



CENTRAL COUNTY FIRE DEPARTMENT

Serving the Cities of Burlingame and Millbrae and the Town of Hillsborough

Requirements for Fire Sprinkler Submittals For NFPA 13, 13R, and 13D System Effective September 8, 2016

- Plan submittals *shall* include three (3) complete sets of drawings and (2) calculations. Calculations shall include a 10% safety factor. Submittals shall include an elevation detail denoting the difference of elevation of the riser from the meter. All drawings and calculations shall be wet stamped and signed by a licensed C-16 or a Professional Engineer.
- Submittals shall have current fire flow information if the fire flow data is older than five (5) years. Additionally, a fire flow shall be conducted when at least a 15% safety factor in your hydraulic calculations cannot be met.
- The minimum size service for fire sprinkler systems conforming to NFPA 13 or 13R is two inches (2").
- For NFPA 13D systems the minimum size pipe/meter will be based upon meeting the system design criteria. In many cases, options for a loop system design and a passive purge connection can reduce the need for larger meter sizes. Note on the drawings that meter size shall be verified at time of rough-in inspection.
- The main sprinkler control valves *shall* be accessible from outside the building and have a method to be locked in the open position. Backflow Prevention Device equipped with an OS&Y and supervised electronically may be used in lieu of a Post Indicator Valve when requested.
- The Fire Department Connection *shall* be within five (5) feet of the sidewalk. It *shall* have a minimum of a single 2 ½" outlet for mains of 3" size and a minimum of a double 2 ½" outlet for mains 4" and larger. Wall mounted units *shall* have prior approval.
- All systems *shall* be monitored by an approved central station for water flow and control.

Exception: Residential one and two-family dwellings

- While sprinkler protection is not required in attics and under-floors for NFPA 13R and 13D designed systems, pilot heads shall be provided adjacent to HVAC, Water Heaters, and similar areas; or at attic access openings.

- Attached garages are required to be protected by fire sprinklers regardless of the type of design of this system.
- An NFPA 13D system for single family dwellings over 3,600 square feet in size shall have an inspector's test valve located at the furthest distance from the system riser.
- Overhead Fire sprinkler shop drawings are to be submitted directly to the Central County Fire Department at 1399 Rollins Road, Burlingame **only after commercial fire sprinkler undergrounds have been submitted and approved by the Burlingame Building Department.**
- NFPA 13D systems shall have a double check valve assembly device installed in-line of the sprinkler riser and verified at rough-in inspection. If the system is installed as a loop system and passive purge design, a double check valve assembly device is not required.
 - Exception: City of Millbrae Water Department does not require double check valve assembly.
- For existing fire sprinkler systems being modified, the Burlingame Water District may require backflow prevention requirements be brought up to code. Underground backflow prevention devices shall be relocated above ground, exposed OS&Y's shall be electronically monitored by and alarm system.
- For underground piping requirements and submission please consult the following:
 - NFPA 24
 - In Burlingame: Water Department (650) 558-7682 & Engineering Department (650) 558-7230.
 - In Hillsborough: Water Department (650) 375-7517 & Engineering Department (650) 375-7488.
 - In Millbrae: Water Department (650) 259-2385 & Engineering Department (650) 259-2339