5A	Work on Cellar Pumps		
04/30/2024	02:53	03:50	0.95	3452.00	3500.00	48.00	INT-1	2: BHA2 Intermediate 1	2K	Rotary Drill f/3452.00 t/3500.00, w/WOB 43,Flow 1000.00, RPM45.00, Press 2500, Tq 18000, ROP 50.53, Diff 500.00		
04/30/2024	03:50	03:55	0.08	3500.00	3500.00	0.00	INT-1	2: BHA2 Intermediate 1	10A	Survey At TD		
04/30/2024	03:55	04:30	0.58	3500.00	3500.00	0.00	INT-1	2: BHA2 Intermediate 1	5A	Circ and Clean Hole		
04/30/2024	04:30	07:45	3.25	3500.00	3500.00	0.00	INT-1	2: BHA2 Intermediate 1	6B	POOH		
04/30/2024	07:45	09:10	1.42	3500.00	3500.00	0.00	INT-1	2: BHA2 Intermediate 1	6P	Lay Down BHA		
04/30/2024	09:10	18:00	8.83	3500.00	3500.00	0.00	INT-1		12B	Casing Ops		
04/30/2024	18:00	20:00	2.00	3500.00	3500.00	0.00	INT-1		5A	Circ Prior to Cement Job		
04/30/2024	20:00	24:00	4.00	3500.00	3500.00	0.00	INT-1		12E	Cement		

Daily Drilling Report 05/12/2024

	Job #	18354	Operator	Logos Operating LLC										
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC										
	Report #	7	Well	Rosa Unit 700H										
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W										
	Rig:	HP 530	County / State	Rio Arriba / New Mexico										
	Date:	05/12/2024	Report Time	00:00-24:00										
	Daily Cost(USD)	17583.00	Well Cost(USD)	72843.50										
Drilling Summary		24Hr (BHA 3)	Run (BHA 3)	Casing Data				Fluids						
Start Depth (Usft)	3500.00	3500.00	Csg Shoe MD(Usft)	600	3.00	%Sand	0.25							
End Depth (Usft)	4360.00	4360.00	OD (in)	300	2.00	%Solids	2.00							
Total Drilled (Usft)	860	860	Weight (lb/ft)	200	1.00	Weight (ppg)	8.70							
Slide Drilled (Usft)	240	240	Bit Data	100	1.00	Fluid Loss	0.01							
Rotary Drilled (Usft)	620	620	SN	5348343	6	1.00	PH	10.60						
Drig/Circ Hrs	6.78 / 0.00	6.78 / 0.00	Bit #	3	3	1.00	Mud Type	WBM						
Slide Drilling Hrs	2.33	2.33	OD (in)	12.250	10s Gel	1.00	Oil/Water	0/100						
Rotary Drilling Hrs	4.45	4.45	TFA	1.178	Temp(F)	120.00								
ROP Rot/Slide (Usft/hr)	139.33 / 102.86	139.33 / 102.86	Grade In	New	PV	1.00								
BRT Hrs	10.25	10.25	Grade Out	1-1-WT-A-X-I-NO-TD	YP	1.00								
%Slide	27.91	27.91	Make	Baker Hughes	Viscosity	28.00								
%Rotary	72.09	72.09	Model	D506VTX	Chlorides	750.00								
Personnel														
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man		
Andrew Baltes	Chris Hileartin Leafstead	JC Slaton												
John Holland	Chris Hite	Marlon Martin												
BHA														
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)					
12 1/4" Hughes D506VTX6x16 - 1.18 (6x16)			12.250	3.000			200.00	1.45	1.45					
9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve			9.620	3.000			185.19	41.04	42.49					
8 PonyNMDC			8.050	3.520			124.72	13.63	56.12					
8 Spiral NMDC			8.030	3.500			142.70	27.68	83.80					
8 MMD GAP sub APS			7.960	3.438			102.25	4.89	88.69					
8 Spiral NMDC			8.050	3.500			141.71	29.99	118.68					
8 Steady Scout			7.950	3.000			154.80	32.30	150.98					
BICO PBL Sub			8.250	3.500			101.00	8.24	159.22					
8 XO - 6 5/8 Reg Pin X4 1/2 XH			6.800	2.750			72.82	4.12	163.34					
6 1/2 DC (15 joints)			6.500	3.000			92.00	448.68	612.02					
6 1/2" Cougar jars			6.500	3.000			89.00	32.15	644.17					
6 1/2" DC (6 jts)			6.500	3.000			92.00	176.29	820.46					
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box			6.720	2.875			73.14	3.76	824.22					
5" HWDP (15 jts)			5.000	3.000		6.500	51.10	454.64	1278.86					
									1278.86					
Motor Details														
SN	Make	Model	Lobes	Bit to Bend(Usft)	Bend	Rev Per (gpm)	Housing	Stages						
TDI-962-01-004	Scout	Turbo Scout	7/8	7.49	2.12	0.15	ADJ	5.9						
Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
3436.00	8.47	12.47	3385.33	508.25	113.17	1.07	-63.14	-107.66	0.52	-6.50	60.00			
3575.00	9.44	9.08	3522.64	529.51	117.18	0.79	-30.23	-111.44	0.70	-2.44	139.00			
3670.00	11.20	11.14	3616.10	546.25	120.19	1.89	12.86	-114.28	1.85	2.17	95.00			
3764.00	13.39	12.26	3707.94	565.85	124.27	2.34	6.76	-118.14	2.33	1.19	94.00			
3859.00	14.11	12.07	3800.21	587.92	129.03	0.76	-3.68	-122.66	0.76	-0.20	95.00			
3954.00	14.71	11.90	3892.23	611.05	133.93	0.63	-4.12	-127.31	0.63	-0.18	95.00			
4049.00	16.07	12.83	3983.82	635.67	139.34	1.45	10.73	-132.45	1.43	0.98	95.00			
4143.00	17.62	11.55	4073.78	662.30	145.08	1.70	-14.07	-137.90	1.65	-1.36	94.00			
4238.00	17.74	9.96	4164.29	690.64	150.46	0.52	-76.80	-142.98	0.13	-1.67	95.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (kibs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (kibs)	ROT (kibs)	SO (kibs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	126.78	28.00	28.24	124.00	620.00	1700.00	1250.00	0.00	184.80	170.80	156.80	14488.24	0.00	
Run	126.78	28.00	28.24	124.00	620.00	1700.00	1250.00	0.00	184.80	170.80	156.80	14488.24	0.00	
MWD Data														
Tool	SN	Type	Version	MWD Details					Battery Details					
Pulser				Orifice					Plug In Date					
Driver				Orifice Type					Plug In Time					
Directional				Pulse Width					Plug Out Date					
Battery 1				Data Rate					Plug Out Time					
Battery 2				EM Power					Plug In Hrs Tot				0.00	
Battery 3				EM Freq					Plug In Hrs Day				0.00	
Gamma				Fin Size (in)					Circ Hrs Total				14.53	
Helix				Non Mag Above/Below					58.17 / 31.19					
										Circ Hours Day				0.00

Magnetics					
Total Field	49366.350	Declination	8.458	Total Correction	8.458
Dip Angle	63.291	Grid Convergence	0.261	North Ref	TRUE
Aggitator Details					
Agitator SN	Make	Model	Description	Agitator->Bit (Usft)	
20328	TTS	XRV	6 1/2" XRVagitator (ball drop)	5332.14	

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
05/12/2024	00:00	01:30	1.50	3500.00	3500.00	0.00	STBY		24A	On well 704H cementing	
05/12/2024	01:30	04:30	3.00	3500.00	3500.00	0.00	STBY		1B	LD cement equipment. landing jt, etc	
05/12/2024	04:30	05:00	0.50	3500.00	3500.00	0.00	STBY		14A	Nipple down BOP for skid to 700H	
05/12/2024	05:00	06:30	1.50	3500.00	3500.00	0.00	STBY		1C	Prepare for skid / Skid	
05/12/2024	06:30	08:00	1.50	3500.00	3500.00	0.00	STBY		14A	Nipple up BOP / set up for offline cement of 704H	
05/12/2024	08:00	11:15	3.25	3500.00	3500.00	0.00	STBY		1B	Rig up	
05/12/2024	11:15	13:45	2.50	3500.00	3500.00	0.00	STBY	3: BHA 3 (Intermediate 2)	6O	PU BHA	
05/12/2024	13:45	16:00	2.25	3500.00	3500.00	0.00	STBY	3: BHA 3 (Intermediate 2)	6A	TIH	
05/12/2024	16:00	16:50	0.83	3500.00	3500.00	0.00	STBY	3: BHA 3 (Intermediate 2)	2A	Drill Shoe Track	
05/12/2024	16:50	17:27	0.62	3500.00	3547.00	47.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3500.00 t/3547.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 76.22, Diff 350.00	
05/12/2024	17:27	17:31	0.07	3547.00	3547.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	17:31	17:48	0.28	3547.00	3565.00	18.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3547.00 t/3565.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 63.53, Diff 350.00	
05/12/2024	17:48	18:10	0.37	3565.00	3590.00	25.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/3565.00 t/3590.00, TF G, w/WOB 20.00,Flow 500.00, Press 1200.00, Tq 12400.00, ROP 68.18, Diff 350.00	
05/12/2024	18:10	18:33	0.38	3590.00	3642.00	52.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3590.00 t/3642.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 135.65, Diff 350.00	
05/12/2024	18:33	18:38	0.08	3642.00	3642.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	18:38	18:47	0.15	3642.00	3660.00	18.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3642.00 t/3660.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 120.00, Diff 350.00	
05/12/2024	18:47	19:00	0.22	3660.00	3685.00	25.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/3660.00 t/3685.00, TF G, w/WOB 20.00,Flow 500.00, Press 1200.00, Tq 12400.00, ROP 115.38, Diff 350.00	
05/12/2024	19:00	19:15	0.25	3685.00	3737.00	52.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3685.00 t/3737.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 208.00, Diff 350.00	
05/12/2024	19:15	19:20	0.08	3737.00	3737.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	19:20	19:27	0.12	3737.00	3755.00	18.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3737.00 t/3755.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 154.29, Diff 350.00	
05/12/2024	19:27	19:40	0.22	3755.00	3780.00	25.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/3755.00 t/3780.00, TF G, w/WOB 20.00,Flow 500.00, Press 1200.00, Tq 12400.00, ROP 115.38, Diff 350.00	
05/12/2024	19:40	19:53	0.22	3780.00	3831.00	51.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3780.00 t/3831.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 235.38, Diff 350.00	
05/12/2024	19:53	19:58	0.08	3831.00	3831.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	19:58	20:03	0.08	3831.00	3849.00	18.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3831.00 t/3849.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 216.00, Diff 350.00	
05/12/2024	20:03	20:15	0.20	3849.00	3869.00	20.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/3849.00 t/3869.00, TF G, w/WOB 20.00,Flow 500.00, Press 1200.00, Tq 12400.00, ROP 100.00, Diff 350.00	
05/12/2024	20:15	20:28	0.22	3869.00	3926.00	57.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3869.00 t/3926.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 263.08, Diff 350.00	
05/12/2024	20:28	20:58	0.50	3926.00	3926.00	0.00	STBY	3: BHA 3 (Intermediate 2)	8P	Rig Service	
05/12/2024	20:58	21:03	0.08	3926.00	3926.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	21:03	21:10	0.12	3926.00	3944.00	18.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3926.00 t/3944.00, w/WOB 20.00,Flow 500.00, RPM20.00, Press 1200.00, Tq 12400.00, ROP 154.29, Diff 350.00	
05/12/2024	21:10	21:28	0.30	3944.00	3979.00	35.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/3944.00 t/3979.00, TF G, w/WOB 20.00,Flow 500.00, Press 1200.00, Tq 12400.00, ROP 116.67, Diff 350.00	
05/12/2024	21:28	21:39	0.18	3979.00	4021.00	42.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/3979.00 t/4021.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 12400.00, ROP 229.09, Diff 600.00	
05/12/2024	21:39	21:44	0.08	4021.00	4021.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	21:44	21:50	0.10	4021.00	4040.00	19.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4021.00 t/4040.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 12400.00, ROP 190.00, Diff 600.00	
05/12/2024	21:50	22:08	0.30	4040.00	4075.00	35.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/4040.00 t/4075.00, TF G, w/WOB 40.00,Flow 800.00, Press 2450.00, Tq 12400.00, ROP 116.67, Diff 600.00	
05/12/2024	22:08	22:18	0.17	4075.00	4116.00	41.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4075.00 t/4116.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 19500.00, ROP 246.00, Diff 600.00	
05/12/2024	22:18	22:22	0.07	4116.00	4116.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	22:22	22:28	0.10	4116.00	4135.00	19.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4116.00 t/4135.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 19500.00, ROP 190.00, Diff 600.00	
05/12/2024	22:28	22:48	0.33	4135.00	4170.00	35.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/4135.00 t/4170.00, TF G, w/WOB 40.00,Flow 800.00, Press 2450.00, Tq 19500.00, ROP 105.00, Diff 600.00	
05/12/2024	22:48	22:58	0.17	4170.00	4210.00	40.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4170.00 t/4210.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 19500.00, ROP 240.00, Diff 600.00	
05/12/2024	22:58	23:03	0.08	4210.00	4210.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	23:03	23:25	0.37	4210.00	4305.00	95.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4210.00 t/4305.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 19500.00, ROP 259.09, Diff 600.00	
05/12/2024	23:25	23:30	0.08	4305.00	4305.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection	
05/12/2024	23:30	23:36	0.10	4305.00	4320.00	15.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4305.00 t/4320.00, w/WOB 40.00,Flow 800.00, RPM40.00, Press 2450.00, Tq 19500.00, ROP 150.00, Diff 600.00	
05/12/2024	23:36	24:00	0.40	4320.00	4360.00	40.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/4320.00 t/4360.00, TF G, w/WOB 40.00,Flow 800.00, Press 2450.00, Tq 19500.00, ROP 100.00, Diff 600.00	

Daily Drilling Report 05/13/2024

	Job #	18354	Operator	Logos Operating LLC								
	API Job # / AFE #	30-039-31441 / 20*240102		Field	Rio Arriba, NM(NAD83) - Logos Operating LLC							
	Report #	8		Well	Rosa Unit 700H							
	Latitude:	36° 54' 50.663" N		Longitude	107° 23' 57.682" W							
	Rig:	HP 530		County / State	Rio Arriba / New Mexico							
	Date:	05/13/2024		Report Time	00:00-24:00							
	Daily Cost(USD)	9600.00		Well Cost(USD)	82443.50							
24Hr Summary												
Drill intermediate 2, fight loses												
24Hr Lookahead												
Drill intermediate 2 to TD												
Drilling Summary		24Hr (BHA 3)	Run (BHA 3)	Casing Data				Fluids				
Start Depth (Usft)	4360.00		3500.00	Csg Shoe MD(Usft)				600	3.00	%Sand	0.25	
End Depth (Usft)	5978.00		5978.00	OD (in)				300	2.00	%Solids	2.00	
Total Drilled (Usft)	1618		2478	Weight (lb/ft)				200	1.00	Weight (ppg)	8.70	
Slide Drilled (Usft)	20		260	Bit Data				100	1.00	Fluid Loss	0.01	
Rotary Drilled (Usft)	1598		2218	SN		5348343		6	1.00	PH	10.60	
Drig/Circ Hrs	13.72 / 4.72		20.50 / 4.72	Bit #		3		3	1.00	Mud Type	WBM	
Slide Drilling Hrs	0.27		2.60	OD (in)		12.250		10s Gel	1.00	Oil/Water	0/100	
Rotary Drilling Hrs	13.45		17.90	TFA		1.178		Temp(F)	120.00			
ROP Rot/Slide (Usft/hr)	118.81 / 75.00		123.91 / 100.00	Grade In		New		PV	1.00			
BRT Hrs	24.00		34.25	Grade Out		1-1-WT-A-X-I-NO-TD		YP	1.00			
%Slide	1.24		10.49	Make		Baker Hughes		Viscosity	28.00			
%Rotary	98.76		89.51	Model		D506VTX		Chlorides	750.00			
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Andrew Baltes	Chris Hileartin Leafstead	JC Slaton										
John Holland	Chris Hite	Marlon Martin										
BHA												
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)		Total Length (Usft)		
12 1/4" Hughes D506VTX6x16 - 1.18 (6x16)			12.250	3.000			200.00	1.45		1.45		
9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve			9.620	3.000			185.19	41.04		42.49		
8 Pony NMDC			8.050	3.520			124.72	13.63		56.12		
8 Spiral NMDC			8.030	3.500			142.70	27.68		83.80		
8 MMD GAP sub APS			7.960	3.438			102.25	4.89		88.69		
8 Spiral NMDC			8.050	3.500			141.71	29.99		118.68		
8 Steady Scout			7.950	3.000			154.80	32.30		150.98		
BICO PBL Sub			8.250	3.500			101.00	8.24		159.22		
8 XO- 6 5/8 Reg Pin X4 1/2 XH			6.800	2.750			72.82	4.12		163.34		
6 1/2 DC (15 joints)			6.500	3.000			92.00	448.68		612.02		
6 1/2" Cougar jars			6.500	3.000			89.00	32.15		644.17		
6 1/2" DC (6 jts)			6.500	3.000			92.00	176.29		820.46		
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box			6.720	2.875			73.14	3.76		824.22		
5" HWDP (15 jts)			5.000	3.000		6.500	51.10	454.64		1278.86		
										1278.86		
Motor Details												
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-962-01-004	Scout	Turbo Scout	7/8	7.49		2.12	0.15		ADJ	5.9		

Surveys											
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)
4333.00	18.49	9.74	4254.59	719.74	155.51	0.79	-5.32	-147.72	0.79	-0.23	95.00
4427.00	19.33	13.08	4343.51	749.59	161.56	1.46	53.78	-153.44	0.89	3.55	94.00
4522.00	17.44	13.09	4433.66	778.77	168.34	1.99	179.91	-159.90	-1.99	0.01	95.00
4616.00	16.29	11.82	4523.62	805.40	174.23	1.28	-162.84	-165.51	-1.22	-1.35	94.00
4710.00	15.85	11.54	4613.94	830.88	179.50	0.48	-170.14	-170.50	-0.47	-0.30	94.00
4773.00	14.57	10.84	4674.74	847.09	182.71	2.05	-172.17	-173.53	-2.03	-1.11	63.00
4836.00	13.10	9.27	4735.91	861.92	185.35	2.41	-166.43	-176.01	-2.33	-2.49	63.00
4899.00	12.02	8.86	4797.40	875.45	187.51	1.72	-175.48	-178.03	-1.71	-0.65	63.00
4962.00	11.06	9.01	4859.12	887.90	189.47	1.52	178.28	-179.85	-1.52	0.24	63.00
5025.00	10.06	7.68	4921.06	899.32	191.15	1.63	-166.95	-181.41	-1.59	-2.11	63.00
5087.00	8.89	7.30	4982.21	909.44	192.48	1.89	-177.13	-182.63	-1.89	-0.61	62.00
5150.00	7.71	7.23	5044.55	918.46	193.63	1.87	-179.54	-183.68	-1.87	-0.11	63.00
5213.00	6.88	8.77	5107.04	926.38	194.74	1.35	167.51	-184.70	-1.32	2.44	63.00
5276.00	6.51	7.88	5169.61	933.65	195.81	0.61	-164.78	-185.69	-0.59	-1.41	63.00
5339.00	5.84	8.51	5232.24	940.36	196.77	1.07	174.54	-186.58	-1.06	1.00	63.00
5402.00	5.68	9.35	5294.92	946.60	197.75	0.29	152.63	-187.50	-0.25	1.33	63.00
5464.00	5.52	7.25	5356.63	952.59	198.62	0.42	-129.02	-188.31	-0.26	-3.39	62.00
5590.00	5.49	9.12	5482.05	964.55	200.34	0.14	100.42	-189.90	-0.02	1.48	126.00
5653.00	5.07	10.05	5544.78	970.27	201.31	0.68	168.95	-190.80	-0.67	1.48	63.00
5716.00	4.88	11.00	5607.54	975.64	202.31	0.33	157.03	-191.74	-0.30	1.51	63.00
5779.00	4.86	10.52	5670.31	980.90	203.30	0.07	-116.38	-192.68	-0.03	-0.76	63.00
5841.00	4.88	10.97	5732.09	986.07	204.29	0.07	62.59	-193.60	0.03	0.73	62.00

Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	117.96	30.93	40.00	145.00	679.63	2085.19	1558.33	0.00	217.00	186.33	158.11	18923.08	0.00
Run	120.88	29.52	35.35	136.00	650.96	1900.00	1410.10	0.00	201.52	178.87	157.48	17169.77	0.00

MWD Data													
Tool		SN	Type	Version	MWD Details					Battery Details			
Pulser					Orifice					Plug In Date			
Driver					Orifice Type					Plug In Time			
Directional					Pulse Width					Plug Out Date			
Battery 1					Data Rate					Plug Out Time			
Battery 2					EM Power					Plug In Hrs Tot			0.00
Battery 3					EM Freq					Plug In Hrs Day			0.00
Gamma					Fin Size (in)					Circ Hrs Total			14.53
Helix					Non Mag Above/Below					Circ Hours Day			0.00

Magnetics													
Total Field		49366.350			Declination				8.458	Total Correction			
Dip Angle		63.291			Grid Convergence				0.261	North Ref			TRUE

Aggitator Details													
Agitator SN		Make		Model		Description					Agitator->Bit (Usft)		
Z0328		TTS		XRv		6 1/2" XRv agitator (ball drop)					5332.14		

Daily Activity													
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description			
05/13/2024	00:00	00:07	0.12	4360.00	4400.00	40.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4360.00 t/4400.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 342.86, Diff 600.00			
05/13/2024	00:07	00:11	0.07	4400.00	4400.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	00:11	00:16	0.08	4400.00	4415.00	15.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4400.00 t/4415.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 180.00, Diff 600.00			
05/13/2024	00:16	00:32	0.27	4415.00	4435.00	20.00	STBY	3: BHA 3 (Intermediate 2)	2J	Slide Drill f/4415.00 t/4435.00, TF G, w/WOB 40.00,Flow 800.00, Press 2450.00, Tq 19500.00, ROP 75.00, Diff 600.00			
05/13/2024	00:32	00:47	0.25	4435.00	4494.00	59.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4435.00 t/4494.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 236.00, Diff 600.00			
05/13/2024	00:47	00:51	0.07	4494.00	4494.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	00:51	01:33	0.70	4494.00	4589.00	95.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4494.00 t/4589.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 135.71, Diff 600.00 - Control Drill Start @4555			
05/13/2024	01:33	01:38	0.08	4589.00	4589.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	01:38	02:56	1.30	4589.00	4683.00	94.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4589.00 t/4683.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 72.31, Diff 600.00			
05/13/2024	02:56	03:18	0.37	4683.00	4683.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	03:18	04:20	1.03	4683.00	4777.00	94.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4683.00 t/4777.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 90.97, Diff 600.00			
05/13/2024	04:20	04:25	0.08	4777.00	4777.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	04:25	04:58	0.55	4777.00	4871.00	94.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4777.00 t/4871.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 170.91, Diff 600.00			
05/13/2024	04:58	05:06	0.13	4871.00	4871.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			
05/13/2024	05:06	05:30	0.40	4871.00	4934.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4871.00 t/4934.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 157.50, Diff 600.00			
05/13/2024	05:30	05:40	0.17	4934.00	4934.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection			

05/13/2024	05:40	06:03	0.38	4934.00	4997.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4934.00 t/4997.00, w/WOB 40.00,Flow 800.00, RPM 40.00, Press 2450.00, Tq 19500.00, ROP 164.35, Diff 600.00
05/13/2024	06:03	06:16	0.22	4997.00	4997.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	06:16	06:36	0.33	4997.00	5060.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/4997.00 t/5060.00, w/WOB 40.00,Flow 700.00, RPM 40.00, Press 2350.00, Tq 20200.00, ROP 189.00, Diff 700.00
05/13/2024	06:36	06:44	0.13	5060.00	5060.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	06:44	07:02	0.30	5060.00	5123.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5060.00 t/5123.00, w/WOB 40.00,Flow 700.00, RPM 40.00, Press 2350.00, Tq 20200.00, ROP 210.00, Diff 700.00
05/13/2024	07:02	07:10	0.13	5123.00	5123.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	07:10	07:25	0.25	5123.00	5186.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5123.00 t/5186.00, w/WOB 40.00,Flow 750.00, RPM 40.00, Press 2600.00, Tq 20900.00, ROP 252.00, Diff 700.00
05/13/2024	07:25	07:36	0.18	5186.00	5186.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	07:36	07:53	0.28	5186.00	5249.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5186.00 t/5249.00, w/WOB 40.00,Flow 750.00, RPM 40.00, Press 2600.00, Tq 20900.00, ROP 222.35, Diff 700.00
05/13/2024	07:53	08:02	0.15	5249.00	5249.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	08:02	08:19	0.28	5249.00	5311.00	62.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5249.00 t/5311.00, w/WOB 40.00,Flow 750.00, RPM 40.00, Press 2600.00, Tq 20900.00, ROP 218.82, Diff 700.00
05/13/2024	08:19	08:27	0.13	5311.00	5311.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	08:27	08:46	0.32	5311.00	5374.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5311.00 t/5374.00, w/WOB 40.00,Flow 750.00, RPM 40.00, Press 2600.00, Tq 20900.00, ROP 198.95, Diff 700.00
05/13/2024	08:46	08:57	0.18	5374.00	5374.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	08:57	09:34	0.62	5374.00	5437.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5374.00 t/5437.00, w/WOB 40.00,Flow 750.00, RPM 40.00, Press 2600.00, Tq 20900.00, ROP 102.16, Diff 700.00, Temp 129.00 - Start Control drilling at 5400 (75 fthr)
05/13/2024	09:34	09:44	0.17	5437.00	5437.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	09:44	10:35	0.85	5437.00	5500.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5437.00 t/5500.00, w/WOB 22.00,Flow 700.00, RPM 40.00, Press 1950.00, Tq 17500.00, ROP 74.12, Diff 175.00, Temp 129.00
05/13/2024	10:35	10:45	0.17	5500.00	5500.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	10:45	11:43	0.97	5500.00	5563.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5500.00 t/5563.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 65.17, Diff 350.00, Temp 129.00 - Losses start at 5538 ft
05/13/2024	11:43	12:15	0.53	5563.00	5563.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	12:15	12:58	0.72	5563.00	5626.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5563.00 t/5626.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 87.91, Diff 350.00, Temp 129.00 - Control drill at 100 fph
05/13/2024	12:58	13:11	0.22	5626.00	5626.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	13:11	13:49	0.63	5626.00	5689.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5626.00 t/5689.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 99.47, Diff 350.00, Temp 129.00
05/13/2024	13:49	13:58	0.15	5689.00	5689.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	13:58	14:37	0.65	5689.00	5751.00	62.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5689.00 t/5751.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 95.38, Diff 350.00, Temp 129.00
05/13/2024	14:37	14:49	0.20	5751.00	5751.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	14:49	15:28	0.65	5751.00	5814.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5751.00 t/5814.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 96.92, Diff 350.00, Temp 129.00
05/13/2024	15:28	15:37	0.15	5814.00	5814.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	15:37	16:16	0.65	5814.00	5877.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5814.00 t/5877.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 96.92, Diff 350.00, Temp 129.00
05/13/2024	16:16	16:24	0.13	5877.00	5877.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	16:24	17:03	0.65	5877.00	5940.00	63.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5877.00 t/5940.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 96.92, Diff 350.00, Temp 129.00
05/13/2024	17:03	17:34	0.52	5940.00	5940.00	0.00	STBY	3: BHA 3 (Intermediate 2)	10D	Survey & Connection
05/13/2024	17:34	17:45	0.18	5940.00	5955.00	15.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5940.00 t/5955.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 81.82, Diff 350.00, Temp 129.00
05/13/2024	17:45	18:35	0.83	5955.00	5955.00	0.00	STBY	3: BHA 3 (Intermediate 2)	5A	Circulate LCMFor Losses
05/13/2024	18:35	18:53	0.30	5955.00	5978.00	23.00	STBY	3: BHA 3 (Intermediate 2)	2K	Rotary Drill f/5955.00 t/5978.00, w/WOB 17.00,Flow 500.00, RPM 40.00, Press 1350.00, Tq 17500.00, ROP 76.67, Diff 350.00, Temp 129.00
05/13/2024	18:53	20:11	1.30	5978.00	5978.00	0.00	STBY	3: BHA 3 (Intermediate 2)	5A	Spot H-Seal Pill
05/13/2024	20:11	21:25	1.23	5978.00	5978.00	0.00	STBY	3: BHA 3 (Intermediate 2)	6G	Pull Up To 4535
05/13/2024	21:25	24:00	2.58	5978.00	5978.00	0.00	STBY	3: BHA 3 (Intermediate 2)	5A	Circulate

Daily Drilling Report 05/14/2024

	Job #	18354	Operator	Logos Operating LLC										
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC										
	Report #	9	Well	Rosa Unit 700H										
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W										
	Rig:	HP 530	County / State	Rio Arriba / New Mexico										
	Date:	05/14/2024	Report Time	00:00-24:00										
	Daily Cost(USD)	9600.00	Well Cost(USD)	92043.50										
24Hr Summary														
Drill Intermediate 2 to TD, Circulate, TOH														
24Hr Lookahead														
RU Run Casing, Cement 1 stage online, skid rig														
Drilling Summary	24Hr (BHA 3)	Run (BHA 3)	Casing Data			Fluids								
Start Depth (Usft)	5978.00	3500.00	Csg Shoe MD(Usft)		600	3.00	%Sand	0.25						
End Depth (Usft)	6385.00	6385.00	OD (in)		300	2.00	%Solids	2.00						
Total Drilled (Usft)	407	2885	Weight (lb/ft)		200	1.00	Weight (ppg)	8.70						
Slide Drilled (Usft)		260	Bit Data		100	1.00	Fluid Loss	0.01						
Rotary Drilled (Usft)	407	2625	SN	5348343	6	1.00	PH	10.60						
Drig/Circ Hrs	4.67 / 6.60	25.17 / 11.32	Bit #	3	3	1.00	Mud Type	WBM						
Slide Drilling Hrs		2.60	OD (in)	12.250	10s Gel	1.00	Oil/Water	0/100						
Rotary Drilling Hrs	4.67	22.57	TFA	1.178	Temp(F)	120.00								
ROP Rot/Slide (Usft/hr)	87.21 / 0.00	116.32 / 100.00	Grade In	New	PV	1.00								
BRT Hrs	17.75	52.00	Grade Out	1-1-WT-A-X-I-NO-TD	YP	1.00								
%Slide		9.01	Make	Baker Hughes	Viscosity	28.00								
%Rotary	100.00	90.99	Model	D506VTX	Chlorides	750.00								
Personnel														
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man		
Andrew Baltes	Chris Hiteartin Leafstead	JC Slaton												
John Holland	Chris Hite	Marlon Martin												
BHA														
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)					
12 1/4" Hughes D506VTX6x16 - 1.18 (6x16)			12.250	3.000			200.00	1.45	1.45					
9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve			9.620	3.000			185.19	41.04	42.49					
8 Pony NMDC			8.050	3.520			124.72	13.63	56.12					
8 Spiral NMDC			8.030	3.500			142.70	27.68	83.80					
8 MWD GAP sub APS			7.960	3.438			102.25	4.89	88.69					
8 Spiral NMDC			8.050	3.500			141.71	29.99	118.68					
8 Steady Scout			7.950	3.000			154.80	32.30	150.98					
BICO PBL Sub			8.250	3.500			101.00	8.24	159.22					
8 XO - 6 5/8 Reg Pin X4 1/2 XH			6.800	2.750			72.82	4.12	163.34					
6 1/2 DC (15 joints)			6.500	3.000			92.00	448.68	612.02					
6 1/2" Cougar jars			6.500	3.000			89.00	32.15	644.17					
6 1/2" DC (6 jts)			6.500	3.000			92.00	176.29	820.46					
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box			6.720	2.875			73.14	3.76	824.22					
5" HWDP (15 jts)			5.000	3.000		6.500	51.10	454.64	1278.86					
									1278.86					
Motor Details														
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages				
TDI-962-01-004	Scout	Turbo Scout	7/8	7.49		2.12	0.15		ADJ	5.9				
Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
5967.00	4.32	12.56	5857.68	995.96	206.34	0.46	167.96	-195.55	-0.44	1.26	126.00			
6093.00	3.33	8.68	5983.40	1004.21	207.92	0.81	-167.28	-197.04	-0.79	-3.08	126.00			
6156.00	3.02	9.10	6046.31	1007.66	208.46	0.49	175.92	-197.54	-0.49	0.67	63.00			
6220.00	2.81	9.47	6110.22	1010.87	208.98	0.33	175.06	-198.03	-0.33	0.58	64.00			
6282.00	2.29	7.88	6172.16	1013.60	209.40	0.85	-173.05	-198.42	-0.84	-2.56	62.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	87.21	17.00	40.00	118.00	500.00	1350.00	1000.00	0.00	225.00	193.00	163.00	17500.00	0.00	
Run	114.64	28.84	35.65	135.00	642.73	1870.00	1387.73	0.00	202.80	179.64	157.78	17191.30	0.00	
MWD Data														
Tool	SN	Type	Version	MWD Details					Battery Details					
Pulser				Orifice					Plug In Date					
Driver				Orifice Type					Plug In Time					
Directional				Pulse Width					Plug Out Date					
Battery 1				Data Rate					Plug Out Time					
Battery 2				EM Power					Plug In Hrs Tot					0.00
Battery 3				EM Freq					Plug In Hrs Day					0.00
Gamma				Fin Size (in)					Circ Hrs Total					14.53
Helix				Non Mag Above/Below					Circ Hours Day					0.00

Magnetics												
Total Field		49366.350		Declination				8.458		Total Correction		8.458
Dip Angle		63.291		Grid Convergence				0.261		North Ref		TRUE
Aggitator Details												
Agitator SN		Make		Model		Description				Agitator->Bit (Usft)		
Z0328		TTS		XRV		6 1/2" XRV agitator (ball drop)				5332.14		
Daily Activity												
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description		
05/14/2024	00:00	00:30	0.50	5978.00	5978.00	0.00	INT-2	3: BHA3 (Intermediate 2)	5A	Circulate at 4550 wating on H-Seal LCMpil to set		
05/14/2024	00:30	03:32	3.03	5978.00	5978.00	0.00	INT-2	3: BHA3 (Intermediate 2)	5A	Wash To Bottom		
05/14/2024	03:32	03:47	0.25	5978.00	6003.00	25.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/5978.00 t/6003.00, w/WOB 17.00,Flow 500.00, RPM40.00, Press 1350.00, Tq 17500.00, ROP 100.00, Diff 350.00, Temp 129.00		
05/14/2024	03:47	03:56	0.15	6003.00	6003.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	03:56	04:38	0.70	6003.00	6066.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6003.00 t/6066.00, w/WOB 17.00,Flow 500.00, RPM40.00, Press 1350.00, Tq 17500.00, ROP 90.00, Diff 350.00, Temp 129.00		
05/14/2024	04:38	04:46	0.13	6066.00	6066.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	04:46	05:35	0.82	6066.00	6129.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6066.00 t/6129.00, w/WOB 17.00,Flow 500.00, RPM40.00, Press 1350.00, Tq 17500.00, ROP 77.14, Diff 350.00, Temp 129.00		
05/14/2024	05:35	05:46	0.18	6129.00	6129.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	05:46	06:34	0.80	6129.00	6192.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6129.00 t/6192.00, w/WOB 17.00,Flow 500.00, RPM40.00, Press 1350.00, Tq 17500.00, ROP 78.75, Diff 350.00, Temp 129.00		
05/14/2024	06:34	06:45	0.18	6192.00	6192.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	06:45	07:23	0.63	6192.00	6255.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6192.00 t/6255.00, w/WOB 28.00,Flow 500.00, RPM40.00, Press 1600.00, Tq 21700.00, ROP 99.47, Diff 525.00, Temp 125.00		
05/14/2024	07:23	07:33	0.17	6255.00	6255.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	07:33	08:11	0.63	6255.00	6318.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6255.00 t/6318.00, w/WOB 28.00,Flow 500.00, RPM40.00, Press 1600.00, Tq 21700.00, ROP 99.47, Diff 525.00, Temp 125.00		
05/14/2024	08:11	08:25	0.23	6318.00	6318.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	08:25	09:05	0.67	6318.00	6381.00	63.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6318.00 t/6381.00, w/WOB 28.00,Flow 500.00, RPM40.00, Press 1600.00, Tq 21700.00, ROP 94.50, Diff 525.00, Temp 125.00		
05/14/2024	09:05	09:16	0.18	6381.00	6381.00	0.00	INT-2	3: BHA3 (Intermediate 2)	10D	Survey & Connection		
05/14/2024	09:16	09:26	0.17	6381.00	6385.00	4.00	INT-2	3: BHA3 (Intermediate 2)	2K	Rotary Drill f/6381.00 t/6385.00, w/WOB 28.00,Flow 500.00, RPM40.00, Press 1600.00, Tq 21700.00, ROP 24.00, Diff 525.00, Temp 125.00		
05/14/2024	09:26	12:30	3.07	6385.00	6385.00	0.00	INT-2	3: BHA3 (Intermediate 2)	5B	Circulate/ Lost returns pump LCMsweeps until getting returns back		
05/14/2024	12:30	16:00	3.50	6385.00	6385.00	0.00	INT-2	3: BHA3 (Intermediate 2)	6B	TOH		
05/14/2024	16:00	17:45	1.75	6385.00	6385.00	0.00	INT-2	3: BHA3 (Intermediate 2)	6P	L/D BHA/ CO Staedy Scout// L/D MWD And Gap Sub/ LD Bit And Motor		
05/14/2024	17:45	24:00	6.25	6385.00	6385.00	0.00	INT-2		12B	Run Casing		

Daily Drilling Report 05/15/2024

	Job #	18354			Operator	Logos Operating LLC						
	API Job # / AFE #	30-039-31441 / 20*240102			Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						
	Report #	10			Well	Rosa Unit 700H						
	Latitude:	36° 54' 50.663" N			Longitude	107° 23' 57.682" W						
	Rig:	HP 530			County / State	Rio Arriba / New Mexico						
	Date:	05/15/2024			Report Time	00:00-24:00						
	Daily Cost(USD)	4300.00			Well Cost(USD)	96343.50						

Drilling Summary		24Hr ()	Run ()	Casing Data				Fluids				
Start Depth (Usft)	6385.00			Csg Shoe MD(Usft)			600	3.00	%Sand		0.25	
End Depth (Usft)	6385.00	6385.00		OD (in)			300	2.00	%Solids		2.00	
Total Drilled (Usft)				Weight (lb/ft)			200	1.00	Weight (ppg)		8.70	
Slide Drilled (Usft)				Bit Data			100	1.00	Fluid Loss		0.01	
Rotary Drilled (Usft)				SN			6	1.00	PH		10.60	
Drig/Circ Hrs				Bit #			3	1.00	Mud Type		WBM	
Slide Drilling Hrs				OD (in)			10s Gel	1.00	Oil/Water		0/100	
Rotary Drilling Hrs				TFA			Temp(F)	120.00				
ROP Rot/Slide (Usft/hr)				Grade In			PV	1.00				
BRT Hrs				Grade Out			YP	1.00				
%Slide				Make			Viscosity	28.00				
%Rotary				Model			Chlorides	750.00				

Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Andrew Baltes	Chris Hiteartin Leafstead	JC Slaton										
John Holland	Chris Hite	Marlon Martin										

Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	0.00	17.00	40.00	118.00	500.00	1350.00	1000.00	0.00	225.00	193.00	163.00	17500.00	0.00
Run	0.00	28.84	35.65	135.00	642.73	1870.00	1387.73	0.00	202.80	179.64	157.78	17191.30	0.00

MWD Data													
Tool	SN	Type	Version	MWD Details					Battery Details				
Pulser				Orifice					Plug In Date				
Driver				Orifice Type					Plug In Time				
Directional				Pulse Width					Plug Out Date				
Battery 1				Data Rate					Plug Out Time				
Battery 2				EM Power					Plug In Hrs Tot 0.00				
Battery 3				EM Freq					Plug In Hrs Day 0.00				
Gamma				Fin Size (in)					Circ Hrs Total 14.53				
Helix				Non Mag Above/Below					Circ Hours Day 0.00				

Magnetics													
Total Field	49366.350			Declination				8.458	Total Correction				8.458
Dip Angle	63.291			Grid Convergence				0.261	North Ref				TRUE

Aggitator Details												
Agitator SN	Make	Model	Description							Agitator->Bit (Usft)		
Z0328	TTS	XRV	6 1/2" XRV agitator (ball drop)							5332.14		

