

#5R/30-045-21477

#439/30-045-27147 SS-2

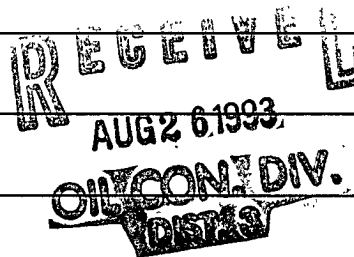
DATA SHEET FOR DEEP GROUND BED CATHODIC PROTECTION WELLS

NORTHWESTERN NEW MEXICO

(Submit 3 Copies to OCD Aztec Office)

Operator: BLACKWOOD & NICHOLS CO. Location: Unit M, Sec. 13, Twp 30N, Rng 8W.Name of Well/Wells or Pipeline Served NEBU 439, 5RElevation 6100' Completion Date 7-20-93 Total Depth 405' Land Type* F, Lease No. SF-079511Casing, Sizes, Types & Depths 8-5/8" SCH 40 P.V.C. - 100' , 7 7/8" OPEN HOLEIf Casing is cemented, show amounts & types used 20 sks Portland Zia I-IIIf Cement or Bentonite Plugs have been placed, show depths & amounts used N/A

Depths & thickness of water zones with description of water when possible:

Fresh, Clear, Salty, Sulphur, Etc. Muddy water, water zone 270', Damp @ 150'Depths gas encountered: N/AType & amount of coke breeze used: 50 sx LorescoDepths anodes placed: 130' - 395'Depths vent pipes placed: 405' to 4' above ground levelVent pipe perforations: 105' - 305'Remarks: Groundbed is 634' 514° East of NEBU 439.

If any of the above data is unavailable, please indicate so. Copies of all logs, including Drillers Log, Water Analyses & Well Bore Schematics should be submitted when available. Unplugged abandoned wells are to be included.

*Land Type may be shown: F-Federal; I-Indian; S-State; P-Fee.

If Federal or Indian, add Lease Number.

Signed by: James K. AllenTitle: Operations EngineerDate: 8/1/93



1115 Farmington Avenue - Farmington , NM 87401
(505) 325-1085

Lab Sample No.: W93-235

Standard A.P.I. Water Analysis Report

Collected By: J. Evans

Company: Blackwood and Nichols Co.

Collection Date: 20-Jul-93

Well Name: NEBU #439 and #5R

Collection Time: 10:30 AM

Formation: Surface water from groundbed

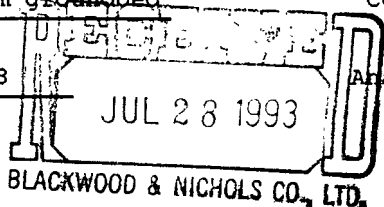
County: San Juan State: NM

Location: (M) Sec.13-T30-R08

Analyst: K. Lambdin

Remarks: Wellbore SS #2.

Analysis Date: 7/25/93



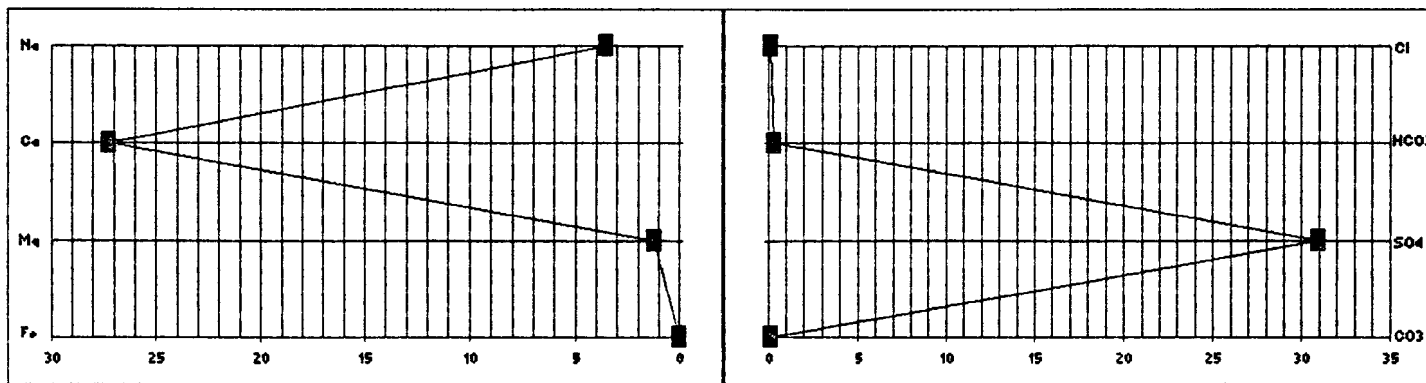
PARAMETER	as ION	Comment	PARAMETER	as ION	Comment
Sodium , Na	81	mg/l	Chloride , Cl	6	mg/l
Potassium, K	12	mg/l	Sulfate, SO ₄	1487	mg/l
Calcium , Ca	546	mg/l	Hydroxide, OH	0	mg/l
Magnesium , Mg	15	mg/l	Carbonate, CO ₃	5	mg/l
Iron, Fe (Total)	0.0	mg/l NR	Bicarbonate, HCO ₃	20	mg/l
Hydrogen Sulfide	0	mg/l NR	Resistivity	3.922	ohm-m
pH	8.38	Units	(@25 Degrees C)		
TDS	1,702	mg/l	Conductivity	2,550	uS
			Specific Gravity	1.000	Units
			(@ 60 Degrees F)		

Remarks: Only a small amount of water was obtained from the gray clay in sample.
Not enough sample to run H₂S.

NR = Test Not Run

Anion/Cation: 97.8%

Stiff Diagram



BLACKWOOD & NICHOLS CATHODIC GROUND BED DRILLERS REPORT

CP# SP 2 WELL# WEB # 43945B

S 13 T 304 R 26

[illegible]

DRILLER James M. Murtland

INSPECTOR Joe M. Atchak

BLACKWOOD & NICHOLS CATHODIC GROUND BED DRILLERS REPORT

P# 55#2 WELL# NEBU #439 + #5R

S 13 T 30 R 08

[illegible]

THRILLER

INSPECTOR