Izaak Walton League of America



Harry Enstrom Chapter of Greene County

Ken Dufalla, Vice President of Pennsylvania & Harry Enstrom Chapter President

46 Middle St. Clarksville, Pennsylvania 15322 (724) 377-0901



January 22, 2014

Proposed Changes to Pennsylvania's Oil and Gas Regulations

The Izaak Walton League of America (herein referred to as the League) is the fourth oldest conservation organization in the United States. The League is a non-profit organization with over 48,000 members and volunteers across the United States. Our goal is to ensure that America's natural resources are protected. managed, and used in a sustainable manner for generations to come. The organization has always and will always support the proper and safe use of our natural resources. The League has never opposed the proper extraction and use of our natural resources. However, the use and removal of our natural resources must be accomplished in a manner that is safe to humans and the environment. The current extraction of the natural gas and oil supplies has failed to meet these qualifications of safety. Numerous incidents of contamination and unsafe practices by the extraction industry have endangered both the health and safety of the people and the environment. With these failures in mind, the League supports the proposed changes to the PA Oil and Gas Regulations as submitted by the groups: Berks Gas Truth, Clean Water Action, Delaware Riverkeeper Network. Earthworks, Clean Air Council, Damascus Citizens for Sustainability, Inc. and the Sierra Club (PA Chapter). We the League have an additional recommendation to these proposed regulation changes.

In Sections 78.60, 78.61, 78.62, 78.63, and 78.70, wherein the issue of **Disposal of Brine, Drill Cuttings, and Residual Waste** is referenced, we recommend the DEP should include the following statement:

Prohibit the disposal of any "flowback water" or any materials associated with the drilling industry into current coal mines, abandoned coal mines, slurry impoundments, coal mine discharges and coal refuse piles.

With these new amendments in place, one must also consider the enforcement of these regulations. In October / November 2013, *SourceWatch* released a study entitled, "Pennsylvania and Fracking". The study was compiled from DEP reports and other sources, and showed that the number of new wells increased from 36,000 in year 2000 to 71,000 in 2010 – an average of 3,500 new

wells yearly. In response to this gas drilling upsurge, DEP increased its staff by 130 new employees, 65 of which were inspectors. Each of these new inspectors would be responsible for approximately 538 new wells. This number seems monumental for one person. The investigative group *ProPublica* reviewed records of 48 wells in 2011. They found that of these 48 wells, most were inspected (42) at least once. Six of the 48 wells, or 12.5%, were never inspected. None, (0%) of the wells were inspected during the "fracking process." If these numbers are projected to include the number of new wells since 2000 to 2010, it would mean that over 729 wells were never inspected. This does not include the wells drilled before the year 2000, or after 2010. With these facts, one must conclude that more employees are needed to protect humans and the environment. Since 2009 the number of deaths to the gas field workers has increased by over 100%. There is an obvious need for both better regulations and better enforcement of these regulations.

One other important factor is that when violations occur or are suspected by the public, the DEP must respond immediately. Too often, the response is either not forthcoming or is investigated days after the event. Enclosed are several requests made by the League's Harry Enstrom Chapter (Greene County, PA.) that have fallen on "deaf ears."

The League stands ready and capable of aiding the regulatory agencies in any way. The Harry Enstrom Chapter of the League has developed a water quality monitoring program and has 3 years of water testing data available upon request.

Finally in support of the rulemaking process and the importance of the proposed new changes in the regulations, we recognize that the general public needs more time to be able to participate in a more meaningful way. We the Izaak Walton League of America, respectfully request the following key changes:

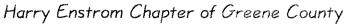
- The public comment period should be expanded to a 120 day minimum to allow for the public review and response process.
- More hearings should be set up in those counties affected by the oil and gas extraction operations.

Thank you,

Len Lyalla, Ken Dufalla,

President of IWLA Harry Enstrom Chapter of Greene Co., PA. & Vice-President of IWLA Pennsylvania State Division





Ken Dufalla, Vice-President State of Pennsylvania Harry Enstrom Chapter President 46 Middle St.

