

COMMONWEALTH OF PENNSYLVANIA
Department of Environmental Protection
Hazardous Sites Cleanup Program
Waynesboro TCE Site
Washington Township, Franklin County, Pennsylvania

STATEMENT OF DECISION

The Commonwealth of Pennsylvania, Department of Environmental Protection (Department) files this statement of decision in accordance with Section 506(e) of the Pennsylvania Hazardous Sites Cleanup Act, Act of October 18, 1988, P.L. 756 No. 108 (HSCA), 35 P.S. Section 6020.506(e).

The selected response for the Waynesboro TCE Site (Site) will consist of an Interim Response to reduce or eliminate the exposure of residents to water supplies contaminated with trichloroethylene (TCE) and tetrachloroethylene (PCE). This action is taken to protect the public health or safety or the environment. The selected response at the Site is a combination of an extension of public waterlines to residences located on Welty Road, east of Anthony Highway (Highway 997) and west of Hollengreen Drive, as well as the Stoner Farmhouse located at 8777 Lyons Road; the installation of Point of Entry Treatment (POET) systems at 8618 Lyons Road and 13943 Anthony Highway; and continued monitoring of the area where the plumes may potentially migrate. The selected response may not be the final action taken at the Site.

I. SITE INFORMATION

A. Site Location and Description

The Site is located in Washington Township, Franklin County, Pennsylvania. The Site is found on the USGS 7.5 minute topographic map for the Waynesboro, Pennsylvania, quadrangle and the Smithsburg, MD-PA, quadrangle. Groundwater in three residential wells is contaminated with trichloroethylene, also referred to as TCE. Tetrachloroethylene, also referred to as PCE, was found in springs utilized by residents, surface water, and one residential well. Homes north of this area are served by the Waynesboro Borough Authority. At the present time, a source of the TCE and PCE groundwater contamination has not been identified.

B. Site History

The Site was discovered during a voluntary Act 2 Land Recycling investigation for the Former Waynesboro Gas Company. Investigative sampling events included monitoring wells at 8777 Lyons Road where TCE contamination was discovered at levels ranging from 12.6 to 17.6 ug/l. The Former Waynesboro Gas Company was determined not to be the source of the contamination and the issue was referred to the Department's Hazardous Sites Cleanup Program for further investigation.

The Department sampled groundwater supply wells in December 2007. The sampling yielded TCE contamination in one residential well above the groundwater Statewide Health Standard for TCE and contamination in a spring serving as an alternative water supply above the groundwater Statewide Health Standard for PCE. The TCE levels ranged from 12.6 ppb to 17.6 ppb and a PCE level of 19.8 ppb was detected. The Maximum Contaminant Level (MCL) for both TCE and PCE is 5 parts per billion (ppb).

During the week of February 4, 2008, Gannett Fleming, the Department's contractor, collected over forty samples from residential wells, springs, and surface water. Results from that sampling event yielded TCE

contamination in one residential well that ranged from 9.56 to 10.4 ppb. Bottled water was provided to this residence as a Prompt Interim Response. PCE results from that sampling event yielded 19.8 ppb contamination in a residence that reportedly utilized a spring (Hollengreen Supply Spring) along Welty Road as an alternative water supply. The location of the source spring, and the number of residences utilizing the spring could not be determined at that time.

In December of 2008 the Department attempted additional sampling of residences along Welty Road, but was unable to obtain access to homes along Welty Road. Subsequent attempts by Gannett Fleming and the Department to contact residents were also unsuccessful.

September 1, 2011, the Department revisited the site and met with the Township Manager who provided information regarding the location of the Hollengreen Supply Spring as well as residences who utilize the spring as an unregulated private water supply.

In the fall of 2012, the Department sampled most of the residences along Welty Road as well as the Hollengreen Supply Spring. Results indicated that contamination in the Hollengreen Supply Spring ranged from 24.6 to 24.9 ppb PCE. The Department confirmed that three residences utilize the Hollengreen Supply Spring as a primary water supply. It has also been confirmed that two other residences use the Hollengreen Supply Spring as a secondary water supply. Bottled water is being provided to these homes. The rest of the homes along Welty Road currently or previously have used the Hollengreen Supply Spring to supplement their wells. The Department issued a notice to residents along Welty Road regarding the contamination in the Hollengreen Supply Spring.

