

DATE IN 12/04/2015	SUSPENSE	ENGINEER PRG	LOGGED IN 12/10/2015	TYPE SWD	APP NO. DMA153442121
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ABOVE THIS LINE FOR DIVISION USE ONLY

NEW MEXICO OIL CONSERVATION DIVISION
- Engineering Bureau -
1220 South St. Francis Drive, Santa Fe, NM 87505



ADMINISTRATIVE APPLICATION CHECKLIST

THIS CHECKLIST IS MANDATORY FOR ALL ADMINISTRATIVE APPLICATIONS FOR EXCEPTIONS TO DIVISION RULES AND REGULATIONS WHICH REQUIRE PROCESSING AT THE DIVISION LEVEL IN SANTA FE

Application Acronyms:

[NSL-Non-Standard Location] [NSP-Non-Standard Proration Unit] [SD-Simultaneous Dedication]
[DHC-Downhole Commingling] [CTB-Lease Commingling] [PLC-Pool/Lease Commingling]
[PC-Pool Commingling] [OLS - Off-Lease Storage] [OLM-Off-Lease Measurement]
[WFX-Waterflood Expansion] [PMX-Pressure Maintenance Expansion]
[SWD-Salt Water Disposal] [IPI-Injection Pressure Increase]
[EOR-Qualified Enhanced Oil Recovery Certification] [PPR-Positive Production Response]

[1] **TYPE OF APPLICATION** - Check Those Which Apply for [A]

[A] Location - Spacing Unit - Simultaneous Dedication
☐ NSL ☐ NSP ☐ SD

Check One Only for [B] or [C]

[B] Commingling - Storage - Measurement
☐ DHC ☐ CTB ☐ PLC ☐ PC ☐ OLS ☐ OLM

[C] Injection - Disposal - Pressure Increase - Enhanced Oil Recovery
☐ WFX ☐ PMX ☒ SWD ☐ IPI ☐ EOR ☐ PPR

[D] Other: Specify _____

[2] **NOTIFICATION REQUIRED TO:** - Check Those Which Apply, or ☐ Does Not Apply

[A] ☐ Working, Royalty or Overriding Royalty Interest Owners

[B] ☒ Offset Operators, Leaseholders or Surface Owner

[C] ☒ Application is One Which Requires Published Legal Notice

[D] ☒ Notification and/or Concurrent Approval by BLM or SLO
U.S. Bureau of Land Management - Commissioner of Public Lands, State Land Office

[E] ☒ For all of the above, Proof of Notification or Publication is Attached, and/or,

[F] ☐ Waivers are Attached

[3] **SUBMIT ACCURATE AND COMPLETE INFORMATION REQUIRED TO PROCESS THE TYPE OF APPLICATION INDICATED ABOVE.**

[4] **CERTIFICATION:** I hereby certify that the information submitted with this application for administrative approval is **accurate** and **complete** to the best of my knowledge. I also understand that **no action** will be taken on this application until the required information and notifications are submitted to the Division.

Note: Statement must be completed by an individual with managerial and/or supervisory capacity.

Ben Stone		Agent for Owl SWD Operating, LLC 12/02/15
Print or Type Name	Signature	Title
		ben@sosconsulting.us
		e-mail Address

- SWD
- Owl SWD Operating, LLC
308339
well
- COLLINS OIL COPY FORTH
30-015-33758
2015 DEC - 4 P 2:44
RECEIVED OGD
POOL
- SWD, Delaware
96100



December 2, 2015

New Mexico Oil Conservation Division
1220 South St. Francis Drive
Santa Fe, New Mexico 87505

Attn: Mr. David Catanach, Director

Re: Application of Owl SWD Operating, LLC to permit for salt water disposal its Collinsoscopy Federal No.1 well, located in Section 7, Township 20 South, Range 30 East, NMPM, Eddy County, New Mexico.

Dear Mr. Catanach,

Please find enclosed form C-108 Application for Authority to Inject, supporting the above-referenced request to for disposal in the Collinsoscopy Federal Well No.1.

Owl SWD Operating seeks to create additional solutions for disposal in various locations in southeast New Mexico. Approval of this application is consistent with that goal as well as the NMOCD's mission of preventing waste and protection of correlative rights.

Published legal notice ran in the November 24, 2015 edition of the Artesia Daily Press and all offset operators and other interested parties have been notified individually. The legal notice affidavit is included in this application. The application also includes wellbore schematics, area of review maps, leaseholder plats and other required information for a complete Form C-108. The well is located on federal land and minerals; the BLM form 3160-3 APD is in process at the Carlsbad Field Office of BLM.

I respectfully request that the approval of this salt water disposal well proceed swiftly and if you or your staff requires additional information or has any questions, please do not hesitate to call or email me.

Best regards,



Ben Stone, Partner
SOS Consulting, LLC
Agent for Owl SWD Operating, LLC

Cc: Application attachment and file

APPLICATION FOR AUTHORIZATION TO INJECT

- I. PURPOSE: **Salt Water Disposal** and the application **QUALIFIES** for administrative approval.
- II. OPERATOR: **Owl SWD Operating, LLC**
ADDRESS: **8214 Westchester Dr., Ste. 850, Dallas, TX 75255**

CONTACT PARTY: **Agent: SOS Consulting, LLC – Ben Stone (903) 488-9850**
- III. WELL DATA: **Active GAS Well – Convert to SWD. All well data and applicable wellbore diagrams are ATTACHED.**
- IV. **This is not an expansion of an existing project.**
- V. **A map is attached** that identifies all wells and leases within two miles of any proposed injection well with a one-half mile radius circle drawn around each proposed injection well. This circle identifies the well's area of review.
- *VI. A tabulation is attached of data on all wells of public record within the area of review which penetrate the proposed injection zone. **There are 4 Wells in the subject AOR.** The data includes a description of each well's type, construction, date drilled, location, depth, and a schematic of any plugged well illustrating all plugging detail. **NO P&A Wells.**
- VII. **The following data is ATTACHED** on the proposed operation, including:
1. Proposed average and maximum daily rate and volume of fluids to be injected;
 2. Whether the system is open or closed;
 3. Proposed average and maximum injection pressure;
 4. Sources and an appropriate analysis of injection fluid and compatibility with the receiving formation if other than reinjected produced water; and,
 5. If injection is for disposal purposes into a zone not productive of oil or gas at or within one mile of the proposed well, attach a chemical analysis of the disposal zone formation water (may be measured or inferred from existing literature, studies, nearby wells, etc.).
- *VIII. **Appropriate geologic data on the injection zone is ATTACHED** including appropriate lithologic detail, geologic name, thickness, and depth. Give the geologic name, and depth to bottom of all underground sources of drinking water (aquifers containing waters with total dissolved solids concentrations of 10,000 mg/l or less) overlying the proposed injection zone as well as any such sources known to be immediately underlying the injection interval.
- IX. **Stimulation program – a conventional acid job may be performed to open new injection perfs and formation.**
- *X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division, they need not be resubmitted). **4 Well Logs are on File with OCD and available through OCD Online.**
- *XI. **There are 2 domestic water wells within one mile of the proposed salt water disposal well. Analyses will be forwarded upon receipt. Water well locations are indicated on the 2 Mile AOR Map.**
- XII. **An affirmative statement is ATTACHED that available geologic and engineering data has been examined and no evidence was found** of open faults or any other hydrologic connection between the disposal zone and any underground sources of drinking water.
- XIII. **"Proof of Notice" section on the next page of this form has been completed and ATTACHED. There are 6 offset lessees and/or operators within ½ mile and BLM & State minerals - all have been noticed.**
- XIV. Certification: I hereby certify that the information submitted with this application is true and correct to the best of my knowledge and belief.

NAME: **Ben Stone** TITLE: **SOS Consulting, LLC agent for Owl SWD Operating, LLC**

SIGNATURE:  DATE: **12/02/2015**

E-MAIL ADDRESS: **ben@sosconsulting.us**

* If the information required under Sections VI, VIII, X, and XI above has been previously submitted, it need not be resubmitted. Please show the date and circumstances of the earlier submittal:

DISTRIBUTION: Original and one copy to Santa Fe with one copy to the appropriate District Office

FORM C-108 – APPLICATION FOR AUTHORIZATION TO INJECT (cont.)

III. WELL DATA – *The following information and data is included (See ATTACHED Wellbore Schematic):*

A. The following well data must be submitted for each injection well covered by this application. The data must be both in tabular and schematic form and shall include:

- (1) Lease name; Well No., Location by Section, Township and Range; and footage location within the section.
- (2) Each casing string used with its size, setting depth, sacks of cement used, hole size, top of cement, and how such top was determined.
- (3) A description of the tubing to be used including its size, lining material, and setting depth.
- (4) The name, model, and setting depth of the packer used or a description of any other seal system or assembly used.

Division District Offices have supplies of Well Data Sheets which may be used or which may be used as models for this purpose. Applicants for several identical wells may submit a "typical data sheet" rather than submitting the data for each well.

B. The following must be submitted for each injection well covered by this application. All items must be addressed for the initial well. Responses for additional wells need be shown only when different. Information shown on schematics need not be repeated.

- (1) The name of the injection formation and, if applicable, the field or pool name.
- (2) The injection interval and whether it is perforated or open-hole.
- (3) State if the well was drilled for injection or, if not, the original purpose of the well.
- (4) Give the depths of any other perforated intervals and detail on the sacks of cement or bridge plugs used to seal off such perforations.
- (5) Give the depth to and the name of the next higher and next lower oil or gas zone in the area of the well, if any.

XIV. PROOF OF NOTICE *pursuant to the following criteria is ATTACHED.*

All applicants must furnish proof that a copy of the application has been furnished, by certified or registered mail, to the owner of the surface of the land on which the well is to be located and to each leasehold operator within one-half mile of the well location.

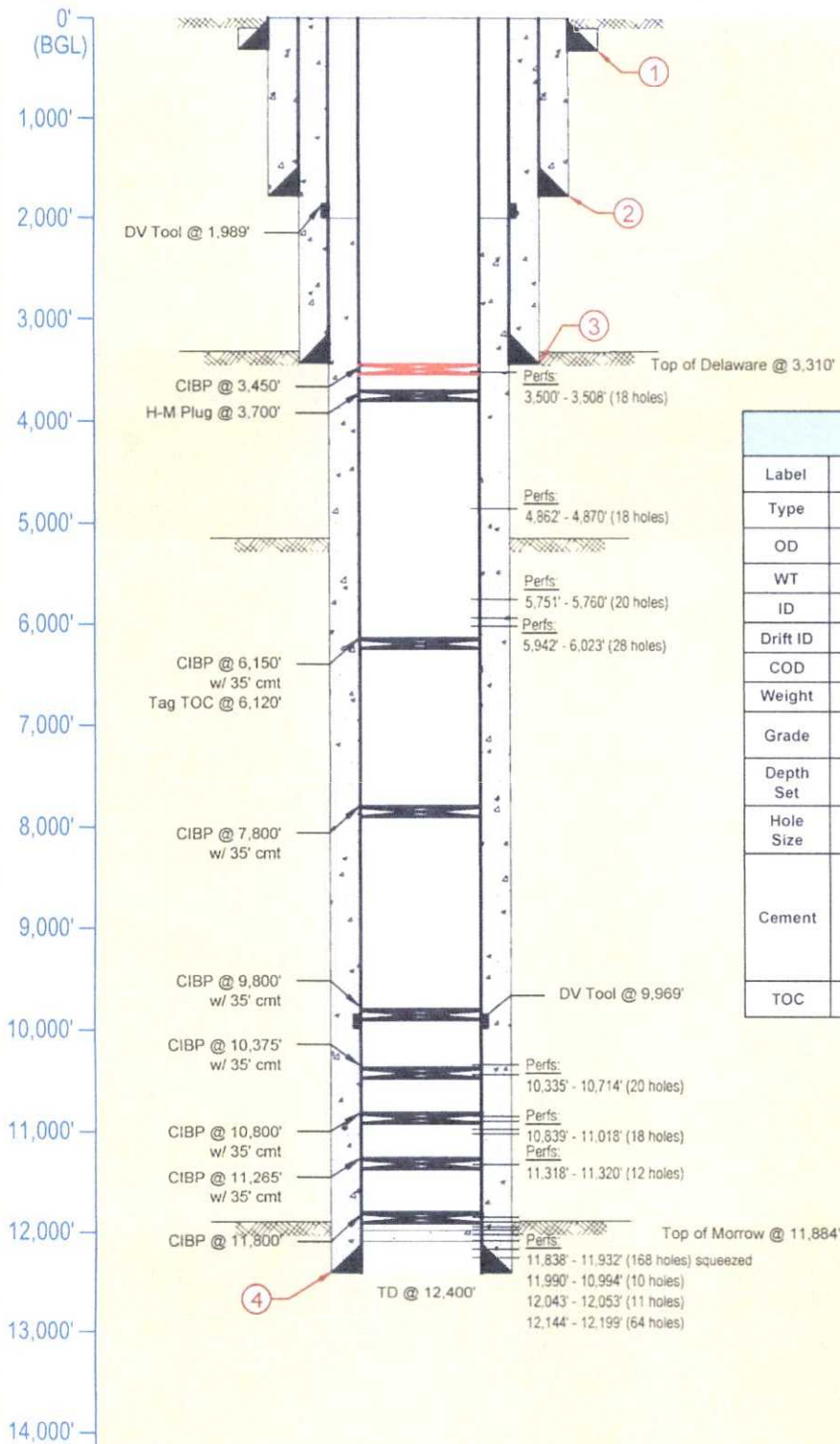
Where an application is subject to administrative approval, a proof of publication must be submitted. Such proof shall consist of a copy of the legal advertisement which was published in the county in which the well is located. The contents of such advertisement must include:

- (1) The name, address, phone number, and contact party for the applicant;
- (2) The intended purpose of the injection well; with the exact location of single wells or the Section, Township, and Range location of multiple wells;
- (3) The formation name and depth with expected maximum injection rates and pressures; and,
- (4) A notation that interested parties must file objections or requests for hearing with the Oil Conservation Division, 1220 South St. Francis Dr., Santa Fe, New Mexico 87505, within 15 days.

NO ACTION WILL BE TAKEN ON THE APPLICATION UNTIL PROPER PROOF OF NOTICE HAS BEEN SUBMITTED.

NOTICE: Surface owners or offset operators must file any objections or requests for hearing of administrative applications within 15 days from the date this application was mailed to them.

CURRENT STATUS
11/15/2015



Casing Information				
Label	1	2	3	4
Type	Conductor	Surface	Intermediate	Production
OD	20"	13.375"	8.625"	5.500"
WT	0.438"	0.38"	0.352"	0.304"
ID	19.124"	12.615"	7.921"	4.892"
Drift ID	18.936"	12.459"	7.796"	4.767"
COD	21"	14.375"	9.625"	6.050"
Weight	94 lb/ft	54.5 lb/ft	32 lb/ft	17 lb/ft
Grade	H-40, BT&C	J-55, ST&C	J-55, BT&C	M95-110, LT&C
Depth Set	315'	1,783'	3,425'	12,400'
Hole Size	26"	17.500"	12.250"	7.875"
Cement	100 sx + 350 sx HLC + 300 sx "C" + 17 sx	1,050 sx HLC + 300 sx "C" (circ 152 sx)	1st: 420 sx HLC + 250 sx "C" (circ 60 sx) 2nd: 600 sx HLC + 100 sx "C" (circ 110 sx)	2,100 sx
TOC	97'	Surface	Surface	2,000'

LONQUIST

FIELD SERVICE

AUSTIN WRIGHT
HOUSTON SALES

Texas License F-8952

3345 Bee Cave Road, Suite 201
Austin, Texas 78746
Tel: 512 732 9812
Fax: 512 732 9816

OWL SWD Operating, Inc.

Country: USA

Location:

Survey/STR:

Well API No: 30-015-33758

Drawn: MMC

Rev No:

Collinsoscopy Federal #1 - Temp Abandon

State/Province: New Mexico

Site:

Field:

Project No: 1155

Reviewed: SLP

Notes: Configuration for temporarily abandoning wellbore.

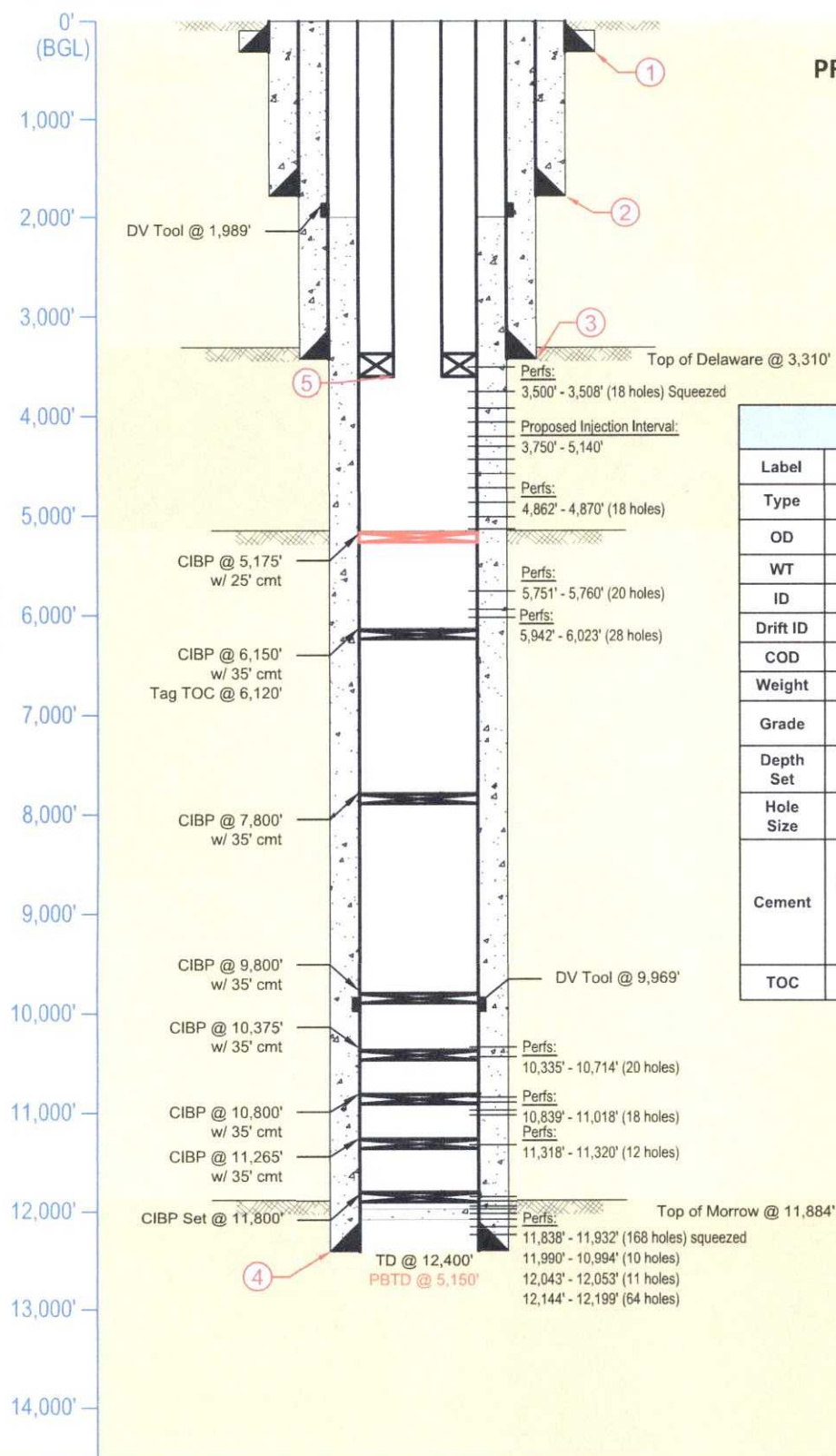
County/Parish: Eddy

Status:

Serial No:

