Chevron U.S.A. Inc.
P. O. Box 1660, Midland, TX 79702

Production Department
Mid-Continent Division

July 5, 1984

Application for Administrative Approval
Expansion of Existing Waterflood Project
Maljamar Grayburg Unit
Lea County, New Mexico

State of New Mexico
Energy and Minerals Department
Oil Conservation Division
P. O. Box 2088
State Land Office Building
Santa Fe, New Mexico 87501

Gentlemen:

It is respectfully requested that administrative approval be granted to expand the existing waterflood project at the Maljamar Grayburg Unit by converting the Maljamar Grayburg Unit No. 78 to water injection. The subject well is located in Unit J, 50' FWL, 1400' FSL, Section 3, T17S, R32E in Lea County, New Mexico.

The original authorization for the Maljamar (Grayburg) water injection project was granted to Mr. Leonard Nichols by Commission Order No. 1538. Subsequent expansion of the project was approved under Order No. 2777, 3035 and R3178.

The Maljamar Grayburg Unit No. 78 was drilled and completed as an oil producer in 1981. Production has declined steadily to its current level of 2 BOPD. Conversion of the Maljamar Grayburg Unit No. 78 to injection will increase pressure in the north central section of the unit, possibly affecting previously unswept areas, thereby preventing waste. A response to water injection in the Maljamar Grayburg Unit No. 78 is expected at unit well numbers 10 and 19.

Injection at the Maljamar Grayburg Unit No. 78 will be into the Grayburg-San Andres formation over a selectively perforated interval from 3921' to 4245'. The Grayburg-San Andres formation consists of fine to very-fine grained, silty sandstones with a porosity ranging from 2 to 14%. Five Grayburg Sand zones, as well as the Premier and Lovington Sands, are present in the unit. The Lovington Sand lies approximately 120' below the top of the San Andres with the Premier Sand immediately above the top of the San Andres. Formation tops at the Maljamar Grayburg Unit No. 78 are as follows: Grayburg at 3783', San Andres at 4089'. No known fresh water aquifers are penetrated by the Maljamar Grayburg Unit No. 78.

An open injection system will be utilized with an average injection pressure of 2500 psi and a maximum injection pressure of 3000 psi. The injected water will be field produced salt water from the Grayburg formation injected at an average rate of 300 BPD with a maximum rate of 600 BPD.

The attached are in support of this application:

STATE OF NEW MEXICO
ENERGY AND MINERALS DEPARTMENT

OIL CONSERVATION DIVISION
POST OFFICE BOX 2088
STATE LAND OFFICE BUILDING
SANTA FE, NEW MEXICO 87501

FORM C-108
Revised 7-1-81

APPLICATION FOR AUTHORIZATION TO INJECT

I. Purpose: [XX] Secondary Recovery [ ] Pressure Maintenance [ ] Disposal [ ] Storage
Application qualifies for administrative approval? [XX] yes [ ] no

II. Operator: Chevron U.S.A. Inc.

Address: P.O. Box 1660, Midland, Texas 79702

Contact party: R. F. Luebbe Phone: (915) 686-1682

III. Well data: Complete the data required on the reverse side of this form for each well proposed for injection. Additional sheets may be attached if necessary.

IV. Is this an expansion of an existing project? [XX] yes [ ] no
If yes, give the Division order number authorizing the project 1538.

V. Attach a map 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. Attach a tabulation of data on all wells of public record within the area of review which penetrate the proposed injection zone. Such data shall include a description of each well's type, construction, date drilled, location, depth, record of completion, and a schematic of any plugged well illustrating all plugging detail.

VII. Attach data 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. Attach appropriate geological data on the injection zone including appropriate lithologic detail, geological 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 source known to be immediately underlying the injection interval.

IX. Describe the proposed stimulation program, if any.

* X. Attach appropriate logging and test data on the well. (If well logs have been filed with the Division they need not be resubmitted.)

* XI. Attach a chemical analysis of fresh water from two or more fresh water wells (if available and producing) within one mile of any injection or disposal well showing location of wells and dates samples were taken.

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 source of drinking water.

XIII. Applicants must complete the "Proof of Notice" section on the reverse side of this form.

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: W. A. Goudeau Title Western Area Superintendent

Signature: W. A. Goudeau Date: July 5, 1984

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

DISTRIBUTION: Original and one copy to Santa Fe with one copy to the appropriate Division district office.

III. WELL DATA

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 name of the next higher and next lower oil or gas zone in the area of the well, if any.

XIV. PROOF OF NOTICE

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, P. O. Box 2088, Santa Fe, New Mexico 87501 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.

AFFIDAVIT OF PUBLICATION

State of New Mexico,

County of Lea.

I, Robert L. Summers

of the Hobbs Daily News-Sun, a daily newspaper published at Hobbs, New Mexico, do solemnly swear that the clipping attached hereto was published once a week in the regular and entire issue of said paper, and not in a supplement thereof for a period

of

One weeks/

Beginning with the issue dated

July 12, 19 84

and ending with the issue dated

July 12, 19 84

Robert L. Summers
Publisher.

Sworn and subscribed to before me this 19 day of July, 1984

Jane F Paulowsky
Notary Public.

My Commission expires

3-24, 1987

(Seal)

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 publication has been made.

OFFICIAL SEAL
Signature Jane F Paulowsky
JANE PAULOWSKY
NOTARY PUBLIC - NEW MEXICO
NOTARY BOND FILED WITH SECRETARY OF STATE
My Commission Expires 3-24-87

LEGAL NOTICE
July 12, 1984

NOTICE OF APPLICATION FOR AUTHORIZATION TO INJECT FLUID AT THE MALJAMAR GRAYBURG UNIT

Chevron U.S.A. Inc., P.O. Box 1660, Midland, Texas 79702 has applied to the New Mexico Oil Conservation Division for a permit to expand an existing waterflood project at the Maljamar Grayburg Unit.

The applicant proposes to inject fluid into the Grayburg-San Andres formation in the Maljamar Grayburg Unit, Well Number 78. The proposed well is located 50 feet FWL and 1400 feet FSL, Section 3, Township 17S, Range 32E, Lea County, New Mexico. Fluid will be injected into strata in the depth interval from 3921 to 4245 feet at a maximum pressure of 3000 psi and a maximum rate of 600 barrels per day.

Interested parties may file objections or requests for a hearing within fifteen days to the Oil Conservation Division, P.O. Box 2088, Santa Fe, New Mexico 87501.

Requests for further information concerning any aspect of the application should be submitted to Mr. R.F. Luebbe with Chevron U.S.A. Inc. at (915) 686-1682.

1. A map with the location of the proposed injection well and area of review identified.

2. A schematic and history for each well of public record within the area of review.

3. A copy of form 9-331 filed with the BLM describing the proposed stimulation program.

4. A copy of the dual laterlog, compensated neutron-formation density log and a micro-seismogram log-cased hole for the Maljamar Grayburg Unit No. 78.

The following is a list of offset operators who have been sent a copy of this application:

Collier Energy Inc., P.O. Drawer R, Artesia, New Mexico 88210.

If additional information is required concerning this matter, please contact Mr. R. F. Luebbe at (915) 686-1682.