C. Threat of Release of Hazardous Substances

TCE and PCE are hazardous wastes as defined under the Solid Waste Management Act, July 7, 1980 (P.L. 380, No. 97, *as amended*), 35 P.S. §§ 6018.101 *et seq.*, and a hazardous substance as defined under Section 103 of the Hazardous Sites Cleanup Act, Act of 1988, (P.L. 756, No. 108), 35 P.S. § 6020.101 *et seq.* The residents are exposed to this compound through ingestion, inhalation, and dermal contact. TCE and PCE are listed as a probable human carcinogen.

TCE is a colorless, nonflammable liquid with a somewhat sweet odor and a sweet, burning taste. It is used mainly as a solvent to remove grease from metal parts, but it is also an ingredient in adhesives, paint removers, typewriter correction fluids, and spot removers. Some people who drink water containing TCE in excess of the MCL over many years could experience problems with their liver and may have an increased risk of getting cancer. The Agency for Toxic Substances and Disease Registry in their Toxicological Profile for Trichloroethylene, prepared in 1997, cites studies that demonstrate that trichloroethylene has a high propensity to volatilize from water; therefore inhalation may be a major route of exposure in homes supplied with contaminated water. As a result of volatilization, significantly elevated indoor air levels of TCE can occur.

PCE is a colorless, nonflammable liquid with a somewhat sweet odor. It is used as a dry cleaning and textile-processing solvent and for vapor degreasing in metal-cleaning operations. Some people who drink water containing PCE in excess of the MCL over many years could experience problems with their liver and kidney and may have an increased risk of getting cancer. The Agency for Toxic Substances and Disease Registry in their Toxicological Profile for Tetrachloroethylene, prepared in 1997, cites studies that demonstrate Tetrachloroethylene has a high propensity to volatilize from water; therefore inhalation may be a major route of exposure in homes supplied with contaminated water. As a result of volatilization, significantly elevated indoor air levels of PCE can occur.

II. RESPONSE CATEGORY

The Department selected a response at this site to protect public health and safety or the environment. A response action is justified in order to remove the exposure risks posed by hazardous substances in the groundwater serving certain residential well supplies. This determination is based upon the following conditions which exist at the Site: (1) The continued release and/or presence of TCE and PCE in the groundwater, and (2) The actual human exposure to hazardous substances via inhalation, ingestion, and dermal contact.

Responses are defined under Section 103 of the Pennsylvania Hazardous Sites Cleanup Act, as follows:

"Interim response." Response which does not exceed 12 months in duration or \$2,000,000 in cost.

"Remedial response or remedy." Any response which is not an interim response.

The response at this site will be categorized as an Interim Response. Interim Response actions are defined under the Pennsylvania Hazardous Sites Cleanup Act as a response, which does not exceed 12 months in duration or \$2,000,000 in cost. This action will be conducted under the Hazardous Sites Cleanup Act utilizing the Hazardous Sites Cleanup Fund.

III. CLEANUP STANDARDS

This Interim Response will be implemented as a final action pursuant to Section 504 of HSCA and, therefore, required to meet standards that apply to final responses. Further investigation has not identified the source of the groundwater contamination.

The Maximum Contaminant Levels (MCLs) for public water supplies and the groundwater Statewide Health Standard for TCE and PCE is 5 parts per billion (ppb). MCLs specify the maximum permissible levels of contaminants in finished water produced by public water supplies. MCLs are numerical limits for selected contaminants such that their presence in drinking water supplies does not pose adverse effects to users. MCLs are also used to establish the Statewide Health cleanup standard for groundwater under the Pennsylvania Land Recycling and Remediation Standards Act and 25 PA Code Chapter 250. The Site-Specific Standard under § 250.403 requires that drinking water use of groundwater shall be made suitable by at least meeting the primary and secondary MCLs at all points of exposure. The standard not only provides for current use but also applies to the probable future use of groundwater.