Date: 7/15/2015


Approved: SLP



PROPOSED SWD CONFIGURATION

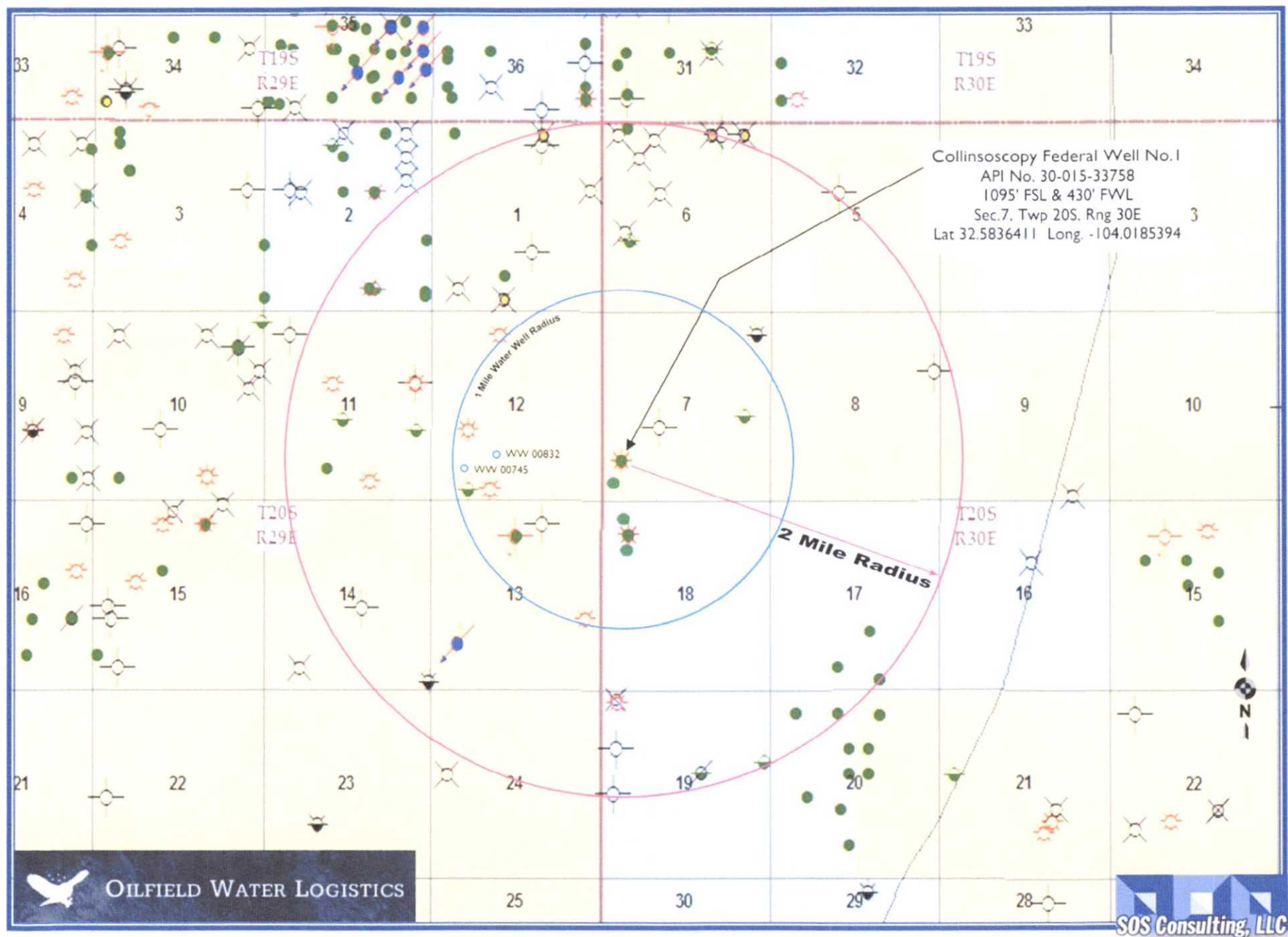
Casing Information				
Label	1	2	3	4
Type	Conductor	Surface	Intermediate	Production
OD	20"	13.375"	8.625"	5.500"
WT	0.438"	0.38"	0.352"	0.304"
ID	19.124"	12.615"	7.921"	4.892"
Drift ID	18.936"	12.459"	7.796"	4.767"
COD	21"	14.375"	9.625"	6.050"
Weight	94 lb/ft	54.5 lb/ft	32 lb/ft	17 lb/ft
Grade	H-40, BT&C	J-55, ST&C	J-55, BT&C	M95-110, LT&C
Depth Set	315'	1,783'	3,425'	12,400'
Hole Size	26"	17.500"	12.250"	7.875"
Cement	100 sx + 350 sx HLC + 300 sx "C" + 17 sx	1,050 sx HLC + 300 sx "C" (circ 152 sx)	1st: 420 sx HLC + 250 sx "C" (circ 60 sx) 2nd: 600 sx HLC + 100 sx "C" (circ 110 sx)	2,100 sx
TOC	97'	Surface	Surface	2,000'

Tubing Information	
Label	5
Type	Production
OD	3.500"
WT	0.216"
ID	3.068"
Drift ID	2.943"
COD	4.500"
Weight	7.7 lb/ft
Grade	L-80, BT&C
Depth Set	3,650'

 <div> <div>FIELD</div> <div>SERVICE</div> </div> <div> <div>AUSTIN</div> <div>HOUSTON</div> </div> <div> <div>WICHITA</div> <div>CALGARY</div> </div>	OWL SWD Operating, Inc.		Collinsoscopy Federal #1 - Proposed	
	Country: USA		State/Province: New Mexico	County/Parish: Eddy
	Location:		Site:	Status:
	Survey/STR:		Field:	Serial No:
	Texas License F-8952		Well API No: 30-015-33758	Project No: 1155
3345 Bee Cave Road, Suite 201 Austin, Texas 78746 Tel: 512.732.9812 Fax: 512.732.9816	Drawn: MMC		Reviewed: RSC	Approved: SLP
	Rev No:		Notes: Proposed configuration. Well being converted to SWD.	

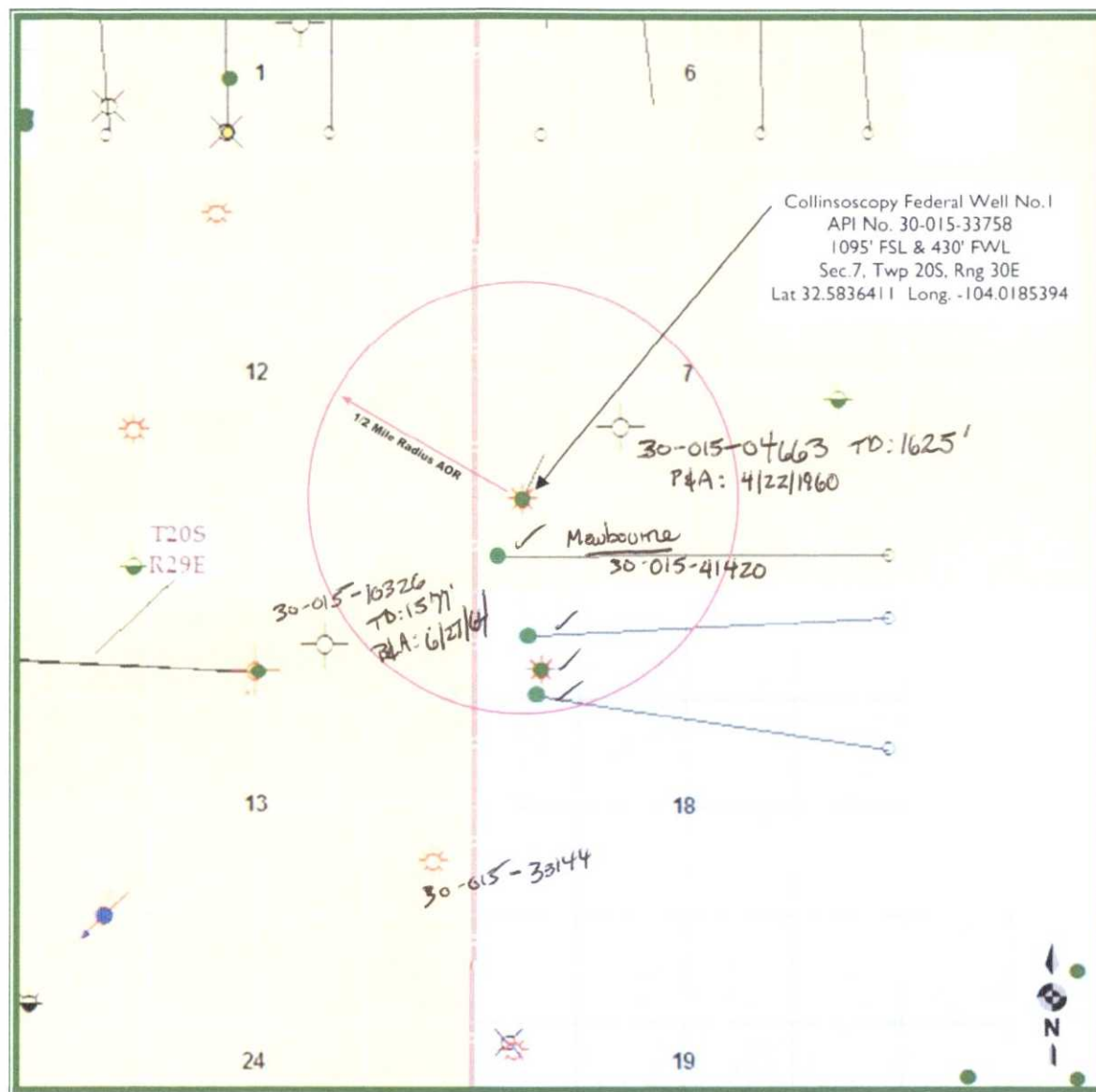
Collinsoscopy Federal Well No.1 - Area of Review / 2 Miles

(Attachment to NMOCD Form C-108 - Item V)



Collinsoscopy Federal Well No.1 - Area of Review / Overview Map

(Attachment to NMOCD Form C-108 - Item V)



~19.7 miles Northeast of
Carlsbad, NM



Eddy County, New Mexico

Form C-108 Item VI - Tabulation of AOR Wells

Top of Proposed DELAWARE Interval 3750'

ALL Wells Penetrate Subject Formation.

API Number	Current Operator	Well Name	Well No.	Type	Lease	Status	ULSTR	Depth	Note
Subject Well									
30-015-33758	[308339] OWL SWD OPERATING, LLC	COLLINSOSCOPY FEDERAL	#001	Gas	Federal	Active	4-7-205-30E	12,400'	3450' PBDT
TA'd DELAWARE (Orig: STRAWN Gas); 20.0" (26.0" hole) @ 315' w/ 767 sx - Circ.; 13.75" (17.5" hole) @ 1783' w/ 1350 sx - Circ. 152 sx; 8.625" (12.25" hole) @ 3425' w/ 1370sx - Circ. 110 sx; 5.5" (8.75" hole) @ 12,400' w/ 2100 sx - TOC @ DV 1969'.									
Section 7 Wells									
30-015-41420	[14744] MEWBOURNE OIL CO	TWO MESAS 7 MP FEDERAL	#001H	Oil	Federal	Active	4-7-205-30E	12,770' MD	
HZNTL Bone Spring Perfs: 8850' - 12,725' (Lateral TVD ~8400'+/-); 20.0" (26.0" hole) @ 285' w/ 854 sx - Circ.; 13.75" (17.5" hole) @ 1764' w/ 1300 sx - Circ. 94 sx to pit; 9.625" (12.25" hole) @ 3450' w/ 1330sx - Circ.; 7.0" (8.75" hole) @ 8788' w/ 1000 sx - Circ. 72 sx pit; 4.5" LNR 8514' to 12,738' w/ 20 PKRs & liner hanger.									
Section 18 Wells									
30-015-32958	[229137] COG OPERATING LLC	COINFLIP STATE	#001	Oil	State	Active	1-18-205-30E	9365' PBDT	
BONE SPRING Perfs: 6602' - 6943'; 20.0" (26.0" hole) @ 300' w/ 650 sx - Circ. 166 sx; 13.75" (17.5" hole) @ 1439' w/ 1100 sx - circ. 170 sx to pit; 8.625" (12.25" hole) @ 3684' w/ 2750sx - Circ. 100 sx; 5.5" (7.875" hole) @ 12280' w/ 2350 sx - Circ. 25 sx; FCBP @ 7400' (PZ Lwr BS); CIBP @ 9400' W/ 35' cap (PZ Strawn); CIBP @ 11,225' w/ 35' cmt cap (PZ Atoka).									
30-015-41937	[229137] COG OPERATING LLC	COINFLIP STATE COM	#002H	Oil	State	Active	1-18-205-30E	12,343' MD	
HZNTL Bone Spring Perfs: 8624' - 12,243' (Lateral TVD ~8450'+/-); 13.75" (17.5" hole) @ 1535' w/ 1300 sx - Circ.; 9.625" (12.25" hole) @ 3402' w/ 2050sx - Circ. 147 sx; 5.5" w/XO @ 7813' & 7.0" (8.75" hole) @ 12,338' w/ 2550 sx - Circ. 240 sx.; Perf @ 7710' & Sqz w/ 600 sx. Drill out to TD.									
30-015-41938	[229137] COG OPERATING LLC	COINFLIP STATE COM	#003H	Oil	State	Active	1-18-205-30E	12,607' MD	39205
HZNTL Bone Spring Perfs: 8637' - 12,600' (Lateral TVD ~8450'+/-); 13.75" (17.5" hole) @ 1533' w/ 1850 sx - Circ. 103 sx to pit; 9.625" (12.25" hole) @ 3430' w/ 2400sx - Circ. 235 sx; 7.0" (8.75" hole) @ 12,650' w/ 2450 sx - Circ.									

SUMMARY: 4 wells penetrate proposed disposal interval. 0 P&A.



C-108 ITEM VII – PROPOSED OPERATION

Collinsoscopy Federal SWD Well No.1

Commercial SWD Facility

Upon approval of all permits for SWD, operations would begin within 30 days. Completion of the well operations will take six to seven weeks. Facility construction including installation of the tank battery, berms, plumbing and other and associated equipment would be occurring during the same interval but at a different location from the well. In any event, it is not expected for the construction phase of the project to last more than 60 days, depending on availability of contractors and equipment. At the time of this submittal, and subject to the availability of the drilling contractor, the anticipated start date is February 1, 2016.

Configure for Salt Water Disposal

Prior to commencing any work, an NOI sundry(ies) will be submitted to BLM to configure the well for SWD and will detail the completion workover including all work otherwise described above, any change to the procedure noted herein and to perform mechanical integrity pressure test per OCD test procedures. (Notify BLM/NMOCD 24 hours prior.) The casing/tubing annulus will be monitored for communication with injection fluid or loss of casing integrity.

Operational Summary

The SWD facility will be fenced with only the offloading station located outside so that trucks may access for load disposal 24/7.

The well and injection equipment will be a closed system and equipped with pressure limiting devices and volume meters. The annulus, loaded with an inert, anti-corrosion packer fluid, will be monitored for pressure.

The tanks will be equipped with telemetry devices and visual alarms to alert the operator and customers of full tanks or an overflow situation.

Anticipated daily maximum volume is 8,000 bpd and an average of 7,000 bpd at a maximum surface injection pressure of 750 psi (.2 psi/ft gradient) with an average pressure of approximately 577 psi.

Potential releases will be contained and cleaned up immediately. The operator shall repair or otherwise correct the situation within 48 hours before resuming operations. OCD will be notified within 24 hours of any release greater than 5 bbls. If required, remediation will start as soon as practicable. Operator shall comply with 19.15.29 NMAC and 19.15.30 NMAC and applicable BLM rules, as necessary and appropriate.

C-108 - Item VII.4

Water Analysis - Disposal Zone - DELAWARE

(Representative of Delaware Formation Water in Area)

WATER ANALYSIS REPORT

Company : YATES PET.
Address : ARTESIA
Lease : MEDANO BRA V A
Well : 1
Sample Pt. : WELLHEAD

Date : 10-22-90
Date Sampled : 10-19-90
Analysis No. : 1

ANALYSIS		mg/L		* meq/L
1. pH	7.1			
2. H2S	POS			
3. Specific Gravity	1.085			
4. Total Dissolved Solids		115832.4		
5. Suspended Solids		NR		
6. Dissolved Oxygen		NR		
7. Dissolved CO2		NR		
8. Oil In Water		NR		
9. Phenolphthalein Alkalinity (CaCO3)				
10. Methyl Orange Alkalinity (CaCO3)				
11. Bicarbonate	HCO3	207.0	HCO3	3.4
12. Chloride	Cl	68799.0	Cl	1940.7
13. Sulfate	SO4	1750.0	SO4	36.4
14. Calcium	Ca	1480.0	Ca	73.0
15. Magnesium	Mg	268.2	Mg	22.1
16. Sodium (calculated)	Na	43328.2	Na	1884.7
17. Iron	Fe	0.0		
18. Barium	Ba	0.0		
19. Strontium	Sr	0.0		
20. Total Hardness (CaCO3)		4800.0		

PROBABLE MINERAL COMPOSITION

*milli equivalents per Liter	Compound	Equiv wt X meq/L	= mg/L
74: *Ca <----- *HCO3	Ca (HCO3)2	81.0	3.4
----- /----->	CaSO4	68.1	36.4
22: *Mg -----> *SO4	CaCl2	55.5	34.0
----- <-----/	Mg (HCO3)2	73.2	
1885: *Na -----> *Cl	MgSO4	60.2	
----->	MgCl2	47.6	22.1
Saturation Values Dist. Water 20 C	NaHCO3	84.0	
CaCO3 13 mg/L	Na2SO4	71.0	
CaSO4 * 2H2O 2090 mg/L	NaCl	58.4	1884.7
BaSO4 2.4 mg/L			110139

REMARKS:

Petrolite Oilfield Chemicals Group

Respectfully submitted,
L MALLETT

C-108 - Item VII.4

Water Analysis - Source Water – BONE SPRING



Laboratory Analysis

Endurance

Jazzmaster 17 State #4H

Sample Date: 1/31/2014

Lea Co. NM

Requested by: T. Ratliff

Water Analysis Measurements			Cations (+)	mg/L	Anions (-)	mg/L	
Oxygen (mg/L)	1.00	Oil in Water (ppm)	n/a	Barium (Ba)	0	Carbonate (CO ₃)	0
Carbon Dioxide (mg/L)	699.16	Specific Gravity	1.150	Calcium (Ca)	16.440	Bicarbonate (HCO ₃)	36.60
Hydrogen Sulfide (mg/L)	0.0	Total Dissolved Solids (TDS)		Magnesium (Mg)	380	Chloride (mg/L)	118.520
pH	5.7	(mg/L) _{calc}	189.969	Sodium (Na) _{calc}	54.270	Sulfate (SO ₄)	319
Temperature °F	73	Total Hardness (mg/L)	18.000	Iron (Fe)	3.00		
				Manganese (Mn)	0.00		

Scaling Potential: Stiff Davis Scale Indicator (SDI)

1/31/2014											
80° F	0.1										
120° F	---										
200° F	---										

Negative SDI = no scaling potential

Positive SDI = scaling potential (scale can form and precipitate)

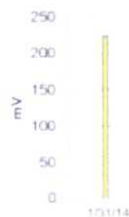
SDI close to zero = borderline scaling potential

Corrosion Potential: ORP Analysis (mV)

1/31/2014											
224.1											

Corrosion Potential Analysis

Negative numbers indicate the potential for severe corrosion.



Red & Negative Corrosion
Yellow & Positive Scale

C-108 – Item VIII

Geologic Information

The Delaware Mountain Group (DMG) of the Delaware Basin comprises of Guadalupian-age arkosic to subarkosic sandstone, siltstone, and detrital limestone that was deposited in deep water, mainly during lowstand and early transgressive sea-level stages. The basin succession is formally divided into the Brushy Canyon, Cherry Canyon, and Bell Canyon Formations (descending order). Stratigraphic divisions within the Delaware Mountain Group are somewhat uncertain due to lithologic similarity and thus a lack of clear boundaries between the major formational intervals.

The Delaware Basin during deposition of the Delaware Mountain Group was a deep-water basin bounded by carbonate-ramp (San Andres and Grayburg) and carbonate-rim (Goat Seep and Capitan) margins that developed on the western edge of the Central Basin Platform, the Northwest Shelf, and the Diablo Platform. The top of the interval is designated by another carbonate, the Lamar limestone included in the Bell Canyon Formation.

The Bell Canyon contains carbonaceous silty sandstone along with clean, fine grained, massive friable sand. The Brushy Canyon and Cherry Canyon intervals consist of the following: (1) very fine to fine-grained arkosic to subarkosic sandstones, mostly massive in character, (2) very fine grained sandstones microlaminated with siltstones, (3) dark-colored organic siltstones (lutites), (4) carbonate beds (limestone or dolomite) more prevalent near shelf margins, and (5) black to dark gray, calcareous shales. Shale is notably rare in the section and is virtually absent from the Brushy Canyon Formation.

Carbonate units (mainly limestone) are present in the upper Cherry Canyon and, especially, Bell Canyon intervals. Porosities and permeabilities in productive intervals range from 12–25% and 1–5 md, respectively, but occasional “streaks” of permeability of up to 200 md are sometimes present. These good porosities indicate a rock that is capable of taking water injection.

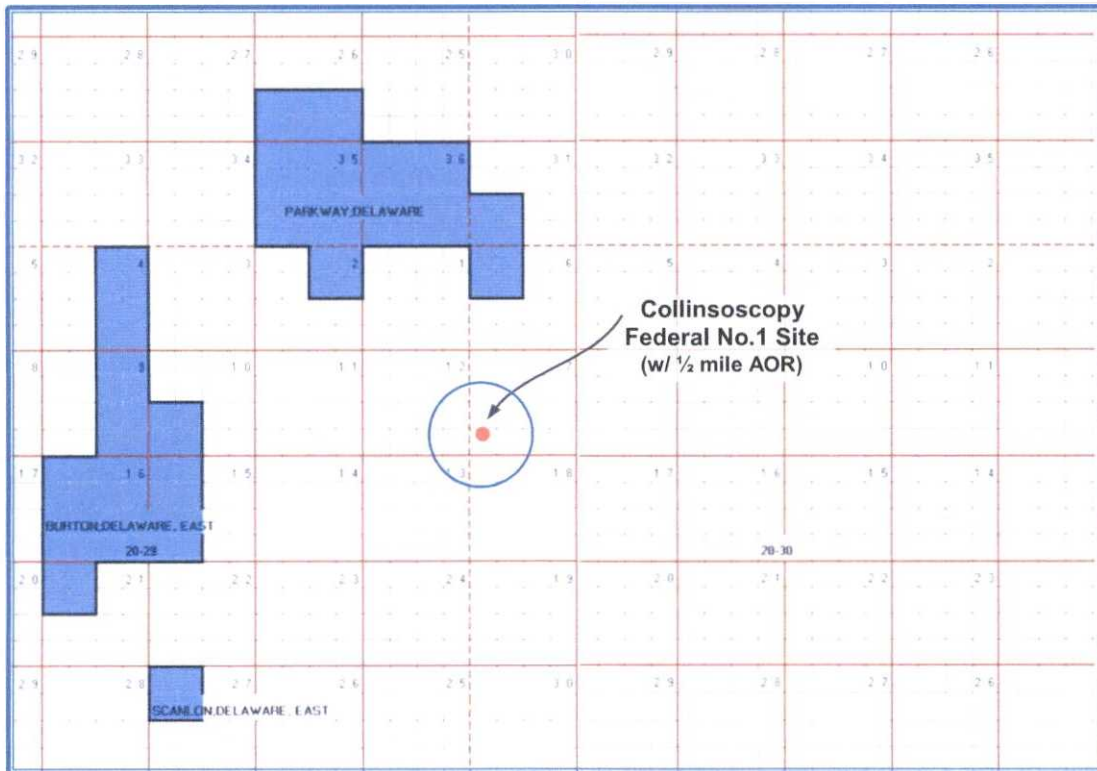
Fresh water in the area is generally available from the Santa Rosa formation. State Engineer’s records show water wells in the area to have an average depth of 100 feet.

There are two (2) water wells located within one mile of the proposed SWD. Analyses will be forward as soon as available.

