

ref

22

GEOLOGICAL COMPLETION LETTER

GENERAL

DATE: 3/22/66

PROJ. NO. & AREA: NE (WRA) P-3-63, ACCIDENT Field, GARRETT County, MARYLAND

OPERATOR & FARM: TETCO #1 Charles Bowser - Reworked

LOCATION: 3900' W'ly SL & 3900' EL of C. Bowser Unit. Maryland grid coordinates:
N 662,455.91' & E 152,116.08'. Sc: 13,400' S of 39°40' latitude & 2350' W
79°17'30" longitude. Scale: 4050' NE of #1 Ella Collier Gas Well.

CONTRACTOR: Ray Brothers Drilling Co.

Re SPUD DATE: 11-24-63

DATE DRLG. COMP: 12-14-63

TOTAL DEPTH: 7808' Driller
7802' Logger

ELEVATIONS: 2676' KB
2659' Gr

<u>CASING:</u>	<u>SIZE</u>	<u>DEPTH</u>	<u>AMOUNT</u>
	13-3/8"	46'	Unknown
	9-5/8"	1360'	"
	7"	7510'	Cmt w/150 sx
	4-1/2" liner	7810-7407'	Cmt w/80 sx
	4-1/2"	surf-7419' *	Cmt 1st stage 130 sx, 2nd stage 280 sx 20% Diacel + 50 sx common.

** <u>SURVEYS:</u>	<u>TYPE</u>	<u>INTERVAL</u>	<u>COMPANY</u>
	Gamma Ray	7800-7000'	McCullough
	Temperature	7800-7400'	"

COMPLETION: Perforations: 7512-22, 7557-62 w/4 SPF (Huntersville Chert)
7667-92, 7692-7738, 7738-78 w/4 SPF (Oriskany Sandstone)

Final gauge: 1" plate, 196# tester pressure, 4581 MCFGPD - SITP 2500#
Absolute open flow not available.

ABANDONMENT Completion date: 12-14-63

GEOLOGICALSTRATIGRAPHY:

<u>MARKER</u>	<u>DEPTH</u>	<u>DATUM</u>	<u>SOURCE</u>
Benson Sandstone	3590'	- 914'	Gamma Ray (orig. Schl.)
Tully Limestone	6732'	-4056'	"
Onondaga Limestone	7483'	-4807'	Gamma Ray (orig. Bird.)
Huntersville Chert	7511'	-4835'	"
Needmore Shale	7610'	-4934'	"
Oriskany Sandstone	7664'	-4988'	"
Helderberg Limestone	7788'	-5112'	By samples
? 180' ⁺ Fault	3240'	- 564'	Gamma Ray (orig. Schl.)
60' ⁺ Fault	7136'	-4460'	"

* Measured depth during workover operation.

** ORIGINAL LOGS:

Gamma Ray - 0-7520' - Schlumberger
 Directional - 1400-7512' - "
 Temperature - 7300-7812' - Birdwell

PAY SECTIONS:

<u>OVERALL</u>	<u>N.E.P.</u>	<u>CHARACTER</u>
7511-7610' (Huntersville Chert)	N. A.	Fractures
7664-7788' (Oriskany Sandstone)	"	"

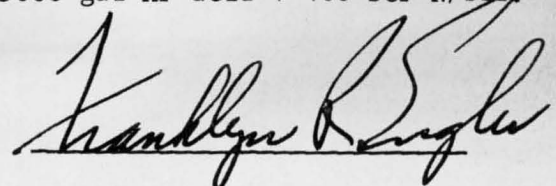
POSSIBLE PAYS: None

<u>OVERALL</u>	<u>N.E.P.</u>	<u>REMARKS</u>
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REMARKS:

	<u>Plate Size</u>	<u>Tester Pressure</u>	<u>Flow Rate</u>
Flow rate prior to workover	3/4"	311 PSIA	4019 MCFGD
Flow rate before acid treatment	1"	130 PSIA	2450 MCFGD
Flow rate after acid treatment	3/4"	335 PSIA	4272 MCFGD

Acid treated (OA) Pf 7512-7738' w/5000 gal gel X-100 + 5000 gal XF acid + 400 SCF N/ bbl
FB 3000#.