Clarksville, Pennsylvania 15322 (724) 377-0901

November 4, 2013 Joel Koricich California District Office 25 Technology Drive Coal Center, PA 15423 Phone (724) 769 1070

RE: Radioactive Waste in Mine Discharge Water

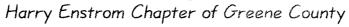
With the recent discovery of high levels of radiation in Black Lick Creek from the Josephine treatment plant in Indiana County, PA, we (IWLA) are requesting that the mine discharges from Emerald Mine 001,004 and 016, Cumberland Mine 014, and 029 Greene County and the Clyde Mine in Washington County be checked for radiation. The requests comes from the fact that high levels of salt, bromides, strontium, osmotic pressures and sodium have been found in these discharges. It is a known fact that bromides are not associated with coal mining especially in the concentrations that have been discovered. It is our fear that if the mine pools have been compromised with drilling wastes that it is a good possibility that radiation from Radium 226 maybe present in these mine discharges also. We (IWLA) would like a copy of the results of the testing for radiation, a water test of these discharges (DEP Code 046), and a request that the testing be given high priority.

Thank You,

Ken W. Dufalla VP State IWLA President Harry Enstrom Chapter

Kenneth Gayman President of Shawnee Chapter IWLA Washington County, PA

Izaak Walton League of America



Ken Dufalla, Vice-President State of Pennsylvania Harry Enstrom Chapter President

46 Middle St. Clarksville, Pennsylvania 15322 (724) 377-0901

December 9, 2013 Joel Koricich California District Office 25 Technology Drive Coal Center, PA 15423 Phone (724) 769 1070

RE: Radioactive Waste in Mine Discharge Water

Mr. Koricich,

On November 4, 2013, the Harry Enstorm Chapter of the Izaak Walton League of America the Greene County Chapter (IWLA) requested that a test for radiation (Radium 226) and a code 046 water test be taken from the Clyde Mine discharge into Ten Mile Creek. The request is based on evidence indicating that good possibilities of flow back water from the current fracking processes have compromised several of our existing mine pools. High levels of bromide, strontium, salt (NaCl), high electronic conductivity levels, sodium and high TDS have been discovered in the mine discharges into Greene County streams. Since over 1 million people depend on the water from the Mon River in West Virginia and Pennsylvania daily, it is imperative that the populous be aware of what is potentially contaminating the raw water supplies. The people residing in the area need to be assured that the mine discharges do not contain radioactive materials.

The failure of the DEP to respond to our request (over 30 days) for radiation testing brings about great suspicions about the dangers in these mine discharges. On December 6, 2013, samples were taken from the Clyde Mine discharge for bromides. The results are pending. If the IWLA does not receive conformation of the radiation testing and results, the IWLA will proceed with our own testing and release the results to the public. The bromide testing results will be released upon completion. Lack of proper testing by the DEP has caused complete loss of confidence in the DEP to protect our water which may lead to further actions in the future.

Thank You,

Ken W. Dufalla President

Berks Gas Truth * Clean Water Action * Delaware Riverkeeper Network * Earthworks * Clean Air Council *
Damascus Citizens for Sustainability, Inc * Sierra Club, Pennsylvania Chapter

Proposed changes to Pennsylvania's oil and gas regulations Key concerns and talking points

In mid-December, the Department of Environmental Protection (DEP) issued proposed changes to the state's oil and gas regulations, known as Chapter 78 of the Pennsylvania Code. Act 13, the oil and gas law passed in 2012, requires DEP to make these changes. They are also necessary because regulations for conventional drilling are outdated and inadequate given the large amount of land and water used and waste and pollution produced in shale gas development.

Public participation is essential to making regulations stronger and more protective of air, water, and health! You have until February 12 to submit written comments or testify at hearings. You can use the analysis and talking points below (which cover key parts of the regulations) to prepare your comments. The regulations and public comment information are at:

www.portal.state.pa.us/portal/server.pt/community/public_resources/20303/surface_regulations/1587188

FIRST please state that the public comment period should be expanded to 120 days minimum and more hearings should be set in affected counties. This is an important and far-reaching rulemaking and more time is needed for people to participate in a meaningful way. 59 Pennsylvania organizations and housands of people have signed a petition calling for more time.