Yours very truly,

W. A. Goudeau
Western Area Superintendent

RFL:cjc

Attachments

P055405162

RECEIPT FOR CERTIFIED MAIL

NO INSURANCE COVERAGE PROVIDED—
NOT FOR INTERNATIONAL MAIL
(See Reverse)

SENT TO
COLLIER ENERGY INC
STREET AND NO.
PO DRAWER R
P.O., STATE AND ZIP CODE
ARTESIA, NEW MEXICO 88210

POSTAGE		$1.22
CONSULT POSTMASTER FOR FEES	CERTIFIED FEE	.75¢
OPTIONAL SERVICES	SPECIAL DELIVERY	¢
	RESTRICTED DELIVERY	¢
	RETURN RECEIPT SERVICE — SHOW TO WHOM AND DATE DELIVERED	.60¢
	RETURN RECEIPT SERVICE — SHOW TO WHOM, DATE, AND ADDRESS OF DELIVERY	¢
	RETURN RECEIPT SERVICE — SHOW TO WHOM AND DATE DELIVERED WITH RESTRICTED DELIVERY	¢
	RETURN RECEIPT SERVICE — SHOW TO WHOM, DATE AND ADDRESS OF DELIVERY WITH RESTRICTED DELIVERY	¢
TOTAL POSTAGE AND FEES		$2.57

POSTMARK OR DATE

USPO AUG 1 1984 NM

PS Form 3800, Apr. 1976

Form 9-331
Dec. 1973

Form Approved.
Budget Bureau No. 42-R1424

UNITED STATES
DEPARTMENT OF THE INTERIOR
GEOLOGICAL SURVEY

SUNDRY NOTICES AND REPORTS ON WELLS

(Do not use this form for proposals to drill or to deepen or plug back to a different reservoir. Use Form 9-331-C for such proposals.)

1. oil well ☒ gas well ☐ other

2. NAME OF OPERATOR
Chevron U. S. A., Inc.

3. ADDRESS OF OPERATOR
P. O. Box 1660 Midland, Texas 79702

4. LOCATION OF WELL (REPORT LOCATION CLEARLY. See space 17 below.)
AT SURFACE: 50' FWL & 1400' FSL
AT TOP PROD. INTERVAL: 3921'
AT TOTAL DEPTH: 4300'

5. LEASE
Federal LC 059576

6. IF INDIAN, ALLOTTEE OR TRIBE NAME

7. UNIT AGREEMENT NAME
Maljamar Grayburg Unit

8. FARM OR LEASE NAME
Maljamar Grayburg Unit

9. WELL NO.
78

10. FIELD OR WILDCAT NAME
Maljamar (grayburg)

11. SEC., T., R., M., OR BLK. AND SURVEY OR AREA
Sec. 3, T-17-S, R-32-E

12. COUNTY OR PARISH: Lea
13. STATE: NM

14. API NO.
NA

15. ELEVATIONS (SHOW DF, KDB, AND WD)
GL 4168'; DF 4176'; KB 4177'

16. CHECK APPROPRIATE BOX TO INDICATE NATURE OF NOTICE, REPORT, OR OTHER DATA

REQUEST FOR APPROVAL TO:		SUBSEQUENT REPORT OF:
TEST WATER SHUT-OFF	☐	☐
FRACTURE TREAT	☐	☐
SHOOT OR ACIDIZE	☐	☐
REPAIR WELL	☐	☐
PULL OR ALTER CASING	☐	☐
MULTIPLE COMPLETE	☐	☐
CHANGE ZONES	☐	☐
ABANDON*	☐	☐
(other) Convert to Water Injection		

(NOTE: Report results of multiple completion or zone change on Form 9-330.)

17. DESCRIBE PROPOSED OR COMPLETED OPERATIONS (Clearly state all pertinent details, and give pertinent dates, including estimated date of starting any proposed work. If well is directionally drilled, give subsurface locations and measured and true vertical depths for all markers and zones pertinent to this work.)*

MIRU PU. POOH w/rods & pump. NDWH. NUBOPE. POOH w/2 3/8" tbg.

RIH w/bit & scraper. CO to 4254'. POOH w/same.

RIH w/Baker Model AD-1 Pkr. & 2 3/8" pc. tbg. Set pkr @ ±3820.

Displace annulus w/pkr. fluid. Test annulus to 500 psi.

NDBOPE NUWH RDMO PU. Acidize w/2000 gals 15% NE FE HCL down tbg.

Turn well over to production for injection. (proposed work date 8-84)

Subsurface Safety Valve: Manu. and Type _____ Set @ _____ Ft.

18. I hereby certify that the foregoing is true and correct

SIGNED _____ TITLE Area Supt. DATE 7-25-84

(This space for Federal or State office use)

APPROVED BY _____ TITLE _____ DATE _____
CONDITIONS OF APPROVAL, IF ANY:

*See Instructions on Reverse Side

Instructions

General: This form is designed for submitting proposals to perform certain well operations, and reports of such operations when completed, as indicated, on Federal and Indian lands pursuant to applicable Federal law and regulations, and, if approved or accepted by any State, on all lands in such State, pursuant to applicable State law and regulations. Any necessary special instructions concerning the use of this form and the number of copies to be submitted, particularly with regard to local, area, or regional procedures and practices, either are shown below or will be issued by, or may be obtained from, the local Federal and/or State office.

Item 4: If there are no applicable State requirements, locations on Federal or Indian land should be described in accordance with Federal requirements. Consult local State or Federal office for specific instructions.

Item 17: Proposals to abandon a well and subsequent reports of abandonment should include such special information as is required by local Federal and/or State offices. In addition, such proposals and reports should include reasons for the abandonment; data on any former or present productive zones, or other zones with present significant fluid contents not sealed off by cement or otherwise; depths (top and bottom) and method of placement of cement plugs; mud or other material placed below, between and above plugs; amount, size, method of parting of any casing, liner or tubing pulled and the depth to top of any left in the hole; method of closing top of well; and date well site conditioned for final inspection looking to approval of the abandonment.

☆ GPO 1979—680-655/684

CALCULATION SHEET
Chevron U.S.A. Inc.

Date 1/21/83 | Prepared by SCH | Page No 01

Title	Location	Department	Project Number

Lease MALJAMAR GRAYBURG **Well #** 8 **Field** MGU

Location 2140' FSL, 2580' FWL	Section 3	Township 17-S	Range 32-E	Block
Type of Comp. SELECT PERF	Current Status PRODUCER - PMPG		Survey	
County LEA	State NM	Date Completed	KB 4292	DF	GL 4283

8 5/8" Csg. @ 323'
Cmtd. w/225 sx

5 1/2" Csg. @ 4390'
Cmtd. w/350 sx

PBTD 4382'
TD 4390'

WELL HEAD LARKIN TYPE IX

Formation Tops

Oil/Water Contact

Csg. Detail

5 1/2", 14#, J-55 CSG LDD @ 4390'

Perforations

4057-61	2	CJPF
4092-4102	4	"
4112-16	4	"
4122-28	4	"
4138-42	2	"
4185-89	2	"
4203-07	4	"
4210-20	4	"
4340-45	4	"
4348-56	4	"

Tbg. Detail

KB - TH	6.50'
134 JTS 2 7/8", 6.5#, J-55	4210.73
2 1/4" PSN	1.10
2 7/8" MA	18.75
LDD @	4237.08

Pertinent Data

60 - 3/4" RODS
58 - 7/8" "
60 - 1" "
2 1/2" x 1 1/4" x 12' AXELSON PUMP

4092-4102, 4112-28, 4208-20, 4240-56'

5-965 GYPSOL & HXL-53 TRTMT. INC. OIL TO 148 BOPD & 74 BWPD

CHRONOLOGICAL HISTORY

Gypsol and HLX-53 treatment. Cost - $1708.11.