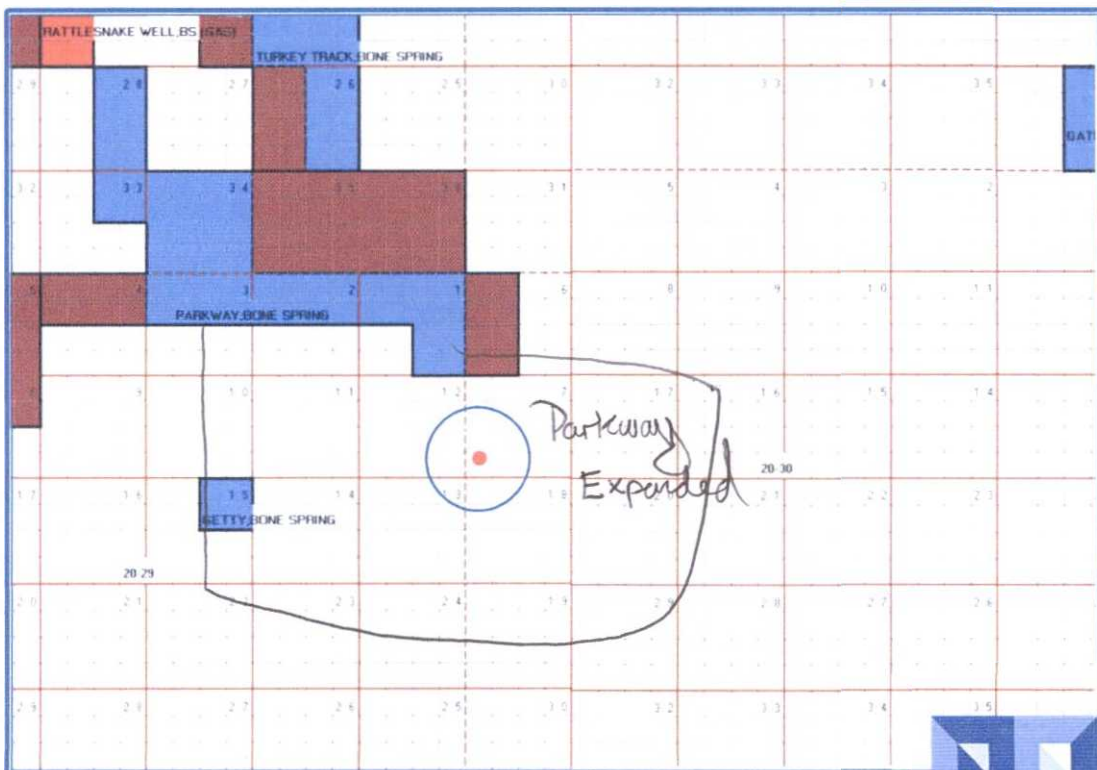
Collinsoscopy Federal Well No.1 – Pool Maps

(Attachment to NMOCD Form C-108, Application for Authority to Inject.)

DELAWARE Pools near proposed SWD.



BONE SPRING Pools near proposed SWD.



C-108 ITEM X – LOGS and AVAILABLE TEST DATA

A log strip from subject well is attached.

LOG STRIP FOLLOWS

HALLIBURTON



DUAL-SPACED NEUTRON SPECTRAL DENSITY

COMPANY	VARBOB ENERGY CORPORATION		
WELL	COLLINSOSCOPY FEDERAL No. 1		
FIELD	BURTON FLAT; MORROW EAST		
COUNTY	EDDY	STATE	NM
API No	30-015-33758		Other Services DLL/MGRD
Location	1095' FSL & 430' FWL		
Sect	7	Twp	20S Rge 30E
Permanent Datum	GROUND LEVEL		Elev. 3310
Log measured from	K.B.	18	ft. above perm datum
Drilling measured from	KELLY BUSHING		Elev. K.B. 3328 D.F. 3327 G.L. 3310
Date	7-FEB-05		
Run No.	ONE		
Depth - Driller	12400		
Depth - Logger	12386		
Bottom - Logged Interval	12300		
Top - Logged Interval	200		
Casing - Driller	8.625 @ 3425		
Casing - Logger	3418		
Bit Size	7.875		
Type Fluid in Hole	BRINE STARCH		
Dens. Visc.	9.9 32		
Ph Fluid Loss	10 N/A		
Source of Sample	FLOW LINE		
Rm @ Meas. Temp.	.089 @ 62 F		
Rmf @ Meas. Temp.	.089 @ 62 F		
Rmc @ Meas. Temp.	N/A @ N/A		
Source Rmf Rmc	MEAS N/A		
Rm @ BHT	0.034 @ 174 F		
Time Since Circ.	02/07 0000		
Time on Bottom	02/07 1015		
Max. Rec. Temp.	174 F @ 12386		
Equip. Location	582 HOBBS		
Recorded By	J. MOUNT		
Witnessed By	B. MAY DOCTOR PROCTO		

RECEIVED
MAY 19 2005
OCC-ARTERIA

Service Ticket No.:	3478641	API Serial No.:	30-015-33758	PGM Version:
CHANGE IN MUD TYPE OR ADDITIONAL SAMPLES				
Date Sample No.		Type Log	Depth	Scale Up Hole
Depth - Driller				Scale Down Hole
Type Fluid				
Dens. Visc.				
Ph Fluid Loss				
Source of Sample				
Rm @ Meas. Temp.		Run No.	Tool Type & No.	Tool Pos.
Rmf @ Meas. Temp.				
Rmc @ Meas. Temp.				
Source Rmf Rmc				
Rm @ BHT				
Rmf @ BHT				
Rmc @ BHT				
RESISTIVITY EQUIPMENT DATA				
EQUIPMENT DATA				
GAMMA		ACOUSTIC		NEUTRON
Run No.	ONE	Run No.	ONE	ONE
Serial No.	108590YL	Serial No.	AD44YL	108772YL
Model No.	NGRT	Model No.	SDL_OA	DSNT-A
Diameter	3.625"	No. of Cart.	4.50"	3.625"
Deflector Model No.	T102-A	Log Type	GAM_GAM	NEU_NEU
Type	SCINT	Source Type	Cs-137	Am241Be

Length	4"	LSA [Y/N]		Serial No	2549GW	Serial No	DSN-90
Distance to Source	11'	FWDA [Y/N]		Strength	* 5Ci	Strength	* 8 5Ci

PAGE 2

GENERAL			GAMMA		ACOUSTIC			DENSITY			NEUTRON			
Run	Depth	Speed	Scale		Scale			Scale			Scale			
No.	From	To	Ft / Min	L	R	L	R	Matrix	L	R	Matrix	L	R	Matrix
ONE	12386	3418	REC	0	100				30%	-10%	2.7*	30%	-10%	LIME
ONE	3418	200	REC	0	100							30%	-10%	LIME

DIRECTIONAL INFORMATION

Maximum Deviation		deg @		KOP	
-------------------	--	-------	--	-----	--

WELLSITE COORDINATES: 32.35 DEG. NORTH AND 104.01 DEG. WEST

Remarks:

TOOLSTRING CONFIGURATION: BRID/FLEX/GR/DSN/SDL/FLEX/DLL/MGRD

ANNULAR HOLE VOLUME CALCULATED USING 5.5" PRODUCTION CASING

LOGGING INTERVALS AS PER CUSTOMER REQUEST

NO AFTER SURVEY CALIBRATIONS PERFORMED AS PER CUSTOMER REQUEST

TD NOT TAGGED ON MAIN PASS AS PER CUSTOMER REQUEST


H.E.S. CREW: A. JURADO, J. RODRIGUEZ

THANK YOU FOR USING HALLIBURTON ENERGY SERVICES (800)844-8451 HOBBS, NM

HALLIBURTON DOES NOT GUARANTEE THE ACCURACY OF ANY INTERPRETATION OF THE LOG DATA. CONVERSION OF LOG DATA TO PHYSICAL ROCK PARAMETERS OR RECOMMENDATIONS WHICH MAY BE GIVEN BY HALLIBURTON PERSONNEL OR WHICH APPEAR ON THE LOG OR IN ANY OTHER FORM. ANY USER OF SUCH DATA, INTERPRETATIONS, CONVERSIONS OR RECOMMENDATIONS AGREES THAT HALLIBURTON IS NOT RESPONSIBLE EXCEPT WHERE DUE TO GROSS NEGLIGENCE OR WILLFUL MISCONDUCT, FOR ANY LOSS, DAMAGES, OR EXPENSES RESULTING FROM THE USE THEREOF.

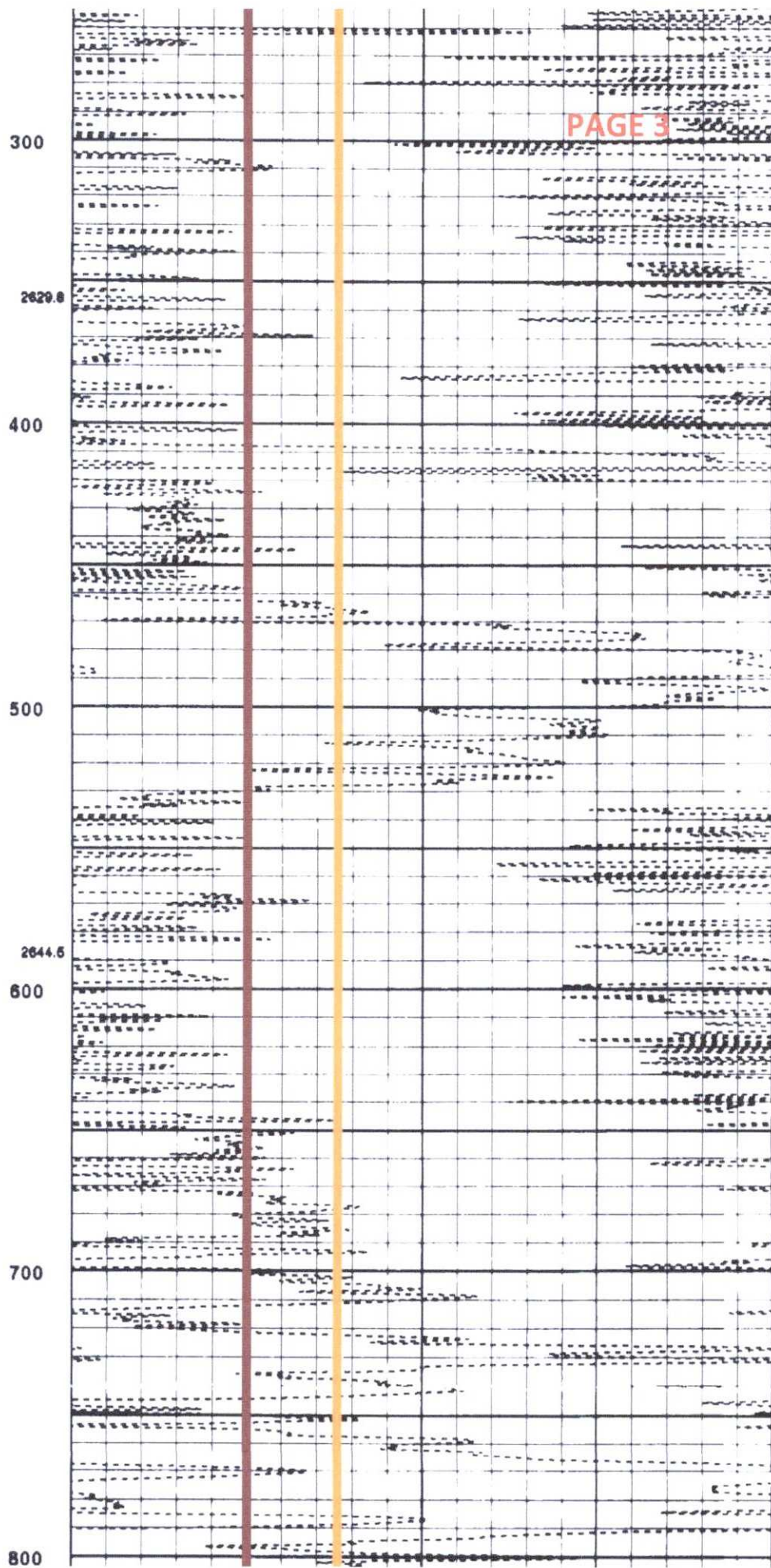
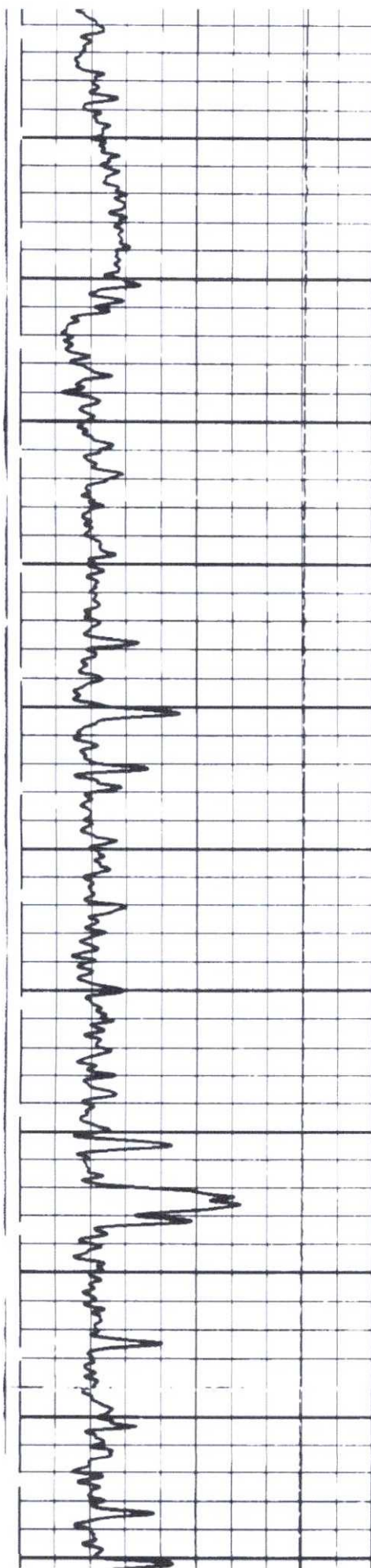
HALLIBURTON

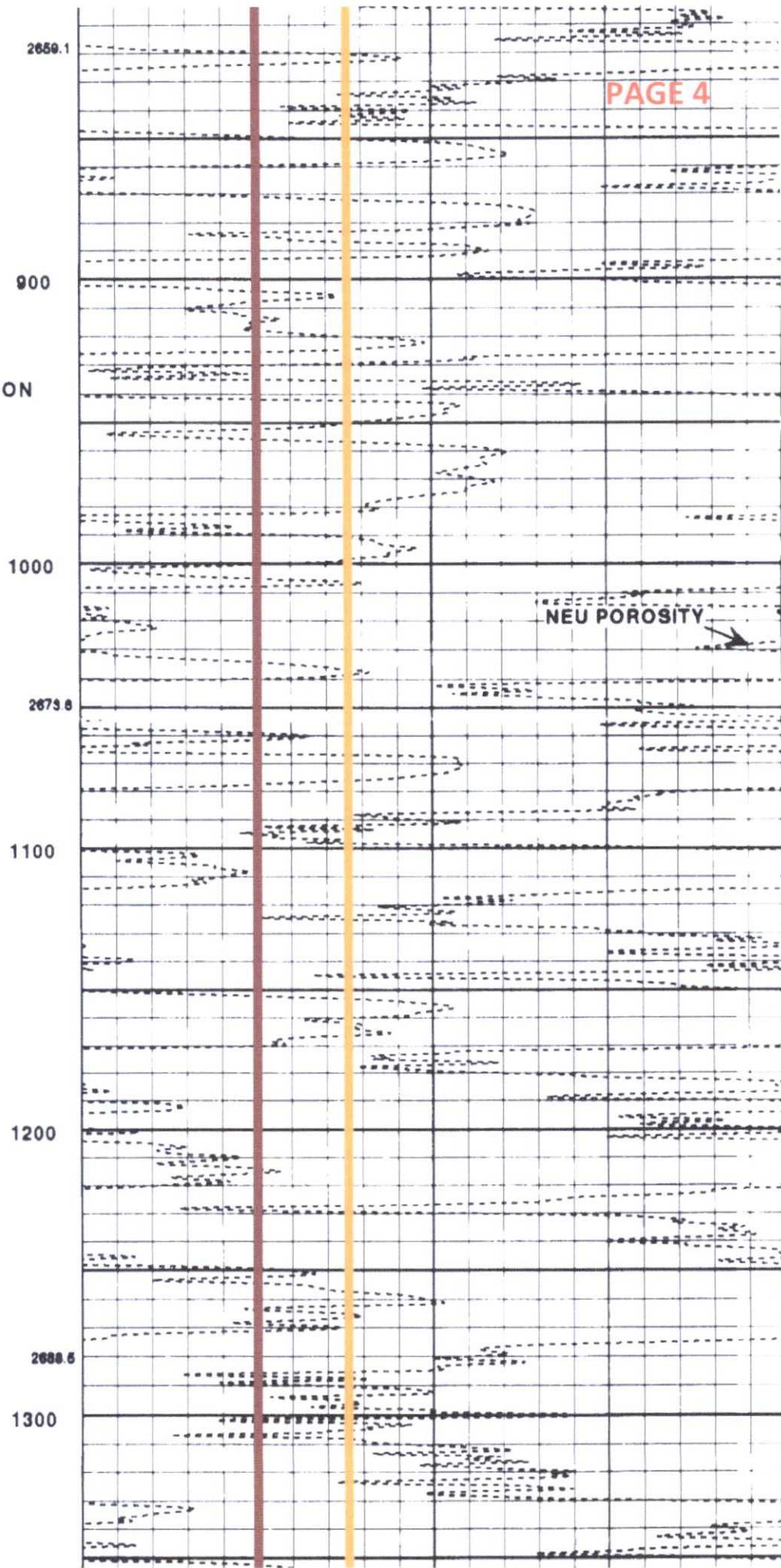
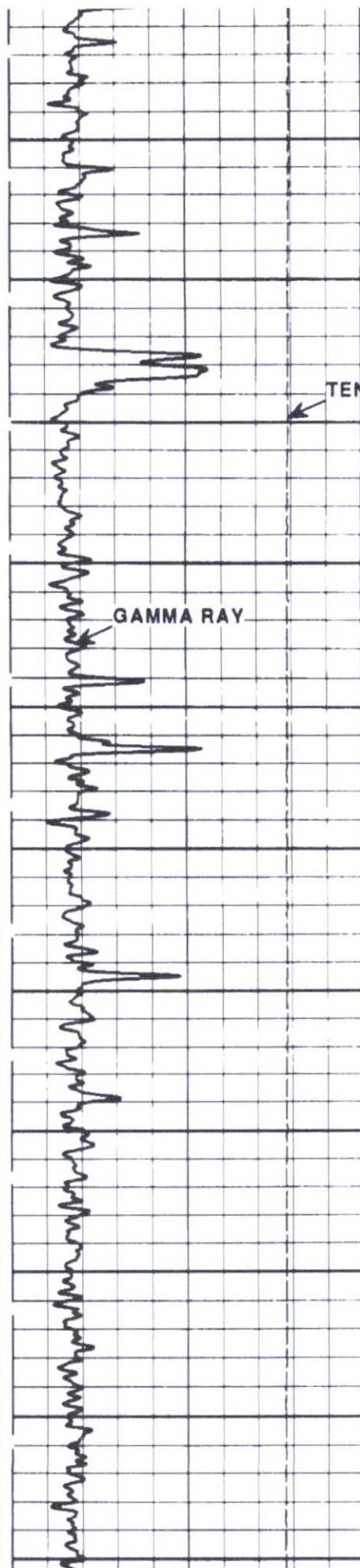
MAIN SECTION (2"=100')

HALLIBURTON 	Version No: 8.6 hc:3.0
	Date File: 0207_0886_s2701.3.cis
	Format File: plot_02_2.spc
	Plot Time: 2005-02-07 17:06:48
	Log Time: 2005-02-07 10:48:08
	Top Depth: 193.76
	Bottom Depth: 12388.25

GAMMA RAY		ANN. VOL. >	NEU POROSITY	
0	API		-10	
SDL CALIPER		TIC=10FT3	% MTX=LIME	
6	INCHES	<HOLE VOL.	BULK DENSITY	
NEAR QUALITY		TIC=10F13	GM/CC	
-4.5		1:600	PE CORR.	
FAR QUALITY		FT.	DENSITY COR.	
4.5			GM/CC	
TENSION				
10000	POUNDS			







