

H-22-19-3

Oil / Gas / Mining

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December 24, 1970

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Mr. A. L. Porter, Secretary-Director
New Mexico Oil Conservation Commission
P. O. Box 2088
Santa Fe, New Mexico 87501

*Approval
Recommended
1-27-71-Ed*
*Approval or objection
requested JK*

Re: Application for Salt Water
Disposal - No. 5 Media well
Sandoval County, New Mexico

Dear Mr. Porter:

Don C. Wiley and Fluid Power Pump Company, operator of the Media field located in Township 19 North, Range 3 West, N.M.P.M., Sandoval County, New Mexico, desire to convert their No. 5 Federal Media well to a salt water disposal well.

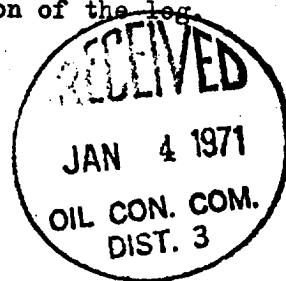
In accordance with the Oil Conservation Commission's Rule No. 701 we are attaching the necessary information for administrative approval of conversion of the Federal Media No. 5 well to a salt water disposal well. The information attached has been prepared according to Rule 701 and the completed Form C-108 shows the location of the No. 5 well in Section 22 of Township 19 North, Range 3 West.

As required by Rule No. 701, a map is attached showing the location of the present producing wells in the Media Entrada field in Sections 14 and 15 of Township 19 North, Range 3 West. These wells are the Jurassic Entrada Nos. 1, 2, and 4 Federal Media wells. As shown on the map, a water pit is located between the Nos. 1 and 2 wells. It is our plan to construct a line from this water pit to the No. 5 well.

The attached map also shows the present ownership of the oil and gas leases within two miles of the No. 5 well. The majority of this acreage is held by Don C. Wiley and Fluid Power Pump Company, and there are no other operators active within the area. Mr. Andres Maestas of 2007 Las Luceros Road N.W., Albuquerque, New Mexico, is the surface lessee of the acreage upon which the No. 5 well is located, and he has been furnished with a copy of Application Form No. C-108 by certified mail today.

Also enclosed are two water analyses, Laboratory No. 189, Samples 1 and 2, as prepared by the United States Department of Agriculture at New Mexico State University. These analyses show a dissolved total solid content of 16,692 parts per million.

I am enclosing the induction electric log of the No. 5 well upon which formation tops have been drafted on the large scale portion of the log.



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A perforating depth control log is also enclosed showing the diagrammatic sketch required for the approval of the salt water disposal well. As shown on the log, the top of the Gallup sand is at 2782' and the bottom of the Gallup sand is at 3380'. Perforated intervals are designated on the diagram.


Originally, the No. 5 well was drilled to the Entrada sandstone where it was found to be non-productive at a total depth of 5350'. The well was plugged back with approval of the U. S. Geological Survey by setting a 70 sack cement plug from 5350' up to 5150' covering the Entrada sand and a 105 sack cement plug from 4438' up to 4132' covering the Dakota sand. The operator then ran 4½" 9.5# casing in the No. 5 well from the surface down to 3453'. The 4½" casing was cemented with a total of 322 sacks of cement which, as shown on the diagrammatic survey, covered an interval from 3453' up to 953'. The well was then fractured in the Gallup formation, making use of 225,000# of sand and 213,400 gallons of water. The well did not respond to fracture treatment and has been in a temporarily abandoned status since.

At present, Don C. Wiley and Fluid Power Pump Company are on limited production capacity from the Federal Media Nos. 1, 2, and 4 Entrada wells due to our inability to dispose of the produced water.

We would appreciate your consideration of our application to make use of the No. 5 well as a water disposal well. It is our desire to use this well as a salt water disposal well because of the fact that it has been broken down over a large interval by the fracture treatment and the injection of water into this formation would not contaminate any known formation water. (The Gallup sandstone in this area is not known to contain water.) Also, the Mancos shale as shown on the induction electric log forms a good thick seal both above and below the Gallup sandstones, which would protect other porous formations from contamination in the salt water disposal well. The excellent cement job in this well should doubly insure that no water escapes to other formations.

If you find that additional information is needed in connection with this application, I will be glad to come to Santa Fe and bring any additional information that you may need to review this application.

Sincerely,



VAL R. REESE

Consulting Geologist for Don C.
Wiley and Fluid Power Pump Company

VRR:mb

CC: Mr. J. W. Cooper
Mr. John Ramming