12-7-65	Dumped 750 gals Kerosene with 4 gals Hyflo in well and circulated 14 hours with well pump.
12-8-65	Turned well to battery for 27 hours.
12-9-65	Dumped 500 gallons FE acid and circulated for 6 hours with well pump. Turned to battery for 20 hours.
12-10-65	Dumped 1500 gallons gypsol converter solution and circulated for 48 hours.
12-12-65	Turned well to battery for 22 hours.
12-13-65	Dumped 1000 gallons 15% NE HCL and circulated for 6 hours and turned to battery.
12-14-65	Mixed 50 gallons HLX-53 with 72 BW and pumped in well. Flushed with 105 BW. Pressure built to 200 psi at end of job.

PRIOR PRODUCTION

November 1965: 76 BOPD and 100 BWPD for 30 days. AFTER 100 BO, 160 BWPD IN

9-1965 GYPSOL & HXL-53 TRTMT. OIL DEC FROM 42-36 BOPD 28 DAYS & WTR INC FROM 65-100 BWPD

10-29-66 MI and RU workover rig. Pulled rods, pump and tubing. NU BOPE. Perforated at 4057'-4061', 4138-4142', and 4185-4189' with 2 CJPF. Tagged PBTD at 4349'. Started in hole with ret. pkr.

10-30-66 Set packer at 4270'. Pumped into Lovington perforations 4340-4356' at stabilized rate of 1 BPM and 2000 psi. ISITP - 1800 psi. 12 min SITP - 0 psi (vac). Reset packer at 4030'. Pumped into all perforations 4092-4356' at stabilized rate of 4 BPM and 800 psi. Pulled packer. Ran ret. pkr and bridge plug. Set BP at 4270'. Set packer at 4160'. Treated Premier perforations 4185-4220' with 40 bbls and 2% hydroxyacetic acid heated to 195° F at the surface, at average rate of 3 - 3.5 BPM and 1200 psi.
Detail:
Pumped 16 BA in formation at 0 psi and 2.5 BPM.
Pumped 24 BA in formation at 600-1200 psi and 3 - 3.5 BPM.
ISITP - 700 psi 2 min. SIP - 0 psi (vac). Flushed acid with 1% KCL water.
Rel packer and ret. BP. Set BP at 4160'. Set packer at 4030'. Treated perforated interval 4057-4142' with 120 bbls of 2% hydroxyacetic acid heated to 195° F, at average rateof 0.9 BPM and 2000 psi.
Detail:
Pumped 12 BA in formation at 2000 psi and 1 BPM.
Pumped 21 BA in formation at 2200 psi and 3/4 BPM.
Pumped 83 BA in formation at 2200-2300 psi and 1/2 BPM.
ISITP 0 2200 psi 15 min. SITP - 1900 psi. Flushed acid with 1% KCL water - pumped 3/4 tubing capacity.

10-31-66 After 12-1/2 hours SI, TP - 0 psi (slight vac). Tested 5-1/2" casing to 1000 psi (4030' to surface), with 0 psi loss in 20 mins. Rel pkr at 4030', ret. BP, and pulled same. Removed BOPE. Ran and landed 2-3/8" tubing at 4325'. Ran pump and rods. Released rig.

11-1-66	P 61 BO 163 BW 24 hours.
11-3-66	P 44 BO 144 BW 24 hours.
11-4-66	P 47 BO 134 BW 24 hours.
11-9-66	P 54 BO 135 BW 24 hours.
11-10-66	P 52 BO 132 BW 24 hours.
11-11-66	P 50 BO 130 BW 24 hours.

3-68 REPLACED 2 7/8" TBG STRING

9-21-77 POOH W/ TBG. TESTED FOR LEAK. LDD TBG 1 JT HIGHER.

9-6-79 CHNG PUMP

Chevron

CALCULATION SHEET
Chevron U.S.A. Inc.

Date 6/18/84
Prepared by SCH
Page No of

Title	Location	Department	Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 9 Field MGU

Location 660' FWL, 1980' FSL	Section 3	Township 17-S	Range 32-E	Block
Type of Comp. SELECT. PERF	Current Status PEA WTR INJ			Survey
County LEA	State NM	Date Completed 10-63	KB 4201	DF	GL 4190

CUT OFF CSG BELOW GROUND LEVEL, WELDED STEEL PLATE SET 4' MARKER

SPOTTED 10 SX CMT @ SURFACE

SHOT 5½" CSG @ 489'

8⅝ Csg. @ 373
Cmtd. w/250 SX
CIRC TO SURFACE

SPOTTED 90 SX CMT @ 489

11" HOLE

25 SX CMT SPOTTED @ 1204

CIRCULATED HOLE WITH MUD LADEN FLUID

25 SX CMT SPOTTED @ 2604

CIRP @ 3900 W/35 SX CMT ON TOP

5½ Csg. @ 4149
Cmtd. w/350 SX

PBTD 4117
TD 4149

7⅞" HOLE

PEA 3-31-75

Formation Tops

Oil/Water Contact

Csg. Detail

Perforations
3950-54
3986-96
4013-22
4042-48
4082-90
4104-16

Tbg. Detail

Pertinent Data

CALCULATION SHEET
Chevron U.S.A. Inc.

Date: 6/18/94
Prepared by: SCH
Page No: 01

Title: **Supplemental Well History**
Location:
Department:
Project Number:

Lease MALJAMAR GRAYBURG UNIT Well # 9 Field MGU

Date	COMPLETION	Production Before	Production After
10-8-63	SPUDDED		
10-16-63	PERF 3986-96 & 4104-16' SELECTIVELY FRACED W/ 20000 GALS OIL & 40000# SAND		
	TEST	NEW	21 BO 0 BW 33° API

CALCULATION SHEET
Chevron U.S.A Inc.

Date 1/4/84 | Prepared by SCH | Page No. of

Title | Location | Department | Project Number

Lease MALJAMAR GYRS UNIT | Well # 10 | Field MALJAMAR

Location 660' FSL & WL Unit M | Section 3 | Township 17-S | Range 32-E | Block

Type of Comp. SELECT PERF | Current Status PRODUCER - PMPG | Survey

County LEA | State N.M. | Date Completed 11-5-58 | KB | DF 4174 | GL 4165'

8 5/8" Csg. @ 366
Cmtd. w/ 200 sx

5 1/2" Csg. @ 4255
Cmtd. w/ 160 sx

Perforations

3920-24	2	CJDP
3952-62	4	"
3972-90	4	"
4005-07	2	"
4011-15	2	"
4050-60	4	"
4074-88	4	"
4208-22	4	"

FILL TO 4193

SET DOWN SOLID @ 4214'
WHILE C.O. - METAL CUTS.

PBTD 4248'
TD 4255'

TBG HEAD - LARKIN TYPE "K"

NOTE - SLIP SEGMENTS IN BOWL ARE NOT FASTENED TOGETHER

Formation Tops

Oil/Water Contact

Csg. Detail

5 1/2", 14#, J-55, 8RD CSG
LDD @ 4255

Tbg. Detail

KB - T/TBG	7.00
1 - 16' & 8' 2 3/8" SUB	14.00
142 - JTS 2 3/8" J-55, 8RD	4189.21
1 - 2 3/8" SN	1.10
1 - 2 3/8" MA (OE W/FLAP)	14.15
LDD @	4175.46

Pertinent Data

16' POLISH ROD
2' x 7/8" PONY ROD
81 - 7/8" RODS
114 - 3/4" "
2" x 1 1/2" X 10' RWB-C PUMP W/ 6" STRAINER

CALCULATION SHEET
Chevron U.S.A. Inc.