Salado

1400

1500

2703.1

1600

Bottom
of salt

1700

2717.6

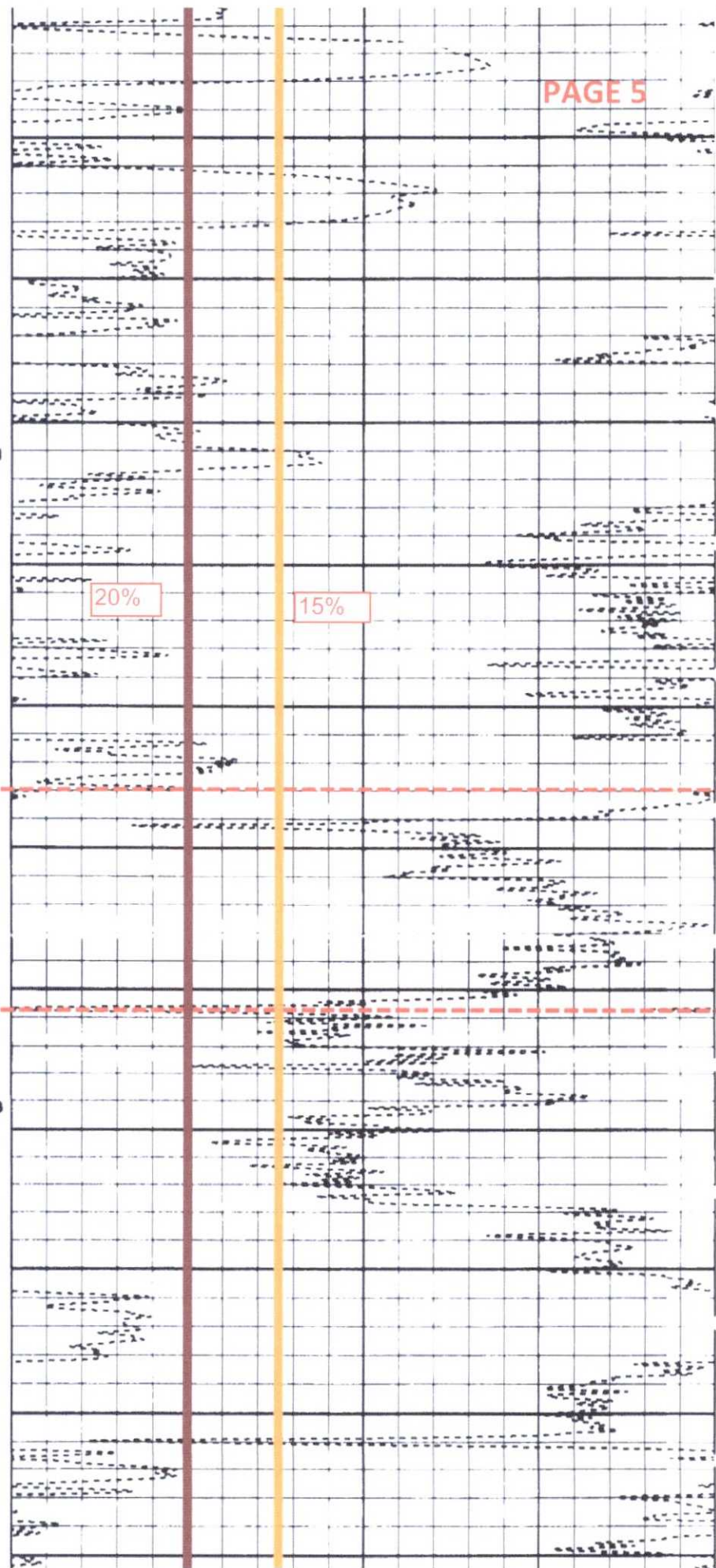
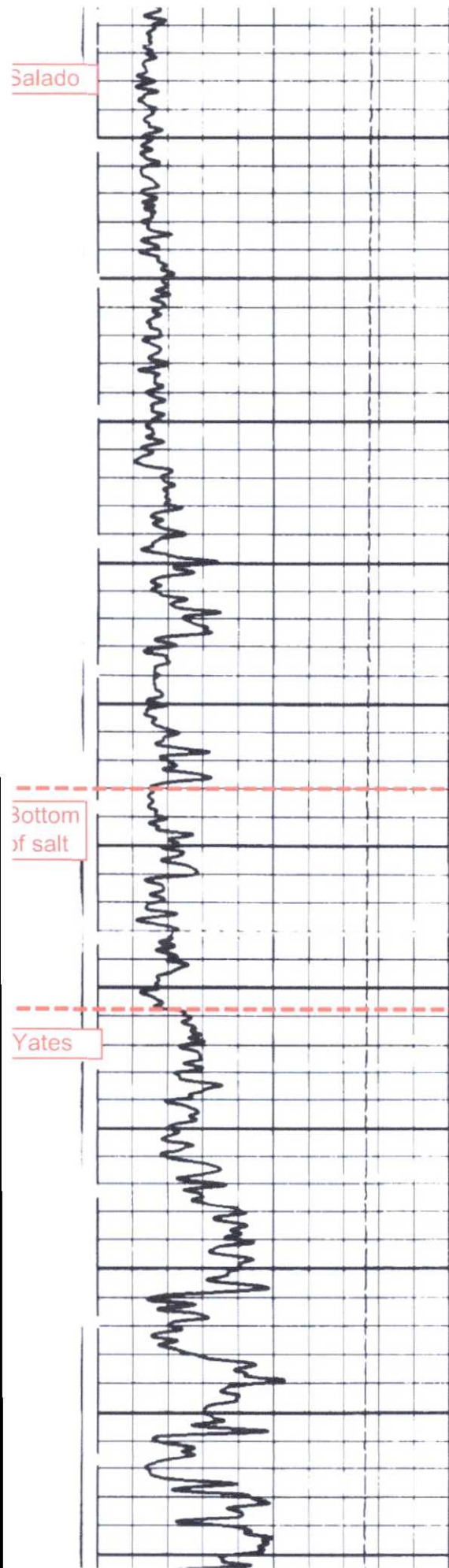
Yates

1800

1900

20%

15%



Seven
Rivers

Capitan
Reef

TENSION

GAMMA RAY

IEU POROSITY

2732.4

2000

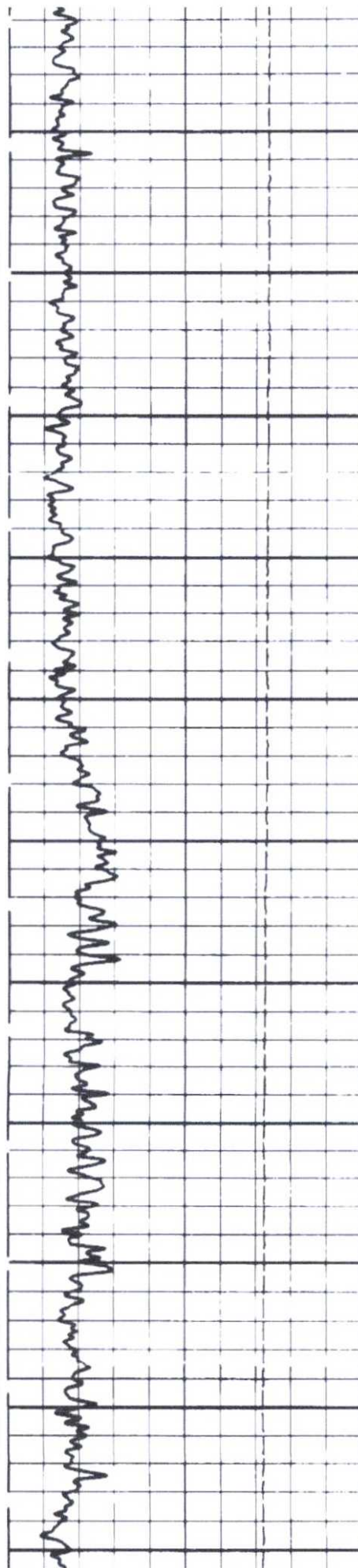
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2200
2147.1

2300

2400

2761.0



2500

2600

2776.4

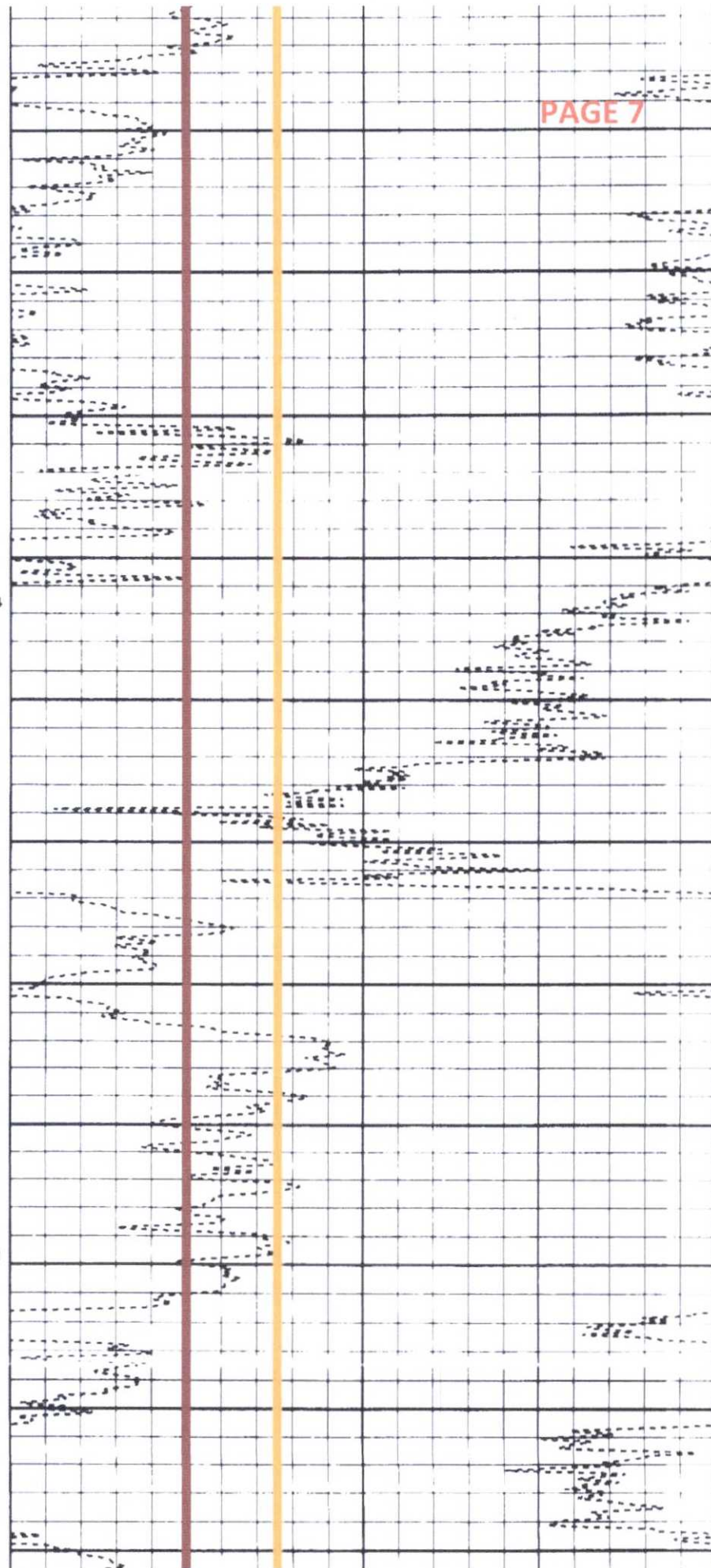
2700

2800

2778.1
2900

3000

PAGE 7



3100

2805.8

3200

3300

2820.4

3400

CASING

TENSION

FAR QUALITY

NEAR QUALITY

DENSITY COR.

SDL CALIPER

HOLE VOL.

BULK DENSITY

GAMMA RAY

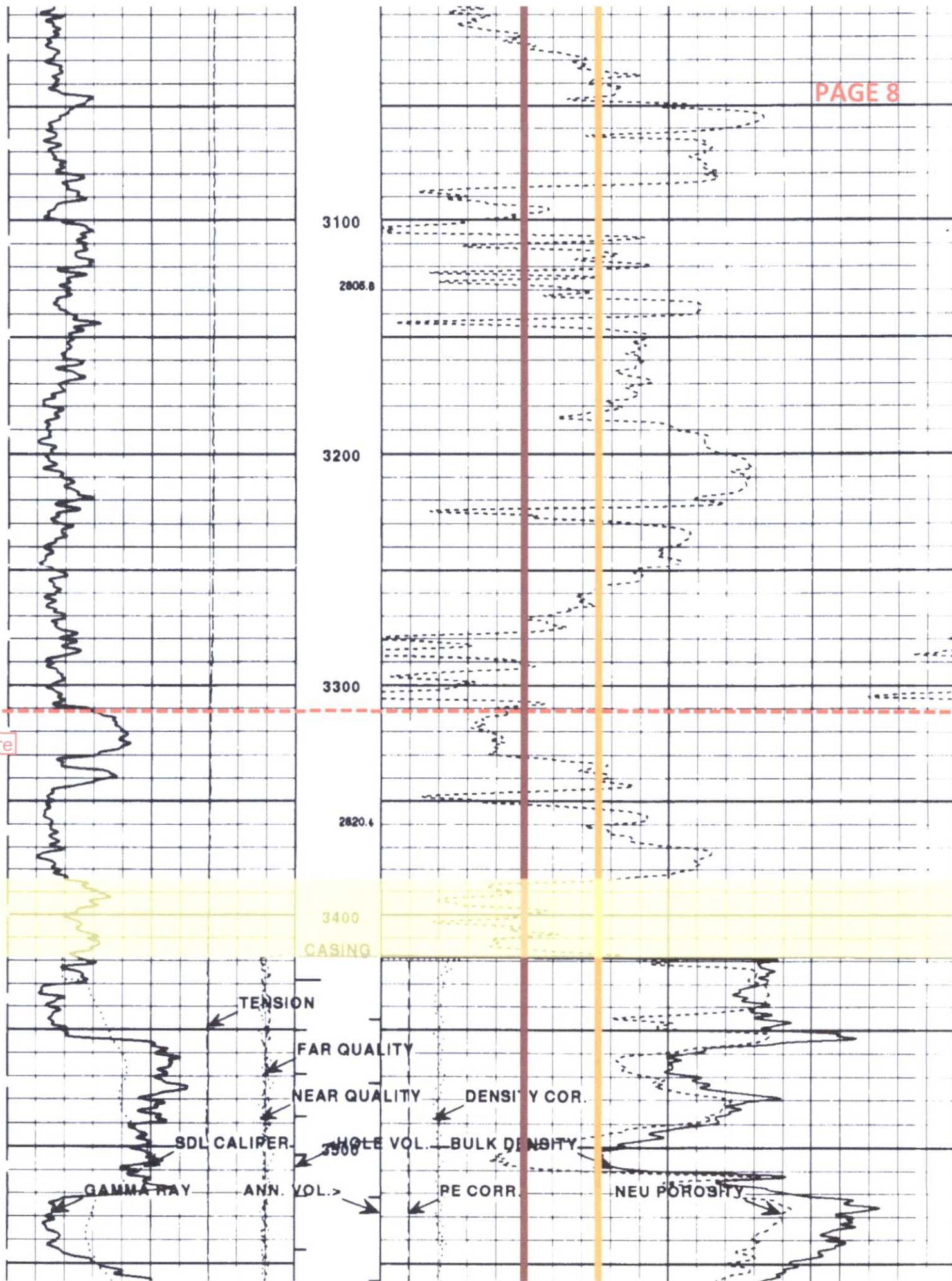
ANN. VOL.

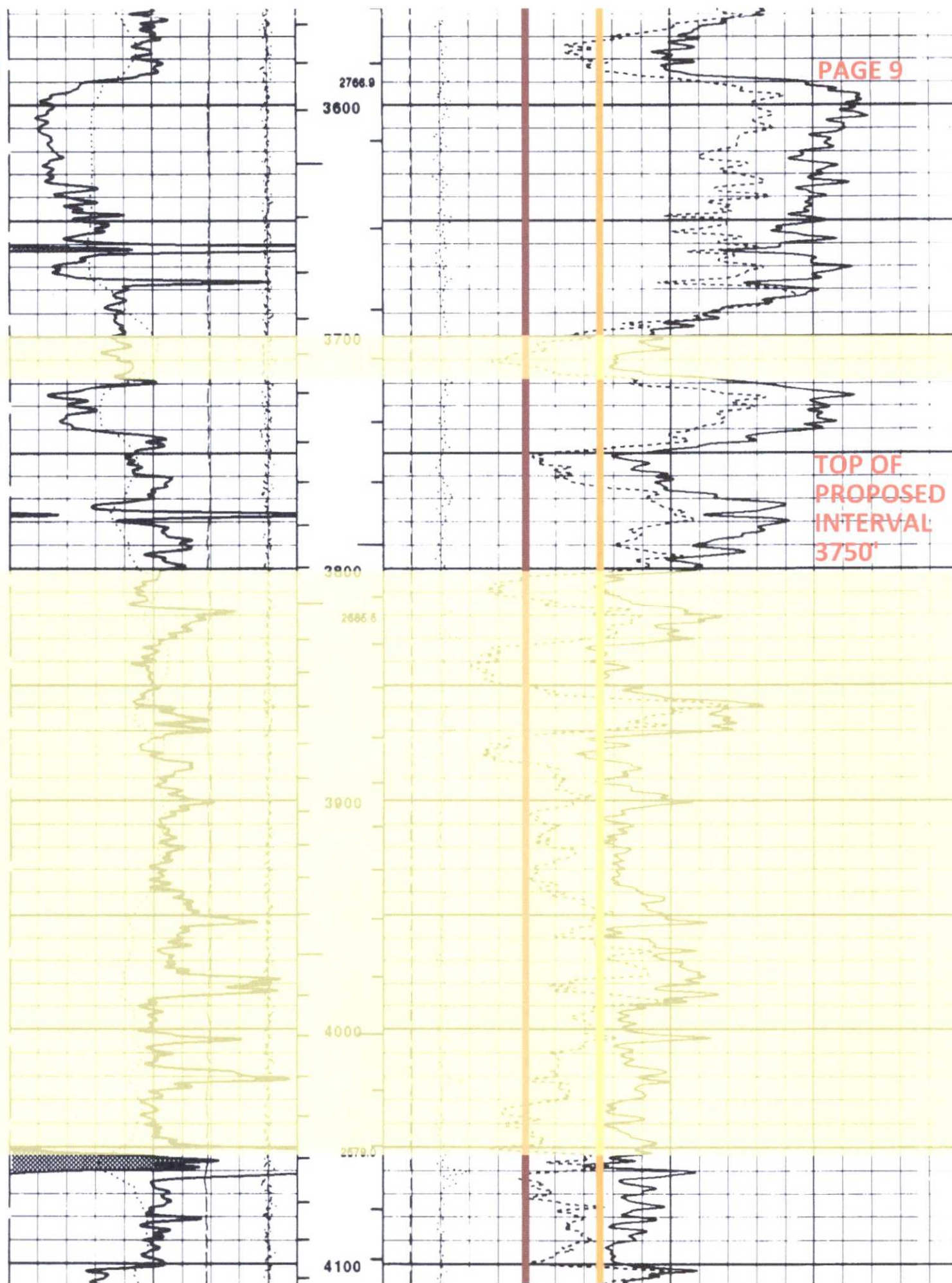
PE CORR.

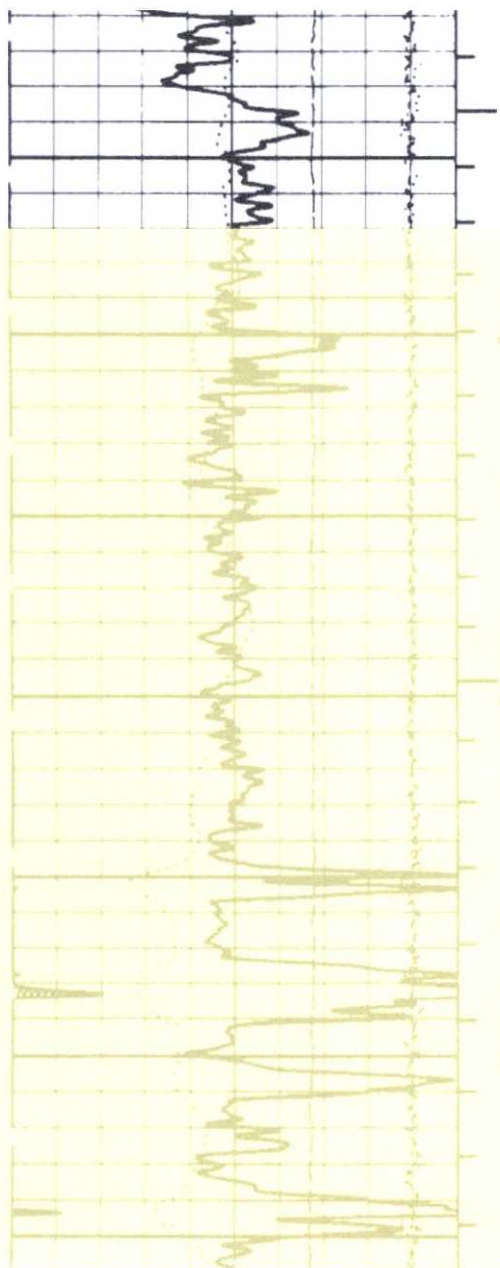
NEU POROSITY

2900

Delaware





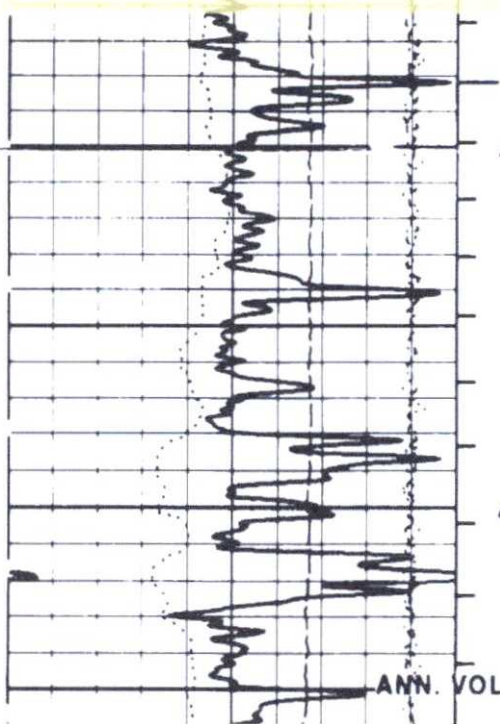
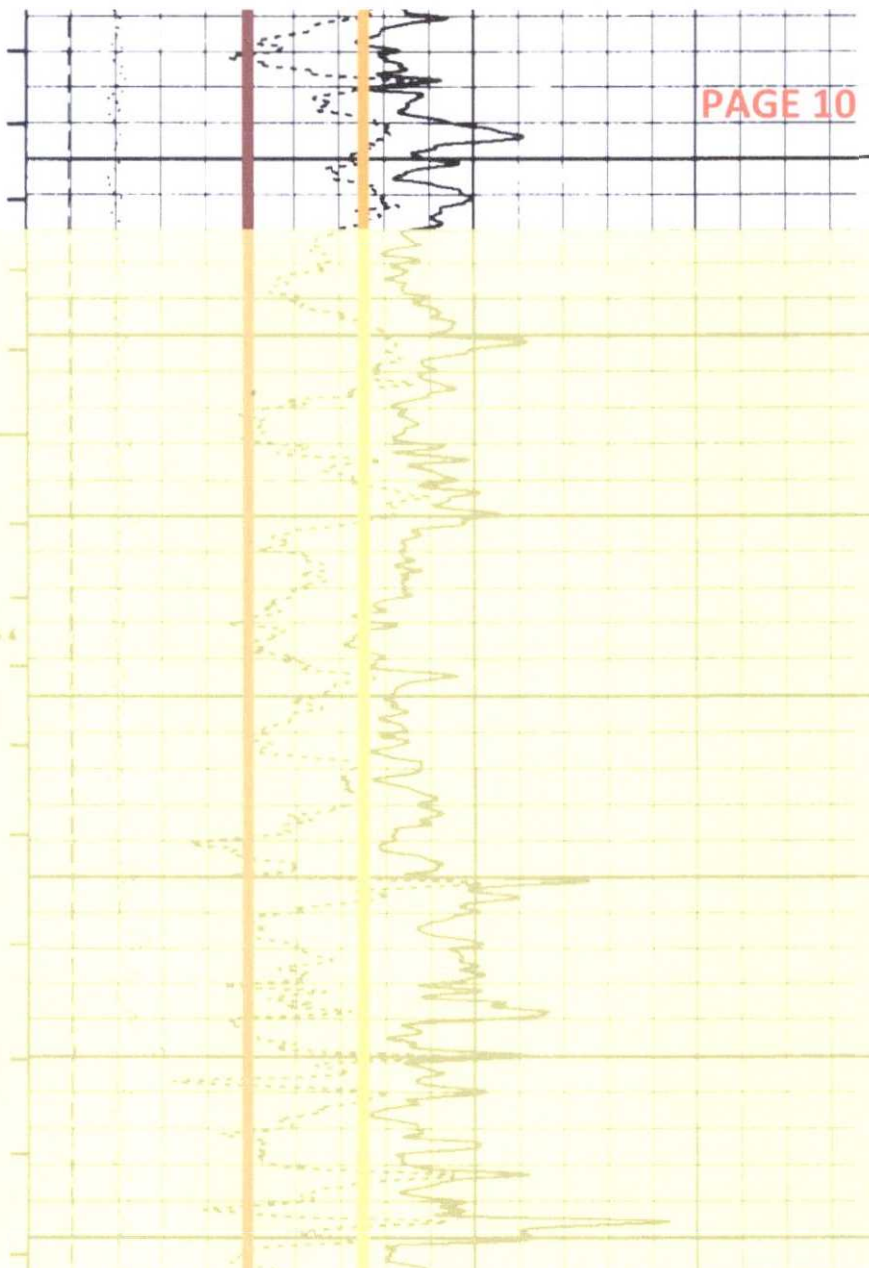


