

P-W

CREST-ARIZ HELIUM #2 SANTA FE
C SW/4 25-20N-27E, Apache 472

COUNTY Apache AREA 7 mi E. of Navajo LEASE NO. Santa Fe #9650

WELL NAME Crest - Ariz. Helium #2 Santa Fe

LOCATION C SW/4 SEC 25 TWP 20N RANGE 27E FOOTAGE 1320' FSL - 1320' FWL

ELEV 5805' GR _____ KB _____ SPUD DATE 10-25-68 STATUS PA 8-28-69 TOTAL DEPTH 1445'
 COMP. DATE 11-16-68* PB 1350'

CONTRACTOR Drake Well Service Co., Farmington, New Mexico

| CASING SIZE | DEPTH | CEMENT | LINER SIZE & DEPTH | DRILLED BY ROTARY |
|---------------|--------------|---------------|--------------------|-----------------------------|
| <u>8 5/8"</u> | <u>30'</u> | <u>10 SKS</u> | <u>NA</u> | <u>x</u> |
| <u>4 1/2"</u> | <u>1435'</u> | <u>50 SKS</u> | | |
| | | | | DRILLED BY CABLE TOOL _____ |
| | | | | PRODUCTIVE RESERVOIR _____ |
| | | | | INITIAL PRODUCTION _____ |

| FORMATION TOPS | DEPTHS | SOURCE | | REMARKS |
|-----------------------|----------------|--------|----------|---------|
| | | L.L. | E.L. | |
| <u>Surface Sand</u> | <u>Surface</u> | | <u>x</u> | |
| <u>Chinle Shale</u> | <u>310'</u> | | | |
| <u>Shinarump Sand</u> | <u>1260'</u> | | | |
| <u>Moenkopi Shale</u> | <u>1319'</u> | | | |
| <u>Coconino Sand</u> | <u>1439'</u> | | | |
| | | | | |
| | | | | |
| | | | | |
| | | | | |
| | | | | |

| ELECTRIC LOGS | PERFORATED INTERVALS | PROD. INTERVALS | SAMPLE LOG |
|---------------|----------------------------|-----------------|-----------------------------|
| <u>IE Log</u> | <u>1290-1293;1297-1301</u> | <u>NA</u> | <u>SAMPLE DESCRP. _____</u> |
| | <u>1305-1311</u> | | <u>SAMPLE NO. _____</u> |
| | | | <u>CORE ANALYSIS _____</u> |
| | | | <u>DSTs _____</u> |

REMARKS _____ APP. TO PLUG x
 _____ PLUGGING REP. x
 _____ COMP. REPORT x

WATER WELL ACCEPTED BY _____

BOND CO. Maryland Casualty Company BOND NO. 94-174783
 BOND AMT. \$ 5,000 CANCELLED 11-25-69 DATE _____
 FILING RECEIPT 9555 LOC. PLAT x WELL BOOK x ORGANIZATION REPORT 11-19-67
 API NO. 02-001-20084 DATE ISSUED 9-19-68 DEDICATION SW/4 of Sec 25
 PLAT BOOK x

PERMIT NUMBER 472

WELL COMPLETION OR RECOMPLETION REPORT AND WELL LOG

DESIGNATE TYPE OF COMPLETION:

New Well Work-Over Deepen Plug Back Same Reservoir Different Reservoir Oil Gas Dry

DESCRIPTION OF WELL AND LEASE

Operator: **Crest Oil Company** Address: **P. O. Box 57 Alton, Ill. 62002**
 Federal, State or Indian Lease Number or name of lessor if fee lease: **Santa Fe Pacific Railway Company** Well Number: **2** Field & Reservoir: **Un-named**
 Location: **Center SW/4 Section 25-T20N-R27E** County: **Apache**
 Sec. TWP-Range or Block & Survey:

Date spudded: **October 25, 1968** Date total depth reached: **November 1, 1968** Date completed, ready to produce: **11/16/68** Elevation (of RKB, RT or Gr.) feet: **5805.0 GL** Elevation of casing hd. flange feet: **5807'**
 Total depth: **1445'** P.B.T.D.: **1350'** Single, dual or triple completion?: **Single** If this is a dual or triple completion, furnish separate report for each completion.
 Producing interval (g) for this completion (Not Produced): **1439'-1445' (Prod) PB Interval 1290'-1311'** Rotary tools used (interval): **Surface to 1445'** Cable tools used (interval): **None**
 Was this well directionally drilled?: **No** Was directional survey made?: **No** Was copy of directional survey filed?: **_____** Date filed: **_____**
 Type of electrical or other logs run (check logs filed with the commission): **Induction Electric Log** Date filed: **12/8/68**

CASING RECORD

| Casing (report all strings set in well—conductor, surface, intermediate, producing, etc.) | | | | | | |
|---|-------------------|-----------------|------------------|-----------|--------------|-------------|
| Purpose | Size hole drilled | Size casing set | Weight (lb./ft.) | Depth set | Sacks cement | Amt. pulled |
| Surface | 10" | 8-5/8" | 24 | 30' | 10 sacks | None |
| Production | 6-1/8" | 4-1/2" | 9.5 | 1435' | 50 sacks | None |

TUBING RECORD

LINER RECORD

| Size EUE | Depth set | Packer set at | Size | Top | Bottom | Sacks cement | Screen (ft.) |
|-----------|-----------|---------------|-----------|----------|-----------|--------------|--------------|
| 2-3/8 in. | 1438 ft. | None ft. | _____ in. | None ft. | _____ ft. | _____ | _____ |

PERFORATION RECORD (Casing)

ACID, SHOT, FRACTURE, CEMENT SQUEEZE RECORD

| Number per ft. | Size & type (after plug back) | Depth Interval | Am't. & kind of material used | Depth Interval |
|----------------|-------------------------------|-----------------------------------|---|-----------------------------|
| 2 | 3-1/2" Jets | 1290-1293; 1297-1301 1305-1311 | Fracture/18M gal h2o & 16M lbs 8-12 sand Plugged 4-1/2" Csg from T.D to Surf/110 sacks | Thru perforations as shown. |

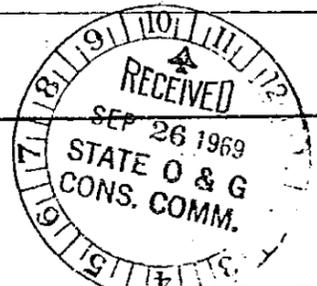
(Tubing pulled)

INITIAL PRODUCTION

Date of first production: **No Production.** Producing method (indicate if flowing, gas lift or pumping—if pumping, show size & type of pump): **Not produced. Dry Hole**
 Date of test: _____ Hrs. tested: _____ Choke size: _____ Oil prod. during test bbls.: _____ Gas prod. during test MCF: _____ Water prod. during test bbls.: _____ Oil gravity ° API (Corr): _____
 Tubing pressure: _____ Casing pressure: _____ Cal'd rate of Production per 24 hrs.: _____ Oil bbls.: _____ Gas MCF: _____ Water bbls.: _____ Gas-oil ratio: _____
 Disposition of gas (state whether vented, used for fuel or sold): _____

CERTIFICATE: I, the undersigned, under the penalty of perjury, state that I am the **Sole Owner** of the **Crest Oil** (company), and that I am authorized by said company to make this report; and that this report was prepared under my supervision and direction and that the facts stated therein are true, correct and complete to the best of my knowledge.

Date: **9/15/69** Signature: **C. F. Swain**



Permit No. **472** STATE OF ARIZONA OIL & GAS CONSERVATION COMMISSION Well Completion or Recompletion Report and Well Log Form No. 4 File **one** Copies **Two**

DETAIL OF FORMATIONS PENETRATED

| Formation | Top | Bottom | Description* |
|--------------------------|------|--------|---|
| Surface Sand | 0 | 310' | Lt Tan to brn surf sand to 230'. 230-310 70% wh to gry fine ss/pebbles of qtz & chert; 30% brn, grn, ppl & red shale |
| Chinle Shale | 310 | 1260' | Alternating beds of white to gry and S & P ss and vari-colored shales with occasional beds (shallow) of red-brn ss. |
| Shinarump Sand | 1260 | 1319' | Wt to clear, med to coarse, v/friable dirty ss, 80% loose qtz grns. Shly. |
| Moenkopi Shale | 1319 | 1439' | Alternating beds of wh, brn, red, brn to buff ss and red, gry, grn, ppl, & maroon shales. |
| Coconino Sand | 1439 | 1445' | Tr. off-wht, med, friable, porous, sub rnd to well rounded ss. |
| <u>Drill Stem Tests:</u> | None | | Drill pipe not heavy enough to open test tool. |
| <u>Cores:</u> | 1079 | 1096' | Recovered 11' only (sand stringers washed out). 11' recovered all shale. This core point was chosen due to samples circulated to surface and correlation with other wells. The true Shinarump ss, due to faulting, did not come in until 1260'. |

* Show all important zones of porosity, detail of all cores, and all drill-stem tests, including depth interval tested, cushion used, time tool open, flowing and shut-in pressures, and recoveries.

INSTRUCTIONS:

Attach drillers log or other acceptable log of well.

This Well Completion or Recompletion report and well log shall be filed with the State of Arizona Oil & Gas Conservation Commission not later than thirty days after project completion.

Form No. 4

APPLICATION TO ABANDON AND PLUG

FIELD Undesignated
OPERATOR C. F. Swain, d/b/a Crest Oil Co. ADDRESS P. O. Box 57 Alton, Ill. 62002
Federal, State, or Indian Lease Number
or Lessor's Name if Fee Lease Santa Fe Pacific Railroad Co WELL NO. #2
SURVEY _____ SECTION 25 COUNTY Apache
LOCATION 1320 FSL & 1320 FWL Section 25-T20N-R27E

TYPE OF WELL Dry Hole TOTAL DEPTH 1445'
(Oil, Gas or Dry Hole)
ALLOWABLE (If Assigned) _____
LAST PRODUCTION TEST OIL _____ (Bbls.) WATER _____ (Bbls.)
GAS _____ (MCF) DATE OF TEST _____
PRODUCING HORIZON _____ PRODUCING FROM _____ TO _____

1. COMPLETE CASING RECORD
8-5/8" casing from surface to 30' cemented/10 sacks
4-1/2" casing from surface to 1435' cemented/50 sacks
Plugged back with "Go" casing bridge packer set @ 1350'
Total depth after plug back, 1350'

2. FULL DETAILS OF PROPOSED PLAN OF WORK
Leave all casing in the hole
Fill casing with cement from total depth to surface
Affix abandoned well marker
Backfill all pits and clean up location

If well is to be abandoned, does proposed work conform with requirements of Rule 202? Yes If not, outline proposed procedure above.

DATE COMMENCING OPERATIONS August 20, 1969
NAME OF PERSON DOING WORK Mesa Field Service, Inc. ADDRESS Farmington, New Mexico
CORRESPONDENCE SHOULD BE SENT TO C. F. Swain, Crest Oil Company
Name
Title Owner
Address P. O. Box 57 Alton, Illinois 62002
Date 23 July, 1969

Date Approved 7-25-69
STATE OF ARIZONA
OIL & GAS CONSERVATION COMMISSION
By: John Bannister
Permit No. #472
STATE OF ARIZONA
OIL & GAS CONSERVATION COMMISSION
Application to Abandon and Plug
File Two Copies
RECEIVED
JUL 26 1969
STATE O & G
CONS. COMM.

March 8, 1971

Memo from W. E. Allen, Director
Enforcement Section

Memo to: Crest-Arizona Helium #2 Santa Fe
C SW/4 Sec. 25-T20N-R27E
Apache County
Our File #472

This well is plugged and abandoned. There is a dry hole marker in place. The pit is filled but there is miscellaneous casing, tubing, fittings, and timbers on location. The surface pipe on this well was cemented to surface as evidenced by the amount of cement around the pipe. No discernible cement between surface casing and 4" casing. Pulled dry hole marker to determine if there was a cement plug in this well. There was.



Grest Arizona Helium #2 February 23, 1971

#472

July 16, 1970

Memo from W. E. Allen

Memo to Crest-Arizona Helium #2 Santa Fe
C SW/4 Sec. 25-T20N-R27E
Apache County
Our File #472

This well has a dry hole marker screwed into the casing. There is a string of 2" EUE tubing, 2 joints of 4-1/2" casing, some sills and debris on location. The pit is not filled; however, Dr. Swain claims the location to be cleaned up. There is an invoice in the file indicating that R. C. Spurlock covered the pits and cleaned the location. The invoice is dated September 1, 1969.

The Completion Report, Form 4, and the Plugging Report, Form 10, state that the 4" casing was filled from total depth to the surface with 110 sacks of cement. I have some doubts that the hole is filled with cement. When the dry hole marker is tapped with a piece of metal, there is a definite ring for a fairly long time interval. To me this indicates an empty string of pipe.

The bond has been released. I will recheck this well at the earliest possible time.

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test Well to Coconino
 3. Well Name Crest-Arizona Helium #2 Santa Fe
 Location 1320' FSL and 1320' FWL (C SW/4)
 Sec. 25 Twp. 20N Rgc. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650 Santa Fe Pacific Railroad Co.
 5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| | | | | | | | |
|-------------------------|--------------------------|----------------------|--------------------------|-----------------------|--------------------------|------------------|-------------------------------------|
| NOTICE OF INTENTION TO: | | | SUBSEQUENT REPORT OF: | | | | |
| TEST WATER SHUT-OFF | <input type="checkbox"/> | PULL OR ALTER CASING | <input type="checkbox"/> | WATER SHUT-OFF | <input type="checkbox"/> | MONTHLY PROGRESS | <input checked="" type="checkbox"/> |
| FRACTURE TREAT | <input type="checkbox"/> | DIRECTIONAL DRILL | <input type="checkbox"/> | FRACTURE TREATMENT | <input type="checkbox"/> | REPAIRING WELL | <input type="checkbox"/> |
| SHOOT OR ACIDIZE | <input type="checkbox"/> | PERFORATE CASING | <input type="checkbox"/> | SHOOTING OR ACIDIZING | <input type="checkbox"/> | ALTERING CASING | <input type="checkbox"/> |
| REPAIR WELL | <input type="checkbox"/> | CHANGE PLANS | <input type="checkbox"/> | (OTHER) | <input type="checkbox"/> | ABANDONMENT | <input type="checkbox"/> |
| (OTHER) | <input type="checkbox"/> | | | (OTHER) | <input type="checkbox"/> | | |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

4

- No additional work has been performed on this well since sundry notices report filed 5/31/69.
- Well is under temporarily abandoned status as approved by the Commission on 6/16/69 until 9/20/69



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

Signed C. F. Swain Title Owner Date 6/30/69
C. F. Swain, d/b/a Crest Oil Company

Permit No. #472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Three Copies
 Form No. 25

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SUNDRY NOTICES AND REPORTS ON WELLS



1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test Well To Cocooning
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location c/SW/4 1320' FSL and 1320' FWL
 Sec. 25 Twp. 20N Rge. 27E County Apache
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650, Santa Fe Pacific Railroad Co.