IV. APPLICABLE, RELEVANT AND APPROPRIATE REQUIREMENTS (ARAR)

The following standards, requirements, criteria, or limitations are legally applicable or relevant and appropriate under the circumstances presented by the site: They will be considered for any final response actions at this site.

The Pennsylvania Constitution, Article 1, Section 27.

Land Recycling and Environmental Remediation Standards Act, Act of May 19, 1995, P.L. 4, No. 1995.2, 35 P.S. Section 6026.101 et. seq. (Act 2).

Administration of the Land Recycling Program, 25 Pa. Code Chapter 250, Subchapter C (Statewide Health Standards).

Subchapter C - Statewide Health Standards

- Section 250.304 - MSCs for groundwater
- Appendix A - Table 1 - Medium-Specific Concentrations for Organic Regulated Substances in Groundwater
- Subchapter D - Site-specific Standard
 - Section 250.402 - Human health and environmental protection goals
 - Section 250.403 - Use of groundwater
 - Section 250.404 - Pathway identification and elimination

The Pennsylvania Solid Waste Management Act, Act of July 7, 1980, P.L. 380, No. 97, as amended, 35 P.S. Sections 6018.101 et. seq.

Hazardous Waste Management Regulations, Article VII, Chapters 260 - 270 (25 Pa. Code 260.1 - 270.1 et. seq.) - 25 PA Code Chapters 260a-266a, 266b and 268a-270a remain as PA ARARs. The former PA Hazardous Waste Regulations Chapters 260-270 are incorporated into the federal regulations by reference. Refer to the Resource Conservation and Recovery Act (RCRA) (42 U.S.C.A., §§ 6901-6992) and the federal regulations in 40 CFR Parts 124, 260-270, 273, and 279.

Residual Waste Management Regulations (Article IX, Chapters 287 - 299).

The Air Pollution Control Act, Act of January 8, 1960, P.L. 2119, 35 P.S. Sections 4001, et. seq.

- Chapter 123 - Standards For Contaminants
 - Section 123.1 - Prohibition of certain fugitive emissions
 - Section 123.2 - Fugitive particulate matter

- Chapter 127 - Construction, Modification, Reactivation and Operation of Sources
 - Sections 127.1 - Purpose (New source emission control)
 - Section 127.12(a)(5) - Best Available Technology (BAT)
 - Section 127.71 - New or modified volatile organic compound sources

- Chapter 131 - Ambient Air Quality Standards
 - Section 131.1 - Purpose
 - Section 131.2 - National Ambient Air Quality Standards
 - Section 131.3 - Ambient air quality standards
 - Section 131.4 - application of ambient air quality standards

Pennsylvania Safe Drinking Water Act, Act of May 1, 1984, P.L. 206, 35 P.S. Sections 721.1 et. seq.

- Chapter 109 - Safe Drinking Water
 - Section 109.201 - Authority
 - Section 109.202 - State MCLs and treatment technique requirements

Pennsylvania Hazardous Substance Transportation Regulations, Pa. Code Titles 13 & 15.

Pennsylvania Hazardous Transportation Regulations, Pa. Code Titles 13 & 15.

Pennsylvania Uniform Environmental Covenants Act, Act No. 68 of 2007 Pa.

V. ANALYSIS OF ALTERNATIVES

Alternative 1. Institutional Controls

Under this alternative, the Department would implement activity use limitations (AULs) either through environmental covenants or administrative orders. Environmental covenants or administrative orders would be placed on deed records that would alert new property owners, and prospective property purchasers, of the health risks for continued use of contaminated private water supplies. AULs placed on property deeds would restrict or limit future site activities to prevent human contact with contaminated groundwater and place limitations on the use of groundwater without adequate treatment.