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2474.4

4300

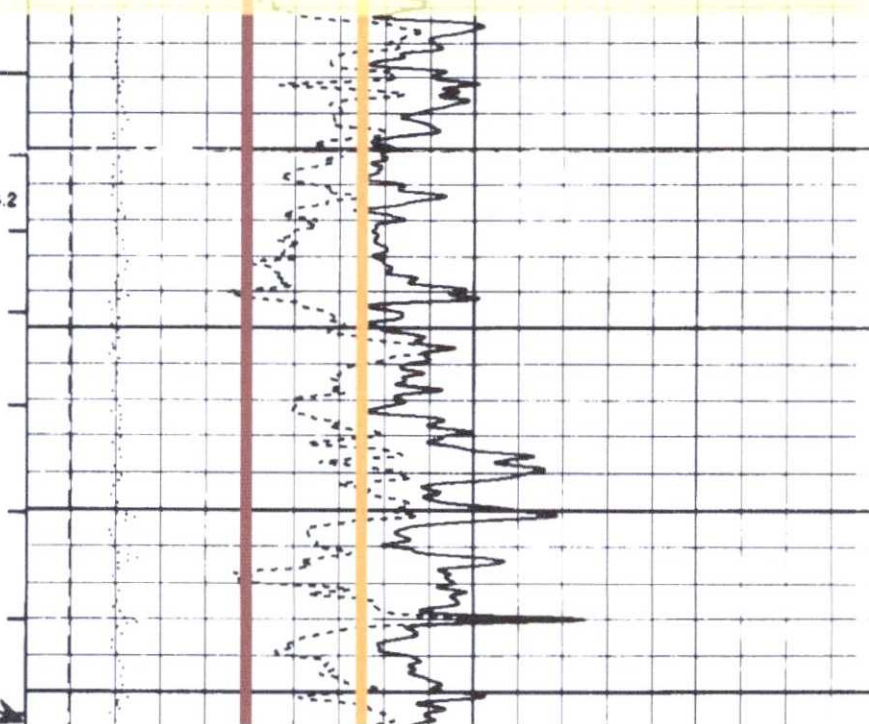
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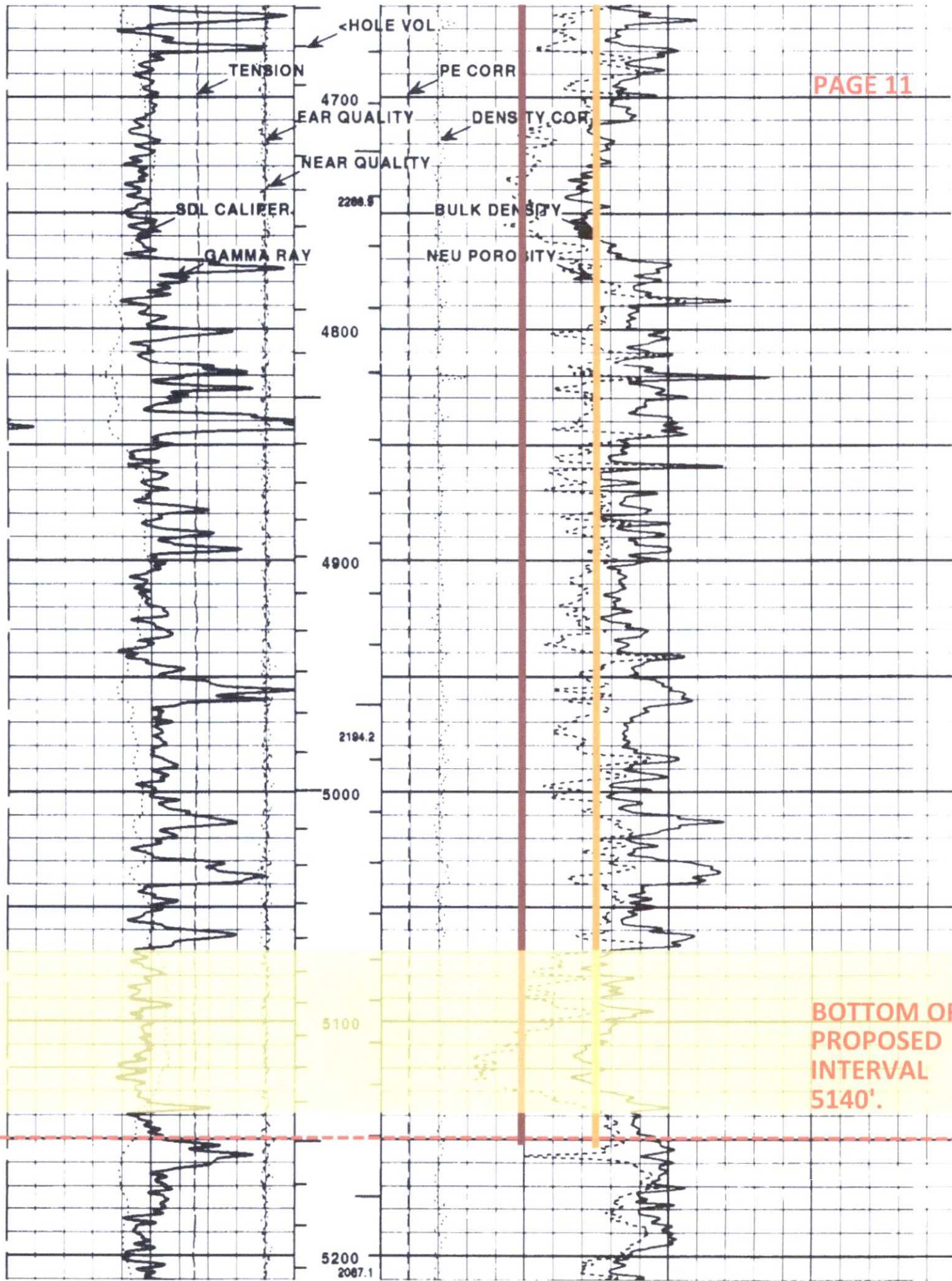
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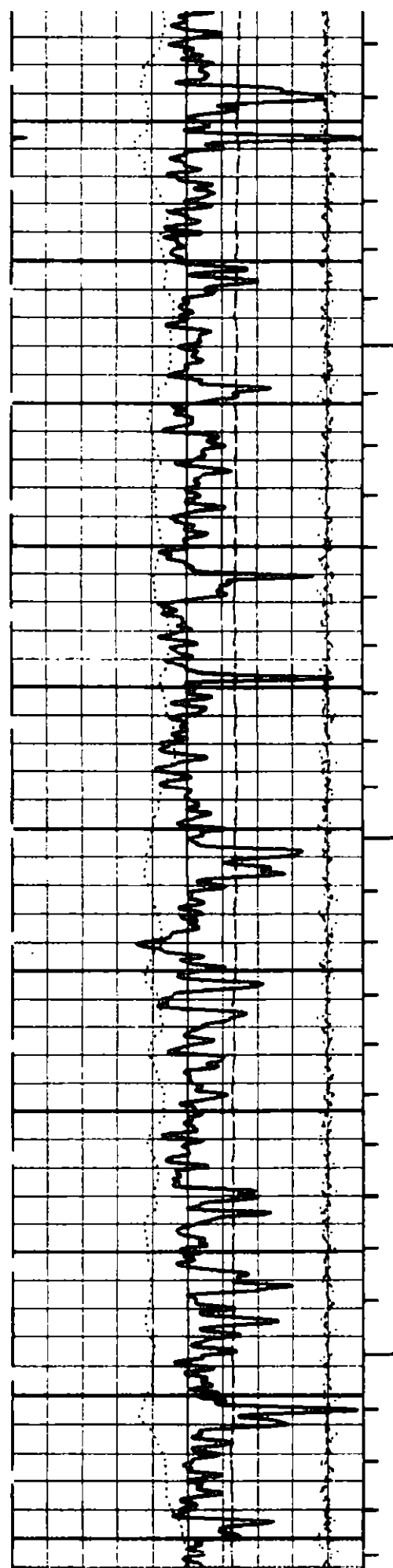
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ANN. VOL. >





5300

5400

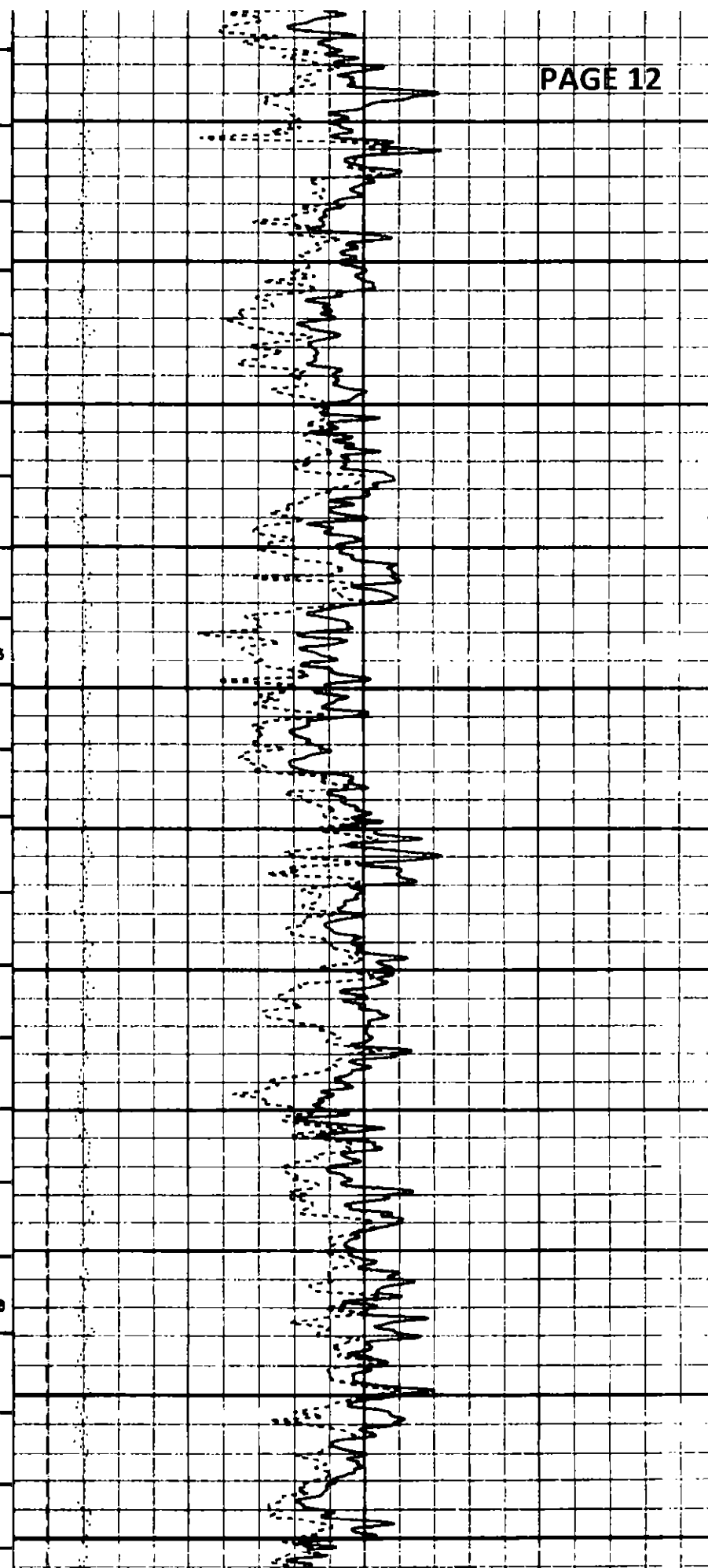
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5600

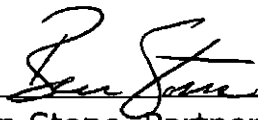
1993.8

5700



C-108 ITEM XII – GEOLOGIC AFFIRMATION

We have examined available geologic and engineering data and have found no evidence of open faults or other hydrologic connection between the disposal interval and any underground sources of drinking water.



Ben Stone, Partner
SOS Consulting, LLC

Project: Owl SWD Operating, LLC
Collinsoscopy Federal No.1
Reviewed 11/23/2015

C-108 ITEM XI – WATER WELLS IN AOR

A search of the State Engineer's database indicates there are 2 water wells within one mile of the proposed salt water disposal well. The well locations are indicated on the 2 Mile AOR Map.

Samples will be taken and the analysis will be forwarded to OCD upon receipt.

(Red rectangle indicates wells located within one mile of subject well.)



New Mexico Office of the State Engineer Active & Inactive Points of Diversion (with Ownership Information)

		(acre ft per annum)																	
WR File Nbr	Sub	basin	Use	Diversion	Owner	County	POD Number	Code	Grant	Source	q	q	q	Sec	Tws	Rng	X	Y	
CP 00740	PRO			3	YATES PETROLEUM CORP.	ED	CP 00740			Shallow	2	3	3	12	20S	29E	590669	3605509*	
CP 00745	PRO			0	YATES PETROLEUM	ED	CP 00745			Shallow	4	1	3	12	20S	29E	590653	3605782	
CP 00832	PLS			3	SNYDER RANCHES	LE	CP 00832			Shallow	2	3	12	20S	29E	590971	3605815*		
CP 01111	PRO			0	CONCHO OIL AND GAS	ED	CP 00745			Shallow	4	1	3	12	20S	29E	590653	3605782	
CP 01112	PRO			0	CONCHO OIL & GAS	ED	CP 00745			Shallow	4	1	3	12	20S	29E	590653	3605782	
CP 01113	PRO			0	BUREAU OF LAND MANAGEMENT	ED	CP 00745			Shallow	4	1	3	12	20S	29E	590653	3605782	

Record Count: 6

PLSS Search:

Section(s): 12, 13 Township: 20S Range: 29E

Sorted by: File Number



New Mexico Office of the State Engineer Active & Inactive Points of Diversion (with Ownership Information)

		(acre ft per annum)																	
WR File Nbr	Sub	basin	Use	Diversion	Owner	County	POD Number	Code	Grant	Source	q	q	q	Sec	Tws	Rng	X	Y	
CP 00834	PLS			3	SNYDER RANCHES	LE	CP 00834			Shallow	2	3	06	20S	30E	592566	3607436*		

Record Count: 1

PLSS Search:

Section(s): 6, 7, 8, 18 Township: 20S Range: 30E

Sorted by: File Number

*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

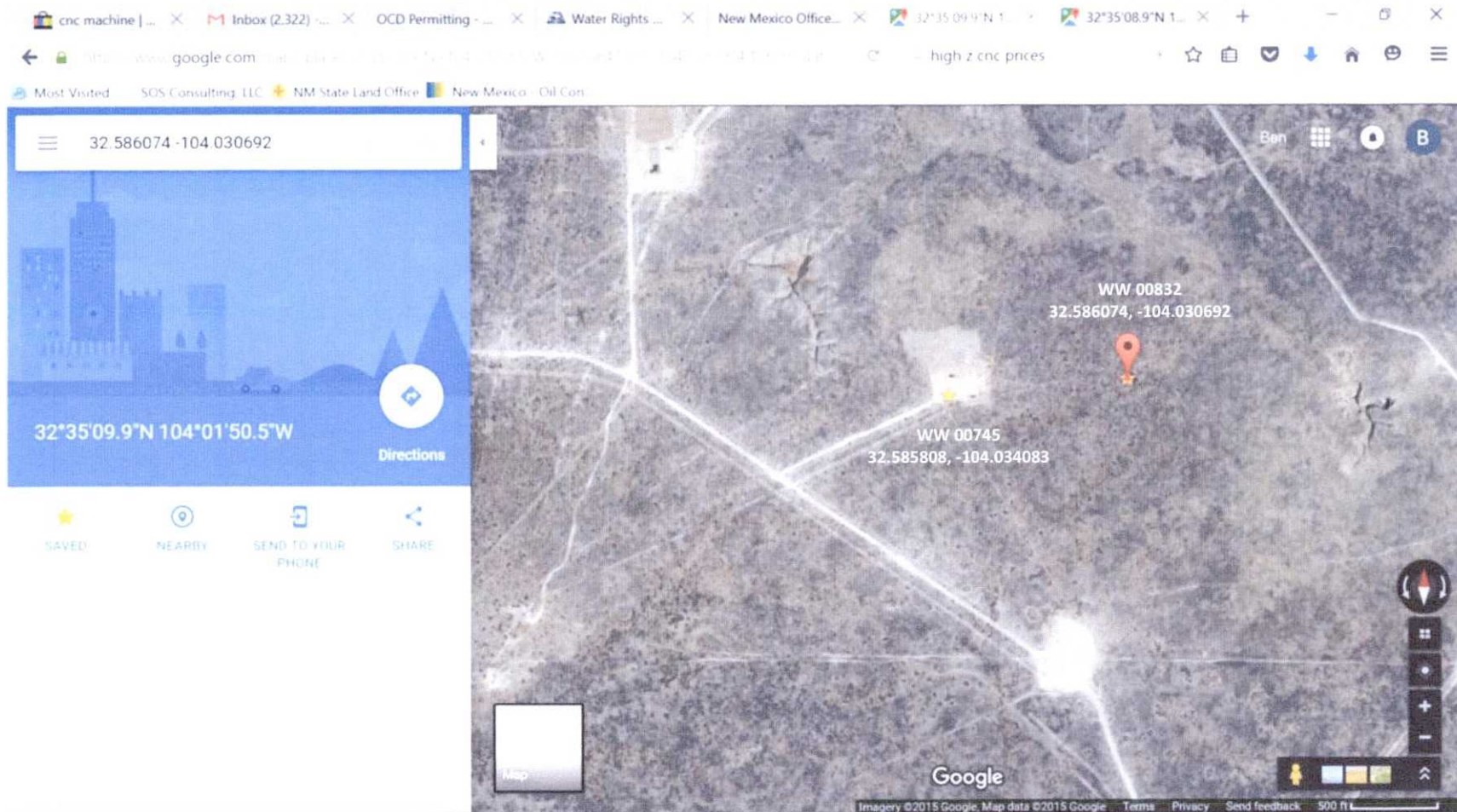
10/15/15 2:45 PM

Page 1 of 1

ACTIVE & INACTIVE POINTS OF DIVERSION

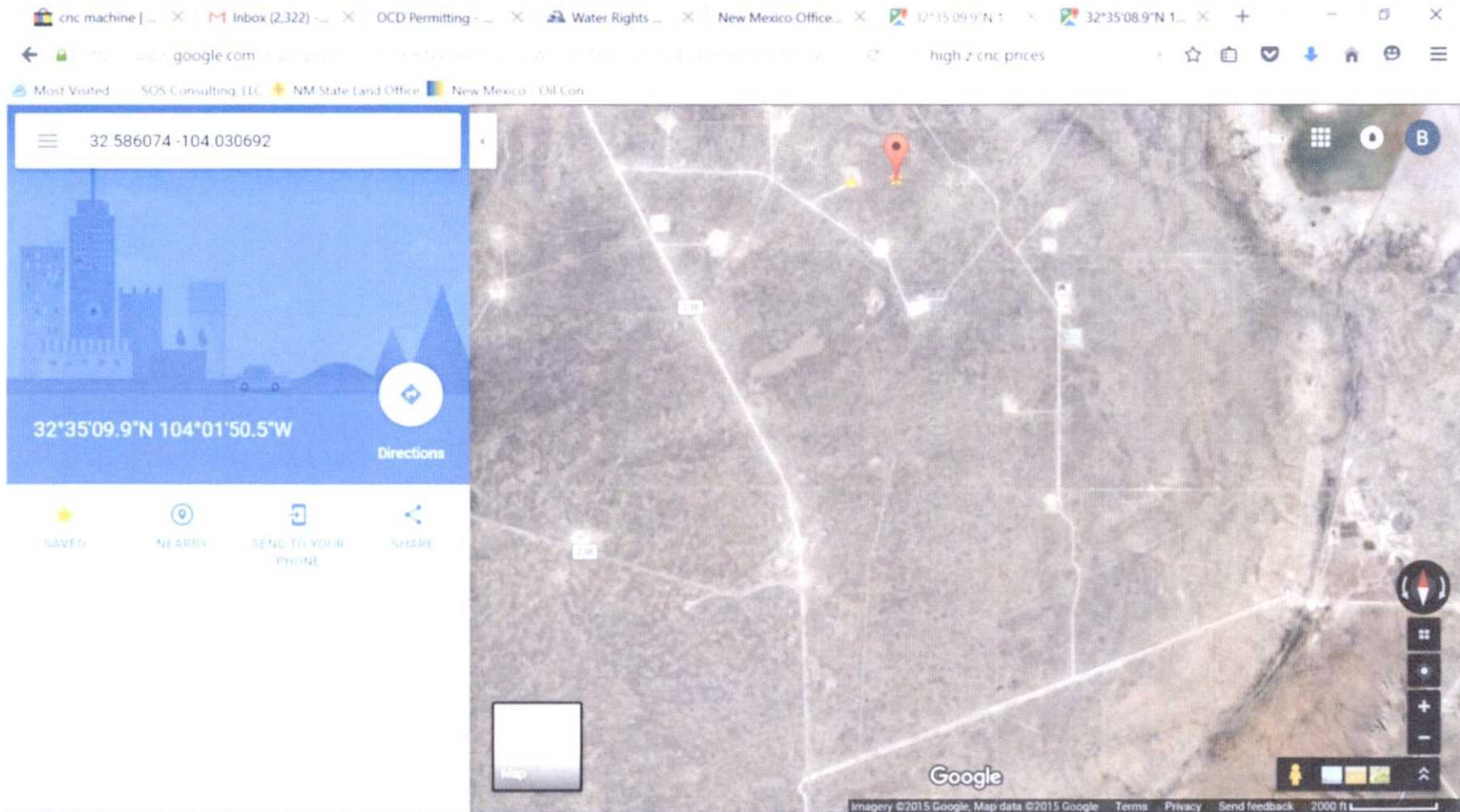
C-108 ITEM XI – WATER WELLS IN AOR

COLLINSOSCOPY FEDERAL NO.1 - WATER WELLS WITHIN ONE MILE



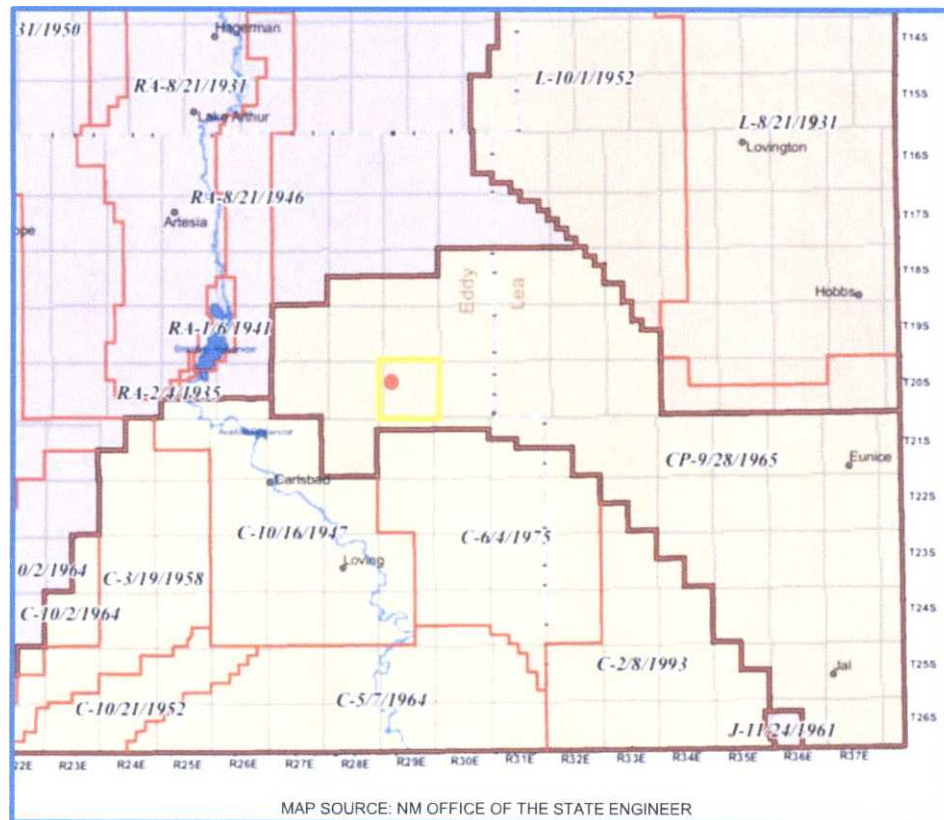
C-108 ITEM XI – WATER WELLS IN AOR

COLLINSOSCOPY FEDERAL NO.1 – LOCATION & ACCESS ROUTES TO WATER WELLS



C-108 - Item XI

Groundwater Basins - Water Column / Depth to Groundwater



The subject well is located within the Capitan Basin, 1-1/2 townships north of the Carlsbad Basin.

Fresh water in the area is generally available from the Santa Rosa formation. State Engineer's records show water wells in 12-20S-29E with an average depth to water at 80 feet.

There are two (2) water wells located within one mile of the proposed SWD. Analyses will be forwarded as soon as available.



New Mexico Office of the State Engineer

Water Column/Average Depth to Water

(A CLW##### in the
POD suffix indicates the
POD has been replaced
& no longer serves a
water right file.)

(R=POD has
been replaced,
O=orphaned,
C=the file is
closed)

(quarters are 1=NW 2=NE 3=SW 4=SE)
(quarters are smallest to largest)

(NAD83 UTM in meters)

(In feet)

POD Number	POD Sub-Code	basin	County	Q 64	Q 16	Q 4	Sec	Tws	Rng	X	Y	Depth Well	Depth Water	Water Column
C 03265 POD1	CUB	ED		1	1	3	20	20S	29E	584052	3602648*	89	52	37
CP 00698		ED		2	3	1	03	20S	29E	587445	3608005			
CP 00698	C	ED		2	3	1	03	20S	29E	587445	3608005			
✓ CP 00740		ED		2	3	3	12	20S	29E	590669	3605509*	150		
CP 00743 POD1		ED		2	4	05	20S	29E	585319	3607382*		160		
CP 00745		ED		4	1	3	12	20S	29E	590653	3605782	232		
CP 00759		ED		4	2	28	20S	29E	586984	3601360*		205	90	115
CP 00830		LE		2	1	04	20S	29E	586118	3608193*		120		
CP 00831		LE		2	2	10	20S	29E	588548	3606605*		100		
✓ CP 00832		LE		2	3	12	20S	29E	590971	3605815*		200		
CP 00833		LE		1	2	16	20S	29E	586548	3604978*		100		
CP 00936 POD1		ED		3	4	2	30	20S	29E	583661	3601238*	70	52	18
CP 01201 POD1		ED		2	2	1	18	20S	29E	582983	3605121	119	49	70
CP 01202 POD1		ED		4	4	3	26	20S	29E	589577	3600494	173	158	15

Average Depth to Water: **80 feet**

Minimum Depth: **49 feet**

Maximum Depth: **158 feet**

Record Count: 14

PLSS Search:

Township: 20S

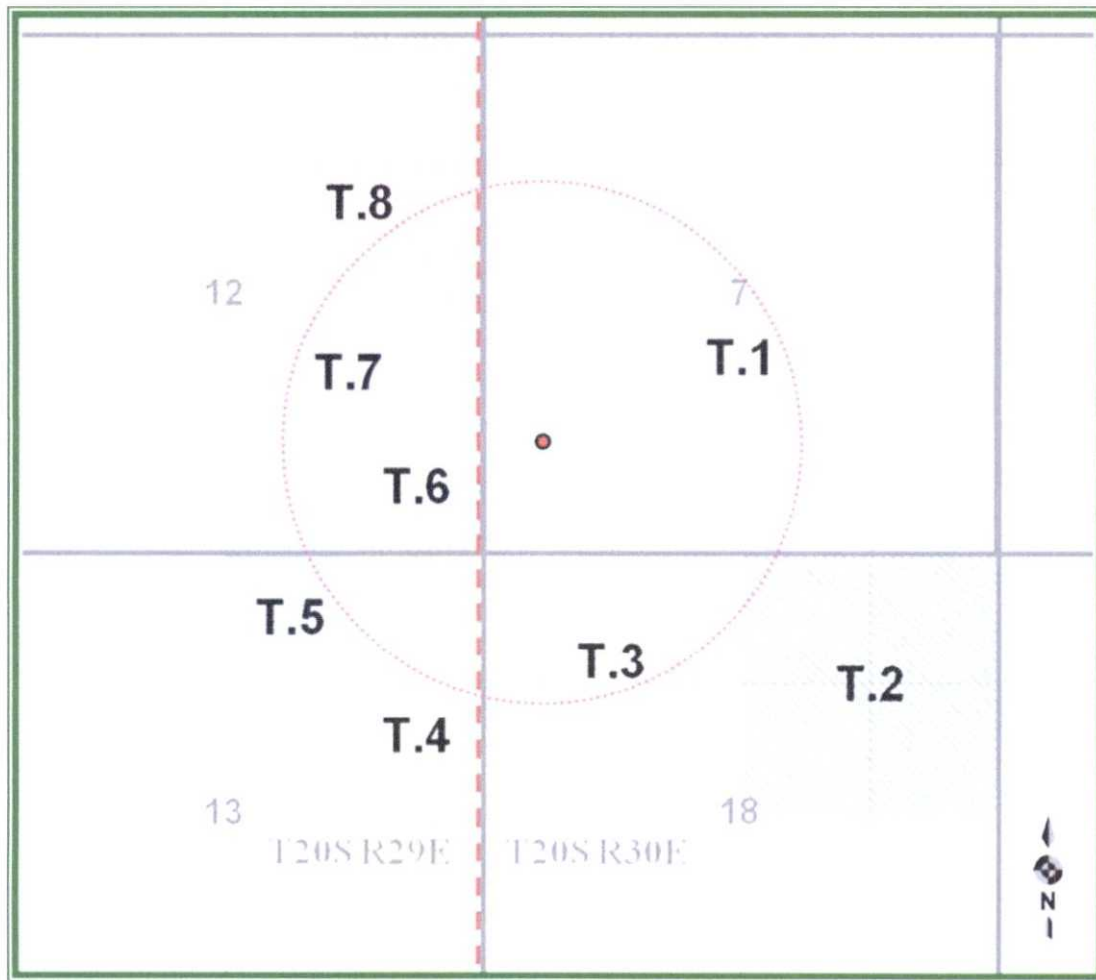
Range: 29E

*UTM location was derived from PLSS - see Help

The data is furnished by the NMOSE/ISC and is accepted by the recipient with the expressed understanding that the OSE/ISC make no warranties, expressed or implied, concerning the accuracy, completeness, reliability, usability, or suitability for any particular purpose of the data.

Collinsoscopy Federal No.1 - Leasehold Plat

(Attachment to NMOCD Form C-108, Application for Authority to Inject.)



Owl SWD Operating, LLC

LEGEND

- T.1 – NMNM-112273 – COG Operating, LLC
- T.2 – V0-8444-0000 – VF Petroleum
- T.3 – V0-5391-0003 – COG Operating, LLC
- T.4 – NMNM-110350 – COG Operating, LLC
- T.5 – NMNM-0555546 – Occidental Permian, LP
- T.6 – NMNM-0313550 – Occidental Permian, LP
- T.7 – NMNM-0120863 – Occidental Permian, LP
- T.8 – NMNM-015882 – Marigold, LLLP

**C-108 ITEM XIII – PROOF OF NOTIFICATION
INTERESTED PARTIES LIST**

SURFACE OWNER

U.S. DEPARTMENT OF INTERIOR (FedEx'ed Copy)
Bureau of Land Management
Oil & Gas Division
620 E. Greene St.
Carlsbad, NM 88220

OFFSET MINERALS LESSEES and OPERATORS (All Notified via USPS Certified Mail)

BLM Leases NMNM-112273; NMNM-110350; State Lease V0-5391-0003
(T.1, T.3 and T.4 on attached plat.)

- Lessee/Operator***
- 1 COG OPERATING, LLC
Attn: Jim Bob Burnett
2208 W. Main St.
Artesia, NM 88210
- Operator***
- 2 MEWBOURNE OIL COMPANY
P.O. Box 5270
Hobbs, NM 88241

State Lease V0-8444-0000
(T.2 on attached plat.)

- Lessee***
- 3 V-F PETROLEUM CORPORATION
P.O. Box 1889
Midland, TX 79702-1889

BLM Leases NMNM-0555546; NMNM-0313550; NMNM-0120863
(T.5, T.6 and T.7 on attached plat.)

- Lessee***
- 4 OCCIDENTAL PERMIAN, LTD
P.O. Box 4294
Houston, TX 77210

BLM Lease NMNM-012211
(T.8 on attached plat.)

- Lessee***
- 5 MARIGOLD, LLLP
105 S. 4th Street
Artesia, NM 88210

**C-108 ITEM XIII – PROOF OF NOTIFICATION
INTERESTED PARTIES LIST (cont.)**

OFFSET MINERALS OWNERS (All Notified via USPS Certified Mail)

NEW MEXICO STATE LAND OFFICE
Commissioner of Public Lands
310 Old Santa Fe Trail
Santa Fe, NM

- 6 U.S. DEPARTMENT OF INTERIOR
Bureau of Land Management
Oil & Gas Division
620 E. Greene St.
Carlsbad, NM 88220

REGULATORY

NEW MEXICO OIL CONSERVATION DIVISION (FedEx'ed original and copy)
1220 S. St. Francis Dr.
Santa Fe, NM 87505

NEW MEXICO OIL CONSERVATION DIVISION (FedEx'ed copy)
811 S. First St.
Artesia, NM 88210

NEW MEXICO STATE LAND OFFICE (FedEx'ed copy)
Commissioner of Public Lands
310 Old Santa Fe Trail
Santa Fe, NM



November 30, 2015

NOTIFICATION TO INTERESTED PARTIES
via U.S. Certified Mail

To Whom It May Concern:

Owl SWD Operating, LLC, Dallas, Texas, has made application to the New Mexico Oil Conservation Division to reconfigure and complete for salt water disposal the Collinsoscopy Federal Well No.1. The proposed SWD will be for commercial use. As indicated in the notice below, the well will be located in Section 7, Township 20 South, Range 30 East in Eddy County, New Mexico.

The disposal interval will be through perforations between a maximum of 3750 feet to 5140 feet in the Delaware formation.

Following is the legal notice published in the Artesia Daily Press, Artesia, New Mexico on or about November 24, 2015.

LEGAL NOTICE

Owl SWD Operating, LLC, 8214 Westchester Dr., Ste.850, Dallas, TX 75255 is filing Form C-108 (Application for Authority to Inject) with the New Mexico Oil Conservation Division for administrative approval to [reenter, plug back and] permit for salt water disposal its Collinsoscopy Federal Well No.1. The well is located 1095' FSL & 430' FWL in Section 7, Township 20 South, Range 30 East in Eddy County, New Mexico. Produced water from area production will be commercially disposed into the Delaware formation through selectively perforated intervals between a maximum applied for top of 3750 feet to maximum depth of 5140 feet based on log analysis. The maximum injection pressure will be 750 psi surface (0.2 psi/ft gradient) and a maximum rate limited only by such pressure. The well may be step-rate tested upon completion to determine if higher pressures are warranted.

Interested parties wishing to object to the proposed application must file with the New Mexico Oil Conservation Division, 1220 St. Francis Dr., Santa Fe, NM 87505, (505)476-3460 within 15 days of the date of this notice. Additional information may be obtained from the applicant's agent, SOS Consulting, LLC, (903)488-9850 or, email info@sosconsulting.us.

You have been identified as a party who may be interested as an offset lessee or operator.

You are entitled to a full copy of the application. A full copy in PDF format on a mini-CD will be arriving within a few days of this notice. If you do not receive it, please call or email SOS Consulting, LLC at 903-488-9850, info@sosconsulting.us, and a copy will be expedited to you and may also be sent via email if preferred.

Thank you for your attention in this matter.

Best regards,

A handwritten signature in black ink, appearing to read "Ben Stone", with a stylized, cursive script.

Ben Stone, SOS Consulting, LLC
Agent for Owl SWD Operating, LLC

Cc: Application File

C-108 - Item XIV

Proof of Notice (Certified Mail Receipts)

502 2846 2000 0490 5102 102 2846 2000 0490 5102 102 2846 2000 0490 5102 102 2846 2000 0490 5102

U.S. Postal Service™ CERTIFIED MAIL® RECEIPT Domestic Mail Only	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>COG OPERATING, LLC</u> <u>Attn: Jim Bob Burnett</u> <u>2208 W. Main St.</u> City, State, Zip <u>Artesia, NM 88210</u> PS Form <u>38</u>	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>OCCIDENTAL PERMIAN, LTD</u> <u>P.O. Box 4294</u> City, State, Zip <u>Houston, TX 77210</u> PS Form <u>38</u>	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>MEWBOURNE OIL COMPANY</u> <u>P.O. Box 5270</u> City, State, Zip <u>Hobbs, NM 88241</u> PS Form <u>38</u>	

U.S. Postal Service™ CERTIFIED MAIL® RECEIPT Domestic Mail Only	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>V-F PETROLEUM CORPORATION</u> <u>P.O. Box 1889</u> City, State, Zip <u>Midland, TX 79702-1889</u> PS Form <u>38</u>	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>MARIGOLD, LLLP</u> <u>105 S. 4th Street</u> City, State, Zip <u>Artesia, NM 88210</u> PS Form <u>38</u>	
For delivery information, visit our website at www.usps.com	
OFFICIAL USE	
Certified Mail Fee \$ <u>3.45</u> Extra Services & Fees (check box, add fee as appropriate) <input type="checkbox"/> Return Receipt (hardcopy) \$ <u>2.75</u> <input type="checkbox"/> Return Receipt (electronic) \$ <u>0.00</u> <input type="checkbox"/> Certified Mail Restricted Delivery \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Required \$ <u>0.00</u> <input type="checkbox"/> Adult Signature Restricted Delivery \$ <u>0.00</u> Postage \$ <u>4.99</u> Total Postage and Fees \$ <u>6.74</u>	COMO TX 75437 NOV 30 2015 Postmark Here
Sent To Street and Apt. <u>BUREAU OF LAND MANAGEMENT</u> <u>Oil & Gas Division</u> <u>620 E. Greene St.</u> City, State, Zip <u>Carlsbad, NM 88220</u> PS Form <u>38</u>	

**C-108 ITEM XIII – PROOF OF NOTIFICATION
Regulatory Filings**

Owl SWD Operating, LLC

Collinsoscopy Federal No.1

C-108 sent 12/03/15

FedEx Tracking Nos.

OCD SF – 7751 1229 7745

OCD Artesia – 7751 1231 6295

BLM – 7751 1226 5794

I hereby certify that a full copy of the subject C-108 application was sent to the applicable regulatory agencies as indicated above.

A handwritten signature in black ink, appearing to read "Ben Stone", with a stylized, cursive script.

Ben Stone, Partner

SOS Consulting, LLC

Agent for Owl SWD Operating, LLC

Affidavit of Publication

No. 23741

State of New Mexico

County of Eddy:

Danny Scott

being duly sworn says that she is the

Publisher

of the Artesia Daily Press, a daily newspaper of General circulation, published in English at Artesia, said county and state, and that the hereto attached

Legal Ad

was published in a regular and entire issue of the said Artesia Daily Press, a daily newspaper duly qualified for that purpose within the meaning of Chapter 167 of the 1937 Session Laws of the state of New Mexico for 1 Consecutive weeks/day on the same

day as follows:

First Publication November 24, 2015

Second Publication

Third Publication

Fourth Publication

Fifth Publication

Sixth Publication

Subscribed and sworn before me this

24th day of November 2015



OFFICIAL SEAL
Latisha Romine
NOTARY PUBLIC-STATE OF NEW MEXICO

My commission expires: 5/12/2019

Latisha Romine

Latisha Romine

Notary Public, Eddy County, New Mexico

Copy of Publication:

LEGAL NOTICE

Owl SWD Operating, LLC, 8214 Westchester Dr., Ste. 850, Dallas, TX 75255 is filing Form C-108 (Application for Authority to Inject) with the New Mexico Oil Conservation Division for administrative approval to [reenter, plug back and] permit for salt water disposal its Collinsoscopy Federal Well No. 1. The well is located 1095' FSL & 430' FWL in Section 7, Township 20 South, Range 30 East in Eddy County, New Mexico. Produced water from area production will be commercially disposed into the Delaware formation through selectively perforated intervals between a maximum applied for top of 3750 feet to maximum depth of 5140 feet based on log analysis. The maximum injection pressure will be 750 psi surface (0.2 psi/ft gradient) and a maximum rate limited only by such pressure. The well may be step-rate tested upon completion to determine if higher pressures are warranted.

Interested parties wishing to object to the proposed application must file with the New Mexico Oil Conservation Division, 1220 St. Francis Dr., Santa Fe, NM 87505, (505)476-3460 within 15 days of the date of this notice. Additional information may be obtained from the applicant's agent, SOS Consulting, LLC, (903)488-9850 or, email info@sosconsulting.us.

Published in the Artesia Daily Press, Artesia, N.M., Nov. 24, 2015 Legal No. 23741.