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| NOTICE OF INTENTION TO: | | SUBSEQUENT REPORT OF: | |
|--|---|--|--|
| TEST WATER SHUT-OFF <input type="checkbox"/> | PULL OR ALTER CASING <input type="checkbox"/> | WATER SHUT-OFF <input type="checkbox"/> | MONTHLY PROGRESS <input checked="" type="checkbox"/> XXX |
| FRACTURE TREAT <input type="checkbox"/> | DIRECTIONAL DRILL <input type="checkbox"/> | FRACTURE TREATMENT <input type="checkbox"/> | REPAIRING WELL <input type="checkbox"/> |
| SHOOT OR ACIDIZE <input type="checkbox"/> | PERFORATE CASING <input type="checkbox"/> | SHOOTING OR ACIDIZING <input type="checkbox"/> | ALTERING CASING <input type="checkbox"/> |
| REPAIR WELL <input type="checkbox"/> | CHANGE PLANS <input type="checkbox"/> | (OTHER) <input type="checkbox"/> | ABANDONMENT <input type="checkbox"/> |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

1. No additional work has been performed on this well since sundry notices report filed 4/30/69.
2. Well is under temporarily abandoned status as approved by Commission on 4/17/69, until 6/20/69
3. As per conditions as cited in cover letter attached hereto, extension of temporarily abandoned status is requested.

APPROVED

By J. Barnette
 Date 6/16/69

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

Signed C. F. Swain Title Owner Date 5/31/69
C. F. Swain, d/b/a Crest Oil Company

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

Permit No. #172

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test Well To Coconino
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location C/SW/4 1320' FSL and 1320' FWL
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650, Santa Fe Pacific Railroad Co.

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| NOTICE OF INTENTION TO: | | SUBSEQUENT REPORT OF: | |
|--|---|--|--|
| TEST WATER SHUT-OFF <input type="checkbox"/> | PULL OR ALTER CASING <input type="checkbox"/> | WATER SHUT-OFF <input type="checkbox"/> | MONTHLY PROGRESS <input checked="" type="checkbox"/> |
| FRACTURE TREAT <input type="checkbox"/> | DIRECTIONAL DRILL <input type="checkbox"/> | FRACTURE TREATMENT <input type="checkbox"/> | REPAIRING WELL <input type="checkbox"/> |
| SHOOT OR ACIDIZE <input type="checkbox"/> | PERFORATE CASING <input type="checkbox"/> | SHOOTING OR ACIDIZING <input type="checkbox"/> | ALTERING CASING <input type="checkbox"/> |
| REPAIR WELL <input type="checkbox"/> | CHANGE PLANS <input type="checkbox"/> | (OTHER) <input type="checkbox"/> | ABANDONMENT <input type="checkbox"/> |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

4

- No additional work has been performed on this well since sundry notices report filed 3/22/69
- Well is under temporarily abandoned status as approved by Commission 4/17/69 until 6/20/69



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

Signed C. F. Swain Title Owner Date 4/30/69
C. F. Swain, d/b/a Crest Oil Company

Permit No. #472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

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DRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test Well To Coconino
 3. Well Name Crest-Arizona Helium #2 Santa Fe
 Location C/SW/4 1320' FSL and 1320' FWL
 Sec 25 Twp 20N Rge 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650, Santa Fe Pacific RR Company

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

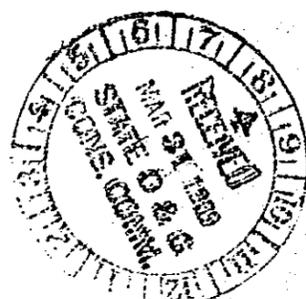
| | | | |
|--|---|--|--|
| NOTICE OF INTENTION TO: | | SUBSEQUENT REPORT OF: | |
| TEST WATER SHUT-OFF <input type="checkbox"/> | PULL OR ALTER CASING <input type="checkbox"/> | WATER SHUT-OFF <input type="checkbox"/> | MONTHLY PROGRESS <input checked="" type="checkbox"/> XXX |
| FRACTURE TREAT <input type="checkbox"/> | DIRECTIONAL DRILL <input type="checkbox"/> | FRACTURE TREATMENT <input type="checkbox"/> | REPAIRING WELL <input type="checkbox"/> |
| SHOOT OR ACIDIZE <input type="checkbox"/> | PERFORATE CASING <input type="checkbox"/> | SHOOTING OR ACIDIZING <input type="checkbox"/> | ALTERING CASING <input type="checkbox"/> |
| REPAIR WELL <input type="checkbox"/> | CHANGE PLANS <input type="checkbox"/> | (OTHER) <input type="checkbox"/> | ABANDONMENT <input type="checkbox"/> |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

- No additional work has been performed on this well since sundry notices report filed 2/28/69
- This well is presently in temporary abandon status; said status due to expire 4/21/69.
- Request that temporary abandon status be extended *with 4/30/69* approximately 60 days, in order that any additional work or plugging of this well can be coordinated with other work planned in the area to commence during month of June.

APPROVED
 By J. Bannister
 Date 4/17/69



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

Signed C. F. Swain Title Owner Date 3/22/69
C. F. Swain, d/b/a Crest Oil Company

Permit No. #472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test well to Coconino Formation
 3. Well Name Crest-Arizona Helium #2 Santa Fe
 Location C/SW/4 1320' FSL and 1320' FWL
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650, Santa Fe Pacific RR Company

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

NOTICE OF INTENTION TO:

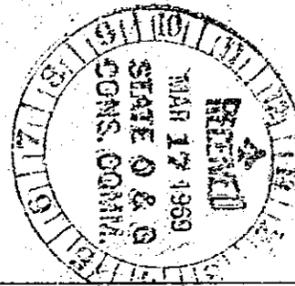
SUBSEQUENT REPORT OF:

| | | | |
|--|---|--|--|
| TEST WATER SHUT-OFF <input type="checkbox"/> | PULL OR ALTER CASING <input type="checkbox"/> | WATER SHUT-OFF <input type="checkbox"/> | MONTHLY PROGRESS <input checked="" type="checkbox"/> |
| FRACTURE TREAT <input type="checkbox"/> | DIRECTIONAL DRILL <input type="checkbox"/> | FRACTURE TREATMENT <input type="checkbox"/> | REPAIRING WELL <input type="checkbox"/> |
| SHOOT OR ACIDIZE <input type="checkbox"/> | PERFORATE CASING <input type="checkbox"/> | SHOOTING OR ACIDIZING <input type="checkbox"/> | ALTERING CASING <input type="checkbox"/> |
| REPAIR WELL <input type="checkbox"/> | CHANGE PLANS <input type="checkbox"/> | (OTHER) <u>Well Temporarily Abandoned as per</u> | ABANDONMENT <input type="checkbox"/> |

report 2/18/69, Approved 2/24/69
 (NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

1. No additional action or work on this well since since sundry notices report filed 2/18/69



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

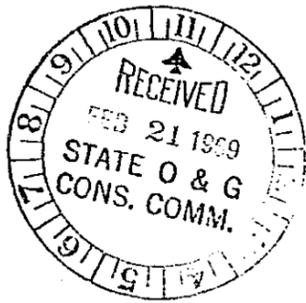
Signed C. F. Swain Title Owner Date February 28, 1969
C. F. Swain, d/b/a Crest Oil Company

Permit No. #472

Form No. 25

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies

B



GEOLOGICAL & DRILLING REPORT
of
CREST OIL COMPANY
Crest-Arizona Helium #2 Santa Fe
Section 25 T20N R27E
Apache County, Arizona

E. A. Clement
Consulting Geologist
Farmington, N. M.
November 26, 1968

WELL DATA

Operator: Crest Oil Co.

Well Name: Crest-Arizona Helium #2 Santa Fe

Location: 1320' from the South line &
1320' from the West line of
Section 25, T20N, R27E
Apache County, Arizona

Elevation: 5805.0 Ground

Contractor: Drake Well Service
Farmington, N. M.

Starting Date: October 25, 1968

Total Depth: 1445'

Hole Size: 10" - 0 to 30'
6 1/8" 30' to 1445'

Casing Program: 8 5/8" surf. to 30' cemented with
10 sacks cement.
4 1/2" surf. to 1435' cemented with 50
sacks cement.

Fresh Water Zones: 440' to 458'; 502' to 521'

Drill Stem Tests: None

Cores: 1079' to 1096'

Logs: Welox Induction Electric log,
100' to 1434'.

Completion: Installed pumping unit to pump
back free water.

GEOLOGY & DRILLING

Formation tops were identified by sample examination as drilling progressed and were later correlated with the electric log tops. The surface at the well site is wind-blown sand. Other formation tops are as follows:

| <u>FORMATION</u> | <u>DEPTH</u> | <u>SEA LEVEL DATUM</u> |
|---------------------|--------------|------------------------|
| Chinle Shale | 310' | plus 5495' |
| Shinarump Sandstone | 1280' | " 4548' |
| Moenkopi Shale | 1319' | " 4486' |
| Cocconino Sandstone | 1439' | " 4366' |

Drill cutting samples were taken at 10 foot intervals from 230' to 1079', the well was cored from 1079' to 1096'.

Ten foot samples were taken from 1096' to 1400' and samples were caught at 5' intervals from 1400' to 1445'.

All samples were microscopically examined at the well site as drilled. Drilling time was recorded by the driller at 5' intervals while drilling and at 1' intervals while coring.

A sample description and core description along with the drilling time and a log of the daily drilling operations are included in this report.

All measurements by the driller were taken from 6' above ground level. Measurements by Schlumberger were taken from ground level. These have all been corrected to correspond with the Schlumberger figures except in the sample description. Sample description depths are 6' more than the log depths

on corresponding points.

During the drilling of this well, the drilling mud was kept above 45 viscosity at all times and the well was drilled to total depth with the only lost circulation being in the Coconino sandstone.

A core was cut from 1079' to 1096' with 11 feet being recovered. This was thought to be at the top of the Shinarump sandstone by the samples which were being circulated to the surface and by correlation on adjacent wells. After pulling the core, it was found that only minor sandstone stringers were being drilled with the remainder of the core being shale. The actual Shinarump top did not come in until 1260', which was 109' lower than expected. It is believed a series of minor step faults, instead of one big fault, exist in the area which caused the beds to be found at a lower depth than calculated.

No drill stem tests were run, due to the drill pipe not being heavy enough to set the Haliburton packer and open the test tool.

After cementing 4½" casing at the top of the Coconino sandstone, the well was swabbed with only water being recovered. Continuous swabbing showed no gas shows.

The well was plugged back and the Shinarump sand was perforated and sand water fraced. The casing swab was stuck in the casing on attempting to swab, which resulted

in a 5 day fishing job. After the casing swab was recovered, tubing was run and the well swabbed thru the tubing. Only water was recovered with no shows of gas. The amount of water recovered by swabbing was so small, it was decided to install a pumping unit. The well was put on a pump at 6 p.m., 11-16-68 and pumped until 11-26-68. At this time a $\frac{1}{2}$ " stream of water was being pumped from the well with no shows of gas. The pump was shut down 11-26-68 and pumping will be resumed when a pumper is moved to the area on 12-1-68.

Details of all work can be found in the daily operations sheets, which is included in this report.

E. A. Clement
Consulting Geologist

CREST OIL CO. CREST-ARIZONA HELIUM #2 SANTA FE

DAILY DRILLING OPERATIONS

- 10-25-68 Moved rig from #8X and rigged up - mixed approx. 30 sacks mud and broke hose to mud hopper at dark - Shut down for nite. Transwestern hauling water.
- 10-26-68 On loc. 7:15 am, repaired mud hose - went in hole with new S3J Security bit with 9/32" nozzles, started drilling. Drilled to 379' & started out of hole at 6 PM. Crew left at 6:20 pm. Before starting to drill, mixed 50 sks. jel, 4 sks. col6, 12 qts. celex, 6 sks. lost circulation material. Mud vis. 45 - dropped to 35, mixed 6 sks. jel, 4 qts. celex - vis went up to 50, then back to 40 when thoroughly mixed.
- 10-27-68 On loc. 7 am. Jetted and stirred mud, went in hole with new S3J Security bit, on bottom drilling at 8:40 am. Drilled to 779' by 5:45 pm. Loaded mud with 1700 gal diesel oil - Vis 45, wght. 8.6. Started out of hole at 5:45 pm. Mud vis up to 60. Crew left at 6 pm.
- 10-28-68 On loc. at 7 am, jetted mud, mixed 1 sk col6-re-run bit #1 - hit 2 bridges going in hole, on bottom drilling at 9:45 am. Drilled to 1049' - Started circulating at 5:15 pm - out of hole at

6:30 pm.

10-29-68 On location at 7 am - put on used bit - (left over from #1 location), mixed 1 sk. col6, jetted mud - went in hole and drilled to 1079', pulled bit and run core barrel. Mud vis 55, wght. 8.8. Cored to 1096'. Started out of hole at 5:30 pm. Cut 17' of core, recovered 11' of shale, sand stringers apparently had washed out. Left location at 7 pm.

10-30-68 On loc. 7 am - mixed 1 sk. col6, 4 sks. l.o. material - run new S3J Security bit with 3/8" nozzles - on bottom drilling at 8:40 am - drilled to 1294' - started out of hole at 5:30 pm. left loc. at 7 pm. Bob Drake and Geo. Jones, Jr., left for Farmington at 7 am - worked all day with 3 man crew.

10-31-68 On loc. 7 am - mixed 1 sk col6, 6 sks. l.o. material - went in hole with used S-4 Security bit - on bottom drilling at 9 am. Drilled to 1409' - out of hole at 6:30 pm. Schlumberger arrived at 1 pm. Beasley arrived at 5 pm and unloaded casing - took tubing to #1 Crest Spurlock - will remain over-nite and haul tubing from Henderson's yard to #2 well. Schlumberger left for Farmington around 10 pm - left note on trailer door at rig.