This alternative would not remove the actual exposure of the residents to the hazardous substances in the groundwater and would not be protective of human health and the environment unless the individual property owners initiated measures to limit their exposure. This alternative would not comply with ARARs for the Site. Existing private well supplies and selected monitoring wells would be incorporated into a long-term monitoring network. Groundwater would be monitored annually for TCE, PCE, and other VOCs to assess the contaminant plume status and to assess whether additional homes may be at risk from contaminated water supplies. The annual analytical cost for the groundwater monitoring in this alternative is \$1,040. The projected 30 year costs for this alternative is \$31,200.

Alternative 2. Bottled Water

This alternative provides for the Department to furnish commercial bottled water to the impacted residences that have water supplies containing TCE and PCE at concentrations exceeding 5 ppb. Bottled water would be delivered regularly to each residence that had a water supply contaminated in excess of the MCL for TCE and PCE. For residents receiving the bottled water, this would effectively remove the risk posed by ingestion, but would not remove the risk posed by inhalation and dermal contact. TCE and PCE would continue to be released to indoor air with use of the contaminated water within the home. Low level ingestion and inhalation exposure would occur for residents with water supply contamination below 5 ppb. This alternative would reduce the negative health impact of using the contaminated groundwater for private water supplies and thus provide an increase in protection of human health and the environment.

The Department would implement AULs either through environmental covenants or administrative orders placed on deed records that would alert new property owners, and prospective property purchasers, of the health risks for continued use of contaminated private water supplies. Contamination would remain in the underlying aquifer and would continue to pose threats to groundwater users. This would comply with the applicable requirements of the site-specific cleanup standard under the Land Recycling and Environmental Remediation Standards Act requiring institutional controls.

The remedy would need to be continued until the contamination is no longer present in the groundwater in excess of the MCL. Existing private well supplies and selected monitoring wells would be incorporated into a long-term monitoring network. Groundwater would be monitored annually for TCE, PCE, and other VOCs to assess the contaminant plume status and to assess whether additional homes may be at risk from contaminated water supplies.

The present cost of this alternative, to provide bottled water for the known residential supplies that could potentially exceed the MCL for PCE and TCE, is approximately \$1085 per year. The annual analytical cost for the groundwater monitoring in this alternative is \$1,040.

| Alternative 2 | Capital Costs PADEP | Annual Costs Home Owner | Annual Costs PADEP | Multiplier | Total Costs |
|---------------|------------------------|----------------------------|-----------------------|------------|-------------|
| Bottled Water | | | \$1,085 | 30 yrs | \$32,550 |
| Monitoring | | | \$1,040 | 30 yrs | \$31,200 |

Alternative 3A. Point Of Entry Treatment Units

Under this alternative, Point of Entry Treatment (POET) systems would be installed on homes utilizing the contaminated spring. This includes properties along the portion of Welty Road, east of Anthony Highway (Highway 997) and west of Hollengreen Drive, as well as 8777 Lyons Road.

The Department would implement AULs either through environmental covenants or administrative orders placed on deed records that would alert new property owners, and prospective property purchasers, of the health risks for continued use of contaminated private water supplies. Notification placed on deed records will indicate that the Department has installed a POET system in order to mitigate potential threat to human health from the contaminated water supply.

The POET systems consist of two carbon units in series and an ultraviolet light on the supply line from the contaminated wells. Water pumped from the private wells would be passed through the POET systems at the point of entry into the homes and remove the TCE and PCE to below the MCL. The systems will require property owners to monitor and maintain the units. The remedy would need to be continued until the contamination is no longer present in the influent water above the drinking water standard. This would effectively remove the risk posed by ingestion, inhalation and dermal contact.

Carbon adsorption is effective in removing the TCE present in the site groundwater. However, activated carbon has low adsorptive capacities for vinyl chloride, which will not be effectively or efficiently removed. Vinyl chloride has not been detected in groundwater from the site but may eventually appear because it is an end product of the degradation process of TCE.

One potential impact to human health is the potential for bacterial growth on the carbon beds and resultant excess bacterial counts in the treated effluent. This condition will be addressed by property owners through periodic replacement of the carbon and the use of an ultraviolet light after the carbon treatment.