Date: 5/27/83 | Prepared by: SCH | Page No. of

Title: Supplemental Well History | Location | Department | Project Number

Lease MALJAMAR Well # 103 Field MGU

Date		Production Before	Production After
11-29-66	Ø 4255 PERF 3952-62, 3972-90, 4050-60, 4074-88 & 4206-22 W/4 CSPF FRACED W/ 30,000 GAL LSE OIL W/ 2# SAND/GAL.	NEW	F 85 O
2-66	PERF 3920-24, 4005-07 & 4011-15 W/2 CSPF ACID W/1500 GALS MA. SEE ATTACHED.		
10-3-77	REQUESTED 1 YR TA		
2-27-79	BROUGHT REERS FROM EACH CSG STRING CSG. LEAK SURVEY		
12-83	CO TO 4214 - SET DOWN SOLID - GOT METAL CUTTINGS TEST TBG 1) PMP 10 BFW " " BBLS 15% NEFE HCL W/ 55 GALS ACIDIRING SOLUTION " 10 BFW " 4 " W/ 4 DRUMS SCALE CONVERTER - NALCO CHEM FLUSH 20 " SIFN FOR 6 DAYS (X-MAS & WEATHER) 2) PMP 2000 GALS 15% NEFE HCL W/ 400# BAF & 600# RS IN 3 STAGES - SEE TOUR REPORTS 3) PMP 20 BFW W/ 1 DRUM INHIBITOR - NALCO CHEM FLUSH W/ 50 BFW - PUT ON PROD		

WELL WAS TA'D PRIOR TO WORK - 10 YRS±

CALCULATION SHEET
Chevron U.S.A. Inc.

Date / /

Prepared by | Page No | of

Title | Location | Department | Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 11 Field MGU

Location 1660' FSL, 2080 FWL	Section 2	Township 17-S	Range 37-E	Block
Type of Comp. OPEN HOLE	Current Status P&A WTR. INJ			Survey
County LEA State NM	Date Completed 1-48	KB	DF 4213	GL

CUT OFF CSG BELOW GROUND LEVEL, WELDED STEEL PLATE SET 4' MARKER

PERF 8 5/8" @ 450, PMPD 100 SX - CIRC TO SURFACE

SHOT 5½" CSG @ 1270

8 5/8 Csg. @ 1245
Cmtd. w/ 50 SX

SPOTTED 60 SX @ 1270

11" HOLE

MUD LADEN FLUID

Perforations
3963 - 4150'
OPEN HOLE

SPOTTED 25 SX CMT @ 2500'

MUD LADEN FLUID

SPOTTED 25 SX CMT @ 3200'

MUD LADEN FLUID

CIBP @ 3800' W/35 SX CMT ON TOP

7⅞" HOLE

5½ Csg. @ 3960'
Cmtd. w/ 100 SX

PBTD 4130
TD 4290

CALSEAL CAP ON LEAD WOOL PLUG

4¾" HOLE

P&A 3-31-75

Formation Tops

Oil/Water Contact

Csg. Detail

Tbg. Detail

Pertinent Data

60-144 7 CW

CALCULATION SHEET
Chevron U.S.A. Inc.

Date / /
Prepared by
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of

Title: **Supplemental Well History**
Location
Department
Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 11 Field MGU

Date		Production Before	Production After
10-10-48	SPUDDED		
1-13-49	COMPLETED AS OPEN HOLE FRACED OPEN HOLE 3963-4150 W/10000 GALS FRAC OIL W/15000# SAND		
	POTENTIAL	NEW	100 BOPD

GO 144 2-CY

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Title | Location | Department | Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 18 Field MGU

Location 1980' FNL, 660' FEL UNIT H	Section 4	Township 17-S	Range 32 E	Block
Type of Comp. SELECT PERF	Current Status P&A WTR INJ			Survey
County LEA	State NM	Date Completed 3-60	KB 4229	DF	GL 4218

CUT OFF CSG, WELDED STEEL PLATE, SET 4' MARKER

8 5/8 Csg. @ 323
Cmtd. w/250 SX
11" HOLE

RMPD 91 SX CMT
CIRCULATING TO SURF.
LEAVING 5 1/2" FULL

PERF 5 1/2" @ 373'

SPOTTED 25 SX CMT @ 1200'

CIRCULATE MUD LADEN FLUID

SPOTTED 30 SX CMT @ 2000'

SPOTTED 25 SX CMT TOP @ 3670'

5 1/2 Csg. @ 4407
Cmtd. w/300 SX

HOLE 7 7/8"

PBTD 4382'
TD 4410'

P&A 6-30-75

Perforations

3970-80
4005-11
4028-34
4058-61
4077-83
4087-89
4093-97
4120-23
4126-28
4176-81
4183-90

Formation Tops

Oil/Water Contact

Csg. Detail

Tbg. Detail

Pertinent Data

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Title: **Supplemental Well History**
Location | Department | Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 18 Field MGU

Date		Production Before	Production After
2-24-60	SPUDDED		
3-60	PERF 4005 - 4190 SELECTIVELY ACID W/ 40000 GALS FRACED W/ 35000 GALS REFINED OIL & 75000# SAND		
	POTENTIAL	NEW	43 BO 0 BW 35.5° API GOR 801

CALCULATION SHEET
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Date 1/24/83
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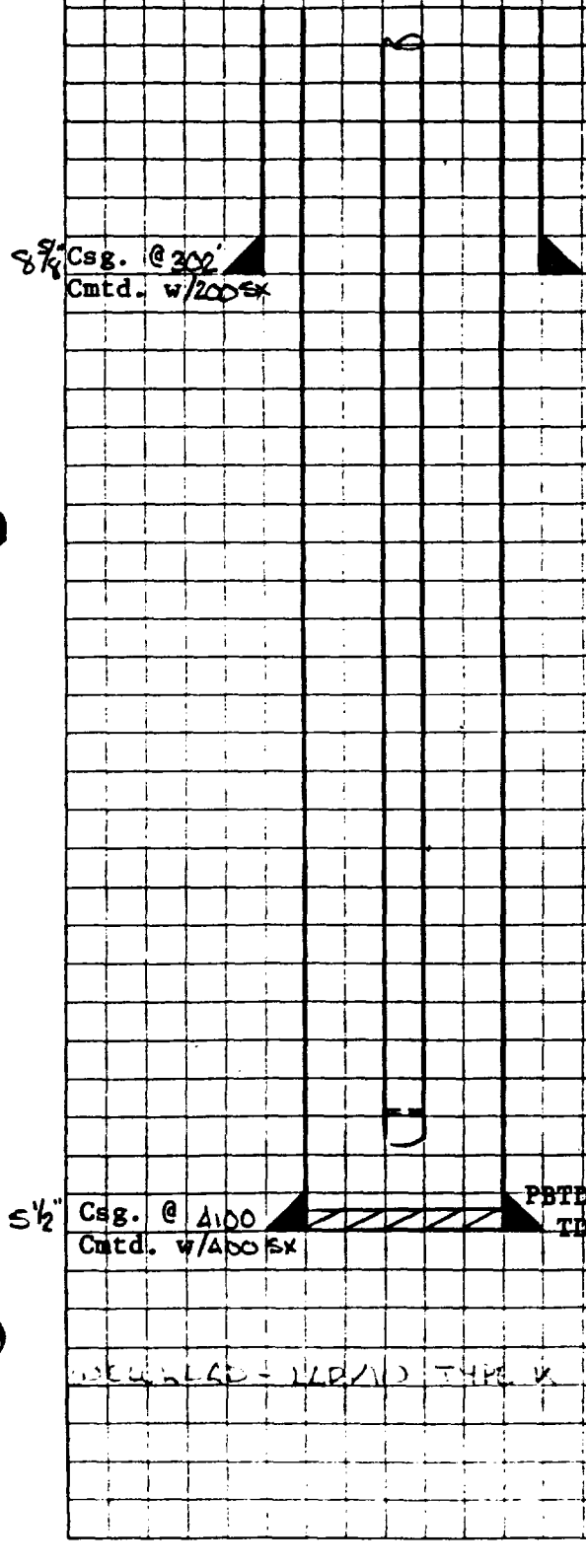
Title	Location	Department	Project Number