11-1-68 On loc. at 7 am - mixed 2 sks. ccl6 - went in hole with S4 new Security bit - drilled to 1444', topped Coconino at 1439'- circulated 15 min for sample - decided to cut 5' more - out 18" and lost circulation (TD 1445), put l.o. material in over suction- could not get returns - pulled 8 jnts. off of bottom - mixed more l.o. material over suction - no returns - put total of 6 sks. in thru suction to pump. Pulled out of hole - lost total of approx. 50 bbls. mud. Filled hole with mud, stood in hole o.k. - W. O. Schlumberger. Schlumberger arrived at 4 pm, attempted to log - could not get below 78'- mixed pit of mud to go in hole and attempt to circulate and clean up. Drilled and circulated down 8 jnts. Had to drill each jnt down. Decided at 8 pm to wait until morning. Pulled back out of hole, mixed pit of mud. Shut down at 9 pm. Schlumberger pulled truck off of job and went to Farmington - would not wait until we got hole ready to log. Beasley hauled 50 jnts. 2 3/8" tubing from Henderson's yard to #2 well, 1576.72'. Hauled 40 jnts. to #1 well, will tally later.

11-2-68 On loc. 7 am - mixed mud- went in hole - had to drill and circulate down 9 joints - then pipe went

free to 7 jnts. off bottom - drilled & circulated to TD - lost returns on bottom - picked up 20' and got mud returns back - circulated and lowered pipe back to TD. Circulated ok for 3 hour - Welex logging truck arrived at 10 am - pulled out of hole and run log to 1439' below ground level. TD is 1445, Coconino sandstone did not show on log - could not get to bottom because of fill-up in hole. Did not hit any bridges. Rigged up and ran casing, casing stopped at 60 ft. went slow for approx. 10 jnts. Ran 1440.03', 45 joints, of 4½", 9.5#, J55 casing and landed at 1435' below ground level. Ran with Haliburton formation packer shoe. (Total pipe on loc. 48 jnts., 1538.97'. Beasley delivered 44 new jnts. hauled 4 jnts. from #8X. 3 jnts. left on loc.) Landed casing at 5:30 pm. Haliburton arrived at 7 pm - dropped ball to open packer- rigged up and pumped 23.5 bbls water to displace mud - mud circulated at surface after pumping 6 bbls. with 300 psi pressure. Pumped in 50 sacks of class A cement with 12½ # of Gilsomite per sack, 2% calcium chloride, 59-50 pos mix and 2% bentonite. Mud circulated during pumping - displaced with 23.5 bbls. water- plug down at 9 pm. Computed fill-up to be 811'. Crew left for Farmington at 7 pm.

CREST OIL CO. CREST-ARIZONA HELIUM #2 SANTA FE
DAILY COMPLETION OPERATIONS

- 11-5-68 Cut off 4 $\frac{1}{2}$ " casing and welded on thread.
Installed tubing head and run 3 7/8" bit on tbng.
Drilled rubber plug, inside of ssng. packer shoe
and went to bottom of hole, bottom was 13' below
rubber plug. Circulated and cleaned up for 1 hr.
lost approx. 8 bbls. water to formation. Cut 8 $\frac{1}{2}$ '
off of a jnt. of tbng. and welded on pin collar
for bottom jnt. Shut down for nite, 6 pm.
- 11-6-68 On loc. 7 am- loaded power swivel on trailer-
pulled tbng. and bit. Ran 1442.34' of 2 3/8"
tbng. w/pin collar on bottom, (46jnts.) and set
at 1438' below ground level. Swabbed thru tbng.
for 5 hrs., recovered only water - level seems to
be steady at 400' off bottom. Continued swabbing
for 1 $\frac{1}{2}$ hrs more, recovered water as before. Shut
down at 5:30 pm. Mud inventory, 49 sks. quick jel,
3 sks. celled, 1 coarse micatex, 9 sks. cc 16, 42
sks. fibertex, 22 sks. hy-seal.
- 11-7-68 On loc. 7 am - no pressure on well - had very sl.
blow when opened - swabbed 8-10 runs, no gas. Tore
down and moved rig to #1 well. Beasley moved small
mud tank and pump to #1. Loaded big mud tank, dog
house, drill pipe, collars, etc. and took to Farmington.

- 11-8-68 Moved rig back on from #1 well and rigged up by 7 pm.
- 11-9-68 On loc. 7 am, filled hole with heavily mud laden fluid up to 1350'. Pulled tubing and stood back. Ran Jet Tech gamma ray correlation log and collar locator from 1350' up to 1000'. Set 4 1/2" GO cast iron bridging plug at 1350'. Perforated with 2 glass strip jets per foot at 1290'-93"; 1297'-1301'; 1305'-11'. Sand water fractured with 1 Haliburton H-400 pump truck using a total of 16,320 gal water and 16000 lbs. 8-12 sand & 10 gal. Howco Suds. Formation broke down at 1800 psi and took treatment at 1150 to 1350 psi. Average injection rate 29 bbls. per min. Average pressure 1240 psi. Dropped 10 rubber balls half-way thru frac. Shut in for 1 hr.- opened and flowed back small amount of water. Started swabbing- Swabbed water down to 800' - no sand - driller dropped swab to 1100' and hung in sand - pulled line off leaving 4' of one strand of cable (3/16") and 2 - 1 ft. strands - Called Farmington for overshot and grapple. Crew left location at 4 pm. Light plant not operating.
- 11-10-68 Beasley truck arrived at 7 am - Crew on loc at 7 AM. Run overshot with 1 3/4" grapple. Beasley moved mud pump and pit from #1 location. Hooked up pump and

circulated approx. 2 sacks sand out of hole. Hooked on to fish & moved 4' after 1 hour of pulling - tool came loose - could not get tool to stay on fish. Pulled tbng. and over shot - found grapple broken. Went in hole with 8' piece of 3" with teeth out on bottom - washed over 3' and stopped - circulated up sand & wire, went in hole with overshot and 1 5/8" grapple - could not make overshot stay on fish - pulled off at 45,000 pounds of pull. Pulled tbng. & over shot, found ball of wire in overshot - removed wire and run back in hole- hooked on to fish, pulled max. of 70,000 pounds - pulled and worked for 30 min.- pulled tool off of fish. Came out of hole & shut down for nite, crew left loc. at 6 pm, light plant not operating & yellow dog pump will not pump.

11-11-68 On loc. 7 am, Beasley arrived with overshot grapples 1 5/8" - 1 3/4" and Bowen jars. Ran overshot with 1 3/4" grapples and Bowen jars - could not get on fish - turned tbng to mark overshot - pulled out of hole and found marks on overshot indicating rope socket is 1 15/16" at top. Called Farmington for 1 7/8" and 2" grapples and flat milling tool. Blackie McClelland arrived at 2:20 pm, put on 1.9"

grapple, bowen jars & bumper sub. Had difficulty getting on fish. Tool went over fish approx. $1\frac{1}{8}$ " jarred 4 times did not move fish - tool slipped off. Hooked back on - jarred 1 time, tool came off. Apparently rope socket is worn down and pointed at top. Pulled tubing and overshot - put on 51" length of wash pipe with milling head, run back in hole and washed over 3', circulated up metal, wire and some sand. Shut down and left loc. at 5:30 pm. No lights. Picked up pipe.

11-12-68 On loc. 6:45 am - went back to bottom, circulated 30 min, went back to same place as yesterday. Pulled tbng. and wash over pipe, rope socket mark on sub at top of wash over pipe. Have washed over 51". Went back in hole with overshot, 1.9 grapples, bowen jars and bumper sub. Hooked on to fish and jarred 8 to 10 times, could not move fish. Overshot slipping off, found grapple broken. Called Farmington for new grapples, 6 drill collars and 30' jnt of wash pipe. Waited at rig until 5:30 pm for truck. Truck arrived at 9 pm. Worked with 3 man crew, as Tony Daws left.

11-13-68 On loc. 6:45 am - Beasley truck arrived on loc. at 7:15 am - unloaded 2 jnts. wash pipe, 6 - 3 3/4"

drill collars with pick up subs - 2 sets slips,
1 spider, 1 set elevators, 1 drill collar clamp,
1 set hydraulic short stroke jars, 3 grapples for
overshot - 2 1/8" - 2" - 1 7/8". Went in hole with
30' jnt 3 15/16" wash pipe with milling shoe, pipe
is 3.425" I.D. Washed and milled over entire fish -
fish came free - went down free for 3 jnts - stopped
at 1227' - cleaned out by reverse circulation,
pulled out of hole. Casing swab was stuck in wash
pipe. Run tubing with pin collar back to bottom and
circulated up sand. Pulled tubing above perforations
and swabbed thru tubing. Tried to pump water from
pit with yellow dog pump, still will not work.
Lost 3/4 pit water. Swabbed thru tubing for 6 hours
swabbed down to 200-250 ft. Recov. approx. 1 bbl.
each run. Quit swabbing at 5 pm and SD for nite.
Tubing is at 1281' - 9' above top perforation.
McClelland left for Farmington, took all tools except
6 drill collars and handling subs, 2 jnts. wash over
pipe, 1 set slips, 1 spider, 1 set jars, 1 sand pump
with chisel bottom extra.

11-14-88 On loc. 7 am - started swabbing - casing was on
vacuum - wtr level at 250' - swabbing 1/2 to 1
bbl. every 10 min. Swabbed all day, have recov.
approx. 75 bbls. wtr. - recov. 5 to 10 gal per run

at end of day - shut down at 5:30 pm.

11-15-68 On loc. 7 am - started swabbing - unloading 1 to 2 bbls. each run. Swabbed well down - put on 3 jnts. tbng., went to 1343' - no sand in hole. Pulled tbng. up to 1312' and started swabbing - swabbed well down, recovering 2 to 3 gal per run. Swabbed until 4:30 PM and shut down- (snowing & raining all day). Have swabbed total of 105 bbls. water back thru tbng. - swabbed 25 bbls. with casing swab - Total swabbed and recovered now is 130 bbls. Decided to put well on pump.

11-16-68 On loc. 7 am - Run swab- had 250' water in hole - Pulled tbng - Beasley truck arrived at 7 am with rods, pump, polish rod for #2 well, and separator for #2 well. Stuck truck 1 mi. from location - broke "u" jnt to winch - had wrecker pull truck out- hauled rods to loc and left at noon for Holbrook to repair truck. Ran rods, and working barrel pump set pump at 1292 with bottom of tubing at 1301'. Had Steve Henderson pick up pumping unit at Arizona Helium plant and haul to location - Beasley truck arrived at 4 pm and set pumping unit, hauled butane tank from compressor. Hauled separator to #1 well. Beasley loaded all of AAA fishing tools and hauled to Farmington. Started pumping unit, pumped up in

45 minutes - pumping 1" stream of water. Crew left at 5:30 PM. Rigged down rig and moved to 1st cattle guard by ranch house.

11-17-68 Checked pumping unit at 8 am - unit was down - had pumped 1" of water in pit (approx. 6 bbls.), started unit, balanced by removing part of weights, built fence around unit. Drove rig to Crest Spurlock #1.

CREST OIL CO. CREST-ARIZONA HELIUM #2 SANTA FE

SAMPLE DESCRIPTION

| <u>DEPTH</u> | <u>DRILLING TIME MIN.</u> | <u>DESCRIPTION</u> |
|--------------|-----------------------------------|---|
| 230-40 | | 70% wh to gry, fine ss with pebbles of qtz & chert; 30% grn, brn, ppl & red shale |
| 240-50 | | Same |
| 250-60 | | Same |
| 260-70 | | Same |
| 270-80 | | 50% ss as above; 50% shale as above |
| 280-330 | | Same description as above |
| 330-40 | 35 | 40% wh, fine, S&P, ss; 60% sh. as above |
| 340-50 | 28 | 20% ss as abv.; 80% sh as abv., pred. red-brn, |
| 350-60 | 37 | Same |
| 360-70 | 33 | 10% ss as abv; 90% sh as abv., Pred. brite red |
| 370-80 | 25 | Same |
| 380-90 | 20 | Same |
| 390-400 | 9 | Same |
| 400-10 | 8 | Same |
| 410-20 | 8 | Same |
| 420-30 | 7 | Same except shale is all red brn |
| 430-40 | 8 | Same |
| 440-50 | 9 | Same |
| 450-60 | 10 | 90% red-brn, med, shaly, hd, tite, S&P ss. 10% red-brn shale |
| 460-70 | 8 | 45% red-brn ss as abv.; 45% wh, med, S&P, hd, tite SS; 10% shale as above |
| 470-80 | 7 | 80% red-brn & wh SS; 10% wh to pnk ls; 10% sh |

| | | |
|---------|----|---|
| 480-90 | 7 | 70% ss as abv.; 30% red-brn shale |
| 490-500 | 37 | 10% ss as abv.; 90% sh as abv |
| 500-10 | 11 | Same |
| 510-20 | 14 | 10% wh, med, S&P, friable ss; 10% red " " " " ; 25% red-brn sh. |
| 520-30 | 12 | 60% wh to clr, med, w/rnded, friable, S&P ss; 15% brn-red, v/silty, fine ss 25% red-brn shale |
| 530-40 | 6 | 40% wh ss as above; 40% red ss as above; 20% red-brn shale |
| 540-50 | 7 | 60% wh, ss as above; 30% red ss as above; 10% sh as abv. |
| 550-60 | 6 | Same |
| 560-70 | 10 | Same |
| 570-80 | 13 | Same |
| 580-90 | 9 | 90% wh ss as above; 10% sh as abv |
| 590-600 | 56 | As above |
| 600-10 | 16 | Same |
| 610-20 | 6 | 10% ss as abv; 90% red-brn sticky shale |
| 620-30 | 7 | Same |
| 630-40 | 9 | Same |
| 640-50 | 10 | Same |
| 650-60 | 7 | Same |
| 660-70 | 7 | 90% gry, fine, hard, silty ss; 10% sh as abv. |
| 670-80 | 8 | Same |
| 680-90 | 9 | Same |
| 690-700 | 6 | 20% ss as abv; 80% sh as abv; |