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
05/15/2024	00:00	06:30	6.50	6385.00	6385.00	0.00	INT-2		12B	Running Casing	
05/15/2024	06:30	09:00	2.50	6385.00	6385.00	0.00	INT-2		5A	Circulate hole prior to cementing	
05/15/2024	09:00	17:00	8.00	6385.00	6385.00	0.00	INT-2		12E	Cementing operations	
05/15/2024	17:00	17:30	0.50	6385.00	6385.00	0.00	INT-2		14A	Nipple down BOP	
05/15/2024	17:30	18:00	0.50	6385.00	6385.00	0.00	INT-2		1C	Prep Rig For Skid	
05/15/2024	18:00	19:00	1.00	6385.00	6385.00	0.00	INT-2		1C	Skid Rig T702H	
05/15/2024	19:00	22:00	3.00	6385.00	6385.00	0.00	INT-2		14A	NU BOP	
05/15/2024	22:00	22:30	0.50	6385.00	6385.00	0.00	INT-2		15A	Test BOP	
05/15/2024	22:30	24:00	1.50	6385.00	6385.00	0.00	INT-2		6O	PU BHA on 702H	

Daily Drilling Report 06/21/2024

	Job #	18354	Operator	Logos Operating LLC										
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC										
	Report #	11	Well	Rosa Unit 700H										
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W										
	Rig:	HP 530	County / State	Rio Arriba / New Mexico										
	Date:	06/21/2024	Report Time	00:00-24:00										
	Daily Cost(USD)	31195.00	Well Cost(USD)	127538.50										
24Hr Summary														
dumb iron run/Drill out condition mud/TOH/PU curve BHA/TIH/Drill Curve														
24Hr Lookahead														
Drill Curve and Lateral														
Drilling Summary	24Hr (BHA 5)	Run (BHA 5)	Casing Data			Fluids								
Start Depth (Usft)	6385.00	6401.00	Csg Shoe MD(Usft)			600	40.00	%Sand						
End Depth (Usft)	6552.00	6552.00	OD (in)			300	23.00	%Solids	17.00					
Total Drilled (Usft)	151	151	Weight (lb/ft)			200	17.00	Weight (ppg)	10.60					
Slide Drilled (Usft)	65	65	Bit Data			100	11.00	Fluid Loss	13.40					
Rotary Drilled (Usft)	86	86	SN	R11508		6	4.00	PH						
Drig/Circ Hrs	2.03 / 0.33	2.03 / 0.33	Bit #	4		3	3.00	Mud Type	OBM					
Slide Drilling Hrs	0.73	0.73	OD (in)	8.500		10s Gel	4.00	Oil/Water	75/25					
Rotary Drilling Hrs	1.30	1.30	TFA	0.920		Temp(F)	150.00							
ROP Rot/Slide (Usft/hr)	66.15 / 88.64	66.15 / 88.64	Grade In	1-1-CT-N-E-I-NO-BHA		PV	17.00							
BRT Hrs	7.17	7.17	Grade Out			YP	6.00							
%Slide	43.05	43.05	Make	Smith		Viscosity	57.00							
%Rotary	56.95	56.95	Model	XR+		Chlorides	28500.00							
Personnel														
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man		
Ryan Buford	Marc Keim	Tyler Sjogren		David Riley	John John									
Brian Mitchell	Will Drake	JC Slaton												
BHA														
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)					
8 1/2" Smith XR+ Rock Bit 3x20 - 0.92 (3x20)			8.500	3.000			100.00	1.00	1.00					
6 1/2" Bit Sub W/Float			6.530	2.250			99.00	4.39	5.39					
6 1/2" Spiral Steel DC's (6 jts)			6.500	3.000			92.00	181.34	186.73					
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box			6.660	2.875			87.30	3.00	189.73					
5" HWDP (15 jts)			5.000	3.000	6.500	6.500	51.10	453.41	643.14					
5" DP (to surface)			5.000	4.276	6.625	3.500	23.10	1.00	644.14					
									644.14					
Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
6407.00	1.95	10.54	6297.07	1018.20	210.18	0.32	172.33	-199.15	-0.31	1.25	89.00			
6502.00	6.45	326.56	6391.81	1024.24	207.53	5.50	-58.94	-196.44	4.74	-46.29	95.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	2.99	32.33	45.00	241.00	516.67	3150.00	2720.00	0.00	175.00	165.00	155.00	10.00	0.00	
Run	2.99	32.33	45.00	241.00	516.67	3150.00	2720.00	0.00	175.00	165.00	155.00	10.00	0.00	
MWD Data														
Tool	SN	Type	Version	MWD Details					Battery Details					
Pulser				Orifice					Plug In Date					
Driver				Orifice Type					Plug In Time					
Directional				Pulse Width					Plug Out Date					
Battery 1				Data Rate					Plug Out Time					
Battery 2				EM Power					Plug In Hrs Tot					0.00
Battery 3				EM Freq					Plug In Hrs Day					0.00
Gamma				Fin Size (in)					Circ Hrs Total					14.53
Helix				Non Mag Above/Below					58.17 / 31.19		Circ Hours Day			0.00
Magnetics														
Total Field	49366.350			Declination			8.458	Total Correction			8.458			
Dip Angle	63.291			Grid Convergence			0.261	North Ref			TRUE			
Aggitator Details														
Agitator SN	Make	Model	Description					Agitator->Bit (Usft)						
Z0328	TTS	XR/V	6 1/2" XR/V agitator (ball drop)					5332.14						

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
06/21/2024	00:00	00:30	0.50	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	6O	PU BHA4 clean out / DV drill out	
06/21/2024	00:30	02:00	1.50	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	6A	TIH to first DV tool	
06/21/2024	02:00	02:38	0.63	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	2A	Drill DV tool 1	
06/21/2024	02:38	03:15	0.62	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	6A	TIH to DV tool 2	
06/21/2024	03:15	05:00	1.75	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	2A	Drill DV tool 2	
06/21/2024	05:00	06:10	1.17	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	1A	casing test	
06/21/2024	06:10	06:45	0.58	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	6A	TIH to 6152	
06/21/2024	06:45	07:00	0.25	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	5A	Circulating	
06/21/2024	07:00	07:15	0.25	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	15B	Test casing guage	
06/21/2024	07:15	08:11	0.93	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	5B	Swap over to OBM	
06/21/2024	08:11	08:30	0.32	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	15B	Test w/OBM	
06/21/2024	08:30	10:58	2.47	6385.00	6385.00	0.00	CRVILAT	4: BHA4(DV drill out)	2A	Drill cement/shoe	
06/21/2024	10:58	11:28	0.50	6385.00	6401.00	16.00	CRVILAT	4: BHA4(DV drill out)	2K	Rotary Drill f/6385.00 t/6401.00, w/WOB 27.00,Flow 365.00, RPM65.00, Press 830.00, Tq 8000.00, ROP 32.00, Diff 30.00 - Drilling 10 new hole wdumb iron	
06/21/2024	11:28	12:00	0.53	6401.00	6401.00	0.00	CRVILAT	4: BHA4(DV drill out)	5A	Circulate	
06/21/2024	12:00	12:38	0.63	6401.00	6401.00	0.00	CRVILAT	4: BHA4(DV drill out)	15B	Fit test	
06/21/2024	12:38	13:18	0.67	6401.00	6401.00	0.00	CRVILAT	4: BHA4(DV drill out)	5A	Circulate	
06/21/2024	13:18	15:10	1.87	6401.00	6401.00	0.00	CRVILAT	4: BHA4(DV drill out)	6B	TOH	
06/21/2024	15:10	15:45	0.58	6401.00	6401.00	0.00	CRVILAT	4: BHA4(DV drill out)	6P	LD BHA	
06/21/2024	15:45	16:50	1.08	6401.00	6401.00	0.00	CRVILAT	5: BHA 5 (Curve-Lateral)	6O	PU BHA	
06/21/2024	16:50	20:00	3.17	6401.00	6401.00	0.00	CRVILAT	5: BHA 5 (Curve-Lateral)	6A	TIH	
06/21/2024	20:00	21:30	1.50	6401.00	6401.00	0.00	CRVILAT	5: BHA 5 (Curve-Lateral)	9A	Slip and Cut	
06/21/2024	21:30	21:50	0.33	6401.00	6401.00	0.00	CRVILAT	5: BHA 5 (Curve-Lateral)	5A	Wash to Bottom	
06/21/2024	21:50	22:57	1.12	6401.00	6477.00	76.00	CRVILAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6401.00 t/6477.00, w/WOB 25,Flow 450, RPM45, Press 2650, Tq 10, ROP 68.06, Diff 550.00, Temp 130.00	
06/21/2024	22:57	23:05	0.13	6477.00	6477.00	0.00	CRVILAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/21/2024	23:05	23:49	0.73	6477.00	6542.00	65.00	CRVILAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/6477.00 t/6542.00, TF 310M, w/WOB 40,Flow 550, Press 3350, Tq , ROP 88.64, Diff 320.00, Temp 130.00	
06/21/2024	23:49	24:00	0.18	6542.00	6552.00	10.00	CRVILAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6542.00 t/6552.00, w/WOB 32,Flow 550, RPM, Press 3450, Tq , ROP 54.55, Diff 420.00, Temp 130.00	

Daily Drilling Report 06/22/2024

	Job #	18354	Operator	Logos Operating LLC								
	API Job # / AFE #	30-039-31441 / 20*240102		Field	Rio Arriba, NM(NAD83) - Logos Operating LLC							
	Report #	12	Well	Rosa Unit 700H								
	Latitude:	36° 54' 50.663" N		Longitude	107° 23' 57.682" W							
	Rig:	HP 530		County / State	Rio Arriba / New Mexico							
	Date:	06/22/2024		Report Time	00:00-24:00							
	Daily Cost(USD)	10000.00		Well Cost(USD)	137538.50							
24Hr Summary												
Drill Curve, Drill Lateral												
24Hr Lookahead												
Drill Lateral												
Drilling Summary	24Hr (BHA 5)	Run (BHA 5)	Casing Data				Fluids					
Start Depth (Usft)	6552.00	6401.00	Csg Shoe MD(Usft)			600	41.00	%Sand				
End Depth (Usft)	9407.00	9407.00	OD (in)			300	24.00	%Solids	18.00			
Total Drilled (Usft)	2855	3006	Weight (lb/ft)			200	18.00	Weight (ppg)	10.60			
Slide Drilled (Usft)	712	777	Bit Data			100	12.00	Fluid Loss	18.40			
Rotary Drilled (Usft)	2143	2229	SN		5347417	6	5.00	PH				
Drig/Circ Hrs	20.32 / 0.52	22.35 / 0.85	Bit #		4	3	4.00	Mud Type	OBM			
Slide Drilling Hrs	6.85	7.58	OD (in)		8.500	10s Gel	5.00	Oil/Water	75/25			
Rotary Drilling Hrs	13.47	14.77	TFA		0.994	Temp(F)	151.00					
ROP Rot/Slide (Usft/hr)	159.13 / 103.94	150.95 / 102.46	Grade In		New	PV	17.00					
BRT Hrs	24.00	31.17	Grade Out		1-1-CT-S-X-I-PN-BHA	YP	7.00					
%Slide	24.94	25.85	Make		Baker Hughes	Viscosity	57.00					
%Rotary	75.06	74.15	Model		DD406TS	Chlorides	27500.00					
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Ryan Buford	Marc Keim	Tyler Sjogren		David Riley	John John							
Brian Mitchell	Will Drake	JC Slaton										
BHA												
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)			8.500	3.000			100.00	0.80	0.80			
7 Scout Cam 5/6 9.6 1.75 SLK			7.120	2.000			98.96	37.39	38.19			
6 3/4" Pony NMDC			6.680	3.310			92.00	10.63	48.82			
6 3/4" Pony NMDC			6.730	3.310			92.09	13.90	62.72			
6 1/2" NMDC			6.560	3.300			86.99	29.43	92.15			
6 1/2 Gap Sub(APS)			6.450	3.125			90.82	5.12	97.27			
6 1/2" NMDC			6.480	3.300			87.02	30.28	127.55			
6 1/2" Float sub			6.500	2.850			92.51	2.27	129.82			
5" HWDP (1 stand)			5.000	3.000	6.625	6.500	51.10	89.69	219.51			
5" DP (32 stands)			5.000	4.276	6.625	2.750	23.89	3025.00	3244.51			
6 1/2" XRV agitator (always on)			6.480	3.250			94.00	10.75	3255.26			
5" DP (22 stands)			5.000	4.276	6.625	2.750	23.89	2077.26	5332.52			
6 1/2" XRV agitator (ball drop)			6.500	3.250			94.00	10.75	5343.27			
5" DP (to surface)			5.000	4.276	6.625	2.750	23.89	1.00	5344.27			
									5344.27			
Motor Details												
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-712-MLA07-024	Scout	CAM	5/6	5.46		1.75	0.38		FBH	9.6		

Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
6502.00	6.45	326.56	6391.81	1024.24	207.53	5.50	-58.94	-196.44	4.74	-46.29	95.00			
6596.00	15.59	321.27	6483.98	1038.53	196.70	9.77	-8.93	-185.45	9.72	-5.63	94.00			
6691.00	22.91	310.99	6573.63	1060.66	174.72	8.46	-29.78	-163.23	7.71	-10.82	95.00			
6785.00	32.23	302.64	6656.90	1086.24	139.71	10.71	-26.29	-127.95	9.91	-8.88	94.00			
6880.00	42.44	297.10	6732.36	1114.59	89.69	11.31	-20.46	-77.63	10.75	-5.83	95.00			
6974.00	50.55	294.87	6797.02	1144.35	28.43	8.80	-12.06	-16.04	8.63	-2.37	94.00			
7069.00	62.54	292.91	6849.30	1176.31	-43.94	12.74	-8.32	56.67	12.62	-2.06	95.00			
7163.00	71.54	292.14	6885.93	1209.41	-123.82	9.60	-4.66	136.90	9.57	-0.82	94.00			
7258.00	75.28	283.09	6913.10	1236.86	-210.49	9.94	-68.02	223.87	3.94	-9.53	95.00			
7352.00	82.28	274.61	6931.41	1250.94	-301.47	11.56	-50.81	314.99	7.45	-9.02	94.00			
7447.00	90.10	270.26	6937.72	1254.95	-396.08	9.41	-29.21	409.63	8.23	-4.58	95.00			
7541.00	88.92	269.70	6938.53	1254.91	-490.07	1.39	-154.61	503.62	-1.26	-0.60	94.00			
7636.00	88.89	269.84	6940.34	1254.53	-585.05	0.15	102.10	598.59	-0.03	0.15	95.00			
7730.00	87.38	268.54	6943.40	1253.20	-678.99	2.12	-139.31	692.51	-1.61	-1.38	94.00			
7825.00	87.88	268.16	6947.33	1250.47	-773.87	0.66	-37.22	787.35	0.53	-0.40	95.00			
7919.00	88.15	268.06	6950.58	1247.37	-867.76	0.31	-20.31	881.21	0.29	-0.11	94.00			
8013.00	87.98	267.44	6953.76	1243.68	-961.63	0.68	-105.35	975.03	-0.18	-0.66	94.00			
8108.00	86.91	267.09	6957.99	1239.16	-1056.43	1.18	-161.91	1069.78	-1.13	-0.37	95.00			
8202.00	86.80	267.43	6963.15	1234.67	-1150.18	0.38	107.96	1163.47	-0.12	0.36	94.00			
8297.00	87.24	267.50	6968.09	1230.47	-1244.96	0.47	9.03	1258.20	0.46	0.07	95.00			
8392.00	87.51	267.42	6972.44	1226.27	-1339.77	0.30	-16.49	1352.96	0.28	-0.08	95.00			
8486.00	88.29	267.91	6975.88	1222.44	-1433.62	0.98	32.13	1446.77	0.83	0.52	94.00			
8581.00	88.59	267.04	6978.47	1218.26	-1528.49	0.97	-70.98	1541.59	0.32	-0.92	95.00			
8676.00	88.86	267.43	6980.59	1213.67	-1623.36	0.50	55.30	1636.40	0.28	0.41	95.00			
8770.00	89.63	266.38	6981.82	1208.60	-1717.21	1.39	-53.75	1730.19	0.82	-1.12	94.00			
8864.00	89.19	267.90	6982.79	1203.91	-1811.09	1.68	106.15	1824.01	-0.47	1.62	94.00			
8959.00	90.61	268.48	6982.96	1200.91	-1906.04	1.61	22.22	1918.92	1.49	0.61	95.00			
9053.00	90.50	268.95	6982.05	1198.80	-2000.01	0.51	103.17	2012.86	-0.12	0.50	94.00			
9148.00	91.28	267.67	6980.57	1196.00	-2094.95	1.58	-58.63	2107.77	0.82	-1.35	95.00			
9242.00	91.31	267.79	6978.45	1192.28	-2188.86	0.13	75.96	2201.63	0.03	0.13	94.00			
9337.00	91.21	267.94	6976.36	1188.74	-2283.77	0.19	123.69	2296.50	-0.11	0.16	95.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	140.57	35.69	34.78	244.00	550.00	3564.29	3034.00	0.00	176.00	165.00	154.57	10.00	0.00	
Run	134.54	35.42	34.80	243.00	547.37	3531.58	3009.21	0.00	175.92	165.00	154.61	10.00	0.00	
MWD Data														
Tool		SN	Type	Version	MWD Details					Battery Details				
Pulser					Orifice					Plug In Date				
Driver					Orifice Type					Plug In Time				
Directional					Pulse Width					Plug Out Date				
Battery 1					Data Rate					Plug Out Time				
Battery 2					EM Power					Plug In Hrs Tot			0.00	
Battery 3					EM Freq					Plug In Hrs Day			0.00	
Gamma					Fin Size (in)					Circ Hrs Total			14.53	
Helix					Non Mag Above/Below					58.17 / 31.19			Circ Hours Day	0.00
Magnetics														
Total Field		49366.350			Declination				8.458	Total Correction			8.458	
Dip Angle		63.291			Grid Convergence				0.261	North Ref			TRUE	
Aggitator Details														
Agitator SN		Make	Model	Description					Agitator->Bit (Usft)					
Z0328		TTS	XR V	6 1/2" XR V agitator (ball drop)					5332.14					
Daily Activity														
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description				
06/22/2024	00:00	00:10	0.17	6552.00	6572.00	20.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6552.00 t/6572.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 120.00, Diff 420.00, Temp 130.00				
06/22/2024	00:10	00:21	0.18	6572.00	6572.00	0.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection				
06/22/2024	00:21	00:30	0.15	6572.00	6582.00	10.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6572.00 t/6582.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 66.67, Diff 420.00, Temp 130.00				
06/22/2024	00:30	01:01	0.52	6582.00	6632.00	50.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/6582.00 t/6632.00, TF -20G, w/WOB 32,Flow 550, Press 3450, Tq , ROP 96.77, Diff 420.00, Temp 130.00				
06/22/2024	01:01	01:23	0.37	6632.00	6666.00	34.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6632.00 t/6666.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 92.73, Diff 420.00, Temp 130.00				
06/22/2024	01:23	01:33	0.17	6666.00	6666.00	0.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection				
06/22/2024	01:33	02:11	0.63	6666.00	6729.00	63.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/6666.00 t/6729.00, TF -30G, w/WOB 32,Flow 550, Press 3450, Tq , ROP 99.47, Diff 420.00, Temp 130.00				
06/22/2024	02:11	02:33	0.37	6729.00	6761.00	32.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/6729.00 t/6761.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 87.27, Diff 420.00, Temp 130.00				
06/22/2024	02:33	02:43	0.17	6761.00	6761.00	0.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection				
06/22/2024	02:43	03:21	0.63	6761.00	6841.00	80.00	CRV/LAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/6761.00 t/6841.00, TF -15G, w/WOB 45,Flow 550, Press 3450, Tq , ROP 126.32, Diff 420.00, Temp 130.00				

06/22/2024	03:21	03:32	0.18	6841.00	6855.00	14.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#6841.00 t#6855.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 76.36, Diff 420.00, Temp 130.00
06/22/2024	03:32	03:37	0.08	6855.00	6855.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	03:37	03:50	0.22	6855.00	6873.00	18.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#6855.00 t#6873.00, w/WOB 32,Flow 550, RPM25, Press 3450, Tq 10, ROP 83.08, Diff 420.00, Temp 130.00
06/22/2024	03:50	04:21	0.52	6873.00	6933.00	60.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#6873.00 t#6933.00, TF -10G, w/WOB 48,Flow 550, Press 3550, Tq , ROP 116.13, Diff 520.00, Temp 130.00
06/22/2024	04:21	04:28	0.12	6933.00	6950.00	17.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#6933.00 t#6950.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 145.71, Diff 570.00, Temp 130.00
06/22/2024	04:28	04:34	0.10	6950.00	6950.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	04:34	04:54	0.33	6950.00	6994.00	44.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#6950.00 t#6994.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 132.00, Diff 570.00, Temp 130.00
06/22/2024	04:54	05:16	0.37	6994.00	7044.00	50.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#6994.00 t#7044.00, TF -30G, w/WOB 52,Flow 550, Press 3550, Tq 10, ROP 136.36, Diff 520.00, Temp 130.00
06/22/2024	05:16	05:25	0.15	7044.00	7044.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	05:25	05:30	0.08	7044.00	7054.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7044.00 t#7054.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 120.00, Diff 570.00, Temp 130.00
06/22/2024	05:30	05:59	0.48	7054.00	7122.00	68.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7054.00 t#7122.00, TF -15G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 140.69, Diff 570.00, Temp 130.00
06/22/2024	05:59	06:08	0.15	7122.00	7139.00	17.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7122.00 t#7139.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 113.33, Diff 570.00, Temp 130.00
06/22/2024	06:08	06:13	0.08	7139.00	7139.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	06:13	06:28	0.25	7139.00	7177.00	38.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7139.00 t#7177.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 152.00, Diff 570.00, Temp 130.00
06/22/2024	06:28	06:59	0.52	7177.00	7233.00	56.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7177.00 t#7233.00, TF -70G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 108.39, Diff 570.00, Temp 130.00
06/22/2024	06:59	07:06	0.12	7233.00	7233.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	07:06	07:27	0.35	7233.00	7278.00	45.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7233.00 t#7278.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 128.57, Diff 570.00, Temp 130.00
06/22/2024	07:27	07:54	0.45	7278.00	7328.00	50.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7278.00 t#7328.00, TF -55G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 111.11, Diff 570.00, Temp 130.00
06/22/2024	07:54	08:25	0.52	7328.00	7328.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	5A	Circ and Clean out Choke
06/22/2024	08:25	08:31	0.10	7328.00	7328.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	08:31	08:40	0.15	7328.00	7348.00	20.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7328.00 t#7348.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 133.33, Diff 570.00, Temp 130.00
06/22/2024	08:40	09:10	0.50	7348.00	7406.00	58.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7348.00 t#7406.00, TF -35G, w/WOB 52,Flow 550, Press 3600, Tq 10, ROP 116.00, Diff 570.00, Temp 130.00
06/22/2024	09:10	09:18	0.13	7406.00	7422.00	16.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7406.00 t#7422.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 120.00, Diff 570.00, Temp 130.00
06/22/2024	09:18	09:55	0.62	7422.00	7517.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7422.00 t#7517.00, w/WOB 32,Flow 550, RPM40, Press 3600, Tq 10, ROP 154.05, Diff 570.00, Temp 130.00
06/22/2024	09:55	09:59	0.07	7517.00	7517.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	09:59	10:03	0.07	7517.00	7527.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7517.00 t#7527.00, w/WOB 32,Flow 550, RPM25, Press 3600, Tq 10, ROP 150.00, Diff 570.00, Temp 130.00 - target change 88.5
06/22/2024	10:03	10:12	0.15	7527.00	7533.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7527.00 t#7533.00, TF -150G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 40.00, Diff 570.00, Temp 130.00
06/22/2024	10:12	10:42	0.50	7533.00	7611.00	78.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7533.00 t#7611.00, w/WOB 32,Flow 550, RPM55, Press 3600, Tq 10, ROP 156.00, Diff 570.00, Temp 130.00
06/22/2024	10:42	10:46	0.07	7611.00	7611.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	10:46	11:15	0.48	7611.00	7706.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7611.00 t#7706.00, w/WOB 32,Flow 550, RPM55, Press 3600, Tq 10, ROP 196.55, Diff 570.00, Temp 130.00
06/22/2024	11:15	11:19	0.07	7706.00	7706.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	11:19	11:25	0.10	7706.00	7724.00	18.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7706.00 t#7724.00, w/WOB 32,Flow 550, RPM55, Press 3600, Tq 10, ROP 180.00, Diff 570.00, Temp 130.00
06/22/2024	11:25	11:32	0.12	7724.00	7730.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7724.00 t#7730.00, TF -100G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 51.43, Diff 570.00, Temp 130.00
06/22/2024	11:32	11:55	0.38	7730.00	7800.00	70.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7730.00 t#7800.00, w/WOB 32,Flow 550, RPM55, Press 3600, Tq 10, ROP 182.61, Diff 570.00, Temp 130.00
06/22/2024	11:55	11:59	0.07	7800.00	7800.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	11:59	12:01	0.03	7800.00	7806.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7800.00 t#7806.00, w/WOB 32,Flow 550, RPM55, Press 3600, Tq 10, ROP 180.00, Diff 570.00, Temp 130.00
06/22/2024	12:01	12:09	0.13	7806.00	7812.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7806.00 t#7812.00, TF -20G, w/WOB 32,Flow 550, Press 3600, Tq 10, ROP 45.00, Diff 570.00, Temp 130.00
06/22/2024	12:09	12:35	0.43	7812.00	7895.00	83.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7812.00 t#7895.00, w/WOB 32,Flow 550, RPM55, Press 3700, Tq 10, ROP 191.54, Diff 600.00, Temp 176.00
06/22/2024	12:35	12:39	0.07	7895.00	7895.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	12:39	13:10	0.52	7895.00	7895.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7895.00 t#7895.00, w/WOB 32,Flow 550, RPM55, Press 3700, Tq 10, ROP 0.00, Diff 600.00, Temp 176.00 - target change 87.00
06/22/2024	13:10	13:34	0.40	7895.00	7895.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	8P	Ream, Survey & Connection
06/22/2024	13:34	13:38	0.07	7895.00	7895.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	13:38	13:43	0.08	7895.00	7995.00	100.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#7989.00 t#7995.00, TF -140.00G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 72.00, Diff 600.00, Temp 176.00
06/22/2024	13:43	14:11	0.47	7995.00	8083.00	88.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#7995.00 t#8083.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 188.57, Diff 600.00, Temp 176.00
06/22/2024	14:11	14:15	0.07	8083.00	8083.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	14:15	14:18	0.05	8083.00	8088.00	5.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8083.00 t#8088.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 100.00, Diff 600.00, Temp 176.00

06/22/2024	14:18	14:25	0.12	8088.00	8094.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8088.00 t#8094.00, TF -170.00G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 51.43, Diff 600.00, Temp 176.00
06/22/2024	14:25	14:58	0.55	8094.00	8178.00	84.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8094.00 t#8178.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 152.73, Diff 600.00, Temp 176.00
06/22/2024	14:58	15:02	0.07	8178.00	8178.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	15:02	15:29	0.45	8178.00	8272.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8178.00 t#8272.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 208.89, Diff 600.00, Temp 176.00
06/22/2024	15:29	15:34	0.08	8272.00	8272.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	15:34	16:01	0.45	8272.00	8367.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8272.00 t#8367.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 211.11, Diff 600.00, Temp 176.00 - target change 88.50
06/22/2024	16:01	16:05	0.07	8367.00	8367.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	16:05	16:34	0.48	8367.00	8462.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8367.00 t#8462.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 196.55, Diff 600.00, Temp 176.00
06/22/2024	16:34	16:38	0.07	8462.00	8462.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	16:38	16:42	0.07	8462.00	8466.00	4.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8462.00 t#8466.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 60.00, Diff 600.00, Temp 176.00
06/22/2024	16:42	16:50	0.13	8466.00	8472.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8466.00 t#8472.00, TF 0.00G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 45.00, Diff 600.00, Temp 176.00
06/22/2024	16:50	17:18	0.47	8472.00	8556.00	84.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8472.00 t#8556.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 180.00, Diff 600.00, Temp 176.00 - Target change 90.00
06/22/2024	17:18	17:22	0.07	8556.00	8556.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	17:22	17:25	0.05	8556.00	8560.00	4.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8556.00 t#8560.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 80.00, Diff 600.00, Temp 176.00
06/22/2024	17:25	17:33	0.13	8560.00	8567.00	7.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8560.00 t#8567.00, TF 0G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 52.50, Diff 600.00, Temp 176.00
06/22/2024	17:33	18:00	0.45	8567.00	8651.00	84.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8567.00 t#8651.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 186.67, Diff 600.00, Temp 176.00
06/22/2024	18:00	18:05	0.08	8651.00	8651.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	18:05	18:10	0.08	8651.00	8666.00	15.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8651.00 t#8666.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 180.00, Diff 600.00, Temp 176.00
06/22/2024	18:10	18:23	0.22	8666.00	8674.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8666.00 t#8674.00, TF 45G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 36.92, Diff 600.00, Temp 176.00
06/22/2024	18:23	18:45	0.37	8674.00	8746.00	72.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8674.00 t#8746.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 196.36, Diff 600.00, Temp 176.00
06/22/2024	18:45	18:51	0.10	8746.00	8746.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	18:51	18:56	0.08	8746.00	8756.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8746.00 t#8756.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 120.00, Diff 600.00, Temp 176.00
06/22/2024	18:56	19:35	0.65	8756.00	8764.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8756.00 t#8764.00, TF -45G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 12.31, Diff 600.00, Temp 176.00 - Bad Slide Hang Up Issues
06/22/2024	19:35	19:55	0.33	8764.00	8840.00	76.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8764.00 t#8840.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 228.00, Diff 600.00, Temp 176.00
06/22/2024	19:55	20:01	0.10	8840.00	8840.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	20:01	20:06	0.08	8840.00	8852.00	12.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8840.00 t#8852.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 144.00, Diff 600.00, Temp 176.00
06/22/2024	20:06	20:15	0.15	8852.00	8860.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8852.00 t#8860.00, TF 90G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 53.33, Diff 600.00, Temp 176.00
06/22/2024	20:15	20:38	0.38	8860.00	8934.00	74.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8860.00 t#8934.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 193.04, Diff 600.00, Temp 176.00
06/22/2024	20:38	20:43	0.08	8934.00	8934.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	20:43	20:48	0.08	8934.00	8946.00	12.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8934.00 t#8946.00, w/WOB 32.00,Flow 550.00, RPM55.00, Press 3700.00, Tq 10.00, ROP 144.00, Diff 600.00, Temp 176.00
06/22/2024	20:48	20:58	0.17	8946.00	8954.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#8946.00 t#8954.00, TF 0G, w/WOB 32.00,Flow 550.00, Press 3700.00, Tq 10.00, ROP 48.00, Diff 600.00, Temp 176.00
06/22/2024	20:58	21:22	0.40	8954.00	9029.00	75.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#8954.00 t#9029.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 187.50, Diff 700.00, Temp 197.00
06/22/2024	21:22	21:29	0.12	9029.00	9029.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	21:29	21:57	0.47	9029.00	9123.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#9029.00 t#9123.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 201.43, Diff 700.00, Temp 197.00
06/22/2024	21:57	22:03	0.10	9123.00	9123.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	22:03	22:07	0.07	9123.00	9133.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#9123.00 t#9133.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 150.00, Diff 700.00, Temp 197.00
06/22/2024	22:07	22:18	0.18	9133.00	9141.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f#9133.00 t#9141.00, TF -45G, w/WOB 32.00,Flow 550.00, Press 3800, Tq 14, ROP 43.64, Diff 700.00, Temp 197.00
06/22/2024	22:18	22:43	0.42	9141.00	9218.00	77.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#9141.00 t#9218.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 184.80, Diff 700.00, Temp 197.00
06/22/2024	22:43	22:49	0.10	9218.00	9218.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	22:49	23:18	0.48	9218.00	9312.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#9218.00 t#9312.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 194.48, Diff 700.00, Temp 197.00
06/22/2024	23:18	23:25	0.12	9312.00	9312.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/22/2024	23:25	24:00	0.58	9312.00	9407.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f#9312.00 t#9407.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 162.86, Diff 700.00, Temp 197.00

Daily Drilling Report 06/23/2024

	Job #	18354		Operator	Logos Operating LLC							
	API Job # / AFE #	30-039-31441 / 20*240102			Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						
	Report #	13			Well	Rosa Unit 700H						
	Latitude:	36° 54' 50.663" N			Longitude	107° 23' 57.682" W						
	Rig:	HP 530			County / State	Rio Arriba / New Mexico						
	Date:	06/23/2024			Report Time	00:00-24:00						
	Daily Cost(USD)	13195.00			Well Cost(USD)	150733.50						
24Hr Summary												
Drill Lateral												
24Hr Lookahead												
Drill Lateral												
Drilling Summary		24Hr (BHA 5)	Run (BHA 5)	Casing Data		Fluids						
Start Depth (Usft)	9407.00	6401.00	Csg Shoe MD(Usft)			600	41.00	%Sand				
End Depth (Usft)	12938.00	12938.00	OD (in)			300	24.00	%Solids	18.00			
Total Drilled (Usft)	3531	6537	Weight (lb/ft)			200	18.00	Weight (ppg)	10.60			
Slide Drilled (Usft)	49	826	Bit Data			100	12.00	Fluid Loss	18.40			
Rotary Drilled (Usft)	3482	5711	SN		5347417	6	5.00	PH				
Drig/Circ Hrs	19.88 / 0.63	42.23 / 1.48	Bit #		4	3	4.00	Mud Type	OBM			
Slide Drilling Hrs	1.40	8.98	OD (in)		8.500	10s Gel	5.00	Oil/Water	75/25			
Rotary Drilling Hrs	18.48	33.25	TFA		0.994	Temp(F)	151.00					
ROP Rot/Slide (Usft/hr)	188.39 / 35.00	171.76 / 91.95	Grade In		New	PV	17.00					
BRT Hrs	24.00	55.17	Grade Out		1-1-CT-S-X-I-PN-BHA	YP	7.00					
%Slide	1.39	12.64	Make		Baker Hughes	Viscosity	57.00					
%Rotary	98.61	87.36	Model		DD406TS	Chlorides	27500.00					
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John							
Brian Mitchell	Will Drake	Marlon Martin										
BHA												
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)		
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)				8.500	3.000			100.00	0.80	0.80		
7 Scout Cam 5/6 9.6 1.75 SLK				7.120	2.000			98.96	37.39	38.19		
6 3/4" Pony NMDC				6.680	3.310			92.00	10.63	48.82		
6 3/4" Pony NMDC				6.730	3.310			92.09	13.90	62.72		
6 1/2" NMDC				6.560	3.300			86.99	29.43	92.15		
6 1/2 Gap Sub(APS)				6.450	3.125			90.82	5.12	97.27		
6 1/2" NMDC				6.480	3.300			87.02	30.28	127.55		
6 1/2" Float sub				6.500	2.850			92.51	2.27	129.82		
5" HWDP (1 stand)				5.000	3.000	6.625	6.500	51.10	89.69	219.51		
5" DP (32 stands)				5.000	4.276	6.625	2.750	23.89	3025.00	3244.51		
6 1/2" XRV agitator (always on)				6.480	3.250			94.00	10.75	3255.26		
5" DP (22 stands)				5.000	4.276	6.625	2.750	23.89	2077.26	5332.52		
6 1/2" XRV agitator (ball drop)				6.500	3.250			94.00	10.75	5343.27		
5" DP (to surface)				5.000	4.276	6.625	2.750	23.89	1.00	5344.27		
										5344.27		
Motor Details												
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-712-MLA07-024	Scout	CAM	5/6	5.46		1.75	0.38		FBH	9.6		

Surveys											
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TPO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)
9431.00	90.84	267.78	6974.68	1185.23	-2377.69	0.43	-156.62	2390.37	-0.39	-0.17	94.00
9526.00	90.54	267.69	6973.53	1181.48	-2472.61	0.33	-163.30	2485.25	-0.32	-0.09	95.00
9621.00	90.24	267.63	6972.89	1177.60	-2567.52	0.32	-168.69	2580.12	-0.32	-0.06	95.00
9715.00	89.97	268.29	6972.71	1174.25	-2661.46	0.76	112.25	2674.01	-0.29	0.70	94.00
9810.00	89.56	268.29	6973.10	1171.42	-2756.42	0.43	180.00	2768.93	-0.43	0.00	95.00
9904.00	89.23	268.93	6974.10	1169.14	-2850.39	0.77	117.28	2862.87	-0.35	0.68	94.00
9999.00	88.96	269.03	6975.60	1167.45	-2945.36	0.30	159.68	2957.82	-0.28	0.11	95.00
10093.00	89.87	267.78	6976.56	1164.83	-3039.32	1.64	-53.95	3051.74	0.97	-1.33	94.00
10188.00	89.80	268.33	6976.83	1161.60	-3134.26	0.58	97.25	3146.65	-0.07	0.58	95.00
10282.00	89.63	268.67	6977.30	1159.14	-3228.23	0.40	116.57	3240.58	-0.18	0.36	94.00
10377.00	89.36	269.09	6978.13	1157.29	-3323.20	0.53	122.74	3335.53	-0.28	0.44	95.00
10472.00	89.13	269.04	6979.39	1155.74	-3418.18	0.25	-167.74	3430.49	-0.24	-0.05	95.00
10566.00	90.10	268.00	6980.02	1153.31	-3512.15	1.51	-47.00	3524.42	1.03	-1.11	94.00
10660.00	90.13	267.96	6979.83	1150.00	-3606.09	0.05	0.00	3618.32	0.03	-0.04	94.00
10755.00	89.80	268.31	6979.89	1146.90	-3701.04	0.51	133.32	3713.23	-0.35	0.37	95.00
10849.00	89.56	268.27	6980.41	1144.10	-3794.99	0.26	-170.54	3807.15	-0.26	-0.04	94.00
10944.00	90.13	267.89	6980.67	1140.92	-3889.94	0.72	-33.69	3902.06	0.60	-0.40	95.00
11038.00	90.03	267.02	6980.54	1136.74	-3983.85	0.93	-96.56	3995.91	-0.11	-0.93	94.00
11133.00	90.20	266.85	6980.35	1131.66	-4078.71	0.25	-45.00	4090.72	0.18	-0.18	95.00
11227.00	90.34	266.68	6979.90	1126.36	-4172.56	0.23	-50.53	4184.50	0.15	-0.18	94.00
11321.00	90.17	267.32	6979.49	1121.44	-4266.43	0.70	104.87	4278.31	-0.18	0.68	94.00
11416.00	91.01	266.55	6978.51	1116.36	-4361.29	1.20	-42.51	4373.11	0.88	-0.81	95.00
11510.00	90.64	266.43	6977.15	1110.61	-4455.10	0.41	-162.03	4466.86	-0.39	-0.13	94.00
11604.00	90.61	266.58	6976.13	1104.88	-4548.92	0.16	101.31	4560.61	-0.03	0.16	94.00
11699.00	90.60	267.27	6975.13	1099.78	-4643.78	0.73	90.83	4655.41	-0.01	0.73	95.00
11793.00	90.70	267.37	6974.06	1095.38	-4737.67	0.15	45.00	4749.24	0.11	0.11	94.00
11888.00	90.50	267.03	6973.06	1090.74	-4832.55	0.42	-120.47	4844.07	-0.21	-0.36	95.00
11982.00	90.71	267.16	6972.07	1085.98	-4926.42	0.26	31.76	4937.89	0.22	0.14	94.00
12077.00	90.64	266.94	6970.95	1081.09	-5021.29	0.24	-107.65	5032.70	-0.07	-0.23	95.00
12171.00	90.30	267.20	6970.18	1076.29	-5115.17	0.46	142.59	5126.51	-0.36	0.28	94.00
12265.00	90.03	267.82	6969.91	1072.20	-5209.08	0.72	113.53	5220.37	-0.29	0.66	94.00
12360.00	91.48	267.66	6968.66	1068.46	-5303.99	1.54	-6.30	5315.24	1.53	-0.17	95.00
12454.00	91.55	268.14	6966.17	1065.01	-5397.89	0.52	81.69	5409.10	0.07	0.51	94.00
12549.00	91.62	268.14	6963.55	1061.93	-5492.81	0.07	0.00	5503.98	0.07	0.00	95.00
12644.00	91.48	268.92	6960.98	1059.50	-5587.74	0.83	100.17	5598.88	-0.15	0.82	95.00
12738.00	91.14	268.77	6958.83	1057.60	-5681.70	0.40	-156.20	5692.81	-0.36	-0.16	94.00
12833.00	91.58	266.63	6956.57	1053.79	-5776.59	2.30	-78.35	5787.65	0.46	-2.25	95.00

Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	650.70	35.17	51.98	261.00	550.00	4045.19	3236.54	0.00	227.50	158.25	112.06	1248.58	0.00
Run	377.52	34.42	47.78	256.00	549.18	3800.41	3129.92	0.00	206.47	160.94	130.04	609.57	0.00

MWD Data							
Tool	SN	Type	Version	MWD Details		Battery Details	
Pulser				Orifice		Plug In Date	
Driver				Orifice Type		Plug In Time	
Directional				Pulse Width		Plug Out Date	
Battery 1				Data Rate		Plug Out Time	
Battery 2				EM Power		Plug In Hrs Tot	0.00
Battery 3				EM Freq		Plug In Hrs Day	0.00
Gamma				Fin Size (in)		Circ Hrs Total	14.53
Helix				Non Mag Above/Below		Circ Hours Day	0.00