C-108 Review Checklist:

Received 12/10/15 Add. Request: _____

Reply Date: 7/8/16

Suspended: 12/31/15

(Ver 16)

ORDER TYPE: WFX / PMX / SWD Number: 1648

Order Date: 08/29/16

Legacy Permits/Orders: _____

Well No. 1 Well Name(s): Collinsoscopy Federal

Review R-11-P * DMG assessment 9/7/2016

API: 30-0 15-33758

Spud Date: 12/18/2004

New or Old: New

(UIC Class II Primacy 03/07/1982)

Footages 1095 FSL / 430 FWL

Lot 4 of Unit M

Sec 7

Tsp 20S

Rge 30E

County Eddy

General Location: Clayton Basin; 4 1/2 m north of 180-

Pool: Morrow East, Barton Flat, SWD/Delaware

Pool No.:

BLM 100K Map: Hobbs & Artesia

Operator: OWL SWD Operating LLC

OGRID: 308339

Contact: B. Stone / SOS Consulting

COMPLIANCE RULE 5.9: Total Wells: 20

Inactive: 2

Fincl Assur: Yes

Compl. Order? No

IS 5.9 OK? Yes

Date: 08/29/16

WELL FILE REVIEWED

Current Status:

Active well; Morrow → Strawn → Delaware producer

[Morrow/previous operator]

WELL DIAGRAMS: NEW: Proposed

or RE-ENTER:

Before Conv.

After Conv.

Logs in Imaging:

Deep form logs

shallow on one copy

Planned Rehab Work to Well: Drill out shallow plugs; squeeze perms 3500'-3508'; install CIBP @ 5175'; new perms

Well Construction Details		Sizes (in) Borehole / Pipe	Setting Depths (ft)	Cement (Sx) or Cf	Cement Top and Determination Method
Planned ___ or Existing <input checked="" type="checkbox"/> Surface		26/20	0 to 315	750 + 10c/RM	-not cir./56' after RM
Planned ___ or Existing <input checked="" type="checkbox"/> Intern/Prod		17 1/2 / 12 3/8	0 to 1783	None	cir. to surface
Planned ___ or Existing <input checked="" type="checkbox"/> Intern/Prod		12 1/4 / 8 5/8	0 to 3425	DV 1989'	cir. to surface
Planned ___ or Existing <input checked="" type="checkbox"/> Prod/Liner		7 5/8 / 5 1/2	0 to 12400	DV 9969'	TS 1000' BGS
Planned ___ or Existing <input checked="" type="checkbox"/> Liner					
Planned ___ or Existing <input checked="" type="checkbox"/> OH / PERF					
Injection Lithostratigraphic Units:		Depths (ft)		Units	
Adjacent Unit: Litho. Struc. Por.			Capitan Reef	2136	
Confining Unit: Litho. Struc. Por.		+440'	Delaware	3310	
Proposed Inj Interval TOP:		3750	Cherry Canyon		
Proposed Inj Interval BOTTOM:		5140	Brushy Canyon		
Confining Unit: Litho. Struc. Por.		+1,155'	Bone Spring	6295	
Adjacent Unit: Litho. Struc. Por.			Wolfcamp	4789	
AOR: Hydrologic and Geologic Information					
POTASH: R-111-P No	Noticed?	BLM Sec Ord	WIPP NA	Noticed?	NA
FRESH WATER: Aquifer	Shallow	SR	Capitan	Max Depth	<300' / <338'
NMOSE Basin:	Capitan	CAPITAN REEF: thru	ad	NA	No. GW Wells in 1-Mile Radius? 2
Disposal Fluid: Formation Source(s)	Bone Spring	Delaware	Analysis?	Yes	On Lease ___ Operator Only ___ or Commercial <input checked="" type="checkbox"/>
Disposal Interval: Inject Rate (Avg/Max BWPD):	7000/8000	Protectable Waters?	No	Source: Sample	System: Closed or Open
HC Potential: Producing Interval?	No	Formerly Producing?	Yes	Method: Logs/DST/P&A	Other: history
AOR Wells: 1/2-M Radius Map?	Yes	Well List?	Yes	Total No. Wells Penetrating Interval:	4
Penetrating Wells: No. Active Wells	4	Num Repairs?	0	on which well(s)?	Pathway BS Play
Penetrating Wells: No. P&A Wells	NA	Num Repairs?	NA	on which well(s)?	Diagrams? No

Completion/Operation Details:

Drilled TD 12400 PBDT 5150
 NEW TD _____ NEW PBDT 5175 - cont
 NEW Open Hole ___ or NEW Perfs ☒
 Tubing Size 4 1/2 in. Inter Coated? Yes
 Proposed Packer Depth _____
 Min. Packer Depth (above perfs at 3500/3508) (100-ft limit)
 Proposed Max. Surface Press. 750 psi
 Admin. Inj. Press. 750 (0.2 psi per ft)

NOTICE: Newspaper Date Nov 24, 2015

Mineral Owner BLM

Surface Owner BLM

N. Date Nov 30, 2015

RULE 26.7(A): Identified Tracts? Yes

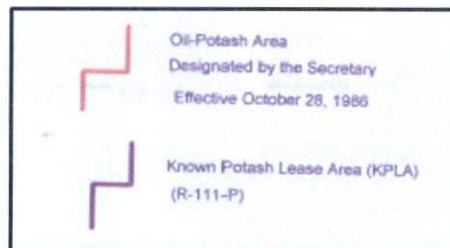
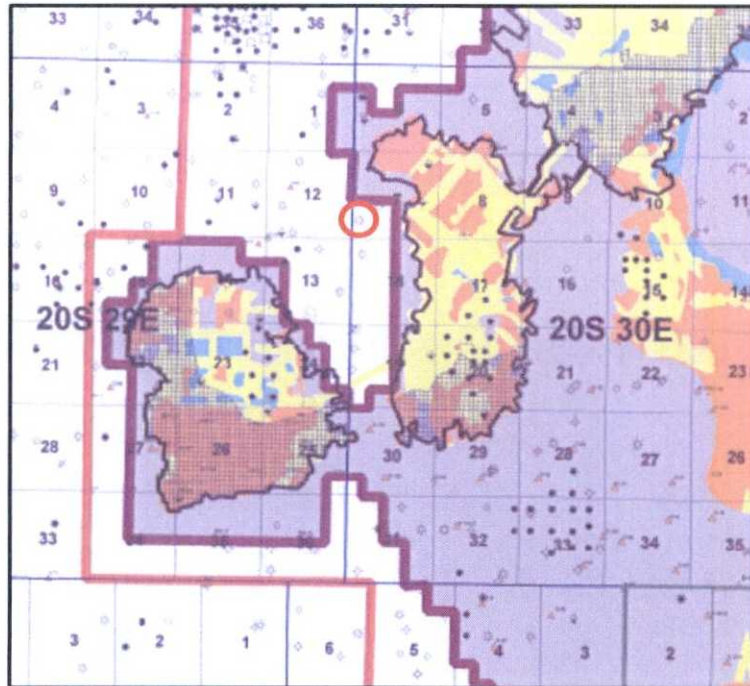
Affected Persons: Mawbourne / COG / Occidental / V-F Petroleum / Manigault

Date Nov 30, 2015

Order Conditions: Issues: pressure in DMG; commercial injection rate

Add Order Cond: Set MSIP with SRT; injection survey

Potash Resource Area Evaluation
C-108 Application; OWL SWD Operating LLC
Collinsoscopy Fed No. 1 (30-015-33758)
Proposed Disposal Interval: 3750' to 5140'



30-015-33758-00-00

COLLINSOSCOPY FEDERAL No. 001

Company Name: MARBOB ENERGY CORP

Location: Sec: 7 T: 20S R: 30E Spot:

Lat: 32.583648244872 Long: -104.018535248961

Property Name: COLLINSOSCOPY FEDERAL

County Name: Eddy

String Information

Cement Information

Perforation Information

Top (ft sub)	Bottom (ft sub)	Shts/Ft	No Shts	Dt Sqz
0	0			

Formation Information

St Code	Formation	Depth
Psal	Salado	682
Pbslt	Base of Salt	1630
Pyts	Yates	1708
Psr	Seven Rivers	1988
Preef	Capitan Reef	2136
Pdel	Delaware	3309
Pbs	Bone Spring	6295
Pwc	Wolfcamp	9789
PPst	Strawn	10818
Ppat	Atoka	11100
Ppmorc	Morrow Clastics	11884

Hole: Unknown

TD:

TVD: 0

PBTD:

(Two Mesas 7 MP Fed #1H)
30-015-41420
M-7-20S-30E
- 3729
- 6212

2-1 22 1/2
2-1 22 1/2
2-1 22 1/2

[illegible]

26¹¹

577

17 1/2

DV 1989

124

 $7\frac{1}{8}$

FILED 35 JUL 10 1959

212P + 200T 11-55

21P-500-132

12/1/20

1961-12-15

1250

$\{20^\circ @ 315^\circ$

100 ft. 10 + 350 440
+ "300" C. + 17 jds
red. 100 ft.

7/8" x 1/83"

50 HWC + 300 "C"
circ 152.5)

TOC 220' TS

Q5012.3475

1st: 420 HLC + 250 "C" (aire 60,2)

DV 9969

10335-10714 (20) P. S. S. S.

10837-11012' (12) 51.

1948-20

11335-931000

11-770-741

12-14-77
12-14-77

506 1240

Bluffville

12. 6/10/1911
13. 10/10/1911

174511

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

OCD-ARTESIA

FORM APPROVED
OM B No. 1004-0137
Expires: March 31, 2007

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.

SUBMIT IN TRIPLICATE- Other instructions on reverse side.

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

OCT 31 2007

2. Name of Operator Marbob Energy Corporation

OCD-ARTESIA

3a. Address
PO Box 227, Artesia, NM 88211-02273b. Phone No. (include area code)
575-748-3303

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

1095 FSL 430 FWL, Sec. 7-T20S-R30E, Lot 4

5. Lease Serial No.

NMNM112273

6. If Indian, Allottee or Tribe Name

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

8. Well Name and No.
Collinscopsy Federal #19. API Well No.
30-015-3375810. Field and Pool, or Exploratory Area
Burton Flat; Delaware11. County or Parish, State
Eddy Co., NM

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

TYPE OF SUBMISSION	TYPE OF ACTION			
<input type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-Off
<input checked="" type="checkbox"/> Subsequent Report	<input type="checkbox"/> Alter Casing	<input type="checkbox"/> Fracture Treat	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input checked="" type="checkbox"/> Recomplete	<input type="checkbox"/> Other
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	
	<input type="checkbox"/> Convert to Injection	<input checked="" type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

13. Describe Proposed or Completed Operation (clearly state all pertinent details, including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths of all pertinent markers and zones. Attach the Bond under which the work will be performed or provide the Bond No. on file with BLM/BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notices shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

Recompleted in the Delaware 1 zone as follows:

8/27/07 - Set CIBP + 35' cmt @ 10815'. Perf the Upper Penn @ 10400' - 10743' (20 shots).

8/28/07 - Acidz w/ 5000 gal NE Fe 7 1/2% HCl acid.

9/11/07 - Set CIBP + 35' cmt @ 10375'. Set CIBP + 35' cmt @ 9800'. Set CIBP + 35' cmt @ 7800'. Perf the Delaware 1 @ 6172' - 6200' (20 shots).

9/12/07 - Acidz w/ 1000 gal NE Fe 7 1/2% HCl.

9/14/07 - Frac Delaware 1 perms w/ 80K# sand. AIR 26 BPM. AIP 1500#. ISIP 1200#.

ACCEPTED FOR RECORD

OCT 23 2007

LES BABYAK
PETROLEUM ENGINEER14. I hereby certify that the foregoing is true and correct
Name (Printed/Typed)

Diana J. Briggs

Title Production Analyst

Signature

Date

10/15/2007

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved by

Title

Date

Conditions of approval, if any, are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Office

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Instructions on page 2)

OCD-ARTESIA

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

RECEIVED
MAR 10 2010
NMWD-ARTESIA
OMB No. 1001-0137
Expires July 31, 2010

SUNDRY NOTICES AND REPORTS ON WELLS
Do not use this form for proposals to drill or to re-enter an abandoned well. Use Form 3160-3 (APD) for such proposals.

SUBMIT IN TRIPLICATE - Other Instructions on page 2.

1 Type of Well <input checked="" type="checkbox"/> Oil Well <input type="checkbox"/> Gas Well <input type="checkbox"/> Other		5 Lease Serial No. NMNM112273
2 Name of Operator Marbob Energy Corporation		6 If Indian, Allottee, or Tribe Name
3a Address PO Box 227 Artesia, NM 88211-0227	3b Phone No. (include area code) (575) 748-3303	7 If Unit or CA Agreement Name and/or No
4 Location of Well (if not on Sec. T, R, M, or Survey Description) 1095 430 FWL, Sec. 7-T20S-R30E, Lot 4		8 Well Name and No. Collinsoscopy Federal #1
		9 API Well No. 30-015-33758
		10 Field and Pool, or Exploratory Area Burton Flat, Delaware
		11 County or Parish, State Eddy Co., NM

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

TYPE OF SUBMISSION	TYPE OF ACTION			
<input type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-off
<input checked="" type="checkbox"/> Subsequent Report	<input type="checkbox"/> Altering Casing	<input type="checkbox"/> Fracture Treat	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input checked="" type="checkbox"/> Recomplete	<input type="checkbox"/> Other
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon	
	<input type="checkbox"/> Convert to Injection	<input checked="" type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal	

13 Describe Proposed or Completed Operation (clearly state all pertinent details including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recompleat horizontally, give subsurface locations and measured and true vertical depths of pertinent markers and sands. Attach the Bond under which the work will be performed or provide the Bond No. on file with the BLM/ BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notice shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

Plugged back to the Delaware 5 zone as follows:

2/16/10 - MIRU, POOH w/ pump & rods.

2/17/10 - POOH w/ tbg. Set 5 1/2" H-M plug @ 3700'. Test OK to 2000#. RIH w/ 111 jts 2 3/8" L80 tbg. Set @ 3596'.
RIH w/ pump & rods.

2/18/10 - Hang well on pump. RDMO.

Producing Interval: Delaware 5 @ 3500' - 3508'

14 I hereby certify that the foregoing is true and correct
Name (Printed/Typed)

Signature: Diana J. Briggs

Title

Production Manager

Date

ACCEPTED FOR RECORD
March 2, 2010

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved by

Title

MAR 6 2010

Conditions of approval, if any are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Title 18 USC Section 1001 AND Title 43 USC Section 1212, make it a crime for any person knowingly and willfully to state any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

D. J. - 3-15-10

OCD-ARTESIA

Form 3160-5
(August, 2007)UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENTFORM APPROVED
OMB No 1004-0137
Expires July 31, 2010

SEP - 9 2008

OCD-ARTESIA

SUNDRY NOTICES AND REPORTS ON WELLS
Do not use this form for proposals to drill or to re-enter an
abandoned well. Use Form 3160-3 (APD) for such proposals.

SUBMIT IN TRIPLICATE - Other Instructions on page 2.

1 Type of Well <input type="checkbox"/> Oil Well <input checked="" type="checkbox"/> Gas Well <input type="checkbox"/> Other		5 Lease Serial No NMNM112273
2 Name of Operator Marbob Energy Corporation		6 If Indian, Allottee, or Tribe Name
3a Address PO Box 227 Artesia, NM 88211-0227	3b Phone No (include area code) (575) 748-3303	7 If Unit or CA Agreement Name and/or No
4 Location of Well (Footage, Sec., T., R., M., or Survey Description) 1095 430 FWL, Sec. 7-T20S-R30E, Lot 4		8 Well Name and No Collinscopy Federal #1
		9 API Well No 30-015-33758
		10 Field and Pool, or Exploratory Area Burton Flat; Strawn, East
		11 County or Parish, State Eddy Co., NM

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

TYPE OF SUBMISSION	TYPE OF ACTION				
<input type="checkbox"/> Notice of Intent	<input type="checkbox"/> Acidize	<input type="checkbox"/> Deepen	<input type="checkbox"/> Production (Start/Resume)	<input type="checkbox"/> Water Shut-off	
<input checked="" type="checkbox"/> Subsequent Report	<input type="checkbox"/> Altering Casing	<input type="checkbox"/> Fracture Treat	<input type="checkbox"/> Reclamation	<input type="checkbox"/> Well Integrity	
<input type="checkbox"/> Final Abandonment Notice	<input type="checkbox"/> Casing Repair	<input type="checkbox"/> New Construction	<input checked="" type="checkbox"/> Recomplete	<input type="checkbox"/> Other	
	<input type="checkbox"/> Change Plans	<input type="checkbox"/> Plug and Abandon	<input type="checkbox"/> Temporarily Abandon		
	<input type="checkbox"/> Convert to Injection	<input checked="" type="checkbox"/> Plug Back	<input type="checkbox"/> Water Disposal		

13 Describe Proposed or Completed Operation (clearly state all pertinent details including estimated starting date of any proposed work and approximate duration thereof. If the proposal is to deepen directionally or recomplete horizontally, give subsurface locations and measured and true vertical depths or pertinent markers and sands. Attach the Bond under which the work will be performed or provide the Bond No. on file with the BLM/ BIA. Required subsequent reports shall be filed within 30 days following completion of the involved operations. If the operation results in a multiple completion or recompletion in a new interval, a Form 3160-4 shall be filed once testing has been completed. Final Abandonment Notice shall be filed only after all requirements, including reclamation, have been completed, and the operator has determined that the site is ready for final inspection.)

Delaware Sand
Recompleted in the Delaware Sand as follows:

7/17/08 - Set CIBP + 35' cmt @ 6150'. Perf the Delaware 2 @ 5942' - 6023' (28 shots). Acdz w/ 1500 gal NE Fe 7 1/2% HCl.
 7/22/08 - Frac the Delaware 2 w/ 29784# sand & 30736 gal fluid. AIR 14.4 BPM. AIP 1427#.
 7/25/08 - Set CBP @ 5912'. Perf the Delaware 3 @ 5751' - 5760' (20 shots).
 7/28/08 - Acdz w/ 750 gal NE Fe 7 1/2% HCl.
 7/30/08 - Set CBP @ 5700'. Perf the Delaware 4 @ 4862' - 4870' (18 shots).
 7/31/08 - Acdz w/ 500 gal NE Fe 7 1/2% HCl.
 8/1/08 - Set CBP @ 4810'. Perf the Delaware 5 @ 3500' - 3508' (18 shots).
 8/4/08 - Acdz w/ 500 gal NE Fe 7 1/2% HCl.
 8/7/08 - Frac the Delaware 5 w/ 11844# sand & 11437 gal fluid. AIR 9.9 BPM. AIP 2349# ISIP 830#.
 8/8/08 - Drill out CBP's @ 5912', 5700' & 4810'. Tag TOC @ 6120'.

ACCEPTED FOR RECORD

SEP 6 2008

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

ACCEPTED FOR RECORD

14 I hereby certify that the foregoing is true and correct

Name (Printed/Typed)

Diana J. Briggs

Title

SEP 10 2008

Production Analyst

Signature

Date

Gerry Guye, Deputy Field Inspector

August 21, 2008

THIS SPACE FOR FEDERAL OR STATE OFFICE USE

Approved by

Title

Date

Conditions of approval, if any are attached. Approval of this notice does not warrant or certify that the applicant holds legal or equitable title to those rights in the subject lease which would entitle the applicant to conduct operations thereon.

Title 18 USC Section 1001 AND Title 43 USC Section 1212, make it a crime for any person knowingly and willfully to make any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

(Instructions on page 2)

OCD Artesia

Form 3160-4
(April 2004)UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

WELL COMPLETION OR RECOMPLETION REPORT AND LOG

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

1a. Type of Well <input checked="" type="checkbox"/> Oil Well <input type="checkbox"/> Gas Well <input type="checkbox"/> Dry <input type="checkbox"/> Other		5. Lease Serial No. NMNMI12273
b. Type of Completion: <input checked="" type="checkbox"/> New Well <input type="checkbox"/> Work Over <input type="checkbox"/> Deepen <input type="checkbox"/> Plug Back <input type="checkbox"/> Diff. Resvr. Other		6. If Indian, Allottee or Tribe Name
2. Name of Operator Mewbourne Oil Company		7. Unit or CA Agreement Name and No.
3. Address PO Box 5270 Hobbs, NM 88241		8. Lease Name and Well No. Two Mesas 7 MP Fed #1H
3a. Phone No. (include area code) 575-393-5905		9. AFI Well No. 30-015-41420
4. Location of Well (Report location clearly and in accordance with Federal requirements)* At surface 405' FSL & 200' FWL Sec 7, T20S, R30E Lot 4 At top prod. interval reported below 506' FSL & 310' FWL At total depth 425' FSL & 330' FEL Sec 7, T20S, R30E Unit P		10. Field and Pool, or Exploratory Parkway Bone Spring 49622
14. Date Spudded 10/31/13		11. Sec., T., R., M., on Block and Survey or Area Sec 7, T20S, R30E
15. Date T.D. Reached 11/29/13		12. County or Parish Eddy
16. Date Completed 01/02/14 <input type="checkbox"/> D & A <input checked="" type="checkbox"/> Ready to Prod.		13. State NM
17. Elevations (DF, RKB, RT, GL)* 3314' GL		

18. Total Depth: MD 12770' TVD 8436'	19. Plug Back T.D.: MD 12725' TVD 8436'	20. Depth Bridge Plug Set: MD NA TVD NA
21. Type Electric & Other Mechanical Logs Run (Submit copy of each) CCL, GR, CNL & CBL		22. Was well cored? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis) Was DST run? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit report) Directional Survey? <input type="checkbox"/> No <input checked="" type="checkbox"/> Yes (Submit copy)

23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sks. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
26"	20" J55	94#	0	285'		854	204	Surface	NA
17 1/2"	13 3/8" J&H	54.5 & 48#	0	1764'		1300	478	Surface	NA
12 1/4"	9 5/8" J55	36#	0	3450'		1330	469	Surface	NA
8 3/4"	7" P110	26#	0	8788'		1000	331	Surface	NA
6 1/8"	4 1/2" P110	13.5#	8514'	12738'		Liner	NA	NA	NA

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2 7/8"	7840'							

25. Producing Intervals

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) Bone Spring	6212	12770'	8850' - 12725' MD			Open
B)			8386' - 8436' TVD			
C)						
D)						

27. Acid, Fracture, Treatment, Cement Squeeze, etc.

Depth Interval	Amount and Type of Material
8850' - 12725'	Frac w/298,923 gals SW. 294,075 gals 20# Linear Gel. 808,727 gals 20# XL gel carrying 106,036# 100 Mesh. 1,655,827# 20/40 white sand & 401,092 20/40 SB Excel sand.

