



Pennsylvania  
Department of  
Environmental Protection

June 5, 2026

Certified Mail: [REDACTED]

[REDACTED]

Re: Request for Investigation 337601  
Methane Gas in Water Supply-- Positive Determination  
Rose Township, Jefferson County

Dear [REDACTED]

The Pennsylvania Department of Environmental Protection ("Department") has investigated the natural gas in the water supply at the address listed in Exhibit A ("Water Supply"), in response to a complaint received on October 16, 2018. The Department's investigation determined that the Water Supply is being affected by oil and gas activities, including but not limited to the drilling, alteration, or operation of an oil or gas well and/or an associated gathering line, pipeline, or transmission line. The case information is summarized below.

**CASE INFORMATION:**

Date of Complaint	Nature of Complaint (odor, taste, quantity, use, color)	Pollution
October 16, 2018	Methane gas detected in water supply	Dissolved and free natural gas in water supply

**INVESTIGATION SUMMARY:**

On October 17, 2018, Seneca Resources Corporation ("Seneca") notified the Department of the discovery of methane gas in your Water Supply located at 385 Baha Lane, Brookville, Pennsylvania. Moody and Associates Inc. ("Moody") was collecting pre-plugging samples from water supplies within 1,500 feet of the [REDACTED] permit number 065-01122, which Seneca was preparing to plug. The [REDACTED] is located 1,214 feet northwest of the complaint.

According to well records, the drilling of oil and gas wells in the area began around 1918. There are a total of nineteen mapped oil and gas wells within 2,500 feet of the Water Supply and numerous oil and gas wells beyond the area of investigation. In addition, there are multiple gas transmission lines, gas well gathering lines, and an underground gas storage facility in the area. The Galbraith gas storage field is located approximately 4,400 feet southeast of the complaint.

Eight oil and gas wells were plugged during the investigation. Seven of the wells were within 2,500 feet of the Water Supply and one well was approximately 2,800 feet from the Water Supply. Four additional wells were plugged prior to the start of the investigation. The last of these wells was plugged in 2013. There are five remaining active oil and gas wells within 2,500 feet of the complaint.

Your current Water Supply was drilled in 2008 after your, now abandoned, water supply was allegedly impacted by the drilling of a nearby oil and gas well. You stated that you lost water during the drilling of the well, but the drilling crew communicated that they were too far away to impact the water supply. According to a local resident, the abandoned water supply was drilled in the 1960s to a depth of 75 feet and produced both gas and water and provided gas to a nearby home for approximately 30 years.

The Department sampled the Water Supply three times during the investigation. The samples were submitted to the Department's lab and analyzed for general chemistry, inorganics, metals, and dissolved methane, ethane, and propane. The sample results were compared to results from samples collected for the prior complaint of red water in the Water Supply (CID 260186) and from two water samples collected prior to the drilling of the Joiner WH 39007 gas well. The water quality exceeded the Primary Maximum Contaminant Level (MCL) for barium in two samples and the Secondary MCL for iron and manganese in all of the raw water samples. Methane and ethane were also above the detection limit in all samples.

Iron and manganese occur naturally in many water supplies in Western Pennsylvania due to the types of rocks the groundwater encounters as it flows to wells. These levels can naturally fluctuate throughout the year due to seasonal variation. Levels can also fluctuate year over year due to climate variability and other influences. Increases in iron and manganese, in some cases, have been attributed to methane migrating into a water supply. Based on the treated water sample results from the sample collected on February 20, 2024, your water treatment system is effectively treating the water for barium, iron, and manganese.

In addition, dissolved and free gas samples were collected from the Water Supply, and free gas samples were collected from the abandoned water supply and from multiple gas wells in the area of investigation and submitted to [REDACTED] Lab. [REDACTED] These samples were analyzed for complete gas composition and isotopic analysis of methane, ethane, and propane. The results indicate that the dissolved and free gas found in the Water Supply are mature thermogenic gas, which suggests that a gas well or associated gathering line or pipeline may be contributing to the stray gas migrating into the Water Supply.

Free and dissolved gas continues to be detected in the Water Supply and free gas continues to be detected in the abandoned water supply. Please be aware that methane levels can fluctuate. This

means that even with a relatively low level of methane, you should be vigilant of changes in your water that could indicate an increase in methane concentration. Changing conditions can allow gas to migrate to basements and crawlspaces. Consequently, there is a physical danger of fire or explosion due to the migration of natural gas into water wells or through soils into dwellings where it could be ignited by sources that are present in most homes/buildings. Natural gas can also cause a threat of asphyxiation, although this is extremely rare. The Department recommends that the Water Supply and abandoned water supply continue to be vented.

Based on site observations, property owner interviews, water and gas sample results, the review of geologic publications, review of gas well records and gas well completion reports, and oil and gas well inspections, the Department determines that the Water Supply is being impacted by oil and gas activity; however, a specific source of the stray gas has not been identified. The Department will continue to work to permanently resolve this complaint.

Any person aggrieved by this action may appeal the action to the Environmental Hearing Board ("Board") pursuant to Section 4 of the Environmental Hearing Board Act, 35 P.S. § 7514, and the Administrative Agency Law, 2 Pa.C.S. Chapter 5A. The Board's address is:

Environmental Hearing Board  
Rachel Carson State Office Building, Second Floor  
400 Market Street  
P.O. Box 8457  
Harrisburg, PA 17105-8457

TDD users may contact the Board through the Pennsylvania Relay Service, 800-654-5984.

Appeals must be filed with the Board within 30 days of receipt of notice of this action unless the appropriate statute provides a different time. This paragraph does not, in and of itself, create any right of appeal beyond that permitted by applicable statutes and decisional law.

A Notice of Appeal form and the Board's rules of practice and procedure may be obtained online at [www.ehb.pa.gov](http://www.ehb.pa.gov) or by contacting the Secretary to the Board at 717-787-3483. The Notice of Appeal form and the Board's rules are also available in braille and on audiotape from the Secretary to the Board.

**IMPORTANT LEGAL RIGHTS ARE AT STAKE. YOU SHOULD SHOW THIS DOCUMENT TO A LAWYER AT ONCE. IF YOU CANNOT AFFORD A LAWYER, YOU MAY QUALIFY FOR FREE PRO BONO REPRESENTATION. CALL THE SECRETARY TO THE BOARD AT 717-787-3483 FOR MORE INFORMATION. YOU DO NOT NEED A LAWYER TO FILE A NOTICE OF APPEAL WITH THE BOARD.**

**IF YOU WANT TO CHALLENGE THIS ACTION, YOUR APPEAL MUST BE FILED WITH AND RECEIVED BY THE BOARD WITHIN 30 DAYS OF RECEIPT OF NOTICE OF THIS ACTION.**

If you have any questions, please contact Joe Lichtinger by phone at 814.332.6869 or by email at [jlichtinge@pa.gov](mailto:jlichtinge@pa.gov).

Sincerely,

*Scott M. Dudzic*

Scott M. Dudzic  
Northwest District Oil and Gas Manager  
District Oil and Gas Operations

Enclosures:  
Exhibit A

c: Joe Lichtinger (elec. w/encl.)  
Dave Adams (elec. w/encl.)  
Adam Hartle (elec. w/encl.)  
Johnathan Frederick (elec. w/encl.)  
Jennifer McDonough, OCC (elec. w/encl.)  
Aaron O'Hara (elec. w/encl.)

**Exhibit A**