| | | |
|---------|----|--|
| 700-10 | 9 | 100% red-brn shale |
| 710-20 | 8 | Same |
| 720-30 | 9 | Same |
| 730-40 | 28 | 5% wh, v/fne, silty ss; 95% wh, silty bentonitic shale |
| 740-50 | 10 | 10% wh ss as abv; 90% wh, gry, red shale |
| 750-60 | 12 | 90% wh, S&P, med, hard ss;; 10% red-brn sh |
| 760-70 | 10 | 60% ss as abv; 40% sh as abv. |
| 770-80 | 13 | 80 % ss as abv. becoming brown; 20% sh as abv |
| 780-90 | 8 | As above |
| 790-800 | 10 | 60% ss as abv; 40% red brn & ppl sh |
| 800-10 | 10 | 30% ss as abv; 70% sh; wh, red-brn & ppl. |
| 810-20 | 10 | Same |
| 820-30 | 11 | Same |
| 830-40 | 7 | 20% wh, fne, silty ss; 80% brn, red-brn & ppl. shale |
| 840-50 | 30 | 30% brn, v/fine ss; 30% wh, fne, silty ss; 40% red-brn & ppl shale |
| 850-60 | 9 | 80% sh to tan, grainy ls; 20% sh as abv. |
| 860-70 | 12 | 20% ls as abv; 80% wh, bentonitic, ppl and red-brn shale |
| 870-80 | 14 | 60% wh, fine, S&P ss; 40% gry-blu, wh shale. |
| 880-90 | 42 | 40% ss as abv; 60% sh as abv. |
| 890-900 | 45 | 10% ss as abv; 90% gry-blu, red-brn, ppl shale |
| 900-10 | 12 | Same |
| 910-20 | 13 | 50% gry, med, v/tite, S&P ss; 50% sh as abv. |

| | | |
|----------|--------|---|
| 920-30 | 13 | 100% gry & gry blu shale |
| 930-40 | 11 | 100% gry and brn shale |
| 940-50 | 12 | 100% gry, gry-blu, ppl shale |
| 950-60 | 8 | 100% brn, gry and ppl shale |
| 960-70 | 11 | 100% sh as above |
| 970-80 | 17 | 70% wh, S&P, crse, ang, ss; 30% ppl & brn sh |
| 980-90 | 20 | 20% ss as abv; 80% sh as abv. |
| 990-1000 | 10 | 20% wh, ang, crse, S&P ss; 10% wh to gry ls; 70% ppl & gry shale |
| 1000-10 | 12 | 10% ls as abv; 90% sh as abv. |
| 1010-20 | 10 | 30% wh, crse, ang, S&P ss; 70% sh as abv. |
| 1020-30 | 11 | 50% ss as abv; 50% sh as abv. |
| 1030-40 | 11 | 20% ss as abv; 80% sh as abv. |
| 1040-50 | 13 | Same |
| 1055 | 20 min | circul. sample as abv. |
| 1050-60 | 81 | 10% wh, S&P, med, friable ss; 90% gry, brn, & ppl shale |
| 1060-70 | 20 | Same |
| 1070-80 | 17 | Same |
| 1085-85 | 10 | As above with several chips Shinarump sand |

CORE NO. 1 1085 to 1102 RECOVERED 11 feet ; Apparently the sandstone stringers in the shale were washed out.

Complete core was red and gray banded soft to med hard shale with bands 1 to 6 inches thick

Coring time in minutes per foot;
 1085 to 1090; 7 - 11 - 15 - 7 - 7
 1090 to 1095; 9 - 10 - 11 - 12 - 13
 1095 to 1102; 13 - 13 - 12 - 15 - 12 - 9 - 13

| | | |
|-----------|----|---|
| 1102-10 | 14 | 10% sh, S&P, ss w/ abund free qtz. grains 90% gry, ppl, & brn shale |
| 1110-20 | 12 | Same |
| 1120-30 | 10 | 80% brn, vv/fne, silty ss; 20% brn, ppl, gry shale |
| 1130-40 | 10 | Same, becoming grey |
| 1140-50 | 6 | 50% gry, v/ fine ss; as abv with free qtz grns. 50% gry and brn shale |
| 1150-55 | 5 | 80% ss as abv; 20% gry and brn sh |
| 1155-60 | 7 | Same |
| 1160-65 | 7 | Same |
| 1165-80 | 8 | 90% ss as above; 10% sh as abv. |
| 1170-80 | 14 | Same |
| 1180-90 | 12 | Same |
| 1190-1200 | 10 | 60% ss as abv; w/ abund loose qtz grns. 40% gry, red and brn shale |
| 1200-10 | 15 | Same |
| 1210-20 | 15 | 20% brn, fne, silty ss; 20% brn, med, mic. ss; 60% red, brn, gry shale |
| 1220-30 | 24 | 30% brn, med, S&P, mic. ss; abund loose qts. 70% gry and brn shale |
| 1230-40 | 18 | 10% fne, gry ss; 90% gry shale |
| 1240-50 | 19 | 20% wh to gry, v/fne, silty ss; 80% gry, tan, and red shale |
| 1250-60 | 15 | 10% ss as abv; 90% sh as abv. |
| 1260-70 | 13 | 10% ss as abv; 90% gry, brn & ppl shale |
| 1270-80 | 11 | Same |
| 1280-90 | 9 | 10% wh to clr, med to coarse, v/friable, sl. dirty ss; 10% gry, brn & ppl shale; 80% loose qtz grns |

| | | |
|-------------------------------|----|---|
| 1290-1300 | 9 | Same description as above |
| 1300-10 | 16 | 10% ss as abv but clean; 10% loose qtz grns; 80% shale as abv |
| 1310-20 | 12 | Same |
| 1320-30 | 23 | 20% wh, crse, ang, v/poorly cem ss; with abund. loose qtz grns; 80% gry, red, brn, ppl sh |
| 1330-40 | 30 | Same |
| 1340-50 | 25 | 100% brn, red, ppl shale, with abund. loose qtz. |
| 1350-60 | 36 | Same |
| 1360-70 | 44 | Same |
| 1370-80 | 35 | 20% brn, v/fine, v/silty, calc. ss; 80% sh as abv. |
| 1380-90 | 40 | 10% brn ss as abv.; 90% sh as abv.; abund. free qtz grains |
| 1390-1400 | 40 | Same |
| 1400-05 | 23 | Same |
| 1405-10 | 21 | Same |
| 1410-15 | 26 | Same |
| 1415-20 | 20 | Tr. red ss as above; Tr. wh, v/fine ss 100% red, gry, grn, ppl & maroon shale |
| 1420-25 | 13 | 30% brn-buff, & wh fine, h& ss; 70% sh as abv |
| 1425-30 | 15 | Same with abund loose qtz grns. |
| 1430-35 | 14 | As above |
| 1435-40 | 12 | As above |
| 1440-45 | 15 | As above |
| 1445-50 | 27 | Tr. off-white, med, friable, porous, sub rnd to well rnded, Coconino ss; 20% brn & wh ss as abv; 80% shle as abv. |
| 1450 - 15 min circ. sample | | 20% Coconino ss as abv; 20% wh & brn as abv; 60% shale as abv. |

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test Well To Coconino
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location Center of SW/4 (1320' FSL and 1320' FWL)
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease SFP-9650, Santa Fe Pacific RR Company
 5. Field or Pool Name Undesignated

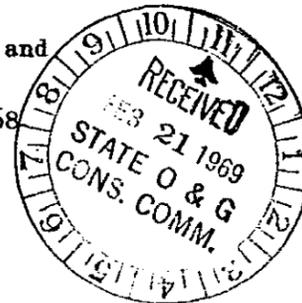
6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| NOTICE OF INTENTION TO: | | | SUBSEQUENT REPORT OF: | | | | |
|-------------------------|--------------------------|----------------------|--------------------------|-----------------------|--------------------------|------------------|-------------------------------------|
| TEST WATER SHUT-OFF | <input type="checkbox"/> | PULL OR ALTER CASING | <input type="checkbox"/> | WATER SHUT-OFF | <input type="checkbox"/> | MONTHLY PROGRESS | <input checked="" type="checkbox"/> |
| FRACTURE TREAT | <input type="checkbox"/> | DIRECTIONAL DRILL | <input type="checkbox"/> | FRACTURE TREATMENT | <input type="checkbox"/> | REPAIRING WELL | <input type="checkbox"/> |
| SHOOT OR ACIDIZE | <input type="checkbox"/> | PERFORATE CASING | <input type="checkbox"/> | SHOOTING OR ACIDIZING | <input type="checkbox"/> | ALTERING CASING | <input type="checkbox"/> |
| REPAIR WELL | <input type="checkbox"/> | CHANGE PLANS | <input type="checkbox"/> | (OTHER) | <input type="checkbox"/> | ABANDONMENT | <input type="checkbox"/> |
| (OTHER) | <input type="checkbox"/> | | | | | | |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

1. Pumping of above well as described in item 10. of Sundry Notices Report dated 11/29/68 has been discontinued.
2. No additional work, stimulation or completion attempt has been done.
3. In order that every chance be given this very expensive and time consuming and geologically frustrating hole, it is requested that the well be placed in Temporarily Abandoned Status until planned additional work in the area begins in the Spring, at which time the decision will be made for additional completion efforts, or to Plug and Abandon.
4. Geological Brochure of detailed drilling, testing, and completion attempts attached.
5. Electric Log and Core data previously filed, 12/5/68



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

Signed C. F. Swain Title Owner Date 2/18/69
C. F. Swain, d/b/a Crest Oil Company

Permit No. 472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

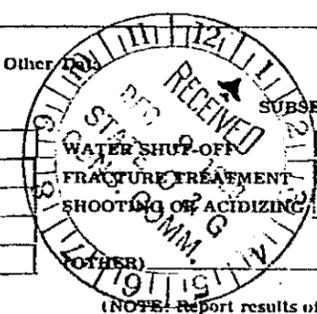
SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) Test well to Coconino
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location Center of SW/4 (1320' FSL and 1320' FWL)
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease Santa Fe SFP-9650

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other (See)

| | | | |
|--|---|--|--|
| NOTICE OF INTENTION TO: | | SUBSEQUENT REPORT OF: | |
| TEST WATER SHUT-OFF <input type="checkbox"/> | PULL OR ALTER CASING <input type="checkbox"/> | WATER SHUT-OFF <input type="checkbox"/> | MONTHLY PROGRESS <input checked="" type="checkbox"/> |
| FRACTURE TREAT <input type="checkbox"/> | DIRECTIONAL DRILL <input type="checkbox"/> | FRACTURE TREATMENT <input type="checkbox"/> | REPAIRING WELL <input type="checkbox"/> |
| SHOOT OR ACIDIZE <input type="checkbox"/> | PERFORATE CASING <input type="checkbox"/> | SHOOTING OR ACIDIZING <input type="checkbox"/> | ALTERING CASING <input type="checkbox"/> |
| REPAIR WELL <input type="checkbox"/> | CHANGE PLANS <input type="checkbox"/> | OTHER <input type="checkbox"/> | ABANDONMENT <input type="checkbox"/> |
| (OTHER) <input type="checkbox"/> | | | |



(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

1. 11/2/68, T. D. Driller 1445, T. D. Welx, 1439 (Es-Ind)
2. " , Ran 1440' of 9.5 lb J-55 4-1/2" casing with Halliburton cementing packer shoe. Halliburton cemented with 50 sacks.
3. Swab well from 11/5/68 through 11/7/68.....no show gas. (Coconino)
4. 11/9/68, filled hole (casing) with 1350' of heavily mud laden fluid and set "Go" cast iron packer bridge plug at 1350'.
5. Halliburton fracked with 18,420 gals of water and 16,000 lbs of sand through perforations (2 glass jets per ft) at 1290-1293; 1297-1301; 1305-1311. (11/9/68) Swabbed back with level of water down to 1000 ft and hung swab in casing. Pulled line off swab.
6. 11/10/68, started fishing for ~~XXXX~~ 4-1/2" swab.
7. Landed fish 11/13/68. Ran 2-3/8 tubing to bottom and circulated hole clean. ~~XX~~ Pulled tubing up to top of perforations and started swabbing
8. Continued swabbing until evening of 11/15/68. Fluid recovery down to about 2-3 gallons per run. No show of gas. Decided to pump well
9. 11/16/68, Moved pumping unit over hole, ran ~~xx~~ rods, and hooked up to pump. Well pumped up in approx 45 minutes, pumping 1" stream of water.
10. 11/17/68, pumping unit down. Had pumped approx 25 bbls. Started unit again and built fence around unit. Rigged Drake unit down and moved to Crest-Spurlock #1.

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

Signed C. F. Swain Title Owner Date 11/29/68
C. F. Swain, d/b/a Crest Oil Co

Permit No. 472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

WELL SITE CHECK

By Jed
Date 11-14-68

Contractor Drake

Person(s) Contacted _____

Spud date _____

Type Rig _____ Rotary Cable _____

Samples _____

Pipe _____

Water Zones _____

Lost Circ. Zones _____

Formation Tops _____

Cores, Logs, DST _____

Crews _____

Present Operations Swabbing
Shinarump perf 1291-1312

Drilling with Air Mud

Size Hole _____

Size Drill Pipe _____

Type Bit _____

No. Bit _____ Drilling Rate _____

Formation _____

Lithology _____

REMARKS, PHOTO, MAP

Well running 100' low
structurally to # 8-X well.



DRAKE RIG ON CREST

Have fractured Shinarump;
swabbed; Now prep to
put Shinarump on
pump to pump out
frack water.

19 WELL NAME Crest - Ariz Helium #2 Santa Fe

Permit No. 472
Confidential: Yes No

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) _____
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location 1320' FSL and 1320' FWL (center SW/4)
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease Santa Fe Pacific Railroad Co. (9650)

5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| NOTICE OF INTENTION TO: | | SUBSEQUENT REPORT OF: | | | | | |
|-------------------------|-------------------------------------|-----------------------|-------------------------------------|-----------------------|--------------------------|------------------|--------------------------|
| TEST WATER SHUT-OFF | <input type="checkbox"/> | PULL OR ALTER CASING | <input type="checkbox"/> | WATER SHUT-OFF | <input type="checkbox"/> | MONTHLY PROGRESS | <input type="checkbox"/> |
| FRACTURE TREAT | <input checked="" type="checkbox"/> | DIRECTIONAL DRILL | <input type="checkbox"/> | FRACTURE TREATMENT | <input type="checkbox"/> | REPAIRING WELL | <input type="checkbox"/> |
| SHOOT OR ACIDIZE | <input type="checkbox"/> | PERFORATE CASING | <input checked="" type="checkbox"/> | SHOOTING OR ACIDIZING | <input type="checkbox"/> | ALTERING CASING | <input type="checkbox"/> |
| REPAIR WELL | <input type="checkbox"/> | CHANGE PLANS | <input type="checkbox"/> | (OTHER) | <input type="checkbox"/> | ABANDONMENT | <input type="checkbox"/> |
| (OTHER) | <u>Plug Back</u> | | | (OTHER) | | | |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

Total Depth of Hole 1445'
 Top Coconino 1439
 4-1/2" Csg set @ 1435 (50Sacks)
 Est. top Cement 645'
 Top of Shinarump 1260'
 Base " " 1319'

As swab testing of Coconino recovered salt water and no gas it is proposed:

1. Fill hole with heavily mud laden fluid from T. D. (1445') up into pipe to 1350'.
2. Run packer type casing bridge plug on wire line and set at 1350'.
3. Perforate casing with 2 glass jet shots per foot:
 1312-1306
 1302-1298
 1294-1291
4. Fracture Shinarump sand.
5. Swab back frac fluid and test for gas flow.