Lease MALJAMAR GYRG UNIT Well # 19 Field MGU

Location 1980' FSL, 660' FEL	Section 4	Township 17-S	Range 32-E	Block
Type of Comp. SELECT PERF	Current Status PRODUCER - PMPG E		Survey	
County LEA	State N.M.	Date Completed 12-60	KB 4181	DF	GL 4171



Perforations
3918-32 2 CJPF
3954-64 4 "
4009-15 4 "
4049-53 4 "
4071-81 4 "

Formation Tops

Oil/Water Contact

Csg. Detail

5½", 14#, J-55 CSG LDD (2)
4100'

Tbg. Detail

KB	10.00
130-JTS 2⅜", 4.7#, J-55	4047.87
SN	.75
MUD ANCHOR	26.48
	4085.10
TBG ABOVE GL	- 11.50
LDD (2)	4073.60

(132 JTS)

Pertinent Data

WELL HEAD - WKM/10 TYPE V

FRACED W/ 20,000 GALS REF. OIL W/ 4[illegible]
IP 115 BOPD

Supplement to Well Completion Report - Potassium Chloride Brine and Calgon S-31 in two stages separated by 8# Calgon D-240 in 20 bbl. slug, flushed with KCl brine. Cost $1019.

Prior Production: 20 BOPD -0 BWPD - January, 1967

2-9-67	Rigged up wellhead for pressure, filled annulus with 80 bbls. 8.5% KCl brine at rate of 5 BPM, 0 psi, first 55 bbls. Next 25 bbls. at 2-3 BPM at 1100-1500 psi, pumped 50 bbls. stage brine containing 55 gallon Calgon S-31 at rate of 1½ BPM at 1900 psi first 5 bbls. Eased pressure up to 2400 psi. at 3 BPM. Pumped remainder of 50 bbl. at rate of 2 BPM at 2200 psi. Pumped 20 bbls. slug of brine containing 8# Calgon D-240 Polymer average rate of 3 BPM 1500 psi. Pumped second stage 50 bbl. KCl brine containing 55 gal. Calgon S-31 at rate of 2 BPM at 2200 psi, stayed at same rate and pressure throughout second stage, pumped 100 bbl. KCl flush at rate of @ BPM 2200-2400 psi first 25 bbls. next 75 bbls 2 BPM, pressure slowly increased to 2500 psi. 5 min. SIP 1750 psi.
2-10-67	Placed well on production, Lack 300 BLW.
2-11-67	No tst.
2-12-67	Pump stuck. MIPU.
2-13-67	Changed pump. P 11 BO 14 BW 11 hrs. Lack 286 BLW.
2-14-67	P 14 BO 20 BW. Lack 266 BLW.
2-15-67	No test.

CHRONOLOGICAL HISTORY

5-12-70	**Moved in rigged up pulling unit (Clarke Well Service Unit 1 - Hobbs, N.M.)**
5-13-70	**Pulled rods, pump and 2-3/8" tubing. Rigged up wire line unit and perforated intervals 3918-32' in 2 runs with 2 CJPF. Rigged down wire line unit and ran back in hole with tubing, pump and rods. Placed well on production. Rigged down, moved out pulling unit.**
5-14-70	**Pumped 50 BO and 2 BWPD.**
5-15-70	**Pumped 33 BO and 6 BWPD.**
5-16-70	**Pumped 36 BO and 2 BWPD.**
5-18-70	**Pumped 39 BO and 1 BWPD.**
5-19-70	**Pumped 30 BO and 3 BWPD.**
5-20-70	**Pumped 41 BO and 2 BWPD.**
5-21-70	**Pumped 40 BO and 3 BWPD.**
5-22-70	**Pumped 30 BO and 6 BWPD.**
5-23-70	**Pumped 32 BO and 2 BWPD.**
5-24-70	**Pumped 36 BO and 1 BWPD.** **Prior to workover well was P 39 BO and 0 BWPD.**

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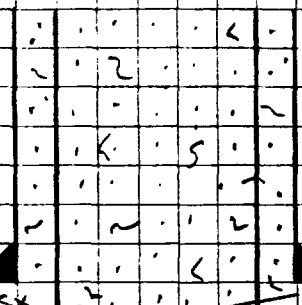
Lease MALJAMAR GRAYBURG UNIT | Well # 20 | Field MGU

Location 1980' FSL & FEL UNIT J	Section 4	Township 17-S	Range 32-E	Block
Type of Comp. SELECT HERE	Current Status P&A WTR INJ			Survey
County LEA	State NM	Date Completed 9-60	KB 4169	DF	GL 4159

CUT OFF CSG, WELDED STEEL PLATE, SET 4' MARKER



PUMP 75 SX CMT
CIRC TO SURFACE
LEFT 5½" FULL

8⅝ Csg. @ 309
Cmtd. w/200 SX.

PERF 5½" @ 3560

SPOTTED 35 SX CMT @ 1150'

SPOTTED 30 SX CMT @ 2500'

DISPLACE W/9.5 MUD LADEN FLUID

SPOTTED 25 SX CMT W/ TOP @ 2616'

HOWCO R-3 PACKER @ 3992

WLBP @ 4110

PBTD 4107
TD 4209

5½ Csg. @ 4200
Cmtd. w/450 SX
7⅞" HOLE

P&A 9-11-75

Perforations

3892-96
3926-30
3948-54
3974-81
4014-18
4038-48
4162-66
4180-86

Formation Tops

Oil/Water Contact

Csg. Detail

Tbg. Detail

Pertinent Data

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Title: Supplemental Well History

Location | Department | Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 20 Field MGU

Date	COMPLETION	Production Before	Production After
9-14-60	SPUDDED		
9-60	PERF 3926 - 4186 SELECTIVELY		
	ACID W/1000 GALS		
	FRACED W/30,000 GALS REFINED OIL W/60000# SAND		
	POTENTIAL		38 BO
			0 BW
			GOR 911

GO 144 2 7 ?

CALCULATION SHEET
Chevron U.S.A. Inc.