Magnetics					
Total Field	49366.350	Declination	8.458	Total Correction	8.458
Dip Angle	63.291	Grid Convergence	0.261	North Ref	TRUE

Aggitator Details					
Agitator SN	Make	Model	Description		
20328	TTS	XR.V	6 1/2" XR.Vagitator (ball drop)		
					Agitator->Bit (Usft)

Daily Activity										
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description
06/23/2024	00:00	00:05	0.08	9407.00	9407.00	0.00	CRVLAT	5: BHA.5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	00:05	00:29	0.40	9407.00	9501.00	94.00	CRVLAT	5: BHA.5 (Curve-Lateral)	2K	Rotary Drill f/9407.00 t/9501.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 235.00, Diff 700.00, Temp 197.00
06/23/2024	00:29	00:35	0.10	9501.00	9501.00	0.00	CRVLAT	5: BHA.5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	00:35	01:03	0.47	9501.00	9596.00	95.00	CRVLAT	5: BHA.5 (Curve-Lateral)	2K	Rotary Drill f/9501.00 t/9596.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 203.57, Diff 700.00, Temp 197.00
06/23/2024	01:03	01:11	0.13	9596.00	9596.00	0.00	CRVLAT	5: BHA.5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	01:11	01:38	0.45	9596.00	9691.00	95.00	CRVLAT	5: BHA.5 (Curve-Lateral)	2K	Rotary Drill f/9596.00 t/9691.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 211.11, Diff 700.00, Temp 197.00

06/23/2024	01:38	01:43	0.08	9691.00	9691.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	01:43	02:10	0.45	9691.00	9785.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#9691.00 t#9785.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 208.89, Diff 700.00, Temp 197.00
06/23/2024	02:10	02:15	0.08	9785.00	9785.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	02:15	02:44	0.48	9785.00	9880.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#9785.00 t#9880.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 196.55, Diff 700.00, Temp 197.00
06/23/2024	02:44	02:49	0.08	9880.00	9880.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	02:49	03:20	0.52	9880.00	9974.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#9880.00 t#9974.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 181.94, Diff 700.00, Temp 197.00
06/23/2024	03:20	03:25	0.08	9974.00	9974.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	03:25	03:54	0.48	9974.00	10069.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#9974.00 t#10069.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 196.55, Diff 700.00, Temp 197.00
06/23/2024	03:54	04:01	0.12	10069.00	10069.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	04:01	04:06	0.08	10069.00	10079.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10069.00 t#10079.00, w/WOB 32.00,Flow 550.00, RPM50, Press 3800, Tq 14, ROP 120.00, Diff 700.00, Temp 197.00
06/23/2024	04:06	04:16	0.17	10079.00	10087.00	8.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f#10079.00 t#10087.00, TF -50G, w/WOB 32.00,Flow 550.00, Press 3800, Tq 14, ROP 48.00, Diff 700.00, Temp 197.00
06/23/2024	04:16	04:42	0.43	10087.00	10163.00	76.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10087.00 t#10163.00, w/WOB 32.00,Flow 550.00, RPM55, Press 3800, Tq 14, ROP 175.38, Diff 700.00, Temp 197.00
06/23/2024	04:42	04:47	0.08	10163.00	10163.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	04:47	05:14	0.45	10163.00	10258.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10163.00 t#10258.00, w/WOB 36,Flow 550.00, RPM55, Press 4000, Tq 15, ROP 211.11, Diff 800.00, Temp 208.00
06/23/2024	05:14	05:24	0.17	10258.00	10258.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	05:24	05:53	0.48	10258.00	10352.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10258.00 t#10352.00, w/WOB 36,Flow 550.00, RPM55, Press 4000, Tq 15, ROP 194.48, Diff 800.00, Temp 208.00
06/23/2024	05:53	06:00	0.12	10352.00	10352.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	06:00	06:27	0.45	10352.00	10447.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10352.00 t#10447.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 211.11, Diff 800.00, Temp 208.00
06/23/2024	06:27	06:32	0.08	10447.00	10447.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	06:32	07:00	0.47	10447.00	10542.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10447.00 t#10542.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 203.57, Diff 800.00, Temp 208.00
06/23/2024	07:00	07:05	0.08	10542.00	10542.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	07:05	07:44	0.65	10542.00	10636.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10542.00 t#10636.00, w/WOB 37.00,Flow 550.00, RPM60.00, Press 4000.00, Tq 17.00, ROP 144.62, Diff 800.00, Temp 208.00
06/23/2024	07:44	07:49	0.08	10636.00	10636.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	07:49	08:12	0.38	10636.00	10730.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10636.00 t#10730.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 245.22, Diff 800.00, Temp 208.00
06/23/2024	08:12	08:17	0.08	10730.00	10730.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	08:17	08:43	0.43	10730.00	10825.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10730.00 t#10825.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 219.23, Diff 800.00, Temp 208.00
06/23/2024	08:43	08:48	0.08	10825.00	10825.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	08:48	09:14	0.43	10825.00	10919.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10825.00 t#10919.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 216.92, Diff 800.00, Temp 208.00
06/23/2024	09:14	09:19	0.08	10919.00	10919.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	09:19	09:23	0.07	10919.00	10929.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10919.00 t#10929.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 150.00, Diff 800.00, Temp 208.00
06/23/2024	09:23	09:31	0.13	10929.00	10936.00	7.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f#10929.00 t#10936.00, TF -60.00G, w/WOB 36.00,Flow 550.00, Press 4000.00, Tq 15.00, ROP 52.50, Diff 800.00, Temp 208.00
06/23/2024	09:31	09:54	0.38	10936.00	11014.00	78.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#10936.00 t#11014.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 203.48, Diff 800.00, Temp 208.00
06/23/2024	09:54	09:59	0.08	11014.00	11014.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	09:59	10:07	0.13	11014.00	11024.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11014.00 t#11024.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 15.00, ROP 75.00, Diff 800.00, Temp 208.00
06/23/2024	10:07	10:19	0.20	11024.00	11032.00	8.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f#11024.00 t#11032.00, TF -60.00G, w/WOB 36.00,Flow 550.00, Press 4000.00, Tq 17.00, ROP 40.00, Diff 800.00, Temp 208.00 - Stalled motor
06/23/2024	10:19	10:51	0.53	11032.00	11108.00	76.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11032.00 t#11108.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 17.00, ROP 142.50, Diff 800.00, Temp 208.00
06/23/2024	10:51	10:56	0.08	11108.00	11108.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	10:56	10:59	0.05	11108.00	11118.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11108.00 t#11118.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 17.00, ROP 200.00, Diff 800.00, Temp 208.00
06/23/2024	10:59	11:12	0.22	11118.00	11124.00	6.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f#11118.00 t#11124.00, TF -30.00G, w/WOB 36.00,Flow 550.00, Press 4000.00, Tq 17.00, ROP 27.69, Diff 800.00, Temp 208.00
06/23/2024	11:12	11:44	0.53	11124.00	11203.00	79.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11124.00 t#11203.00, w/WOB 36.00,Flow 550.00, RPM55.00, Press 4000.00, Tq 17.00, ROP 148.13, Diff 800.00, Temp 208.00
06/23/2024	11:44	11:49	0.08	11203.00	11203.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	11:49	12:13	0.40	11203.00	11297.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11203.00 t#11297.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 235.00, Diff 850.00, Temp 208.00
06/23/2024	12:13	12:44	0.52	11297.00	11391.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11297.00 t#11391.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 181.94, Diff 850.00, Temp 208.00
06/23/2024	12:44	12:49	0.08	11391.00	11391.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	12:49	12:58	0.15	11391.00	11408.00	17.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f#11391.00 t#11408.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 113.33, Diff 850.00, Temp 208.00
06/23/2024	12:58	13:09	0.18	11408.00	11414.00	6.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f#11408.00 t#11414.00, TF -40.00G, w/WOB 36.00,Flow 550.00, Press 4150.00, Tq 18.00, ROP 32.73, Diff 850.00, Temp 208.00

06/23/2024	13:09	13:32	0.38	11414.00	11486.00	72.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11414.00 t/11486.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 187.83, Diff 850.00, Temp 208.00
06/23/2024	13:32	13:37	0.08	11486.00	11486.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	13:37	14:05	0.47	11486.00	11580.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11486.00 t/11580.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 201.43, Diff 850.00, Temp 208.00
06/23/2024	14:05	14:10	0.08	11580.00	11580.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	14:10	14:37	0.45	11580.00	11674.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11580.00 t/11674.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 208.89, Diff 850.00, Temp 208.00
06/23/2024	14:37	14:42	0.08	11674.00	11674.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	14:42	15:08	0.43	11674.00	11769.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11674.00 t/11769.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 219.23, Diff 850.00, Temp 226.00
06/23/2024	15:08	15:12	0.07	11769.00	11769.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	15:12	15:40	0.47	11769.00	11863.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11769.00 t/11863.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 201.43, Diff 850.00, Temp 226.00
06/23/2024	15:40	15:45	0.08	11863.00	11863.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	15:45	16:11	0.43	11863.00	11958.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11863.00 t/11958.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 219.23, Diff 850.00, Temp 226.00
06/23/2024	16:11	16:25	0.23	11958.00	11958.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	16:25	16:50	0.42	11958.00	12052.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/11958.00 t/12052.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 225.60, Diff 850.00, Temp 226.00 - SPRS
06/23/2024	16:50	16:55	0.08	12052.00	12052.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	16:55	17:23	0.47	12052.00	12147.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12052.00 t/12147.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 203.57, Diff 850.00, Temp 226.00
06/23/2024	17:23	17:28	0.08	12147.00	12147.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	17:28	18:08	0.67	12147.00	12241.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12147.00 t/12241.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 141.00, Diff 850.00, Temp 226.00
06/23/2024	18:08	18:46	0.63	12241.00	12241.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	5A	Circulate and clean Hole
06/23/2024	18:46	18:51	0.08	12241.00	12241.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	18:51	19:26	0.58	12241.00	12335.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12241.00 t/12335.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 161.14, Diff 850.00, Temp 226.00
06/23/2024	19:26	19:31	0.08	12335.00	12335.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	19:31	19:34	0.05	12335.00	12345.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12335.00 t/12345.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 200.00, Diff 850.00, Temp 226.00
06/23/2024	19:34	19:49	0.25	12345.00	12353.00	8.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f/12345.00 t/12353.00, TF OG, w/WOB 36.00,Flow 550.00, Press 4150.00, Tq 18.00, ROP 32.00, Diff 850.00, Temp 226.00
06/23/2024	19:49	20:17	0.47	12353.00	12430.00	77.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12353.00 t/12430.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 165.00, Diff 850.00, Temp 226.00
06/23/2024	20:17	20:21	0.07	12430.00	12430.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	20:21	20:53	0.53	12430.00	12524.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12430.00 t/12524.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 176.25, Diff 850.00, Temp 226.00
06/23/2024	20:53	21:00	0.12	12524.00	12524.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	21:00	21:34	0.57	12524.00	12619.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12524.00 t/12619.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 167.65, Diff 850.00, Temp 226.00
06/23/2024	21:34	21:40	0.10	12619.00	12619.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	21:40	22:14	0.57	12619.00	12714.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12619.00 t/12714.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 167.65, Diff 850.00, Temp 226.00
06/23/2024	22:14	22:20	0.10	12714.00	12714.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	22:20	22:52	0.53	12714.00	12808.00	94.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12714.00 t/12808.00, w/WOB 36.00,Flow 550.00, RPM50.00, Press 4150.00, Tq 18.00, ROP 176.25, Diff 850.00, Temp 226.00
06/23/2024	22:52	22:57	0.08	12808.00	12808.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	22:57	23:28	0.52	12808.00	12903.00	95.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12808.00 t/12903.00, w/WOB 35.00,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 183.87, Diff 900.00, Temp 230.00
06/23/2024	23:28	23:33	0.08	12903.00	12903.00	0.00	CRVLAT	5: BHA5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/23/2024	23:33	23:36	0.05	12903.00	12913.00	10.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12903.00 t/12913.00, w/WOB 35.00,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 200.00, Diff 900.00, Temp 230.00
06/23/2024	23:36	23:51	0.25	12913.00	12919.00	6.00	CRVLAT	5: BHA5 (Curve-Lateral)	2J	Slide Drill f/12913.00 t/12919.00, TF 130G, w/WOB 35.00,Flow 550.00, Press 4300, Tq 18500, ROP 24.00, Diff 900.00, Temp 230.00
06/23/2024	23:51	24:00	0.15	12919.00	12938.00	19.00	CRVLAT	5: BHA5 (Curve-Lateral)	2K	Rotary Drill f/12919.00 t/12938.00, w/WOB 35.00,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 126.67, Diff 900.00, Temp 230.00

Daily Drilling Report 06/24/2024

	Job #	18354		Operator	Logos Operating LLC							
	API Job # / AFE #	30-039-31441 / 20*240102			Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						
	Report #	14			Well	Rosa Unit 700H						
	Latitude:	36° 54' 50.663" N			Longitude	107° 23' 57.682" W						
	Rig:	HP 530			County / State	Rio Arriba / New Mexico						
	Date:	06/24/2024			Report Time	00:00-24:00						
	Daily Cost(USD)	10000.00			Well Cost(USD)	160733.50						
24Hr Summary												
Drill Lateral												
24Hr Lookahead												
Drill Lateral												
Drilling Summary		24Hr (BHA 5)	Run (BHA 5)	Casing Data			Fluids					
Start Depth (Usft)	12919.00	6401.00	Csg Shoe MD(Usft)			600	49.00	%Sand				
End Depth (Usft)	15286.00	15286.00	OD (in)			300	29.00	%Solids	23.00			
Total Drilled (Usft)	2367	8885	Weight (lb/ft)			200	21.00	Weight (ppg)	11.00			
Slide Drilled (Usft)	55	881	Bit Data			100	14.00	Fluid Loss	17.40			
Rotary Drilled (Usft)	2312	8023	SN		5347417	6	6.00	PH				
Drig/Circ Hrs	17.12 / 2.37	59.35 / 3.85	Bit #		4	3	5.00	Mud Type	OBM			
Slide Drilling Hrs	1.67	10.65	OD (in)		8.500	10s Gel	6.00	Oil/Water	80/20			
Rotary Drilling Hrs	15.45	48.70	TFA		0.994	Temp(F)	150.00					
ROP Rot/Slide (Usft/hr)	149.64 / 33.00	164.74 / 82.72	Grade In		New	PV	20.00					
BRT Hrs	24.00	79.17	Grade Out		1-1-CT-S-X-I-PN-BHA	YP	9.00					
%Slide	2.32	9.89	Make		Baker Hughes	Viscosity	48.00					
%Rotary	97.68	90.11	Model		DD406TS	Chlorides	32000.00					
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John							
Brian Mitchell	Will Drake	Marlon Martin										
BHA												
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)		
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)				8.500	3.000			100.00	0.80	0.80		
7 Scout Cam 5/6 9.6 1.75 SLK				7.120	2.000			98.96	37.39	38.19		
6 3/4" Pony NMDC				6.680	3.310			92.00	10.63	48.82		
6 3/4" Pony NMDC				6.730	3.310			92.09	13.90	62.72		
6 1/2" NMDC				6.560	3.300			86.99	29.43	92.15		
6 1/2 Gap Sub(APS)				6.450	3.125			90.82	5.12	97.27		
6 1/2" NMDC				6.480	3.300			87.02	30.28	127.55		
6 1/2" Float sub				6.500	2.850			92.51	2.27	129.82		
5" HWDP (1 stand)				5.000	3.000	6.625	6.500	51.10	89.69	219.51		
5" DP (32 stands)				5.000	4.276	6.625	2.750	23.89	3025.00	3244.51		
6 1/2" XRV agitator (always on)				6.480	3.250			94.00	10.75	3255.26		
5" DP (22 stands)				5.000	4.276	6.625	2.750	23.89	2077.26	5332.52		
6 1/2" XRV agitator (ball drop)				6.500	3.250			94.00	10.75	5343.27		
5" DP (to surface)				5.000	4.276	6.625	2.750	23.89	1.00	5344.27		
										5344.27		
Motor Details												
SN	Make	Model	Lobes	Bit to Bend(Usft)			Bend	Rev Per (gpm)		Housing	Stages	
TDI-712-MLA07-024	Scout	CAM	5/6	5.46			1.75	0.38		FBH	9.6	

Surveys											
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TPO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)
12927.00	89.50	269.84	6955.69	1050.90	-5870.52	4.07	122.92	5881.55	-2.21	3.41	94.00
13022.00	89.80	269.42	6956.27	1050.28	-5965.52	0.54	-54.46	5976.53	0.32	-0.44	95.00
13116.00	89.50	268.99	6956.84	1048.98	-6059.51	0.56	-124.90	6070.50	-0.32	-0.46	94.00
13211.00	88.89	269.15	6958.18	1047.44	-6154.48	0.66	165.31	6165.46	-0.64	0.17	95.00
13306.00	88.05	270.26	6960.71	1046.95	-6249.45	1.46	127.14	6260.41	-0.88	1.17	95.00
13400.00	90.03	269.96	6962.29	1047.13	-6343.43	2.13	-8.62	6354.39	2.11	-0.32	94.00
13495.00	90.00	269.91	6962.26	1047.02	-6438.43	0.06	0.00	6449.38	-0.03	-0.05	95.00
13590.00	89.93	269.57	6962.32	1046.59	-6533.43	0.37	-101.63	6544.37	-0.07	-0.36	95.00
13684.00	90.13	269.98	6962.27	1046.22	-6627.43	0.49	64.00	6638.36	0.21	0.44	94.00
13778.00	90.57	270.62	6961.70	1046.71	-6721.42	0.83	55.49	6732.36	0.47	0.68	94.00
13873.00	90.61	272.91	6960.72	1049.64	-6816.37	2.41	88.99	6827.33	0.04	2.41	95.00
13967.00	90.40	273.34	6959.89	1054.76	-6910.22	0.51	116.03	6921.23	-0.22	0.46	94.00
14062.00	90.24	272.98	6959.36	1060.00	-7005.08	0.41	-113.96	7016.14	-0.17	-0.38	95.00
14157.00	90.17	273.35	6959.02	1065.24	-7099.93	0.40	100.71	7111.04	-0.07	0.39	95.00
14251.00	91.38	272.45	6957.75	1070.00	-7193.80	1.60	-36.63	7204.96	1.29	-0.96	94.00
14346.00	90.71	270.04	6956.02	1072.06	-7288.75	2.63	-105.51	7299.93	-0.71	-2.54	95.00
14440.00	90.54	270.14	6954.99	1072.21	-7382.75	0.21	149.54	7393.92	-0.18	0.11	94.00
14535.00	90.81	270.99	6953.87	1073.15	-7477.74	0.94	72.37	7488.91	0.28	0.89	95.00
14630.00	90.57	270.43	6952.73	1074.32	-7572.72	0.64	-113.20	7583.90	-0.25	-0.59	95.00
14724.00	90.64	270.97	6951.73	1075.47	-7666.71	0.58	82.61	7677.90	0.07	0.57	94.00
14819.00	90.61	270.91	6950.70	1077.03	-7761.69	0.07	-116.57	7772.89	-0.03	-0.06	95.00
14913.00	90.74	270.99	6949.59	1078.59	-7855.67	0.16	31.61	7866.88	0.14	0.09	94.00
15007.00	90.71	270.86	6948.40	1080.11	-7949.65	0.14	-102.99	7960.87	-0.03	-0.14	94.00
15101.00	91.08	271.83	6946.93	1082.31	-8043.61	1.10	69.11	8054.85	0.39	1.03	94.00
15196.00	90.30	271.87	6945.79	1085.38	-8138.56	0.82	177.06	8149.82	-0.82	0.04	95.00

Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	138.42	32.93	51.03	260.00	550.00	4485.23	3611.93	0.00	230.68	159.32	87.86	19236.11	0.00
Run	308.61	34.02	48.69	257.00	549.40	3981.93	3257.68	0.00	212.89	160.51	118.86	5807.67	0.00

MWD Data							
Tool	SN	Type	Version	MWD Details		Battery Details	
Pulser				Orifice		Plug In Date	
Driver				Orifice Type		Plug In Time	
Directional				Pulse Width		Plug Out Date	
Battery 1				Data Rate		Plug Out Time	
Battery 2				EM Power		Plug In Hrs Tot	0.00
Battery 3				EM Freq		Plug In Hrs Day	0.00
Gamma				Fin Size (in)		Circ Hrs Total	14.53
Helix				Non Mag Above/Below		Circ Hours Day	0.00

Magnetics					
Total Field	49366.350	Declination	8.458	Total Correction	8.458
Dip Angle	63.291	Grid Convergence	0.261	North Ref	TRUE

Aggitator Details					
Agitator SN	Make	Model	Description		Agitator->Bit (Usft)
Z0328	TTS	XR/V	6 1/2" XR/V agitator (ball drop)		5332.14

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
06/24/2024	00:00	00:20	0.33	12919.00	12997.00	78.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/12938.00 t/12997.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 177.00, Diff 900.00, Temp 230.00	
06/24/2024	00:20	00:27	0.12	12997.00	12997.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/24/2024	00:27	01:03	0.60	12997.00	13092.00	95.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/12997.00 t/13092.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 158.33, Diff 900.00, Temp 230.00	
06/24/2024	01:03	01:08	0.08	13092.00	13092.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/24/2024	01:08	01:40	0.53	13092.00	13186.00	94.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13092.00 t/13186.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 176.25, Diff 900.00, Temp 230.00	
06/24/2024	01:40	01:46	0.10	13186.00	13186.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/24/2024	01:46	02:20	0.57	13186.00	13281.00	95.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13186.00 t/13281.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 167.65, Diff 900.00, Temp 230.00	
06/24/2024	02:20	02:27	0.12	13281.00	13281.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/24/2024	02:27	02:31	0.07	13281.00	13291.00	10.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13281.00 t/13291.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 150.00, Diff 900.00, Temp 230.00	
06/24/2024	02:31	02:43	0.20	13291.00	13299.00	8.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/13291.00 t/13299.00, TF 50G, w/WOB 35,Flow 550.00, Press 4300, Tq 18500, ROP 40.00, Diff 900.00, Temp 230.00	
06/24/2024	02:43	03:05	0.37	13299.00	13299.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	5A	work free after Slide	
06/24/2024	03:05	03:32	0.45	13299.00	13376.00	77.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13299.00 t/13376.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 171.11, Diff 900.00, Temp 230.00	
06/24/2024	03:32	03:37	0.08	13376.00	13376.00	0.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection	
06/24/2024	03:37	03:41	0.07	13376.00	13386.00	10.00	CR/VLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13376.00 t/13386.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 150.00, Diff 900.00, Temp 230.00	

06/24/2024	03:41	03:52	0.18	13386.00	13394.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/13386.00 t/13394.00, TF 0G, w/WOB 35,Flow 550.00, Press 4300, Tq 18500, ROP 43.64, Diff 900.00, Temp 230.00
06/24/2024	03:52	04:22	0.50	13394.00	13470.00	76.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13394.00 t/13470.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 152.00, Diff 900.00, Temp 230.00
06/24/2024	04:22	04:29	0.12	13470.00	13470.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	04:29	04:53	0.40	13470.00	13526.00	56.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13470.00 t/13526.00, w/WOB 35,Flow 550.00, RPM53, Press 4300, Tq 18500, ROP 140.00, Diff 900.00, Temp 230.00
06/24/2024	04:53	05:35	0.70	13526.00	13526.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	8A	Replace Mud Line Gasket
06/24/2024	05:35	05:49	0.23	13526.00	13565.00	39.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13526.00 t/13565.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 167.14, Diff 875.00, Temp 230.00
06/24/2024	05:49	05:55	0.10	13565.00	13565.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	05:55	06:28	0.55	13565.00	13660.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13565.00 t/13660.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 172.73, Diff 875.00, Temp 230.00
06/24/2024	06:28	06:39	0.18	13660.00	13660.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	06:39	06:44	0.08	13660.00	13670.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13660.00 t/13670.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 120.00, Diff 875.00, Temp 230.00
06/24/2024	06:44	06:55	0.18	13670.00	13676.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/13670.00 t/13676.00, TF G, w/WOB 32,Flow 550.00, Press 4450, Tq 19000, ROP 32.73, Diff 875.00, Temp 230.00
06/24/2024	06:55	07:27	0.53	13676.00	13754.00	78.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13676.00 t/13754.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 146.25, Diff 875.00, Temp 230.00
06/24/2024	07:27	07:34	0.12	13754.00	13754.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	07:34	07:42	0.13	13754.00	13764.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13754.00 t/13764.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 75.00, Diff 875.00, Temp 230.00
06/24/2024	07:42	07:53	0.18	13764.00	13771.00	7.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/13764.00 t/13771.00, TF G, w/WOB 32,Flow 550.00, Press 4450, Tq 19000, ROP 38.18, Diff 875.00, Temp 230.00
06/24/2024	07:53	08:26	0.55	13771.00	13848.00	77.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13771.00 t/13848.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 140.00, Diff 875.00, Temp 230.00
06/24/2024	08:26	08:32	0.10	13848.00	13848.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	08:32	08:38	0.10	13848.00	13858.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13848.00 t/13858.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 100.00, Diff 875.00, Temp 230.00
06/24/2024	08:38	08:52	0.23	13858.00	13866.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/13858.00 t/13866.00, TF G, w/WOB 32,Flow 550.00, Press 4450, Tq 19000, ROP 34.29, Diff 875.00, Temp 230.00
06/24/2024	08:52	09:23	0.52	13866.00	13943.00	77.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13866.00 t/13943.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 149.03, Diff 875.00, Temp 230.00
06/24/2024	09:23	09:28	0.08	13943.00	13943.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	09:28	10:05	0.62	13943.00	14037.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/13943.00 t/14037.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 152.43, Diff 875.00, Temp 230.00
06/24/2024	10:05	10:10	0.08	14037.00	14037.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	10:10	10:48	0.63	14037.00	14132.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14037.00 t/14132.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 150.00, Diff 875.00, Temp 230.00
06/24/2024	10:48	10:53	0.08	14132.00	14132.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	10:53	11:30	0.62	14132.00	14227.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14132.00 t/14227.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 154.05, Diff 875.00, Temp 230.00
06/24/2024	11:30	11:37	0.12	14227.00	14227.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	11:37	11:43	0.10	14227.00	14237.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14227.00 t/14237.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 100.00, Diff 875.00, Temp 230.00
06/24/2024	11:43	11:57	0.23	14237.00	14243.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/14237.00 t/14243.00, TF G, w/WOB 32,Flow 550.00, Press 4450, Tq 19000, ROP 25.71, Diff 875.00, Temp 230.00
06/24/2024	11:57	12:30	0.55	14243.00	14321.00	78.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14243.00 t/14321.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 141.82, Diff 875.00, Temp 230.00
06/24/2024	12:30	12:38	0.13	14321.00	14321.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	12:38	12:40	0.03	14321.00	14331.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14321.00 t/14331.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 300.00, Diff 875.00, Temp 230.00
06/24/2024	12:40	12:50	0.17	14331.00	14337.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/14331.00 t/14337.00, TF G, w/WOB 32,Flow 550.00, Press 4450, Tq 19000, ROP 36.00, Diff 875.00, Temp 230.00
06/24/2024	12:50	13:20	0.50	14337.00	14416.00	79.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14337.00 t/14416.00, w/WOB 32,Flow 550.00, RPM50, Press 4450, Tq 19000, ROP 158.00, Diff 875.00, Temp 230.00
06/24/2024	13:20	13:35	0.25	14416.00	14416.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	8P	Rig service
06/24/2024	13:35	14:10	0.58	14416.00	14510.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14416.00 t/14510.00, w/WOB 32,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 161.14, Diff 850.00, Temp 233.00
06/24/2024	14:10	14:15	0.08	14510.00	14510.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	14:15	14:22	0.12	14510.00	14520.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14510.00 t/14520.00, w/WOB 32,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 85.71, Diff 850.00, Temp 233.00
06/24/2024	14:22	14:39	0.28	14520.00	14526.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/14520.00 t/14526.00, TF G, w/WOB 32,Flow 550.00, Press 4650, Tq 20000, ROP 21.18, Diff 850.00, Temp 233.00
06/24/2024	14:39	15:12	0.55	14526.00	14605.00	79.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14526.00 t/14605.00, w/WOB 32,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 143.64, Diff 850.00, Temp 233.00
06/24/2024	15:12	17:12	2.00	14605.00	14605.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	5A	Circulate clean up cycle
06/24/2024	17:12	17:51	0.65	14605.00	14700.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14605.00 t/14700.00, w/WOB 37,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 146.15, Diff 850.00, Temp 233.00
06/24/2024	17:51	17:58	0.12	14700.00	14700.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	17:58	18:37	0.65	14700.00	14794.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14700.00 t/14794.00, w/WOB 32,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 144.62, Diff 850.00, Temp 233.00
06/24/2024	18:37	18:41	0.07	14794.00	14794.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	18:41	19:22	0.68	14794.00	14889.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14794.00 t/14889.00, w/WOB 32,Flow 550.00, RPM50, Press 4650, Tq 20000, ROP 139.02, Diff 850.00, Temp 233.00

06/24/2024	19:22	19:27	0.08	14889.00	14889.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	19:27	19:34	0.12	14889.00	14903.00	14.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14889.00 t/14903.00, w/WOB 32.00, Flow 550.00, RPM 50, Press 4650, Tq 20000, ROP 120.00, Diff 850.00, Temp 233.00
06/24/2024	19:34	20:50	1.27	14903.00	14903.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	24A	Blacked Out / Restart Gens and get back Going
06/24/2024	20:50	21:24	0.57	14903.00	14983.00	80.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14903.00 t/14983.00, w/WOB 32.00, Flow 550.00, RPM 50.00, Press 4650.00, Tq 20000.00, ROP 141.18, Diff 850.00, Temp 233.00
06/24/2024	21:24	21:29	0.08	14983.00	14983.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	21:29	22:14	0.75	14983.00	15077.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/14983.00 t/15077.00, w/WOB 32.00, Flow 550.00, RPM 50.00, Press 4650.00, Tq 20000.00, ROP 125.33, Diff 850.00, Temp 233.00
06/24/2024	22:14	22:20	0.10	15077.00	15077.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	22:20	23:03	0.72	15077.00	15171.00	94.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15077.00 t/15171.00, w/WOB 32.00, Flow 550.00, RPM 50.00, Press 4650.00, Tq 20000.00, ROP 131.16, Diff 850.00, Temp 233.00
06/24/2024	23:03	23:07	0.07	15171.00	15171.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	23:07	23:46	0.65	15171.00	15266.00	95.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15171.00 t/15266.00, w/WOB 32.00, Flow 550.00, RPM 55, Press 4850, Tq 20000.00, ROP 146.15, Diff 850.00, Temp 237.00
06/24/2024	23:46	23:51	0.08	15266.00	15266.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection
06/24/2024	23:51	24:00	0.15	15266.00	15286.00	20.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15266.00 t/15286.00, w/WOB 32.00, Flow 550.00, RPM 55, Press 4850, Tq 20000.00, ROP 133.33, Diff 850.00, Temp 237.00

Daily Drilling Report 06/25/2024

	Job #	18354	Operator	Logos Operating LLC										
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC										
	Report #	15	Well	Rosa Unit 700H										
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W										
	Rig:	HP 530	County / State	Rio Arriba / New Mexico										
	Date:	06/25/2024	Report Time	00:00-24:00										
	Daily Cost(USD)	26000.00	Well Cost(USD)	186733.50										
24Hr Summary														
Drill Lateral to TD														
24Hr Lookahead														
Circ, ST, Circ, POOH														
Drilling Summary	24Hr (BHA 6)	Run (BHA 6)	Casing Data		Fluids									
Start Depth (Usft)	15286.00	15536.00	Csg Shoe MD(Usft)		600	51.00	%Sand							
End Depth (Usft)	15536.00	15536.00	OD (in)		300	30.00	%Solids	23.00						
Total Drilled (Usft)			Weight (lb/ft)		200	22.00	Weight (ppg)	11.10						
Slide Drilled (Usft)			Bit Data		100	14.00	Fluid Loss	17.40						
Rotary Drilled (Usft)			SN	5347417	6	6.00	PH							
Drig/Circ Hrs			Bit #	4	3	5.00	Mud Type	OBM						
Slide Drilling Hrs			OD (in)	8.500	10s Gel	6.00	Oil/Water	80/20						
Rotary Drilling Hrs			TFA	0.994	Temp(F)	150.00								
ROP Rot/Slide (Usft/hr)			Grade In	New	PV	21.00								
BRT Hrs	7.00	7.00	Grade Out	1-1-CT-S-X-I-PN-BHA	YP	9.00								
%Slide			Make	Baker Hughes	Viscosity	54.00								
%Rotary			Model	DD406TS	Chlorides	31000.00								
Personnel														
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man		
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John									
Brian Mitchell	Will Drake	Marlon Martin												
BHA														
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)					
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)			8.500	3.000			100.00	0.80	0.80					
7 Scout Cam 5/6 9.6 1.75 SLK			7.120	2.000			98.96	37.39	38.19					
6 3/4" Pony NMDC			6.680	3.310			92.00	10.63	48.82					
6 3/4" Pony NMDC			6.730	3.310			92.09	13.90	62.72					
6 1/2" NMDC			6.560	3.300			86.99	29.43	92.15					
6 1/2 Gap Sub(APS)			6.450	3.125			90.82	5.12	97.27					
6 1/2" NMDC			6.480	3.300			87.02	30.28	127.55					
6 1/2" Float sub			6.500	2.850			92.51	2.27	129.82					
5" HWDP (1 stand)			5.000	3.000	6.625	6.500	51.10	89.69	219.51					
5" DP (32 stands)			5.000	4.276	6.625	2.750	23.89	3025.00	3244.51					
6 1/2" XRV agitator (always on)			6.480	3.250			94.00	10.75	3255.26					
5" DP (22 stands)			5.000	4.276	6.625	2.750	23.89	2077.26	5332.52					
6 1/2" XRV agitator (ball drop)			6.500	3.250			94.00	10.75	5343.27					
5" DP (to surface)			5.000	4.276	6.625	2.750	23.89	1.00	5344.27					
									5344.27					
Motor Details														
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages			
TDI-712-MLA07-Q24		Scout	CAM	5/6	5.46		1.75	0.38		FBH	9.6			
Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
15290.00	90.54	272.48	6945.10	1088.95	-8232.48	0.70	68.52	8243.79	0.26	0.65	94.00			
15384.00	89.19	271.12	6945.32	1091.90	-8326.43	2.04	-134.79	8337.76	-1.44	-1.45	94.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	89.29	32.93	51.03	271.00	550.00	4485.23	3611.93	0.00	230.68	159.32	87.86	19236.11	0.00	
Run	147.29	34.02	48.69	268.00	549.40	3981.93	3257.68	0.00	212.89	160.51	118.86	5807.67	0.00	
MWD Data														
Tool	SN	Type	Version	MWD Details					Battery Details					
Pulser				Orifice					Plug In Date					
Driver				Orifice Type					Plug In Time					
Directional				Pulse Width					Plug Out Date					
Battery 1				Data Rate					Plug Out Time					
Battery 2				EM Power					Plug In Hrs Tot				0.00	
Battery 3				EM Freq					Plug In Hrs Day				0.00	
Gamma				Fin Size (in)					Circ Hrs Total				14.53	
Helix				Non Mag Above/Below					58.17 / 31.19	Circ Hours Day				0.00
Magnetics														
Total Field		49366.350		Declination			8.458	Total Correction			8.458			
Dip Angle		63.291		Grid Convergence			0.261	North Ref			TRUE			

Aggitator Details													
Agitator SN				Make		Model		Description				Agitator->Bit (Usft)	
Z0328				TTS		XRV		6 1/2" XRV agitator (ball drop)				5332.14	
Daily Activity													
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description			
06/25/2024	00:00	00:36	0.60	15286.00	15360.00	74.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15286.00 t/15360.00, w/WOB 32.00,Flow 550.00, RPM55, Press 4850, Tq 20000.00, ROP 123.33, Diff 850.00, Temp 237.00			
06/25/2024	00:36	00:41	0.08	15360.00	15360.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection			
06/25/2024	00:41	00:48	0.12	15360.00	15370.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15360.00 t/15370.00, w/WOB 32.00,Flow 550.00, RPM55, Press 4850, Tq 20000.00, ROP 85.71, Diff 850.00, Temp 237.00			
06/25/2024	00:48	01:10	0.37	15370.00	15378.00	8.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/15370.00 t/15378.00, TF -115G, w/WOB 32.00,Flow 550.00, Press 4850, Tq 20000.00, ROP 21.82, Diff 850.00, Temp 237.00			
06/25/2024	01:10	01:54	0.73	15378.00	15454.00	76.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15378.00 t/15454.00, w/WOB 32.00,Flow 550.00, RPM55, Press 4850, Tq 20000.00, ROP 103.64, Diff 850.00, Temp 237.00 - Rubber over Shakers			
06/25/2024	01:54	01:59	0.08	15454.00	15454.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	10D	Ream, Survey & Connection			
06/25/2024	01:59	02:04	0.08	15454.00	15464.00	10.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15454.00 t/15464.00, w/WOB 32.00,Flow 550.00, RPM55, Press 4850, Tq 20000.00, ROP 120.00, Diff 850.00, Temp 237.00			
06/25/2024	02:04	02:15	0.18	15464.00	15470.00	6.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2J	Slide Drill f/15464.00 t/15470.00, TF -60G, w/WOB 32.00,Flow 550.00, Press 4850, Tq 20000.00, ROP 32.73, Diff 850.00, Temp 237.00			
06/25/2024	02:15	02:58	0.72	15470.00	15536.00	66.00	CRVLAT	5: BHA 5 (Curve-Lateral)	2K	Rotary Drill f/15470.00 t/15536.00, w/WOB 32.00,Flow 550.00, RPM55, Press 4900, Tq 20000.00, ROP 92.09, Diff 800.00, Temp 237.00			
06/25/2024	02:58	06:37	3.65	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	5A	Circ BU Prior to Trip for BHA Rubber found over the shakers, Clean Hloe and Pump Slug			
06/25/2024	06:37	11:57	5.33	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	6B	TOH			
06/25/2024	11:57	13:38	1.68	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	5A	Circulate/flow check			
06/25/2024	13:38	14:13	0.58	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	24A	Pull rotating head/install trip nipple			
06/25/2024	14:13	15:30	1.28	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	6B	TOH			
06/25/2024	15:30	16:30	1.00	15536.00	15536.00	0.00	CRVLAT	5: BHA 5 (Curve-Lateral)	6P	LD BHA			
06/25/2024	16:30	17:00	0.50	15536.00	15536.00	0.00	CRVLAT	6: BHA6 (Lateral)	6O	PU BHA			
06/25/2024	17:00	24:00	7.00	15536.00	15536.00	0.00	LAT	6: BHA6 (Lateral)	6A	TIH			

Daily Drilling Report 06/26/2024

	Job #	18354	Operator	Logos Operating LLC								
	API Job # / AFE #	30-039-31441 / 20*240102		Field	Rio Arriba, NM(NAD83) - Logos Operating LLC							
	Report #	16	Well	Rosa Unit 700H								
	Latitude:	36° 54' 50.663" N		Longitude	107° 23' 57.682" W							
	Rig:	HP 530		County / State	Rio Arriba / New Mexico							
	Date:	06/26/2024		Report Time	00:00-24:00							
	Daily Cost(USD)	10000.00		Well Cost(USD)	196733.50							
24Hr Summary												
Ream to Bottom, Drill Lateral												
24Hr Lookahead												
Drill Lateral to TD, Circ,												
Drilling Summary		24Hr (BHA 6)	Run (BHA 6)	Casing Data			Fluids					
Start Depth (Usft)	15536.00	15536.00	Csg Shoe MD(Usft)		600	54.00	%Sand					
End Depth (Usft)	17460.00	17460.00	OD (in)		300	32.00	%Solids	23.00				
Total Drilled (Usft)	1924	1924	Weight (lb/ft)		200	23.00	Weight (ppg)	11.10				
Slide Drilled (Usft)	113	113	Bit Data		100	15.00	Fluid Loss	17.80				
Rotary Drilled (Usft)	1811	1811	SN	5346521	6	6.00	PH					
Drig/Circ Hrs	15.48 / 5.87	15.48 / 5.87	Bit #	5	3	5.00	Mud Type	OBM				
Slide Drilling Hrs	4.40	4.40	OD (in)	8.500	10s Gel	6.00	Oil/Water	77/23				
Rotary Drilling Hrs	11.08	11.08	TFA	0.994	Temp(F)	150.00						
ROP Rot/Slide (Usft/hr)	163.40 / 25.68	163.40 / 25.68	Grade In	New	PV	22.00						
BRT Hrs	24.00	31.00	Grade Out	1-1-WT-A-X-I-NO-TD	YP	10.00						
%Slide	5.87	5.87	Make	Baker Hughes	Viscosity	50.00						
%Rotary	94.13	94.13	Model	DD406TS	Chlorides	29000.00						
Personnel												
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John							
Brian Mitchell	Will Drake	Marlon Martin										
BHA												
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)			8.500	3.000			100.00	0.80	0.80			
7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab			7.120	2.000			99.97	37.01	37.81			
6 3/4" Pony NMDC			6.680	3.310			92.00	10.63	48.44			
6 3/4" Pony NMDC			6.730	3.310			92.09	13.90	62.34			
6 1/2" NMDC			6.560	3.300			86.99	29.43	91.77			
6 1/2 Gap Sub(APS)			6.450	3.125			90.82	5.12	96.89			
6 1/2" NMDC			6.480	3.300			87.02	30.28	127.17			
6 1/2" Float sub			6.500	2.850			92.51	2.27	129.44			
5" HWDP (1 stand)			5.000	3.000	6.625	6.500	51.10	89.69	219.13			
5" DP (32 stands)			5.000	4.276	6.625	2.750	23.89	3025.00	3244.13			
6 1/2" XRV agitator (always on)			6.480	3.250			94.00	10.75	3254.88			
5" DP (22 stands)			5.000	4.276	6.625	2.750	23.89	2077.26	5332.14			
6 1/2" XRV agitator (ball drop)			6.500	3.250			94.00	10.75	5342.89			
5" DP (to surface)			5.000	4.276	6.625	2.750	23.89	1.00	5343.89			
									5343.89			
Motor Details												
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-712-MLA07-033	Scout	Cam	5/6	5.47		1.25	0.40		FBH	9.4		

