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who h	Horit	NEW MEXICO OIL CONSE - Engineering		ION	
nwys	man	1220 South St. Francis Drive,		1.1.1	
di	H pit	ADMINISTRATIVE A		CHECKLI	ST
	THIS CHECKLIST	IS MANDATORY FOR ALL ADMINISTRATIVE A			<u> </u>
Applic	ation Acrony	WHICH REQUIRE PROCESSIN	IG AT THE DIVISION LEVEL IN	N SANTA FE	
	-	andard Location] [NSP-Non-Stand	ard Proration Unit] [§	iD-Simultaneous	Dedication]
	-			PLC-Pool/Lease	
	[PC-		ease Storage] [OLM [PMX-Pressure Mainte	1-Off-Lease Meas enance Expansio	
		[SWD-Salt Water Disposal]		-	
	[EOK-Q	ualified Enhanced Oil Recovery Cei	raticationj [PPK-Pd	sitive Productio	on Kesponsej
[1]		APPLICATION - Check Those Wh	ich Apply for [A]	- Sindi	n Ehengy, L.F 2611 Le11 Recues 94
	[A]	Location - Spacing Unit - Simult	taneous Dedication	347004	h Enengy, L.F.
			D	23	2611
		ck One Only for [B] or [C]		-	LEII
	[B]	Commingling - Storage - Measur			
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	[C]	Injection - Disposal - Pressure In			
		🖾 WFX 🗌 PMX 🔲 S	WD IPI IF	EOR 🗌 PPR	SEP - I P I: 3
	[D]	Other: Specify			- <u> </u>
	[]	·			PDO
[2]		TION REQUIRED TO: - Check T			
	[A]	Working, Royalty or Overri	iding Royalty Interest C	lwners	w 🗇
	<b>[B]</b>	Offset Operators, Leasehold	ders or Surface Owner		Pool
	[0]		Denvine Dutit-t-1T	al NI-dias	-
	[C]	Application is One Which R	cequires Published Leg	al Notice ·	- Leeves , OH
	[D]	Notification and/or Concurr U.S. Bureau of Land Management - Comm		or SLO and Office	-leevesjon 52070
	[E]	For all of the above, Proof	of Notification or Publi	ication is Attache	d, and/or,
	<b>[F]</b>	Waivers are Attached			

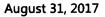
# [3] SUBMIT ACCURATE AND COMPLETE INFORMATION REQUIRED TO PROCESS THE TYPE OF APPLICATION INDICATED ABOVE.

[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	- Sen trans	Agent for Sundown Energy, LP	8/31/17
Print or Type Name	Signature	Title	Date
		ben@sosconsulting.us	
		e-mail Address	





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

Oil & Gos Ac

Attn: Mr. David Catanach, Director

*Re: Application of Sundown Energy, LP to convert to injection its Reeves Queen Waterflood Unit Well No.3, API No.30-025-03127 located in Section 22, Township 18 South, Range 35 East, NMPM, Lea County, New Mexico.* 

Oil-Field=Technical-As

Dear Mr. Catanach,

Please find enclosed the form C-108; Application for Authority to Inject, supporting the above-referenced request to authorize injection authority for this well. The Reeves Queen Waterflood Unit authorization of two original injection wells was permitted by R-13785 on January 21, 2014.

Sundown Energy, LP seeks to optimize efficiency, both economically and operationally, of its assets. Approval of this application is consistent with that goal as well as the NMOCD's mission of preventing waste and protection of correlative rights. Sundown anticipates that the conversion of the No.3 well will enhance production and improve efficiency of the unit.

Of particular note, the applicant is requesting a maximum surface injection pressure of 1200 psi based on steprate tests conducted on the existing 2 injection wells. Those wells were approved for 1350 psi and 1200 psi by IPI-492 on August 15, 2015. (The 0.2 psi/ft standard gradient would have allowed 886 psi.) Details are included in this application.

Published legal notice will run in the September 1, 2017 edition of the Hobbs News-Sun. Sundown is the operator of record for the unit and 3 offset operators were noticed. Some updated maps and diagrams are included in this application for clarity, and this well's AOR brought in 4 additional wells in the area of review; those well construction details are tabulated.

The well is located on state land and minerals and a copy of this application has been submitted to the State Land Office, Oil & Gas Division.

I respectfully request that approval for this injection authority 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 Sundown Energy, LP

Cc: Application attachment and file

STATE OF NEW MEXICO ENERGY, MINERALS AND NATURAL RESOURCES DEPARTMENT Oil Conservation Division 1220 South St. Francis Dr. Santa Fe, New Mexico 87505

#### **APPLICATION FOR AUTHORIZATION TO INJECT**

- I. PURPOSE: Waterflood Expansion and the application qualifies for administrative approval.
- II. OPERATOR: Sundown Energy, LP (Ogrid 232611) ADDRESS: 16400 Dallas Parkway, St 100, Dallas, TX 75248

CONTACT PARTY: Ralph Butler (214) 368-6100 Agent: SOS Consulting, LLC – Ben Stone (903) 488-9850

- III. WELL DATA: All well data and applicable wellbore diagrams are ATTACHED hereto.
- IV. This is an expansion of an existing project. (Previously permitted by R-13785.)
- 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. **PREVIOUSLY SUBMITTED** A tabulation of of data on all wells of public record within the area of review which penetrate the proposed injection zone. 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. **4** Additional Wells; **1** active, **3** P&A Data ATTACHED.
- VII. Attach data on the proposed operation, including: Included on following C-103 Narrative.
  - 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. Attach appropriate geologic data on the injection zone 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. *PREVIOUSLY SUBMITTED*
- IX. Describe the proposed stimulation program, if any. *The well may be acidized when converted to injection.*
- \*X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division, they need not be resubmitted). *PREVIOUSLY SUBMITTED*
- \*XI. State Engineer's records indicate there are 3 water wells within one mile the proposed injection well. Ail data PREVIOUSLY SUBMITTED.
- XII. Applicants for disposal wells must make an affirmative statement that they have examined available geologic and engineering data and find no evidence 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. Affected parties have not changed. Legal Notice was published 9/01/17 in the Hobbs News-Sun.
- 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	$\sim$	TITL	E: SOS Consulting, L	LC agent / consultant	for Sundo	own Energy, LP.	
SIGNATL	JRE:	Ser.	Same			DATE:	8/30/2017	
			5-0-			-		

#### 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:

### Page 2

- III. WELL DATA The following information for the Bobbi State WF Unit No.6 are ATTACHED and includes:
- 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 Note: The APPLICANT is the operator of record for subject unit. Offset operators were noticed and Published Legal Notice was made. No other offset affected parties are due notice for application.

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.

## **C-108 - APPLICATION FOR AUTHORIZATION TO INJECT**

## Sundown Energy, LP Reeves Queen Waterflood Unit Well No.3 30-025-03127

I. This application is being submitted to expand the previously authorized waterflood unit and improve the efficiency of the waterflood project.

The Reeves Queen Waterflood Unit and the original two injection wells were authorized on January 21, 2014 by R-13785 (unitization R-13786), Case File No.15048 (waterflood) and No.15055 (unitization). The RQWFU Nos.1 and 2 are currently active injection wells and so designated. Injection authorization for the No.3 well is anticipated to enhance production and increase efficiency.

This application qualifies for administrative approval.

- **II.** ALL operater data is shown previously and throughout.
- III. ALL well data has been submitted no interval changes to the well are proposed. The 'Current' and 'Proposed' wellbore diagrams are included.
- IV. This request is an expansion of the <u>original project as authorized by R-13785</u>.
- V. An updated One-Half Mile Area of Review Map is attached. The current AOR includes **4** *additional wells*; 1 active and 4 plugged and abandoned.
- VI. A tabulation of well construction data for the *4 additional wells* is included herein.
- VII. Data on the proposed operation has been previously submitted, but is shown here for clarity including:
  - 1. The well is expected to inject between 100 and 200 bwpd;
  - 2. The system is closed;
  - 3. The default injection pressure of 0.2 psi/ft would allow for a surface injection pressure of 866 psi however; RQWFU well nos.1 and 2 had step-rate tests performed in June, 2015. *The results allowed for pressures of 1200 psi on well no.1 and 1350 psi on well no.2. Sundown therefore requests an allowable maximum injection pressure of 1200 psi;*
  - 4. Produced water from the lease and some make up water (also from on-lease water well) as required; all applicable water data was previously submitted and approved; and,
  - 5. Injection will be into the Reeves; Queen Pool (52070) as authorized for secondary recovery.
- VIII. All Geologic Data has been previously submitted and approved.
- IX. A routine <u>small acid job may be performed</u> to clean the perforations and formation wall.

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

## Sundown Energy, LP Reeves Queen Waterflood Unit Well No.3 30-025-03127

- X. Logs are on file with the Division and were presented for project initialization.
- XI. Water analysis for 1 water well was submitted previously.
- XII. Applicant stated during hearing testimony that seismic data indicated no evidence of open faults or any other hydrologic connection between the injection zone and any underground sources of drinking water.
- XIII. Legal notice was published for this application in the Hobbs News-Sun on September 1, 2017. No offset notification was required for the unitized tracts operated by Sundown Energy, LP. A copy of this application was submitted to the NM State Land Office, Oil & Gas Division via Fed Ex. The original lease plat is included with this application. 3 current offset operators were noticed via U.S. Certified Mail.
- **XIV.** The application has been signed and dated.



## **CURRENT WELL CONFIGURATION**



0

500

1000

- 1500

2000

2500

- 3000

- 3500

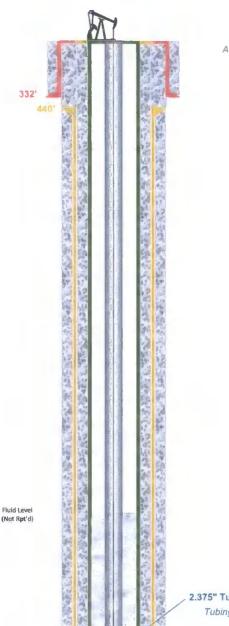
4000

4500

**Reeves Queen WF Unit Well No.3** 

API 30-025-03127

660' FSL & 660' FWL, SEC. 22-T18S-R35E LEA COUNTY, NEW MEXICO



H Low

1

ReEntry TD @ 4600'

4567

Spud Dt: 5/02/1958 P&A:Date: 8/07/1958 ReEntry Date: 1/17/1990

Oil Producer on Pümp Volumes:Reported on C-115 AVG Production 2015-17 = <1 bopd

> Surface Casing 13.375" Csg. (17.0" Hole) @ 332' 400 sx Class 'C' - Circulated

9.625" Csg. (12.25" Hole) @ 440' - 4000' 1650 sx Class 'C' - Circulated.