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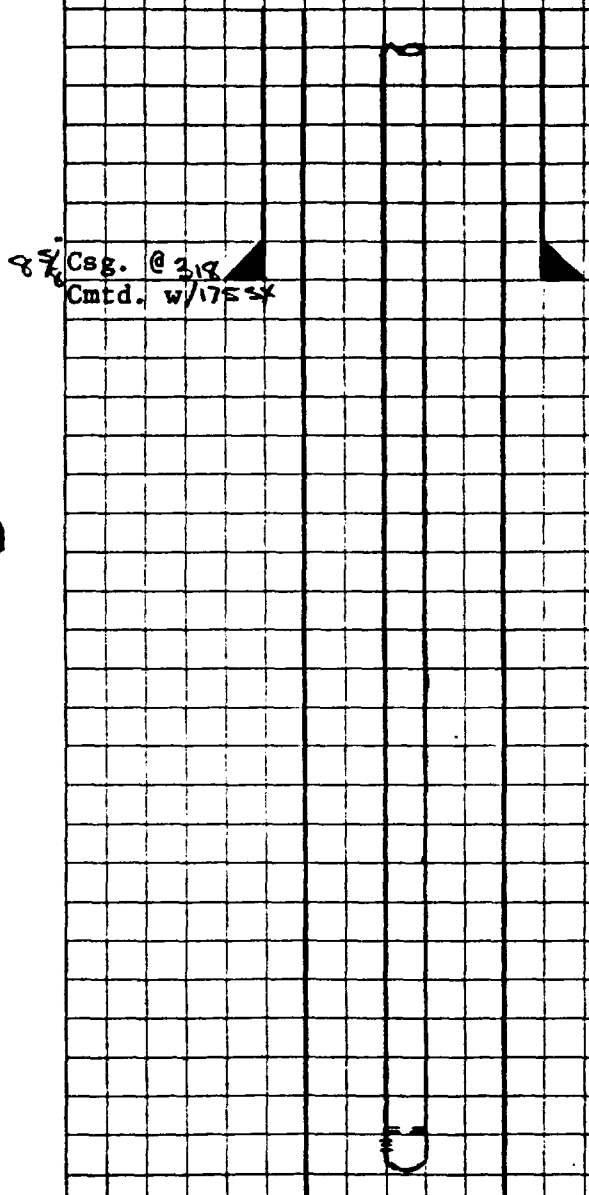
Title	Location	Department	Project Number

Lease MALJAMAR GYRG UNIT Well # 27 Field MGU

Location 990' FSL, 1980' FEL	Section 4	Township 17-S	Range 32-E	Block
Type of Comp. SELECT PERF.	Current Status PRODUCER - PMRSE			Survey
County LEA	State NM	Date Completed	KB 4148	DF	GL 4140



Perforations

3864-68 2 CSPF
3898-3916 4 "
3928-32 2 "
3956-60 2 "
3978-4002 4 "
4020-26 2 "

WELLHEAD: LARKIN TYPE R 8 5/8" x 5 1/2"

Formation Tops

Oil/Water Contact

Csg. Detail

5 1/2", 14#, J-55, 8 RD CSG
LDD @ 4035'

Tbg. Detail

KB	8.00'
127- JTS 2 3/8", 4.7#, J-55	3964.72
SN	1.10
PERF SUB	3.91
MA w/ 1/2" TAP PLUG BTM	31.60
	4009.33

Pertinent Data

CHRONOLOGICAL HISTORY

11-27-60	Spudded.
12-9-60	Set 318' - 8-5/8" 24# surface pipe with 175 sxs.
12-20-60	Washed perfs with acid and fraced with 25,000 gals RFO and 13,000# sd. Potentialed flowing 125 BOPD.
10-4-62	Fraced with 60,000 gal RFO and 120,000# sand. Potentialed 25 BOPD pumping.
6-1-65	Well purchased by Standard.
6-1-65	Waterflood response noted.
1-19-66	MIRUPU. Pull rods and pump.
1-20-66	Pull tubing. Rigged up PGAC and perforated following zones with 2 CJPF: G-1 3864-68 G-3 3928-32 G-4 3956-60 Premier 4020-26 Sand pumped to 4038', recovered frac sand. Ran casing scraper to 4038'.
1-21-66	Inclement weather forced shut down.
1-22-66	Made run with sand pump. Recovered sand only (no scales). RIH with FBRC and RBP. Tested casing at 1000 psi satisfactorily. Tested tubing to 4000 psi. Stage 1 - FBRC at 3969, RBP at 4030'. Broke down perfs 3978-4002; 4020-26' with 250 gallons mud acid at 2.5 BPM and 800 psi. ISIP 600 psi. 5 min. 450 psi. Stage 2 - FBRC at 3940, RBP at 3969'. Broke down perfs 3956-60 with 250 gallons mud acid at ¼ BPM and 2600 psi. ISIP 2600. Attempted to set BP up the hole. Could not release. POOH with BP and packer.
1-23-66	Stage 3 - FBRC at 3878, RBP at 3940. Treated perfs 3898-3916; 3928-32 with 500 gallons mud acid at 1.5 BPM and 1000 psi. ISIP 900 psi. Retrieved BP and pulled up hole to 3850. Packer stuck and could not be moved either direction. Worked pipe without success.
1-24-66	Ran free point. Free to FBRC mandrel. Tried to release safety joint in packer with two string shots. Unable to release. Cut tubing 3' above packer and POOH with tubing. RIH with overshot and jars.
1-25-66	Caught fish and bumped down and free. Worked up through tight place at 3850'. POOH with packer and BP. Packer was shiny above elements as if sand has packed around it. Ran 5½" casing roller to T.D. with only slight indications of swaging. Ran production string and nippled up wellhead.

ILES FEDERAL #1

1-26-66	Ran pump and placed well on production.
1-28-66	Pumped 62 BO in 20 hrs. Unknown water.
1-29-66	Pumped 65 BO in 24 hrs. Unknown water.
1-31-66	Pumped 93 BO in 24 hrs. Unknown water.
2-4-66	Pumped 84 BO 51 BW in 24 hrs.
2-5-66	Pumped 69 BO 50 BW in 24 hrs.
2-6-66	Pumped 83 BO 51 BW in 24 hrs.
2-7-66	Pumped 89 BO 50 BW in 24 hrs.
2-10-66	Ran Howco Gypsol treatment and squeezed 40 gallons HLX-53 in 4000 gallons water at 1200 psi.

FRANCES FEDERAL #1 - Supplement to Well Completion Report.

CHRONOLOGICAL HISTORY

Gyp removal and inhibitor treatment Cost $1465.

1-13-66	Dumped 750 gals Kerosene and 4 gals Hyflo and circulated for 14 hrs with well pump.
1-14-66	Turned to battery.
1-15-66	Dumped 500 gals FE acid and circulated 6½ hours. Turned to battery for 21 hours.
1-16-66	Dumped 1500 gals gyp converter solution (Howco) and circulated for 48 hours.
1-18-66	Turned to battery.
1-22-66	Commenced workover to open additional pay and bream down with acid.
1-26-66	Mixed 30 gals Howco HLX-53 with 72 BW and flushed with 110 BW, reached maximum pressure of 200 psi.

