

PA DEP Small Drinking Water Systems Engineering Services Program (ESP) Case Study

Client Name: Fairview Water Association
Location: Granville Township, Mifflin County
Project Name: Public Water System Feasibility Study

Background:

The former Fairview Water Association, located in Granville Township, Mifflin County, utilized an untreated and unpermitted surface water source to supply its members. Additionally, its distribution system was undersized to provide adequate service to its 46 connections and could not provide fire protection for the Community.

Public Health Challenges:

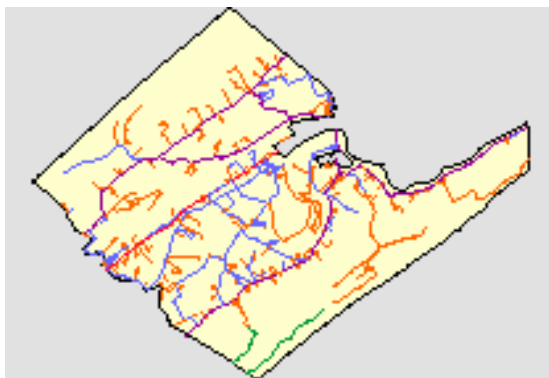
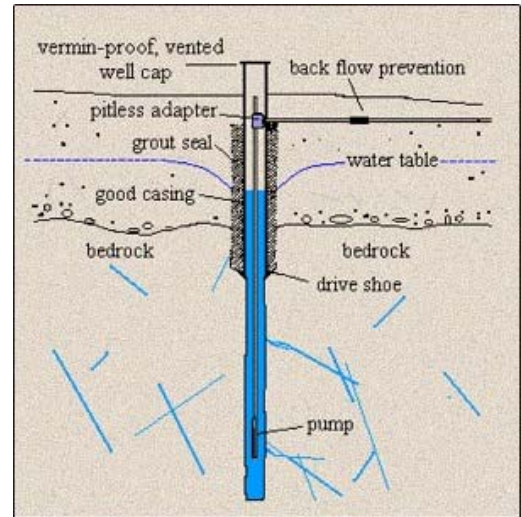
As a result of continued water quality and quantity deficiencies, the Association received an Order from the Commonwealth Court of Pennsylvania requiring that the source be either filtered or replaced with an alternative source/treatment system approved under the Safe Drinking Water Act.

Capacity Issues:

Technical – The surface source required a filtration system to comply with regulations. The Association's other option was to develop an alternative groundwater source.

Managerial – The Association could not effectively operate and maintain the system due to the increased regulatory requirements and its small size. It was not an official Municipal Authority.

Financial – Due to small customer base, the Association could not afford to rectify these public water system deficiencies without dramatically increasing user rates to levels identified as unacceptable by its members (well over \$100 per month).



Actions:

A Feasibility Study was conducted by Alfred Benesch & Company in order to help the Association determine a course of action to bring the system into compliance with the PA Safe Drinking Water Act. Various alternatives were considered in the Feasibility Study, including interconnection with neighboring water systems, development of a new groundwater source, and construction of a filtration system for the existing surface water source. The Feasibility Study also included the associated costs for each alternative and a 20-year lifecycle cost analysis.

Outcomes:

Due to the limited finances of the Association, each alternative evaluated in the Feasibility Study was deemed cost-prohibitive. Therefore, at the Association's request, the Township allowed the drilling of private wells by each residence and the dissolution of the Fairview Water Association as a public water system. The cost for drilling each well was the responsibility of the property owner.