2.375" Tubing & Rods Tubing @ 4406'

Queen Perfs: 4432'-4450'

PBTD 4556'

Production Liner 4.5" 10.5# Lnr. (7.875" Hole) @ 4567' 1280 sx 'C' - Circulated 150 sx

SOS Consulting, LLC

Drawn by: Ben Stone, 8/30/2017.

## C-108 - Item III - Well Data **CURRENT WELL CONFIGURATION**



#### **Reeves Queen WF Unit Well No.3**

API 30-025-03127 660' FSL & 660' FWL, SEC. 22-T18S-R35E LEA COUNTY, NEW MEXICO

Spud Dt: 5/02/1958 P&A Date: 8/07/1958 ReEntry Date: 1/17/1990 Inj. Date: ~10/01/2017

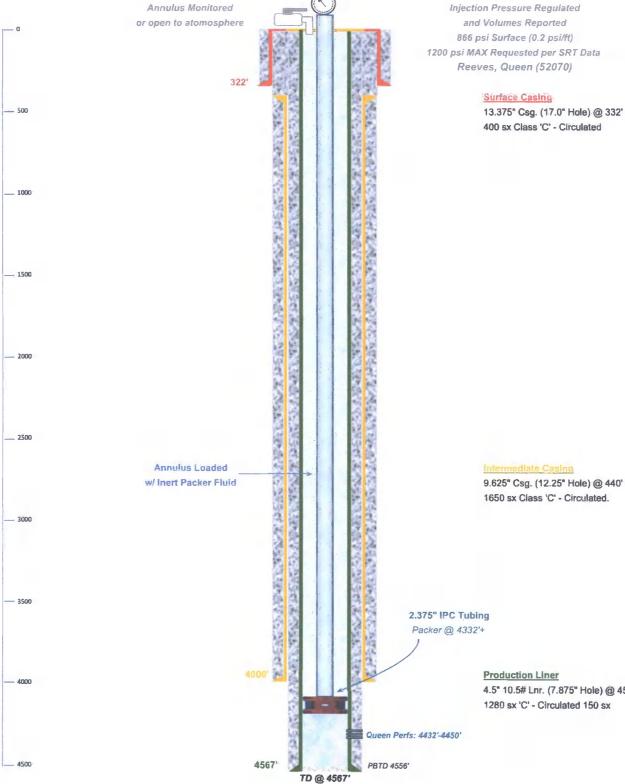
Injection Pressure Regulated and Volumes Reported 866 psi Surface (0.2 psi/ft) 1200 psi MAX Requested per SRT Data Reeves, Queen (52070)

400 sx Class 'C' - Circulated

9.625" Csg. (12.25" Hole) @ 440' - 4000' 1650 sx Class 'C' - Circulated.

4.5" 10.5# Lnr. (7.875" Hole) @ 4567' 1280 sx 'C' - Circulated 150 sx





## State of New Mexico Energy, Minerals and Natural Resources Department

Susana Martinez Governor

David Martin Cabinet Secretary

Brett F. Woods, Ph.D. Deputy Cabinet Secretary David R. Catanach, Division Director Oil Conservation Division



Administrative Order IPI-492 August 10, 2015

Mr. Daniel Hunter Sundown Energy, LP 16400 Dallas Parkway, Suite 100 Dallas, TX 75248

### **RE:** Injection Pressure Increase

Injection Permit: Order No. R-13785 Reeves Queen Waterflood Project Reeves;Queen Pool (Code 52070) 30-025-29340 and 30-025-29526

Dear Mr. Hunter:

Reference is made to your request on behalf of Sundown Energy, LP (OGRID 232611) received by the Division on June 24, 2015, to increase the maximum allowed surface tubing pressure on the referenced wells.

These wells were permitted by the Division for injection into the Queen formation within the Reeves Queen Waterflood Project by Division Order No. R-13785 approved January 21, 2014.

Based on step-rate tests for these wells through 2<sup>\*</sup>/<sub>8</sub>-inch tubing, you are hereby authorized to inject at the following <u>maximum surface tubing pressure:</u>

API No.	Well No.	ULSTR	SRT Test Date	Maximum Injection Pressure	Pressure Gradient (in psi/ft)
30-025-29340	Reeves Queen Waterflood Unit Well No. 1	A-28-18S-35E	6/17/2015	1200 psi	0.27
30-025-29526	Reeves Queen Waterflood Unit Well No. 2	B-28-18S-35E	6/18/2015	1350 psi	0.30

This approval is based on the provision that the tubing size, packer setting depth and completion interval for these wells does not change. Any future requested pressure increase will require resubmission of additional data and a new step-rate test. The Division Director retains the right to require at any time wireline verification of completion and packer setting depths in these wells. This

Administrative Order IPI-492 Sundown Energy, LP August 10, 2015 Page 2 of 2

approval is subject to your being in compliance with all other Division rules, including but not limited to Division Rule 19.15.5.9 NMAC.

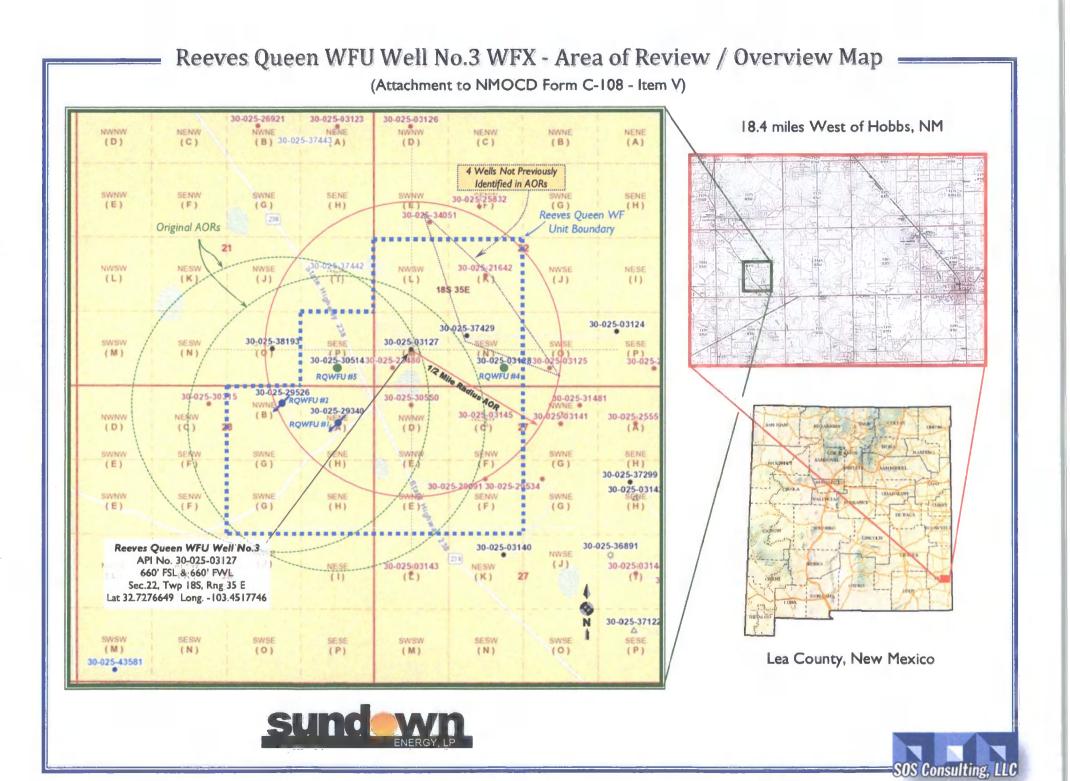
The Division Director may rescind this permitted injection pressure increase if it becomes apparent that the injected fluid is not being confined to the permitted interval or is endangering any fresh water aquifer.

Sincerely,

DAVID R. CATANACH DIRECTOR

DRC/wvjj

cc: Oil Conservation Division – Hobbs District Office Case No. 15048 Administrative Application Reference No. pMAM1518154470



#### Form C-108 Item VI - Tabulation of AOR Wells

	Top of Proposed QUEEN Interval 4412'				4 AD	DITIONAL	Wells Penetrate Pro	posed Interval.	
API Subject Well	Current Operator	Well Name	Well Number	Туре	Lease	Status	ULSTR	Depth	Plugged On
30-025-03127	[232611] SUNDOWN ENERGY LP	REEVES QUEEN WF UNIT	#003	Oîl	State	Active	22-18S-35E		
Section 22 Well	5								
30-025-37429	[372000] POGO OIL & GAS OPERATING, INC	SOUTH VACUUM	#221	Oil	State	Active	22-185-35E	14572'	
MISS	Perfs: 10794'-872' ; 13.3755" (17.5" hole) @ 416' w	630 sx - Circ.; 9.625" (12.25" hole) @ 3	943' w/ 1370 sx - Circ.; 7.	.0" (8.75"	nole) @ 123	745' w 1220	sx -TOC @ 9080'; 5.0'	LNR 11955'-1459	2' w/ 250 sx - TOL
30-025-34051	[13954] MANZANO OIL CORP	SV HONEY BEE STATE	#001	OII	State	P&A-R	22-185-35E	12000'	7/9/2002
								See attach	ed P&A diagram.
30-025-21642	[214263] PRE-ONGARD WELL OPERATOR	PRE-ONGARD WELL	#008	OII	State	P&A-R	22-185-35E	11780'	1/1/1900
								See attach	ed P&A diagram.
30-025-03125	[214263] PRE-ONGARD WELL OPERATOR	PRE-ONGARD WELL	#002	Oll	State	P&A-R	22-185-35E	11750'	1/1/1900
								See attach	ed P&A diagram.

