

Lewisville Fire Prevention Division Fire Prevention Standard

Inspection, Testing, and Maintenance of Private Fire Hydrant Systems

Purpose

The purpose of this Standard is to clarify the requirements for the testing, inspection, maintenance, and marking of private fire hydrants. Private fire hydrants are those hydrants not owned and maintained by the City of Lewisville. It is the responsibility of the property owner to have all the fire hydrants located on his/her property tested once every year in accordance with N.F.P.A. 25. This testing is necessary in order to assure proper function of the fire hydrants located on the property.

Scope

This Standard applies to all privately owned and maintained fire hydrant systems located within the City of Lewisville. Private fire service systems shall be maintained per the most recent version of N.F.P.A. Standard 25—Standard for the Inspection, Testing, and Maintenance of Water-Based Fire Protection Systems.

Requirements

Private Hydrant Inspection, Testing, and Maintenance:

Private hydrant systems shall be inspected, tested, and serviced annually, and the owner shall correct any deficiencies immediately. Hydrants shall be flushed, valves operated and gaskets and caps inspected. Hydrant paint shall be maintained in good condition.

Inspection, Testing and Maintenance Service shall be provided by a *qualified contractor* or qualified property owners representative in which all components unique to the property's systems are inspected and tested at the required times and necessary maintenance is provided. A *qualified contractor* or qualified property owners representative is a person that has knowledge of the installation, construction, or operation of fire hydrant systems and the hazards involved. This program includes logging and retention of relevant records.



Inspection of private fire hydrants shall be done annually and after each inspection the necessary corrective actions shall taken as shown if needed:

Condition	Corrective Action
Inaccessible	Make Accessible
Barrel contains water or ice (presence of water or ice could indicate a faulty drain, a leaky hydrant valve, or high groundwater table.)	Repair and drain: for high groundwater it could be necessary to plug the drain and pump out the barrel after each use.
Improper drainage from barrel	Repair Drain
Leaks in outlets or at top of hydrant	Repair or replace gaskets, packing, or parts as necessary.
Cracks in hydrant barrel	Repair or replace
Tightness of outlet caps.	Lubricate and tighten if necessary
Worn outlet threads	Repair or replace
Worn hydrant operating nut	Repair or replace

Testing Fire Hydrants:

Fire hydrants shall be tested annually to ensure proper operation and function. The following steps shall be taken:

- A. Each hydrant shall be opened fully and water flowed until all foreign material has cleared.
- B. Flow shall be maintained for not less than 1 minute.
- C. After operation, hydrants shall be observed for proper drainage from the barrel
- D. Full drainage shall take no longer than 60 minutes.
- E. Where soil condition or other factors are such that the hydrant barrel does not drain within 60 minutes, or where the groundwater level is above that of the hydrant drain, the hydrant drain shall be plugged and the water in the barrel shall be pumped out.
- F. Record estimated amount of water used in the test.



After all inspections and testing are complete a record of the tests shall be kept on file with the management or owner. A copy of the test shall be forwarded on to the City of Lewisville Fire Prevention Division.

Markings:

All private fire hydrants shall be painted in accordance with City of Lewisville standards. The body of the hydrant shall be painted a "reflective" **white** color of an approved paint.