Surveys														
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)			
15479.00	89.83	270.77	6946.13	1093.47	-8421.42	0.77	-28.67	8432.76	0.67	-0.37	95.00			
15574.00	90.81	270.05	6945.60	1094.15	-8516.41	1.28	-36.30	8527.75	1.03	-0.76	95.00			
15668.00	90.97	269.69	6944.14	1093.93	-8610.40	0.42	-66.03	8621.73	0.17	-0.38	94.00			
15763.00	91.18	269.14	6942.36	1092.96	-8705.38	0.62	-69.09	8716.69	0.22	-0.58	95.00			
15857.00	91.28	269.60	6940.34	1091.93	-8799.35	0.50	77.73	8810.65	0.11	0.49	94.00			
15952.00	91.28	268.95	6938.22	1090.73	-8894.32	0.68	-89.99	8905.60	0.00	-0.68	95.00			
16046.00	91.51	269.00	6935.93	1089.05	-8988.27	0.25	12.26	8999.53	0.24	0.05	94.00			
16141.00	90.97	268.86	6933.88	1087.27	-9083.24	0.59	-165.47	9094.47	-0.57	-0.15	95.00			
16235.00	91.28	268.86	6932.03	1085.40	-9177.20	0.33	0.00	9188.41	0.33	0.00	94.00			
16329.00	91.82	269.32	6929.49	1083.91	-9271.15	0.75	40.41	9282.34	0.57	0.49	94.00			
16424.00	91.14	269.76	6927.03	1083.15	-9366.12	0.85	147.10	9377.29	-0.72	0.46	95.00			
16518.00	92.02	269.67	6924.44	1082.68	-9460.08	0.94	-5.84	9471.24	0.94	-0.10	94.00			
16613.00	92.46	270.23	6920.73	1082.60	-9555.00	0.75	51.81	9566.16	0.46	0.59	95.00			
16707.00	91.88	272.67	6917.17	1084.98	-9648.90	2.67	103.33	9660.08	-0.62	2.60	94.00			
16801.00	91.51	272.50	6914.39	1089.21	-9742.76	0.43	-155.33	9753.98	-0.39	-0.18	94.00			
16895.00	90.00	272.01	6913.15	1092.91	-9836.68	1.69	-162.02	9847.93	-1.61	-0.52	94.00			
16990.00	88.62	271.74	6914.29	1096.02	-9931.62	1.48	-168.93	9942.90	-1.45	-0.28	95.00			
17084.00	88.52	271.50	6916.64	1098.68	-10025.55	0.28	-112.63	10036.85	-0.11	-0.26	94.00			
17178.00	89.09	271.60	6918.60	1101.22	-10119.50	0.62	9.95	10130.82	0.61	0.11	94.00			
17273.00	88.18	269.92	6920.86	1102.48	-10214.46	2.01	-118.47	10225.79	-0.96	-1.77	95.00			
17367.00	88.25	270.22	6923.79	1102.59	-10308.41	0.33	76.86	10319.74	0.07	0.32	94.00			
Drilling Parameters														
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)	
24 Hrs	124.26	38.48	63.64	284.00	550.00	4394.83	3950.00	0.00	235.00	160.00	50.00	17.36	0.00	
Run	124.26	38.48	63.64	284.00	550.00	4394.83	3950.00	0.00	235.00	160.00	50.00	17.36	0.00	
MWD Data														
Tool		SN	Type	Version	MWD Details					Battery Details				
Pulser					Orifice					Plug In Date				
Driver					Orifice Type					Plug In Time				
Directional					Pulse Width					Plug Out Date				
Battery 1					Data Rate					Plug Out Time				
Battery 2					EM Power					Plug In Hrs Tot			0.00	
Battery 3					EM Freq					Plug In Hrs Day			0.00	
Gamma					Fin Size (in)					Circ Hrs Total			14.53	
Helix					Non Mag Above/Below					58.17 / 31.19		Circ Hours Day		0.00
Magnetics														
Total Field		49366.350			Declination			8.458	Total Correction			8.458		
Dip Angle		63.291			Grid Convergence			0.261	North Ref			TRUE		
Aggitator Details														
Agitator SN		Make	Model	Description						Agitator->Bit (Usft)				
Z0328		TTS	XR/V	6 1/2" XR/V agitator (ball drop)						5332.14				

Daily Activity											
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description	
06/26/2024	00:00	01:20	1.33	15536.00	15536.00	0.00	LAT	6: BHA6 (Lateral)	3D	Wash and ream from 12800 to 13366	
06/26/2024	01:20	02:04	0.73	15536.00	15536.00	0.00	LAT	6: BHA6 (Lateral)	5A	Shut in and circ out Gas	
06/26/2024	02:04	05:30	3.43	15536.00	15536.00	0.00	LAT	6: BHA6 (Lateral)	3D	Wash and Ream F/13336 T/15536	
06/26/2024	05:30	05:44	0.23	15536.00	15548.00	12.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15536.00 t/15548.00, w/WOB 25,Flow 550, RPM50, Press 4300, Tq 13, ROP 51.43, Diff 350.00, Temp 215.00	
06/26/2024	05:44	05:49	0.08	15548.00	15548.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	05:49	06:02	0.22	15548.00	15558.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15548.00 t/15558.00, w/WOB 25,Flow 550, RPM50, Press 4300, Tq 13, ROP 46.15, Diff 350.00, Temp 215.00	
06/26/2024	06:02	06:20	0.30	15558.00	15568.00	10.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/15558.00 t/15568.00, TF -30G, w/WOB 46,Flow 550, Press 4300, Tq , ROP 33.33, Diff 350.00, Temp 215.00	
06/26/2024	06:20	07:12	0.87	15568.00	15643.00	75.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15568.00 t/15643.00, w/WOB 35,Flow 550, RPM65, Press 4450, Tq 17, ROP 86.54, Diff 500.00, Temp 215.00	
06/26/2024	07:12	07:19	0.12	15643.00	15643.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	07:19	08:08	0.82	15643.00	15737.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15643.00 t/15737.00, w/WOB 37,Flow 550, RPM65, Press 4450, Tq 17, ROP 115.10, Diff 500.00, Temp 215.00	
06/26/2024	08:08	08:14	0.10	15737.00	15737.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	08:14	08:57	0.72	15737.00	15832.00	95.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15737.00 t/15832.00, w/WOB 37,Flow 550, RPM65, Press 4450, Tq 17, ROP 132.56, Diff 500.00, Temp 215.00	
06/26/2024	08:57	09:04	0.12	15832.00	15832.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	09:04	09:36	0.53	15832.00	15926.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15832.00 t/15926.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 17, ROP 176.25, Diff 450.00, Temp 215.00	
06/26/2024	09:36	09:41	0.08	15926.00	15926.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	09:41	10:13	0.53	15926.00	16021.00	95.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/15926.00 t/16021.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 178.13, Diff 450.00, Temp 215.00	
06/26/2024	10:13	10:18	0.08	16021.00	16021.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	10:18	10:56	0.63	16021.00	16115.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16021.00 t/16115.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 148.42, Diff 450.00, Temp 215.00	
06/26/2024	10:56	11:02	0.10	16115.00	16115.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	11:02	11:08	0.10	16115.00	16125.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16115.00 t/16125.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 100.00, Diff 450.00, Temp 215.00	
06/26/2024	11:08	11:35	0.45	16125.00	16132.00	7.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16125.00 t/16132.00, TF 150G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 15.56, Diff 450.00, Temp 215.00	
06/26/2024	11:35	12:01	0.43	16132.00	16210.00	78.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16132.00 t/16210.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 180.00, Diff 450.00, Temp 215.00	
06/26/2024	12:01	12:08	0.12	16210.00	16210.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	12:08	12:34	0.43	16210.00	16304.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16210.00 t/16304.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 216.92, Diff 450.00, Temp 215.00	
06/26/2024	12:34	12:41	0.12	16304.00	16304.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	12:41	13:08	0.45	16304.00	16398.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16304.00 t/16398.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 208.89, Diff 450.00, Temp 215.00	
06/26/2024	13:08	13:15	0.12	16398.00	16398.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	13:15	13:19	0.07	16398.00	16408.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16398.00 t/16408.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 150.00, Diff 450.00, Temp 215.00	
06/26/2024	13:19	13:33	0.23	16408.00	16417.00	9.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16408.00 t/16417.00, TF 150G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 38.57, Diff 450.00, Temp 215.00	
06/26/2024	13:33	13:56	0.38	16417.00	16493.00	76.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16417.00 t/16493.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 198.26, Diff 450.00, Temp 215.00	
06/26/2024	13:56	14:01	0.08	16493.00	16493.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	14:01	14:06	0.08	16493.00	16503.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16493.00 t/16503.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 120.00, Diff 450.00, Temp 215.00	
06/26/2024	14:06	14:19	0.22	16503.00	16508.00	5.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16503.00 t/16508.00, TF 38G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 23.08, Diff 450.00, Temp 215.00	
06/26/2024	14:19	14:45	0.43	16508.00	16587.00	79.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16508.00 t/16587.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 182.31, Diff 450.00, Temp 215.00	
06/26/2024	14:45	14:51	0.10	16587.00	16587.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	14:51	14:55	0.07	16587.00	16597.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16587.00 t/16597.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 150.00, Diff 450.00, Temp 215.00	
06/26/2024	14:55	15:28	0.55	16597.00	16607.00	10.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16597.00 t/16607.00, TF 150G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 18.18, Diff 450.00, Temp 215.00	
06/26/2024	15:28	15:50	0.37	16607.00	16682.00	75.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16607.00 t/16682.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 204.55, Diff 450.00, Temp 215.00	
06/26/2024	15:50	15:55	0.08	16682.00	16682.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	15:55	16:01	0.10	16682.00	16692.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16682.00 t/16692.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 100.00, Diff 450.00, Temp 215.00	
06/26/2024	16:01	16:34	0.55	16692.00	16707.00	15.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16692.00 t/16707.00, TF 180G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 27.27, Diff 450.00, Temp 215.00	
06/26/2024	16:34	16:56	0.37	16707.00	16776.00	69.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16707.00 t/16776.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 188.18, Diff 450.00, Temp 215.00	
06/26/2024	16:56	17:29	0.55	16776.00	16776.00	0.00	LAT	6: BHA6 (Lateral)	8P	Rig Service	
06/26/2024	17:29	17:33	0.07	16776.00	16786.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16776.00 t/16786.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 150.00, Diff 450.00, Temp 215.00	
06/26/2024	17:33	18:33	1.00	16786.00	16801.00	15.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16786.00 t/16801.00, TF 180G, w/WOB 47,Flow 550, Press 4400, Tq 18, ROP 15.00, Diff 450.00, Temp 215.00	
06/26/2024	18:33	19:01	0.47	16801.00	16870.00	69.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16801.00 t/16870.00, w/WOB 37,Flow 550, RPM65, Press 4400, Tq 18, ROP 147.86, Diff 450.00, Temp 215.00	
06/26/2024	19:01	19:23	0.37	16870.00	16870.00	0.00	LAT	6: BHA6 (Lateral)	5A	Activate 2nd Agitator	
06/26/2024	19:23	19:28	0.08	16870.00	16870.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	19:28	19:31	0.05	16870.00	16880.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16870.00 t/16880.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 200.00, Diff 750.00, Temp 215.00	
06/26/2024	19:31	19:56	0.42	16880.00	16898.00	18.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16880.00 t/16898.00, TF -135G, w/WOB 37,Flow 550, Press 5250, Tq 18, ROP 43.20, Diff 750.00, Temp 215.00	
06/26/2024	19:56	20:20	0.40	16898.00	16964.00	66.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16898.00 t/16964.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 165.00, Diff 750.00, Temp 215.00	
06/26/2024	20:20	20:31	0.18	16964.00	16964.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	20:31	20:51	0.33	16964.00	16976.00	12.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/16964.00 t/16976.00, TF 180G, w/WOB 37,Flow 550, Press 5250, Tq 18, ROP 36.00, Diff 750.00, Temp 215.00	
06/26/2024	20:51	21:17	0.43	16976.00	17059.00	83.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/16976.00 t/17059.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 191.54, Diff 750.00, Temp 215.00	
06/26/2024	21:17	21:27	0.17	17059.00	17059.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	21:27	21:51	0.40	17059.00	17153.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17059.00 t/17153.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 235.00, Diff 750.00, Temp 215.00	
06/26/2024	21:51	21:58	0.12	17153.00	17153.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	21:58	22:23	0.42	17153.00	17247.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17153.00 t/17247.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 225.60, Diff 750.00, Temp 215.00	
06/26/2024	22:23	22:28	0.08	17247.00	17247.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection	
06/26/2024	22:28	22:33	0.08	17247.00	17257.00	10.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17247.00 t/17257.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 120.00, Diff 750.00, Temp 215.00	
06/26/2024	22:33	22:54	0.35	17257.00	17269.00	12.00	LAT	6: BHA6 (Lateral)	2J	Slide Drill f/17257.00 t/17269.00, TF -130G, w/WOB 37,Flow 550, Press 5250, Tq 18, ROP 34.29, Diff 750.00, Temp 215.00	
06/26/2024	22										

Daily Drilling Report 06/27/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC									
	Report #	17	Well	Rosa Unit 700H									
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W									
	Rig:	HP 530	County / State	Rio Arriba / New Mexico									
	Date:	06/27/2024	Report Time	00:00-24:00									
	Daily Cost(USD)	10000.00	Well Cost(USD)	206733.50									
24Hr Summary													
Drill Lat to TD, Circ, POOH													
24Hr Lookahead													
Finish Laying Down BHA, Casing and Cement Ops													
Drilling Summary		24Hr (BHA 6)	Run (BHA 6)	Casing Data				Fluids					
Start Depth (Usft)	17460.00	15536.00	Csg Shoe MD(Usft)				600	54.00	%Sand				
End Depth (Usft)	18177.00	18177.00	OD (in)				300	32.00	%Solids		23.00		
Total Drilled (Usft)	717	2641	Weight (lb/ft)				200	23.00	Weight (ppg)		11.10		
Slide Drilled (Usft)		113	Bit Data				100	15.00	Fluid Loss		17.80		
Rotary Drilled (Usft)	717	2528	SN		5346521		6	6.00	PH				
Drig/Circ Hrs	3.42 / 8.67	18.90 / 14.53	Bit #		5		3	5.00	Mud Type		OBM		
Slide Drilling Hrs		4.40	OD (in)		8.500		10s Gel	6.00	Oil/Water		77/23		
Rotary Drilling Hrs	3.42	14.50	TFA		0.994		Temp(F)	150.00					
ROP Rot/Slide (Usft/hr)	209.85 / 0.00	174.34 / 25.68	Grade In		New		PV	22.00					
BRT Hrs	24.00	55.00	Grade Out		1-1-WT-AX-I-NO-TD		YP	10.00					
%Slide		4.28	Make		Baker Hughes		Viscosity	50.00					
%Rotary	100.00	95.72	Model		DD406TS		Chlorides	29000.00					
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John								
Brian Mitchell	Will Drake	Marlon Martin											
BHA													
Description			OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)				
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)			8.500	3.000			100.00	0.80	0.80				
7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab			7.120	2.000			99.97	37.01	37.81				
6 3/4" Pony NMDC			6.680	3.310			92.00	10.63	48.44				
6 3/4" Pony NMDC			6.730	3.310			92.09	13.90	62.34				
6 1/2" NMDC			6.560	3.300			86.99	29.43	91.77				
6 1/2 Gap Sub(APS)			6.450	3.125			90.82	5.12	96.89				
6 1/2" NMDC			6.480	3.300			87.02	30.28	127.17				
6 1/2" Float sub			6.500	2.850			92.51	2.27	129.44				
5" HWDP (1 stand)			5.000	3.000	6.625	6.500	51.10	89.69	219.13				
5" DP (32 stands)			5.000	4.276	6.625	2.750	23.89	3025.00	3244.13				
6 1/2" XRV agitator (always on)			6.480	3.250			94.00	10.75	3254.88				
5" DP (22 stands)			5.000	4.276	6.625	2.750	23.89	2077.26	5332.14				
6 1/2" XRV agitator (ball drop)			6.500	3.250			94.00	10.75	5342.89				
5" DP (to surface)			5.000	4.276	6.625	2.750	23.89	1.00	5343.89				
									5343.89				
Motor Details													
SN	Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages			
TDI-712-MLA07-033	Scout	Cam	5/6	5.47		1.25	0.40		FBH	9.4			
Surveys													
MD (Usft)	INC	AZI	TVD (Usft)	NS (Usft)	EW (Usft)	DLS (deg/100Usft)	TFO	VS (Usft)	BR (deg/100Usft)	TR (deg/100Usft)	CL (Usft)		
17462.00	88.49	270.03	6926.49	1102.80	-10403.37	0.32	-38.36	10414.70	0.25	-0.20	95.00		
17556.00	88.79	269.88	6928.73	1102.73	-10497.35	0.36	-26.56	10508.66	0.32	-0.16	94.00		
17650.00	89.06	269.79	6930.49	1102.46	-10591.33	0.30	-18.43	10602.64	0.29	-0.10	94.00		
17745.00	89.50	269.60	6931.68	1101.95	-10686.32	0.50	-23.36	10697.62	0.46	-0.20	95.00		
17839.00	89.87	269.04	6932.20	1100.83	-10780.31	0.71	-56.55	10791.59	0.39	-0.60	94.00		
17934.00	90.10	269.68	6932.22	1099.77	-10875.30	0.72	70.23	10886.57	0.24	0.67	95.00		
18028.00	90.34	269.65	6931.86	1099.22	-10969.30	0.26	-7.12	10980.55	0.26	-0.03	94.00		
18108.00	90.50	269.06	6931.28	1098.32	-11049.29	0.76	-74.82	11060.53	0.20	-0.74	80.00		
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	209.85	37.00	65.00	285.00	550.00	5250.00	4500.00	0.00	235.00	160.00	50.00	18.00	0.00
Run	139.74	37.88	64.23	284.00	550.00	4743.88	4174.49	0.00	235.47	159.82	50.00	17.64	0.00

MWD Data													
Tool		SN	Type	Version	MWD Details					Battery Details			
Pulser					Orifice					Plug In Date			
Driver					Orifice Type					Plug In Time			
Directional					Pulse Width					Plug Out Date			
Battery 1					Data Rate					Plug Out Time			
Battery 2					EM Power					Plug In Hrs Tot		0.00	
Battery 3					EM Freq					Plug In Hrs Day		0.00	
Gamma					Fin Size (in)					Circ Hrs Total		14.53	
Helix					Non Mag Above/Below					58.17 / 31.19		Circ Hours Day	0.00
Magnetics													
Total Field		49366.350			Declination				8.458	Total Correction			8.458
Dip Angle		63.291			Grid Convergence				0.261	North Ref			TRUE
Aggitator Details													
Agitator SN		Make		Model		Description					Agitator->Bit (Usft)		
Z0328		TTS		XRV		6 1/2" XRV agitator (ball drop)					5332.14		
Daily Activity													
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description			
06/27/2024	00:00	00:22	0.37	17460.00	17531.00	71.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17460.00 t/17531.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 193.64, Diff 750.00, Temp 230.00			
06/27/2024	00:22	00:29	0.12	17531.00	17531.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	00:29	00:54	0.42	17531.00	17625.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17531.00 t/17625.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 225.60, Diff 750.00, Temp 237.00			
06/27/2024	00:54	00:59	0.08	17625.00	17625.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	00:59	01:25	0.43	17625.00	17719.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17625.00 t/17719.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 216.92, Diff 750.00, Temp 237.00			
06/27/2024	01:25	01:31	0.10	17719.00	17719.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	01:31	01:55	0.40	17719.00	17814.00	95.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17719.00 t/17814.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 237.50, Diff 750.00, Temp 237.00			
06/27/2024	01:55	02:03	0.13	17814.00	17814.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	02:03	02:28	0.42	17814.00	17908.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17814.00 t/17908.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 225.60, Diff 750.00, Temp 237.00			
06/27/2024	02:28	02:38	0.17	17908.00	17908.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	02:38	03:02	0.40	17908.00	18003.00	95.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/17908.00 t/18003.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 237.50, Diff 750.00, Temp 237.00			
06/27/2024	03:02	03:07	0.08	18003.00	18003.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	03:07	03:36	0.48	18003.00	18097.00	94.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/18003.00 t/18097.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 194.48, Diff 750.00, Temp 237.00			
06/27/2024	03:36	03:42	0.10	18097.00	18097.00	0.00	LAT	6: BHA6 (Lateral)	10D	Ream, Survey & Connection			
06/27/2024	03:42	04:12	0.50	18097.00	18177.00	80.00	LAT	6: BHA6 (Lateral)	2K	Rotary Drill f/18097.00 t/18177.00, w/WOB 37,Flow 550, RPM65, Press 5250, Tq 18, ROP 160.00, Diff 750.00, Temp 237.00			
06/27/2024	04:12	04:15	0.05	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	10A	TD Survey			
06/27/2024	04:15	11:20	7.08	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	5A	Circ and pump Sweeps			
06/27/2024	11:20	19:25	8.08	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	6B	TOH			
06/27/2024	19:25	21:00	1.58	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	5A	Circ and Pump Mud Cap			
06/27/2024	21:00	23:00	2.00	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	6B	POOH			
06/27/2024	23:00	24:00	1.00	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	6P	L/D BHA			

Daily Drilling Report 06/28/2024

	Job #	18354	Operator	Logos Operating LLC									
	API Job # / AFE #	30-039-31441 / 20*240102	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC									
	Report #	18	Well	Rosa Unit 700H									
	Latitude:	36° 54' 50.663" N	Longitude	107° 23' 57.682" W									
	Rig:	HP 530	County / State	Rio Arriba / New Mexico									
	Date:	06/28/2024	Report Time	00:00-18:00									
	Daily Cost(USD)	4300.00	Well Cost(USD)	211033.50									
24Hr Summary													
L/D BHA, R/U and Run Casing													
Drilling Summary	24Hr (BHA 6)	Run (BHA 6)	Casing Data		Fluids								
Start Depth (Usft)	18177.00	15536.00	Csg Shoe MD(Usft)		600	54.00	%Sand						
End Depth (Usft)	18177.00	18177.00	OD (in)		300	32.00	%Solids	23.00					
Total Drilled (Usft)		2641	Weight (lb/ft)		200	23.00	Weight (ppg)	11.10					
Slide Drilled (Usft)		113	Bit Data		100	15.00	Fluid Loss	17.80					
Rotary Drilled (Usft)		2528	SN	5346521	6	6.00	PH						
Drig/Circ Hrs		18.90 / 14.53	Bit #	5	3	5.00	Mud Type	OBM					
Slide Drilling Hrs		4.40	OD (in)	8.500	10s Gel	6.00	Oil/Water	77/23					
Rotary Drilling Hrs		14.50	TFA	0.994	Temp(F)	150.00							
ROP Rot/Slide (Usft/hr)		174.34 / 25.68	Grade In	New	PV	22.00							
BRT Hrs	1.00	56.00	Grade Out	1-1-WT-A-XI-NO-TD	YP	10.00							
%Slide		4.28	Make	Baker Hughes	Viscosity	50.00							
%Rotary		95.72	Model	DD406TS	Chlorides	29000.00							
Personnel													
Co Man	DD	MWD	Drilling Engineer	Mud Engineer	Geologist	Tool Pusher	Trainee 1	Trainee 2	RSS Eng. 1	Rss Eng. 2	Third Man	Fourth Man	
Ryan Buford	Marc Keim	JC Slaton		David Riley	John John								
Brian Mitchell	Will Drake	Marlon Martin											
BHA													
Description				OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)			
8 1/2" Baker DD406TS 9x12 TFA0.994 - 0.99 (9x12)				8.500	3.000			100.00	0.80	0.80			
7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab				7.120	2.000			99.97	37.01	37.81			
6 3/4" Pony NMDC				6.680	3.310			92.00	10.63	48.44			
6 3/4" Pony NMDC				6.730	3.310			92.09	13.90	62.34			
6 1/2" NMDC				6.560	3.300			86.99	29.43	91.77			
6 1/2 Gap Sub(APS)				6.450	3.125			90.82	5.12	96.89			
6 1/2" NMDC				6.480	3.300			87.02	30.28	127.17			
6 1/2" Float sub				6.500	2.850			92.51	2.27	129.44			
5" HWDP (1 stand)				5.000	3.000	6.625	6.500	51.10	89.69	219.13			
5" DP (32 stands)				5.000	4.276	6.625	2.750	23.89	3025.00	3244.13			
6 1/2" XRV agitator (always on)				6.480	3.250			94.00	10.75	3254.88			
5" DP (22 stands)				5.000	4.276	6.625	2.750	23.89	2077.26	5332.14			
6 1/2" XRV agitator (ball drop)				6.500	3.250			94.00	10.75	5342.89			
5" DP (to surface)				5.000	4.276	6.625	2.750	23.89	1.00	5343.89			
										5343.89			
Motor Details													
SN		Make	Model	Lobes	Bit to Bend(Usft)		Bend	Rev Per (gpm)		Housing	Stages		
TDI-712-MLA07-033		Scout	Cam	5/6	5.47		1.25	0.40		FBH	9.4		
Drilling Parameters													
	ROP (Usft/hr)	WOB (klbs)	RPM	RPM DH	FLOW (gpm)	SPP ON (psi)	SPP OFF (psi)	SPM	PU (klbs)	ROT (klbs)	SO (klbs)	TQ ON (Kftlb)	TQ OFF (Kftlb)
24 Hrs	0.00	37.00	65.00	285.00	550.00	5250.00	4500.00	0.00	235.00	160.00	50.00	18.00	0.00
Run	139.74	37.88	64.23	284.00	550.00	4743.88	4174.49	0.00	235.47	159.82	50.00	17.64	0.00
MWD Data													
Tool	SN	Type	Version	MWD Details					Battery Details				
Pulser				Orifice					Plug In Date				
Driver				Orifice Type					Plug In Time				
Directional				Pulse Width					Plug Out Date				
Battery 1				Data Rate					Plug Out Time				
Battery 2				EM Power					Plug In Hrs Tot				0.00
Battery 3				EM Freq					Plug In Hrs Day				0.00
Gamma				Fin Size (in)					Circ Hrs Total				14.53
Helix				Non Mag Above/Below					Circ Hours Day				0.00
Magnetics													
Total Field	49366.350			Declination			8.458	Total Correction			8.458		
Dip Angle	63.291			Grid Convergence			0.261	North Ref			TRUE		
Aggitator Details													
Agitator SN		Make	Model	Description					Agitator->Bit (Usft)				
Z0328		TTS	XRV	6 1/2" XRV agitator (ball drop)					5332.14				

Daily Activity										
Date	From	To	Hrs	Start (Usft)	End (Usft)	CL	Phase	BHA	Code	Description
06/28/2024	00:00	01:00	1.00	18177.00	18177.00	0.00	LAT	6: BHA6 (Lateral)	6P	Finish Laying Down BHA
06/28/2024	01:00	02:00	1.00	18177.00	18177.00	0.00	LAT		24A	Clean Rig Floor and Pull wear Bushing
06/28/2024	02:00	03:00	1.00	18177.00	18177.00	0.00	LAT		12B	Rig up Casing crew
06/28/2024	03:00	18:00	15.00	18177.00	18177.00	0.00	LAT		12B	Run Casing

**Innovative Drilling Solutions
Data-Driven Decision**

A large, light gray gear graphic is centered in the background of the page, behind the title box.

BHA SUMMARY

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

BHA 1: BHA #1 (Surface)

				Bottom Hole Assembly											
Job#	18354						Rig	HP 530		BHA Length (Usft)			180.50		
Operator	Logos Operating LLC						BHA #	1		BHA Weight dry (klbs)			29.59		
Well	Rosa Unit 700H - OH						Bit #	1		BHA Weight Bouyed (klbs)			25.75		
Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						Depth In (Usft)	36.00		Wt. Below Jars dry (klbs)			29.59		
Date In	4/13/2024						Depth Out(Usft)	374.00		Wt. Below Jars Bouyed (klbs)			25.75		
Date Out	4/13/2024						Drilled(Usft)	338.00		Drilling / Circ Hours			8.33 / 1.38		
Sensor Offsets															
Survey Offset				N/A		Gamma Offset				N/A		Gyro Offset		N/A	
#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)		
	1	SK619	26" NOV TK95 jets 12x15's TFA2.071	26.000	3.250	0.000	0.00	7 5/8 REG		235.000	0.51	0.51	2.17	2.17	
	2	TDI-962-MLA01-010	9 5/8" 7/8 3.9stg staight motor w/slick sleeve	9.620	3.500	9.610	3.05	6 5/8 REG	7 5/8 REG	236.201	9.57	10.08	40.50	42.67	
	3	SD602195	23 3/4" NM Stabilizer	8.290	2.875	8.270	2.62	6 5/8 REG	6 5/8 REG	154.762	1.30	11.38	8.40	51.07	
	4	SD34407	8" Spiral NMDC	7.970	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	140.471	3.70	15.08	26.34	77.41	
	5	SD602201	23 3/4" NM Stabilizer	8.270	2.875	0.000	0.00	6 5/8 REG	6 5/8 REG	152.198	1.35	16.43	8.87	86.28	
	6	800-SS04-002	8" Steady Scout	8.000	3.125	6.010	1.08	6 5/8 REG	6 5/8 REG	142.000	4.58	21.00	32.24	118.52	
	7	SD43896	8" Spiral NMDC	8.030	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	140.870	3.95	24.95	28.04	146.56	
	8	SD51661	8" Spiral NMDC	8.050	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	139.803	4.25	29.20	30.40	176.96	
	9	SD120202	8" XO - 6 5/8 Reg Pin X4 1/2 XH	7.780	3.000	0.000	0.00	4 1/2 XH	6 5/8 REG	118.110	0.30	29.50	2.54	179.50	
	10	HP001	6 1/2" Steel DC (to surface)	6.500	2.810	0.000	0.00	NC46	NC46	90.610	0.09	29.59	1.00	180.50	
Bit Data						Motor Data									
SN	SK619					SN	TDI-962-MLA01-010								
Size (in)	26.000					OD (in)	9.620								
Type	PDC					Description	9 5/8" 7/8 3.9stg staight motor w/slick sleeve								
Description	26" NOV TK95 jets 12x15's TFA2.071					Make/Model	Scout / Turbo Scout								
Make	NOV					Bit to Bend (Usft) / Angle	0.00 / 0.00								
Model	TK95					Stab / Kick Pad OD (in)									
TFA	0.79 (4x16)					Stator Vendor/Type/Fit									
Grade In	1-1-WT-A-X-I-NO-TD					Pre Run Dyno HP%									
Grade Out						Lobes	7/8								
Drilled (Usft)	338.000					Stages	3.9								
						Rev/Gal	0.068								
						Diff Press (Avg/Max))(psi)	0.0 / 1320.0								
						Press. Drop(psi)	221.0								
						Max Torque(Kftlb)	33750.0								
						Max RPM	120								
						Flow Range(gpm)	600-1200								
						Re-Run	NO								
						Direct Bill	NO								
Stabilizer Data															
Component Number	Description			OD (in)	Blade Length (in)		Blade Width (in)		Blade Count		Stab->Bit (Usft)				
3	23 3/4" NM Stabilizer			23.750	19.50		3.63		3		45.08				
5	23 3/4" NM Stabilizer			23.750	18.00		2.88		3		79.62				

BHA 2: BHA 2 Intermediate 1

				Bottom Hole Assembly											
Job#	18354						Rig	HP 530		BHA Length (Usft)			1266.24		
Operator	Logos Operating LLC						BHA #	2		BHA Weight dry (klbs)			109.32		
Well	Rosa Unit 700H - OH						Bit #	2		BHA Weight Bouyed (klbs)			94.30		
Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						Depth In (Usft)	374.00		Wt. Below Jars dry (klbs)			74.61		
Date In	4/27/2024						Depth Out(Usft)	3500.00		Wt. Below Jars Bouyed (klbs)			64.36		
Date Out	4/30/2024						Drilled(Usft)	3126.00		Drilling / Circ Hours			49.12 / 3.62		
Sensor Offsets															
Survey Offset				64.00		Gamma Offset				60.57		Gyro Offset		N/A	
	#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)	
	1	A291711	17 1/2" NOV TK86 jets 8x16 TFA 1.571	17.500	3.000	0.000	0.00	7 5/8 REG		200.000	0.29	0.29	1.45	1.45	
	2	TDI-OSA-962-01-017	9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve	9.620	3.000	0.000	0.00	6 5/8 REG	7 5/8 REG	236.436	9.50	9.79	40.18	41.63	
	3	SD51886	8 Pony NMDC	7.900	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	156.780	1.85	11.64	11.80	53.43	
	4	SD50942	8 Spiral NMDC	7.960	3.625	0.000	0.00	6 5/8 REG	6 5/8 REG	139.695	3.85	15.49	27.56	80.99	
	5	850114097	8" MWD GAP sub APS	7.960	3.438	0.000	0.00	6 5/8 REG	6 5/8 REG	101.420	0.50	15.99	4.93	85.92	
	6	SD33340	8 Spiral NMDC	7.980	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	139.190	3.85	19.84	27.66	113.58	
	7	800-SS04-002	8 Steady Scout	8.000	3.125	0.000	0.00	6 5/8 REG	6 5/8 REG	155.087	5.00	24.84	32.24	145.82	
	8	SD120150	8 XO - 6 5/8 Reg Pin X 4 1/2 XH	8.050	2.875	0.000	0.00	4 1/2 XH	6 5/8 REG	131.965	0.45	25.29	3.41	149.23	
	9	HP01	6 1/2 DC (18 joints)	6.500	3.000	0.000	0.00	4 1/2 XH	4 1/2 XH	92.000	49.32	74.61	536.12	685.35	
	10	DJ10-650-018	6 1/2" Cougar jars	6.500	3.000	5.020	3.74	4 1/2 XH	4 1/2 XH	89.000	3.05	77.66	34.25	719.60	
	11	HP02	6 1/2" DC (3 jts)	6.500	3.000	0.000	0.00	4 1/2 XH	4 1/2 XH	92.000	8.17	85.84	88.85	808.45	
	12	SD4007	6 1/2" XO - 4 1/2 XH pin X 4 1/2 IF box	6.660	2.875	0.000	0.00	4 1/2 IF	4 1/2 XH	79.365	0.25	86.09	3.15	811.60	
	13	HP03	5" HWDP (15 jts)	5.000	3.000	0.000	0.00	4 1/2 IF	4 1/2 IF	51.100	23.23	109.32	454.64	1266.24	
Bit Data				Motor Data						Jar Data					
SN	A291711			SN	TDI-OSA-962-01-017			SN	DJ10-650-018						
Size (in)	17.500			OD (in)	9.620			OD (in)	6.500						
Type	PDC			Description	9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve			Description	6 1/2" Cougar jars						
Description	17 1/2" NOV TK86 jets 8x16 TFA 1.571			Make/Model	Scout			Make	Cougar						
Make	NOV			Bit to Bend (Usft) / Angle	7.51 / 2.12			Model	Hydra-Mech						
Model	TK86			Stab / Kick Pad OD (in)				Latch Up (klbs)	88000.00						
TFA	1.57 (8x16)			Stator Vendor/Type/Fit				Latch Down (klbs)	48000.00						
Grade In	New			Pre Run Dyno HP%				Impulse (klbs)	0.00						
Grade Out	1-1-WT-S-X-I-NO-TD			Lobes	7/8			Cnx Top	4 1/2 XH						
Drilled (Usft)	3126.000			Stages	3.9			Cnx Btm	4 1/2 XH						
				Rev/Gal	0.068										
				Diff Press (Avg/Max))(psi)	0.0 / 1320.0										
				Press. Drop(psi)	221.0										
				Max Torque(Kftlb)	33750.0										
				Max RPM	50										
				Flow Range(gpm)	600-1200										
				Re-Run	NO										
				Direct Bill	NO										

MWD Data							
MWD Type	EM	Pulser SN		Gamma SN		Plug In Date	
Orifice		Driver SN		EM SN		Plug In Time	
Orifice Type		Dir. Module SN		Pulse Width	0.00	Plug Out Date	
Poppet		Battery 1 SN		Data Rate	0.00	Plug Out Time	
Make		Battery 2 SN		EM Power	0.00	Plug In Hrs	0.00
Model		Battery 3 SN		EM Freq	0.000		
Fin Size (in)	0.000	Helix SN		Retrievable			

BHA 3: BHA 3 (Intermediate 2)

				Bottom Hole Assembly											
Job#	18354					Rig		HP 530		BHA Length (Usft)			1278.86		
Operator	Logos Operating LLC					BHA #		3		BHA Weight dry (klbs)			108.29		
Well	Rosa Unit 700H - OH					Bit #		3		BHA Weight Bouyed (klbs)			93.90		
Field	Rio Ariba, NM(NAD83) - Logos Operating LLC					Depth In (Usft)		3500.00		Wt. Below Jars dry (klbs)			65.70		
Date In	5/12/2024					Depth Out(Usft)		6385.00		Wt. Below Jars Bouyed (klbs)			56.97		
Date Out	5/14/2024					Drilled(Usft)		2885.00		Drilling / Circ Hours			25.17 / 11.32		
Sensor Offsets															
Survey Offset			67.00		Gamma Offset				63.48		Gyro Offset			N/A	
#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)		
	1	5348343	12 1/4" Hughes D506VTX6x16	12.250	3.000	0.000	0.00	6 5/8 REG		200.000	0.29	0.29	1.45	1.45	
	2	TDI-962-01-004	9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve	9.620	3.000	0.000	0.00	6 5/8 REG	6 5/8 REG	185.185	7.60	7.89	41.04	42.49	
	3	SD55949	8 Pony NMDC	8.050	3.520	0.000	0.00	6 5/8 REG	6 5/8 REG	124.725	1.70	9.59	13.63	56.12	
	4	SD43896	8 Spiral NMDC	8.030	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	142.702	3.95	13.54	27.68	83.80	
	5	TES8501140104	8 MWD GAP sub APS	7.960	3.438	0.000	0.00	6 5/8 REG	6 5/8 REG	102.249	0.50	14.04	4.89	88.69	
	6	SD51661	8 Spiral NMDC	8.050	3.500	0.000	0.00	6 5/8 REG	6 5/8 REG	141.714	4.25	18.29	29.99	118.68	
	7	800-SS04-004	8 Steady Scout	7.950	3.000	0.000	0.00	6 5/8 REG	6 5/8 REG	154.799	5.00	23.29	32.30	150.98	
	8	825BP284	BICO PBL Sub	8.250	3.500	8.240	4.13	6 5/8 REG	6 5/8 REG	101.000	0.83	24.12	8.24	159.22	
	9	SD122660	8 XO - 6 5/8 Reg Pin X4 1/2 XH	6.800	2.750	0.000	0.00	4 1/2 XH	6 5/8 REG	72.816	0.30	24.42	4.12	163.34	
	10	HP01	6 1/2 DC (15 joints)	6.500	3.000	0.000	0.00	4 1/2 XH	4 1/2 XH	92.000	41.28	65.70	448.68	612.02	
	11	DJ10-650-042	6 1/2" Cougar jars	6.500	3.000	6.460	4.37	4 1/2 XH	4 1/2 XH	89.000	2.86	68.56	32.15	644.17	
	12	HP02	6 1/2" DC (6 jts)	6.500	3.000	0.000	0.00	4 1/2 XH	4 1/2 XH	92.000	16.22	84.78	176.29	820.46	
	13	SD120967	6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box	6.720	2.875	0.000	0.00	4 1/2 IF	4 1/2 XH	73.138	0.27	85.06	3.76	824.22	
	14	HP03	5" HWDP (15 jts)	5.000	3.000	0.000	0.00	4 1/2 IF	4 1/2 IF	51.100	23.23	108.29	454.64	1278.86	
Comments															
Survey= 67', Gamma=63.48', Max Diff= 1390, Max TQ= 21,870, Flow 400-900, Rev/Gal 0.155, MaxRPM45															