SUMMARY: 4 ADDITIONAL wells penetrate proposed injection interval. 3 P&A.



# C-108 - Item VI

Area of Review Well Data

## PLUGGED WELL SCHEMATICS

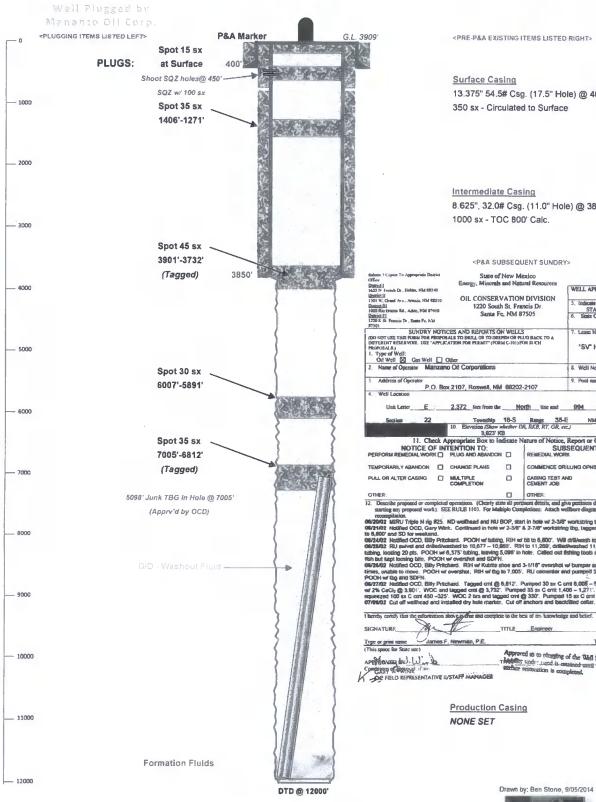
There Are 3 P&A'd Wells Within the AOR Which Penetrate the Proposed Injection Zone.

Schematics follow this page...

## **PLUGGED WELL SCHEMATIC**

## SV Honey Bee State No.1

API 30-025-34051 2372' FNL & 994' FWL, SEC. 22-T18S-R35E LEA COUNTY, NEW MEXICO



Spud Date: 7/15/1997 P&A Date: 7/09/2002

<PRE-P&A EXISTING ITEMS LISTED RIGHT>

13.375" 54.5# Csg. (17.5" Hole) @ 400' 350 sx - Circulated to Surface

8.625", 32.0# Csg. (11.0" Hole) @ 3850' 1000 sx - TOC 800' Calc.

#### <P&A SUBSEQUENT SUNDRY>

ham 3 Copies To Appropriate Dedrict	State of				Form C	
Rist.) 25 N. Feends Dr., Holdon, XIA 882.40	Energy, Minerals	and Nati	ind Resources	WELL APT NO	Renard March 25	1999
aziet (J	OIL CONSERV		DBUSION	THE API NO	30-025-34051	
11 W, Chrand Ave., America, NM 82810	1220 South			5. Indicate Type	e of Lease	
II Rio Hearn Rd., Ader. NM \$7410	Santa Fe			STATE		
<u>Briel IV</u> 20 S. St. Francis (br., <b>Santa Fo</b> , NM 20 S				6. State Oil &	Gas Lease No. E-1582	
SUNDRY NOTI D-SOT LEE THIS FORM FOR PROPO FFLRENT RESERVOR. USE "APPLR LPDSALS.) Type of Well;	CATION FOR PERMIT* (POR)	NEW OR PL	LO BACK TO A		or Agreement Name: ey Bee State	
Oit Well Gas Well				8. Well No. #1		
Address of Operator				9. Pool rarra; or	Wildow	
	or 2107, Roswell, NM	68202	2107			
Unix Letter <u>E</u> : Section 22	2.372 feet from the Township 10. Elevation (Slow w 3,023' K)	18-S	Range 35-	E NMPM	from the <u>West</u> County Less	-
11. Check A	Appropriate Box to In	dicate N	lature of Notice,	Report or Othe	r Data	
		a	SUE	ISEQUENT RI	EPORT OF: ALTERING CASIN	G D
	CHANGE PLANS		COMMENCE OR	LUNG OPNS	PLUG AND	
	MALTIPLE COMPLETION	٥	CABING TEBT A		ABANDONMENT	
THER:			OTHER:			
starting any proposed work). SI recompilation. 20072 MURV Triple N dg R25. NUR2 Notified COL Daily MM (800° and SD for veekand. 20072 Notified COL Billy PM mg, loosing 20 ph. POOH wi but Kapt loosing bills. PCOH MM Autified COL Billy PM BMR Autified COL Billy PM EVR2 Notified COL Billy PM Not Autified COL Billy PM Not Autified COL Billy PM Not Automation SDFM. EVR2 Notified COL Billy PM Not Col g 3.801°. WCC an exected 100 arc. Con 459 –322 NM22 Cut off wellhead and in	ND wellhead and NU E nt. Continued in tote w chard. POOH w fubing asched to 10,677 – 10,9 6,375° tubing, leaving 5 4,375° tubing, leaving 5 r overshot, RH w fubit chard. RH w fubit chard. RH w fubit to lagged ant 6,3732° . WOC 2 has not lagg stalled dry hole marker.	30P, star # 2-3/8* ( , RIH w/ 1008 in ( 1008 in ( 1007,005 5,812', P Pumpe ped cmi ( , Cut off	t in hole w/2-3/6 8.2-7/8" workstrin bit to 6,600". We to 11,259", define hole. Called out 1 3-1/16" overshot; RU comenter at Pumped 30 sr: C a 4 35 sr: C orn 1,4 g 330". Pumped anchors and bac	workstring Eg., g Bp., tagged PB d dfl/wesh to 12, deveshed 11,269 dshing tools and f w bumper sob. 1. md pumped 35 s3 ant 6,005 – 5,801. Dis – 1,271. Per 15 ax C ant 60 i killed odlar.	SDFN. TD @ +/- 10.833'. 	PUH sugh svera 38'.
roby certally that the mformation .	show the state and comparis	e lo the be	cs of my knowledg	te and belief.	Prov.	
NATURE A	Je		Engineer		DATE 07/09/02	_
	F. Newman, P.E.			Tcicp	hon: No. 915-687-1	994
S SPACE for State use)		Approve	ed as to plugging under und is an restoration is con	of the Well Bore Rained sami Rapiezed,	HAN 2 4 2003	- 5
	Oreduction (	See les				
	Production C	asin	9			
	NONE SET					



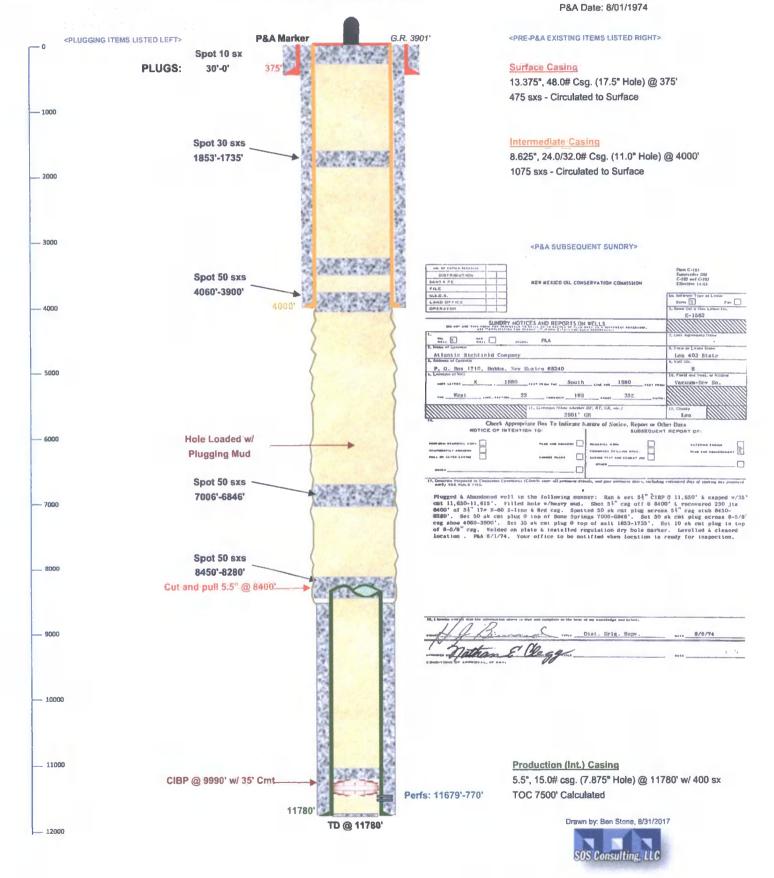
#### PLUGGED WELL SCHEMATIC

#### Lea 403 State Well No.8

API 30-025-21642

1980' FSL & 1980' FWL, SEC. 22-T18S-R35E LEA COUNTY, NEW MEXICO

Spud Date: 11/13/1965

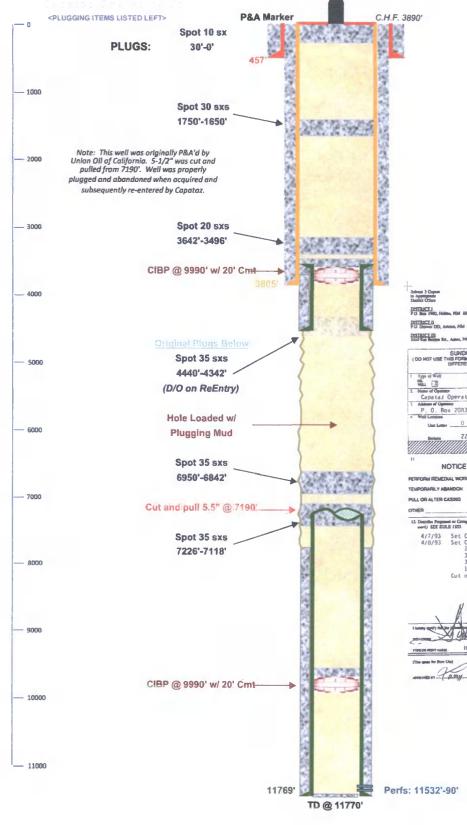


### **PLUGGED WELL SCHEMATIC**

### **Reeves State No.1**

API 30-025-03125

330' FSL & 2180.5' FEL, SEC. 22-T18S-R35E LEA COUNTY, NEW MEXICO



Spud Date: 11/02/1959 P&A Date: 8/28/1969 Re-Entry Date: 12/30/1992 P&A Date: 4/08/1993