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

Signed C. F. Swain Title Owner Date 11/9/68
C. F. Swain, d/b/a Crest Oil Company

Permit No. 472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

November 8, 1968
1:50 p.m.

Dr. C.F. Swain telephoned

Re: Crest-Ariz Helium #2 Santa Fe
C SW/4 25-20N-27E
Permit 472

Tops:
Shinarump 1260' - base 1319'
Coconino 1439'
T.D. 1445'

Casing set to 1435' (with cement up to 645')

Coconino sand is water-wet. However, not making water.
Wants to plug back as follows:

④
mud: from bottom to 1350'
packer plug in casing from 1350' to top of Shinarump (1260')

Then will perforate and test Shinarump.

Told him to go ahead and confirm above with sundry report.

mr

Notice discrepancy between above Coconino top of T.D as per those noted in file dated 11-4-68 which also are verbal reports. Sundry report should confirm correctness.

Crest #2

permit 472

10-31-68

Spud 10-25-68

Elev: 5805 GR

Core #1: 1085-1102

Rec 11' shale

(Tried to core)
SHINARUMP

Set 8⁵/₈ csg @ 34' w/ 10 5x

Drilling size 6¹/₈" hole.

Drilling @ 1415

11-4-68

Set 4¹/₂" J-55 csg. @ 143¹/₂ w/ 50 5x.

Top Coccolite @ 1445'

Driller's TD 1452¹/₂

Logged by WELLEX (RAN IE Log only) on 11-2-68

(SHINARUMP section reported to look favorable on log)

Present Operation: Waiting on cement.

SUNDRY NOTICES AND REPORTS ON WELLS

1. Name of Operator C. F. Swain, d/b/a/ Crest Oil Company
 2. OIL WELL GAS WELL OTHER (Specify) _____
 3. Well Name Crest Arizona Helium #2 Santa Fe
 Location 1320' FSL and 1320' FWL (C SW/4)
 Sec. 25 Twp. 20N Rge. 27E County Apache Arizona.
 4. Federal, State or Indian Lease Number, or lessor's name if fee lease Santa Fe (SFP-9650)
 5. Field or Pool Name Undesignated

6. Check Appropriate Box to Indicate Nature of Notice, Report, or Other Data

| | | | | | | | |
|-------------------------|--------------------------|----------------------|--------------------------|-----------------------|--------------------------|------------------|-------------------------------------|
| NOTICE OF INTENTION TO: | | | SUBSEQUENT REPORT OF: | | | | |
| TEST WATER SHUT-OFF | <input type="checkbox"/> | PULL OR ALTER CASING | <input type="checkbox"/> | WATER SHUT-OFF | <input type="checkbox"/> | MONTHLY PROGRESS | <input checked="" type="checkbox"/> |
| FRACTURE TREAT | <input type="checkbox"/> | DIRECTIONAL DRILL | <input type="checkbox"/> | FRACTURE TREATMENT | <input type="checkbox"/> | REPAIRING WELL | <input type="checkbox"/> |
| SHOOT OR ACIDIZE | <input type="checkbox"/> | PERFORATE CASING | <input type="checkbox"/> | SHOOTING OR ACIDIZING | <input type="checkbox"/> | ALTERING CASING | <input type="checkbox"/> |
| REPAIR WELL | <input type="checkbox"/> | CHANGE PLANS | <input type="checkbox"/> | (OTHER) | <input type="checkbox"/> | ABANDONMENT | <input type="checkbox"/> |
| (OTHER) | <input type="checkbox"/> | | | (OTHER) | <input type="checkbox"/> | | |

(NOTE: Report results of multiple completion on Well Completion or Recompletion Report and Log form.)

7. 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.)

1. Not yet started.
2. Anticipate moving and rigging up 10/25/68.



8. I hereby certify that the foregoing is true and correct. Crest Oil Company
 Signed C. F. Swain Title Owner Date 10/24/68

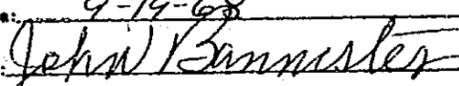
Permit No. 472

STATE OF ARIZONA
 OIL & GAS CONSERVATION COMMISSION
 Sundry Notices and Reports On Wells
 File Two Copies
 Form No. 25

APPLICATION FOR PERMIT TO DRILL OR RE-ENTER

APPLICATION TO DRILL

RE-ENTER OLD WELL

| NAME OF COMPANY OR OPERATOR Crest Oil Company | | |
|---|--|--|
| Address P. O. Box 57 Alton Illinois | | |
| Drilling Contractor Drake Well Service Company | | |
| Address Farmington, New Mexico | | |
| DESCRIPTION OF WELL AND LEASE | | |
| Federal, State or Indian Lease Number, or if fee lease, name of lessor Santa Fe #9650 | Well number 2 | Elevation (ground) 5805.0 |
| Nearest distance from proposed location to property or lease line: 1320 feet | Distance from proposed location to nearest drilling completed or applied—for well on the same lease: 1840 feet | |
| Number of acres in lease: 640 | Number of wells on lease, including this well, completed in or drilling to this reservoir: 3 | |
| If lease, purchased with one or more wells drilled, from whom purchased: Name _____ Address _____ | | |
| Well location (give footage from section lines) 1320 FSL - 1320 FWL | Section—township—range or block and survey Sec. 25-T20N-R27E | Dedication (Comply with Rule 105) SW/4 of Sec 25 |
| Field and reservoir (If wildcat, so state) Wildcat | County Apache | |
| Distance, in miles, and direction from nearest town or post office 7 miles East of Navajo | | |
| Proposed depth: 1500' | Rotary or cable tools rotary | Approx. date work will start 9-20-68 |
| Bond Status issued | Organization Report | Filing Fee of \$25.00 |
| Amount \$5,000 | On file <input checked="" type="checkbox"/> Or attached | Attached <input checked="" type="checkbox"/> |
| Remarks: See Case #33 for exception to Rule 105. | | |
| CERTIFICATE: I, the undersigned, under the penalty of perjury, state that I am the <u>sole owner</u> of the _____ (company), and that I am authorized by said company to make this report; and that this report was prepared under my supervision and direction and that the facts stated therein are true, correct and complete to the best of my knowledge. | | |
|  Signature | | |
| Date 9-19-68 | | |
| Permit Number: 472 | STATE OF ARIZONA OIL & GAS CONSERVATION COMMISSION Application to Drill or Re-enter File Two Copies | |
| Approval Date: 9-19-68 | | |
| Approved By:  | Form No. 3 | |
| Notice: Before sending in this form be sure that you have given all information requested. Much unnecessary correspondence will thus be avoided. | | |

API # 02-001-70024

(Complete Reverse Side)

1. Operator shall outline the dedicated acreage for both oil and gas wells on the plat.
2. A registered professional engineer or land surveyor registered in the State of Arizona or approved by the Commission shall show on the plat the location of the well and certify this information in the space provided.
3. All distances shown on the plat must be from the outer boundaries of the Section.
4. Is the Operator the only owner in the dedicated acreage outlined on the plat below? YES NO
5. If the answer to question four is "no," have the interests of all the owners been consolidated by communitization agreement or otherwise? YES NO If answer is "yes," Type of Consolidation _____
6. If the answer to question four is "no," list all the owners and their respective interests below:

| Owner | Land Description |
|-------|------------------|
| | |
| | |
| | |
| | |
| | |

CERTIFICATION

I hereby certify that the information above is true and complete to the best of my knowledge and belief.

[Signature]

Name _____

Position **sole owner**

Company **Crest Oil Company**

Date **9-19-68**

I hereby certify that the well location shown on the plat was plotted from field notes of actual surveys made by me or under my supervision, and that the same is true and correct to the best of my knowledge and belief.

Date Surveyed _____

Registered Professional Engineer and/or Land Surveyor _____

Certificate No. _____

PROPOSED CASING PROGRAM

| Size of Casing | Weight | Grade & Type | Top | Bottom | Cementing Depths | Sacks Cement |
|----------------|--------|---------------|-------|----------------------|------------------|--------------|
| 7" | 17# | New J-55 surf | 30' | circulate to surface | 10 | |
| 4 1/2" | 9.5 | N J-55 surf | 1390' | T.D. to 1000' | 50 | |

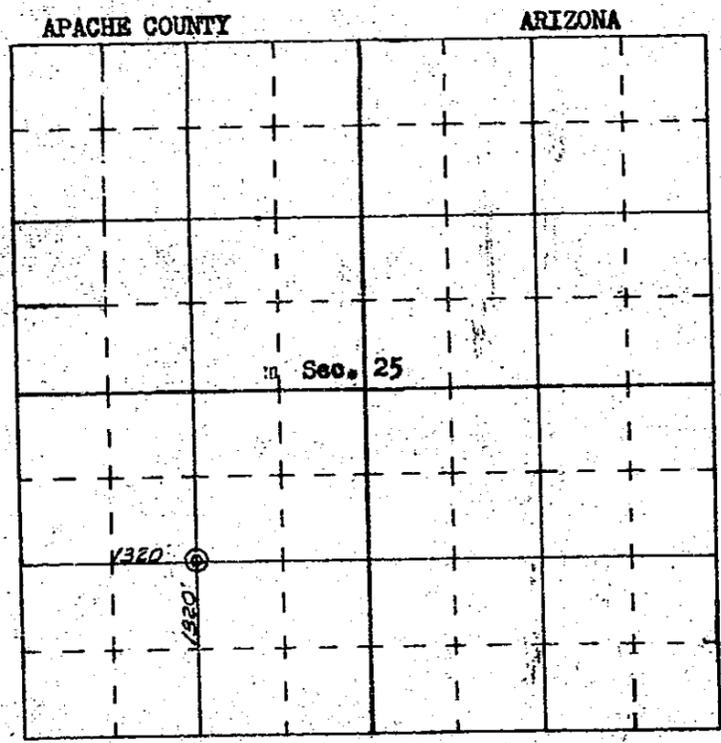
COMPANY CREST OIL COMPANY

LEASE CREST-ARIZONA HELIUM WELL NO. 2

SEC. 25 T. 20 NORTH R. 27 EAST, G.&S.R.M.

LOCATION 1320 feet from the South line and
1320 feet from the West line

ELEVATION 5805.0



SCALE—4 INCHES EQUALS 1 MILE

THIS IS TO CERTIFY THAT THE ABOVE PLAT WAS PREPARED FROM FIELD NOTE OF ACTUAL SURVEYS MADE BY ME UNDER MY SUPERVISION AND THAT THE SAME ARE TRUE AND CORRECT TO THE BEST OF MY KNOWLEDGE AND BELIEF.

SEAL: *James P. Lee*
Registered Land Surveyor.
JAMES P. LEESE
Ariz. Reg. No. 1849

SURVEYED 2 September, 1968



SAN JUAN ENGINEERING COMPANY, FARMINGTON, N. M.

472



PERMIT TO DRILL

This constitutes the permission and authority from the
OIL AND GAS CONSERVATION COMMISSION,
STATE OF ARIZONA,

To: CREST OIL COMPANY
(OPERATOR)

to drill a well to be known as

CREST-ARIZ HELIUM #2 SANTA FE
(WELL NAME)

located 1320' FSL and FWL (C SW/4)

Section 25 Township 20N Range 27E, Apache County, Arizona.

The SW/4 of said

Section, Township and Range is dedicated to this well.

Said well is to be drilled substantially as outlined in the attached Application and must be drilled in full compliance with all applicable laws, statutes, rules and regulations of the State of Arizona.

Issued this 19th day of September, 1968.

160-acre spacing
Case 33, Order 34

OIL AND GAS CONSERVATION COMMISSION

By John W. Lammeter
EXECUTIVE SECRETARY

PERMIT No 472

RECEIPT NO. 9555
API 02-001-20084

State of Arizona
Oil & Gas Conservation Commission
Permit to Drill

FORM NO. 27

SAMPLES REQUIRED



OFFICE OF
Oil and Gas Conservation Commission

STATE OF ARIZONA
4515 NORTH 7TH AVE.
PHOENIX, ARIZONA 85013
PHONE: (602) 271-5161

April 12, 1974

CERTIFIED MAIL

Mr. Henry Fullop
Eastern Petroleum Company
P. O. Box 291
Carmi, Illinois 62821

Re: Navajo Springs Area

Dear Mr. Fullop:

We have received Mr. Edward's letter dated March 12, 1974 together with Form 25, Sundry Notice and Reports, on 16 wells in the Navajo Springs area. We are aware that a number of your wells are in the Navajo Springs Coconino Unit. According to our records, several of the wells that are in the Unit have never produced except during testing and are being carried as shut-in helium wells. A number of wells outside the Unit have never produced, and your completion reports indicate the production on the potential test to be zero or TSM. Other wells have been taken off production for various reasons.

The possibility of some of these wells ever being produced commercially again appears negligible. As you know, Western Helium has not taken gas from your wells since December 31, 1973. This company is now in the process of dismantling and moving their plant out of the area. There is a possibility that Kerr-McGee might arrange to take gas from some of the wells in the Navajo Springs Unit as they are now doing from your Santa Fe No. 13 and Barfoot.

It is the opinion of this Commission that all non-commercial wells in the Navajo Springs area, whether in the Unit or not, should be permanently plugged and abandoned as quickly as possible. These wells would include, within the Navajo Springs Coconino Unit, the Crest Santa Fe No. 2, Santa Fe Nos. 31 and 32, and the Reese No. 2. No production has been reported from any of these wells. Also to be plugged should be your Ancon Santa Fe Nos. 21 and 21-1A, Connelly KM State No. 1, Merde No. 1 and all the non-producers that have been drilled within the past three years. Your Merde No. 2 must be plugged immediately. The hole in the casing at approximately 750' has never been repaired and the well is flowing water. Also your Dreck No. 1 has been reported plugged and abandoned, a copy of your plugging report is attached. It is possible that this well has been partially plugged, however there is definitely no plug in the top of the casing and fluid is several hundred feet from the surface. The dry hole marker was never installed. It is on

HW

Mr. Henry Fullop
April 12, 1974
Page 2

location but the casing had a bucket inverted over the open end. The hole you drilled on the original location for the Chambers No. 1 for a "water well" is open with wire line and other junk around the open hole. Mr. Tom Pelton, the owner or holder of the surface rights of the land on which the two Chamber holes are located has expressed the desire to assume responsibility of both the holes for water wells. Mr. Pelton's address is P. O. Box 7, Sanders, Arizona 86512, phone: (602) 688-2930. Our Form No. 24, when executed by Mr. Pelton, will satisfy our requirements. Also Wayne Wallace has some interest in some of the holes on his place for use as water wells.