Bit Data		Motor Data		Jar Data	
SN	5348343	SN	TDI-962-01-004	SN	DJ10-650-042
Size (in)	12.250	OD (in)	9.620	OD (in)	6.500
Type	PDC	Description	9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve	Description	6 1/2" Cougar jars
Description	12 1/4" Hughes D506VTX6x16	Make/Model	Scout / Turbo Scout	Make	Cougar
Make	Baker Hughes	Bit to Bend (Usft) / Angle	7.49 / 2.12	Model	Hydra-Mech
Model	D506VTX	Stab / Kick Pad OD (in)	10.280	Latch Up (klbs)	88000.00
TFA	1.18 (6x16)	Stator Vendor/Type/Fit		Latch Down (klbs)	48000.00
Grade In	New	Pre Run Dyno HP%		Impulse (klbs)	0.00
Grade Out	1-1-WT-A-X-I-NO-TD	Lobes	7/8	Cnx Top	4 1/2 XH
Drilled (Usft)	2885.000	Stages	5.9	Cnx Btm	4 1/2 XH
		Rev/Gal	0.155		
		Diff Press (Avg/Max))(psi)	0.0 / 1390.0		
		Press. Drop(psi)	221.0		
		Max Torque(Kftlb)	21870.0		
		Max RPM	45		
		Flow Range(gpm)	400-900		
		Re-Run	NO		
		Direct Bill	NO		

MWD Data							
MWD Type	EM	Pulser SN		Gamma SN		Plug In Date	
Orifice		Driver SN		EM SN		Plug In Time	
Orifice Type		Dir. Module SN		Pulse Width	0.00	Plug Out Date	
Poppet		Battery 1 SN		Data Rate	0.00	Plug Out Time	
Make		Battery 2 SN		EM Power	0.00	Plug In Hrs	0.00
Model		Battery 3 SN		EM Freq	0.000		
Fin Size (in)	0.000	Helix SN		Retrievable			

BHA 4: BHA 4(DV drill out)

				Bottom Hole Assembly											
Job#	18354						Rig	HP 530		BHA Length (Usft)			644.14		
Operator	Logos Operating LLC						BHA #	4		BHA Weight dry (klbs)			40.65		
Well	Rosa Unit 700H - OH						Bit #	4		BHA Weight Bouyed (klbs)			35.25		
Field	Rio Ariba, NM (NAD83) - Logos Operating LLC						Depth In (Usft)	0.00		Wt. Below Jars dry (klbs)			40.65		
Date In							Depth Out(Usft)	6401.00		Wt. Below Jars Bouyed (klbs)			35.25		
Date Out							Drilled(Usft)	16.00		Drilling / Circ Hours			5.35 / 2.38		
Sensor Offsets															
Survey Offset				N/A		Gamma Offset				N/A		Gyro Offset		N/A	
	#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)	
	1	R11508	8 1/2" Smith XR+ Rock Bit 3x20	8.500	3.000	0.000	0.00	4 1/2 REG		100.000	0.10	0.10	1.00	1.00	
	2	N69217	6 1/2" Bit Sub W/Float	6.530	2.250	0.000	0.00	4 1/2 XH	4 1/2 REG	99.000	0.43	0.53	4.39	5.39	
	3	HP01	6 1/2" Spiral Steel DC's (6 jts)	6.500	3.000	0.000	0.00	4 1/2 XH	4 1/2 XH	92.000	16.68	17.22	181.34	186.73	
	4	SD4007	6 1/2 XO- 4 1/2 XH Pin x 4 1/2 IF box	6.660	2.875	0.000	0.00	4 1/2 IF	4 1/2 XH	87.302	0.26	17.48	3.00	189.73	
	5	HP03	5" HWDP (15 jts)	5.000	3.000	0.000	0.00	4 1/2 IF	4 1/2 IF	51.100	23.17	40.65	453.41	643.14	
	6	HP04	5" DP (to surface)	5.000	4.276	0.000	0.00	HT50	HT50	23.100	0.02	40.67	1.00	644.14	
Bit Data															
SN				R11508											
Size (in)				8.500											
Type				Rock Bit											
Description				8 1/2" Smith XR+ Rock Bit 3x20											
Make				Smith											
Model				XR+											
TFA				0.92 (3x20)											
Grade In				1-1-CT-N-E-I-NO-BHA											
Grade Out															
Drilled (Usft)				16.000											

BHA 5: BHA 5 (Curve-Lateral)

						Bottom Hole Assembly										
Job#	18354						Rig		HP 530		BHA Length (Usft)				5344.27	
Operator	Logos Operating LLC						BHA #		5		BHA Weight dry (klbs)				140.41	
Well	Rosa Unit 700H - OH						Bit #		4		BHA Weight Bouyed (klbs)				116.83	
Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						Depth In (Usft)		6401.00		Wt. Below Jars dry (klbs)				140.41	
Date In	6/21/2024						Depth Out(Usft)		15536.00		Wt. Below Jars Bouyed (klbs)				116.83	
Date Out	6/25/2024						Drilled(Usft)		9154.00		Drilling / Circ Hours				62.15 / 9.18	
Sensor Offsets																
Survey Offset				70.00			Gamma Offset				66.56		Gyro Offset			N/A
	#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)		
	1	5347417	8 1/2" Baker DD406TS 9x12 TFA 0.994	8.500	3.000	0.000	0.00	4 1/2 REG		100.000	0.08	0.08	0.80	0.80		
	2	TDI-712-MLA07-024	7 Scout Cam 5/6 9.6 1.75 SLK	7.120	2.000	5.750	0.99	4 1/2 IF	4 1/2 REG	98.957	3.70	3.78	37.39	38.19		
	3	SD54077	6 3/4" Pony NMDC	6.680	3.310	0.000	0.00	4 1/2 IF	4 1/2 IF	92.004	0.98	4.76	10.63	48.82		
	4	SD55003	6 3/4" Pony NMDC	6.730	3.310	0.000	0.00	4 1/2 IF	4 1/2 IF	92.086	1.28	6.04	13.90	62.72		
	5	SD57131	6 1/2" NMDC	6.560	3.300	0.000	0.00	4 1/2 IF	4 1/2 IF	86.986	2.56	8.60	29.43	92.15		
	6	GAP 6501140324	6 1/2 Gap Sub(APS)	6.450	3.125	0.000	0.00	4 1/2 IF	4 1/2 IF	90.820	0.46	9.06	5.12	97.27		
	7	SD57653	6 1/2" NMDC	6.480	3.300	0.000	0.00	4 1/2 IF	4 1/2 IF	87.021	2.63	11.70	30.28	127.55		
	8	SD121330	6 1/2" Float sub	6.500	2.850	0.000	0.00	4 1/2 IF	4 1/2 IF	92.511	0.21	11.91	2.27	129.82		
	9	HP01	5" HWDP (1 stand)	5.000	3.000	0.000	0.00	4 1/2 IF	4 1/2 IF	51.100	4.58	16.49	89.69	219.51		
	10	HP02	5" DP (32 stands)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	72.27	88.76	3025.00	3244.51		
	11	Z40024	6 1/2" XRV agitator (always on)	6.480	3.250	5.000	1.29	4 1/2 IF	4 1/2 IF	94.000	1.01	89.77	10.75	3255.26		
	12	HP03	5" DP (22 stands)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	49.63	139.39	2077.26	5332.52		
	13	Z0328	6 1/2" XRV agitator (ball drop)	6.500	3.250	5.000	1.29	4 1/2 IF	4 1/2 IF	94.000	1.01	140.41	10.75	5343.27		
	14	HP04	5" DP (to surface)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	0.02	140.43	1.00	5344.27		

Bit Data				Motor Data			
SN	5347417			SN	TDI-712-MLA07-024		
Size (in)	8.500			OD (in)	7.120		
Type	PDC			Description	7 Scout Cam 5/6 9.6 1.75 SLK		
Description	8 1/2" Baker DD406TS 9x12 TFA0.994			Make/Model	Scout / CAM		
Make	Baker Hughes			Bit to Bend (Usft) / Angle	5.46 / 1.75		
Model	DD406TS			Stab / Kick Pad OD (in)			
TFA	0.99 (9x12)			Stator Vendor/Type/Fit			
Grade In	New			Pre Run Dyno HP%			
Grade Out	1-1-CT-S-X-I-PN-BHA			Lobes	5/6		
Drilled (Usft)	9154.000			Stages	9.6		
				Rev/Gal	0.380		
				Diff Press (Avg/Max))(psi)	0.0 / 2260.0		
				Press. Drop(psi)	240.0		
				Max Torque(Kftlb)	15080.0		
				Max RPM	60		
				Flow Range(gpm)	350-750		
				Re-Run	NO		
				Direct Bill	NO		
MWD Data							
MWD Type		Pulser SN		Gamma SN		Plug In Date	
Orifice		Driver SN		EM SN		Plug In Time	
Orifice Type		Dir. Module SN		Pulse Width	0.00	Plug Out Date	
Poppet		Battery 1 SN		Data Rate	0.00	Plug Out Time	
Make		Battery 2 SN		EM Power	0.00	Plug In Hrs	0.00
Model		Battery 3 SN		EM Freq	0.000		
Fin Size (in)	0.000	Helix SN		Retrievable			

BHA 6: BHA 6 (Lateral)

				Bottom Hole Assembly												
Job#	18354						Rig		HP 530		BHA Length (Usft)			5343.89		
Operator	Logos Operating LLC						BHA #		6		BHA Weight dry (klbs)			140.41		
Well	Rosa Unit 700H - OH						Bit #		5		BHA Weight Bouyed (klbs)			116.83		
Field	Rio Arriba, NM(NAD83) - Logos Operating LLC						Depth In (Usft)		15536.00		Wt. Below Jars dry (klbs)			140.41		
Date In	6/25/2024						Depth Out(Usft)		18177.00		Wt. Below Jars Bouyed (klbs)			116.83		
Date Out	6/28/2024						Drilled(Usft)		2641.00		Drilling / Circ Hours			18.90 / 14.53		
Sensor Offsets																
Survey Offset				69.00			Gamma Offset				66.20		Gyro Offset		N/A	
	#	SN	Description	OD (in)	ID (in)	FN OD (in)	FN Length (Usft)	Cnx Up	Cnx Dn	Unit Weight (lb/ft)	Comp Weight (klbs)	Total Weight (klbs)	Length (Usft)	Total Length (Usft)		
	1	5346521	8 1/2" Baker DD406TS 9x12 TFA0.994	8.500	3.000	0.000	0.00	4 1/2 REG		100.000	0.08	0.08	0.80	0.80		
	2	TDI-712-MLA07-033	7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab	7.120	2.000	6.990	1.37	4 1/2 IF	4 1/2 REG	99.973	3.70	3.78	37.01	37.81		
	3	SD54077	6 3/4" Pony NMDC	6.680	3.310	0.000	0.00	4 1/2 IF	4 1/2 IF	92.004	0.98	4.76	10.63	48.44		
	4	SD55003	6 3/4" Pony NMDC	6.730	3.310	0.000	0.00	4 1/2 IF	4 1/2 IF	92.086	1.28	6.04	13.90	62.34		
	5	SD57131	6 1/2" NMDC	6.560	3.300	0.000	0.00	4 1/2 IF	4 1/2 IF	86.986	2.56	8.60	29.43	91.77		
	6	GAP 6501140324	6 1/2 Gap Sub(APS)	6.450	3.125	0.000	0.00	4 1/2 IF	4 1/2 IF	90.820	0.46	9.06	5.12	96.89		
	7	SD57653	6 1/2" NMDC	6.480	3.300	0.000	0.00	4 1/2 IF	4 1/2 IF	87.021	2.63	11.70	30.28	127.17		
	8	SD121330	6 1/2" Float sub	6.500	2.850	0.000	0.00	4 1/2 IF	4 1/2 IF	92.511	0.21	11.91	2.27	129.44		
	9	HP01	5" HWDP (1 stand)	5.000	3.000	0.000	0.00	4 1/2 IF	4 1/2 IF	51.100	4.58	16.49	89.69	219.13		
	10	HP02	5" DP (32 stands)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	72.27	88.76	3025.00	3244.13		
	11	ZA0024	6 1/2" XRV agitator (always on)	6.480	3.250	5.000	1.29	4 1/2 IF	4 1/2 IF	94.000	1.01	89.77	10.75	3254.88		
	12	HP03	5" DP (22 stands)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	49.63	139.39	2077.26	5332.14		
	13	Z0328	6 1/2" XRV agitator (ball drop)	6.500	3.250	5.000	1.29	4 1/2 IF	4 1/2 IF	94.000	1.01	140.41	10.75	5342.89		
	14	HP04	5" DP (to surface)	5.000	4.276	0.000	0.00	4 1/2 IF	4 1/2 IF	23.890	0.02	140.43	1.00	5343.89		

Bit Data		Motor Data	
SN	5346521	SN	TDI-712-MLA07-033
Size (in)	8.500	OD (in)	7.120
Type	PDC	Description	7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab
Description	8 1/2" Baker DD406TS 9x12 TFA0.994	Make/Model	Scout / Cam
Make	Baker Hughes	Bit to Bend (Usft) / Angle	5.47 / 1.25
Model	DD406TS	Stab / Kick Pad OD (in)	
TFA	0.99 (9x12)	Stator Vendor/Type/Fit	
Grade In	New	Pre Run Dyno HP%	
Grade Out	1-1-WT-A-X-I-NO-TD	Lobes	5/6
Drilled (Usft)	2641.000	Stages	9.4
		Rev/Gal	0.400
		Diff Press (Avg/Max))(psi)	0.0 / 1880.0
		Press. Drop(psi)	240.0
		Max Torque(Kftlb)	11214.0
		Max RPM	80
		Flow Range(gpm)	350-700
		Re-Run	NO
		Direct Bill	NO
MWD Data			
MWD Type		Pulser SN	
Orifice		Driver SN	
Orifice Type		Dir. Module SN	
Poppet		Battery 1 SN	
Make		Battery 2 SN	
Model		Battery 3 SN	
Fin Size (in)	0.000	Helix SN	
		Gamma SN	
		EM SN	
		Pulse Width	0.00
		Data Rate	0.00
		EM Power	0.00
		EM Freq	0.000
		Retrievable	
		Plug In Date	
		Plug In Time	
		Plug Out Date	
		Plug Out Time	
		Plug In Hrs	0.00

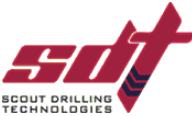
**Innovative Drilling Solutions
Data-Driven Decision**

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BOTTOM HOLE ASSEMBLY MUD MOTOR RECAP

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

BHA 2 Intermediate 1 - Motor Performance Report



Job #	18354	Operator	Logos Operating LLC
API#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC
Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H
Longitude	107° 23' 57.682" W	State	New Mexico
Rig	HP 530	County	Rio Arriba
Reason POOH	Section TD	BHA #	2
Lead DD	Chris Hite	Company Man	Andrew Baltes
DD Coordinator	Bill Herbers	District	

Motor Performance Report						
Run Data		Motor Data		Drilling Parameters		
Date In	4/27/2024 15:30	SN	TDI-OSA-962-01-017		WOB Rotate (klbs)	20/34/43
Date Out	4/30/2024 09:10	Description	9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve		WOB Slide (klbs)	32.00
Depth In(Usft)	374.00	Make	Scout		RPM Max	50
Depth Out(Usft)	3500.00	Model			RPM Avg	40/44/45
Inc In	0.63	Re-run	NO		Flow Rate (gpm)	1000/1000/1000
Inc Out	8.91	Direct Bill	NO		Off Btm Press (psi)	1000/1650/2000
Azi In	134.44	Lobes	7/8		On Btm Press (psi)	1200/2199/2500
Azi Out	10.82	Stages	3.9		Avg Diff Press (psi)	549.00
Total Drilled (Usft)	3126.00	Bend Angle	2.12		Tq On Btm (Kftlb)	10800/17412/23000
%Slide (Rtg)	20.28	Bit to Bend (Usft)	7.51		Tq Off Btm (Kftlb)	0.00
%Slide (Hrs)	26.43	Sleeve Stab OD (in)			Temperature (degF)	0 / 0 / 0
Slide Drilled (Usft)	634.00	Bearing Gap (in)			PUWT (klbs)	85.00
Slide Hours	12.98	Stab to Bit (Usft)			ROT WT (klbs)	85.00
%Rotary (Rtg)	79.72	Kickpad OD (in)			SO WT (klbs)	85.00
%Rotary (Hrs)	73.57	Body OD (in)	9.620		Bit SN	A291711
Rotary Drilled (Usft)	2492.00	Fishneck OD (in)			Bit Type	PDC
Rotary Hours	36.14	Length (Usft)	40.18		Bit Make	NOV
Total Drig Hrs	49.12	Integral Float	YES		Bit Model	TK86
Total D&C Hrs	52.73	Rev per Gal:	0.068		Bit OD (in)	17.500
Off Btm Circ Hrs	3.62	#Stalls			Bit TFA	1.57 (8x16)
BRT Hrs	65.67	Stalls Pressure			Bit #	2
Slide ROP (Usft/hr)	48.84	Stator Vendor			Bit Grade In	New
Rot ROP (Usft/hr)	68.95	Stator Type			Bit Grade Out	1-1-WT-S-X-I-NO-TD
Avg ROP (Usft/hr)	63.64	Stator Fit	0.000		Drill Hrs	49.12
		Pre-Run Dyno HP%			Circ Hrs	3.62
		Max DiffP (psi)	1320.00			
		Max Torque (Kftlb)	33750.00			
		Flow Range (gpm)	600-1200			

Mud Data													
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)
10	7	5	3	2	1	3 / 4		9.30	310.00	WBM	5.00	0.25	

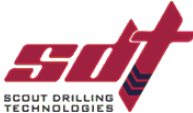
Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
64.00	60.57				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.98

BHA Details										
Description	SN	OD (in)	ID (in)	CNX TOP	CNX BTM	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)
17 1/2" NOV/TK86 jets 8x16 TFA 1.571 1.57 (8x16)	A291711	17.500	3.000	7 5/8 REG				200.00	1.45	1.45
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve	TDI-OSA-962-01-017	9.620	3.000	6 5/8 REG	7 5/8 REG			236.44	40.18	41.63
8 Pony NMDC	SD51886	7.900	3.500	6 5/8 REG	6 5/8 REG			156.78	11.80	53.43
8 Spiral NMDC	SD50942	7.960	3.625	6 5/8 REG	6 5/8 REG			139.69	27.56	80.99
8" MMD GAP sub APS	850114097	7.960	3.438	6 5/8 REG	6 5/8 REG			101.42	4.93	85.92
8 Spiral NMDC	SD33340	7.980	3.500	6 5/8 REG	6 5/8 REG			139.19	27.66	113.58
8 Steady Scout	800-SS04-002	8.000	3.125	6 5/8 REG	6 5/8 REG			155.09	32.24	145.82
8 XO - 6 5/8 Reg Pin X 4 1/2 XH	SD120150	8.050	2.875	4 1/2 XH	6 5/8 REG			131.97	3.41	149.23
6 1/2 DC (18 joints)	HP01	6.500	3.000	4 1/2 XH	4 1/2 XH			92.00	536.12	685.35
6 1/2" Cougar jars	DJ10-650-018	6.500	3.000	4 1/2 XH	4 1/2 XH			89.00	34.25	719.60
6 1/2" DC (3 jts)	HP02	6.500	3.000	4 1/2 XH	4 1/2 XH			92.00	88.85	808.45
6 1/2" XO - 4 1/2 XH pin X 4 1/2 IF box	SD4007	6.660	2.875	4 1/2 IF	4 1/2 XH			79.36	3.15	811.60
5" HWDP (15 jts)	HP03	5.000	3.000	4 1/2 IF	4 1/2 IF		6.500	51.10	454.64	1266.24
										1266.24

Additional Comments
Reason to POOH: TD/Casing Depth Surface findings: Motor Drained well and Had Minimal Squat. Run description: Drill INT #1 Type of Fluid: WBM Temp In: 87? F Temp Out: 143? F Ream In footage (ft): N/A Ream In total Time (Hrs): N/A Additional Comments: Bit Graded 1-1-CT-S-X-I-No-TD

Images

BHA 2 Intermediate 1 - MWD Post Run Report

	Job #	18354	Operator	Logos Operating LLC
	API Job#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H
	Longitude	107° 23' 57.682" W	State	New Mexico
	Rig	HP 530	County	Rio Arriba
	Reason POOH	Section TD	BHA/MWD #	2 / 1
	MWD Engineers	Tyler Sjogren / JC Slaton	Company Man	Andrew Baltes

MWD Post Run Report									
Run Data				MWD Data		Drilling Parameters			
Date In	4/27/2024 15:30			Pulser SN		WOB (klbs)	20/34/43		
Date Out	4/30/2024 09:10			Driver SN		RPM	40/44/45		
Depth In/Out(Usft)	374.00 / 3500.00			Directional SN		Flow Rate (gpm)	1000/1000/1000		
Inc In/Out	0.63 / 8.91			Battery 1 SN		Off Btm Press (psi)	1000/1650/2000		
Azi In/Out	134.44 / 10.82			Battery 2 SN		On Btm Press (psi)	1200/2199/2500		
Total Drilled (Usft)	3126.00			Battery 3 SN		Tq On Btm (Kftlb)	10800/17412/23000		
%Slide	20.28			Gamma SN		Tq Off Btm (Kftlb)	0.00		
Slide Drilled (Usft)	634.00			EM SN		Avg Diff Press (psi)			
Slide Hours	12.98			Helix SN		Bit Make	NOV		
%Rotary	79.72			Plug In Date		Bit Model	TK86		
Rotary Drilled (Usft)	2492.00			Plug In Time		Bit OD (in)	17.500		
Rotary Hours	36.14			Plug Out Date		Bit TFA	1.57 (8x16)		
Drig/Circ/BRT Hrs	49.12 / 3.62 / 65.67			Plug Out Time		Bit #	2		
Slide ROP (Usft/hr)	48.84			Plug In Hours		Bit Grade In	New		
Rot ROP (Usft/hr)	68.95			Circ Hours	3.62	Bit Grade Out	1-1-WT-S-X-I-NO-TD		
Avg ROP (Usft/hr)	63.64					Drill / Circ Hrs	49.12 / 3.62		

Mud Data														
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)	
10	7	5	3	2	1	3 / 4		9.30	310.00	WBM	5.00	0.25		

Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
64.00	60.57				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.98

BHA Details								
Description	OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)	
17 1/2" NOV TK86 jets 8x16 TFA 1.571 1.57 (8x16)	17.500	3.000			200.00	1.45	1.45	
9 5/8 Scout 7/8 3.9stg w/2.12 ABH slick sleeve	9.620	3.000			236.44	40.18	41.63	
8 Pony NMDC	7.900	3.500			156.78	11.80	53.43	
8 Spiral NMDC	7.960	3.625			139.69	27.56	80.99	
8" MWD GAP sub APS	7.960	3.438			101.42	4.93	85.92	
8 Spiral NMDC	7.980	3.500			139.19	27.66	113.58	
8 Steady Scout	8.000	3.125			155.09	32.24	145.82	
8 XO - 6 5/8 Reg Pin X4 1/2 XH	8.050	2.875			131.97	3.41	149.23	
6 1/2 DC (18 joints)	6.500	3.000			92.00	536.12	685.35	
6 1/2" Cougar jars	6.500	3.000			89.00	34.25	719.60	
6 1/2" DC (3 jts)	6.500	3.000			92.00	88.85	808.45	
6 1/2" XO - 4 1/2 XH pin X4 1/2 IF box	6.660	2.875			79.36	3.15	811.60	
5" HWDP (15 jts)	5.000	3.000		6.500	51.10	454.64	1266.24	
							1266.24	

MWD Data										
Rig Floor Disp. SN		Pre Run Comms		Pulse Amp Off Btm	0.00					
Barrier Box SN		Pre Run Pulse		Pulse Amp On Btm	0.00					
Logging HASP SN		Pre Run Flow		Good Detection						
Main Laptop SN		Pre Run Tap		Pulse Width / Data Rate	0.00 / 0.00					
BU Laptop SN		Post Run Comms		Fin Size (in)						
Aggregator SN		Post Run Pulse		Retrieval						
Depth Tracking SN		Post Run Flow		Internal Offset						
Transducer SN		Post Run Tap		External Offset						
Receiver SN		Dir Ver.		Orifice Size/Type						
MWD Kit SN		Pulser Ver.		Poppet Size						
Gamma Kit SN		Gamma Ver.		EM Power						
Surface System Ver.		Dir Type	EM	EM Freq						
Surface System Type	BTRC	Pulser Type		UBHO SN						
EDR		Gamma Type		UBHO Length (Ust)						
Hookload Sensor		MWD Type	EM	UBHO Connection						
Receiver Type		Helix Type		UBHO Pin->Setscrew						
BU Receiver SN										
BU Surf Sys Type										
Laptop 3 SN										
Laptop 4 SN										
DD Verification										
MWD Verification 1										
MWD Verification 2										
TF Sequence										
Survey Sequence										
X/O Angle										
Run OOS	No									
Magnetics										
Total Field	49366.35	Declination	8.46	North Ref	TRUE	Non Mag Above	49.58	Req NM Above		Azimuth Error
Dip Angle	63.29	Convergence	0.26	Applied Correction	8.46	Non Mag Below	22.37	Req NM Below		
MWD Comments										
Images										

BHA 3 (Intermediate 2) - Motor Performance Report

	Job #	18354	Operator	Logos Operating LLC	
	API#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC	
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H	
	Longitude	107° 23' 57.682" W	State	New Mexico	
	Rig	HP 530	County	Rio Arriba	
	Reason POOH	Section TD	BHA #	3	
	Lead DD	Chris Hiteartin Leafstead	Company Man	Andrew Baltas	
	DD Coordinator	Bill Herbers	District		
Motor Performance Report					
Run Data		Motor Data		Drilling Parameters	
Date In	5/12/2024 13:45	SN	TDI-962-01-004	WOB Rotate (klbs)	17/29/40
Date Out	5/14/2024 17:45	Description	9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve	WOB Slide (klbs)	28.89
Depth In(Usft)	3500.00	Make	Scout	RPM Max	45
Depth Out(Usft)	6385.00	Model	Turbo Scout	RPM Avg	20/35/40
Inc In	8.91	Re-run	NO	Flow Rate (gpm)	500/631/800
Inc Out	2.02	Direct Bill	NO	Off Btm Press (psi)	850/1360/1900
Azi In	10.82	Lobes	7/8	On Btm Press (psi)	1200/1843/2600
Azi Out	10.24	Stages	5.9	Avg Diff Press (psi)	483.00
Total Drilled (Usft)	2885.00	Bend Angle	2.12	Tq On Btm (Kftlb)	12400/17133/21700
%Slide (Rtg)	9.01	Bit to Bend (Usft)	7.49	Tq Off Btm (Kftlb)	0.00
%Slide (Hrs)	10.33	Sleeve Stab OD (in)		Temperature (degF)	0 / 126 / 129
Slide Drilled (Usft)	260.00	Bearing Gap (in)	2.640	PU WT (klbs)	170.00
Slide Hours	2.60	Stab to Bit (Usft)		ROT WT (klbs)	166.00
%Rotary (Rtg)	90.99	Kickpad OD (in)	10.280	SO WT (klbs)	152.00
%Rotary (Hrs)	89.67	Body OD (in)	9.620	Bit SN	5348343
Rotary Drilled (Usft)	2625.00	Fishneck OD (in)		Bit Type	PDC
Rotary Hours	22.57	Length (Usft)	41.04	Bit Make	Baker Hughes
Total Drig Hrs	25.17	Integral Float	YES	Bit Model	D506VTX
Total D&C Hrs	36.48	Rev per Gal:	0.155	Bit OD (in)	12.250
Off Btm Circ Hrs	11.32	#Stalls		Bit TFA	1.18 (6x16)
BRT Hrs	52.00	Stalls Pressure		Bit #	3
Slide ROP (Usft/hr)	100.00	Stator Vendor		Bit Grade In	New
Rot ROP (Usft/hr)	116.30	Stator Type		Bit Grade Out	1-1-WT-A-X-I-NO-TD
Avg ROP (Usft/hr)	114.62	Stator Fit	0.000	Drill Hrs	25.17
		Pre-Run Dyno HP%		Circ Hrs	11.32
		Max DiffP (psi)	1390.00		
		Max Torque (Kftlb)	21870.00		
		Flow Range (gpm)	400-900		
Mud Data					
600	300	200	100	6	3
PV / YP	Oil/Water		Wt (ppg)	Chlorides	Type
3	2	1	1	1	1
1 / 1			8.70	750.00	WBM
2.00					
0.25					
Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
67.00	63.48				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.41
BHA Details					
Description	SN	OD (in)	ID (in)	CNX TOP	CNX BTM
12 1/4" Hughes D506VTX6x16 1.18 (6x16)	5348343	12.250	3.000	6 5/8 REG	
9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve	TDI-962-01-004	9.620	3.000	6 5/8 REG	6 5/8 REG
8 Pony NMDC	SD55949	8.050	3.520	6 5/8 REG	6 5/8 REG
8 Spiral NMDC	SD43896	8.030	3.500	6 5/8 REG	6 5/8 REG
8 MWD GAP sub APS	TES8501140104	7.960	3.438	6 5/8 REG	6 5/8 REG
8 Spiral NMDC	SD51661	8.050	3.500	6 5/8 REG	6 5/8 REG
8 Steady Scout	800-SS04-004	7.950	3.000	6 5/8 REG	6 5/8 REG
BICO PBL Sub	825BP284	8.250	3.500	6 5/8 REG	6 5/8 REG
8 XO - 6 5/8 Reg Pin X4 1/2 XH	SD122660	6.800	2.750	4 1/2 XH	6 5/8 REG
6 1/2 DC (15 joints)	HP01	6.500	3.000	4 1/2 XH	4 1/2 XH
6 1/2" Cougar jars	DJ10-650-042	6.500	3.000	4 1/2 XH	4 1/2 XH
6 1/2" DC (6 jts)	HP02	6.500	3.000	4 1/2 XH	4 1/2 XH
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box	SD120967	6.720	2.875	4 1/2 IF	4 1/2 XH
5" HWDP (15 jts)	HP03	5.000	3.000	4 1/2 IF	
Additional Comments					
Reason to POOH: Section TD Surface findings: Motor drained good, no signs of any damage Run description: Drill 12 1/4 intermediate 2 section Type of Fluid: WBM Temp In: 87? F Temp Out: 129? F Ream In footage (ft): 0 Ream In total Time (Hrs): 0 Additional Comments: Played catch up on angle from 17 1/2 hole section. Building to 19? to build to get 45 above line. Build rates were fom 2 to 9?/100. Once in the no slide zone angle dropped from 17? to 2.2? leaving us 120 below line. On surface motor drained good with no signs of damage. Bite Grade 1-1-WT-AII					
Images					

BHA 3 (Intermediate 2) - MWD Post Run Report

	Job #	18354	Operator	Logos Operating LLC	
	API Job#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC	
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H	
	Longitude	107° 23' 57.682" W	State	New Mexico	
	Rig	HP 530	County	Rio Arriba	
	Reason POOH	Section TD	BHA/MWD #	3 / 2	
	MWD Engineers	JC Slaton / Marlon Martin	Company Man	Andrew Baltis	

MWD Post Run Report									
Run Data			MWD Data			Drilling Parameters			
Date In	5/12/2024 13:45		Pulser SN			WOB (klbs)	17/29/40		
Date Out	5/14/2024 17:45		Driver SN			RPM	20/35/40		
Depth In/Out(Usft)	3500.00 / 6385.00		Directional SN			Flow Rate (gpm)	500/631/800		
Inc In/Out	8.91 / 2.02		Battery 1 SN			Off Btm Press (psi)	850/1360/1900		
Azi In/Out	10.82 / 10.24		Battery 2 SN			On Btm Press (psi)	1200/1843/2600		
Total Drilled (Usft)	2885.00		Battery 3 SN			Tq On Btm (Kftlb)	12400/17133/21700		
%Slide	9.01		Gamma SN			Tq Off Btm (Kftlb)	0.00		
Slide Drilled (Usft)	260.00		EM SN			Avg Diff Press (psi)			
Slide Hours	2.60		Helix SN			Bit Make	Baker Hughes		
%Rotary	90.99		Plug In Date			Bit Model	D506VTX		
Rotary Drilled (Usft)	2625.00		Plug In Time			Bit OD (in)	12.250		
Rotary Hours	22.57		Plug Out Date			Bit TFA	1.18 (6x16)		
Drig/Circ/BRT Hrs	25.17 / 11.32 / 52.00		Plug Out Time			Bit #	3		
Slide ROP (Usft/hr)	100.00		Plug In Hours			Bit Grade In	New		
Rot ROP (Usft/hr)	116.30		Circ Hours	11.32		Bit Grade Out	1-1-WT-A-X-I-NO-TD		
Avg ROP (Usft/hr)	114.62					Drill / Circ Hrs	25.17 / 11.32		

Mud Data													
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)
3	2	1	1	1	1	1 / 1		8.70	750.00	WBM	2.00	0.25	0.00 / 129.00

Sensor Offsets / Directional Performance					
Svy (Usft)	Cam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
67.00	63.48				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.41

BHA Details								
Description	OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)	
12 1/4" Hughes D506VTX 6x16 1.18 (6x16)	12.250	3.000			200.00	1.45	1.45	
9 5/8 Scout Combo 7/8 5.9stg w/2.12 ABH slick sleeve	9.620	3.000			185.19	41.04	42.49	
8 Pony NMDC	8.050	3.520			124.72	13.63	56.12	
8 Spiral NMDC	8.030	3.500			142.70	27.68	83.80	
8 MWD GAP sub APS	7.960	3.438			102.25	4.89	88.69	
8 Spiral NMDC	8.050	3.500			141.71	29.99	118.68	
8 Steady Scout	7.950	3.000			154.80	32.30	150.98	
BICO PBL Sub	8.250	3.500			101.00	8.24	159.22	
8 XO - 6 5/8 Reg Pin X4 1/2 XH	6.800	2.750			72.82	4.12	163.34	
6 1/2 DC (15 joints)	6.500	3.000			92.00	448.68	612.02	
6 1/2" Cougar jars	6.500	3.000			89.00	32.15	644.17	
6 1/2" DC (6 jls)	6.500	3.000			92.00	176.29	820.46	
6 1/2 XO- 4 1/2 XH Pin x4 1/2 IF box	6.720	2.875			73.14	3.76	824.22	
5" HMWP (15 jls)	5.000	3.000		6.500	51.10	454.64	1278.86	
							1278.86	

MWD Data										
Rig Floor Disp. SN		Pre Run Comms		Pulse Amp Off Btm	0.00					
Barrier Box SN		Pre Run Pulse		Pulse Amp On Btm	0.00					
Logging HASP SN		Pre Run Flow		Good Detection						
Main Laptop SN		Pre Run Tap		Pulse Width / Data Rate	0.00 / 0.00					
BU Laptop SN		Post Run Comms		Fin Size (in)						
Aggregator SN		Post Run Pulse		Retrieval						
Depth Tracking SN		Post Run Flow		Internal Offset						
Transducer SN		Post Run Tap		External Offset						
Receiver SN		Dir Ver.		Orifice Size/Type						
MWD Kit SN		Pulser Ver.		Poppet Size						
Gamma Kit SN		Gamma Ver.		EM Power						
Surface System Ver.		Dir Type	EM	EM Freq						
Surface System Type	BTRC	Pulser Type		UBHO SN						
EDR		Gamma Type		UBHO Length (Ust)						
Hookload Sensor		MWD Type	EM	UBHO Connection						
Receiver Type		Helix Type		UBHO Pin->Setscrew						
BU Receiver SN										
BU Surf Sys Type										
Laptop 3 SN										
Laptop 4 SN										
DD Verification										
MWD Verification 1										
MWD Verification 2										
TF Sequence										
Survey Sequence										
X/O Angle										
Run OOS	No									
Magnetics										
Total Field	49366.35	Declination	8.46	North Ref	TRUE	Non Mag Above	51.68	Req NM Above		Azimuth Error
Dip Angle	63.29	Convergence	0.26	Applied Correction	8.46	Non Mag Below	24.51	Req NM Below		
MWD Comments										
Images										

BHA 5 (Curve-Lateral) - Motor Performance Report

	Job #	18354	Operator	Logos Operating LLC	
	API#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC	
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H	
	Longitude	107° 23' 57.682" W	State	New Mexico	
	Rig	HP 530	County	Rio Arriba	
	Reason POOH	Motor Failure	BHA #	5	
	Lead DD	Marc Keim	Company Man	Ryan Buford	
	DD Coordinator	Bill Herbers	District		

Motor Performance Report					
Run Data		Motor Data		Drilling Parameters	
Date In	6/21/2024 16:50	SN	TDI-712-MLA07-024	WOB Rotate (klbs)	25/34/52
Date Out	6/25/2024	Description	7 Scout Cam 5/6 9.6 1.75 SLK	WOB Slide (klbs)	36.26
Depth In(Usft)	6401.00	Make	Scout	RPM Max	60
Depth Out(Usft)	15536.00	Model	CAM	RPM Avg	25/49/60
Inc In	1.97	Re-run	NO	Flow Rate (gpm)	450/549/550
Inc Out	90.42	Direct Bill	NO	Off Btm Press (psi)	2100/3288/4100
Azi In	10.46	Lobes	5/6	On Btm Press (psi)	2650/4017/4900
Azi Out	270.34	Stages	9.6	Avg Diff Press (psi)	729.00
Total Drilled (Usft)	9154.00	Bend Angle	1.75	Tq On Btm (Kftlb)	10/6309/20000
%Slide (Rtg)	9.78	Bit to Bend (Usft)	5.46	Tq Off Btm (Kftlb)	0.00
%Slide (Hrs)	18.02	Sleeve Stab OD (in)		Temperature (degF)	130 / 195 / 237
Slide Drilled (Usft)	895.00	Bearing Gap (in)	1.800	PU WT (klbs)	175.00
Slide Hours	11.20	Stab to Bit (Usft)		ROT WT (klbs)	153.00
%Rotary (Rtg)	90.22	Kickpad OD (in)		SOWT (klbs)	50.00
%Rotary (Hrs)	81.98	Body OD (in)	7.120	Bit SN	5347417
Rotary Drilled (Usft)	8259.00	Fishneck OD (in)	5.750	Bit Type	PDC
Rotary Hours	50.95	Length (Usft)	37.39	Bit Make	Baker Hughes
Total Drig Hrs	62.15	Integral Float	YES	Bit Model	DD406TS
Total D&C Hrs	71.33	Rev per Gal:	0.380	Bit OD (in)	8.500
Off Btm Circ Hrs	9.18	#Stalls	15	Bit TFA	0.99 (9x12)
BRT Hrs	79.17	Stalls Pressure	1600.00	Bit #	4
Slide ROP (Usft/hr)	79.91	Stator Vendor		Bit Grade In	New
Rot ROP (Usft/hr)	162.10	Stator Type		Bit Grade Out	1-1-CT-S-X-I-PN-BHA
Avg ROP (Usft/hr)	147.29	Stator Fit	0.000	Drill Hrs	62.15
		Pre-Run Dyno HP%		Circ Hrs	9.18
		Max DiffP (psi)	2260.00		
		Max Torque (Kftlb)	15080.00		
		Flow Range (gpm)	350-750		

Mud Data													
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)
49	29	21	14	6	5	20 / 9	80.00	11.00	32000.00	OBM	23.00		

Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
70.00	66.56				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
				9.00	12.74 / 12.74

BHA Details										
Description	SN	OD (in)	ID (in)	CNX TOP	CNX BTM	TJ OD (in)	TJ ID (in)	Weight (lbft)	Length (Usft)	Total Length (Usft)
8 1/2" Baker DD406TS 9x12 TFA0.994 0.99 (9x12)	5347417	8.500	3.000	4 1/2 REG				100.00	0.80	0.80
7 Scout Cam 5/6 9.6 1.75 SLK	TDI-712-MLA07-024	7.120	2.000	4 1/2 IF	4 1/2 REG			98.96	37.39	38.19
6 3/4" Pony NMDC	SD54077	6.680	3.310	4 1/2 IF	4 1/2 IF			92.00	10.63	48.82
6 3/4" Pony NMDC	SD55003	6.730	3.310	4 1/2 IF	4 1/2 IF			92.09	13.90	62.72
6 1/2" NMDC	SD57131	6.560	3.300	4 1/2 IF	4 1/2 IF			86.99	29.43	92.15
6 1/2 Gap Sub(APS)	GAP 6501140324	6.450	3.125	4 1/2 IF	4 1/2 IF			90.82	5.12	97.27
6 1/2" NMDC	SD57653	6.480	3.300	4 1/2 IF	4 1/2 IF			87.02	30.28	127.55
6 1/2" Float sub	SD121330	6.500	2.850	4 1/2 IF	4 1/2 IF			92.51	2.27	129.82
5" HWD P (1 stand)	HP01	5.000	3.000	4 1/2 IF	4 1/2 IF	6.625	6.500	51.10	89.69	219.51
5" DP (32 stands)	HP02	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	3025.00	3244.51
6 1/2" XRV agitator (always on)	ZA0024	6.480	3.250	4 1/2 IF	4 1/2 IF			94.00	10.75	3255.26
5" DP (22 stands)	HP03	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	2077.26	5332.52
6 1/2" XRV agitator (ball drop)	Z0328	6.500	3.250	4 1/2 IF	4 1/2 IF			94.00	10.75	5343.27
5" DP (to surface)	HP04	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	1.00	5344.27
										5344.27

Incident Information													
Failed	YES	Hrs to Fail	Tripped For Failure	NO	BHA SN	MWD SN	EDR Review	NO	Closed	NO	Motor Cat		
LIH	NO	NPT	Catastrophic Failure	NO	MOTOR FAIL	YES	MWD FAIL	NO	Surface Fail	NO	MTBF Attrib.	NO	MWD Cat

Operations at Time of Incident													
While drilling ahead at 15300 Drilling got erratic, rotation kept stalling and drillstring would Pressure up. went to slide at 15370 and noticed we had about 300PSI extra off Bottom, Pressure came back to normal after 10 Min. and at Bottoms up Rubber foud over shakers. Drilled ahead to 15536 and stalling progressively got worse. Decided to trip for suspected Motor Failure.													