#### <PRE-P&A EXISTING ITEMS LISTED RIGHT>

#### Surface Casing

11.75" Csg. (17.5" Hole) @ 457' 475 sxs - Circulated to Surface

#### Intermediate Casing

8.625", 32.0# Csg. (11.0" Hole) @ 3805' 2088 sxs - Circulated to Surface

NEW Production Liner 5.5", 15.0# csg. (7.5" Hole) 3586'-4500' w/ 165 sx TOC @ TOL

#### <P&A SUBSEQUENT SUNDRY>

Informati 3 Corpora In Approximation Destruct Officer	State of New Mexi Energy, .orrais and Nataral Reac		Form C-003 Revined 1-1-09
VISTILICT   7 C. Bes. 1982, Habbs, Hol. 58240	OIL CONSERVATION	DIVISION	LL API ND
	P.O. Box 2088 Santa Fe, New Maxico 87	1504.2088	30-025-03125
VU Unseer CD, Artana, Mid 60719		3.	STATE TYPE OF LOOP
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Drawn by: Ban Stane, 8/31/2017 SOS Consulting, LLC

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- O Proposed Injection Well
- O Producing Well
- 🔶 PA'd Well
  - C-108 Notice Area

Text Leasehold or Mineral Interest Owner Text Operator

# Sundown Energy, LP Reeves Queen Unit Waterflood Offset Operator/Leashold Owner Identification

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

#### SURFACE OWNER

STATE OF NEW MEXICO (FedEx'ed copy) Oil, Gas and Minerals Division 310 Old Santa Fe Trail Santa Fe, NM 87504

#### OFFSET OPERATORS (All Notified via USPS Certified Mail)

#### Operator

1 OXY USA WTP LIMITED PARTNERSHIP 6001 Deauville Blvd. Midland, TX 79706 Cert. Rcpt: 7015 3010 0001 3789 9538

#### Operator

2 T.H. McELVAIN OIL & GAS LLP 1050 17th Street, Suite 2500 Denver, CO 80265 Cert. Rcpt: 7015 3010 0001 3789 9545

#### Operator

3 POGO OIL & GAS OPERATING, INC 1515 Calle Sur, Ste.174 Hobbs, NM 88240 Cert. Rcpt: 7015 3010 0001 3789 9552

#### 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

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

#### **ADDITIONAL NOTICE**

ALL of Section of 21-18S-35E Lessee/ Operator:

Oxy USA, Inc.

ALL of Section 22-18S-35E Lessee:

1 BLACK MOUNTAIN OPERATING, LLC Attn: Luke Mildren 500 Main Street, Ste. 1200 Fort Worth, TX 76102 Cert. Rcpt: 7015 3010 0001 3789 9583

#### **Operators:**

Sundown Energy, LP Pogo Oil & Gas

ALL of Section 27-18S-35E *Lessee*:

2 MOBIL PRODUCING TEXAS & NM, INC. P.O. Box 2305 Houston, TX 77252-2305 Cert. Rcpt: 7015 3010 0001 3789 9590

#### **Operator**:

Pogo Oil & Gas



Dile&GastAccounting===Regulatony=Broccessing=Assistance=== Oil=Field=Treahnical=Assistance===

August 30, 2017

## **NOTIFICATION TO INTERESTED PARTIES** via U.S. Certified Mail -- Return Receipt Requested

To Whom It May Concern:

Sundown Energy, LP, Dallas, Texas, has made application to the New Mexico Oil Conservation Division to expand its Reeves Queen Waterflood Project by converting the Reeves Queen WFU Well No.3 to injection. The proposed conversion will enhance production and improve efficiency. As indicated in the notice below, the well is located in Section 22, Township 18 South, Range 35 East in Lea County, New Mexico.

The published notice states that the interval will be from 4432 feet to 4450 feet.

Following is the notice published in the Hobbs News-Sun, Hobbs, New Mexico on or about September 1, 2017.

#### LEGAL NOTICE

Sundown Energy, LP, 16400 Dallas Parkway, St 100, Dallas, TX 75248, is filing Form C-108 (Application for Authority to Inject) with the New Mexico Oil Conservation Division for administrative approval to convert a well to injection in its Reeves Queen Waterflood Unit. The project was authorized for injection into the San Andres formation by Division Order R-13785 on January 21, 2014.

Sundown Energy proposes to now convert its Reeves Queen WF Unit Well No.3 (API No.30-025-03127) located 660' FSL & 660' FWL in Section 22, Township 18 South, Range 35 East, NMPM, Lea County, New Mexico as originally authorized.

Produced water from the lease and an on-lease water supply well will be will be injected through existing perforations from 4432 feet to 4450 feet at a maximum surface injection pressure of 886 psi (.2 psi/ft uppermost perforation). The applicant will request an increased injection pressure of 1200 psi based on inferred data from 2 injection wells previously step-rate tested and approved for this increase. Maximum injection rates are expected to be between 100 and 200 bwpd.

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.

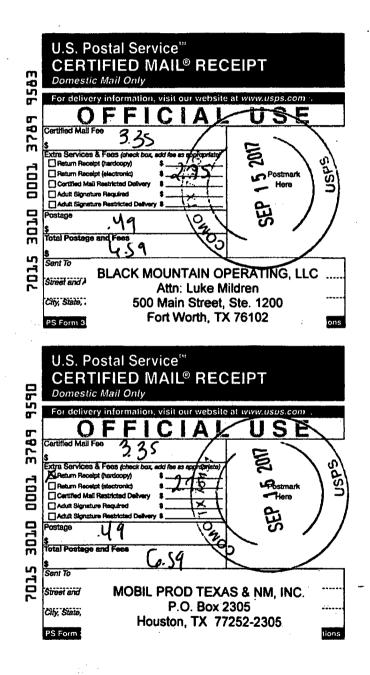
Best regards,

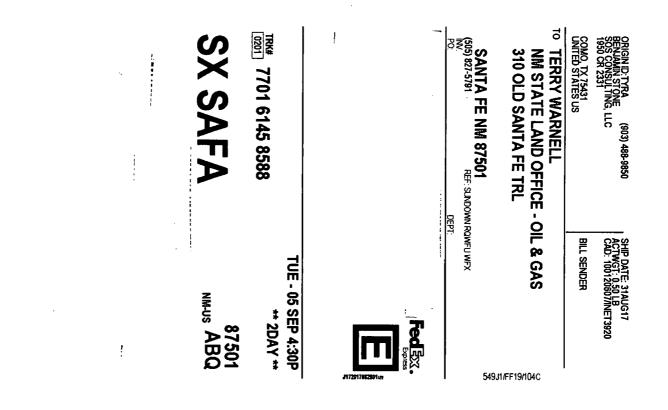
an

Ben Stone, SOS Consulting, LLC Agent for Sundown Energy, LP

Cc: Application File

Proof of Notice (Certified Mail Receipts - cont.)





After printing this label:

1. Use the 'Print' button on this page to print your label to your laser or inkjet printer.

2. Fold the printed page along the horizontal line.

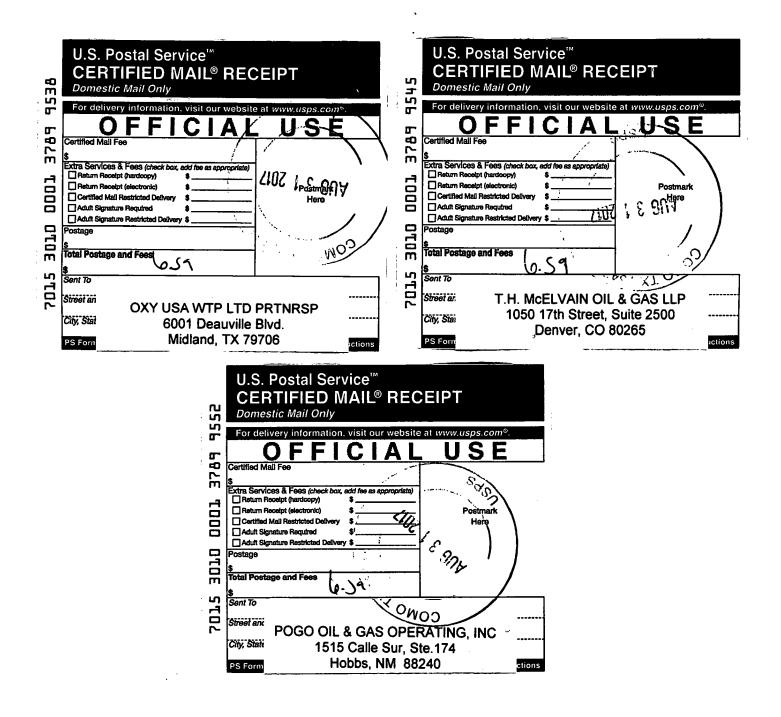
3. Place label in shipping pouch and affix it to your shipment so that the barcode portion of the label can be read and scanned.

Warning: Use only the printed original label for shipping. Using a photocopy of this label for shipping purposes is fraudulent and could result in additional billing charges, along with the cancellation of your FedEx account number.

Use of this system constitutes your agreement to the service conditions in the current FedEx Service Guide, available on fedex.com.FedEx will not be responsible for any claim in excess of \$100 per package, whether the result of loss, damage, delay, non-delivery, misdelivery, or misinformation, unless you declare a higher value, pay an additional charge, document your actual loss and file a timely claim.Limitations found in the current FedEx Service Guide apply. Your right to recover from FedEx for any loss, including intrinsic value of the package, loss of sales, income interest, profit, attorney's fees, costs, and other forms of damage whether direct, incidental, consequential, or special is limited to the greater of \$100 or the authorized declared value. Recovery cannot exceed actual documented loss.Maximum for items of extraordinary value is \$1,000, e.g. jewelry, precious metals, negotiable instruments and other items listed in our ServiceGuide. Written claims must be filed within strict time limits, see current FedEx Service Guide.

