



**Goodwin's Mills
Fire-Rescue**

**REGULATION
1701**

Created Date	05-01-08
Effective Date	05-01-08
05-01-08 Carpenter, H. Rodney	

Subject:
Water Supply Standard

Purpose:
To ensure any new development in Lyman or Dayton has a reliable and adequate water supply to provide a fast attack and suppression of any fire in the said development.

Referance:
n/a

Background:
In order to ensure fire protection as well as lift the financial responsibility from the tax payers, any person(s) developing a sub division shall be subject to the following provisions.

Regulation:
Any proposed development with 4 homes or more must have it's own water source using the following table: When ever possible 30,000 gallon tanks are preferred to meet ISO requirements, but the length of hose lays will be a consideration.

Number of Homes	Water Sources
4 - 11	10,000 gal. (1 tank)
12 - 23	20,000 gal. (2 tanks)
24 - 35	30,000 gal. (1 tank)
36 - 47	40,000 gal. (2 tanks)
48+	To be determined by fire dept.

Sprinklers may be considered in lieu of some water supply volume. Residential sprinklers designed, installed and maintained by trained and licensed professionals will only be considered. The fire department will make the final decision on all suppression requirements in the Towns of Lyman and Dayton.

Any developer and/or installer will meet with the fire department prior to beginning any installation of dry hydrants and or holding tanks to ensure that the required criteria will be met. Additionally, the fire department will be notified 7 days prior to any such installation to allow scheduling of an on-site inspection.

Types: Although holding tanks are preferred, dry hydrants installed in ponds, brooks and streams could be considered if: the developer can prove 50 years of adequate water level has been maintained in proposed water supply, with no more than a ten foot lift from said water. All natural water sources will have ice levels, dam conditions and water flows factored in, Any proposed water source will be reviewed and the fire department will have final approval of the source .

Materials: Holding tanks – suitable materials include concrete, stainless steel, fiberglass or lined concrete.

Installations: Tanks should be set on firm foundations and surrounded with soft sand, well compacted into place. Tanks must be anchored or weighted to prevent floating in locations where the water table is high or may rise. Underground tanks must be protected against damaging loads.

Installer: The installer, owner, and/or responsible party for the project shall insure in writing to the Planning Board and the Goodwins Mills Fire Department, that the water in the tank and vertical lift of the hydrant will be protected from freezing. To clarify the pond or river water will rise in the vertical lift of the hydrant, equal to the level of the pond or river, and the water in the tank will rise in the hydrant connection exact to the water level in the tank, and the water in the vertical lift in all cases must not be subject to freezing.

Hardware: Each tank will be provided with a 6” National Standard female thread Fire Department connection with cap and chain. This connection will be located within 6 feet from hot top or hard surface suitable for support of, fire apparatus. The center-to-cap elevation shall be 30” from final grade. An appropriate vent must be provided for normal operation (1000 GPM) of any tank to permit filling and emptying and for the maximum expansion or contraction of the tank contents with changes in temperature. A screen shall be provided to prevent clogged vents, which may result in the rupturing of tanks from the internal pressure or collapse due to internal vacuum. Inadequately sized vents may have the same result. The vent shall be a minimum of 6” in circumference (schedule 40 PVC pipe) and terminate a minimum 6 feet above grade. Pipe materials that are resistant to corrosion and have adequate strength to withstand the maximum service pressure shall be used.

An inspection cover shall be provided that will allow any required maintenance to be done from the inside.

Two tanks may be connected, or the connection of several tanks to hold the required gallons is allowed if approved by the Fire Department and tank manufacturer.

The piping for the Fire Department connection MUST be constructed so that it comes through the interior of the tank, not through the end or underside.

The suction pipe inside the tank must be 6” Schedule 40 PVC to the top of the water level, then minimum Schedule 40 or 6” iron pipe from the top of the tank to the fire department connection. The level of the hydrant head shall be installed at 30 inches above the final grade of the road. All iron piping shall be painted with two coats of red epoxy paint.

A 24” concrete collar around the Fire Department connection shall be poured in place, on top of tank cover.

There must be 6’ by 40’ pad of level ground in front of the Fire Department connection, this pad shall be made of gravel or crushed rock and maybe paved, adequate to hold up a loaded fire truck.

Protective posts shall be installed and approved by the Fire Department. One 12” x 18” sign with a red reflective “H” will be installed at hydrant or holding tank and an additional sign will be installed at the beginning of the development road and must be on 10’ U channel posts. The signs maybe purchased from the Goodwins Mills Fire Department at cost.

Threaded or welded connections are acceptable.

Tanks are required to be re-inspected internally 30 days after installation.

The developer will be responsible for pumping any existing water, totally remove any foreign material of any-kind, i.e. gasket material, dirt, leaves, concrete dust, etc., prior to on-site inspection by the Fire Department.

The developer shall be responsible for filling the tank under Fire Department supervision.

The owner or contractor shall be responsible for all maintenance for a ten-year period.
