



Automatic Sprinklers: Sprinkler Guards

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Learning Objective: The student shall be able to identify requirements for listed sprinkler guards.

NFPA 13, *Standard for the Installation of Sprinkler Systems*, includes this very simple statement: “Sprinklers subject to mechanical injury shall be protected with listed guards.”

What is a guard and what is so important about its listing?

Sprinkler guards are metallic “cages” designed to protect the sprinkler, but not interfere with its water discharge pattern. Therefore, it is important to remember that the guards must be matched to the sprinkler that is installed because not every manufacturer’s sprinkler guard is listed for the wide variety of automatic sprinklers that are installed.

Sprinkler guards should be installed anywhere an automatic sprinkler might be damaged due to impact. Sometimes these locations are obvious, such as when the sprinklers are installed in low ceilings, in industrial workrooms, under stairs, in mechanical spaces, or within rack storage arrays. At other times, the location may not be so obvious, such as in a school gymnasium where an errant ball might damage the sprinkler.

Equally important to the listing is how and when the guard is installed. In some cases, sprinkler guards may be installed as a retrofit—after the sprinklers are in place—and at other times (especially with some wet-pendent sprinklers) they should be mounted before the sprinkler during initial installation and prior to applying any pipe-joint compound or tape to the external threads of the sprinkler.

Since installation timing may be important, the designer, plan reviewer, inspector, and installer may have to anticipate in the early phases of design and installation where listed guards should be installed. If possible, that information should be communicated among all parties before the sprinkler system is ready for final inspection and commissioning.

Always refer to manufacturer’s installation guidelines for proper sprinkler guard positioning.

For additional information, refer to NFPA 13, Chapter 6.



This red sprinkler guard is intended to protect the sprinkler from inadvertent impact.