# C-108 - Item XIV

Proof of Notice (Certified Mail Receipts)



COMPLETE THIS SECTION ON DELIVERY SENDER: COMPLETE THIS SECTION A Signa Complete Items 1, 2, and 3. Print your name and address on the reverse so that we can return the card to you. **x** < Attach this card to the back of the malpiace, or on the tront if space permits.
 Article Addressed to: B. A .0. ng iry adi BLACK MOUNTAIN OPERATING, LLC Attn: Luke Mildren 500 Main Street, Ste. 1200 Fort Worth, TX 76102 Rowru 9590 9402 1356 5285 2003 33 2. Article Number (Transfer from eervice label) 7015 3010 0001 3789 9583 iniziani Dei PS Form 3811, July 2015 PSN 7530-02-000-6053 SENDER: COMPLETE THIS SECTION COMPLETE THIS SECTION ON DELIVERY SENDER, COMPLETE THIS SECTION Complete Items 1, 2, and 3. Complete Itame 1, 2, and 3.
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 Print your name and address on the reverse so that we can return the card to you. A Ska Print your name and address on the reverse so that we can return the card to you. CI Acent Ve х CI Addre O. Date of Deb Attach this card to the back of the malpiece, or on the front If space permits. B. Pacificad by Printed I Attach this card to the back of the malpies or on the front if space permits. 1. Article Addressed to 117 ΈÝ D. Is delivery eddress diffs If YES, onter delivery a rent from it CI Yes C Is delivery address different from item 1? If YES, enter delivery address below: O No OXY USA WTP LTD PRTNRSP MOBIL PROD TEXAS & NM, INC. LLC 6001 Deauville Blvd. 431 P.O. Box 2305 Houston, TX 77252-2305 Midland, TX 79706 C Priority Mell & C Registered Me C Registered Me Delivery Service Type C) Priority teleff Expre C) Receiverent Med Pri 46 9590 9403 0195 5120 3855 29 9590 9402 1356 5285 2663 40 den ins er Mensfer from service let 8 2. Article 7015 3010 0001 3789 9538 NEY. 70 PS Form 3811, April 2016 PSN 7530-02-000-0053 PS Form um Receipt . .... De 16 E

## C-108 - Item XIV

### Proof of Notice – Legal Notice Newspaper of General Circulation

#### LEGAL NOTICE September 1, 2017

Sundown Energy, LP, 16400 Dallas Parkway, St 100, Dallas, TX 75248, is filing Form C-108 (Application for Authority to Inject) with the New Mexico Oil Conservation Division for administrative approval to convert a well to injection in its Reeves Queen Waterflood Unit. The project was authorized for injection into the San Andres formation by Division Order R-13785 on January 21, 2014.

Sundown Energy proposes to now convert its Reeves Queen WF Unit Well No.3 (API No.30-025-03127) located 660' FSL & 660' FWL in Section 22, Township 18 South, Range 35 East, NMPM, Lea County, New Mexico as originally authorized.

Produced water from the lease and an on-lease water supply well will be will be injected through existing perforations from 4432 feet to 4450 feet at a maximum surface injection pressure of 886 psi (.2 psi/ft uppermost perforation). The applicant will request an increased injection pressure of 1200 psi based on inferred data from 2 injection wells previously step-rate tested and approved for this increase. Maximum injection rates are expected to be between 100 and 200 bwpd.

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. #32031

The above is the "Proof Copy" sent from the Hobbs News-Sun. The affidavit of publication will be forwarded as soon as it is received.

# Affidavit of Publication

STATE OF NEW MEXICO COUNTY OF LEA

I, Daniel Russell, Publisher of the Hobbs News-Sun, a newspaper published at Hobbs, New Mexico, solemnly swear that the clipping attached hereto was published in the regular and entire issue of said newspaper, and not a supplement thereof for a period of 1 issue(s).

> Beginning with the issue dated September 01, 2017 and ending with the issue dated September 01, 2017.

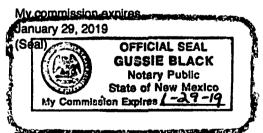
Pressel

Publisher

Sworn and subscribed to before me this 1st day of September 2017.

Slack uss

**Business Manager** 



This newspaper is duly qualified to publish legal notices or advertisements within the meaning of Section 3, Chapter 167, Laws of 1937 and payment of fees for said

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BEN STONE SOS CONSULTING, LLC. P.O. BOX 300 COMO, TX 75431

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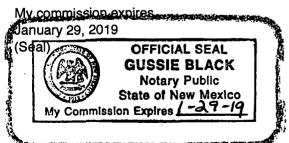
> Beginning with the issue dated September 01, 2017 and ending with the issue dated September 01, 2017.

Publisher

Sworn and subscribed to before me this 1st day of September 2017.

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**Business Manager** 



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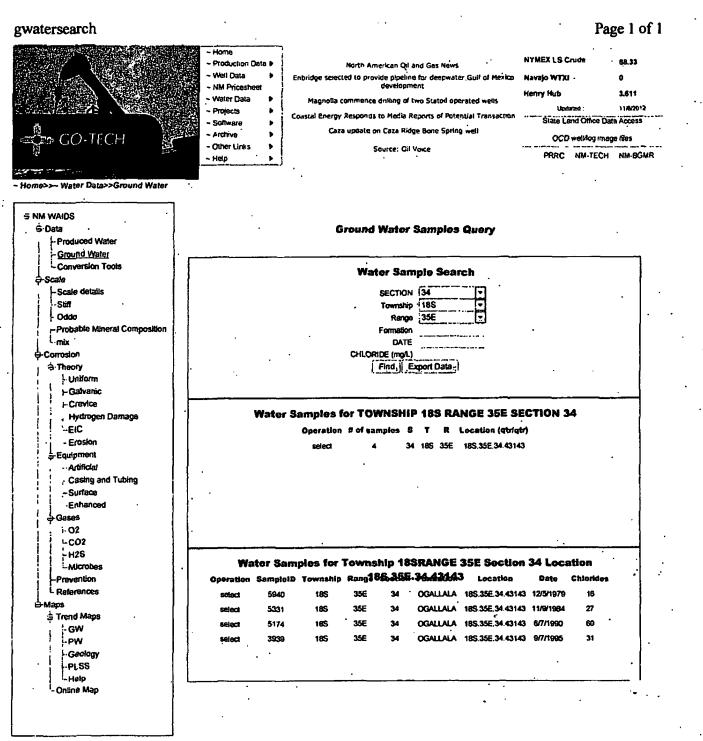
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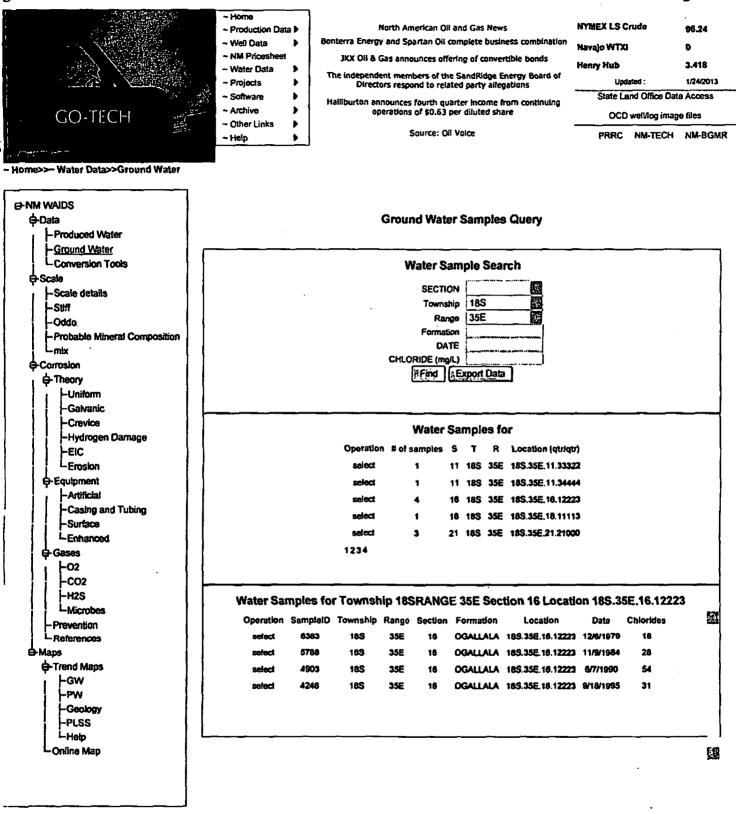
BEN STONE SOS CONSULTING, LLC. P.O. BOX 300 COMO, TX 75431



PETROLEUM RECOVERY RESEARCH CENTER, SOCORRO, NM-87801

11/7/2012

#### gwatersearch

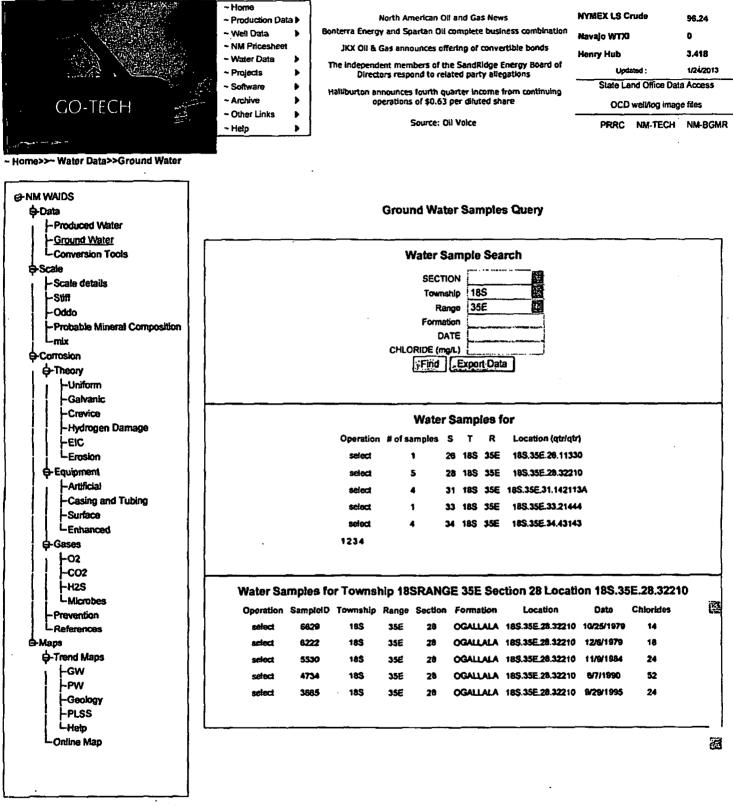


PETROLEUM RECOVERY RESEARCH CENTER, SOCORRO, NM-87801

1/25/2013

## gwatersearch

#### Page 1 of 1



FETROLEUM RECOVERY RESEARCH CENTER, SOCORRO, NM-87801

1/25/2013

PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NM 88240

December 19, 2012

KYLE PAXTON SUNDOWN ENERGY P. O. BOX 277

WICKETT, TX 79788

**RE: REEVES QUEEN WATERFLOOD UNIT** 

Enclosed are the results of analyses for samples received by the laboratory on 11/20/12 11:10.