CHRONOLOGICAL HISTORY

5-17-66	Rigged up double derrick. Pulled rods and tubing, ran FBRC on 3" frac string to 3700'.
5-18-66	Set FBRC at 3800'. Tested casing to 1500 psi. Placed 1000 psi on backside and fraced with 15,000 gallons gelled water: 30,000# 20-40 sand and 450# P-3 polyphosphate in three equal stages separated by ball sealers. 110 balls were dropped after first stage and built pressure 200 psi.....80 balls were dropped after second stage and pressure suddenly built to 5800 psi at 7 BPM.....Broke down to 4500 psi and fraced at 5300 psi (1100 psi ball action). Average Rate: 19.9 BPM at 4500 psi. ISIP: 3600 psi 10 Minute: 3100 psi 4 Hour Shut-In: 2600 psi - Shut in for the night.
5-19-66	TP 600 psi - bled off and pulled frac string. Tagged fill at 3900' (138') and sand pumped to 3945' recovering sand and balls.
5-20-66	Sand pumped slowly to 3965. Getting very little recovery. Balls were probably bridging the pump.
5-21-66	Rigged up kill truck. Ran tubing with sawtooth collar to 3965'. Reversed out sand and balls to TD 4038'. Pulled 7 joints tubing and landed at 3839'. Ran pump and hit paraffin. Pulled pump.
5-22-66	Cut paraffin and ran pump. Rigged down unit and moved out. Placed well on production.
5-23-66	Well did not pump up - lowered pump and reseated.

5-24-66	P 44 BO and 127 BW in 19 hrs.
5-25-66	P 115 BO and 119 BW in 24 hours.
5-26-66	P 107 BO and 104 BW in 24 hours.
5-27-66	P 84 BO and 110 BW in 24 hours.
5-28-66	P 90 BO and 80 BW in 24 hours.
5-29-66	P 98 BO and 65 BW in 24 hours.
5-30-66	P 94 BO and 59 BW in 24 hours.
5-31-66	P 84 BO and 54 BW in 24 hours.

CALCULATION SHEET
Chevron U.S.A. Inc.

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Title	Location	Department	Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 28 Field MGU

Location 660' FSL, 660' FEL UNIT P	Section 4	Township 17-S	Range 32-E	Block
Type of Comp. ELECT. PERF.	Current Status P&A WTR INJ		Survey	
County LEA	State NM	Date Completed 12-14-60	KB 4160	DF	GL 4150

CUT OFF CSG, WELDED STEEL PLATE, SET 4' MARKER

PUMP 96 SX CMT CIRC TO SURFACE LEFT 5½" FULL

8⅝ Csg. @ 308
Cmtd. w/200 SX.

PERF 5½" @ 358'

SPOTTED 35 SX CMT @ 1000'

SPOTTED 30 SX CMT @ 2400'

DISPLACED HOLE W/9.5 MUD LADEN FLUID

SPOTTED 25 SX CMT @ 3800

5½ Csg. @ 4090
Cmtd. w/400 SX

PBTD 4078
TD 4090

7⅞" HOLE

P&A 9-11-75

Perforations

3884-88
3915-25
3938-42
3948-52
3966-70
3977-81
4014-18
4036-46

Formation Tops

Oil/Water Contact

Csg. Detail

Tbg. Detail

Pertinent Data

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Chevron U.S.A. Inc.

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Title	Location	Department	Project Number
Supplemental Well History			

Lease MALJAMAR GRAYBURG UNIT Well # 28 Field MGU

Date	COMPLETION	Production Before	Production After
12-6-60	SPUDDED		
12-60	PERF. 3912-4046 SELECTIVELY		
	FRACED W/ 23,000 GALS REFINED OIL & 31,000# SAND		
	POTENTIAL	NEW	61 BO
			0 BW

CALCULATION SHEET
Chevron U.S.A. Inc.

Date 1/27/83 | Prepared by SCH | Page No. of

Title | Location | Department | Project Number

Lease MALJAMAR GYRG UNIT Well # 33 Field MGU

Location 670' FNL, 720' FEL | Section 9 | Township 17-S | Range 32-E | Block

Type of Comp. SELECT. PERF. | Current Status PRODUCER - PMPG | Survey

County LEA | State NM | Date Completed 10-64 | KB 4135' | DF | GL

Formation Tops

Oil/Water Contact

Csg. Detail

8 5/8" Csg. @ 289'
Cmtd. w/225sx

5 1/2", 14#, J-55, 8RD CSG
LDD @ 4050'

Perforations

3888-94 4 CSPF
3914-22 4 "
3983-87 4 "
3992-4000 4 "
4006-16 4 "

Tbg. Detail

KB
132-JTS 2 3/8", 4.7#, 8RD ± 4000.00
PSN 1.10
MA-OPEN ENDED ± 15.00
LDD @ ± 4016.10

5 1/2" Csg. @ 4050'
Cmtd. w/200sx

PBTD 4034'
TD 4050'

Pertinent Data

WELLHEAD - LARKIN TYPE K

10/64 [illegible] WELL IN 2 STAGES W/ 42,000 [illegible] 40,000 [illegible]
GEL WTR. IP 40 BOPD

TAYLOR B-2 - Supplement to Well Completion Report
Maljamar Field HLX-53 Treatment - Cost $622.

CHRONOLOGICAL HISTORY

2-17-66	Dumped 750 gallons Kerosene and 4 gallons Hyflo down annulus and circulated 14 hours with well pump.
2-18-66	Turned to battery for 20 hours.
2-19-66	Mixed 30 gallons HLX-53 with 72 BFW and flushed with 105 BFW. Pressure reached 1200 psi on flush. Let set 1 hour and placed well on production.

PRIOR PRODUCTION

November 1965:	75 BOPD and 1 BWPD
December 1965:	88 BOPD and 2 BWPD
January 1966:	109 BOPD and 1 BWPD
February 1966:	111 BOPD and 1 BWPD

AFTER TREATMENT

Well production jumped from 110 BOPD and 1 BWPD to 121 BOPD and 1 BWPD.

March 1966 production averaged 123 BOPD and 1 BWPD.

J. D. WEBB

JDW/cz

copy CNS 4-20-66

F.1

TAYLOR "B" 2

Supplement to Well Completion Report - Potassium Chloride Brine and LP-53 with one gallon/1000 gallons 14-N Non-emulsifier treatment. Cost $1056.

Prior Production: 60 BOPD 40 BWPD - January, 1967

2-8-67	Rigged up wellhead for pressure. Filled annulus with 100 bbls. 8.5% brine water at average rate of 4 BPM 0 psi first 70 bbls, pressure increased to 1000 psi last 30 bbls. Followed with 100 bbls. KCl brine containing 40 gallon LP-53 at average rate of 2 BPM 1200-1500 psi, flushed with 100 bbls. 8.5% KCl brine water at rate of 2 BPM 1500 psi first 40 bbls., pressure increased to 1850 psi, slowed rate to 1-1/2 BPM 1850 spi. Last 60 bbls. 5 min. SIP 725 psi, 15 min. SIP - 150# psi.
2-9-67	Placed on production. Lack 300 BLW.
2-10-67	P 35 BO 166 BW 22 hrs.
2-11-67	P 43 BO 108 BW 24 hrs.
2-12-67	P 60 BO 76 BW 24 hrs. Cum. 50 BNW.
2-13-67	P 47 BO 88 BW 24 hrs. Cum. 138 BNW.
2-14-67	P 51 BO 82 BW 24 hrs. Cum. 226 BNW.
2-15-67	P 43 BO 85 BW 24 hrs. Cum. 311 BNW.
12-12-72	REPAIR TBG LEAK, REPLACE PSN
10-5-78	STRIP OUT STUCK PUMP

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Title | Location | Department | Project Number

Lease MALJAMAR GRAYBURG UNIT | Well # 52 | Field MGU

Location		Section	Township	Range	Block
660' FNL, 690' FWL UNIT D		10	17-S	32-E	
Type of Comp. OPEN HOLE		Current Status P&A WTR INJ		Survey	
County LEA	State NM	Date Completed NA	KB NA	DF	GL