28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
01/02/14	02/20/14	24	→	239	618	1499	43.4	0.8158	Pumping
Choke Size	Tbg. Press Flwg.	Csg. Press	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
NA	SI 370	220	→	239	618	1499	2585	Producing	

28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press Flwg.	Csg. Press	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	
	SI		→						

*(See instructions and spaces for additional data on page 2)

RECEIVED

FEB 25 2014

NMOCD ARTESIA

ACCEPTED FOR RECORD

FEB 22 2014

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

28b. Production - Interval C									
Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Cwt. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	

28c. Production - Interval D									
Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Cwt. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate →	Oil BBL	Gas MCF	Water BBL	Gas/Oil Ratio	Well Status	

29. Disposition of Gas (Sold, used for fuel, vented, etc.)

30. Summary of Porous Zones (Include Aquifers):

Show all important zones of porosity and contents thereof: Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
				T. Salt	400'
				B. Salt	1558'
				Yates	1760'
				Capitan	2064'
				Delaware	3729'
				Bone Spring	6212'

32. Additional remarks (include plugging procedure):

33. Indicate which items have been attached by placing a check in the appropriate boxes:

- ☒ Electrical/Mechanical Logs (1 full set req'd.)
 ☐ Geologic Report
 ☐ DST Report
 ☒ Directional Survey
☐ Sundry Notice for plugging and cement verification
☐ Core Analysis
☒ Other: Comp sundry, Dev Rpt, C104, Gyro, Final C102, C144 Clez, pkr port

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions)*

Name (please print) Jackie Lathan

Title Hobbs Regulatory

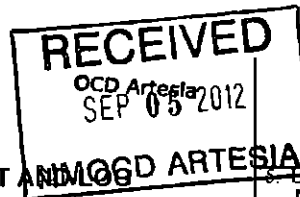
Signature

Jackie Lathan

Date 01/10/14

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT



FORM APPROVED
OMB No 1004-0137
Expires: July 31, 2010

WELL COMPLETION OR RECOMPLETION REPORT

ANMOGD ARTESIA

Lease Serial No.
NMNM81929

1a. Type of Well <input checked="" type="checkbox"/> Oil Well <input type="checkbox"/> Gas Well <input type="checkbox"/> Dry <input type="checkbox"/> Other		6. If Indian, Allottee or Tribe Name	
b. Type of Completion <input checked="" type="checkbox"/> New Well <input type="checkbox"/> Work Over <input type="checkbox"/> Deepen <input type="checkbox"/> Plug Back <input type="checkbox"/> Diff Resvr Other		7. Unit or CA Agreement Name and No. NMNM128739	
2. Name of Operator YATES PETROLEUM CORPORATION		8. Lease Name and Well No. ZIA AHZ FEDERAL COM 2H	
Contact TINA HUERTA Email: tinah@yatespetroleum.com		9. API Well No. 30-015-40404-00-S1	
3. Address 105 SOUTH FOURTH STREET ARTESIA, NM 88210		3a. Phone No. (include area code) Ph: 575-748-4168	
4. Location of Well (Report location clearly and in accordance with Federal requirements)* Sec 13 T20S R29E Mer NMP At surface NENW 983FNL 2490FWL Sec 13 T20S R29E Mer NMP At top prod interval reported below NENW 983FNL 2490FWL Sec 14 T20S R29E Mer NMP At total depth NWNW 750FNL 2279FEL		10. Field and Pool, or Exploratory GETTY	
14. Date Spudded 06/13/2012		15. Date T.D. Reached 07/10/2012	
16. Date Completed <input type="checkbox"/> D & A <input checked="" type="checkbox"/> Ready to Prod. 08/07/2012		17. Elevations (DF, KB, RT, GL)* 3326 GL	

18. Total Depth. MD TVD 12900	19. Plug Back T.D.: MD TVD 12760	20. Depth Bridge Plug Set MD TVD
21. Type Electric & Other Mechanical Logs Run (Submit copy of each) CNL HI-RESLATEROLOG CBL		22. Was well cored? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis) Was DST run? <input checked="" type="checkbox"/> No <input type="checkbox"/> Yes (Submit analysis) Directional Survey? <input type="checkbox"/> No <input checked="" type="checkbox"/> Yes (Submit analysis)

23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sk. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
36.000			0	40		27		0	
26.000	20.000 J-55	94.0	0	300		840		0	
17.500	13.375 H-40	48.0	0	1498		1160		0	
12.250	9.625 J-55	36.0	0	3600		1045		0	
8.750	5.500 P-110	17.0	0	12801		1360			

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2.875	7885							

25. Producing Intervals

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) BONE SPRING	8610	12775	9925 TO 12775			19 ports, open
B)						
C)						
D)						

27. Acid, Fracture, Treatment, Cement Squeeze, Etc.

Depth Interval	Amount and Type of Material
12449 TO 12449	bbls 20# Borate X-Link, 99800# 20/40 Jordan, 21900# 20/40 Super LC, 1000 gal 7.5% HCL acid
12602 TO 12602	bbls 20# Borate X-Link, 99800# 20/40 Jordan, 21900# 20/40 Super LC, 1000 gal 7.5% HCL acid
12775 TO 12775	bbls 20# Borate X-Link, 99800# 20/40 Jordan, 21900# 20/40 Super LC

28. Production - Interval A

Date First Produced 08/08/2012	Test Date 08/13/2012	Hours Tested 24	Test Production →	Oil BBL 239.0	Gas MCF 0.0	Water BBL 1874.0	Oil Gravity Corr API	Gas Gravity	Production Method ELECTRIC-PUMP-SUB-SURFACE
Choke Size	Tbg. Press Flwg SI 340	Csg Press	24 Hr Rate →	Oil BBL 239	Gas MCF 0	Water BBL 1874	Gas Oil Ratio	Well Status POW	ACCEPTED FOR RECORD

28a Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production →	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr API	Gas Gravity	Production Method
Choke Size	Tbg. Press Flwg SI	Csg Press	24 Hr Rate →	Oil BBL	Gas MCF	Water BBL	Gas Oil Ratio	Well Status	SEP 2 2012

(See Instructions and spaces for additional data on reverse side)

ELECTRONIC SUBMISSION #145924 VERIFIED BY THE BLM WELL INFORMATION SYSTEM

** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED ** BLM REVISED **

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

AW

28b. Production - Interval C

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press Flwg SI	Csg. Press	24 Hr Rate	Oil BBL	Gas MCF	Water BBL	Gas Oil Ratio	Well Status	
			→						

28c. Production - Interval D

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr API	Gas Gravity	Production Method
			→						
Choke Size	Tbg. Press Flwg SI	Csg. Press	24 Hr Rate	Oil BBL	Gas MCF	Water BBL	Gas Oil Ratio	Well Status	
			→						

29. Disposition of Gas (Solid, used for fuel, vented, etc.)

NO MEASURABLE GAS

30. Summary of Porous Zones (Include Aquifers).

Show all important zones of porosity and contents thereof: Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.

31. Formation (Log) Markers

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
RUSTLER	268	521		RUSTLER	268
TANSILL	1326	1424		TANSILL	1326
YATES	1425	1826		YATES	1425
CAPITAN REEF	1827	3742		CAPITAN REEF	1827
DELAWARE	3742	6241		DELAWARE	3742
BONE SPRING	6242	12900		BONE SPRING	6242

32. Additional remarks (include plugging procedure):

CONTINUED:

44. ACID, FRACTURE, TREATMENT, CEMENT SQUEEZE, ETC

TOP-AMOUNT AND TYPE OF MATERIAL

12293-2089BBLs 20# BORATE X-LINK, 99800LB 20/40 JORDAN, 21900LB 20/40 SUPER LC, PUMPED 1000G

7-1/2% HCL ACID

12136-1995BBLs 20# BORATE X-LINK, 99800LB 20/40 JORDAN, 21900LB 20/40 SUPER LC, PUMPED

1000G 7-1/2% HCL ACID

33. Circle enclosed attachments:

- | | | | |
|---|--------------------|---------------|-----------------------|
| 1. Electrical/Mechanical Logs (1 full set req'd) | 2. Geologic Report | 3. DST Report | 4. Directional Survey |
| 5. Sundry Notice for plugging and cement verification | 6. Core Analysis | 7. Other: | |

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions):

Electronic Submission #145924 Verified by the BLM Well Information System.

For YATES PETROLEUM CORPORATION, sent to the Carlsbad

Committed to AFMSS for processing by KURT SIMMONS on 08/23/2012 (12KMS285ISE)

Name (please print) TINA HUERTA

Title REG COMPLIANCE SUPERVISOR

Signature (Electronic Submission)

Date 08/15/2012

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction

** REVISED ** REVISED ** REVISED ** REVISED ** REVISED ** REVISED ** REVISED ** REVISED **

NM OIL CONSERVATION

ARTESIA DISTRICT

OCD Artesia

JAN 06 2016

Form 3160-4
(August 2007)

UNITED STATES
DEPARTMENT OF THE INTERIOR
BUREAU OF LAND MANAGEMENT

FORM APPROVED
OMB No. 1004-0137
Expires: July 31, 2010

WELL COMPLETION OR RECOMPLETION REPORT

5. Lease Serial No.
NMNM15882

1a. Type of Well ☒ Oil Well ☐ Gas Well ☐ Dry ☐ Other
b. Type of Completion ☒ New Well ☐ Work Over ☐ Deepen ☐ Plug Back ☐ Diff. Resvr.
Other _____

6. If Indian, Allottee or Tribe Name

7. Unit or CA Agreement Name and No.

2. Name of Operator
COG OPERATING LLC

Contact: STORMI DAVIS
E-Mail: sdavis@concho.com

8. Lease Name and Well No.
MOSSY FEDERAL 1H

3. Address 2208 W MAIN ST
ARTESIA, NM 88210

3a. Phone No. (include area code)
Ph: 575-748-6946

9. API Well No.
30-015-42735

4. Location of Well (Report location clearly and in accordance with Federal requirements)*
At surface Sec 12 T20S R29E Mer NMP
NENE 990FNL 550FEL

10. Field and Pool, or Exploratory
PARKWAY; BONE SPRING

11. Sec., T., R., M., or Block and Survey
or Area Sec 12 T20S R29E Mer NMP

At top prod interval reported below
Sec 7 T20S R30E Mer NMP

12. County or Parish
EDDY

13. State
NM

At total depth NENE 408FNL 350FEL

14. Date Spudded
12/07/2014

15. Date T.D. Reached
01/04/2015

16. Date Completed
☐ D & A ☒ Ready to Prod.
04/10/2015

17. Elevations (DF, KB, RT, GL)*
3266 GL

18. Total Depth: MD 13678
TVD 8424

19. Plug Back T.D.: MD 13678
TVD 8424

20. Depth Bridge Plug Set: MD
TVD

21. Type Electric & Other Mechanical Logs Run (Submit copy of each)
DSN, DLL

22. Was well cored? ☒ No ☐ Yes (Submit analysis)
Was DST run? ☒ No ☐ Yes (Submit analysis)
Directional Survey? ☐ No ☒ Yes (Submit analysis)

23. Casing and Liner Record (Report all strings set in well)

Hole Size	Size/Grade	Wt. (#/ft.)	Top (MD)	Bottom (MD)	Stage Cementer Depth	No. of Sks. & Type of Cement	Slurry Vol. (BBL)	Cement Top*	Amount Pulled
26.000	20.000 J55	94.0	0	292		1423		0	
17.500	13.375 J55	54.5	0	1691		1550		0	
12.250	9.625 J55	40.0	0	3210		925		0	
8.750	7.000 P110	29.0	0	7700		2450		0	
8.750	5.500 P110	17.0	7700	13671					

24. Tubing Record

Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)	Size	Depth Set (MD)	Packer Depth (MD)
2.875	8586	7784						

25. Producing Intervals

26. Perforation Record

Formation	Top	Bottom	Perforated Interval	Size	No. Holes	Perf. Status
A) BONE SPRING	9062	13475	9062 TO 13475	0.430	540	OPEN
B)						
C)						
D)						

27. Acid, Fracture, Treatment, Cement Squeeze, Etc.

Depth Interval	Amount and Type of Material
9062 TO 13475	SEE IN REMARKS

28. Production - Interval A

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity
04/11/2015	06/08/2015	24	→	469.0	707.0	1560.0		
Choke Size	Thg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status
			→	469	707	1560		POW

ACCEPTED FOR RECORD

GAS LIFT

DEC 31 2015

28a. Production - Interval B

Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity
			→					
Choke Size	Thg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas:Oil Ratio	Well Status
			→					

BUREAU OF LAND MANAGEMENT
CARLSBAD FIELD OFFICE

(See Instructions and spaces for additional data on reverse side)

ELECTRONIC SUBMISSION #305463 VERIFIED BY THE BLM WELL INFORMATION SYSTEM

** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED ** OPERATOR-SUBMITTED **

Reclamation: 12/19/15

28b. Production - Interval C									
Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas Oil Ratio	Well Status	

28c. Production - Interval D									
Date First Produced	Test Date	Hours Tested	Test Production	Oil BBL	Gas MCF	Water BBL	Oil Gravity Corr. API	Gas Gravity	Production Method
Choke Size	Tbg. Press. Flwg. SI	Csg. Press.	24 Hr. Rate	Oil BBL	Gas MCF	Water BBL	Gas Oil Ratio	Well Status	

29. Disposition of Gas(Sold, used for fuel, vented, etc.)
SOLD

30. Summary of Porous Zones (Include Aquifers):	31. Formation (Log) Markers
Show all important zones of porosity and contents thereof. Cored intervals and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures and recoveries.	

Formation	Top	Bottom	Descriptions, Contents, etc.	Name	Top Meas. Depth
CHERRY CANYON	3451	4554		RUSTLER	81
BRUSHY CANYON	4555	6145		TOS	395
BONE SPRING LM	6146	7407		BOS	1605
1ST BONE SPRING	7408	8143		YATES	1698
2ND BONE SPRING	8144	8448		SEVEN RIVERS	1921
				CAPITAN	2027
				CHERRY CANYON	3451
				BRUSHY CANYON	4555

32. Additional remarks (include plugging procedure):
Perfs 7 1/2" Sand (#) Fluid (gal)
13274-13475 3024 450635 361200
12976-13173 6048 449745 375522
12673-12873 6006 449322 382326
12372-12574 5982 449955 377850
12071-12271 6300 451718 378630
11772-11970 6720 449895 378126
11469-11670 6048 450511 377076

33. Circle enclosed attachments:

1. Electrical/Mechanical Logs (1 full set req'd.)	2. Geologic Report	3. DST Report	4. Directional Survey
5. Sundry Notice for plugging and cement verification	6. Core Analysis	7. Other:	

34. I hereby certify that the foregoing and attached information is complete and correct as determined from all available records (see attached instructions):

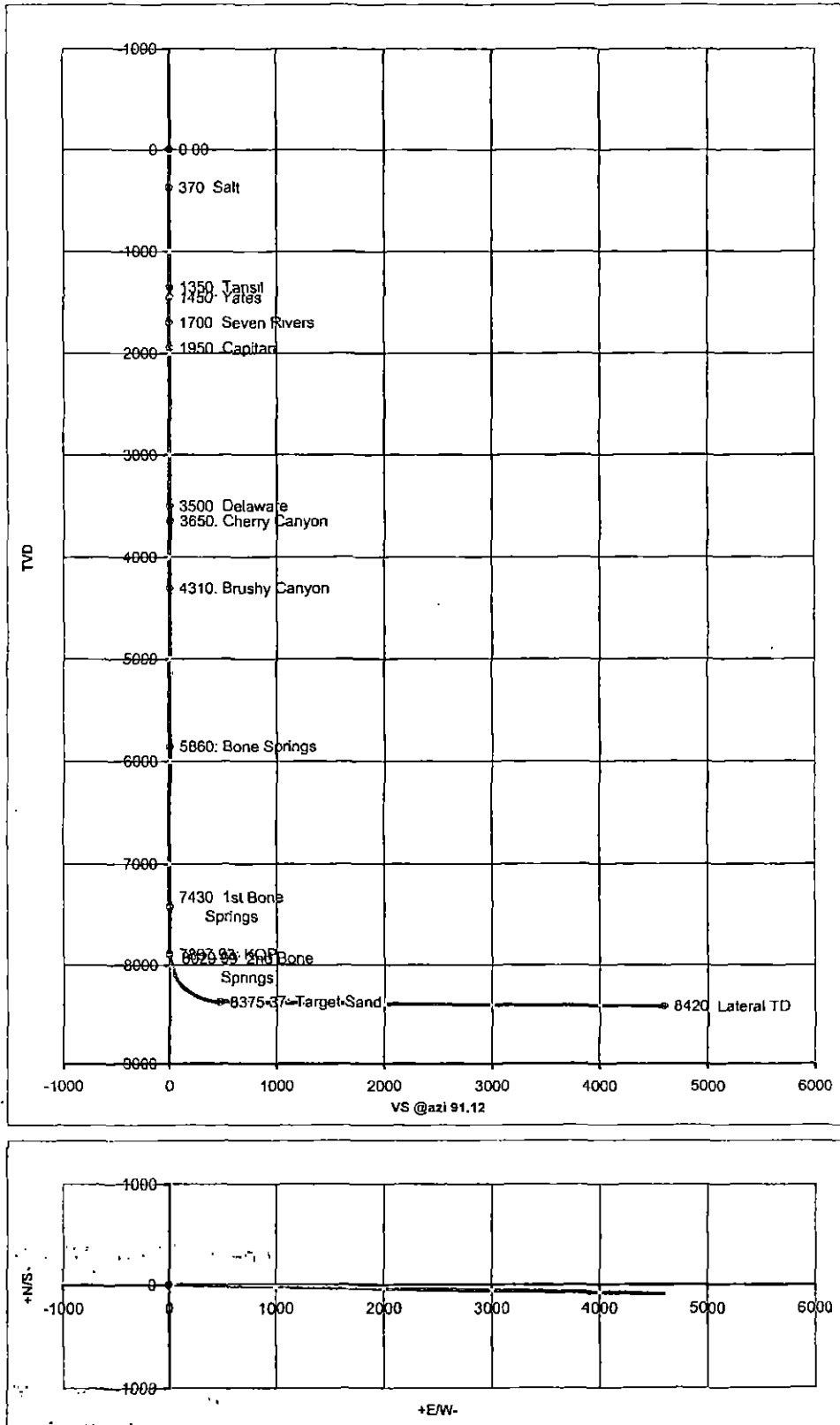
Electronic Submission #305463 Verified by the BLM Well Information System.
For COG OPERATING LLC, sent to the Carlsbad
Committed to AFMSS for processing by DEBORAH HAM on 12/21/2015 ()

Name (please print) STORMI DAVIS Title REGULATORY ANALYST

Signature (Electronic Submission) Date 06/18/2015

Title 18 U.S.C. Section 1001 and Title 43 U.S.C. Section 1212, make it a crime for any person knowingly and willfully to make to any department or agency of the United States any false, fictitious or fraudulent statements or representations as to any matter within its jurisdiction.

** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL ** ORIGINAL **



4/13/2005

Wellbore Diagram

r263

30-015-33790-00-00

FREEWAY FEDERAL No. 001

Company Name: CHI OPERATING INC

Location: Sec: 30 T: 19S R: 30E Spot:

Lat: 32.6332500656379 Long: -104.013370697723

Property Name: FREEWAY FEDERAL

County Name: Eddy

String Information

Cement Information

Perforation Information

Top (ft sub)	Bottom (ft sub)	Shts/Ft	No Shts	Dt Sqz
0	0			

Check GR
350-370 Salt

Formation Information

St Code	Formation
Pyts	Yates
Psr	Seven Rivers
Preef	Capitan Reef
Pdel	Delaware
Pbs	Bone Spring
Pbs3sd	3rd Bone Spring Sand
Pwc	Wolfcamp
Ppund	Pennsylvanian
PPst	Strawn
Ppat	Atoka
Ppmorl	Morrow Limestone
Ppmorc	Morrow Clastics

Depth
1750
1940
2209
3751
6008
9020
9512
10314
10550
10940
11487
11600

3605

-TC 4784'

Hole: Unknown

TD:

TVD: 0

PBTD:

Goetze, Phillip, EMNRD

From: Goetze, Phillip, EMNRD
Sent: Friday, July 08, 2016 9:47 AM
To: 'ben@sosconsulting.us'
Cc: McMillan, Michael, EMNRD; Jones, William V, EMNRD; Catanach, David, EMNRD
Subject: RE: Owl's Collinsoscopy SWD C-108...

Ben:

OWL's proposed location is within an area identified by the NMBGMR as having a moderate potential for hydrocarbon development for the Brushy Canyon formation (Broadhead, 2010). Additionally, there is compiled information of adjacent DMG fracturing data (both SRT results and horizontal well completions to the west) suggesting a formation parting pressure of less than the administrative gradient of 0.2 psi/ft. Since this is a proposed commercial operation and the applicant has indicated an 8000 BPD rate, the application garners a little more review than the usually DMG application farther west in Lea County. It is in a collection of DMG applications that I am trying to resolve in the next 30 days, barring additional assignments requiring immediate response. PRG

Phillip R. Goetze, PG
Engineering Bureau
Oil Conservation Division
New Mexico Energy, Minerals and Natural Resources Department
1220 South St. Francis Drive
Santa Fe, NM 87505
Direct: 505.476.3466
E-mail: phillip.goetze@state.nm.us



From: ben@sosconsulting.us [mailto:ben@sosconsulting.us]
Sent: Friday, July 08, 2016 8:44 AM
To: McMillan, Michael, EMNRD <Michael.McMillan@state.nm.us>; Goetze, Phillip, EMNRD <Phillip.Goetze@state.nm.us>; Jones, William V, EMNRD <WilliamV.Jones@state.nm.us>
Subject: Owl's Collinsoscopy SWD C-108...

Gentlemen:

Can I get a quick update on the status of this C-108... it's been in for 7 months.

Thanks,
Ben