Cardinal Laboratories is accredited through Texas NELAP under certificate number T104704398-11-3. Accreditation applies to drinking water, non-potable water and solid and chemical materials. All accredited analytes are denoted by an asterisk (\*). For a complete list on accredited analytes and matrices visit the TCEQ website at <a href="https://www.tceq.texas.gov/field/ga/lab\_accred\_certif.html">www.tceq.texas.gov/field/ga/lab\_accred\_certif.html</a>.

Cardinal Laboratories is accreditated through the State of Colorado Department of Public Health and Environment for:

Method EPA 552.2	Haloacetic Acids (HAA-5)
Method EPA 524.2	Total Trihalomethanes (TTHM)
Method EPA 524.4	Regulated VOCs (V1, V2, V3)

Accreditation applies to public drinking water matrices.

This report meets NELAP requirements and is made up of a cover page, analytical results, and a copy of the original chain-of-custody. If you have any questions concerning this report, please feel free to contact me.

Sincerely,

Celey D. Keine

Celey D. Keene Lab Director/Quality Manager

Page 1 of 14

# Laboratories

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PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NN 88240

SUNDOWN ENERGY P. O. BOX 277 WICKETT TX, 79788		Project: REEVES QUEEN WATERFLOOD U Project Number: NOT GIVEN Project Manager: KYLE PAXTON Fax To: NOT GIVEN			JN]	l Reported: 19-Dec-12 15:56			
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Analytical Results For:

Cardinal Laboratories

\*=Accredited Analyte

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Celing D.Ke

PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NM 88240

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**Cardinal Laboratories** 

\*=Accredited Analyte

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CARDINAL

PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NN 88240

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Analytical Results For:

**Cardinal Laboratories** 

\*=Accredited Analyte

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PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NM 88240

#### Analytical Results For: .

SUNDOWN ENERGY P. O. BOX 277 WICKETT TX, 79788		FLOOD UNI Reported: 19-Dec-12 15:56							
L	co	MP OF S V			103		·		
Analyte	Result	H2V28 Reporting Limit	Units	Dilution	Batch	Analyst	Analyzed	Mathad	Notes
				<u>.</u>					
		Cardin	al Laborat	ories					
norganic Compounds			<u>.</u>			·····			· ·
Ikalinity, Bicarbonate	317	5.00	mg/L	1	2110104	HM	13-Dec-12	310.1	
kalinity, Carbonate	ND	0.00	mg/L	1	2310104	HM	13-Dec-12	310.1	
bloride"	16700	4.00	mg/L	1	2121905	HM	19-Dec-12	4500-CI-B	
ondactivity"	- 50900	1.00	uS/cm	1	2121806	AP	18-Dec-12	120.1	
<b>]•</b>	7.57	. 0.100	pH Units	<b>.</b> .	2121910	HM	II-Dec-12	150.1	
esistivity	0.196	0.000	Ohms/m (blank)	1	2121908 2121909	HM HM	18-Dec-12	120.1 SM 2710F	
pecific Gravity @ 60° F	1,016 	· 0,000 10.0	(come) mg/L	-	2121909	AP	19-Dec-12	-	
ILLRIC" DS4	. 296 . 33300	5.00	шу/L mg/L	i.	2120501	AP AP	10-Dec-12	160.1	•
	260 <sup>··</sup>	4.00	mg/L.	•	2110104	. ~~ HM	13-Dec-12 13-Dec-12	310.1	. ·
ikelizity, Totel*	200	4.00		•	2110104	1774	13-1200-12	314.1	
issolved Metals				·			•		
artum -	ND	1.00	mg/L	100	2121907	СК	13-Dec-12	200.7	GAI
ekium	2209	100	mg/L	100	2121907	CK ·	13-Dec-12	200.7	GA
0	ND	5.00	mg/L	100	2121907	CK	13-Dec-12	200.7	GA
agrestum ·	619	100	mg/L	100	2121907	СК	13-Dco-12	200,7	GAL
rtassium .	. 326	100	mg/L	100	2121907	CK	13-Dec-12	200.7	GAL
ngiam	7650	100	mg/L	100	2121907	CK	13-Dec-12	200.7	GAL

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Celey D.K.

Celey D. Keene, Lab Director/Quality Manager

Page 5 of 14

Laboratories

PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NM 88240

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Sundown Energy P. O. Box 277 Wickett TX, 79788	•	Project Number: Project Manager:	· · ·	Reported: 19-Dec-12 15:56

Analytical Results For:

#### Inorganic Compounds - Quality Control

		Reporting		Spike	Source	••	<b>%REC</b>		RPD	
Analyte	Result	Limit	Uzits	Lovel	Result	WREC	Limits	RPD	Limit	Notes
Batch 2101718 - *** DEFAULT PREP ***										
Biank (2101718-BLK1)		• •		Prepared:	7-Oct-12 A	nalyzed: 0	9-Nov-12			
	ND	1.00	mg/L,	_						
PO(BISSIUED)	ND	1.00	mg/L	•						
). Beirinm	ND	. 1.60	യു/L							
LCS (2101718-BS1)	_	· ·		Prepared &	Analyzed:	17-Oct-12				
Popassium	3.00		mg∕L	3.00		100	80-120			
Magnesium	54,4		mg/L,	50.0		· 109	80-120		•	
Calcium	20.8		mg/L	. 20.0		· 104	80-120			
Duplicate (2101718-DUP1)	Soa	rce: H202593-	<u>01</u>	Prepared: 1	7-Oct-12 A	nalyzed: 0	-Nov-12			
Magnesium .	1820	1.00	mg/L		1880			3.24	20	
Celcium	6710	1.60	mg/L		6410		•	4.57	20	
Potessian	540	1.00	mg/L		540			0.00	20	
Batch 2110104 - General Prep - Wet Chem										
	•			Descended 6	Analyzed	31-Oct-12				
Bank (2110104-BLK1)	·			гтератев а						
	<u>-</u>	0.00	mg/L	rieparcu a						
Alkalinity, Carbonate	ND ND	- 0.00		riquard o			:			•
Ikalinity, Carbonate Ikalinity, Bicarbonato	-						:			•
Utalinity, Carbonate Utalinity, Bicarbonato Ikalinity, Total	ND	5.00	mg/L		Analyzed:	31-Oct-12	:			•.
Utalinity, Carbonate Utalinity, Bicarbonato Utalinity, Total CS (2110104-BS1)	ND	5.00	mg/L		· · ·	<u>31-Oct-12</u>	80-120			•.
Bhank (2110104-BLK1) Alkalinity, Carbonato Alkalinity, Bicarbonato Alkalinity, Total LCS (2110104-BS1) Alkalinity, Carbonato Alkalinity, Bicarbonato	ND ND	5.00 4.00	mg/L mg/L		· · ·	<u>31-Oct-12</u>	80-120 80-120			•.
Utelinity, Carbonate Utelinity, Bicarbonato Utelinity, Total CS (2110104-BS1) Utelinity, Carbonate Utelinity, Bicarbonate	ND ND	5.00 4.00	mg/L mg/L mg/L		· · ·	31-Oct-12 112				•.
Utalinity, Carbonate Utalinity, Bicarbonato Ukalinity, Total CS (2110104-BS1) Utalinity, Carbonate Ukalinity, Bicarbonate Ukalinity, Total	ND ND ND 137	5.00 4.00 0.00 5.00	mg/L mg/L mg/L mg/L	Prepared &	· · ·	112	80-120			· .
Utalinity, Carbonate Utalinity, Bicarbonato Utalinity, Total CS (2110104-BS1) Utalinity, Carbonate Utalinity, Bicarbonate Utalinity, Total CS Dup (2110104-BSD1)	ND ND ND 137	5.00 4.00 0.00 5.00	mg/L mg/L mg/L mg/L	Prepared &	Analyzed:	112	80-120			•
Utalinity, Carbonate Utalinity, Bicarbonato Utalinity, Total LCS (2110104-BS1) Utalinity, Carbonate	ND ND 137 112	5.00 4.00 5.00 4.00	mg/L mg/L mg/L mg/L mg/L	Prepared & 100	Analyzed:	112	80-120 80-120	0.00	20	•

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PHONE (575) 393-2326 \* 101 E. MARLAND \* HOBBS, NM 88240