This alternative will be protective of human health and the environment. This alternative will comply with the applicable requirement that drinking water use of groundwater meet the MCL. The exhausted or "spent" carbon will be removed for regeneration or disposal in accordance with applicable regulations.

Initial installation of a POET system is estimated to cost \$3,670 per unit. Annual carbon change out and UV light replacement is estimated at \$920. Sampling and analytical monitoring costs are estimated at \$1040 a year per system.

| Alternative 3A | Capital Costs PADEP | | Annual Costs Home Owner | Annual Costs PADEP | Multiplier | Total Costs |
|----------------|------------------------|--|----------------------------|-----------------------|---------------------|-------------|
| POET Systems | \$3,670 | | | | 4 units | \$14,680 |
| O&M costs | | | \$920 | | 4 units x 30 yrs | \$110,400 |
| Monitoring | | | | \$1,040 | 1 yr | \$1,040 |

Alternative 3B. Drill New Residential Wells

Under this alternative, new supply wells would be constructed on the properties utilizing the contaminated springs. This includes properties along Welty Road, east of Anthony Highway (Highway 997) and west of Hollengreen Drive, as well as 8777 Lyons Road.

In order for this alternative to be effective, wells would need to be drilled into an aquifer segregated from the contaminated aquifer and constructed so that water from the contaminated aquifer would not be drawn into the new wells. One potential impact to human health is the potential for ground water contamination to migrate into the aquifer utilized by the residents. Property owners will need to monitor wells for contaminants of concern. Should wells become impacted, property owners will need to place POET systems on their homes. The Department would implement AULs either through environmental covenants or administrative orders placed on deed records that would alert new property owners, and prospective property purchasers, of the health risks for continued use of contaminated private water supplies. Notification placed on deed records will indicate that the Department has drilled new residential wells in order to mitigate potential threat to human health from the contaminated water supply.

Installation of a new residential supply well is estimated to cost \$20,000 per well. Annual utility and maintenance costs are estimated at \$180 per well.

| Alternative 3B | Capital Costs PADEP | Annual Costs Home Owner | Annual Costs PADEP | Multiplier | Total Costs |
|-------------------|------------------------|----------------------------|-----------------------|------------------|-------------|
| Well Installation | \$20,000 | | | 4 units | \$80,000 |
| O&M costs | | \$180 | | 4 units x 30 yrs | \$21,600 |
| Monitoring | | | \$1,040 | 1 yr | \$1,040 |

Alternative 4. Extend Municipal Water Supply Line

This alternative provides for public water to the residential properties along Welty Road, east of Anthony Highway (Highway 997) and west of Hollengreen Drive, as well as 8777 Lyons Road. The public water distribution lines are present on Hollengreen Drive and Anthony Highway. The Township would receive a grant from the HSCA Fund to extend the water lines south to Welty Road and 8777 Lyons Road. Any cost related to the initial connection to the system, the abandoning of wells and all necessary restoration work will be included in the response. Properties connected to the public supply will be responsible for customary continuing service payments.

| Alternative 4 | Capital Costs PADEP | Annual Costs Home Owner | Annual Costs PADEP | Multiplier | Total Costs |
|------------------|------------------------|-------------------------------|--------------------------|------------|-------------|
| Water connection | \$500,000 | | | | \$500,000 |

VI. SELECTED RESPONSE

The Department has already implemented Alternative 2 as a Prompt Interim Response, and selects Alternative 1, 3A, and 4 to implement as a Final Response. Alternative 2, Bottled Water, was initiated the first week of January 2007 for residences with water supplies determined to have contamination levels greater than 5 ppb of TCE but less than 25 ppb. Bottled water delivery to residents with this level of water supply contamination will continue until the selected response action for the site is implemented.