Troubleshooting Performed													
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Surface Findings
Additional Comments
Reason to POOF: Suspected Motor Failure Surface findings: Run description: Drill Curve, Drill Lateral Type of Fluid: OBM Temp In: 130? F Temp Out: 237? F Ream In footge (ft): NA Ream In total Time (Hrs): NA Additional Comments: While drilling ahead at 15300 Drilling got erratic, rotation kept stalling and drillstring would Pressure up. went to slide at 15370 and noticed we had about 300PSI extra off Bottom, Pressure came back to normal after 10 Min. and at Bottoms up Rubber foud over shakers. Drilled ahead to 15536 and stalling progressively got worse. Decided to trip for suspected Motor Failure. On surface the motor drained by itself and had some compression from the bit box that may have been out of spec. Bit was graded a 1-1 with chipped cutters and worn nubbs. Stator rubber was found in one of the jets.
Images

MWD Data													
Rig Floor Disp. SN			Pre Run Comms			Pulse Amp Off Btm		0.00					
Barrier Box SN			Pre Run Pulse			Pulse Amp On Btm		0.00					
Logging HASP SN			Pre Run Flow			Good Detection							
Main Laptop SN			Pre Run Tap			Pulse Width / Data Rate		0.00 / 0.00					
BU Laptop SN			Post Run Comms			Fin Size (in)							
Aggregator SN			Post Run Pulse			Retrievable							
Depth Tracking SN			Post Run Flow			Internal Offset							
Transducer SN			Post Run Tap			External Offset							
Receiver SN			Dir Ver.			Orifice Size/Type							
MWD Kit SN			Pulser Ver.			Poppet Size							
Gamma Kit SN			Gamma Ver.			EM Power							
Surface System Ver.			Dir Type			EM Freq							
Surface System Type		BTRC	Pulser Type			UBHO SN							
EDR			Gamma Type			UBHO Length (Usft)							
Hookload Sensor			MWD Type			UBHO Connection							
Receiver Type			Helix Type			UBHO Pin->Setscrew							
BU Receiver SN													
BU Surf Sys Type													
Laptop 3 SN													
Laptop 4 SN													
DD Verification													
MWD Verification 1													
MWD Verification 2													
TF Sequence													
Survey Sequence													
X/O Angle													
Run OOS		No											

Magnetics									
Total Field	49366.35	Declination	8.46	North Ref	TRUE	Non Mag Above	57.55	Req NM Above	Azimuth Error
Dip Angle	63.29	Convergence	0.26	Applied Correction	8.46	Non Mag Below	31.81	Req NM Below	

Aggitator Details				
Agitator SN	Make	Model	Description	Agitator->Bit (Usft)
Z0328	TTS	XRv	6 1/2" XRv agitator (ball drop)	5332.52

Incident Information													
Failed	YES	Hrs to Fail	Tripped For Failure	NO	BHASN	MWD SN	EDR Review	NO	Closed	NO	Motor Cat		
LJH	NO	NPT	Catastrophic Failure	NO	MOTOR FAIL	YES	MWD FAIL	NO	Surface Fail	NO	MTBF Attrib.	NO	MWD Cat

Operations at Time of Incident

While drilling ahead at 15300 Drilling got irratic, rotation kept stalling and drillstring would Pressure up. went to slide at 15370 and noticed we had about 300PSI extra off Bottom, Pressure came back to normal after 10 Min. and at Bottoms up Rubber foud over shakers. Drilled ahead to 15536 and stalling progressively got worse. Decided to trip for suspected Motor Failure.

Troubleshooting Performed

Surface Findings

Shop Findings

MWD Comments

Images

BHA 6 (Lateral) - Motor Performance Report

	Job #	18354	Operator	Logos Operating LLC	
	API#	30-039-31441	Field	Rio Arriba, NM(NAD83) - Logos Operating LLC	
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H	
	Longitude	107° 23' 57.682" W	State	New Mexico	
	Rig	HP 530	County	Rio Arriba	
	Reason POOH	Well TD	BHA #	6	
	Lead DD	Marc Keim	Company Man	Ryan Buford	
	DD Coordinator	Bill Herbers	District		

Motor Performance Report					
Run Data		Motor Data		Drilling Parameters	
Date In	6/25/2024 17:00	SN	TDI-712-MLA07-033	WOB Rotate (klbs)	25/38/47
Date Out	6/28/2024 01:00	Description	7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab	WOB Slide (klbs)	43.90
Depth In(Usft)	15536.00	Make	Scout	RPM Max	80
Depth Out(Usft)	18177.00	Model	Cam	RPM Avg	50/64/65
Inc In	90.42	Re-run	NO	Flow Rate (gpm)	550/550/550
Inc Out	90.50	Direct Bill	NO	Off Btm Press (psi)	3950/4174/4500
Azi In	270.34	Lobes	5/6	On Btm Press (psi)	4300/4744/5250
Azi Out	269.06	Stages	9.4	Avg Diff Press (psi)	570.00
Total Drilled (Usft)	2641.00	Bend Angle	1.25	Tq On Btm (Kftlb)	13/18/18
%Slide (Ftg)	4.28	Bit to Bend (Usft)	5.47	Tq Off Btm (Kftlb)	0.00
%Slide (Hrs)	23.28	Sleeve Stab OD (in)		Temperature (degF)	215 / 222 / 237
Slide Drilled (Usft)	113.00	Bearing Gap (in)		PU WT (klbs)	235.00
Slide Hours	4.40	Stab to Bit (Usft)		ROT WT (klbs)	151.00
%Rotary (Ftg)	95.72	Kickpad OD (in)		SO WT (klbs)	50.00
%Rotary (Hrs)	76.72	Body OD (in)	7.120	Bit SN	5346521
Rotary Drilled (Usft)	2528.00	Fishneck OD (in)	6.990	Bit Type	PDC
Rotary Hours	14.50	Length (Usft)	37.01	Bit Make	Baker Hughes
Total Drig Hrs	18.90	Integral Float	YES	Bit Model	DD406TS
Total D&C Hrs	33.43	Rev per Gal:	0.400	Bit OD (in)	8.500
Off Btm Circ Hrs	14.53	#Stalls		Bit TFA	0.99 (9x12)
BRT Hrs	56.00	Stalls Pressure		Bit #	5
Slide ROP (Usft/hr)	25.68	Stator Vendor		Bit Grade In	New
Rot ROP (Usft/hr)	174.34	Stator Type		Bit Grade Out	1-1-WT-A-X-I-NO-TD
Avg ROP (Usft/hr)	139.74	Stator Fit	0.000	Drill Hrs	18.90
		Pre-Run Dyno HP%		Circ Hrs	14.53
		Max DiffP (psi)	1880.00		
		Max Torque (Kftlb)	11214.00		
		Flow Range (gpm)	350-700		

Mud Data													
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)
54	32	23	15	6	5	22 / 10	77.00	11.10	29000.00	OBM	23.00		

Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
69.00	66.20				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.67

BHA Details										
Description	SN	OD (in)	ID (in)	CNX TOP	CNX BTM	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)
8 1/2" Baker DD406TS 9x12 TFA0.994 0.99 (9x12)	5346521	8.500	3.000	4 1/2 REG				100.00	0.80	0.80
7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab	TDI-712-MLA07-033	7.120	2.000	4 1/2 IF	4 1/2 REG			99.97	37.01	37.81
6 3/4" Pony NMDC	SD54077	6.680	3.310	4 1/2 IF	4 1/2 IF			92.00	10.63	48.44
6 3/4" Pony NMDC	SD55003	6.730	3.310	4 1/2 IF	4 1/2 IF			92.09	13.90	62.34
6 1/2" NMDC	SD57131	6.560	3.300	4 1/2 IF	4 1/2 IF			86.99	29.43	91.77
6 1/2 Gap Sub(APS)	GAP 6501140324	6.450	3.125	4 1/2 IF	4 1/2 IF			90.82	5.12	96.89
6 1/2" NMDC	SD57653	6.480	3.300	4 1/2 IF	4 1/2 IF			87.02	30.28	127.17
6 1/2" Float sub	SD121330	6.500	2.850	4 1/2 IF	4 1/2 IF			92.51	2.27	129.44
5" HWDP (1 stand)	HP01	5.000	3.000	4 1/2 IF	4 1/2 IF	6.625	6.500	51.10	89.69	219.13
5" DP (32 stands)	HP02	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	3025.00	3244.13
6 1/2" XRV agitator (always on)	ZA0024	6.480	3.250	4 1/2 IF	4 1/2 IF			94.00	10.75	3254.88
5" DP (22 stands)	HP03	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	2077.26	5332.14
6 1/2" XRV agitator (ball drop)	Z0328	6.500	3.250	4 1/2 IF	4 1/2 IF			94.00	10.75	5342.89
5" DP (to surface)	HP04	5.000	4.276	4 1/2 IF	4 1/2 IF	6.625	2.750	23.89	1.00	5343.89
										5343.89

Additional Comments	
Reason to POOH: TD Lateral Surface findings: Motor Drained well. No visible Bearing Squat. Bit Looked good Run description: Drill remaining 2650 of lateral Type of Fluid: OEM Temp In: 215? FTemp Out: 237? FReam In footage (ft): 2736? Ream In total Time (Hrs): 5.5 hrs Additional Comments: Motor Yielded 10-15?/100, Sliding got really stick at 16800 and 2nd agitator was engaged. when sliding got difficult we were out of the top of the target formation and got substantially better when back in targeted formation. 16.1 Bit Hours 30.2 Circ Hrs	

	Job #	18354	Operator	Logos Operating LLC
	API Job#	30-039-31441	Field	Rio Arriba, NM (NAD83) - Logos Operating LLC
	Latitude	36° 54' 50.663" N	Well	Rosa Unit 700H
	Longitude	107° 23' 57.682" W	State	New Mexico
	Rig	HP 530	County	Rio Arriba
	Reason POOH	Well TD	BHA/MWD #	6 / 5
	MWD Engineers	JC Slaton / Marion Martin	Company Man	Ryan Buford

MWD Post Run Report					
Run Data		MWD Data		Drilling Parameters	
Date In	6/25/2024 17:00	Pulser SN		WOB (klbs)	25/38/47
Date Out	6/28/2024 01:00	Driver SN		RPM	50/64/65
Depth In/Out(Usft)	15536.00 / 18177.00	Directional SN		Flow Rate (gpm)	550/550/550
Inc In/Out	90.42 / 90.50	Battery 1 SN		Off Btm Press (psi)	3950/4174/4500
Azi In/Out	270.34 / 269.06	Battery 2 SN		On Btm Press (psi)	4300/4744/5250
Total Drilled (Usft)	2641.00	Battery 3 SN		Tq On Btm (Kftlb)	13/18/18
%Slide	4.28	Gamma SN		Tq Off Btm (Kftlb)	
Slide Drilled (Usft)	113.00	EM SN		Avg Diff Press (psi)	
Slide Hours	4.40	Helix SN		Bit Make	Baker Hughes
%Rotary	95.72	Plug In Date		Bit Model	DD406TS
Rotary Drilled (Usft)	2528.00	Plug In Time		Bit OD (in)	8.500
Rotary Hours	14.50	Plug Out Date		Bit TFA	0.99 (9x12)
Drig/Circ/BRT Hrs	18.90 / 14.53 / 56.00	Plug Out Time		Bit #	5
Slide ROP (Usft/hr)	25.68	Plug In Hours		Bit Grade In	New
Rot ROP (Usft/hr)	174.34	Circ Hours	14.53	Bit Grade Out	1-1-WT-A-X-I-NO-TD
Avg ROP (Usft/hr)	139.74			Drill / Circ Hrs	18.90 / 14.53

Mud Data													
600	300	200	100	6	3	PV / YP	Oil/Water	Wt (ppg)	Chlorides	Type	%Solids	%Sand	Temp (degF)
54	32	23	15	6	5	22 / 10	77.00	11.10	29000.00	OBM	23.00		215.00 / 237.00

Sensor Offsets / Directional Performance					
Svy (Usft)	Gam (Usft)	Res (Usft)	PWD (Usft)	Dens (Usft)	Neu (Usft)
69.00	66.20				
Sonic (Usft)	NB Inc (Usft)	NB Azi (Usft)	Gyro (Usft)	Plan DLS (deg/100Usft)	Act/Max DLS (deg/100Usft)
					0.00 / 2.67

BHA Details							
Description	OD (in)	ID (in)	TJ OD (in)	TJ ID (in)	Weight (lb/ft)	Length (Usft)	Total Length (Usft)
8 1/2" Baker DD406TS 9x12 TFA 0.994 0.99 (9x12)	8.500	3.000			100.00	0.80	0.80
7 Scout Cam 5/6 9.4 1.25 8 3/8 & 8 1/8 Stab	7.120	2.000			99.97	37.01	37.81
6 3/4" Pony NMDC	6.680	3.310			92.00	10.63	48.44
6 3/4" Pony NMDC	6.730	3.310			92.09	13.90	62.34
6 1/2" NMDC	6.560	3.300			86.99	29.43	91.77
6 1/2 Gap Sub(APS)	6.450	3.125			90.82	5.12	96.89
6 1/2" NMDC	6.480	3.300			87.02	30.28	127.17
6 1/2" Float sub	6.500	2.850			92.51	2.27	129.44
5" HMDP (1 stand)	5.000	3.000	6.625	6.500	51.10	89.69	219.13
5" DP (32 stands)	5.000	4.276	6.625	2.750	23.89	3025.00	3244.13
6 1/2" XRV agitator (always on)	6.480	3.250			94.00	10.75	3254.88
5" DP (22 stands)	5.000	4.276	6.625	2.750	23.89	2077.26	5332.14
6 1/2" XRV agitator (ball drop)	6.500	3.250			94.00	10.75	5342.89
5" DP (to surface)	5.000	4.276	6.625	2.750	23.89	1.00	5343.89
							5343.89

MWD Data										
Rig Floor Disp. SN				Pre Run Comms			Pulse Amp Off Btm		0.00	
Barrier Box SN				Pre Run Pulse			Pulse Amp On Btm		0.00	
Logging HASP SN				Pre Run Flow			Good Detection			
Main Laptop SN				Pre Run Tap			Pulse Width / Data Rate		0.00 / 0.00	
BU Laptop SN				Post Run Comms			Fin Size (in)			
Aggregator SN				Post Run Pulse			Retrievable			
Depth Tracking SN				Post Run Flow			Internal Offset			
Transducer SN				Post Run Tap			External Offset			
Receiver SN				Dir Ver.			Orifice Size/Type			
MWD Kit SN				Pulser Ver.			Poppet Size			
Gamma Kit SN				Gamma Ver.			EM Power			
Surface System Ver.				Dir Type			EM Freq			
Surface System Type		BTRC		Pulser Type			UBHO SN			
EDR				Gamma Type			UBHO Length (Usft)			
Hookload Sensor				MWD Type			UBHO Connection			
Receiver Type				Helix Type			UBHO Pin->Setscrew			
BU Receiver SN										
BU Surf Sys Type										
Laptop 3 SN										
Laptop 4 SN										
DD Verification										
MWD Verification 1										
MWD Verification 2										
TF Sequence										
Survey Sequence										
X/O Angle										
Run OOS		No								
Magnetics										
Total Field	49366.35	Declination	8.46	North Ref	TRUE	Non Mag Above	58.17	Req NM Above		Azimuth Error
Dip Angle	63.29	Convergence	0.26	Applied Correction	8.46	Non Mag Below	31.19	Req NM Below		
Aggitator Details										
Agitator SN		Make	Model	Description				Agitator->Bit (Usft)		
Z0328		TTS	XRv	6 1/2" XRv agitator (ball drop)				5332.14		
MWD Comments										

**Innovative Drilling Solutions
Data-Driven Decision**



SLIDE SHEETS

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

BHA #1 (Surface) - Slide Sheet

										BHA #1 (Surface) - Slide Sheet																							
Operator		Logos Operating LLC				BHA		BHA #1 (Surface)				BHA #:		1		RKB:		6325.00		North Reference:		TRUE		Total Drilled:		338.00							
Site		Rosa Unit 24				Survey Offset		0.00				BHA Type:		Motor		Units:		Us Feet		Declination:		8.46		Rotate :		338.00 (100.00%)							
Well Name		Rosa Unit 700H - OH				Gamma Offset		0.00				Bit Type:		PDC		Grid Conv :		0.26		VS Azimuth:		270.62		Slide:		0.00 (0.00%)							
Drilling Data										Survey Data										Parameters										Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments
04/13/2024	08:24	09:37	1.22	36.00	86.00	50.00	Rotate				66.66	0.29	79.39	66.66	0.03	0.17	-0.17	0.44	0.00	-0.00	10.00	20.00	910.00	7400.00	41.10	800.00	625.00	175.00		64000.00	64000.00	64000.00	
04/13/2024	10:30	11:32	1.03	86.00	131.00	45.00	Rotate				130.42	0.30	89.22	130.42	0.06	0.49	-0.49	0.08	-0.00	0.00	12.00	40.00	1100.00	9800.00	43.55	1200.00	900.00	300.00		64000.00	64000.00	64000.00	
04/13/2024	11:53	13:47	1.90	131.00	206.00	75.00	Rotate														13.00	45.00	1200.00	8700.00	39.47	1330.00	1000.00	330.00		69000.00	69000.00	69000.00	
04/13/2024	14:31	17:15	2.73	206.00	284.00	78.00	Rotate				219.67	0.34	103.32	219.67	0.01	0.98	-0.98	0.10	0.00	-0.00	12.00	45.00	1050.00	9400.00	28.54	1100.00	800.00	300.00		74000.00	74000.00	74000.00	
04/13/2024	17:22	18:49	1.45	284.00	374.00	90.00	Rotate				299.93	0.47	119.60	299.93	-0.21	1.50	-1.50	0.21	-0.00	-0.00	12.00	45.00	1050.00	9400.00	62.07	1100.00	800.00	300.00		74000.00	74000.00	74000.00	

BHA 2 Intermediate 1 - Slide Sheet



BHA 2 Intermediate 1 - Slide Sheet



Operator	Logos Operating LLC	BHA	BHA 2 Intermediate 1	BHA #:	2	RKB:	6325.00	North Reference:	TRUE	Total Drilled:	3126.00
Site	Rosa Unit 24	Survey Offset	64.00	BHA Type:	Motor	Units:	Us Feet	Declination:	8.46	Rotate :	2492.00 (79.72%)
Well Name	Rosa Unit 700H - OH	Gamma Offset	60.57	Bit Type:	PDC	Grid Conv:	0.26	VS Azimuth:	270.62	Slide:	634.00 (20.28%)

Drilling Data												Survey Data										Parameters								Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments
04/27/2024	16:30	16:50	0.33	374.00	418.00	44.00	Rotate														20.00	40.00	1000.00	10800.00		1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	16:56	18:00	1.07	418.00	507.00	89.00	Rotate				443.00	0.80	142.47	442.99	-1.29	2.62	-2.63	0.29	0.33	0.39	20.00	40.00	1000.00	10800.00	83.44	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	18:10	19:05	0.92	507.00	567.00	60.00	Slide	10.00	10.00		533.00	2.19	73.31	532.96	-1.30	4.65	-4.66	2.27	0.61	1.37	20.00	40.00	1000.00	10800.00	65.45	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	19:05	19:21	0.27	567.00	597.00	30.00	Rotate														20.00	40.00	1000.00	10800.00	112.50	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	19:32	20:04	0.53	597.00	642.00	45.00	Slide	355.00	355.00		621.00	3.83	55.27	620.84	0.86	8.68	-8.67	2.13	0.94	4.32	20.00	40.00	1000.00	10800.00	84.38	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	20:04	20:24	0.33	642.00	685.00	43.00	Rotate														20.00	40.00	1000.00	10800.00	129.00	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	20:35	20:48	0.22	685.00	700.00	15.00	Rotate														20.00	40.00	1000.00	10800.00	69.23	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	20:48	21:42	0.90	700.00	778.00	78.00	Slide	325.00	325.00		744.00	6.30	29.19	743.36	9.09	15.35	-15.25	2.70	2.27	8.50	20.00	40.00	1000.00	10800.00	86.67	1200.00	1000.00	200.00		85.00	85.00	85.00	
04/27/2024	22:02	22:23	0.35	778.00	808.00	30.00	Rotate														30.00	40.00	1000.00	12000.00	85.71	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/27/2024	22:35	23:05	0.50	808.00	868.00	60.00	Slide	315.00	315.00		838.00	8.50	16.25	836.58	20.27	19.81	-19.58	2.92	4.35	10.21	30.00	40.00	1000.00	12000.00	120.00	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/27/2024	23:05	23:20	0.25	868.00	902.00	34.00	Rotate														30.00	40.00	1000.00	12000.00	136.00	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/27/2024	23:30	24:00	0.50	902.00	952.00	50.00	Slide	350.00	350.00		930.00	10.87	11.44	927.26	35.30	23.43	-23.05	2.72	7.33	10.46	30.00	40.00	1000.00	12000.00	100.00	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/28/2024	00:00	00:28	0.47	952.00	994.00	42.00	Rotate														30.00	40.00	1000.00	12000.00	90.00	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/28/2024	00:40	01:26	0.77	994.00	1085.00	91.00	Rotate				1021.00	10.75	10.55	1016.65	52.05	26.68	-26.12	0.23	9.21	10.15	30.00	40.00	1000.00	12000.00	118.70	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/28/2024	01:37	02:10	0.55	1085.00	1135.00	50.00	Slide	0.00	0.00		1110.00	12.45	12.00	1103.83	69.60	30.20	-29.44	1.94	9.55	10.03	30.00	40.00	1000.00	12000.00	90.91	1900.00	1400.00	500.00		110.00	105.00	100.00	
04/28/2024	02:10	02:31	0.35	1135.00	1174.00	39.00	Rotate														32.00	45.00	1000.00	16000.00	111.43	2250.00	1700.00	550.00		125.00	120.00	115.00	
04/28/2024	02:42	03:32	0.83	1174.00	1266.00	92.00	Rotate				1202.00	12.04	13.24	1193.73	88.64	34.46	-33.50	0.53	9.94	10.33	32.00	45.00	1000.00	16000.00	110.40	2250.00	1700.00	550.00		125.00	120.00	115.00	
04/28/2024	03:39	04:22	0.72	1266.00	1360.00	94.00	Rotate				1296.00	12.52	11.66	1285.58	108.16	38.76	-37.59	0.62	10.41	10.57	32.00	45.00	1000.00	16000.00	131.16	2250.00	1700.00	550.00		125.00	120.00	115.00	
04/28/2024	04:32	05:21	0.82	1360.00	1455.00	95.00	Rotate				1391.00	13.05	8.70	1378.23	128.85	42.47	-41.07	0.89	11.70	9.99	35.00	45.00	1000.00	18000.00	116.33	2350.00	1700.00	650.00		132.00	128.00	120.00	
04/28/2024	05:30	06:12	0.70	1455.00	1549.00	94.00	Rotate				1485.00	12.98	6.30	1469.82	149.83	45.23	-43.61	0.58	13.31	8.43	35.00	45.00	1000.00	18000.00	134.29	2350.00	1700.00	650.00		132.00	128.00	120.00	
04/28/2024	06:19	06:58	0.65	1549.00	1644.00	95.00	Rotate				1580.00	13.42	3.46	1562.31	171.44	47.07	-45.21	0.82	15.14	5.83	35.00	45.00	1000.00	23000.00	146.15	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	07:06	07:10	0.07	1644.00	1648.00	4.00	Rotate														35.00	45.00	1000.00	23000.00	60.00	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	07:10	07:49	0.65	1648.00	1700.00	52.00	Slide	100.00	100.00		1674.00	13.41	9.03	1653.75	193.10	49.44	-47.34	1.37	17.35	3.75	35.00	45.00	1000.00	23000.00	80.00	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	07:49	08:12	0.38	1700.00	1738.00	38.00	Rotate														35.00	45.00	1000.00	23000.00	99.13	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	08:54	09:56	1.03	1738.00	1833.00	95.00	Rotate				1769.00	12.75	13.02	1746.28	214.19	53.53	-51.21	1.18	19.13	3.46	35.00	45.00	1000.00	23000.00	91.94	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	10:04	11:08	1.07	1833.00	1927.00	94.00	Rotate				1863.00	12.46	12.39	1838.02	234.20	58.04	-55.50	0.34	20.12	3.81	35.00	45.00	1000.00	23000.00	88.13	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	11:16	12:56	1.67	1927.00	2022.00	95.00	Rotate				1958.00	12.55	10.86	1930.76	254.35	62.18	-59.43	0.36	20.96	3.77	35.00	45.00	1000.00	23000.00	57.00	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	13:03	14:34	1.52	2022.00	2116.00	94.00	Rotate				2052.00	12.18	8.27	2022.58	274.19	65.53	-62.56	0.71	21.55	3.01	35.00	45.00	1000.00	23000.00	61.98	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	14:43	16:25	1.70	2116.00	2211.00	95.00	Rotate				2147.00	12.85	6.68	2115.33	294.60	68.20	-65.01	0.79	22.35	1.47	35.00	45.00	1000.00	23000.00	55.88	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	16:37	16:40	0.05	2211.00	2215.00	4.00	Rotate														35.00	45.00	1000.00	23000.00	80.00	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	16:40	17:25	0.75	2215.00	2228.00	13.00	Slide	120.00	120.00												35.00	45.00	1000.00	23000.00	17.33	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	17:25	19:11	1.77	2228.00	2305.00	77.00	Rotate				2241.00	12.33	7.07	2207.06	314.94	70.66	-67.24	0.56	23.25	-0.26	35.00	45.00	1000.00	23000.00	43.58	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	19:25	21:00	1.58	2305.00	2358.00	53.00	Slide	120.00	120.00		2336.00	11.02	11.34	2300.10	333.91	73.69	-70.07	1.65	22.68	-1.15	35.00	45.00	1000.00	23000.00	33.47	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	21:00	21:35	0.58	2358.00	2400.00	42.00	Rotate														35.00	45.00	1000.00	23000.00	72.00	2500.00	1700.00	800.00		132.00	128.00	120.00	

04/28/2024	21:47	23:02	1.25	2400.00	2494.00	94.00	Rotate				2430.00	9.94	7.68	2392.53	350.76	76.54	-72.74	1.35	20.17	-1.79	35.00	45.00	1000.00	23000.00	75.20	2500.00	1700.00	800.00		132.00	128.00	120.00	
04/28/2024	23:11	24:00	0.82	2494.00	2557.00	63.00	Rotate				2525.00	9.49	7.99	2486.17	366.64	78.72	-74.75	0.48	16.36	-2.88	43.00	45.00	1000.00	18000.00	73.47	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	00:00	00:25	0.42	2557.00	2589.00	32.00	Rotate														43.00	45.00	1000.00	18000.00	76.80	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	00:35	02:25	1.83	2589.00	2639.00	50.00	Slide	50.00	50.00		2620.00	10.31	12.36	2579.75	382.70	81.63	-77.49	1.17	12.86	-3.30	43.00	45.00	1000.00	18000.00	27.27	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	02:25	03:06	0.68	2639.00	2684.00	45.00	Rotate														43.00	45.00	1000.00	18000.00	65.85	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	03:16	04:43	1.45	2684.00	2778.00	94.00	Rotate				2714.00	10.04	15.12	2672.28	398.83	85.57	-81.25	0.59	9.86	-2.72	43.00	45.00	1000.00	18000.00	64.83	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	07:45	11:15	3.50	2778.00	2873.00	95.00	Rotate				2809.00	10.04	13.83	2765.82	414.86	89.71	-85.22	0.24	6.60	-1.93	43.00	45.00	1000.00	18000.00	27.14	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	11:21	14:57	3.60	2873.00	2967.00	94.00	Rotate				2903.00	9.91	16.20	2858.40	430.59	93.93	-89.26	0.46	3.25	-1.00	43.00	45.00	1000.00	18000.00	26.11	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	15:01	17:11	2.17	2967.00	3062.00	95.00	Rotate				2998.00	9.19	14.23	2952.08	445.79	98.07	-93.24	0.83	-0.84	-0.04	43.00	45.00	1000.00	18000.00	43.85	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	17:16	18:30	1.23	3062.00	3157.00	95.00	Rotate				3093.00	8.11	13.31	3046.00	459.67	101.48	-96.50	1.15	-6.39	0.48	43.00	45.00	1000.00	18000.00	77.03	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	18:42	21:13	2.52	3157.00	3220.00	63.00	Slide	0.00	0.00		3187.00	8.19	9.60	3139.05	472.72	104.12	-99.00	0.57	-12.71	0.41	43.00	45.00	1000.00	18000.00	25.03	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	21:13	21:42	0.48	3220.00	3251.00	31.00	Rotate														43.00	45.00	1000.00	18000.00	64.14	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	21:53	23:38	1.75	3251.00	3311.00	60.00	Slide	10.00	10.00		3282.00	8.88	15.45	3233.00	486.46	107.20	-101.93	1.17	-18.46	0.63	43.00	45.00	1000.00	18000.00	34.29	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/29/2024	23:38	24:00	0.37	3311.00	3338.00	27.00	Rotate														43.00	45.00	1000.00	18000.00	73.64	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/30/2024	00:00	00:06	0.10	3338.00	3346.00	8.00	Rotate														43.00	45.00	1000.00	18000.00	80.00	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/30/2024	00:16	01:18	1.03	3346.00	3440.00	94.00	Rotate				3376.00	8.16	16.37	3325.96	499.85	111.02	-105.60	0.78	-24.20	1.64	43.00	45.00	1000.00	18000.00	90.97	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/30/2024	01:26	01:36	0.17	3440.00	3452.00	12.00	Rotate														43.00	45.00	1000.00	18000.00	72.00	2500.00	2000.00	500.00		160.00	150.00	140.00	
04/30/2024	02:53	03:50	0.95	3452.00	3500.00	48.00	Rotate														43.00	45.00	1000.00	18000.00	50.53	2500.00	2000.00	500.00		160.00	150.00	140.00	

BHA 3 (Intermediate 2) - Slide Sheet



BHA 3 (Intermediate 2) - Slide Sheet



Operator	Logos Operating LLC	BHA	BHA 3 (Intermediate 2)	BHA #	3	RKB:	6325.00	North Reference:	TRUE	Total Drilled:	2885.00
Site	Rosa Unit 24	Survey Offset	67.00	BHA Type:	Mtor	Units:	Us Feet	Declination:	8.46	Rotate :	2625.00 (90.99%)
Well Name	Rosa Unit 700H - OH	Gamma Offset	63.48	Bit Type:	PDC	Grid Conv:	0.26	VS Azimuth:	270.62	Slide:	260.00 (9.01%)

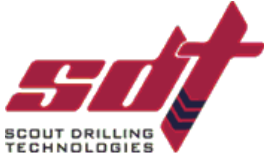
Drilling Data												Survey Data										Parameters								Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments
05/12/2024	16:50	17:27	0.62	3500.00	3547.00	47.00	Rotate														20.00	20.00	500.00	12400.00	76.22	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	17:31	17:48	0.28	3547.00	3565.00	18.00	Rotate														20.00	20.00	500.00	12400.00	63.53	1200.00	850.00	350.00	78.00	170.00	166.00	160.00	
05/12/2024	17:48	18:10	0.37	3565.00	3590.00	25.00	Slide	0.00	0.00		3575.00	9.44	9.08	3522.64	529.51	117.18	-111.44	0.79	-35.45	1.64	20.00	20.00	500.00	12400.00	68.18	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	18:10	18:33	0.38	3590.00	3642.00	52.00	Rotate														20.00	20.00	500.00	12400.00	135.65	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	18:38	18:47	0.15	3642.00	3660.00	18.00	Rotate														20.00	20.00	500.00	12400.00	120.00	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	18:47	19:00	0.22	3660.00	3685.00	25.00	Slide	0.00	0.00		3670.00	11.20	11.14	3616.10	546.25	120.19	-114.28	1.89	-38.24	1.18	20.00	20.00	500.00	12400.00	115.38	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	19:00	19:15	0.25	3685.00	3737.00	52.00	Rotate														20.00	20.00	500.00	12400.00	208.00	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	19:20	19:27	0.12	3737.00	3755.00	18.00	Rotate														20.00	20.00	500.00	12400.00	154.29	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	19:27	19:40	0.22	3755.00	3780.00	25.00	Slide	0.00	0.00		3764.00	13.39	12.26	3707.94	565.85	124.27	-118.14	2.34	-37.75	1.19	20.00	20.00	500.00	12400.00	115.38	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	19:40	19:53	0.22	3780.00	3831.00	51.00	Rotate														20.00	20.00	500.00	12400.00	235.38	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	19:58	20:03	0.08	3831.00	3849.00	18.00	Rotate														20.00	20.00	500.00	12400.00	216.00	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	20:03	20:15	0.20	3849.00	3869.00	20.00	Slide	0.00	0.00		3859.00	14.11	12.07	3800.21	587.92	129.03	-122.66	0.76	-34.85	1.36	20.00	20.00	500.00	12400.00	100.00	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	20:15	20:28	0.22	3869.00	3926.00	57.00	Rotate														20.00	20.00	500.00	12400.00	263.08	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	21:03	21:10	0.12	3926.00	3944.00	18.00	Rotate														20.00	20.00	500.00	12400.00	154.29	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	21:10	21:28	0.30	3944.00	3979.00	35.00	Slide	0.00	0.00		3954.00	14.71	11.90	3892.23	611.05	133.93	-127.31	0.63	-30.85	1.46	20.00	20.00	500.00	12400.00	116.67	1200.00	850.00	350.00		170.00	166.00	160.00	
05/12/2024	21:28	21:39	0.18	3979.00	4021.00	42.00	Rotate														40.00	40.00	800.00	12400.00	229.09	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	21:44	21:50	0.10	4021.00	4040.00	19.00	Rotate														40.00	40.00	800.00	12400.00	190.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	21:50	22:08	0.30	4040.00	4075.00	35.00	Slide	0.00	0.00		4049.00	16.07	12.83	3983.82	635.67	139.34	-132.45	1.45	-25.23	1.74	40.00	40.00	800.00	12400.00	116.67	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	22:08	22:18	0.17	4075.00	4116.00	41.00	Rotate														40.00	40.00	800.00	19500.00	246.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	22:22	22:28	0.10	4116.00	4135.00	19.00	Rotate														40.00	40.00	800.00	19500.00	190.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	22:28	22:48	0.33	4135.00	4170.00	35.00	Slide	-10.00	0.00		4143.00	17.62	11.55	4073.78	662.30	145.08	-137.90	1.70	-17.29	1.94	40.00	40.00	800.00	19500.00	105.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	22:48	22:58	0.17	4170.00	4210.00	40.00	Rotate														40.00	40.00	800.00	19500.00	240.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	23:03	23:25	0.37	4210.00	4305.00	95.00	Rotate				4238.00	17.74	9.96	4164.29	690.64	150.46	-142.98	0.52	-7.89	1.45	40.00	40.00	800.00	19500.00	259.09	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	23:30	23:36	0.10	4305.00	4320.00	15.00	Rotate														40.00	40.00	800.00	19500.00	150.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/12/2024	23:36	24:00	0.40	4320.00	4360.00	40.00	Slide	20.00	0.00		4333.00	18.49	9.74	4254.59	719.74	155.51	-147.72	0.79	2.22	0.48	40.00	40.00	800.00	19500.00	100.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	00:00	00:07	0.12	4360.00	4400.00	40.00	Rotate														40.00	40.00	800.00	19500.00	342.86	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	00:11	00:16	0.08	4400.00	4415.00	15.00	Rotate														40.00	40.00	800.00	19500.00	180.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	00:16	00:32	0.27	4415.00	4435.00	20.00	Slide	30.00	0.00		4427.00	19.33	13.08	4343.51	749.59	161.56	-153.44	1.46	13.53	0.32	40.00	40.00	800.00	19500.00	75.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	00:32	00:47	0.25	4435.00	4494.00	59.00	Rotate														40.00	40.00	800.00	19500.00	236.00	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	00:51	01:33	0.70	4494.00	4589.00	95.00	Rotate				4522.00	17.44	13.09	4433.66	778.77	168.34	-159.90	1.99	24.09	1.03	40.00	40.00	800.00	19500.00	135.71	2450.00	1850.00	600.00		207.00	178.00	152.00	Control Drill Start @4555
05/13/2024	01:38	02:56	1.30	4589.00	4683.00	94.00	Rotate				4616.00	16.29	11.82	4523.62	805.40	174.23	-165.51	1.28	32.06	1.38	40.00	40.00	800.00	19500.00	72.31	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	03:18	04:20	1.03	4683.00	4777.00	94.00	Rotate				4710.00	15.85	11.54	4613.94	830.88	179.50	-170.50	0.48	38.74	1.35	40.00	40.00	800.00	19500.00	90.97	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	04:25	04:58	0.55	4777.00	4871.00	94.00	Rotate				4836.00	13.10	9.27	4735.91	861.92	185.35	-176.01	2.41	44.28	0.77	40.00	40.00	800.00	19500.00	170.91	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	05:06	05:30	0.40	4871.00	4934.00	63.00	Rotate				4899.00	12.02	8.86	4797.40	875.45	187.51	-178.03	1.72	44.89	0.13	40.00	40.00	800.00	19500.00	157.50	2450.00	1850.00	600.00		207.00	178.00	152.00	