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		Analyti	ical Res	sults For:			÷.				
SUNDOWN ENERGY	•	 i	Project:	REEVES QU	EEN WATI	RFLOOD	UN)		Reported:		
P. O. BOX 277								<u>,</u> 19-	Dec-12 1	5:56	
WICKETT TX, 79788		-	-					•			
			Fax To: 1	REEVES QUEEN WATERFLOOD UNI NOT GIVEN       Report 19-Dec-1         KYLE PAXTON NOT GIVEN       19-Dec-1         s - Quality Control       boratories         Spike Source       %REC       RPI         Level Result       %REC       Limits         Prepared & Analyzed: 26-Nov-12       100       104         Prepared & Analyzed: 26-Nov-12       100       20         Prepared & Analyzed: 26-Nov-12       20         Prepared: 21-Nov-12 Analyzed: 29-Nov-12       20         Prepared: 21-Nov-12 Analyzed: 29-Nov-12       20         Prepared: 21-Nov-12 Analyzed: 29-Nov-12       20         Prepared & Analyzed: 26-Nov-12       6.21       20         101       90.6       80-1							
	Inor	-			Control					•	
· ·		Cardi	nal Lab	oratories		•					
		Reporting		•					RPD		
Analyte	Result	Limit	Unita	Level	Result	KREC	Limits	RPD	Limit	Notes	
atch 2112104 - General Prep - Wet	Chem	•						·			
lank (2112104-BLK1)				Prepared &	Analyzed:	26-Nov-12	2			<u>-</u>	
bloride	ND	4.00	mg/L							•	
ACS (2112104-BS1)	•	:			Analyzed:		<u></u>				
bloride .	- 104	4.00	mg/L	100		104	80-120				
CS Dap (2112104-BSD1)				Prepared &	Analyzed:	26-Nov-12	2				
hloride	104	4.00	mg/L	100		104	80-120	0.00	20		
atch 2112602 - Filtration	·									-	
lank (2112602-BLK1)				Prepared; 2	1-Nov-12	Analyzed: 2	29-Nov-12	•	•		
DS	ND	5.00	mg/L							•	
CS (2112602-BS1)			-	Prepared: 2	1-Nov-12	Analyzed: 2	29-Nov-12		-		
DS	· 239	<del></del> .						•		•	
uplicate (2112602-DUP1)	Sonw	æ: <b>H2</b> 02812	-03	Prepared 7	1-Nov-12	halvzed 2	9-Nov-12				
DS	1560	5.00	 					6.21	20	• .	
atch 2112607 - General Prep - Wet	Chem		<b>v</b>		•					•	
CS (2112607-BS1)				Prepared &	Analyzed:		2				
1	7,05		pH Units	7.00		. 101	90-110				
onductivity	. 1410		oS/cm	·1410		· 100	80-120		•		
aplicate (2112607-DUP1)	Source	<del>:: H202825</del>	-01 .	Prepared &	Analyzod:	26-Nov-12	2	<u> </u>		•	
natuctivity	40300	1.00	uS/cm						20		
H	6.14	0.100	pH Units		6.11			0.490	20		
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PLACE NOTE: Linking and Conteges. Condition for the section of early of this print, which plants in control or boy, and be landed to the section with the defense. All claims, including from he medium and any class subjects and to decard within which can be writed and by Cardinal within Gary (30) class bits controller of the specific writes. In one part that Cardinal to be been by Cardinal bits for acception of the specific writes. In one part that Cardinal to the specific writes are stated and the specific write are stated and the specific writes are stated and the specific write and the specific write are stated and the specific write are stated and the specific write are stated and the specific write writes are stated and the specific write write are stated and the specific write writes are stated and the specific write write write write write write write are stated and the specific write write writes are stated and the specific write writ

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PHONE (575) 393-2326 \* 101 L MARLAND \* HOBBS, NM 88240

			<b>REEVES QU</b>		RFLOOD	UNI	l	Reported:	
	Project N	umber:	NOT GIVEN			•	19-	Dec-12 1	5:56
	Project Ma	nager:	KYLE PAXTO	DN					
	f	ax To:	NOT GIVEN						
Inorg				•					
· . 	Cardin	al Lab	oratories						
•	Reporting		Spike	Source		%REC		RPD	
Result	Limit	Units	Level	Result	%REC	Limits	RPD	Limit	Notes
œ			•				·	• 	
			Prepared &	Analyzed:	27-Nov-12	· ·			
ND	· 10.0	mg/L			_	•			•
			Prepared &	Analyzed:	27-Nov-12				•
16.9	10,0	æg/L.	20.0		84.6	80-120			
			Prepared &	Analyzed:	27-Nov-12	!			
19.4	10.0	mg/L	20.0		97,2	80-120	13.8	· 20	
						•			
<u></u>	-		Prepared &	Analyzed:	10-Dec-12	· ·	~~~~~	. •	
. ND	10.0	mg/L,			•				
			Prepared &	Analyzed:	10-Dec-12	• .	•		•
16.7	10,0	mg/L	20.0		83.7	80-120			
	•		Prenared &	Analyzed	10-Dec-12				
18.1	10,0	mg/L	20.0		90.4	80-120	7,64	20	- ;
			•						
	· · · · · · · · · · · · · · · · · · ·		Durand B					••••••	
ND	5.00	=ug/L	inchanco a	- ANELYZCO:	0-100-12			•	'
		•	Democrad A	Annhand	06-De- 12			•	
		ms/L		-maryzed:		80-120			
		,	2-10	•			•		1
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•									
	Result ID ND 16.9 19.4 ISI 16.7 18.1	F Inorganic Com Cardin Result Limit Im ND 10.0 16.9 10.0 19.4 10.0 IS.1 10.0 18.1 10.0 18.1 10.0	Fax To: Inorganic Compounds Cardinal Lat Reporting Limit Units m ND 10.0 mg/L 16.9 10.0 mg/L 19.4 10.0 mg/L 19.4 10.0 mg/L 19.4 10.0 mg/L 18.1 10.0 mg/L 18.1 10.0 mg/L	Fax To: NOT GIVEN Inorganic Compounds - Quality Cardinal Laboratories Reporting Spike Limit Units Level ma Prepared & ND 10.0 mg/L Prepared & 16.9 10.0 mg/L 20.0 Prepared & 19.4 10.0 mg/L 20.0 Prepared & 19.4 10.0 mg/L Prepared & 16.7 10.0 mg/L Prepared & 16.7 10.0 mg/L 20.0 Prepared & 16.1 10.0 mg/L 20.0 Prepared & 18.1 10.0 mg/L 20.0 Prepared & 18.1 10.0 mg/L 20.0 Prepared & ND 5.00 mg/L Prepared & ND 5.00 mg/L Prepared & ND 5.00 mg/L Prepared &	Fax To: NOT GIVEN Inorganic Compounds - Quality Control Cardinal Laboratories Reporting Spike Source Level Result Init Units Level Result Prepared & Analyzed: ND 10.0 mg/L Prepared & Analyzed: 16.9 10.0 mg/L 20.0 Prepared & Analyzed: 19.4 10.0 mg/L 20.0 Prepared & Analyzed: 19.4 10.0 mg/L Prepared & Analyzed: 16.7 10.0 mg/L Prepared & Analyzed: 18.1 10.0 mg/L Prepared & Analyzed: 18.1 10.0 mg/L Prepared & Analyzed: ND 5.00 mg/L	Fax To: NOT GIVEN Inorganic Compounds - Quality Control Cardinal Laboratories Reporting Spike Source Result Limit Units Level Result %REC TEM Prepared & Analyzed: 27-Nov-12 ND 10.0 mg/L Prepared & Analyzed: 27-Nov-12 16.9 10.0 mg/L 20.0 \$4.6 Prepared & Analyzed: 27-Nov-12 19.4 10.0 mg/L 20.0 \$7.2 Prepared & Analyzed: 10-Dec-12 ND 10.0 mg/L Prepared & Analyzed: 10-Dec-12 16.7 10.0 mg/L 20.0 \$3.7 Prepared & Analyzed: 10-Dec-12 16.7 10.0 mg/L 20.0 \$3.7 Prepared & Analyzed: 10-Dec-12 16.7 10.0 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 18.1 10.0 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 18.1 10.0 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 ND \$1.00 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 ND \$1.00 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 ND \$1.00 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 ND \$1.00 mg/L 20.0 \$0.4 Prepared & Analyzed: 10-Dec-12 ND \$1.00 mg/L 20.0 \$0.4	Fax To: NOT GIVEN           Inorganic Compounds - Quality Control Cardinal Laboratories           Reporting Result         Spike Source Result         %REC Limits           Prepared & Analyzed: 27-Nov-12           ND         10.0         mg/L           Prepared & Analyzed: 27-Nov-12           ND         10.0         mg/L           Prepared & Analyzed: 27-Nov-12           IG 9         10.0         mg/L         20.0         84.6         80-120           Prepared & Analyzed: 27-Nov-12           IG 9         10.0         mg/L         20.0         84.6         80-120           Prepared & Analyzed: 10-Dec-12           IO 0         mg/L         Prepared & Analyzed: 10-Dec-12           IS 0         10.0         mg/L         Prepared & Analyzed: 10-Dec-12           ND         10.0         mg/L         Prepared & Analyzed: 06-Dec-12           ND         spaned & Analyzed: 06-Dec-12	Fax To: NOT GIVEN           Inorganic Compounds - Quality Control Cardinal Laboratories           Reporting Result         Spike Limit         Source Level         %REC Result         %REC Limits         %REC Limits <td>Fax To: NOT GIVEN           Inorganic Compounds - Quality Control Cardinal Laboratories           Reporting Result         Spike Limit         Source Spike         %REC Result         RPD Limit         RPD Limit           Prepared &amp; Analyzed: 27-Nov-12           ND         10.0         mg/L        </td>	Fax To: NOT GIVEN           Inorganic Compounds - Quality Control Cardinal Laboratories           Reporting Result         Spike Limit         Source Spike         %REC Result         RPD Limit         RPD Limit           Prepared & Analyzed: 27-Nov-12           ND         10.0         mg/L