After considering institutional controls, bottled water, point of use water treatment units, and connection to the public water system, the Department is proposing to continue supplying bottled water as a prompt interim response and connection to the Washington Township public water system as the interim response for the site. The Department would continue to furnish commercial bottled water to residences that have a water supply contaminated in excess of 5 ppb of TCE or PCE until the residences are either connected to the public water supply or receive a Point of Entry Treatment (POET) system. Residences in the projected contamination plume on Welty Road, between Anthony Highway and Hollengreen Drive, as well as an unoccupied farmhouse located at 8777 Lyons Road, will be connected to the public water distribution line. Residences at 8618 Lyons Road and 13943 Anthony Highway will receive POET systems.

The Department will carry out an investigation following the issuance of the Statement of Decision that will, among other things, investigate groundwater contamination south of the East Branch Antietam Creek. For residences that receive POET systems, and which the investigation concludes will be impacted by contamination in the future the Department would implement Activity Use Limitations (AULs) either through environmental covenants or administrative orders placed on deed records that would alert new property owners and prospective property purchasers, of the health risks for continued use of contaminated private water supplies. Notification placed on deed records will indicate that the Department has installed a POET system in order to mitigate potential threat to human health from the contaminated water supply. Similar institutional controls may be required for homes serviced by the public water system if the Township does not implement an ordinance that restricts the use of groundwater.

The Department's response will include extending the water line into Welty Road and installing the lateral water line into each home's water distribution system. Any fees related to the initial connection to the system, the abandoning of affected wells and all necessary restoration work will be included in the response. This action will eliminate ingestion, inhalation, and dermal contact. This alternative will provide maximum protection by removing all exposure to contaminated groundwater serving private water supply systems. The DEP will assure that all existing house wells of residents connected to the public water will be disconnected and abandoned in accordance with the Department's approved specifications. This will eliminate all exposure with the contaminated groundwater, the fugitive release of the TCE and PCE to the outdoor air in the neighborhood, and the possibility of cross connection to the public water supply.

This response will be carried out as a final remedial action pursuant to Section 504 of the Hazardous Sites Cleanup Act (HSCA). The Department and its contractors will formally evaluate the potential for the groundwater contamination to migrate south at levels above the drinking water standard. Additional

response actions may be needed to achieve a complete, permanent and final cleanup for the site. Treatment technologies that address aquifer restoration and/or protection of the environment, such as ex-situ or in-situ treatment technologies, may also be considered in the future provided a technically feasible and cost-effective approach can be developed.

VII. MAJOR CHANGES FROM PROPOSED RESPONSE

This Statement of Decision amends and alters the previous Statement of Decision signed July 7, 2015 as the previous Statement of Decision was found to be cost prohibitive.

8618 Lyons Road will have a POET installed instead of being connected to public water.
13943 Anthony Highway has been added to the list of residences to be addressed under this response.
13943 Anthony Highway will have a POET installed

The Department and its contractors will formally evaluate the potential for the contamination to migrate south at levels above the drinking water standard.

VIII. RESPONSE TO PUBLIC COMMENTS

The Department's response to public comments concerning the selection of this response action is filed in the administrative record.

IX. DEPARTMENT APPROVALS

FOR THE COMMONWEALTH OF PENNSYLVANIA
DEPARTMENT OF ENVIRONMENTAL PROTECTION



Joseph Adams, Director
Southeastern Region

7/30/16

Date

DEPARTMENT OF ENVIRONMENTAL PROTECTION
Hazardous Sites Cleanup Program
RESPONSE TO PUBLIC COMMENTS
WAYNESBORO TCE
[DATE], 2016

The Department provided a public comment period concerning the reopening of the administrative record for the interim response at the Waynesboro TCE site (Site). The Department reopened the administrative record to revise its selected interim response pursuant to Section 506(g) and (h) of HSCA, 35 P.S. Sections 6020.506(g) and 6020.506(h) on April 23, 2016 through public notice issued in the *Pennsylvania Bulletin, Volume 46, Number 17 Record Herald*. Written comments were accepted during the comment period which extended from April 23, 2016 to June 23, 2016 and written and oral comments were presented at the public hearing conducted on June 14, 2016 at the Washington Township building. The Department has compiled all comments, criticisms, and new data received during the comment period or at the public hearing, from the following persons.