Recently we found a well some 700' \pm in a northerly direction of the Merde No. 2, a copy of a photograph is attached. We have no records of a well being drilled at this location. Any information that you could give us on this well would be appreciated. It is being used as a water well.

Either Mr. Bannister or myself will be happy to discuss the above mentioned situation with you. However, we are determined to have the existing conditions in the area brought into complete compliance with the rules and regulations of the Oil and Gas Conservation Commission in the very near future.

We would appreciate your thoughts on the above.

Very truly yours,



W. E. Allen, Director
Enforcement Section

WEA/rlb

Encs.

cc John Fisher, Kerr-McGee, Oklahoma
Richard J. Gasdaska, Western Helium, Pennsylvania
C. F. Swain, Crest Oil, Illinois
Jess Edwards, Eastern, Illinois
U.S.F. &G., Indiana

KNOW ALL MEN BY THESE PRESENTS

BOND SERIAL NO. 94-174763

That we: C. F. SWAIN, DBA: CREST OIL COMPANY

of the County of: MADISON in the State of: ILLINOIS

as principal, and MARYLAND CASUALTY COMPANY

of BALTIMORE, MARYLAND

AUTHORIZED TO DO BUSINESS WITHIN the State of Arizona.

as surety, are held and firmly bound unto the Oil and Gas Conservation Commission, State of Arizona, in the penal sum as indicated, lawful money of the United States, for which payment, well and truly to be made, we bind ourselves, and each of us, and each of our heirs, executors, administrators or successors, and assigns jointly and severally, firmly by these presents.

The conditions of this obligation is that whereas the above bounden principal proposes to drill a well or wells for oil, gas, helium, other minerals, or for stratigraphic purposes in and upon the following described land situated within the State, to wit:

SOUTHWEST QUARTER OF SECTION 25, TOWNSHIP 20N, RANGE 27E, APACHE COUNTY
(May be used as blanket bond or for single well)

NOW, THEREFORE, if the above bounden principal shall comply with all of the provisions of the laws of this State and the rules, regulations and orders of the Oil and Gas Conservation Commission, especially with reference to the requirements of A.R.S. 27-516, providing for the proper drilling, casing and plugging of said well or wells, and filing with the Oil & Gas Conservation Commission all notices and records required by said Commission, in the event said well or wells do not produce oil or gas in commercial quantities, or cease to produce oil or gas in commercial quantities, then this obligation is void; otherwise, the same shall be and remain in full force and effect. Liability under this bond may not be terminated without written permission of this commission.

Penal sum of FIVE THOUSAND AND NO/100THS DOLLARS (\$5,000.00)

Witness our hands and seals, this 16TH day of SEPTEMBER, 1968

Principal

Witness our hands and seals, this 16TH day of SEPTEMBER, 1968

MARYLAND CASUALTY COMPANY

BY: Samuel E. E. Conklin
SAMUEL E. E. CONKLIN, ATTORNEY-IN-FACT

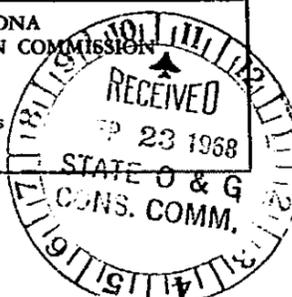
Surety, Resident Arizona Agent
(If issued in a state other than Arizona)

(If the principal is a corporation, the bond should be executed by its duly authorized officers, with the seal of the corporation affixed. When principal or surety executes this bond by agent, power of attorney or other evidence of authority must accompany the bond.)

Approved Date 9-19-68
STATE OF ARIZONA
OIL & GAS CONSERVATION COMMISSION
By: John Gannister

Permit No. 472

STATE OF ARIZONA
OIL & GAS CONSERVATION COMMISSION
Bond
File Two Copies
Form No. 2



CERTIFIED COPY

Know all Men by these Presents: That MARYLAND CASUALTY COMPANY, a corporation created by and existing under the laws of the State of Maryland, of Baltimore City, Maryland, in pursuance of the authority set forth in Section 12 of Article V of its By-laws, from which the following is a true extract, and which Section has not been amended nor rescinded:

"The President or any Vice-President may, by written instrument under the attested corporate seal, appoint attorneys-in-fact with authority to execute bonds, policies, recognizances, stipulations, undertakings, or other like instruments on behalf of the Corporation, and may authorize any officer or any such attorney-in-fact to affix the corporate seal thereto; and may with or without cause modify or revoke any such appointment or authority."

does hereby nominate, constitute and appoint W. J. BUFFINGTON and SAMUEL E. E. CONKLIN, each with full power to act alone,

of PHOENIX State of ARIZONA its Attorney s-in-Fact to make, execute, seal, and deliver on its behalf as Surety, and as its act and deed, any and all bonds, recognizances, stipulations, undertakings, and other like instruments.

Such bonds, recognizances, stipulations, undertakings, or other like instruments shall be binding upon said Company as fully and to all intents and purposes as if such instruments had been duly executed and acknowledged and delivered by the authorized officers of the Company when duly executed by either one of the aforesaid attorneys in fact.

This instrument supersedes power of attorney granted W. J. Buffington and E. J. McKenna dated October 14, 1964.

In Witness Whereof, MARYLAND CASUALTY COMPANY has caused these presents to be executed in its name and on its behalf and its Corporate Seal to be hereunto affixed and attested by its officers, thereunto duly authorized, this 13th day of January, 1966, at Baltimore City, Maryland.

ATTEST: (CORPORATE SEAL) MARYLAND CASUALTY COMPANY

(Signed) Rose E. Lutz Assistant Secretary. By (Signed) Albert H. Walker Vice-President

STATE OF MARYLAND }
BALTIMORE CITY } ss.

On this 13th day of January, A. D., 1966, before the subscriber, a Notary Public of the State of Maryland, in and for Baltimore City, duly commissioned and qualified, came Albert H. Walker Vice-President, and Rose E. Lutz Assistant Secretary, of MARYLAND CASUALTY COMPANY, to me personally known, and known to be the officers described in, and who executed the preceding instrument; and they each acknowledged the execution of the same; and, being by me duly sworn, they severally and each for himself deposed and said that they respectively hold the offices in said Corporation as indicated, that the Seal affixed to the preceding instrument is the Corporate Seal of said Corporation, and that the said Corporate Seal, and their signatures as such officers, were duly affixed and subscribed to the said instrument pursuant to all due corporate authorization.

IN WITNESS WHEREOF, I have hereunto set my hand and affixed my Official Seal, at Baltimore City, the day and year first above written.

(NOTARIAL SEAL) (Signed) Clagett R. Reimer Notary Public.

My commission expires July 1, 1967

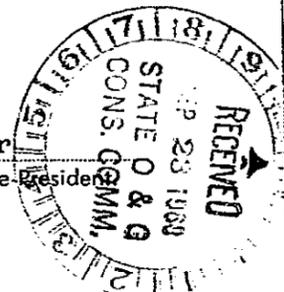
CERTIFICATE

I, an Assistant Secretary of the Maryland Casualty Company, do hereby certify that I have compared the aforesaid copy of the Power of Attorney with the original now on file among the records of the Home Office of the Company and in my custody, and that the same is a full, true and correct copy, and that the Power of Attorney has not been revoked, amended or abridged, and is now in full force and effect.

Given under my hand as Assistant Secretary, and the Seal of the Company, at Baltimore City, Md., this 16th day of SEPTEMBER, A. D., 1968

472

Clagett R. Reimer
Assistant Secretary.



X - Chicoma
X - Sanbert

November 25, 1969

Mr. Samuel Conklin
Maryland Casualty Company
100 West Clarendon
Phoenix, Arizona 85013

Re: Crest-Arizona Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Maryland Casualty Company
Bond No. 94-174783
\$5,000

Dear Mr. Conklin:

Records of this office indicate that on 11-25-69 Crest Oil Company fulfilled their obligations to the Commission of the State of Arizona as to the requirements pertaining to the well covered by the captioned bond. We authorize termination of this bond effective this date.

Yours truly,

John Bannister
Executive Secretary

jd

cc: Crest Oil Company, Dr. C. F. Swain

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

AREA CODE 618-462-5346

11/20/69

James A. Lambert, Adm Asst
Arizona Oil & Gas Conservation Commission
1624 West Adams Room 202
Phoenix, Arizona 85007

| | |
|---------------------------|----------------------------|
| Re: Crest #1 Spurlock | Crest-Ariz Hel #2 S. F. |
| T17N-R26E, G&SRM | T20N-R27E, G&SRM |
| Section 5: SW/4 NE/4 | Section 25: C SW/4 |
| Apache County Permit #442 | Apache County, Permit #472 |

Dear Mr. Lambert:

Please review our file on the above captioned wells beginning with my letter of September 24, 1969 and ending with your letter November 17, 1969.

I enclose herewith copies of the statements from Ted Spurlock, landowner for covering the pits and cleaning up the locations.

In addition I enclose copy of invoices from Mesa Field Service, Inc., Farmington, New Mexico showing that we were billed for 4-1/2 feet of 4-1/2" pipe and welded on lettering for the two wells.

Mr. J. D. Hooper, pumper for the Navajo Springs area hired by Arizona Helium Corporation, and I personally placed the dry hole markers on the wells after the holes were filled full of cement.

The name of the wells, their respective locations and permit numbers were welded lettering on the pipes, large and clear.

Will appreciate your prompt contact with Maryland Casualty Company giving permission for cancellation of the respective bonds.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company

CFS:fs



472

NOTE-O-GRAM

R. G. SPURLOCK & SONS

NAVAJO, ARIZONA • PHONE 688-2742

MESSAGE

REPLY

TO *East Oil Co.
% Doc Swain*

DATE

DATE *Sept 1, 1969*

Bill SW Cor - Sec. 25 East

*Cover pit and clean
up 5 hrs 17.50 per hr.*

*PAID
9/2/69
CHF No. 113
C/S*

87.00

*Pit not
filled
7-16-70
W.S.C.*

BY *R. G. Spurlock*

SIGNED

INSTRUCTIONS TO RECEIVER

KEEP YELLOW COPY. SEND WHITE AND PINK COPIES WITH CARBON INTACT.

WRITE REPLY. OFFER TO RECEIVE. KEEP PINK COPY, RETURN WHITE COPY TO SENDER.



472

Mesa Field Service, Inc.

238 PETROLEUM PLAZA BLDG. • PHONE: 325-5667
 FARMINGTON, NEW MEXICO 87401

TO Crest Oil Company
 P.O. Box 57
 Alton, Illinois 62002

DATE September 4, 1969

INVOICE NO. 9-3

E. P. NO.

WELL NO.

LEASE

| DATE | DESCRIPTION | AMOUNT |
|-----------|---|----------------|
| September | 9 foot pipe @ \$1.00 per foot | \$ 9.00 |
| | 3 hours welding @ \$9.00 per hour | 27.00 |
| | | <u>\$36.00</u> |
| | One dry hole marker made from 4-1/2" pipe, 4-1/2 feet long, with well name, location and permit number welded on for Crest Arizona Helium #2 Santa Fe.....\$18.00 | |
| | One dry hole marker made from 4-1/2" pipe, 4-1/2 feet long, with well name, location and permit number welded on for Crest-Spurlock #1.....\$18.00 | |

Handwritten: Paid No. 114
 9/11/69
 [Signature]



X-Chrome
X-Lambert
X-442

November 17, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442

Crest-Ariz #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Please advise us when we may expect to receive a statement pertaining to the captioned well sites as requested in our letter dated September 30.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jd
E

472

September 30, 1969

Dr. C. F. Swain
Crest Oil Company
P.O. Box 57
Alton, Illinois 62002

Re: Crest #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442

Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Please refer to Rules and Regulations, Rule 202.A.7, which directs the manner in which an abandoned well should be marked.

When we receive the statement from you that the well site has been cleared and each of the wells marked in the prescribed manner, we will be willing to notify Maryland Casualty Company that the wells covered by their bonds are complete and that we are willing to release the bonds on the captioned wells.

Yours truly,

James A. Lambert
Administrative Assistant

/vb

C.F. SWAIN

CREST
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

AREA CODE 618-462-5346

September 24, 1969



James A. Lambert, Administrative Assistant
Arizona Oil & Gas Conservation Commission
1624 West Adams Room 202
Phoenix, Arizona 85007

Re: Crest #1 Spurlock
Section 3: SW/4 NE/4
T17N, R26E, G & SRM
Apache County
Permit #442

Crest-Arizona Helium #2 Santa Fe
Section 25: C SW/4
T20N, R27E, G & SRM
Apache County
Permit #472

Dear Mr. Lambert:

Attached hereto please find Forms 10 and Forms 4 in duplicate on the Captioned wells.

Unless I hear from you to the contrary, I will assume that you will inform the Maryland Casualty Company that they may release the Bonds covering these wells.

Thank you for your patience in awaiting the receipt of the completed forms 10 and 4.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company

CFS:fs

X-Cheno
X-Lambert

September 17, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442 X

Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Thank you for the offer of extra copies of the Geologist's report describing the sample study on the samples from the Crest-Arizona Helium #2 Santa Fe. The copy we have is sufficient. Thank you for your efforts to try to find the lost samples.

We will expect to receive the completed forms 10 and forms 4 on the captioned wells pursuant to your letter dated September 13, 1969.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

AREA CODE 618-462-5346

September 13, 1969

James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Room 202
Phoenix, Arizona 85007

Dear Mr. Lambert:

Having been away from my office from August 18th until September 9th, I am still trying to catch up on correspondence, so please forgive my late replies to your letters of August 20th and 26th.

94 The samples we saved on the Crest-Ariz #2 Santa Fe and which were picked up by the Beasley Hot Shot Trucking Service from Farmington and which were supposed to have been delivered by them to the Four Corners Sample Cut, still cannot be found. Ed Clement our Geologist traced back on them again in person with both the Beasley firm and Four Corners. I then followed up with phone calls to both firms and neither can find them.

Since they appear to be hopelessly lost, can you accept the Geologist's detailed description as written up in his brochure? I assure you that said description is accurate and complete. In all my experience with Geologists, I can recall none more conscientious and careful with strip logs and sample study and description than Ed Clement. If additional copies would be helpful, I will be glad to make them up.

