

# **UNDERGROUND INJECTION CONTROL PROGRAM**

## **PUBLIC NOTICE AND OPPORTUNITY TO COMMENT**

Shell Frontier Oil & Gas Inc.  
3737 Bellaire Blvd  
Houston, TX 77025

### **PURPOSE OF PUBLIC NOTICE**

The purpose of this notice is to solicit public comment on a proposal by the Region 8 Ground Water Program office of the U.S. Environmental Protection Agency (EPA) to issue an Underground Injection Control (UIC) Permit and authorize the underground injection of fluid via Class III Solution Mining Well in Rio Blanco County, CO:

Permit No. CO32210-00000  
Shell Frontier Oil & Gas Inc  
Township 2S, Range 98W, Section 4  
Rio Blanco County, CO

### **BACKGROUND**

Shell Frontier Oil & Gas Inc. (Shell) has submitted an application for a Class III Solution Mining area permit to mine the Saline Zone in the Parachute Creek Member of the Green River Formation to initially include one injection well in their East Research, Development, and Demonstration (RD&D) Project Site. Shell has received a 149 acre RD&D lease from the Bureau of Land and Management (BLM) to demonstrate technologies capable of developing oil shale resources. They also hold a Nahcolite Preference Right Sodium lease to commercially mine nahcolite.

There are two distinct phases in this project proposal. The first phase requires a Class III injection well, to deliver hot water into the targeted zone to leach the nahcolite for recovery at the surface. The nahcolite that will be recovered at the surface is expected to be a relatively small quantity that will be stored at the surface and appropriately disposed of, offsite. Once the formation has been leached, the zone will have increased permeability and the oil shale more readily exposed. In the second phase, the formation will be heated to convert the kerogen (hydrocarbon in oil shale) to gases and liquids and collected at the surface. The injection activity occurs only during the first phase where fluids are injected to recover nahcolite solution and is expected to take six (6) months to one (1) year. During the second phase, there will be no injection activity. The Class III permit is effective for the life of project until the well is converted to a monitoring well or is plugged and abandoned.

A Draft Permit has been prepared in accordance with provisions of the Safe Drinking Water Act (SDWA) as amended (42 USC et seq) and other lawful standards and regulations. The EPA has made a preliminary determination that all underground sources of drinking water will be protected. This Permit is issued for the life of the well(s) or project unless modified, revoked and reissued, or terminated under 40 CFR §144.39 or §144.40. This Permit once issued, will authorize the construction and operation of a new injection well or wells. Operation of the well(s) will be governed by the requirements and conditions specified in the Permit.

### **PUBLIC COMMENTS**

The requirements and conditions of the Draft Permit are tentative, and are open to comment from any interested party. Persons wishing to comment upon or object to any aspect of proposal are invited to submit comments, IN WRITING, within 30 days of the Date of Publication found below:

Wendy Cheung  
U. S. Environmental Protection Agency  
Ground Water Program, 8P-W-GW  
1595 Wynkoop Street  
Denver, Colorado 80202-1129  
Telephone: 1-800-227-8917 ext. 312-6242

The Administrative Record, including the application, the Draft Permit and Statement of Basis prepared by the EPA, and public comments received, is available for public inspection at the above location(s) weekdays from 8:00 a.m. to 4:00 p.m. The Draft Permit and Statement of Basis will also be available on the Region 8 UIC webpage: <http://www.epa.gov/region8/water/uic/>

### **PUBLIC HEARING**

Within the thirty (30) day period, any interested person may request a public hearing as provided by 40 CFR §124.12. A request for a hearing must be made IN WRITING to the above address and must state the nature of the issues proposed to be raised at the hearing. A public hearing will be held only if significant interest is shown.

### **FINAL PERMIT DECISION**

All comments received within the thirty (30) day period will be considered in the Final decision. The decision may be to: issue, modify, or deny the Permit. The Final decision shall become effective thirty (30) days after issuance unless no commenters requested changes to the Draft Permit, in which case the Permit shall become effective immediately upon issuance.

### **APPEALS**

Within thirty (30) days after a Final decision has been issued, any person who filed comments on the Draft decision or who participated in a public hearing may petition the Administrator to review the final decision. Any person who failed to file comments or failed to participate in the public hearing may petition for administrative review only to the extent of the changes from the Draft to the Final Permit decision. Commenters are referred to 40 CFR §124.15 through §124.20 for procedural requirements of the appeal process.

November 17, 2011  
Date of Publication