Identification Number/Person

1. Mrs. Sandy Smith
13943 Anthony Highway
Waynesboro PA, 17268

2. Mr. Roger Smith
13943 Anthony Highway
Waynesboro PA, 17268

3. Mrs. Ann Spottswood
8777 Lyons Road
Waynesboro PA, 17268

4. Mr. Daryl Lentz
14015 Anthony Highway
Waynesboro PA, 17268

Comment #1: The first one is that in talking with the other residents, a couple of them, we find that three of the six homes on Welty Road, are not relying at all on the spring water, which means that they are using water from their private well, which has zero contamination. (1)

Response #1: The Department's concern is that once the spring located at the corner of Hollengreen Drive and Welty Road (Hollengreen Spring) is taken out of use, contamination may begin to migrate toward nearby residential wells along Welty Road. Deterioration of the Hollengreen Spring water supply piping and continued use may also lead to the spread of contamination into residential wells along Welty Road. To address these potential releases, the Department will extend public water to the homes along Welty Road from a nearby public water supply.

Comment #2 Our well, however, tests positive. You're saying it's trace amounts and that's what it is, according to --- it's supposed to be acceptable. Our amount is 0.693 and 5.0 is the contamination level. But we're not being offered this public water line and we'd like to have it. (1)

Response #2: The Safe Drinking Water standard for Tetrachloroethylene (PCE) is 5 parts per billion (ppb). A concentration of 0.693 ppb is an order of magnitude less than the current standard. The revised

Statement of Decision calls for a Point of Entry Treatment (POET) system to be installed at 13943 Anthony Highway which will remove PCE. The POET system will mitigate a potential threat to human health should concentrations of PCE rise above the Safe Drinking Water standard in the future.

Comment #3: The second point is, DEP stated in your decision of July 15, alternative number four, if you got that everybody. I'm not sure about it. It's the superior alternative and that's the one that you're going to use. It quotes here, alternative number four is superior for residences because it is a permanent solution that eliminates all routes --- routes of exposure for ingestion, inhalation and dermal contact with contaminated groundwater, it would be eliminated. Alternative four is founded upon a regulated source of water, free of TCE and PCE contaminants, and eliminates the need for locating new sources and installing multiple carbon treatment systems. By DEP's own admission, this is the best course of action, yet they state that our property doesn't deserve to have the same actions taken. (1)

Response #3: A point of entry treatment (POET) system is an equally protective and permanent remedy that eliminates all routes of exposure for ingestion, inhalation and dermal contact with contaminated groundwater. Other factors, such as cost, must be taken into consideration when the Department implements a remedy. The current Statement of Decision which includes the extension of public water was founded on a cost estimate provided by Washington Township that ranged between \$350,000 and \$500,000. Later estimates provided by the township increased to \$1,239,504. Neither estimate provided by the township included costs to extend a water line to 13943 Anthony Highway.

Comment #4: My third point, installation of the new sewer system in --- sewer lines in Washington Township, we believe is the cause of our contamination. (1)

Response #4: The Department has not concluded a site investigation at this time. Until a site investigation is completed, the Department cannot concur with the belief that the Township's new sewer line was the cause for contamination to reach detection limits in the private well of 13943 Anthony Highway.

Comment #5: The fourth point I'd like you to consider is that TCE was first detected in Waynesboro, according to paperwork that I think we got from you, in 2006. This is 2016, ten years later. And the final, remedial action is still not in place. If this study took ten years, beginning another study to decide if residents proven them already to have contamination, deserve public water, is unacceptable. We can't wait another ten years for clean water. (1)

Response #5: In December 2007 the Department's contractors began a site investigation. In August, 2009 the Department released its contractor before a full site characterization was completed due to HSCA funding constraints. Funding constraints also resulted in Department Regional HSCA sites being reprioritized based on a tier system. Department staff serving in the Regional HSCA section has been reduced as positions are not filled and undergo attrition or reallocation. In September 2011 the Department restarted limited investigation efforts at the Waynesboro TCE site. Upon implementation of the revised decision, the Department will implement a remedy while concurrently carrying out additional site investigation. These efforts will continue while adequate funding and staff are available.