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		Anaryo	cai ne	SUILS POR	•		•		**		
SUNDOWN ENERGY P. O. BOX 277 WICKETT TX, 79788	Project: REEVES QUEEN WATERFLOOD UNI Project Number: NOT GIVEN Project Manager: KYLE PAXTON Fax To: NOT GIVEN								Reported: 19-Dec-12 15:56		
	Inoi	rganic Com Cordin	-	s - Quality poratories			•			•	
				··· · · · ·		<u> </u>				-,	
alyte	Result	Reporting Limit	Units	Spike Level	Source Result	%REC	%REC Limits	RPD	· RPD Limit	Notes	
tch 2120605 - Filtration	•					•					
plicate (2120605-DUP1)	Sou	rce: H202905-	-01	Prepared &	Analyzed:	: 06-Dec-12	•				
s <u> </u>	1200	5.00	mg/L		1140			5.13 .	20		
nteh 2121806 - General Prep - Wet Chem											
(2121806-BS1)				Prepared &	Analyzed:	: 18-Dec-12	<u> </u>				
aductivity	478		uS/cm	500		95.6	80-120				
plicate (2121806-DUP1)	Sou	Source: H203018-01 P		Prepared &	: Analyzed:	: 18-Dec-12					
aductivity	1530	00,1	uS/cm		1530			0.00	20		
ntch 2121905 - General Prep - Wet Chem		•				-	•	•	•		
auk (2121905-BLK1)				Prepared &	Analyzed	19-Dec-12					
loride	ND	4.00	mg/L								
CS (2121905-BS1)				Prepared &	Analyzed:	19-Dec-12				• .	
laride	100	4.00	mg/L	100		100	80-120		•		
S Dup (2121905-BSD1)				Prepared &	Analyzed	19-Dec-12	•				
aride	108	4.00	mg/L	100		108	80-120	7,69	20	•	
tch 2121909 - General Prep - Wet Chem											
plicate (2121909-DUP1)	Som			Prenared &	Analyzed	19-Dec-12					
cific Gravity @ 60° F	1.014	0.000	(blank)		1.016			0.216	200		
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Analytical Results For:

Cardinal Laboratories

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RUGE NOTE LANDER IN DESIGN. Contents both, and don't enders result for any data withing whether based in contents or test, shall be bedued to the structure past by data for unders. All datas, including them in registrate and any other came within the structure whether whether and an and by datas within datas bathy (0) days after compatible of the structure. It as east that for indicate and beduege within findicate, basics in the of state of states and by datas a statesticate, attribute to the structure of the structure of the structure of the statesticate by datas in and statesticate and datas is basis over of the structure and datas in the structure structure statesticate attribute to the structure.

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SUNDOWN ENERGY P. O. BOX 277 WICKETT TX, 79788		Project:       REEVES QUEEN WATERFLOOD UN)       Re         Project Number:       NOT GIVEN       19-C         Project Manager:       KYLE PAXTON       Fax To:         Fax To:       NOT GIVEN       19-C								
	Ino	rganic Compound							•	
	•	Cardinal La	boratories						•	_
analyte	Result	Reporting Limit Units	Spike Level	Source Result	%REC	%REC Limits	RPD	RPD Limit	Notes	
atch 2121910 - General Prep - Wet Chem			·····		•		•			_
CS (2121910-BS1)			Prepared é	Analyzed:	11-Dec-12					
3	7.00	pH Unit	s 7.00		100	90-110				_
uplicate (2121910-DUP1)		rce: H202825-03			11-Dec-12					_
1	7.61	0.100 pH Unit	5	7.57			0.527	20		
					•			•	•	
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<u>5</u>		• .		• •		-		·		
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Celey D. Keene, Lab Director/Quality Manager

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C-108 Review Checklist	125	7			
	alor				
C-108 Review Checklist	Received Add. Req	uest:		Suspended:	
ORDER TYPE WF / PMX / SWD	Number: Orde	er Date:	Legacy Perm	its/Orders: <u>P-13</u>	785 + P
Well No. 6 Well Name(s):			r hf		
API: 30-0 25-03127 Spud	Date: 5/02/1968	New or Old	: _ 🕰 (UIC Class	ll Primacy 03/07/1982)	
API: 30-0       25-03127       Spud         660F5L       5       5         Footages       660F0L       Log	otor Unit <u>M</u> Sec <u>2.2</u>	Tsp	<b>FS</b> Rge _ <b>3</b>	ZE County Le	7
General Location: <u>220miles</u>	LI HUBES Pool:	pee	VES GHE	Cn Pool No.: 52	070
BLM 100K Map: <u><u><u>H0</u>DD</u> Operator: <u>5</u></u>	undown Eners;	JLK OGRI	D: 232611 Con	tact: <u>Ben 5to</u>	ne' As cont
COMPLIANCE RULE 5.9: Total Wells: 37 Ina					
WELL FILE REVIEWED O Current Status:	letive				
WELL DIAGRAMS: NEW: Proposed () or RE-ENT					
WELL DIAGRAMS: NEW: Proposed () of Re-ENT	ER. Belore Conv. ( Alter		Logs in imaging	<u></u>	
Planned Rehab Work to Well:			<del></del>		
Well Construction Details Sizes (in) Borehole / Pip	Setting e Depths (ft)		Cement Sx/or Cf	Cement Top and Deterr	nination M ethod
Planned _or Existing _Surface 77/13	721	Stage Tool	400	SupFLL-	elvisou
Planned_or Existing Interm/Prod / 2/4/5	\$ 4000	1	1650		1415421
Planned_or ExistingInterm/Prod 778 4			1280	SAFFLE	IVISUEI
Planned_or Existing _ Prod/Ling			1680	37.7	
			<u> </u>	<u> </u>	
Planned_or Existing _ Liner Planned_or Existing _ OH /PERF UU32-49	50	Inj Length	Comp	L letion/Operation Deta	ils:
Injection Lithostratigraphic Units: Depths (ft)	Injection or Confining	Tops		76 РВТО	
Adjacent Unit: Litho. Struc. Por.	Units			NEW PBTD	
Confining Unit: Litho. Struc. Por.			NEW Open Hole		D Tor
Proposed Inj Interval TOP:			Tubing Size	In. Inter Coated?	D FPI 492
Proposed Inj Interval BOTTOM:			Proposed Packer	Depth 433 2 ft	- / /
Confining Unit: Litho. Struc. Por.				4332 (100-ft limit	a
Adjacent Unit: Litho. Struc. Por.				face Press. 1200 ps	
AOR: Hydrologic and Geologic	Information			<b>%&amp; 7</b> (0.2 psi pe	
POTASH: R-111-P Noticed? BLM Sec				NW: Cliff House fm	
FRESH WATER: Aquifer 94000	Max Depth	Унуря	O AFFIRM STATEM	ENT By Qualified Perso	<u>m</u> O
NMOSE Basin:		•		s?, FW Analysi	
Disposal Fluid: Formation Source(s)	•				
Disposal Int: Inject Rate (Avg/Max BWPD):	1200 Protectable Wa	ters?	Source:	_ System: Closed or C	)pen
HC Potential: Producing Interval? Former					
AOR Wells: 1/2-M Radius Map?	ist? Total No. Wells	Penetrating	Interval:	_ Horizontals?	_
Penetrating Wells: No. Active Wells	pairs?on which well(s)	?		Diagrams?	
Penetrating Wells: No. P&A Wells				Diagrams?	∠
NOTICE: Newspaper Date <u>6'-01-2017</u> Minu RULE 26.7(A): Identified Tracts? <u></u> Affected		Surface	Owner Musv	N. Date	2-3/-2011
RULE 26.7(A): Identified Tracts?	Persons: BLARK	104M+	Eins Page	möbi / N. Date_	5-102-2-17
Irder Conditions: Issues:		<u> </u>			
dd Order Cond:					



(A CLW##### in the POD suffix indicates the POD has been replaced & no longer serves a water right file.)	D suffix indicates the replaced, D has been replaced O=orphaned, no longer serves a C=the file is ter right file.) closed)							E 3=SW argest)		3 UTM in meter	s) (	In feet)	
POD Number	Code	POD Sub- basin	County	Q Q 64 16	_		Tws	Rng	х	Y	DepthWellDep		/ater lumn
<u>L 02520</u>		L	LE		1	23	18S	35E	647088	3622989*	134	78	56
<u>L 02678</u>		L	LE	3	4	22	18S	35E	645890	3622166* 🔴	200	58	142
<u>L_02678</u>	R	L	LE	3	4	22	18S	35E	645890	3622166* 🔴	200	58	142
L 02678 POD2	R	L	LE	3	4	22	18S	35E	645890	3622166* 🔴	185	58	127
L 02678 POD3		L	LE	3	4	22	18S	35E	645890	3622166* 🔵	190	154	36
<u>L 02679</u>		L	LE	4	4	21	18S	35E	644680	3622151* 🔴	200	68	132
<u>L 02679</u>	R	L	LE	4	4	21	18S	35E	644680	3622151* 🔴	200	68	132
<u>L 02679 POD2</u>		L	LE	3	2	22	18S	35E	645876	3622973* 🔴	187	65	122
<u>L 02680</u>		L	LE	1	2	21	18S	35E	644257	3623357* 🛑	190	59	131
<u>L_03772</u>		L	LE	2	2	21	18S	35E	644659	3623361* 🍘	130	60	70
<u>L 03783</u>		L	LE	•		27	18S	35E	645710	3621138* 🌑	115	65	50
<u>L 03866</u>		L	LE	3	3	22	18S	35E	645082	3622155* 🔴	127	65	62
<u>L 03963</u>		L	LE	1	2	27	18S	35E	645896	3621762* 🌎	127	70	57
<u>L. 04399</u>		L	LE	3	3	22	18S	35E	645082	3622155* 🔵	90	75	15
<u>L 05810</u>		L	LE	2	3	22	18S	35E	645479	3622564* 🔴	145	95	50
<u>L 06868</u>		L	LE	14	3	26	18S	35E	647026	3620666* 🔴	110	57	53
<u>L 06869</u>		L	LE	1	3	26	18S	35E	646717	3620966* 🌔	125	60	65
<u>L 09373</u>		L	LE	1	1	26	18S	35E	646704	3621773* 🔮	120	60	60
										Average Depth to	o Water:	70 feet	t
										Minimu	um Depth:	57 feet	t
										Maximu	m Depth:	154 feet	t
Record Count: 18												1	
PLSS Search:												;	
Section(s): 21-2.	3, 26-28	Townshi	<b>p:</b> 18S	Ra	nge	e: 351	3						

\*UTM location was derived from PLSS - see Help

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9/13/17 3:38 PM

WATER COLUMN/ AVERAGE DEPTH TO WATER