Abington Township Fire Department



Guideline for Private Fire Hydrants

This guideline shall serve as an overview for Private Fire Hydrant use at the Abington Township Fire Training Facility.

The fire hydrants at the training facility are considered private hydrants. This means that the hydrants and associated underground water main system are not the responsibility of the water company. Instead, Abington Township is responsible for the system.

The water main system enters the facility from Florey Lane. At the entrance to the facility, you will notice a valve pit in the roadway. This is where the jurisdiction transfers from Aqua to Abington Township.

The water system provided is a gravity feed, well gridded system for the area. The most immediate water supply for the area is from the Hillside Tank Storage system located on Edge Hill Road. In total, there is 12.5 million gallons of water storage capacity at this site.

A common best practice for private hydrants is to identify them with red paint as to set them apart from the standard public fire hydrant. In our local case, reflective silver paint is used for the public hydrants.

As a training aid, there are two hydrant props which can be used to deliver orientation as to the workings of a dry barrel fire hydrant. These hydrants have "cut outs" which show the internal workings of the hydrant, including the valve stem and the drainage features of the hydrant. One hydrant prop is the older style Mueller hydrant while the other is the newer style hydrant for the area, which is the Kennedy hydrant prop.

The typical water supply provided from the training facility hydrants is as follows:

Static Pressure of 85 psi, Residual Pressure of 58 psi, while flowing 1065 gpm.

The following graph(N-1.85) illustrates additional information for training usage. This system is tested on a periodic basis and recorded for any potential changes or issues.

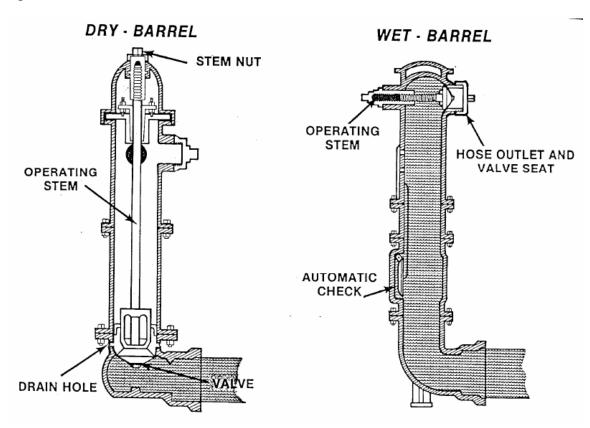
The typical fire hydrant is opened and closed on a sporadic basis. Private Hydrant #1 is opened and closed very frequently due to the use of the facility. As such, it is subject to mechanical issues from time to time, which we have experienced. This is usually attributed to a broken valve stem.

When a problem arises with either private fire hydrant at the facility, notify Larry Siefken of the issue at hand. Although Aqua is not responsible for the hydrants, we enjoy a very

favorable relationship with the water company that needs to be respected. To this point, the water company typically makes repairs to the system at no cost, but this is not an item that should be assumed.

As a point of reference, the water supply for the facility was at one time supplied from the water main on Arbuta Road. This main was abandoned in place in 2009 as the main was valved off at the entrance to the Public Works Facility and also at hydrant #1. This section of water main dated back to the 1960's and was cast iron. We began to experience multiple water main breaks in this main and it was determined that the supply from Florey Lane was more than adequate for our needs.

L. Siefken April 2012



Above – Illustration of the difference between a Dry Barrel and Wet Barrel Fire Hydrant. Our facility and general area is protected with Dry Barrel Hydrants as we have the potential for freezing.