Comment #6: But this point is that property is over 30 acres. We own 30 acres on this property, a little bit more than that. Some of it is developable and has always been an investment for future retirement. Our retirement time is here, now, for us. Placing an AUL, in other words, a limitation on our deed, stating that the groundwater is contaminated, will decrease the value of our property immensely and deter the development of the property.

The devaluation and deterrent would be eliminated if public water is extended to our property. No AUL would be placed on the deed with this solution. And there would be no loss of value to our property. (1)

Response #6: The Department's concern is the protection of human health and the environment. If necessary, an Activity Use Limitation or deed notice would notify potential future property owners and developers that a threat to human health exists.

Comment #7: The sixth and final point, DEP says that 0.693 parts per billion, that PCE is acceptable. So placing a warning on our deed that the water is unsafe is a contradiction and should be a requirement. DEP is telling us, it's safe to drink. So why put a restriction on the deed? (1)

Response #7: Upon implementation of the response action, The Department will offer the owners of 13943 Anthony Highway a POET system for their home. A deed notice would not be required at that time since the groundwater concentrations do not currently exceed the Safe Drinking water standards.

Provided adequate funding is available, the Department will carry out a site characterization study to determine the current and future threat that the groundwater contamination plume poses to residents south of the East Branch of Antietam Creek along Lyons road, Goods Dam Road, and Anthony Highway. During the course of this study, any required POET systems would be installed and maintained by the Department.

Should the results of the study conclude that the levels of contamination will exceed the current drinking water standard, one of several options may be pursued which will serve as DEP's final response:

- a) A public water supply line may be installed.
- b) Properties with exceedances of the drinking water standards would have POET systems installed. A deed notice would be required on these properties, which can be achieved either through an Environmental Covenant, a HSCA 512(a) order, or a Consent Order and Agreement.
- c) Should the study conclude that the levels of contamination will not exceed the current drinking water standard, any installed POET systems will be turned over the property owner(s) and a deed notice would not be required.

Comment #8: At the last meeting, John Krueger and Doug Cordelli said when wells are rendered inactive, the TCEs move to the next well. That was DEP people, that was what they thought. They also said that TCEs and PCEs are not crossing the stream to our property and may never happen. (2)

Response #8: The vertical and horizontal extent of the contamination has not been fully characterized. Initial investigation efforts concluded that shallow residential wells south of the East Branch of the Antietam Creek would not be impacted by contamination. During the initial investigation, the well located at 13943 Anthony Highway was not impacted. Since that time, the well located at 13943 Anthony Highway was modified to an increased depth over 200 feet and contamination was subsequently detected. Further investigation efforts will attempt to determine the vertical and horizontal extent of the contamination plume south of East Branch of Antietam Creek.

Comment #9: No one seems to be able to find where [the contamination] coming from, but if you walk up, there's plenty of buckets and barrels buried up there on the borough. I don't know if it's been checked out by anyone else, but all I did was walk up the hill. (2)

Response #9: On July 13, 2016, Department Waste Management staff investigated a complaint regarding Beck Manufacturing, located at 330 E 9th St, Waynesboro, PA 17268. No violations were noted.

Comment #10: I wanted to extend our thanks to DEP for revising this --- the decision. And especially to the Township officials for really taking this stand and to heart. And it is time to move along for the best interest of everyone and we will continue with written comments. Thank you. (3)

Response #10: The Department appreciates your support

Comment #11: At the last meeting we had here, the gentleman from DEP said that they would test our property, which is at 14015 Anthony Highway, at the same time they tests Rodger's. I've seen nobody. I was wondering if you're still going to test it or what? (4)

Response #11: Upon implementation of the Revised Decision, the Department will being investigation efforts that will include residential wells along Welty Road, Anthony Highway, and Lyons Road. 14015 Anthony Highway will be included in the wells to be sampled.