

FLUID SAMPLER DATA				Date 10-28-71		Ticket Number 455740	
Sampler Pressure _____ P.S.I.G. at Surface				Kind of Job STRADDLE		Halliburton District FARMINGTON	
Recovery: Cu. Ft. Gas _____				Tester MR. DAVIS		Witness MR. WILLIAMS	
cc. Oil _____				Drilling Contractor STEWART BROTHERS BC			
cc. Water _____				EQUIPMENT & HOLE DATA			
cc. Mud _____				Formation Tested Dakota			
Tot. Liquid cc. _____				Elevation _____ Ft.			
Gravity _____ ° API @ _____ °F.				Net Productive Interval 22' Ft.			
Gas/Oil Ratio _____ cu. ft./bbl.				All Depths Measured From Rotary Kelly Bushing			
RESISTIVITY _____ CHLORIDE CONTENT _____				Total Depth 2086' Ft.			
Recovery Water _____ @ _____ °F. _____ ppm				Main Hole/Casing Size 6 1/2"			
Recovery Mud _____ @ _____ °F. _____ ppm				Drill Collar Length _____ I.D. _____			
Recovery Mud Filtrate _____ @ _____ °F. _____ ppm				Drill Pipe Length 1919' I.D. 2.151"			
Mud Pit Sample _____ @ _____ °F. _____ ppm				Packer Depth(s) 1961' - 1966' - 1988' Ft.			
Mud Pit Sample Filtrate _____ @ _____ °F. _____ ppm				Depth Tester Valve 1924' Ft.			
Mud Weight 9.6 vis 50 cp							
Cushion		TYPE	AMOUNT	Depth Back Pres. Valve	Surface Choke 1/2"	Bottom Choke .75"	
Recovered	210	Feet of	Drilling mud	RECEIVED NOV 16 1971 OIL CONSERVATION COMM. SANTA FE			
Recovered	1490	Feet of	Fresh water				
Recovered		Feet of					
Recovered		Feet of					
Recovered		Feet of					
Remarks Tool opened for a 20 minute first flow with a godd blow. Closed tool for 20 minute first closed in pressure. Reopened tool for 20 minute second flow with a weak blow, died in 5 minutes. Closed tool for 20 minute second closed in pressure.							
TEMPERATURE		Gauge No. 283	Gauge No. 349	Gauge No. 2033	TIME		
		Depth: 1928 Ft.	Depth: 1984 Ft.	Depth: 2082 Ft.			
Est. °F.		12 Hour Clock	24 Hour Clock	24 Hour Clock	Tool A.M. 1630 P.M.		
		Blanked Off -	Blanked Off Yes	Blanked Off Yes	Tool A.M. 1750 P.M.		
Actual 85 °F.		Pressures		Pressures		Tool A.M. 1750 P.M.	
		Field	Office	Field	Office	Field	Office
Initial Hydrostatic		860	860	922	857	-	908
First Period	Flow Initial	40	44	40	48		
	Flow Final	730	757	-	UTR	hydrostatic	
	Closed in	769	778	-	UTR	release: 835	
Second Period	Flow Initial	769	772	-	UTR		
	Flow Final	769	779	-	UTR		
	Closed in	782	781	-	UTR		
Third Period	Flow Initial						
	Flow Final						
	Closed in						
Final Hydrostatic		860	836	922	835	-	908
UTR - UNABLE TO READ							