05/13/2024	05:40	06:03	0.38	4934.00	4997.00	63.00	Rotate				4962.00	11.06	9.01	4859.12	887.90	189.47	-179.85	1.52	44.37	-0.49	40.00	40.00	800.00	19500.00	164.35	2450.00	1850.00	600.00		207.00	178.00	152.00	
05/13/2024	06:16	06:36	0.33	4997.00	5060.00	63.00	Rotate				5025.00	10.06	7.68	4921.06	899.32	191.15	-181.41	1.63	42.77	-1.16	40.00	40.00	700.00	20200.00	189.00	2350.00	1650.00	700.00		207.00	178.00	152.00	
05/13/2024	06:44	07:02	0.30	5060.00	5123.00	63.00	Rotate				5087.00	8.89	7.30	4982.21	909.44	192.48	-182.63	1.89	40.01	-1.92	40.00	40.00	700.00	20200.00	210.00	2350.00	1650.00	700.00		207.00	178.00	152.00	
05/13/2024	07:10	07:25	0.25	5123.00	5186.00	63.00	Rotate				5150.00	7.71	7.23	5044.55	918.46	193.63	-183.68	1.87	35.92	-2.63	40.00	40.00	750.00	20900.00	252.00	2600.00	1900.00	700.00		225.00	193.00	163.00	
05/13/2024	07:36	07:53	0.28	5186.00	5249.00	63.00	Rotate				5213.00	6.88	8.77	5107.04	926.38	194.74	-184.70	1.35	30.74	-3.15	40.00	40.00	750.00	20900.00	222.35	2600.00	1900.00	700.00		225.00	193.00	163.00	
05/13/2024	08:02	08:19	0.28	5249.00	5311.00	62.00	Rotate				5276.00	6.51	7.88	5169.61	933.65	195.81	-185.69	0.61	24.91	-3.59	40.00	40.00	750.00	20900.00	218.82	2600.00	1900.00	700.00		225.00	193.00	163.00	
05/13/2024	08:27	08:46	0.32	5311.00	5374.00	63.00	Rotate				5339.00	5.84	8.51	5232.24	940.36	196.77	-186.58	1.07	18.50	-4.01	40.00	40.00	750.00	20900.00	198.95	2600.00	1900.00	700.00		225.00	193.00	163.00	
05/13/2024	08:57	09:34	0.62	5374.00	5437.00	63.00	Rotate				5402.00	5.68	9.35	5294.92	946.60	197.75	-187.50	0.29	11.65	-4.32	20.00	40.00	750.00	17500.00	102.16	2600.00	1900.00	700.00	129.00	225.00	193.00	163.00	Control drill at 5400 (75 fph)
05/13/2024	09:44	10:35	0.85	5437.00	5500.00	63.00	Rotate				5464.00	5.52	7.25	5356.63	952.59	198.62	-188.31	0.42	4.73	-4.68	22.00	40.00	700.00	17500.00	74.12	1950.00	1775.00	175.00	129.00	225.00	193.00	163.00	
05/13/2024	10:45	11:43	0.97	5500.00	5563.00	63.00	Rotate														17.00	40.00	500.00	17500.00	65.17	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	Losses start at 5538 ft
05/13/2024	12:15	12:58	0.72	5563.00	5626.00	63.00	Rotate				5590.00	5.49	9.12	5482.05	964.55	200.34	-189.90	0.14	-9.54	-5.43	17.00	40.00	500.00	17500.00	87.91	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	Control drill at 100 fph
05/13/2024	13:11	13:49	0.63	5626.00	5689.00	63.00	Rotate				5653.00	5.07	10.05	5544.78	970.27	201.31	-190.80	0.68	-16.91	-5.65	17.00	40.00	500.00	17500.00	99.47	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	13:58	14:37	0.65	5689.00	5751.00	62.00	Rotate				5716.00	4.88	11.00	5607.54	975.64	202.31	-191.74	0.33	-24.61	-5.77	17.00	40.00	500.00	17500.00	95.38	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	14:49	15:28	0.65	5751.00	5814.00	63.00	Rotate				5779.00	4.86	10.52	5670.31	980.90	203.30	-192.68	0.07	-32.43	-5.86	17.00	40.00	500.00	17500.00	96.92	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	15:37	16:16	0.65	5814.00	5877.00	63.00	Rotate				5841.00	4.88	10.97	5732.09	986.07	204.29	-193.60	0.07	-40.12	-5.95	17.00	40.00	500.00	17500.00	96.92	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	16:24	17:03	0.65	5877.00	5940.00	63.00	Rotate														17.00	40.00	500.00	17500.00	96.92	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	17:34	17:45	0.18	5940.00	5955.00	15.00	Rotate														17.00	40.00	500.00	17500.00	81.82	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/13/2024	18:35	18:53	0.30	5955.00	5978.00	23.00	Rotate				5967.00	4.32	12.56	5857.68	995.96	206.34	-195.55	0.46	-56.34	-5.95	17.00	40.00	500.00	17500.00	76.67	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/14/2024	03:32	03:47	0.25	5978.00	6003.00	25.00	Rotate														17.00	40.00	500.00	17500.00	100.00	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/14/2024	03:56	04:38	0.70	6003.00	6066.00	63.00	Rotate														17.00	40.00	500.00	17500.00	90.00	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/14/2024	04:46	05:35	0.82	6066.00	6129.00	63.00	Rotate				6093.00	3.33	8.68	5983.40	1004.21	207.92	-197.04	0.81	-74.26	-6.08	17.00	40.00	500.00	17500.00	77.14	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/14/2024	05:46	06:34	0.80	6129.00	6192.00	63.00	Rotate				6156.00	3.02	9.10	6046.31	1007.66	208.46	-197.54	0.49	-83.93	-6.25	17.00	40.00	500.00	17500.00	78.75	1350.00	1000.00	350.00	129.00	225.00	193.00	163.00	
05/14/2024	06:45	07:23	0.63	6192.00	6255.00	63.00	Rotate				6220.00	2.81	9.47	6110.22	1010.87	208.98	-198.03	0.33	-94.03	-6.39	28.00	40.00	500.00	21700.00	99.47	1600.00	1075.00	525.00	125.00	225.00	193.00	163.00	
05/14/2024	07:33	08:11	0.63	6255.00	6318.00	63.00	Rotate				6282.00	2.29	7.88	6172.16	1013.60	209.40	-198.42	0.85	-104.21	-6.54	28.00	40.00	500.00	21700.00	99.47	1600.00	1075.00	525.00	125.00	225.00	193.00	163.00	
05/14/2024	08:25	09:05	0.67	6318.00	6381.00	63.00	Rotate				6318.00	2.23	9.43	6208.13	1015.00	209.62	-198.62	0.24	-110.30	-6.61	28.00	40.00	500.00	21700.00	94.50	1600.00	1075.00	525.00	125.00	225.00	193.00	163.00	
05/14/2024	09:16	09:26	0.17	6381.00	6385.00	4.00	Rotate														28.00	40.00	500.00	21700.00	24.00	1600.00	1075.00	525.00	125.00	225.00	193.00	163.00	

BHA 4(DV drill out) - Slide Sheet

												BHA 4(DV drill out) - Slide Sheet																									
Operator			Logos Operating LLC				BHA		BHA 4(DV drill out)				BHA #:		4		RKB:		6325.00		North Reference:			TRUE		Total Drilled:		16.00									
Site			Rosa Unit 24				Survey Offset		0.00				BHA Type:				Units:		Us Feet		Declination:			8.46		Rotate :		16.00 (100.00%)									
Well Name			Rosa Unit 700H - OH				Gamma Offset		0.00				Bit Type:		Rock Bit		Grid Conv:		0.26		VS Azimuth:			270.62		Slide:		0.00 (0.00%)									
Drilling Data												Survey Data												Parameters										Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments				
06/21/2024	10:58	11:28	0.50	6385.00	6401.00	16.00	Rotate														27.00	65.00	365.00	8000.00	32.00	830.00	800.00	30.00					Drilling 10 new hole wdumb iron				

BHA 5 (Curve-Lateral) - Slide Sheet



BHA 5 (Curve-Lateral) - Slide Sheet



Operator	Logos Operating LLC	BHA	BHA 5 (Curve-Lateral)	BHA #:	5	RKB:	6325.00	North Reference:	TRUE	Total Drilled:	9135.00
Site	Rosa Unit 24	Survey Offset	70.00	BHA Type:	Mtor	Units:	Us Feet	Declination:	8.46	Rotate :	8334.00 (91.23%)
Well Name	Rosa Unit 700H - OH	Gamma Offset	66.56	Bit Type:	PDC	Grid Conv:	0.26	VS Azimuth:	270.62	Slide:	801.00 (8.77%)

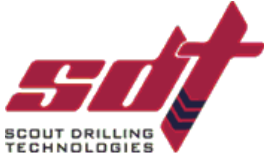
Drilling Data											Survey Data											Parameters								Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments
06/21/2024	21:50	22:57	1.12	6401.00	6477.00	76.00	Rotate				6407.00	1.95	10.54	6297.07	1018.20	210.18	-199.15	0.32	-125.61	-6.71	25.00	45.00	450.00	10.00	68.06	2650.00	2100.00	550.00	130.00	175.00	165.00	155.00	
06/21/2024	23:05	23:49	0.73	6477.00	6542.00	65.00	Slide	310.00	310.00		6502.00	6.45	326.56	6391.81	1024.24	207.53	-196.44	5.50	-108.08	-87.07	40.00		550.00		88.64	3350.00	3030.00	320.00	130.00	175.00	165.00	155.00	
06/21/2024	23:49	24:00	0.18	6542.00	6552.00	10.00	Rotate														32.00	25.00	550.00	10.00	54.55	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	00:00	00:10	0.17	6552.00	6572.00	20.00	Rotate														32.00	25.00	550.00	10.00	120.00	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	00:21	00:30	0.15	6572.00	6582.00	10.00	Rotate														32.00	25.00	550.00	10.00	66.67	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	00:30	01:01	0.52	6582.00	6632.00	50.00	Slide	-20.00	-20.00		6596.00	15.59	321.27	6483.98	1038.53	196.70	-185.45	9.77	-65.33	-125.66	32.00		550.00		96.77	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	01:01	01:23	0.37	6632.00	6666.00	34.00	Rotate														32.00	25.00	550.00	10.00	92.73	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	01:33	02:11	0.63	6666.00	6729.00	63.00	Slide	-30.00	-30.00		6691.00	22.91	310.99	6573.63	1060.66	174.72	-163.23	8.46	-42.80	-128.71	32.00		550.00		99.47	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	02:11	02:33	0.37	6729.00	6761.00	32.00	Rotate														32.00	25.00	550.00	10.00	87.27	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	02:43	03:21	0.63	6761.00	6841.00	80.00	Slide	-15.00	-15.00		6785.00	32.23	302.64	6656.90	1086.24	139.71	-127.95	10.71	-33.59	-120.45	45.00		550.00		126.32	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	03:21	03:32	0.18	6841.00	6855.00	14.00	Rotate														32.00	25.00	550.00	10.00	76.36	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	03:37	03:50	0.22	6855.00	6873.00	18.00	Rotate														32.00	25.00	550.00	10.00	83.08	3450.00	3030.00	420.00	130.00	175.00	165.00	155.00	
06/22/2024	03:50	04:21	0.52	6873.00	6933.00	60.00	Slide	-10.00	-10.00		6880.00	42.44	297.10	6732.36	1114.59	89.69	-77.63	11.31	-28.01	-106.72	48.00		550.00		116.13	3550.00	3030.00	520.00	130.00	210.00	165.00	140.00	
06/22/2024	04:21	04:28	0.12	6933.00	6950.00	17.00	Rotate														32.00	25.00	550.00	10.00	145.71	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	04:34	04:54	0.33	6950.00	6994.00	44.00	Rotate				6974.00	50.55	294.87	6797.02	1144.35	28.43	-16.04	8.80	-24.16	-88.81	32.00	25.00	550.00	10.00	132.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	04:54	05:16	0.37	6994.00	7044.00	50.00	Slide	-30.00	-30.00												52.00		550.00	10.00	136.36	3550.00	3030.00	520.00	130.00	175.00	165.00	155.00	
06/22/2024	05:25	05:30	0.08	7044.00	7054.00	10.00	Rotate														32.00	25.00	550.00	10.00	120.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	05:30	05:59	0.48	7054.00	7122.00	68.00	Slide	-15.00	-15.00		7069.00	62.54	292.91	6849.30	1176.31	-43.94	56.67	12.74	-18.97	-66.26	52.00		550.00	10.00	140.69	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	05:59	06:08	0.15	7122.00	7139.00	17.00	Rotate														32.00	25.00	550.00	10.00	113.33	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	06:13	06:28	0.25	7139.00	7177.00	38.00	Rotate				7163.00	71.54	292.14	6885.93	1209.41	-123.82	136.90	9.60	-10.75	-39.77	32.00	25.00	550.00	10.00	152.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	06:28	06:59	0.52	7177.00	7233.00	56.00	Slide	-70.00	-70.00												52.00		550.00	10.00	108.39	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	07:06	07:27	0.35	7233.00	7278.00	45.00	Rotate				7258.00	75.28	283.09	6913.10	1236.86	-210.49	223.87	9.94	-4.80	-16.20	32.00	25.00	550.00	10.00	128.57	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	07:27	07:54	0.45	7278.00	7328.00	50.00	Slide	-55.00	-55.00												52.00		550.00	10.00	111.11	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	08:21	08:40	0.32	7328.00	7348.00	20.00	Rotate														32.00	25.00	550.00	10.00	63.16	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	08:40	09:10	0.50	7348.00	7406.00	58.00	Slide	-35.00	-35.00		7352.00	82.28	274.61	6931.41	1250.94	-301.47	314.99	11.56	-2.75	-3.19	52.00		550.00	10.00	116.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	09:10	09:18	0.13	7406.00	7422.00	16.00	Rotate														32.00	25.00	550.00	10.00	120.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	09:18	09:55	0.62	7422.00	7517.00	95.00	Rotate				7447.00	90.10	270.26	6937.72	1254.95	-396.08	409.63	9.41	-1.89	2.62	32.00	40.00	550.00	10.00	154.05	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	09:59	10:03	0.07	7517.00	7527.00	10.00	Rotate														32.00	25.00	550.00	10.00	150.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	target change 88.5
06/22/2024	10:03	10:12	0.15	7527.00	7533.00	6.00	Slide	0.00	-150.00												32.00		550.00	10.00	40.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	10:12	10:42	0.50	7533.00	7611.00	78.00	Rotate				7541.00	88.92	269.70	6938.53	1254.91	-490.07	503.62	1.39	-2.79	5.86	32.00	55.00	550.00	10.00	156.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	10:46	11:15	0.48	7611.00	7706.00	95.00	Rotate				7636.00	88.89	269.84	6940.34	1254.53	-585.05	598.59	0.15	-4.71	8.80	32.00	55.00	550.00	10.00	196.55	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	11:19	11:25	0.10	7706.00	7724.00	18.00	Rotate														32.00	55.00	550.00	10.00	180.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	11:25	11:32	0.12	7724.00	7730.00	6.00	Slide	0.00	-100.00		7730.00	87.38	268.54	6943.40	1253.20	-678.99	692.51	2.12	-7.86	10.75	32.00		550.00	10.00	51.43	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	
06/22/2024	11:32	11:55	0.38	7730.00	7800.00	70.00	Rotate														32.00	55.00	550.00	10.00	182.61	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00	

06/22/2024	11:59	12:01	0.03	7800.00	7806.00	6.00	Rotate													32.00	55.00	550.00	10.00	180.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00			
06/22/2024	12:01	12:09	0.13	7806.00	7812.00	6.00	Slide	0.00	-20.00											32.00		550.00	10.00	45.00	3600.00	3030.00	570.00	130.00	175.00	165.00	155.00			
06/22/2024	12:09	12:35	0.43	7812.00	7895.00	83.00	Rotate					7825.00	87.88	268.16	6947.33	1250.47	-773.87	787.35	0.66	-11.89	11.33	32.00	55.00	550.00	10.00	191.54	3700.00	3100.00	600.00	176.00	175.00	165.00	155.00	
06/22/2024	12:39	13:10	0.52	7895.00	7989.00	94.00	Rotate					7919.00	88.15	268.06	6950.58	1247.37	-867.76	881.21	0.31	-15.25	11.51	32.00	55.00	550.00	10.00	181.94	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	target change 87.00
06/22/2024	13:38	13:43	0.08	7989.00	7995.00	6.00	Slide	0.00	-140.00												32.00		550.00	10.00	72.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	13:43	14:11	0.47	7995.00	8083.00	88.00	Rotate					8013.00	87.98	267.44	6953.76	1243.68	-961.63	975.03	0.68	-18.52	11.10	32.00	55.00	550.00	10.00	188.57	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	14:15	14:18	0.05	8083.00	8088.00	5.00	Rotate														32.00	55.00	550.00	10.00	100.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	14:18	14:25	0.12	8088.00	8094.00	6.00	Slide	0.00	-170.00												32.00		550.00	10.00	51.43	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	14:25	14:58	0.55	8094.00	8178.00	84.00	Rotate					8108.00	86.91	267.09	6957.99	1239.16	-1056.43	1069.78	1.18	-22.85	9.88	32.00	55.00	550.00	10.00	152.73	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	15:02	15:29	0.45	8178.00	8272.00	94.00	Rotate					8202.00	86.80	267.43	6963.15	1234.67	-1150.18	1163.47	0.38	-28.11	8.67	32.00	55.00	550.00	10.00	208.89	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	15:34	16:01	0.45	8272.00	8367.00	95.00	Rotate					8297.00	87.24	267.50	6968.09	1230.47	-1244.96	1258.20	0.47	-33.15	7.78	32.00	55.00	550.00	10.00	211.11	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	target change 88.50
06/22/2024	16:05	16:34	0.48	8367.00	8462.00	95.00	Rotate					8392.00	87.51	267.42	6972.44	1226.27	-1339.77	1352.96	0.30	-37.60	6.89	32.00	55.00	550.00	10.00	196.55	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	16:38	16:42	0.07	8462.00	8466.00	4.00	Rotate														32.00	55.00	550.00	10.00	60.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	16:42	16:50	0.13	8466.00	8472.00	6.00	Slide	0.00	0.00												32.00		550.00	10.00	45.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	16:50	17:18	0.47	8472.00	8556.00	84.00	Rotate					8486.00	88.29	267.91	6975.88	1222.44	-1433.62	1446.77	0.98	-41.14	6.34	32.00	55.00	550.00	10.00	180.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	Target change 90.00
06/22/2024	17:22	17:25	0.05	8556.00	8560.00	4.00	Rotate														32.00	55.00	550.00	10.00	80.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	17:25	17:33	0.13	8560.00	8567.00	7.00	Slide	0.00	0.00												32.00		550.00	10.00	52.50	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	17:33	18:00	0.45	8567.00	8651.00	84.00	Rotate					8581.00	88.59	267.04	6978.47	1218.26	-1528.49	1541.59	0.97	-43.82	5.47	32.00	55.00	550.00	10.00	186.67	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	18:05	18:10	0.08	8651.00	8666.00	15.00	Rotate														32.00	55.00	550.00	10.00	180.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	18:10	18:23	0.22	8666.00	8674.00	8.00	Slide	45.00	45.00												32.00	55.00	550.00	10.00	36.92	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	18:23	18:45	0.37	8674.00	8746.00	72.00	Rotate					8676.00	88.86	267.43	6980.59	1213.67	-1623.36	1636.40	0.50	-46.04	4.20	32.00	55.00	550.00	10.00	196.36	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	18:51	18:56	0.08	8746.00	8756.00	10.00	Rotate														32.00	55.00	550.00	10.00	120.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	18:56	19:35	0.65	8756.00	8764.00	8.00	Slide	45.00	-45.00												32.00	55.00	550.00	10.00	12.31	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	Bad Slide Hang Up Issues	
06/22/2024	19:35	19:55	0.33	8764.00	8840.00	76.00	Rotate					8770.00	89.63	266.38	6981.82	1208.60	-1717.21	1730.19	1.39	-47.38	2.40	32.00	55.00	550.00	10.00	228.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	20:01	20:06	0.08	8840.00	8852.00	12.00	Rotate														32.00	55.00	550.00	10.00	144.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	20:06	20:15	0.15	8852.00	8860.00	8.00	Slide	65.00	90.00												32.00	55.00	550.00	10.00	53.33	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	20:15	20:38	0.38	8860.00	8934.00	74.00	Rotate					8864.00	89.19	267.90	6982.79	1203.91	-1811.09	1824.01	1.68	-48.44	0.99	32.00	55.00	550.00	10.00	193.04	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00	
06/22/2024	20:43	20:48	0.08	8934.00	8946.00	12.00	Rotate														32.00	55.00	550.00	10.00	144.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	20:48	20:58	0.17	8946.00	8954.00	8.00	Slide	0.00	0.00												32.00	55.00	550.00	10.00	48.00	3700.00	3100.00	600.00	176.00	205.00	160.00	130.00		
06/22/2024	20:58	21:22	0.40	8954.00	9029.00	75.00	Rotate					8959.00	90.61	268.48	6982.96	1200.91	-1906.04	1918.92	1.61	-48.71	1.31	32.00	55.00	550.00	14.00	187.50	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/22/2024	21:29	21:57	0.47	9029.00	9123.00	94.00	Rotate					9053.00	90.50	268.95	6982.05	1198.80	-2000.01	2012.86	0.51	-47.89	2.48	32.00	50.00	550.00	14.00	201.43	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/22/2024	22:03	22:07	0.07	9123.00	9133.00	10.00	Rotate														32.00	50.00	550.00	14.00	150.00	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00		
06/22/2024	22:07	22:18	0.18	9133.00	9141.00	8.00	Slide	-45.00	-45.00												32.00	50.00	550.00	14.00	43.84	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00		
06/22/2024	22:18	22:43	0.42	9141.00	9218.00	77.00	Rotate					9148.00	91.28	267.67	6980.57	1196.00	-2094.95	2107.77	1.58	-46.52	3.00	32.00	50.00	550.00	14.00	184.80	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/22/2024	22:49	23:18	0.48	9218.00	9312.00	94.00	Rotate					9242.00	91.31	267.79	6978.45	1192.28	-2188.86	2201.63	0.13	-44.49	2.55	32.00	50.00	550.00	14.00	194.48	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/22/2024	23:25	24:00	0.58	9312.00	9407.00	95.00	Rotate					9337.00	91.21	267.94	6976.36	1188.74	-2283.77	2296.50	0.19	-42.50	2.33	32.00	50.00	550.00	14.00	162.86	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/23/2024	00:05	00:29	0.40	9407.00	9501.00	94.00	Rotate					9431.00	90.84	267.78	6974.68	1185.23	-2377.69	2390.37	0.43	-40.92	2.10	32.00	50.00	550.00	14.00	235.00	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/23/2024	00:35	01:03	0.47	9501.00	9596.00	95.00	Rotate					9526.00	90.54	267.69	6973.53	1181.48	-2472.61	2485.25	0.33	-39.88	1.66	32.00	50.00	550.00	14.00	203.57	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	
06/23/2024	01:11	01:38	0.45	9596.00	9691.00	95.00	Rotate					9621.00	90.24	267.63	6972.89	1177.60	-2567.52	2580.12	0.32	-39.33	1.10	32.00	50.00	550.00	14.00	211.11	3800.00	3100.00	700.00	197.00	217.00	163.00	134.00	</

06/23/2024	08:17	08:43	0.43	10730.00	10825.00	95.00	Rotate					10755.00	89.80	268.31	6979.89	1146.90	-3701.04	3713.23	0.51	-47.52	9.98	36.00	55.00	550.00	15.00	219.23	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	08:48	09:14	0.43	10825.00	10919.00	94.00	Rotate					10849.00	89.56	268.27	6980.41	1144.10	-3794.99	3807.15	0.26	-48.14	10.46	36.00	55.00	550.00	15.00	216.92	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	09:19	09:23	0.07	10919.00	10929.00	10.00	Rotate															36.00	55.00	550.00	15.00	150.00	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	09:23	09:31	0.13	10929.00	10936.00	7.00	Slide	0.00	-60.00													36.00	55.00	550.00	15.00	52.50	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	09:31	09:54	0.38	10936.00	11014.00	78.00	Rotate					10944.00	90.13	267.89	6980.67	1140.92	-3889.94	3902.06	0.72	-48.50	10.59	36.00	55.00	550.00	15.00	203.48	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	09:59	10:07	0.13	11014.00	11024.00	10.00	Rotate															36.00	55.00	550.00	15.00	75.00	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	10:07	10:19	0.20	11024.00	11032.00	8.00	Slide	0.00	-60.00													36.00	55.00	550.00	17.00	40.00	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	Stalled motor
06/23/2024	10:19	10:51	0.53	11032.00	11108.00	76.00	Rotate					11038.00	90.03	267.02	6980.54	1136.74	-3983.85	3995.91	0.93	-48.46	9.70	36.00	55.00	550.00	17.00	142.50	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	10:56	10:59	0.05	11108.00	11118.00	10.00	Rotate															36.00	55.00	550.00	17.00	200.00	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	10:59	11:12	0.22	11118.00	11124.00	6.00	Slide	0.00	-30.00													36.00	55.00	550.00	17.00	27.69	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	11:12	11:44	0.53	11124.00	11203.00	79.00	Rotate					11133.00	90.20	266.85	6980.35	1131.66	-4078.71	4090.72	0.25	-48.37	7.93	36.00	55.00	550.00	17.00	148.13	4000.00	3200.00	800.00	208.00	230.00	162.00	107.00	
06/23/2024	11:49	12:13	0.40	11203.00	11297.00	94.00	Rotate					11227.00	90.34	266.68	6979.90	1126.36	-4172.56	4184.50	0.23	-48.03	5.90	36.00	50.00	550.00	18.00	235.00	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	12:13	12:44	0.52	11297.00	11391.00	94.00	Rotate					11321.00	90.17	267.32	6979.49	1121.44	-4266.43	4278.31	0.70	-47.71	4.26	36.00	50.00	550.00	18.00	181.94	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	12:49	12:58	0.15	11391.00	11408.00	17.00	Rotate															36.00	50.00	550.00	18.00	113.33	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	12:58	13:09	0.18	11408.00	11414.00	6.00	Slide	0.00	-40.00													36.00	50.00	550.00	18.00	32.73	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	13:09	13:32	0.38	11414.00	11486.00	72.00	Rotate					11416.00	91.01	266.55	6978.51	1118.36	-4361.29	4373.11	1.20	-46.83	2.50	36.00	50.00	550.00	18.00	187.83	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	13:37	14:05	0.47	11486.00	11580.00	94.00	Rotate					11510.00	90.64	266.43	6977.15	1110.61	-4455.10	4466.86	0.41	-45.57	0.02	36.00	50.00	550.00	18.00	201.43	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	14:10	14:37	0.45	11580.00	11674.00	94.00	Rotate					11604.00	90.61	266.58	6976.13	1104.88	-4548.92	4560.61	0.16	-44.65	-2.43	36.00	50.00	550.00	18.00	208.89	4150.00	3300.00	850.00	208.00	230.00	153.00	108.00	
06/23/2024	14:42	15:08	0.43	11674.00	11769.00	95.00	Rotate					11699.00	90.60	267.27	6975.13	1099.78	-4643.78	4655.41	0.73	-43.74	-4.21	36.00	50.00	550.00	18.00	219.23	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	15:12	15:40	0.47	11769.00	11863.00	94.00	Rotate					11793.00	90.70	267.37	6974.06	1095.38	-4737.67	4749.24	0.15	-42.78	-5.33	36.00	50.00	550.00	18.00	201.43	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	15:45	16:11	0.43	11863.00	11958.00	95.00	Rotate					11888.00	90.50	267.03	6973.06	1090.74	-4832.55	4844.07	0.42	-41.88	-6.66	36.00	50.00	550.00	18.00	219.23	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	16:25	16:50	0.42	11958.00	12052.00	94.00	Rotate					11982.00	90.71	267.16	6972.07	1085.98	-4926.42	4937.89	0.26	-40.99	-8.14	36.00	50.00	550.00	18.00	225.60	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	SPRS
06/23/2024	16:55	17:23	0.47	12052.00	12147.00	95.00	Rotate					12077.00	90.64	266.94	6970.95	1081.09	-5021.29	5032.70	0.24	-39.97	-9.71	36.00	50.00	550.00	18.00	203.57	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	17:28	18:08	0.67	12147.00	12241.00	94.00	Rotate					12171.00	90.30	267.20	6970.18	1076.29	-5115.17	5126.51	0.46	-39.29	-11.24	36.00	50.00	550.00	18.00	141.00	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	3 stalls
06/23/2024	18:51	19:26	0.58	12241.00	12335.00	94.00	Rotate					12265.00	90.03	267.82	6969.91	1072.20	-5209.08	5220.37	0.72	-39.12	-12.04	36.00	50.00	550.00	18.00	161.14	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	19:31	19:34	0.05	12335.00	12345.00	10.00	Rotate															36.00	50.00	550.00	18.00	200.00	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	19:34	19:49	0.25	12345.00	12353.00	8.00	Slide	0.00	0.00													36.00	50.00	550.00	18.00	32.00	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	19:49	20:17	0.47	12353.00	12430.00	77.00	Rotate					12360.00	91.48	267.66	6968.66	1068.46	-5303.99	5315.24	1.54	-37.97	-12.48	36.00	50.00	550.00	18.00	165.00	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	20:21	20:53	0.53	12430.00	12524.00	94.00	Rotate					12454.00	91.55	268.14	6966.17	1065.01	-5397.89	5409.10	0.52	-35.58	-12.64	36.00	50.00	550.00	18.00	176.25	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	21:00	21:34	0.57	12524.00	12619.00	95.00	Rotate					12549.00	91.62	268.14	6963.55	1061.93	-5492.81	5503.98	0.07	-33.05	-12.41	36.00	50.00	550.00	18.00	167.65	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	21:40	22:14	0.57	12619.00	12714.00	95.00	Rotate					12644.00	91.48	268.92	6960.98	1059.50	-5587.74	5598.88	0.83	-30.58	-11.53	36.00	50.00	550.00	18.00	167.65	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	22:20	22:52	0.53	12714.00	12808.00	94.00	Rotate					12738.00	91.14	268.77	6958.83	1057.60	-5681.70	5692.81	0.40	-28.53	-10.14	36.00	50.00	550.00	18.00	176.25	4150.00	3300.00	850.00	226.00	230.00	153.00	108.00	
06/23/2024	22:57	23:28	0.52	12808.00	12903.00	95.00	Rotate					12833.00	91.58	266.63	6956.57	1053.79	-5776.59	5787.65	2.30	-26.38	-10.64	35.00	53.00	550.00	18500.00	183.87	4300.00	3400.00	900.00	230.00	230.00	158.00	100.00	
06/23/2024	23:33	23:36	0.05	12903.00	12913.00	10.00	Rotate															35.00	53.00	550.00	18500.00	200.00	4300.00	3400.00	900.00	230.00	230.00	158.00	100.00	
06/23/2024	23:36	23:51	0.25	12913.00	12919.00	6.00	Slide	130.00	130.00													35.00	53.00	550.00	18500.00	24.00	4300.00	3400.00	900.00	230.00	230.00	158.00	100.00	
06/23/2024	23:51	24:00	0.15	12919.00	12938.00	19.00	Rotate					12927.00	89.50	269.84	6955.69	1050.90	-5870.52	5881.55	4.07	-25.59	-10.25	35.00	53.00	550.00	18500.00	126.67	4300.00	3400.00	900.00	230.00	230.00	158.00	100.00	
06/24/2024	00:00	00:20	0.33	12938.00	12997.00	59.00	Rotate															35.00	53.00	550.00	18500.00	177.00	4300.00	3400.00	900.00	230.00	230.00	158.00	100.00	
06/24/2024	00:27	01:03	0.60	12997.00	13092.00	95.00	Rotate																											

06/24/2024	07:34	07:42	0.13	13754.00	13764.00	10.00	Rotate														32.00	50.00	550.00	19000.00	75.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	07:42	07:53	0.18	13764.00	13771.00	7.00	Slide	70.00	0.00												32.00	50.00	550.00	19000.00	38.18	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	07:53	08:26	0.55	13771.00	13848.00	77.00	Rotate				13778.00	90.57	270.62	6961.70	1046.71	-6721.42	6732.36	0.83	-32.44	-16.08	32.00	50.00	550.00	19000.00	140.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	08:32	08:38	0.10	13848.00	13858.00	10.00	Rotate														32.00	50.00	550.00	19000.00	100.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	08:38	08:52	0.23	13858.00	13866.00	8.00	Slide	90.00	0.00												32.00	50.00	550.00	19000.00	34.29	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	08:52	09:23	0.52	13866.00	13943.00	77.00	Rotate				13873.00	90.61	272.91	6960.72	1049.64	-6816.37	6827.33	2.41	-31.55	-14.18	32.00	50.00	550.00	19000.00	149.03	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	09:28	10:05	0.62	13943.00	14037.00	94.00	Rotate				13967.00	90.40	273.34	6959.89	1054.76	-6910.22	6921.23	0.51	-30.81	-10.06	32.00	50.00	550.00	19000.00	152.43	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	10:10	10:48	0.63	14037.00	14132.00	95.00	Rotate				14062.00	90.24	272.98	6959.36	1060.00	-7005.08	7016.14	0.41	-30.37	-5.85	32.00	50.00	550.00	19000.00	150.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	10:53	11:30	0.62	14132.00	14227.00	95.00	Rotate				14157.00	90.17	273.35	6959.02	1065.24	-7099.93	7111.04	0.40	-30.13	-1.63	32.00	50.00	550.00	19000.00	154.05	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	11:37	11:43	0.10	14227.00	14237.00	10.00	Rotate														32.00	50.00	550.00	19000.00	100.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	11:43	11:57	0.23	14237.00	14243.00	6.00	Slide	-70.00	0.00												32.00	50.00	550.00	19000.00	25.71	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	11:57	12:30	0.55	14243.00	14321.00	78.00	Rotate				14251.00	91.38	272.45	6957.75	1070.00	-7193.80	7204.96	1.60	-28.95	2.11	32.00	50.00	550.00	19000.00	141.82	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	12:38	12:40	0.03	14321.00	14331.00	10.00	Rotate														32.00	50.00	550.00	19000.00	300.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	12:40	12:50	0.17	14331.00	14337.00	6.00	Slide	-140.00	0.00												32.00	50.00	550.00	19000.00	36.00	4450.00	3575.00	875.00	230.00	230.00	160.00	86.00	
06/24/2024	12:50	13:20	0.50	14337.00	14416.00	79.00	Rotate				14346.00	90.71	270.04	6956.02	1072.06	-7288.75	7299.93	2.63	-27.30	3.15	32.00	50.00	550.00	20000.00	158.00	4650.00	3800.00	850.00	230.00	230.00	160.00	86.00	
06/24/2024	13:35	14:10	0.58	14416.00	14510.00	94.00	Rotate				14440.00	90.54	270.14	6954.99	1072.21	-7382.75	7393.92	0.21	-26.37	2.28	32.00	50.00	550.00	20000.00		4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	14:15	14:22	0.12	14510.00	14520.00	10.00	Rotate														32.00	50.00	550.00	20000.00	85.71	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	14:22	14:39	0.28	14520.00	14526.00	6.00	Slide	70.00	0.00												32.00	50.00	550.00	20000.00	21.18	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	14:39	15:12	0.55	14526.00	14605.00	79.00	Rotate				14535.00	90.81	270.99	6953.87	1073.15	-7477.74	7488.91	0.94	-25.34	2.20	35.00	50.00	550.00	20000.00	143.64	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	17:12	17:51	0.65	14605.00	14700.00	95.00	Rotate				14630.00	90.57	270.43	6952.73	1074.32	-7572.72	7583.90	0.64	-24.29	2.35	37.00	50.00	550.00	20000.00	146.15	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	17:58	18:37	0.65	14700.00	14794.00	94.00	Rotate				14724.00	90.64	270.97	6951.73	1075.47	-7666.71	7677.90	0.58	-23.39	2.48	32.00	50.00	550.00	20000.00	144.62	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	18:41	19:22	0.68	14794.00	14889.00	95.00	Rotate				14819.00	90.61	270.91	6950.70	1077.03	-7761.69	7772.89	0.07	-22.45	3.02	32.00	50.00	550.00	20000.00	139.02	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	19:27	19:34	0.12	14889.00	14903.00	14.00	Rotate														32.00	50.00	550.00	20000.00	120.00	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	20:50	21:24	0.57	14903.00	14983.00	80.00	Rotate				14913.00	90.74	270.99	6949.59	1078.59	-7855.67	7866.88	0.16	-21.43	3.56	32.00	50.00	550.00	20000.00	141.18	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	21:29	22:14	0.75	14983.00	15077.00	94.00	Rotate				15007.00	90.71	270.86	6948.40	1080.11	-7949.65	7960.87	0.14	-20.33	4.06	32.00	50.00	550.00	20000.00	125.33	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	22:20	23:03	0.72	15077.00	15171.00	94.00	Rotate				15101.00	91.08	271.83	6946.93	1082.31	-8043.61	8054.85	1.10	-18.95	5.26	32.00	50.00	550.00	20000.00	131.16	4650.00	3800.00	850.00	233.00	230.00	160.00	86.00	
06/24/2024	23:07	23:46	0.65	15171.00	15266.00	95.00	Rotate				15196.00	90.30	271.87	6945.79	1085.38	-8138.56	8149.82	0.82	-17.90	7.30	32.00	55.00	550.00	20000.00	118.75	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/24/2024	23:51	24:00	0.15	15266.00	15286.00	20.00	Rotate														32.00	55.00	550.00	20000.00	133.33	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	00:00	00:36	0.60	15286.00	15360.00	74.00	Rotate				15290.00	90.54	272.48	6945.10	1088.95	-8232.48	8243.79	0.70	-17.30	9.85	32.00	55.00	550.00	20000.00	123.33	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	00:41	00:48	0.12	15360.00	15370.00	10.00	Rotate														32.00	55.00	550.00	20000.00	85.71	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	00:48	01:10	0.37	15370.00	15378.00	8.00	Slide	90.00	-115.00												32.00	55.00	550.00	20000.00	21.82	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	01:10	01:54	0.73	15378.00	15454.00	76.00	Rotate				15384.00	89.19	271.12	6945.32	1091.90	-8326.43	8337.76	2.04	-17.62	11.79	32.00	55.00	550.00	20000.00	103.64	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	Rubber over Shakers
06/25/2024	01:59	02:04	0.08	15454.00	15464.00	10.00	Rotate														32.00	55.00	550.00	20000.00	120.00	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	02:04	02:15	0.18	15464.00	15470.00	6.00	Slide	-60.00	-60.00												32.00	55.00	550.00	20000.00	32.73	4850.00	4000.00	850.00	237.00	245.00	156.00	50.00	
06/25/2024	02:15	02:58	0.72	15470.00	15536.00	66.00	Rotate				15479.00	89.83	270.77	6946.13	1093.47	-8421.42	8432.76	0.77	-18.52	12.33	32.00	55.00	550.00	20000.00	92.09	4900.00	4100.00	800.00	237.00	245.00	156.00	50.00	

BHA 6 (Lateral) - Slide Sheet



BHA 6 (Lateral) - Slide Sheet



Operator	Logos Operating LLC	BHA	BHA 6 (Lateral)	BHA #:	6	RKB:	6325.00	North Reference:	TRUE	Total Drilled:	2641.00
Site	Rosa Unit 24	Survey Offset	69.00	BHA Type:	Motor	Units:	Us Feet	Declination:	8.46	Rotate :	2528.00 (95.72%)
Well Name	Rosa Unit 700H - OH	Gamma Offset	66.20	Bit Type:	PDC	Grid Conv :	0.26	VS Azimuth:	270.62	Slide:	113.00 (4.28%)

Drilling Data											Survey Data											Parameters										Weights			Comments
Date	Start Time	End Time	Hrs	Start Depth	End Depth	Course Len.	Operation	Tgt TF	TF	MY	MD	INC	AZI	TVD	NS	EW	VS	DLS	UD	LR	WOB	RPM	FLOW	Tq	ROP	SPP On Btm	SPP Off Btm	Diff	Temp	PU	ROT	SO	Comments		
06/26/2024	05:30	05:44	0.23	15536.00	15548.00	12.00	Rotate														25.00	50.00	550.00	13.00	51.43	4300.00	3950.00	350.00	215.00	235.00	160.00	50.00			
06/26/2024	05:49	06:02	0.22	15548.00	15558.00	10.00	Rotate														25.00	50.00	550.00	13.00	46.15	4300.00	3950.00	350.00	215.00	235.00	160.00	50.00			
06/26/2024	06:02	06:20	0.30	15558.00	15568.00	10.00	Slide	-30.00	-30.00												46.00		550.00		33.33	4300.00	3950.00	350.00	215.00	235.00	160.00	50.00			
06/26/2024	06:20	07:12	0.87	15568.00	15643.00	75.00	Rotate				15574.00	90.81	270.05	6945.60	1094.15	-8516.41	8527.75	1.28	-18.08	11.99	35.00	65.00	550.00	17.00		4450.00	3950.00	500.00	215.00	235.00	160.00	50.00			
06/26/2024	07:19	08:08	0.82	15643.00	15737.00	94.00	Rotate				15668.00	90.97	269.69	6944.14	1093.93	-8610.40	8621.73	0.42	-16.71	10.76	37.00	65.00	550.00	17.00	115.10	4450.00	3950.00	500.00	215.00	235.00	160.00	50.00			
06/26/2024	08:14	08:57	0.72	15737.00	15832.00	95.00	Rotate				15763.00	91.18	269.14	6942.36	1092.96	-8705.38	8716.69	0.62	-15.02	8.77	37.00	65.00	550.00	17.00		4450.00	3950.00	500.00	215.00	235.00	160.00	50.00			
06/26/2024	09:04	09:36	0.53	15832.00	15926.00	94.00	Rotate				15857.00	91.28	269.60	6940.34	1091.93	-8799.35	8810.65	0.50	-13.09	6.72	37.00	65.00	550.00	17.00	176.25	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	09:41	10:13	0.53	15926.00	16021.00	95.00	Rotate				15952.00	91.28	268.95	6938.22	1090.73	-8894.32	8905.60	0.68	-11.06	4.49	37.00	65.00	550.00	18.00		4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	10:18	10:56	0.63	16021.00	16115.00	94.00	Rotate				16046.00	91.51	269.00	6935.93	1089.05	-8988.27	8999.53	0.25	-8.87	1.80	37.00	65.00	550.00	18.00	148.42	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	11:02	11:08	0.10	16115.00	16125.00	10.00	Rotate														37.00	65.00	550.00	18.00	100.00	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	11:08	11:35	0.45	16125.00	16132.00	7.00	Slide	0.00	150.00												47.00		550.00	18.00	15.56	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	11:35	12:01	0.43	16132.00	16210.00	78.00	Rotate				16141.00	90.97	268.86	6933.88	1087.27	-9083.24	9094.47	0.59	-6.90	-1.00	37.00	65.00	550.00	18.00	180.00	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	12:08	12:34	0.43	16210.00	16304.00	94.00	Rotate				16235.00	91.28	268.86	6932.03	1085.40	-9177.20	9188.41	0.33	-5.15	-3.88	37.00	65.00	550.00	18.00	216.92	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	12:41	13:08	0.45	16304.00	16398.00	94.00	Rotate				16329.00	91.82	269.32	6929.49	1083.91	-9271.15	9282.34	0.75	-2.70	-6.39	37.00	65.00	550.00	18.00	208.89	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	13:15	13:19	0.07	16398.00	16408.00	10.00	Rotate														37.00	65.00	550.00	18.00	150.00	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	13:19	13:33	0.23	16408.00	16417.00	9.00	Slide	0.00	150.00												47.00		550.00	18.00	38.57	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	13:33	13:56	0.38	16417.00	16493.00	76.00	Rotate				16424.00	91.14	269.76	6927.03	1083.15	-9366.12	9377.29	0.85	-0.34	-8.18	37.00	65.00	550.00	18.00	198.26	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	14:01	14:06	0.08	16493.00	16503.00	10.00	Rotate														37.00	65.00	550.00	18.00	120.00	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	14:06	14:19	0.22	16503.00	16508.00	5.00	Slide	0.00	38.00												47.00		550.00	18.00	23.08	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	14:19	14:45	0.43	16508.00	16587.00	79.00	Rotate				16518.00	92.02	269.67	6924.44	1082.68	-9460.08	9471.24	0.94	2.17	-9.66	37.00	65.00	550.00	18.00	182.31	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	14:51	14:55	0.07	16587.00	16597.00	10.00	Rotate														37.00	65.00	550.00	18.00	150.00	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	14:55	15:28	0.55	16597.00	16607.00	10.00	Slide	0.00	150.00												47.00		550.00	18.00	18.18	4400.00	3950.00	450.00	215.00	235.00	160.00	50.00			
06/26/2024	15:28	15:50	0.37	16607.00	16682.00	75.00	Rotate				16613.00	92.46	270.23	6920.73	1082.60	-9555.00	9566.16	0.75	5.79	-10.76	37.00	65.00	550.00	18.00	204.55	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	15:55	16:01	0.10	16682.00	16692.00	10.00	Rotate														37.00	65.00	550.00	18.00	100.00	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	16:01	16:34	0.55	16692.00	16707.00	15.00	Slide	0.00	180.00												47.00		550.00	18.00	27.27	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	16:34	16:56	0.37	16707.00	16776.00	69.00	Rotate				16707.00	91.88	272.67	6917.17	1084.98	-9648.90	9660.08	2.67	9.26	-9.40	37.00	65.00	550.00	18.00	188.18	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	17:29	17:33	0.07	16776.00	16786.00	10.00	Rotate														37.00	65.00	550.00	18.00	150.00	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	17:33	18:33	1.00	16786.00	16801.00	15.00	Slide	0.00	180.00												47.00		550.00	18.00	15.00	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00			
06/26/2024	18:33	19:01	0.47	16801.00	16870.00	69.00	Rotate				16801.00	91.51	272.50	6914.39	1089.21	-9742.76	9753.98	0.43	11.95	-6.18	37.00	65.00	550.00	18.00	147.86	4400.00	3950.00	450.00	220.00	235.00	160.00	50.00	Activated 2nd Agitator		
06/26/2024	19:28	19:31	0.05	16870.00	16880.00	10.00	Rotate														37.00	65.00	550.00	18.00	200.00	5250.00	4500.00	750.00	220.00	235.00	160.00	50.00			
06/26/2024	19:31	19:56	0.42	16880.00	16898.00	18.00	Slide	0.00	-135.00		16895.00	90.00	272.01	6913.15	1092.91	-9836.68	9847.93	1.69	13.09	-3.49	37.00	65.00	550.00	18.00	43.20	5250.00	4500.00	750.00	220.00	235.00	160.00	50.00			
06/26/2024	19:56	20:20	0.40	16898.00	16964.00	66.00	Rotate														37.00	65.00	550.00	18.00	165.00	5250.00	4500.00	750.00	220.00	235.00	160.00	50.00			
06/26/2024	20:31	20:51	0.33	16964.00	16976.00	12.00	Slide	0.00	180.00												37.00	65.00	550.00	18.00	36.00	5250.00	4500.00	750.00	220.00	235.00	160.00	50.00			
06/26/2024	20:51	21:17	0.43	16976.00	17059.00	83.00	Rotate				16990.00	88.62	271.74	6914.29	1096.02	-9931.62	9942.90	1.48	11.86	-1.41	37.00	65.00	550.00	18.00	191.54	5250.00	4500.00	750.00	220.00	235.00	160.00	50.00			