- cc: J. B. Williams
- W. H. Justice
- H. R. Moseley
- C. J. Maki
- M. J. Popovich

STATE OF MARYLAND
DEPARTMENT OF GEOLOGY, MINES AND WATER RESOURCES

The Johns Hopkins University
BALTIMORE 18, MARYLAND

WELL COMPLETION REPORT Charles Bowser Unit #1

This report must be submitted within 30 days after completion of the well

Elev. 2658.58 Gr.

WELL DESCRIPTION

WELL LOG		CASING AND SCREEN RECORD	
State the kind of formations penetrated, their depth, their thickness, and if water-bearing		State the kind and size of casing, liner, shoe, screen, and other accessories (if no casing used, give diameter of well)	
FEET	FEET	DIAM.	FEET
from.....to.....		(inches)	from.....to.....
STATUS OF WELL ON 11-22-63			
AT START OF REWORK			
7" 26# J-55 Csg.	0-7490		
4 1/2" 12160# Liner	7406-7812		
Liner Perf. 7522'-48'			
& 7562'-70'			
REWORK STARTED 11-22-63. COMPLETED 12-14-63: PBSD 7,816'			
7" csg. perf. 5,320', squeezed csg. w/141 sx. Portland Cement. Final Press. 3000 psi. Ran 239 jts. of 4 1/2" 13.50# N-80 csg. as follows and cemented same to surface using 380 sx. of 20% Diacel Cement & 132 sx. of Portland Cement.			
	Baker C. I. Guide Shoe	4 1/2"	7418-7418.5'
	Csg. N-80, 13.50#		
	8 Rd. LT & C	4 1/2"	0-7418'
	Baker Baffle @	4 1/2"	7390'
	Baker Float Collar @	4 1/2"	7388'
	Baker Stage Collar @	4 1/2"	6427'
	6-Baker Centralizers @	4 1/2"	7381'
			7328'
			7236'
			6459'
			6393'
			6302'
PERF: 7,512'-22', 7,557'-62', 7,667'-92', 7,692'-7,738' & 7,738'-78'			
(4 Glass Jets / Foot)			
ACIDIZED PERF: w/5000 gal. of Dowell gel X-100 & 5000 gal. of XF Acid each w/400 SCF/bbl. N₂.			
TESTED WELL AFTER ACID JOB:			
	FWHP	PLATE SIZE	2" TESTER
1.	220 Psia	1"	4,581
2.	345 Psia	3/4"	4,272
3.	650 Psia	1/2"	3,715
Open Flow Potential 5,000 MCF/D.			

Original Permit Number..... 22

Name of Owner
Texas Eastern Transmission Corporation.....

PUMPING TEST
Hours Pumped
Type of Pump Used.....
Pumping Rate
Gallons per Minute.....

WATER LEVEL
Distance from land surface to water:
Before Pumping.....Ft.
When Pumping.....Ft.

APPEARANCE OF WATER
Clear
Cloudy
Taste
Odor

Height of Casing Above Land Surface 1 1/2Ft.

PUMP INSTALLED
Type
Capacity
Gallons per Minute.....
Gallons per Hour.....
Pump Column Length.....Ft.

REMARKS
* Reworked Well.....
.....
.....
.....
.....
.....
Well Was Completed
Date ..December 14, 1963
Well Driller.....
.....
Signature

STATE OF MARYLAND
DEPARTMENT OF GEOLOGY, MINES AND WATER RESOURCES

The Johns Hopkins University
BALTIMORE 18, MARYLAND

WELL COMPLETION REPORT

Elevation 268 $\frac{1}{2}$ KB *This report must be submitted within 30 days after completion of the well*

Charles Bowser Unit No. 1 WELL DESCRIPTION

Permit Number..... 22

WELL LOG

State the kind of formations penetrated, their depth, their thickness, and if water-bearing

CASING AND SCREEN RECORD

State the kind and size of casing, liner, shoe, screen, and other accessories (if no casing used, give diameter of well)