1. Pre-drill water testing and the restoration and replacement of contaminated water supplies (Sections 78.51 and 78.52). We learned through DEP's determination letters that natural gas drilling operations have impacted at least 161 water supplies statewide. The natural gas industry has fought to have water restored to only pre-contamination conditions—even if it is not safe to drink. In addition, DEP leaves it up to the driller to decide when, where, and how to conduct water quality tests before drilling starts. DEP should require:

Operators to restore contaminated drinking water to a quality that meets Safe Drinking Water Act standards, no matter what the quality of the water prior to drilling. If the quality of a water supply prior to drilling was above these standards, the operator must restore the water to that higher standard; otherwise, good water supplies will be degraded.

All drillers to use a consistent list of parameters for pre-drill water testing, which DEP must establish before the proposed regulatory changes are adopted. The parameters should be as comprehensive as possible, but at a minimum match what DEP uses when it conducts full contamination investigations and to ensure that complete baseline data is available.

<u>All drillers make pre-drill data available to the public</u>, while protecting individual homeowners' privacy, through an online platform, which DEP must establish before the proposed regulatory changes are adopted.

2. Standards for frack pits and impoundments (Sections 78.56, 78.57, 78.58, and 78.59). Mounting violations and the potential for water and air pollution have already led some companies to transition away from pits and standardize the use of closed loop systems which utilize tanks to store wastewater. DEP should:

Prohibit operators from using open pits for storage of regulated substances, including wastewater, drill cuttings, and substances (like gels and cement) that return to the surface after fracking. Many spills, leaks, and other problems involving pits have occurred statewide that contaminate water, soil and air. Waste should be stored only in closed systems.

Prohibit the onsite processing of shale drill cuttings, which often contain hazardous substances and radioactive materials and require thorough analysis and special handling.

Define "freshwater" that is used in oil & gas operations. Water leftover from fracking and contaminated fluids being recycled for fracking (such as from mining or sewage) is often mixed with clean water for additional operations. The lack of a clear definition allows operators to avoid regulations on the use and disposal of polluted substances.

3. Disposal of brine, drill cuttings, and residual waste (Sections 78.60, 78.61, 78.62, and 78.63, and 78.70) Operators currently escape the strict federal regulation of hazardous substances that other industries have to follow. Yet drilling and fracking generate large amounts of solid and liquid waste that can harm water supplies, air quality, land, health, and wildlife. Pennsylvania should apply U.S. Resource Recovery and Conservation Act standards to regulate all aspects of the storage, transport, and use of hazardous materials contained in pits, centralized impoundments, and tanks. In addition, DEP's proposed Chapter 78 changes don't address the risks posed by hazardous waste and do little to improve current regulations or ensure safe disposal. DEP should:

Prohibit the burial or land application of drill cuttings, which can contain polluting and radioactive substances. DEP proposes different conditions for disposal of drill cuttings from above and below the well casing, but neither makes the practice safe. Cuttings from deep underground may contain more pollutants, but chemical additives and contaminated fluids are also found in drill cuttings from shallower areas.

Prohibit the onsite burial of waste pits. Buried pits can leak and pollute groundwater over time, yet burial allows operators to walk away from any responsibility after completing operations.

Prohibit the use of brine for dust suppression, de-icing, and road stabilization. Stormwater runoff carries brine into nearby waterways and wetlands. Not allowing the use of brine from shale gas wells is a positive step, but brine from conventional wells can also push salinity loads far above any naturally occurring conditions.

<u>Prohibit the land application of tophole water, pit water, fill, or dredged material</u>. These substances can contain chemicals and sediments bound with pollutants that pose risks to water, air and soil.

4. Identification of orphaned and abandoned gas and oil wells (Section 78.52(a). This is an important change and should be supported. About 200,000 abandoned wells exist statewide. As drilling spreads and intensifies, so does the chance of accidents, blowouts, and pollution from the intersection of new wells with old ones. DEP should expand these changes and require operators to:

Identify existing wells before site and well construction and drilling (not just fracking), so that the location of a new well can be changed if needed.

Plug and seal or otherwise appropriately address abandoned and orphaned wells according to state safety standards *prior* to well site construction. The state lacks funding to address the large number of old wells, so drillers should be responsible for preventing pollution of adjacent water wells and air pollution from accidents when they occur.