Legal Location Sec. - Twp. - Rng. 5 - 16N - 6W

Field Area WILDCAT

County MCKINLEY

State NEW MEXICO

Lease Name FERNANDEZ

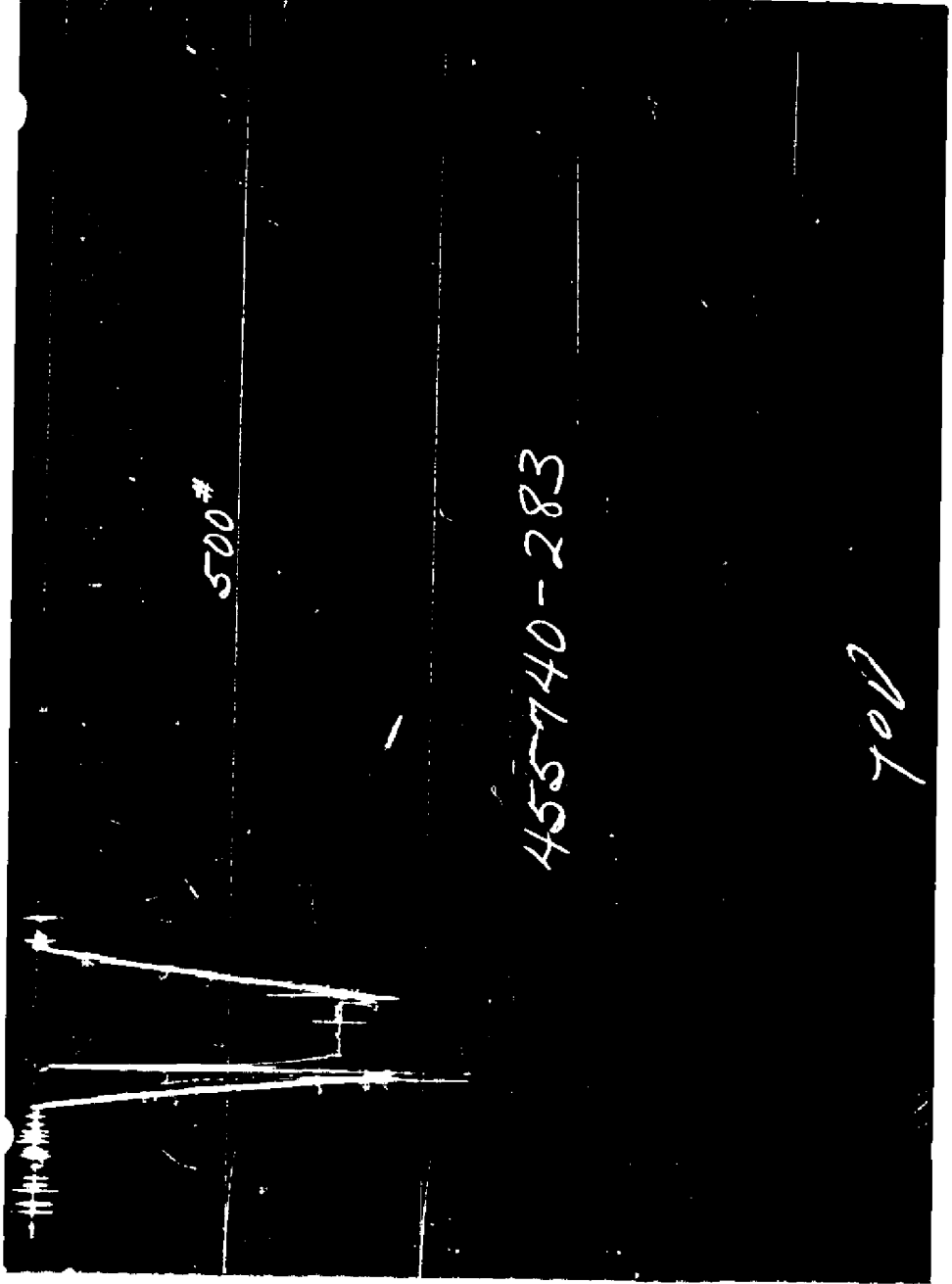
Well No. 2

Test No. 1

Tested Interval 1966' - 1988'

Lease Owner/Company Name SHAR ALAN OIL COMPANY

	O. D.	I. D.	LENGTH	DEPTH
Reversing Sub				
Water Cushion Valve				
Drill Pipe	2 7/8"	2.151"	1919'	
Drill Collars				
Handling Sub & Choke Assembly	3.8"	.87"	5'	
Dual CIP Valve				
Dual CIP Sampler	3.9"	.62"	5'	1924'
Hydro-Spring Tester				
Multiple CIP Sampler				
Extension Joint				
AP Running Case	3.75"	2.3"	4'	1928'
Hydraulic Jar				
VR Safety Joint	3.8"	.75"	2'	
Pressure Equalizing Crossover				
Packer Assembly	5 1/4"	.50"	5'	1961'
Distributor				
Packer Assembly	5 1/4"	.50"	5'	1966'
Flush Joint Anchor				
Pressure Equalizing Tube				
Blanked-Off B.T. Running Case	3.75"	2.3"		1984'
Drill Collars				
Anchor Pipe Safety Joint		.75"	2'	
Packer Assembly	5 1/4"	.50"	5'	1988'
Packer Assembly				
Anchor Pipe Safety Joint				
Side Wall Anchor				
Drill Collars	4"	2.15"	8'	
Flush Joint Anchor			11'	
Blanked-Off B.T. Running Case	3.75"	2.3"	4'	2082'



NOMENCLATURE

b	=	Approximate Radius of Investigation	Feet
b_1	=	Approximate Radius of Investigation (Net Pay Zone h_1)	Feet
$D.R.$	=	Damage Ratio	
El	=	Elevation	Feet
GD	=	B.T. Gauge Depth (From Surface Reference)	Feet
h	=	Interval Tested	Feet
h_1	=	Net Pay Thickness	Feet
K	=	Permeability	md
K_1	=	Permeability (From Net Pay Zone h_1)	md
m	=	Slope Extrapolated Pressure Plot (Psi ² /cycle Gas)	psi/cycle
OF_1	=	Maximum Indicated Flow Rate	MCF/D
OF_2	=	Minimum Indicated Flow Rate	MCF/D
OF_3	=	Theoretical Open Flow Potential with/Damage Removed Max.	MCF/D
OF_4	=	Theoretical Open Flow Potential with/Damage Removed Min.	MCF/D
P_s	=	Extrapolated Static Pressure	Psig.
P_f	=	Final Flow Pressure	Psig.
P_{or}	=	Potentiometric Surface (Fresh Water *)	Feet
Q	=	Average Adjusted Production Rate During Test	bbls/day
Q_1	=	Theoretical Production w/Damage Removed	bbls/day
Q_g	=	Measured Gas Production Rate	MCF/D
R	=	Corrected Recovery	bbls
r_w	=	Radius of Well Bore	Feet
t	=	Flow Time	Minutes
t_o	=	Total Flow Time	Minutes
T	=	Temperature Rankine	°R
Z	=	Compressibility Factor	
μ	=	Viscosity Gas or Liquid	CP
Log	=	Common Log	

* Potentiometric Surface Reference to Rotary Table When Elevation Not Given, Fresh Water Corrected to 100 °F.