CUT OFF CSG, WELD STEEL PLATE, SET 4' MARKER

PERF 5 1/2" & 8 5/8" @ 200'
PUMP 40 SX CMT

8 5/8 Csg. @ NA
Cmtd. w/

PERF 5 1/2" @ 1100'

SPOTTED 130 SX CMT. CALC T/CMT @ 540

SPOTTED 30 SX CMT @ 2300

DISPLACED W/9.5# MUD LADEN FLUID

SPOTTED 25 SX CMT @ 3600'

CIBP @ 3800'

5 1/2 Csg. @ 3880'
Cmtd. w/ NA

PBTD
TD 4144

P&A 10-8-76

Formation Tops

Oil/Water Contact

Csg. Detail

Perforations

3880-4144 OPEN HOLE

PERF 3819, 21, 23, 25, 64, 66, 68, 94, 96 3985, 87, 89

Tbg. Detail

Pertinent Data

CALCULATION SHEET
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Title: OPERATOR - CIMA CAPITAN, INC.
Location:
Department:
Project Number:

Lease HARRISON - FEDERAL Well # 2 Field MALJAMAR (GRAYBURG - SAN ANDRES)

Location 1980 FNL 900 FWL	Section 2	Township 17-S	Range 32-E	Block	
Type of Comp. SELECT PERF	Current Status P&A	PRODUCER	Survey		
County LEA	State NM	Date Completed 6-10-64	KB	DF	GL 4295'

CUT OFF CSG, WELDED ON STEEL PLATE, SET 4' MARKER

20' PLUG IN TOP

8 5/8" Csg. @ 362
Cmtd. w/

PERF 5 1/2" @ 1305'

75 SX CMT
(50 IN PERFS,
25 IN 5 1/2"
W/ TOP @ 1095'

SPOTTED 25 SX CMT @ 2490'

SPOTTED 25 SX CMT @ 3983'

5 1/2" Csg. @ 4292
Cmtd. w/300 SX

PBTD 4252
TD 4382

P&A 9-2-77

Formation Tops

GRAYBURG 3900
SAN ANDRES 4226

Oil/Water Contact

Csg. Detail

Perforations

4091-96
4107-10
4142-46
4182-85
4201-04
4208-12
4216-20
4344-47

Tbg. Detail

Pertinent Data

60 144 2 CW

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Title: **Supplemental Well History**

Location | Department | Project Number

Lease HARRISON - FEDERAL Well # 2 Field MALJAMAR (GRAYBURG - SAN ANDRES)

Date	Completion	Production Before	Production After
5-13-64	SPUDDED		
6-10-64	PERF 4091 - 4347 SELECTIVELY FRACED W/ 42,000 GALS OIL & 18000# SAND		
	POTENTIAL	NEW	428 BO 10 BW 34° API

GO-144 2 CK

CALCULATION SHEET
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Title	Location	Department	Project Number

Lease MALJAMAR GRAYBURG UNIT Well # 78 Field MALJAMAR (GYBG) UNIT

Location 50' FWL, 1400' FSL UNIT J	Section 3	Township 17-S	Range 32-E	Block	
Type of Comp. SELECT PERF	Current Status PRODUCER - PUMPING		Survey		
County LEA	State NM	Date Completed 8-8-81	KB 4177'	DF 4176'	GL 4168'

8 5/8" Csg. @ 370'
Cmtd. w/450 SX
CIRC 150 SX TO SURFACE
RE-CMT w/250 SX

12 1/4" HOLE

T/CMT 1290' BY CBL

Perforations
3921', 24, 26, 51, 53, 60, 62, 63, 74, 76, 78, 81, 85, 87, 90, 4002, 03, 14, 15, 35, 47, 49, 52, 55, 57, 62, 64, 66, 73, 74, 75, 77, 79, 83, 85, 4211, 13, 15, 44, 45'
1 CJPF

BAKER MODEL "AD-1" PACKER @ 3800'±

5 1/2" Csg. @ 4300'
Cmtd. w/1025

PBTD 4254'
TD 4300'

7 7/8" HOLE

WELLHEAD - LARKIN TYPE "R"

Formation Tops

GRAYBURG 3783'
SAN ANDRES 4089'

Oil/Water Contact

Csg. Detail

KB	9.00
108 - JTS 5 1/2, 14#, K-55	4261.99
FLOAT COLLAR	1.64
1 - JT 5 1/2, SAA	37.84
FLOAT SHOE	1.67
CUT OFF CSG	- 12.14
LDD @	4300.00

Tbg. Detail

2 3/8", 4.7#, 8 RD, EUE, J-55 PLASTIC COATED TBG

BAKER MODEL "AD-1" PACKER

LDD @ 3800'

Pertinent Data

CALCULATION SHEET
Chevron U.S.A. Inc.

Date: 6/18/84
Prepared by: SCH
Page No: of

Title: Supplemental Well History
Location:
Department:
Project Number:

Lease MALJAMAR GRAYBURG UNIT Well # 78 Field MGU

Date		Production Before	After
7-81	PERF 4211, 13, 15, 42, 43 W/1 JSPF ACID W/ 500 GALS 15% HCL & 1 GAL A-200 & 1 GAL W-53 NE AGENT PERF 3921 - 4085 SELECTIVELY W/1 CSPF ACID W/ 3500 GALS 15% HCL & 7 GALS A-200 INHIBITOR & 7 GALS W-53 NE AGENT FRACED W/ 42,000 GALS X-LINK GEL & 101,000# SAND		
8-21-81	POTENTIAL	NEW	17 BO, & BW 9 MCF, 38°
1-15-82	REPAIRED BAD BEARINGS ON PMPG UNIT		

LARGE FORMAT EXHIBIT HAS BEEN REMOVED AND IS LOCATED IN THE NEXT FILE

STATE OF NEW MEXICO

ENERGY AND MINERALS DEPARTMENT

OIL CONSERVATION DIVISION

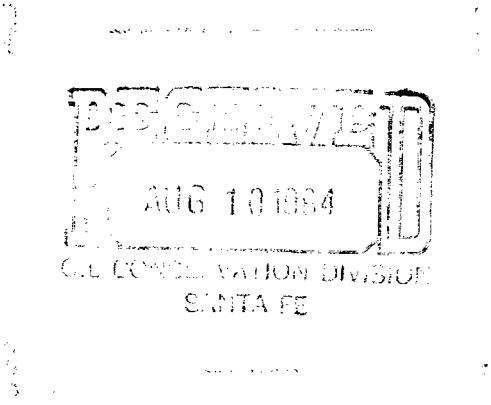
HOBBS DISTRICT OFFICE

August 6, 1984

TONEY ANAYA
GOVERNOR

POST OFFICE BOX 1980
HOBBS, NEW MEXICO 88240
(505) 393-6161

OIL CONSERVATION DIVISION
P. O. BOX 2088
SANTA FE, NEW MEXICO 87501



RE: Proposed:
MC_____
DHC_____
NSL_____
NSP_____
SWD_____
WFX X
PMX_____

Gentlemen:

I have examined the application for the:

Chevron USA, Inc. Maljamar Grayburg Unit No. 78-L 3-17-32
Operator Lease & Well No. Unit S-T-R

and my recommendations are as follows:

O.K.----J.S.

Yours very truly,

Jerry Sexton
Supervisor, District 1

/mc