



## VANCOUVER FIRE DEPARTMENT Fire Code Interpretation



**SUBJECT:** 13R FIRE SPRINKLER SYSTEMS – EXTERIOR CLOSETS

**INTERPRETATION DATE:** October 27, 2017

**OWNER:** Fire Marshal

### **INTENT:**

To clarify fire sprinkler coverage requirements for exterior closets containing mechanical equipment such as washers & dryers and/or heating equipment such as furnaces and water heaters.

### **1.0 CODES INTERPRETED**

- 1.1 NFPA 13R (2016 ed.) A.6.6.4 Closets with washers and dryers, and other heat producing, mechanical equipment, are not considered clothes closets, linen closets, or pantries and therefore would require sprinklers.
- 1.2 NFPA 13R (2016 ed) 6.6.7 Sprinklers shall not be required in closets (regardless of size) on exterior balconies and exterior breezeways/corridors, regardless of size, as long as the closet does not have doors or unprotected penetrations directly into the dwelling unit.

### **2.0 DISCUSSION**

- 2.1 The City of Vancouver Fire Department has responded to numerous residential fires that originated at heat producing equipment.
- 2.2 "Fire in the United States 2006-2015 (19th Edition) indicates that "heating malfunction", "electrical malfunction" and "equipment malfunction" account for approximately 20% of residential fire causes.
- 2.3 The concept of providing sprinklers in closets containing equipment inside the dwelling space is present in the standards. The locations of these exterior closets are adjacent to a potential path of egress.
- 2.4 The NFPA Standards assume a 1-hour rated separation between the exterior closet and the living space.
- 2.5 Without a fire rated fenestration separation, it is not truly separated from the dwelling space.

### **3.0 INTERPRETATION**

- 3.1 The City of Vancouver requires sprinkler coverage in all exterior closets containing washers, dryers, furnaces, water heaters, or sources of potential fire ignition where an automatic self-closing fire rated door assembly is not installed, or the fire rated construction is compromised.