Name of Owner
Wm. E. Snee & Orville Eberly

	FEET		DIAM. (inches)	FEET		PUMPING TEST
	from.....to.....			from.....to.....		
Clay	0	10				Hours Pumped
Sand	10	40				Type of Pump Used.....
Red Shale	40	106	13 3/8 OD Casing set @ 46'			Pumping Rate
Red Sand & Shale	106	498	& cemented to surface			Gallons per Minute.....
Sand	498	560				WATER LEVEL
Sandy Shale	560	775				Distance from land surface to water:
Sand	775	820	9 5/8 OD Casing set @ 1360'			Before Pumping..... Ft.
Sandy Shale	820	1355	cemented with 80 sacks pozmix			When Pumping..... Ft.
Sand	1355	1432				APPEARANCE OF WATER
Shale	1432	1645	7" OD 26 #J Casing set @ 7510			Clear
Sand	1645	1690	& cemented with 250 sacks			Cloudy
Sandy Shale	1690	1972	HES			Taste
Sand	1972	2047	2 3/8 OD EVE Tubing hung to			Odor
Sandy Shale	2047	3322	7787'			Height of Casing Above Land Surface
Conglomeritic Sand	3322	3383				PUMP INSTALLED
Shale	3383	3590	Rotary drilled with mud to			Type
Conglomeritic Sand	3590	3650	1360'			Capacity
Shale	3650	6620	Air drilled 1360 - 7520			Gallons per Minute.....
Calcareous Shale	6620	6723				Gallons per Hour.....
Lime (Tully)	6723	6740	Gas drilled 7520 - 7812			Pump Column Length..... Ft.
Shale	6740	7414				REMARKS
Lime	7414	7443	No water below 1360'			Completed Natural
Black Shale	7443	7483				
Lime	7483	7495	No gas in chert.			
Brown Break	7495	7498				
Lime - Onondaga	7498	7520	Gas in sand. 7665-7675 240M			
Chert - Huntersville	7520	7633	7765-7770 686M			
Shale	7633	7662				
Sand - Oriskany	7662	7790				
Lime - Helderberg	7790	7812 T.D.				
			Total			

Well Was Completed
Date **April 21, 1956**
Well Driller
Snee & Eberly
Robert C. Snee
Signature

State of Maryland
 DEPARTMENT OF GEOLOGY, MINES AND WATER RESOURCES
 The Johns Hopkins University
 Baltimore 18, Maryland

CHARLES BOWSER #1 WELL

APPLICATION FOR PERMIT TO DRILL OIL OR GAS WELL
 (Applications must be submitted in triplicate)

OWNER <u>William E. Snee & Orville Eberly</u>	LOCATION OF WELL
STREET or R.F.D. <u>208 Union Trust Bldg.,</u>	COUNTY <u>Garrett</u>
POST OFFICE <u>Uniontown</u>	NEAREST POST OFFICE <u>Accident, Maryland</u>
<u>Pennsylvania</u>	Distance from Post Office <u>5,600 ft.</u>
PERMIT TO DRILL WELL	Direction from Post Office <u>N 86° E</u>
NOT TO BE FILLED IN BY APPLICANT	APPROXIMATE DEPTH OF WELL (feet) <u>7,700</u>
PERMIT NO. <u>Twenty Two (22)</u>	METHOD OF DRILLING <u>Rotary</u>
The permit is herewith granted subject to the conditions stipulated.	DEEPEST GEOLOGIC FORMATION WELL WILL BE DRILLED <u>Helderberg</u>
<u>J. T. Arignault</u> Director	DISTANCE OF WELL LOCATION TO NEAREST BUILDING (feet) <u>1,150</u>
Date <u>March 2, 1956</u>	NUMBER OF SHIFTS PER DAY <u>3</u>
Special conditions that may apply:	LICENSED DRILLER IN CREW OF EACH SHIFT
	NAME ADDRESS
	<u>C. A. Bates</u>) <u>c/o Delta Drilling Co.,</u>
	<u>Donald Carmen</u>) <u>Oliver Building</u>
	<u>A. W. Stennett</u>) <u>Pittsburgh, Pa.</u>
	These names may be supplied later but before drilling begins

The names and post office addresses of the owners of the tracts of land included on the plat or map accompanying the application are to be given below.

See attached sheet

NOTE

A BOND FOR \$2,500 PAYABLE TO THE STATE OF MARYLAND MUST ACCOMPANY THE APPLICATION
 THIS APPLICATION FORM MUST BE FILLED OUT WITH TYPEWRITER OR IN BLOCK LETTERS