Sincerely yours,

C. F. Swain

C. F. Swain
Crest Oil Company

P. S. I will do my best to complete the Forms 10 and 4 on the two plugged wells in the next couple of days. (Your letter of August 26th) 442-472

I thank you for your assistance in the matter of the Aztec Well Service Company rig being held up at the Port of Entry. However the rig was called back to Farmington. Although delayed several days in waiting, I was able to obtain a rig already operating in the area, Standard Drilling Company, Ben Nelson of Sanders Arizona, owner.



September 10, 1969

Dr. C. F. Swain
Crest Oil Company
P.O. Box 57
Aiton, Illinois 62002

Re: Crest Oil #1 Spurlock
T17N, R28E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442

Crest-Ariz #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Our records indicate that on July 25, 1969 a plugging program was approved for each of the two wells. Please submit your Form 10 and your Form 4 pertinent to each of the two wells should the plugging procedure have been accomplished.

If there has been a delay in this matter, please advise us when you expect to accomplish the plugging of these two wells.

Yours truly,

James A. Lambert
Administrative Assistant

/vb

*J. (Lambert)
X Lambert*

August 26, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest Oil #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442 *X*

Crest-Ariz #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

A telephone call Friday indicated that an Aztec Oil Company rig was in route to the two captioned wells. We hope that we were of assistance in clearing their way on through. We remind you that we will expect the Form 10's and Form 4's pertinent to these two wells within the next several days.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

472

X-ch2ene
X-Lambert

August 20, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Enclosed are photocopies of letters you sent to me on March 22, 1969. Perhaps this will give you some clue and you may find a reply from Four Corners. I have talked to our Tucson curator checking out the possibility that the samples might have been delivered and mislabeled or some other clerical slip occurred. They feel that they have not received the samples on the captioned well from the Four Corners.

Please keep us informed as to the outcome of this matter.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf
Enc.

472

C.F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

AREA CODE 618-462-5346

August 14, 1969

James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Room 202
Phoenix, Arizona 85007

Dear Mr. Lambert:

Am making another effort to locate the missing samples on the Crest Arizona Helium #2 Santa Fe Well, but don't have much hope that they will be found since I am sure that Ed Clement did his best to find them the first time.

4 I enclose a copy of my letter to Ed asking him to check them out again, and I know if they can be found he will find them.

Sincerely yours,
C.F. Swain
C. F. Swain
Crest Oil Company

CFS:fs



472

(No Samples)

#553 Apache Doly #1 Santa Fe Crest SE NW
 #473 Crest #8 Santa Fe SE NW ok -
 #134 " " 8 Santa Fe SE NW ok -

#475 #5 SW/4
 #471 #1 SE SE ok

Crest #1 Sec 19 ok

#110 Crest #2 Sec 33 20827 None

#5 26 20827

Crest #3 3 19827 None
 No Samples

#5A 26 20827

#6 35 20827

#7 24 50827

#1 Spruce 3 17826

C. F. SWAIN

CREST
OIL COMPANY
P. O. BOX 57
ALTON HILL, MICHIGAN 48801

AREA CODE 616-462-5346

August 14, 1969

E. A. Clement, Geologist
906 North Watson
Farmington, New Mexico 87401

Dear Ed,

I have received another request from the Arizona Commission to try and locate and send them the samples from the Crest-Arizona Helium #2 Santa Fe well.

7
Could I impose on you to try to run this down for me again? I helped you put them in the burlap bag myself and I know that Beasley took them in just as he did the others. The only question is, where did he leave them???

Since on the previous occasion that you questioned Beasley and he said they delivered them to the Sample Cut, but the Sample Cut reported not being able to find them, I don't know much more that can be checked out.

But I would appreciate it if you would go over it with them again. They have to be somewhere, or else inadvertently thrown away.

The only additional thought I have, is: would it be possible that they were left with Dowell along with the core samples?

With best regards,

Sincerely yours,

C. F. Swain
Crest Oil Company

CFS:fs



X-CHRONO
X-Lambert

July 31, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest Oil #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442 +

Crest-Ariz #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

Recently we mailed you approved Application to Abandon and Plug forms on the captioned wells. Enclosed is our Form 10, Plugging Record, to be completed at the time of accomplishment of the plugging procedure. We enclose our Form 4, Well Completion. These forms are to be completed in duplicate and returned to this office. Please note that formations should be called on the reverse side of the Well Completion Report.

The reports made by your geologist, E. A. Clement, indicated he examined samples on the Crest-Arizona #2 Santa Fe. Our records do not indicate that we received any samples on that well. We enclose our circular letter pertaining to well samples for your information. Please advise us when you will comply with the well sample instruction letter.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf
Enc.

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

July 23, 1969

James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Room 202
Phoenix, Arizona 85007

RE: Crest Oil #1 Spurlock
SW/4 NE/4 Section 3
T17N-R26E Apache Co.
Permit #442

Crest-Arizona Helium #2 Santa Fe
C SW/4 Section 25
T20N-R27E Apache Co.
Permit #472

Dear Mr. Lambert:

4^u
Enclosed please find applications to plug and abandon the
above two captioned wells which are presently under temporary
abandonment status.

Sincerely yours,

C. F. Swain

C. F. Swain
Crest Oil Company

CFS:fs



X-CHRONO
X-LAMBERT

July 7, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest Oil #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442 X

Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

We have not received our Form 25 covering activities on the captioned wells for the month of June, 1969.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

472

X-Chrono
X-Lambert

June 16, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest Oil #1 Spurlock
T17N, R26E, G & SRM
Sec. 3: SW/4 NE/4
Apache County
Permit #442 X

Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472 /

Dear Dr. Swain:

This Commission approves continuance of temporary abandon status as of this date. This status will expire 9-20-69. During this interim submit a Form 25 on the last day of each month indicating this status. On 9-15-69 submit a Form 25 giving notice of your intentions concerning these wells subsequent to 9-20-69.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

Enc.

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

June 13, 1969



James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Rm 202
Phoenix, Arizona 85007

Crest Arizona #2 Santa Fe Crest-Spurlock #1
Sec 25-20N-27E Apache Co. Sec 3-17N-26E Apache Co.
Permit #472 Permit #442

42

Dear Mr. Lambert:

Enclosed herewith please find Sundry Notices Report on above captioned wells covering the month of May 1969.

With respect to Item 3 of each of the reports enclosed, I hereby request extension of temporarily abandoned status until September 20, 1969. My reasons for this request are as follows:

1. Decision has been made to plug and abandon Crest Arizona Helium #2 Santa Fe, but need more time to inform all parties, make proper application, and arrange necessary details.
2. It appears probable that Crest-Spurlock #1 will also be plugged and abandoned, but need more time to discuss with and inform all parties, make proper application, and arrange necessary details.
3. There are several matters of importance which will require more ^{time} to resolve with Arizona Helium Corporation; which matters I prefer to be resolved before proceeding further.
4. I prefer to be able to make the upcoming Field Trip in new Factory ordered vehicle on which delivery date is indefinite.
5. Requested extension would permit wife and I to be at home and be host to Brother and Mother for their recently planned vacation trip to Alton.

Sincerely yours,
C. F. Swain
C. F. Swain
Crest Oil Company

472

CFS:fs

C.F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

May 9, 1969

James A. Lambert Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Rm 202
Phoenix, Arizona 85007

| | |
|---------------------------|--------------------------|
| Crest Arizona #2 Santa Fe | Crest-Spurlock #1 |
| Sec 25-20N-27E Apache Co. | Sec 3-17N-26E Apache Co. |
| Permit #472 X | Permit #442 |

Dear Mr. Lambert:

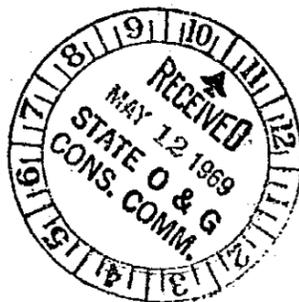
Enclosed herewith please find Sundry Notices Report on
above captioned wells covering month of April 1969.

Sincerely yours,



C. F. Swain
Crest Oil Company

CFS:fs



442

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

April 16, 1969

James A. Lambert, Adm Asst
Oil & Gas Conservation Commission
1624 W. Adams Rm 202
Phoenix, Arizona 85007

Re: Form #8, Sec 25-20N-27E, Apache Co., Ariz.

Dear Mr. Lambert:

In response to your letter written April 11, 1969,
I enclose herewith executed Form #8 in duplicate.

Returned for signature on 4/17/69

4

I have been informed via telephone conversation with Robert B. MacTough, Arizona Helium Corporation, that their new extraction plant at Navajo, Arizona was put on stream 1 A. M. Thursday 4/10/69. I am requesting confirmation and some of the details of operation by letter. (Copy of my letter requesting confirmation enclosed)

Sincerely yours,

C. F. Swain

C. F. Swain
Crest Oil Company

CFS:fs

enc. 2



472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

April 16, 1969

Arizona Helium Corporation
P. O. Box 14427
Phoenix, Arizona 85031

Attention: Robert B. MacTough

Dear Bob:

Although we discussed over the phone last Friday that the new plant at Navajo has been placed on stream, would you please write me a letter of confirmation for my files, and in order that I will have authority to notify others; answering the following questions:

44

1. Date and time on stream.
2. Initial volume of field gas being processed and stored.
3. Percentage of purity of Helium.
4. Names of wells turned into the line.
5. Are all wells individually metered?
6. Is the plant operating satisfactorily....what volumes are now being processed and stored.
7. Any additional pertinent data you may have and care to add.

Thank you very much.

Sincerely yours,

C. F. Swain

C. F. Swain
Crest Oil Company

cfs:fs



472

X-Chron
X-Lambert

April 17, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County
Permit #472

Dear Dr. Swain:

This Commission approves continuance of temporary abandon status as of this date. This status will expire 6-20-69. During this interim submit a Form #25 on the last day of each month indicating that status. On June 15, 1969, submit a Form #25 giving notice of your intentions concerning this well subsequent to 6-20-69.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

Enc.

472

X- Cleono
X- Lambert

April 11, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #1 Santa Fe Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM T20N, R27E, G & SRM
Sec. 25: SE/4 SE/4 Sec. 25: C SW/4
Apache County, Arizona Apache County, Arizona
Permit #471 X Permit #472

Crest-Ariz Helium #8X Santa Fe
T20N, R27E, G & SRM
Sec. 25: SE/4 NW/4
Apache County, Arizona
Permit #473 X

Dear Dr. Swain:

Enclosed is Form #8 in duplicate. Please complete and return to this office at once. We understand that the #1 and #8X Santa Fe Wells are to be produced. This Form will take care of the three captioned wells.

At such time as the Crest #1 Spurlock is produced we will require a Certificate of Compliance on that well.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf
Enc.

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

March 22, 1969

James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 West Adams Rm 202
Phoenix, Arizona 85007

Dear Mr. Lambert:

As per your suggestion in one of your letters dated March 17, 1969, I have written to the Four Corners Sample Cut Association, requesting information concerning when we can expect delivery of samples to the Arizona Bureau of Mines, and to please expedite same.

Sincerely,

C. F. Swain
C. F. Swain
Crest Oil Company

CFS:fs



472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

March 22, 1969

Four Corners Sample Cut Association
P. O. Box 899
Farmington, New Mexico 87401

Gentlemen:

Will you please advise me as to the status of the processing of the samples we sent you on the following wells:

Duplicate samples on →

Crest Arizona Helium #1 Santa Fe
Section 25-20-27 SE/4 SE/4
Apache Co., Arizona

No Samples →

Crest Arizona Helium #2 Santa Fe
Section 25-20-27 C SW/4
Apache Co., Arizona

*Mrs. Wilt, U of A
made thorough search
on 3/20/69 (gd)*

In order that records on these wells may be completed to the Oil and Gas Conservation Commission, I will appreciate any efforts you can extend to hasten the completion of the processing and shipping of the cuts on the above wells.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company

CFS:fs

Photo: James A. Lambert



472

March 17, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C 3W/4
Apache County, Arizona
Permit #472

Dear Dr. Swain:

send 3/31/69
A Form #25 will be due on the captioned well as of the last day of March. You should submit a Form 25 detailing your plans concerning this well on or before April 15, 1969. You know the temporary abandon status expires on 4-21-69.

Samples are due on this well also. I suggest that you contact the Four Corners Sample Cut Association and inquire about the samples pertaining to this well and the Crest Arizona Helium #1.

Yours truly,

James A. Lambert
Administrative Assistant

Jal:jf

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

March 13, 1969

James A. Lambert, Adm Asst
Oil and Gas Conservation Commission
1624 W. Adams Rm 202
Phoenix, Arizona 85007

Re: Crest-Ariz Helium #2 S. F. Permit #472

Dear Mr. Lambert:

In answer to your letter of March 11, 1969 requesting that I file a Form #25 on above captioned well as of the last day of February, I have done so and attach hereto. 7c

I assumed that the form filed 2/18/69, at which time I also filed Form #25 on Crest-Arizona Helium #1 S. F., #8-X S.F., and Crest-Spurlock #1 took care of obligations for February.

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442

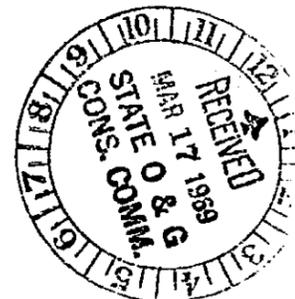
If additional reports are expected for February will you please so advise. Will Form #25 reports be expected on all of above wells on the last day of March? And each month thereafter?

442- TA 4/1/69
Sample i

Also Mr. Lambert, when you have the opportunity, please check your files concerning samples saved from the above wells. Crest saved samples from all, and sent them to the Four Corners Sample Cut Association in Farmington for processing and distribution. To this date, I have only received billing from them for samples I finally was able to locate and obtain from Steve Henderson on the Apache Drilling Company #1 Santa Fe. (this was a shinarump test and completion attempted, but plugged and abandoned September 1968 under permit 353). According to billing from Four Corners, they send cuts to the Arizona Bureau Of Mines, and to the Museum of Northern Arizona. Just wanted you to know that samples from all the wells were saved and taken to them for processing and delivery, as each well was drilled to total depth.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company



CFS:fs

472

Y-L 12000 Log
X - Lambert Log

March 11, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County, Arizona
Permit #472

Dear Dr. Swain:

This is to remind you that a Form #25 is to be submitted on the last day of each month detailing the status of the captioned well. If no action has been taken, so state. We will expect to receive a report dated the last of February at your earliest convenience.

Yours truly,

James A. Lambert
Administrative Assistant

jl

472

X-Lambert Log
X-Chrono Log

February 24, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25:25 C SW/4
Apache County, Arizona
Permit #472

Dear Dr. Swain:

This Commission approves temporary abandon status as of this date. This status will continue until 4-21-69. During this interim submit a form #25 on the last day of each month indicating that status. On April 15, 1969, submit a form #25 giving notice of your intentions concerning this well subsequent to 4-21-69.

