

MODEL EC-25

Extended Coverage Upright Sprinklers

**196 ft² (18 m²)
Storage Protection**

**30 ft (9,1 m) Ceiling-Only
Protection of Retail Stores**

**Suppression Performance
with Low Water Demand**



Features & Benefits:

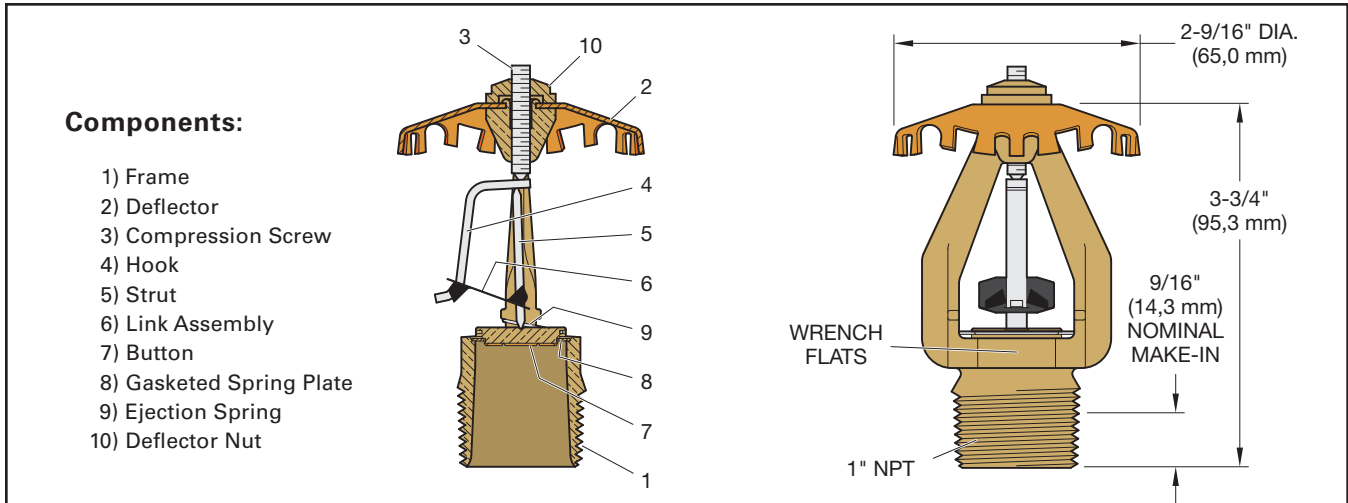
- // Suppression performance with 14 x 14 ft (4.3 x 4.3 m) spacing
- // 35 ft (10,5 m) Ceiling-only protection of cartoned unexpanded plastic
- // Favorable obstruction rules

The Model EC-25 upright sprinkler is UL Listed and FM Global Approved Extended Coverage (EC) sprinkler designed for 196 ft² (18 m²) coverage area. This sprinkler has a fast response link and larger water droplets necessary for high performance fire suppression. In addition, it introduces more installation flexibility by allowing spacing, beyond the 12 ft maximum allowed for standard coverage sprinklers.

Tyco worked as a member of the Retail Fire Research Coalition led by a top engineering and consulting firm that was representing large retail chains that had unique shelving arrangements, combined with bulk storage above the customer picking area.

These configurations would have been considered “solid shelving” under NFPA 13 guidelines requiring multiple levels of in-rack sprinklers. The Tyco Model EC-25 upright sprinkler overcame these challenging configurations resulting in the ceiling-only design criteria of NFPA 13 Chapter 20.3 Sprinkler Design Criteria for Retail Stores.

The Model EC-25 has been tested for applications beyond density/area and retail applications delivering suppression performance. This performance could be achieved with design criteria using as few as 6 sprinklers, significantly reducing total system water.



COMMODITY SELECTION AND DESIGN CRITERIA OVERVIEW FOR MODEL ESFR-25 PENDENT SPRINKLERS

Application	NFPA 13	FM Global
Palletized, Solid Piled storage of Class 1 through Class IV Commodities	NFPA 13 Chapter 21	8-9
Palletized, Solid Piled storage of cartoned unexpanded plastic	NFPA 13 Chapter 21	8-9
Palletized, Solid Piled storage of exposed unexpanded plastic	NFPA 13 Chapter 15 Density/Area	8-9
Palletized, Solid Piled storage of cartoned and exposed expanded plastic	NFPA 13 Chapter 15 Density/Area	8-9
Open frame rack storage of Class 1 through Class IV Commodities	NFPA 13 Chapter 21	8-9
Open frame rack storage of cartoned unexpanded plastic	NFPA 13 Chapter 21	8-9
Open frame rack storage of exposed unexpanded plastic	NFPA 13 Chapter 17 Density/Area	8-9
Open frame rack storage of cartoned expanded plastic	NFPA 13 Chapter 17 Density/Area	8-9
Open frame rack storage of exposed expanded plastic	Outside the Scope of NFPA 13 Chapter 17	8-9
Idle Pallet	NFPA 13, Chapter 12 Density/Area	8-24
Rubber Tire	NFPA 13, Chapter 18 Density/Area	8-3
Ignitable Liquid Storage	NFPA 30	7-29
Roll Paper Storage	NFPA 13 Chapter 19 Density/Area	8-21
Carpet Storage	NA	8-30
Non-Storage Applications	NA	3-26

N/A = Not Applicable

In all cases, the Tyco Technical Data Sheet TFP213 and the appropriate NFPA and FM installation standard, or other applicable standard, must be referenced to ensure applicability and to obtain complete installation guidelines. The general guidelines in this document are not intended to provide complete installation criteria and are subject to change without notice.

Always refer to the Technical Data Sheet TFP213 and our general T & C of sale for complete description of all listing criteria, design parameters, installation instructions, care and maintenance guidelines, and other terms such as our limited warranty.