

Form 3160-5
 (June 1990)

UNITED STATES
 DEPARTMENT OF THE INTERIOR
 BUREAU OF LAND MANAGEMENT

Budget Bureau No. 1004-0135
 Expires: March 31, 1993

SUNDRY NOTICES AND REPORTS ON WELLS

Do not use this form for proposals to drill or to deepen or reentry to a different reservoir
 Use "APPLICATION FOR PERMIT--" for such proposals

5. Lease Designation and Serial No.
 NM-22642

6. If Indian, Allote or Tribe Name

7. If Unit or CA, Agreement Designation

8910180420

8. Well Name and No.

YOUNG DEEP UNIT # 29

9. API Well No.

30-025-31299

10. Field and Pool, or Exploratory Area
 YOUNG BONE SPRING, N.

11. County or Parish, State

LEA COUNTY, NM

SUBMIT IN TRIPLICATE

1. Type of Well

Oil Well Gas Well Other

2. Name of Operator

Harvey E. Yates Company

3. Address and Telephone No.

P.O. Box 1993, Roswell, NM 88202 1-505-623-6601

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

UNIT K, 2310' FSL & 1650' FWL
 SEC. 10, T-18S, R-32E

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

TYPE OF SUBMISSION

TYPE OF ACTION

Notice of Intent

Subsequent Report

Final Abandonment

Abandonment

Recompletion

Plugging Back

Casing Repair

Altering Casing

Other _____

Change in Plans

New Construction

Non-Routine Fracturing

Water Shut-Off

Conversion to Injection

Dispose Water

(Note: Report results of multiple completions on Well

Completion or Recompletion Report and Log Form.)

13. 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. FORMATION: BONE SPRING
2. BWPD: APPROX. 2
3. WTR ANALYSIS: SEE ATTACHED.
4. LEASE STORAGE: STOCK TANKS
5. WATER TRANSPORTED: BY TRUCK TO YOUNG DEEP UNIT PRESS. MAINT. SYSTEM (SEE BELOW) OR IN EMERGENCY TRUCKED TO DISPOSAL FACILITIES LISTED IN # 6
6. OPERATOR: TENNESSEE WATER DISPOSAL OR LOCO HILLS WATER DISPOSAL COMPANY
 TENNESSEE FEDERAL WELL # 1 SEC. 16, T-17S, R-30E
 UNIT I, SEC. 21, T-19S, R-31E EDDY COUNTY, NM
 EDDY COUNTY, NM

NOTE:
 YOUNG DEEP UNIT (PRESSURE MAINT.) 'STORAGE FACILITY LOCATED SOUTH OF YOUNG DEEP UNIT # 1 PAD, UT.
 D, SEC. 10, T-18S, R-32E.

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

Signed

RAY F. NOKES

Title

PROD. MGR./ ENG.

Date 9/27/94

(This space for Federal or State office use)

Approved by

Title

Date

Conditions of approval, if any:



P.O. BOX 2187
HOBBS, N.M. 88240

PHONE: (505) 393-7726

W A T E R A N A L Y S I S R E P O R T

| | |
|--------------------------------|-------------------------------------|
| Report for: Ray Nokes | Date sampled: 08/18/94 |
| cc: | Date reported: 08/26/94 |
| cc: | Lease or well # : Young Deep Unit29 |
| cc: | County: State: |
| Company: Heyco | Formation: |
| Address: | Depth: |
| Service Engineer: Mike Edwards | Submitted by: Mike Edwards |

| CHEMICAL COMPOSITION : | mg/L | meq/L |
|------------------------|--------|-------|
| Chloride (Cl) | 135000 | 3808 |
| Iron (Fe) (total) | 30.0 | |
| Total hardness | 37600 | |
| Calcium (Ca) | 12230 | 610 |
| Magnesium (Mg) | 1725 | 139 |
| Bicarbonates (HCO3) | 183 | 3 |
| Carbonates (CO3) | 0 | |
| Sulfates (SO4) | 1054 | 22 |
| Hydrogen sulfide (H2S) | 0 | |
| Carbon dioxide (CO2) | 702 | |
| Sodium (Na) | 70939 | 3084 |
| Total dissolved solids | 221133 | |
| Barium (Ba) | n/a | |
| Strontium (Sr) | n/a | |

Specific Gravity 1.157
Density (#/gal.) 9.642
pH 6.260
IONIC STRENGTH 4.22

Stiff-Davis (CaCO3) Stability Index :

SI = pH - pCa - pAlk - K

- SI @ 86 F = +0.73
- 104 F = +0.96
- 122 F = +1.22
- 140 F = +1.51
- 158 F = +1.83

This water is 8 mg/l (-0.53%) under ITS CALCULATED CaSO4 saturation value at 82 F.

SATURATION= 1503 mg/L PRESENT= 1495 mg/L

REPORTED BY JOY DUNCAN
LAB TECHNICIAN