06/26/2024	21:27	21:51	0.40	17059.00	17153.00	94.00	Rotate				17084.00	88.52	271.50	6916.64	1098.68	-10025.55	10036.85	0.28	9.42	0.24	37.00	65.00	550.00	18.00	235.00	5250.00	4500.00	750.00	230.00	258.00	151.00	50.00	
06/26/2024	21:58	22:23	0.42	17153.00	17247.00	94.00	Rotate				17178.00	89.09	271.60	6918.60	1101.22	-10119.50	10130.82	0.62	7.37	1.76	37.00	65.00	550.00	18.00	225.60	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/26/2024	22:28	22:33	0.08	17247.00	17257.00	10.00	Rotate														37.00	65.00	550.00	18.00	120.00	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/26/2024	22:33	22:54	0.35	17257.00	17269.00	12.00	Slide	0.00	-120.00												37.00	65.00	550.00	18.00	34.29	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/26/2024	22:54	23:18	0.40	17269.00	17342.00	73.00	Rotate				17273.00	88.18	269.92	6920.86	1102.48	-10214.46	10225.79	2.01	5.01	2.00	37.00	65.00	550.00	18.00	182.50	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/26/2024	23:23	23:47	0.40	17342.00	17436.00	94.00	Rotate				17367.00	88.25	270.22	6923.79	1102.59	-10308.41	10319.74	0.33	1.99	1.10	37.00	65.00	550.00	18.00	235.00	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/26/2024	23:52	24:00	0.13	17436.00	17460.00	24.00	Rotate														37.00	65.00	550.00	18.00	180.00	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/27/2024	00:00	00:22	0.37	17460.00	17531.00	71.00	Rotate				17462.00	88.49	270.03	6926.49	1102.80	-10403.37	10414.70	0.32	-0.80	0.28	37.00	65.00	550.00	18.00	193.64	5250.00	4500.00	750.00	230.00	235.00	160.00	50.00	
06/27/2024	00:29	00:54	0.42	17531.00	17625.00	94.00	Rotate				17556.00	88.79	269.88	6928.73	1102.73	-10497.35	10508.66	0.36	-3.12	-0.80	37.00	65.00	550.00	18.00	225.60	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	00:59	01:25	0.43	17625.00	17719.00	94.00	Rotate				17650.00	89.06	269.79	6930.49	1102.46	-10591.33	10602.64	0.30	-4.98	-2.09	37.00	65.00	550.00	18.00	216.92	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	01:31	01:55	0.40	17719.00	17814.00	95.00	Rotate				17745.00	89.50	269.60	6931.68	1101.95	-10686.32	10697.62	0.50	-6.26	-3.62	37.00	65.00	550.00	18.00	237.50	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	02:03	02:28	0.42	17814.00	17908.00	94.00	Rotate				17839.00	89.87	269.04	6932.20	1100.83	-10780.31	10791.59	0.71	-6.87	-5.75	37.00	65.00	550.00	18.00	225.60	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	02:38	03:02	0.40	17908.00	18003.00	95.00	Rotate				17934.00	90.10	269.68	6932.22	1099.77	-10875.30	10886.57	0.72	-6.99	-7.84	37.00	65.00	550.00	18.00	237.50	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	03:07	03:36	0.48	18003.00	18097.00	94.00	Rotate				18028.00	90.34	269.65	6931.86	1099.22	-10969.30	10980.55	0.26	-6.72	-9.40	37.00	65.00	550.00	18.00	194.48	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	
06/27/2024	03:42	04:12	0.50	18097.00	18177.00	80.00	Rotate				18108.00	90.50	269.06	6931.28	1098.32	-11049.29	11060.53	0.76	-6.21	-11.16	37.00	65.00	550.00	18.00	160.00	5250.00	4500.00	750.00	237.00	235.00	160.00	50.00	

**Innovative Drilling Solutions
Data-Driven Decision**



JOB CHARTS – SUMMARY

**Scout Drilling Technologies
1125 Beach Airport Road, Conroe, Texas 77301
Office: 936-756-3210
www.scoutdrilltech.com**

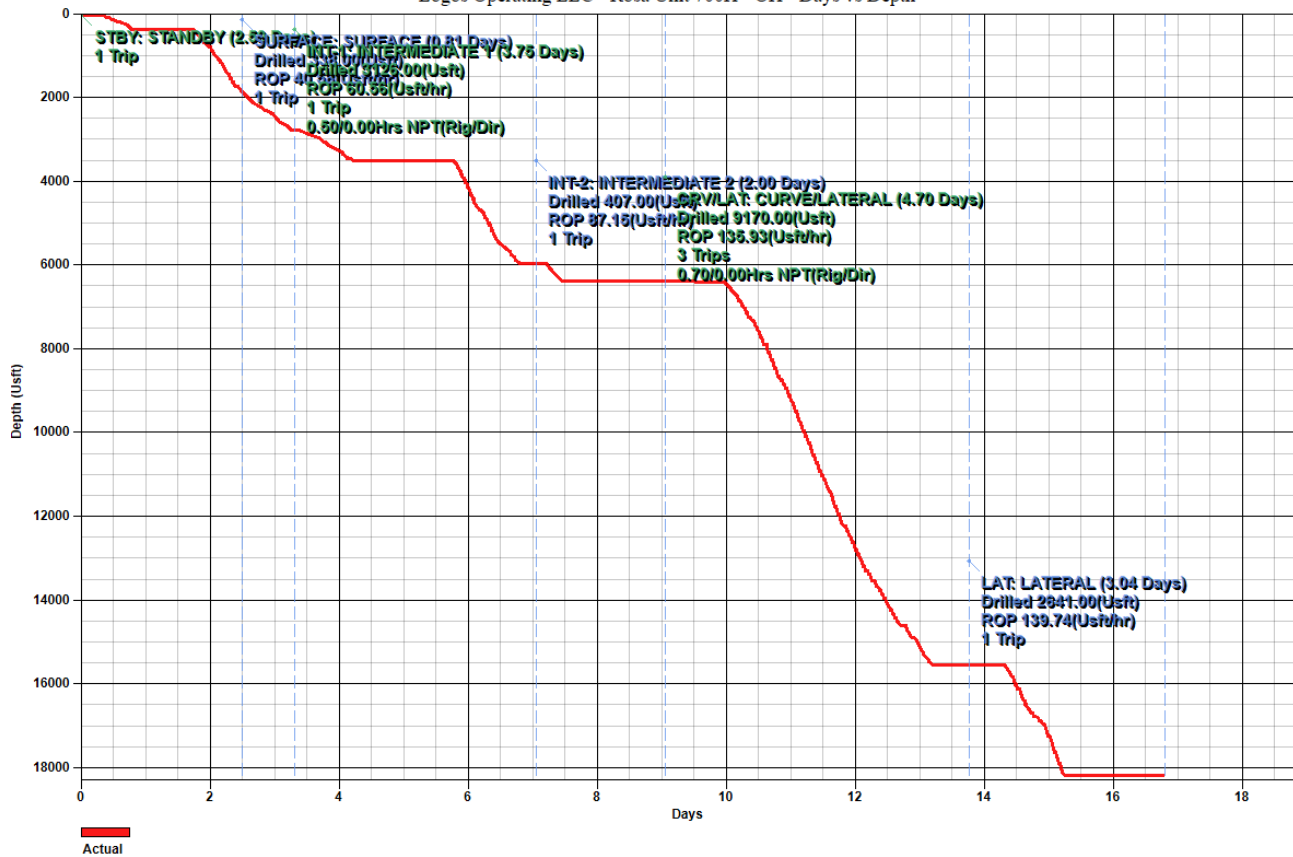
Depth V Time



Rosa Unit 700H - OH - Depth V Time



Logos Operating LLC - Rosa Unit 700H - OH - Days vs Depth



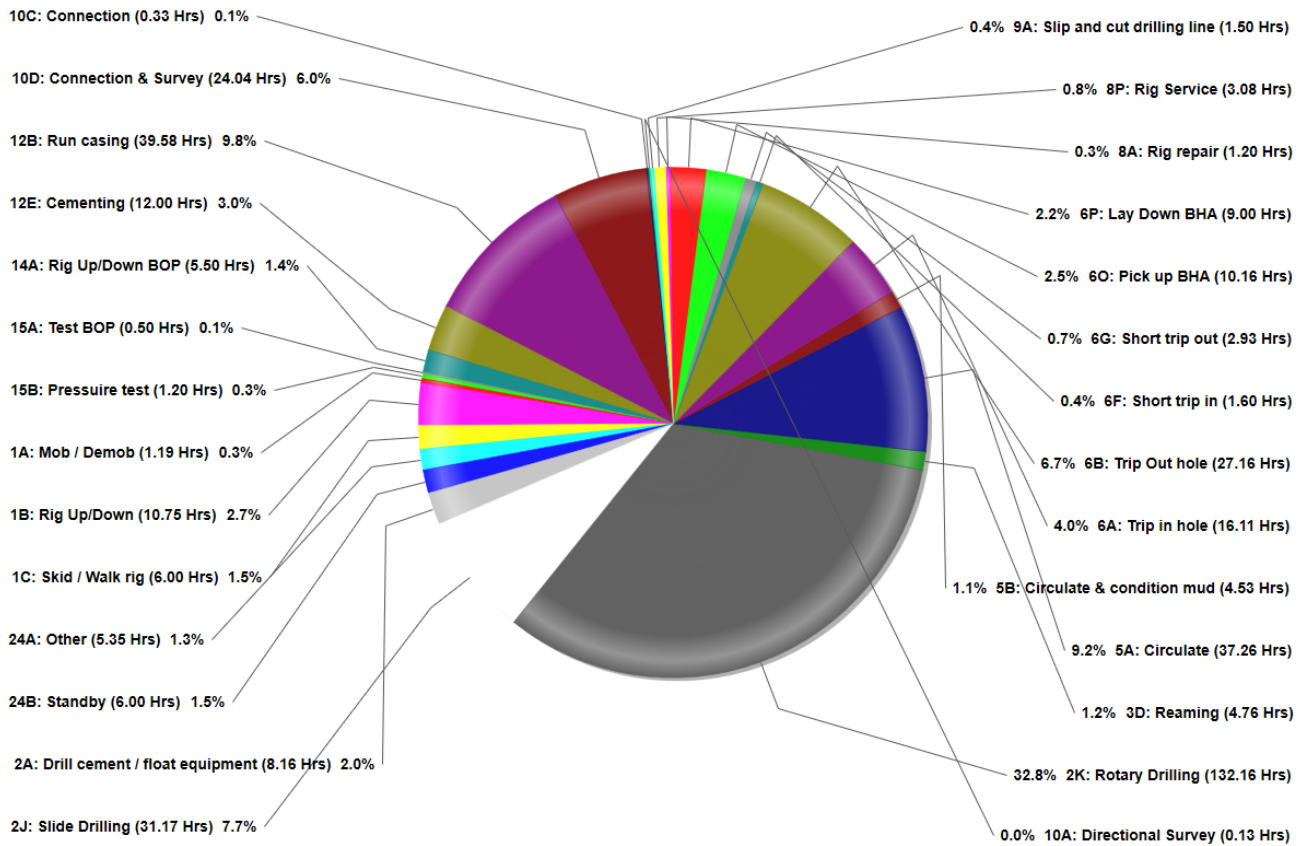
Activity Summary



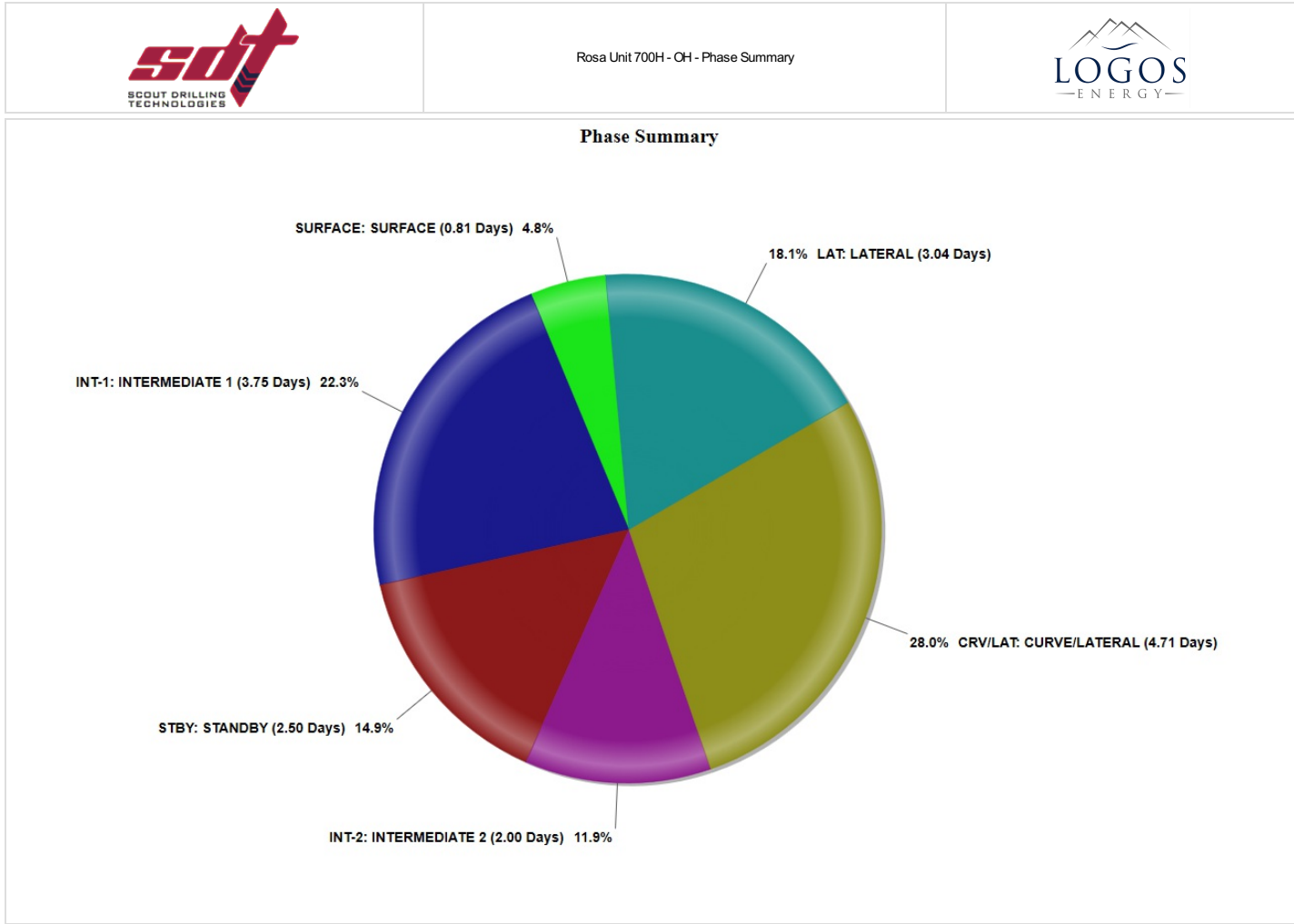
Rosa Unit 700H - OH - Activity Summary



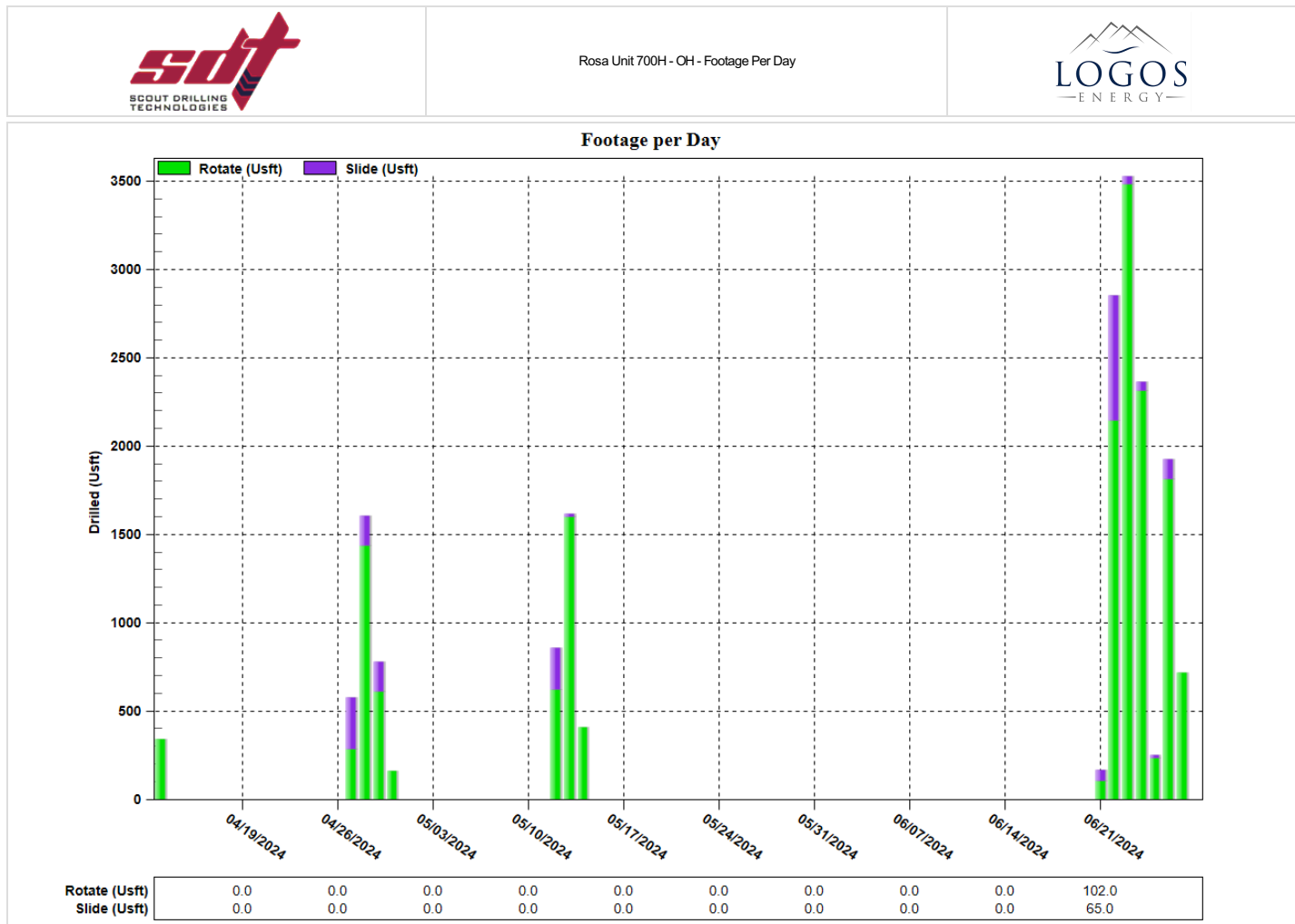
Activity Summary



Phase Summary



Footage Per Day



Rotate (Usft)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	102.0
Slide (Usft)	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	0.0	65.0

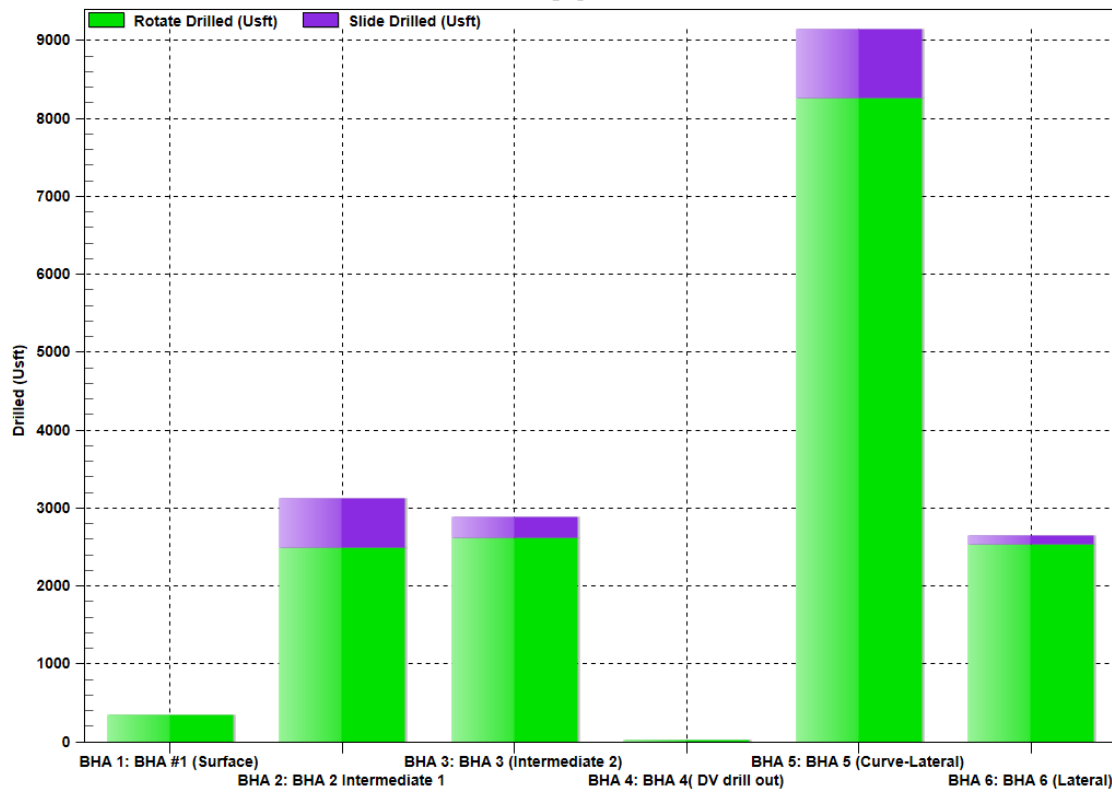
Footage Per Run



Rosa Unit 700H - OH - Footage Per Run

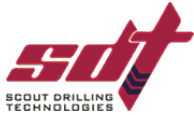


Footage per Run

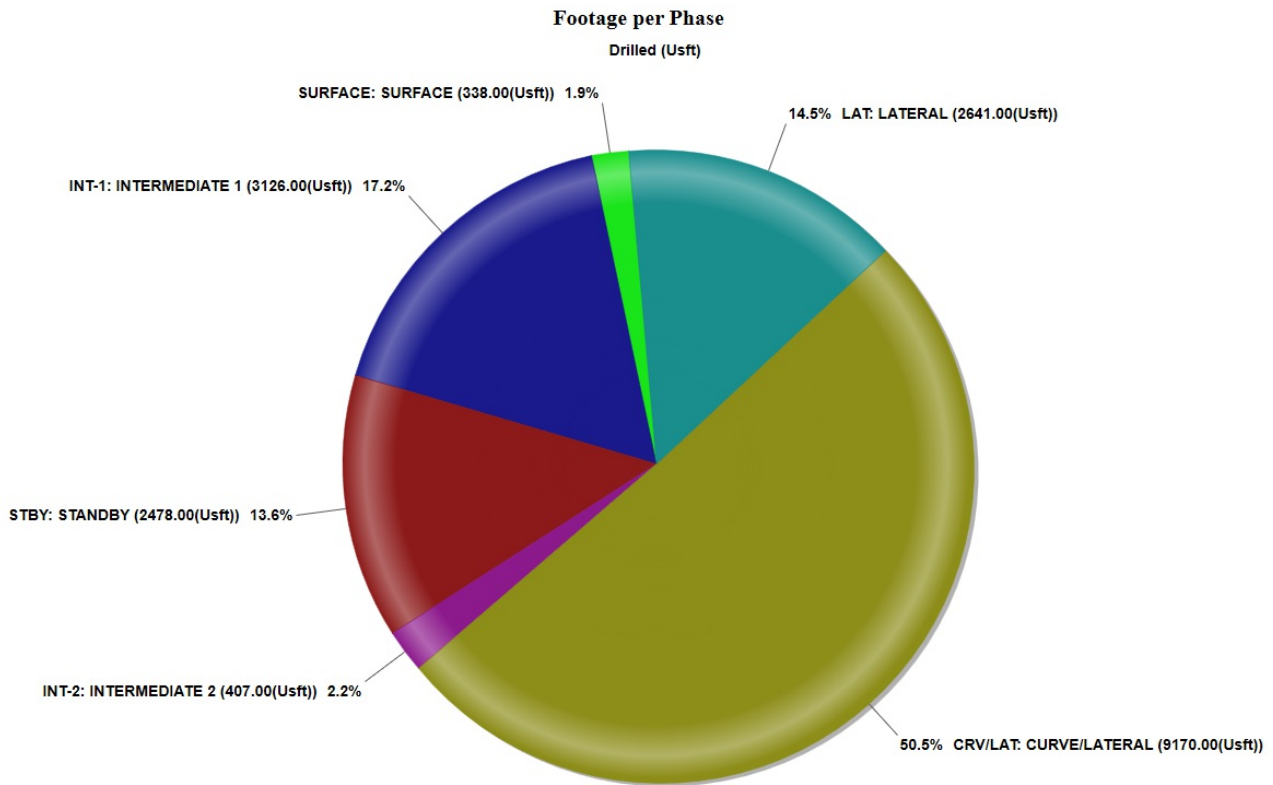


Rotate Drilled (Usft)	338.0	2492.0	2625.0	16.0	8259.0	2528.0
Slide Drilled (Usft)	0.0	634.0	260.0	0.0	895.0	113.0

Footage Per Phase



Rosa Unit 700H - OH - Footage Per Phase



WELL COMPLETION OR RECOMPLETION REPORT AND LOG

Section 1 - Operator and Well Information

Submittal Type: ☒ New Well ☐ Workover ☐ Deepening ☐ Plugback ☐ Different Reservoir ☐ C-144 Closure Attachment ☐ Other	
Operator Name: LOGOS OPERATING, LLC	OGRID: 289408
Property Name and Well Number: ROSA UNIT 700H	Property Code: 320608
Mineral Owner: ☐ State ☐ Fee ☐ Tribal ☒ Federal	API Number: 30-039-31441
Pool Name: BASIN MANCOS	Pool Code: 97232

Section 2 – Well Location										
	Ul or lot no.	Section	Township	Range	Lot Id	Feet from	N/S Line	Feet from	E/W Line	County
SHL:	G	7	31N	5W		2617’	North	1351’	East	Rio Arriba
BHL	E	11	31N	6W		1577’	North	1122’	West	Rio Arriba

Section 3 – Completion Information

Date T.D. Reached 6/27/2024	Total Measured Depth of Well 18,177’ (TD)	Acid Volume (bbls) 1,603 bbls	☒ Directional Survey Submitted ☐ Deviation Survey Submitted
Date Rig Released 6/29/2024	Plug-Back Measured Depth 18,075'	Completion Fluid Used (bbls) 651,075 bbls	Were Logs Ran (Y/N) Y
Completion Date 10/7/2024	Perforations (MD and TVD) 7,450'-17,998'(MD) - 6,938'-6,932'(TVD)	Completion Proppant Used (lbs) 24,040k	List Type of Logs Ran if applicable: Radial Bond, Casing Collar log, Gamma Ray/ VDL

Section 4 – Action IDs for Submissions and Order Numbers

Surface Casing Action ID:	335982	UIC Permit/Order (UIC wells only) ~~Yes~~ ☒ No, Order No.
Intermediate 1 Casing Action ID:	346225	NOI Recomplete Action ID (if applicable): N/A
Intermediate 2 Casing Action ID:	366080	NOI Plugback Action ID (if applicable): N/A
Production Casing Action ID:	367347	Cement Squeeze Action ID (if applicable): N/A
Tubing Action ID:	Pending	All casing was pressure tested in accordance with NMAC ☒ Yes ☐ No
Liner 1 Action ID:	N/A	Casing was installed prior to Action ID system (Y/N): N

Section 5 – Test Data

Date First Production 10/17/2024	Production Method Flowing	Well Status Flowing	Gas – Oil Ratio N/A
Date of Test 10/17/2024	Choke Size 22/64	Flowing Tubing Pressure N/A	Casing Pressure 2200
24 hr Oil (bbls) 0	24 hr Gas (MCF) 1968 mcf	24 hr Water (bbls) 384 bbls	Oil Gravity – API N/A

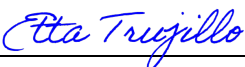
Disposition of Gas:
Sold

Section 6 – Pits

☐ A temporary pit was used at the well. If so, attach a plat with the location of the temporary pit.
☐ A Closed Loop System was used.

☒ If an on-site burial was used at the well, report the exact location of the on-site burial:
LAT:36.913593 LONG: -107.397846

Section 7 - Operator Signature and Certification

☒ I hereby certify that the required Water Use Report has been, or will be, submitted for this well’s completion.	
☒ I hereby certify that the required Fracfocus disclosure has been, or will be, submitted for this well’s completion.	
☒ I hereby certify that the rules of the Oil Conservation Division have been complied with and that the information given above is true and complete to the best of my knowledge and belief.	
Name 	
Title Regulatory Specialist II	Date 11/18/2024

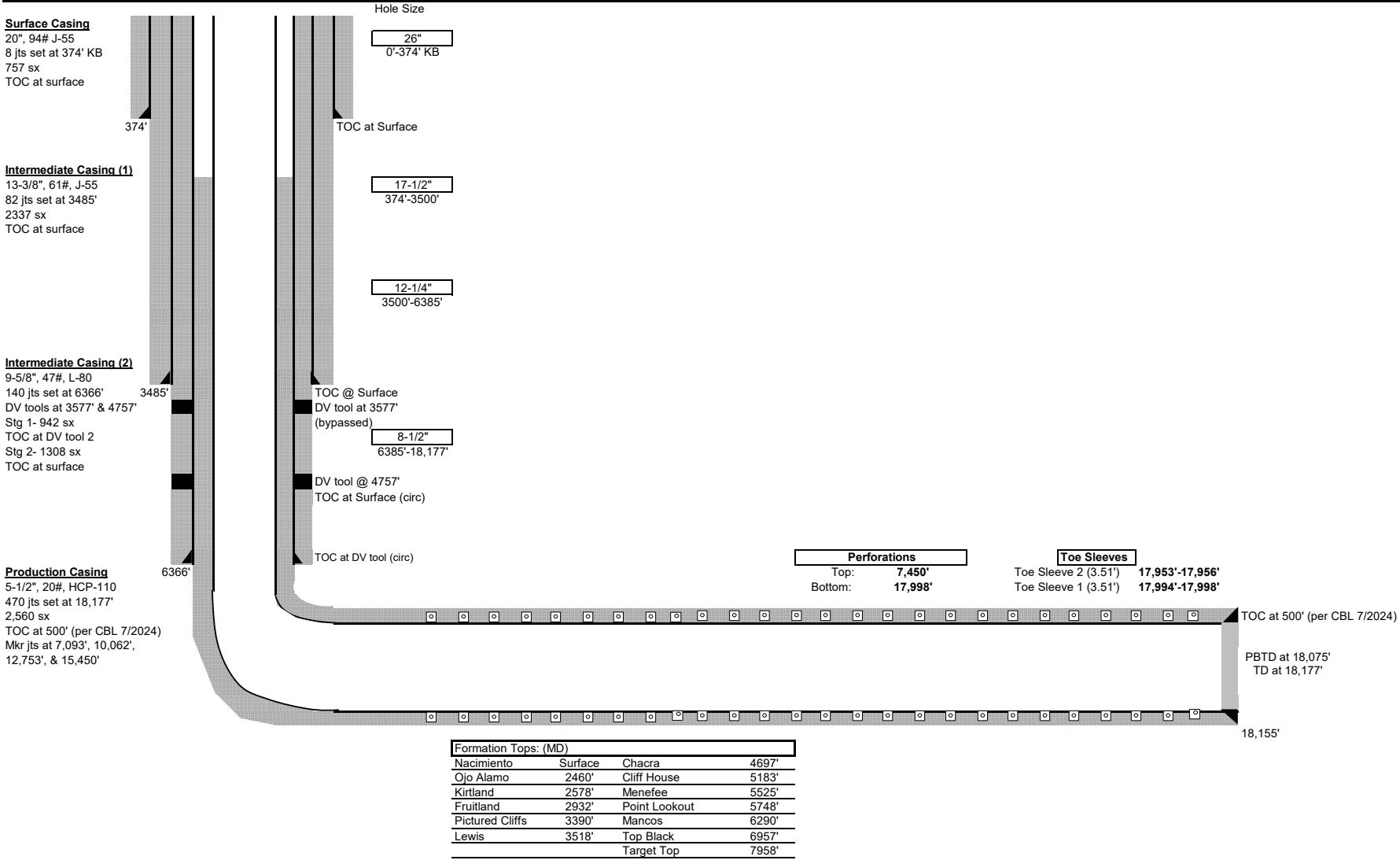
South Formations				North Formations			
Formation/Zone	MD	TVD	W/O/G	Formation/Zone	MD	TVD	W/O/G
T. Anhy				T. San Jose			
T. Salt				T. Nacimiento			
B. Salt				T. Ojo Alamo	2460'	2422'	
T. Yates				T. Kirtland	2578'	2539'	
T. 7 Rivers				T. Fruitland	2932'	2887'	
T. Queen				T. Pictured Cliffs	3390'	3340'	
T. Grayburg				T. Lewis Shale	3518'	3466'	
T. San Andres				T. Chacra	4697'	4601'	
T. Glorieta				T. Cliff House	5478'	5370'	
T. Yeso				T. Menefee	5525'	5417'	
T. Paddock				T. Point Lookout	5748'	5639'	
T. Blinebry				T. Mancos	6290'	6180'	
T.Tubb				T. Gallup			
T. Drinkard				T. Greenhorn			
T. Abo				T. Graneros			
T. Wolfcamp				T. Dakota			
T. Penn				T. Morrison			
T. Cisco				T. Bluff			
T. Canyon				T.Todilto			
T. Strawn				T. Entrada			
T. Atoka				T. Wingate			
T. Morrow				T. Chinle			
T. Barnett Shale				T. Permian			
T. Miss				T. Penn A"			
T. Woodford Shale				T. Penn. "B"			
T. Devonian				T. Penn. "C"			
T. Silurian				T. Penn. "D"			
T. Fusselman				T. Leadville			
T. Montoya				T. Madison			
T. Simpson				T. Elbert			
T. McKee				T. McCracken			
T. Waddell				T. Ignacio Otzte			
T. Connel				T. Granite			
T. Ellenburger				T. Hermosa			
T. Gr. Wash				T. De Chelly			
T. Delaware Sand				T. Pinkerton			
T. Lamar Lime							
T. Bell Canyon							
T. Cherry Canyon							
T. Brushy Canyon							
T. Bone Springs							
T. 1st BS Sand							
T. 2nd BS Carbonate							
T. 2nd BS Sand							
T. 3rd BS Carbonate							
T. 3rd BS Sand							



Well Name: Rosa Unit 700H
Location: SHL - Sec 7, T31N, R05W, 2617' FNL, 1351' FEL
County: Rio Arriba
API #: 30-039-31441
Co-ordinates: 36.914073, -107.399356 NAD83
Operator: LOGOS Operating, LLC

Wellbore Schematic
Ground Elevation: 6295'
KB Elevation: 6325'
TD (TVD): 6938'
TD (MD): 18,177'
PBTD: 18,075'

Prepared By: 6/28/2024 Peace
Reviewed/Signed By:
Last Updated: 11/13/2024 Gomez
Spud Date: 4/13/2024
Completion Date: 10/7/2024
Last Workover Date: N/A



From: blm-afmss-notifications@blm.gov
To: [Etta Trujillo](#)
Subject: Well Name: ROSA UNIT, Well Number: 700H, Notification of Well Completion Acceptance
Date: Monday, November 18, 2024 7:21:03 AM

The Bureau of Land Management

Notice of Acceptance for Well Completion Report

- Operator Name: **LOGOS OPERATING LLC**
- Well Name: **ROSA UNIT**
- Well Number: **700H**
- US Well Number: **3003931441**
- Well Completion Report Id: **WCR2024111893659**

This notification is automatically generated. Please do not reply to this message as this account is not monitored.

Sante Fe Main Office
Phone: (505) 476-3441

General Information
Phone: (505) 629-6116

Online Phone Directory
<https://www.emnrd.nm.gov/oecd/contact-us>

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

ACKNOWLEDGMENTS

Action 406583

ACKNOWLEDGMENTS

Operator: LOGOS OPERATING, LLC 2010 Afton Place Farmington, NM 87401	OGRID: 289408
	Action Number: 406583
	Action Type: [C-104] Completion Packet - Tight Hole/Confidential (C-104CT)

ACKNOWLEDGMENTS

☒	I hereby certify that the required Water Use Report has been, or will be, submitted for this wells completion.
☒	I hereby certify that the required FracFocus disclosure has been, or will be, submitted for this wells completion.
☒	I hereby certify that the rules of the Oil Conservation Division have been complied with and that the information given above is true and complete to the best of my knowledge and belief.

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

CONDITIONS

Action 406583

CONDITIONS

Operator: LOGOS OPERATING, LLC 2010 Afton Place Farmington, NM 87401	OGRID: 289408
	Action Number: 406583
	Action Type: [C-104] Completion Packet - Tight Hole/Confidential (C-104CT)

CONDITIONS

Created By	Condition	Condition Date
plmartinez	File 3160-4 Completion Report and 3160-5 Completion Sundry within 10 days of BLM approval.	1/21/2025