We find the reports that you submitted complete. I hope your health has improved and that you have now fully recovered.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

Enc.

C. F. SWAIN

OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

February 18, 1969



James A. Lambert, Administrative Ass't.
Oil and Gas Conservation Commission
Phoenix, Arizona 85007

Re: Previous correspondence, monthly reports,
ending with your letter dated 2/6/69

Dear Mr. Lambert:

Attached hereto please find the following enclosures:

Permit #442, Crest Spurlock #1, 5-17-26, Apache County.

1. Sundry Notices Form 25 dated 2/18/69.
2. Report of Gas Analysis by Bureau Of Mines, Amarillo, Texas, sample from Supai formation. (See item 2 above report) Report of Analysis received 12/20/68.

Permit #471, Crest Arizona Helium #1 Santa Fe, 25-20-27, Apache Co.

1. Sundry Notices Form 25 dated 2/18/69.
2. Well Completion Report Form Number 4, dated 2/5/69.
3. Report of Gas Analysis by Bureau Of Mines, Amarillo, Texas, sample from Coconino formation. Date of Analysis, 12/20/68. (Date Report of Analysis received)
4. Geological brochure (copy), detailed report of drilling, testing, and completion work, including sample study.

Permit #472, Crest Arizona Helium #2 Santa Fe, 25-20-27 Apache Co.

1. Sundry Notices Form 25, dated 2/18/69.
2. Geological brochure (copy), detailed report of drilling, testing, and attempted completion work, including sample study.

Permit #473, Crest Arizona Helium #8-X Santa Fe, 25-20-27, Apache Co.

1. Sundry Notices Form 25 dated 2/18/69.
2. Well Completion Report Form No. 4, dated 2/5/69.
3. Report of Gas Analysis, sample from Coconino formation, received 12/20/68 from Bureau Of Mines, Amarillo, Texas.
4. Geological brochure (copy) detailed report of drilling, testing, and completion work, including sample study.

Will appreciate receipt of your acknowledgement of having received these reports and enclosures and your comments concerning same.

Sincerely yours,
C. F. Swain
C. F. Swain Crest Oil Company

CFS:fs

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TELEGRAM - NIGHT LETTER
ALTON, ILLINOIS
FEBRUARY 19, 1969

DEAR MR. LAMBERT - PLEASE REFER TO OUR CORRESPONDENCE ENDING
WITH YOUR LETTER DATED FEBRUARY 6 1969. REPORTS ON ALL WELL
INCLUDING VARIOUS ENCLOSURES SENT TO YOU AIRMAIL CERTIFIED THIS
PM. SINCERELY YOURS C F SWAIN

#442
471
472
473

February 6, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Permits #442
#471
#472
#473

Dear Dr. Swain:

The Commission has notified the Attorney General to suspend action in your case for another ten days.

We are sympathetic to your series of personal misfortunes that has occurred. However, note that we have asked your cooperation and failed to receive it in December prior to the series of misadventures and maladies that have beset you. Postponement of required reports only compounds the requirements and earns a negative opinion of service commissions that have been set up to help you and conserve resources of the people. Please bring your operations into conformance with the published regulations prior to February 20, 1969.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf

472

C. F. SWAIN

Crest
OIL COMPANY
P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

January 24, 1969

James A. Lambert
Administrative Assistant
Oil and Gas Conservation Commission
1624 W. Adams Room 202
Phoenix, Arizona 85007

Dear Mr. Lambert:

Wish to acknowledge your letters written 1/14/69 requesting reports due the commission on the Crest Arizona Helium #1, #2, and #8-X Santa Fe, and the Crest Spurlock #1.

I realize that these reports are due and will get to them soon as I possibly can. I assure you I am not just ignoring your reminders nor just being negligent.

No one can take care of these reports for me. Both Betty (wife and bookkeeper) and I have been really down with the Influenza since very shortly after we arrived back in Alton following our drilling program covering the Subject wells. First I had it and then she, with each of us staying home and taking care of the other. So from mid December until January 15th we were unable to work at the office at all.

Our backlog of work became tremendous as I am sure you can appreciate, particularly at this time of the year. So please bear with me a few more days and I assure you I will bring myself into compliance as soon as possible.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company



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OFFICE OF
Oil and Gas Conservation Commission
STATE OF ARIZONA

| | |
|---|---|
| INSTRUCTIONS TO DELIVERING EMPLOYEE | |
| <input type="checkbox"/> Deliver <i>ONLY</i> to addressee | <input type="checkbox"/> Show address where delivered |
| <i>(Additional charges required for these services)</i> | |

| | |
|---|--|
| RECEIPT | |
| Received the numbered article described on other side. | |
| SIGNATURE OR NAME OF ADDRESSEE (must always be filled in) | |
| <i>[Signature]</i> | |
| SIGNATURE OF ADDRESSEE'S AGENT, IF ANY | |
| DATE DELIVERED | SHOW WHERE DELIVERED (only if requested) |
| JAN 27 1969 | |

[Circular stamp: RECEIVED JAN 29 1969 STATE O & G CONS. COMM.]

4 and January 13
our letters of
According to
erals, Oil and
; Section 27-527;

Commission is subject to a civil penalty of not more than one thousand dollars for each violation and for each day the violation continues.

By copy of this letter, we notify the Attorney General, State of Arizona, that Dr. C. F. Swain, Crest Oil Company, P. O. Box 57, Alton, Illinois, is in violation of rules and regulations.

Please bring yourself into full compliance with these regulations on or before February 5, 1969.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf
cc: Attorney General, State of Arizona

(not sent)



OFFICE OF
Oil and Gas Conservation Commission
STATE OF ARIZONA
ROOM 202
1624 WEST ADAMS
Phoenix, Arizona 85007
PHONE: 271-5161

January 24, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Permits #442
#471
#472
#473

Dear Dr. Swain:

Please refer to our letters dated January 14 and January 13 pertaining to the captioned permits. Note our letters of December 9, 1968, and of December 23, 1968. According to the Arizona Revised Statutes; Title 27, Minerals, Oil and Gas; Article 1, Production and Conservation; Section 27-527; any person who violates any rule, regulation or order of the Commission is subject to a civil penalty of not more than one thousand dollars for each violation and for each day the violation continues.

By copy of this letter, we notify the Attorney General, State of Arizona, that Dr. C. F. Swain, Crest Oil Company, P. O. Box 57, Alton, Illinois, is in violation of rules and regulations.

Please bring yourself into full compliance with these regulations on or before February 5, 1969.

Yours truly,

James A. Lambert
Administrative Assistant

JAL:jf
cc: Attorney General, State of Arizona

(not sent)

January 16, 1969

Dr. C. F. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois 62002

Re: Crest-Ariz Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County, Arizona
Permit #472

Dear Dr. Swain:

In reference to the captioned well, this Commission requires that you submit a Form #25, Sundry Notices and Reports on Wells, covering all activities for the month of December. We also require a Form #25 covering activities from January 1 through January 15, 1969. Please furnish our Form #1, Well Completion Report, if such has been accomplished. This Form must be completed on both sides to be acceptable to this office.

Your letter dated December 5 is our last communication from you. Regulations of the Commission require regular reports on wells. Please bring yourself into compliance.

Yours truly,

James A. Lambert
Administrative Assistant

jf

472

C. F. SWAIN



CREST
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

12/5/68



John Bannister, Executive Secretary
Arizona Oil and Gas Conservation Commission
1624 West Adams Rm 202
Phoenix, Arizona 85007

Dear Mr. Bannister:

Enclosed please find Form 25 Sundry Notices and Reports on Wells on the Crest Arizona Helium #1 Santa Fe, #2 Santa Fe, #8-X Santa Fe, and also the Crest-Spurlock #1.

Please note that the #8-X was hooked up to the pipe line 10/29/68; #1 ready for pipe line (as soon as line is brought to well); #2 is on the pump in an effort to get out as much water as necessary to allow gas to come in; Crest-Spurlock requested additional time to see if gas will come to well bore, to help determine if additional work is warranted on lease block....also awaiting Bureau of Mines analysis of sample of gas from Supai which might also help above determination. (Hate to be hasty in condemning a large lease block on one Test Well, if any evidence exists at all to warrant additional work.)

I have spoken to Dick McDonald since I last talked to you and relayed your request that he inform you right away as to when the Navajo Springs connection was made to their pipe line.

Along with the Sundry Notices on each well, I am enclosing their respective electric logs, and copies of all test data as taken.

Due to lost circulation problems, it was not possible to Drill Stem Test or Core the #1 Santa Fe.

The same is true of the #2 Santa Fe as relates to the Coconino. As relates to the Shinarump, the well ran 100 feet lower than the #8-X and our Geologist Ed Clement had great difficulty in trying to decide just when to start coring. Finally in desperation, we went in with the core barrel, but recovered nothing but shale. When the true Shinarump sand started showing in the samples, it was too late. The shale corings we did not even send in for analysis as there was nothing to analyze.

Sincerely yours,

C. F. Swain
C. F. Swain
Crest Oil Company

472

December 9, 1968

Dr. C. N. Swain
Crest Oil Company
P. O. Box 57
Alton, Illinois

Re: Crest-Arizona Helium #1 Santa Fe
T20N, R27E, G & SRM
Sec. 25: SE/4 SE/4
Apache County, Arizona
Permit #471

Crest-Arizona Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: ~~SE/4~~ SW/4
Apache County, Arizona
Permit #472

Crest-Arizona Helium #8X Santa Fe
T20N, R27E, G & SRM
Sec. 25: SE/4 NW/4
Apache County, Arizona
Permit #473

Dear Dr. Swain:

This office still has not received the completed Form No. 25, Sundry Notices and Reports on Wells, for the Crest-Arizona Helium #1 and #8X wells bearing a November date. We enclosed forms in our November 20, 1968, letter for your use in reporting activities on the wells for the month of December. We would appreciate receiving all these forms as soon as possible.

We have brought this matter to your attention in correspondence dated 11-20-68 and 12-2-68. Please reply.

Yours truly,

James A. Lambert
Administrative Assistant

jf

472

November 20, 1968

Dr. C. F. Swain
Crest Oil Company
Navajo, Arizona 86509

Re: Crest-Arizona Helium #1 Santa Fe
T20N, R27E, G & SRM
Sec. 25: SE/4 SE/4
Apache county, Arizona
Permit #471

Crest-Arizona Helium #2 Santa Fe
T20N, R27E, G & SRM
Sec. 25: C SW/4
Apache County, Arizona
Permit #472

Crest-Arizona Helium #8X Santa Fe
T20N, R27E, G & SRM
Sec. 25: SE/4 NW/4
Apache County, Arizona
Permit #473

Dear Dr. Swain:

Please submit a completed form No. 25, Sundry Notices
And Reports On Wells, at once for the Crest-Arizona
Helium #1 and #8X wells. We received your Sundry Report
of 11-9-68 concerning the #2 well. Forms are also
enclosed for report of activities on the three captioned
wells due on or about the 5th of December.

Yours truly,

James A. Lambert
Administrative Assistant

jf
Enc.

472

C. F. SWAIN

POST
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

Navajo, Arizona

PHONE 462-5346

October 24, 1968

John Bannister, Exec Secy
Arizona O & G Conservation Comm
1624 W. Adams
Phoenix, Arizona 85007

Dear Mr. Bannister:

In answer to your letter of October 22nd, enclosed find reports as requested, and also report requested by Mr. Lambertin his letter dated 10/17/68.

I am sorry if we have not been reporting progress frequently enough and will do my best to complete forms as required when due.

My only excuse is that I arise at 5:30 and after breakfast with Ed and crew I go to the field and generally don't get back to trailer house until after dark. We are doing our best to get as much work done as possible before the weather turns bad, and also office facilities leave a lot to be desired.

Samples and logs are being furnished practically as soon as obtained, and we will forward copies of core and DST reports as soon as we get them.

Sincerely yours,



C. F. Swain
Crest Oil Company

P.S. Navajo Address is:
C. F. Swain
P. O. Box 4
Navajo, Arizona 86509

Phone is: 688-2914



472

October 22, 1968

Dr. C. F. Swain
Crest Oil Company
Navajo, Arizona 86509

Re: Crest-Arizona Helium #1 Santa Fe
Our Permit #471

Crest-Arizona Helium #2 Santa Fe
Our Permit #472

Crest-Arizona Helium #8X Santa Fe
Our Permit #473

Dear Dr. Swain:

I am enclosing some copies of our Sundry Notice Form #25. Will you please fill out one form for each of the captioned wells and return this immediately. We have no written reports from you on any of these wells although we do have Mr. Scurlock's reports. I would remind you that our rules and regulations call for an up to date report at least monthly on all drilling wells. As you know, these wells were permitted September 19, 1968, and a report should be submitted for each permit monthly as long as they are in the drilling status. In the case of the #8X Well, I believe, which has not been commenced, a report should be submitted to this effect. In the case of the other two wells a report should bring us to date from the date of spudding showing in detail what action has been taken. I will appreciate your cooperation.

I would like to take this opportunity to remind you that the permit date of each well is September 19 and should no work be commenced on a permit within 90 days after its date of issuance, then the permit will expire by law unless an extension is granted by this Commission. Consequently, should you find yourself in a position of not having work commenced on each of these wells by December 18, you should notify this office requesting an extension or the permit will expire by operation of law. If we may be of any help, please do not hesitate to ask.

Sincerely,

John Bannister
Executive Secretary
JB:jf
Enc.

472

C. F. SWAIN

Crest
OIL COMPANY

P. O. BOX 57
ALTON, ILLINOIS 62002

PHONE 462-5346

Field Office
C.F. Swain, Crest Oil Co.
Navajo, Ariz 86509

July 20, 1968

John Bannister, Exec Sec'y
Oil and Gas Conservation Commission
1624 W. Adams Room 202
Phoenix, Arizona 85007

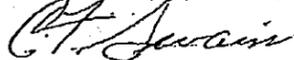
Dear Mr. Bannister:

Attached please find the Originals of three (3) single well bonds executed by me as Principal and Maryland Casualty Company as Surety covering the recently applied for Permits to drill in Section 25-20N-27E, Apache Co.

I have not yet had the chance to locate the other information from Mr. Henderson, but I understand he is in the Navajo area and will be here for several days.

Thank you very much for the time and assistance given to me by you and your staff, especially Mrs. Rushton. Please tell her that Navajo area is in full bloom and seems to have great possibilities for picnic lunches and the like.

Sincerely yours,



C. F. Swain
Crest Oil Company

CFS:fs

P.S. May I have copies of the bonds for my file?

