

SUBMITTED PRODUCT :

**FLEXIBLE SPRINKLER HOSE WITH FITTINGS**

Rated Pressure, psi	<b>175</b>
Maximum Ambient Temperature, °F	<b>150</b>
Largest Sprinkler K-factor for 1/2 in. outlet	<b>5.6GPM</b>
Wet System, Dry System, or Both	<b>Both</b>
Minimum Bending Radius, mm	<b>125</b>
Flexibility	<b>Limited Flexibility – 100 cycles</b>
Internal Diameter of Hose, mm	<b>21</b>

Model	Length, mm	Hose Type	Inlet Type	Outlet Type	Size, (Inlet x Outlet), in.	Maximum Number of 90 Degree Bends
MFJ-S700	700	Unbraided	Straight	Straight	1 x 1/2	<b>1</b>
MFJ-S1000	1000	Unbraided	Straight	Straight	1 x 1/2	<b>2</b>
MFJ-S1200	1200	Unbraided	Straight	Straight	1 x 1/2	<b>3</b>
MFJ-S1500	1500	Unbraided	Straight	Straight	1 x 1/2	<b>3</b>
MFJ-S1800	1800	Unbraided	Straight	Straight	1 x 1/2	<b>3</b>

# INSTALLATION INSTRUCTIONS

## for Flexible sprinkler hose with fittings

### 1. General

Before installing Flexible sprinkler hose fittings the installer must read this Installation Instructions carefully and install it accurately. This instruction is in accordance with **NFPA 13 (Standard for Installation of Sprinkler Systems)**, **NFPA13D (Standard for Installation of Sprinkler Systems in Residential Occupancies up to Four Stories in Height)** and **NFPA 13R (Standard for Installation of Sprinkler Systems in One and Two Family Dwellings and Manufactured Homes)**.

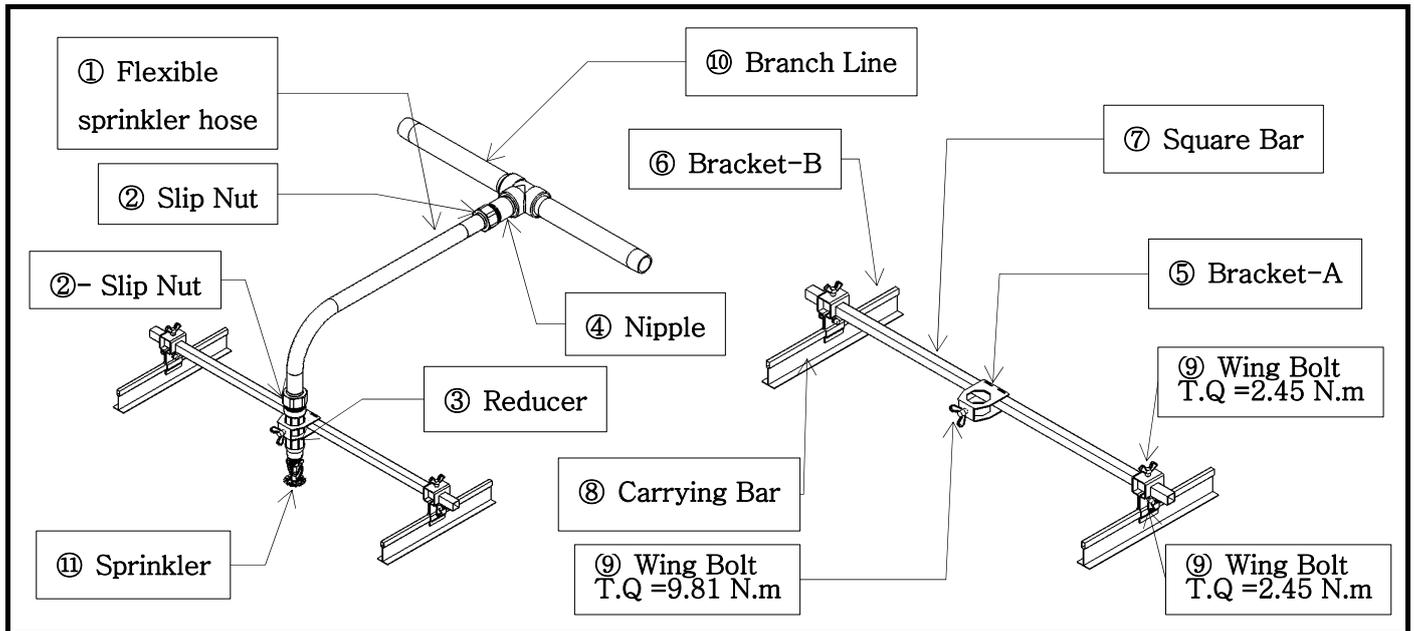
### 2. Technical Information

- a. Largest K-factor and orifice diameter of sprinkler intended to be connected to the fitting; 5.6GPM, 11.3mm
- b. Lengths of available flexible sprinkler hose with fittings; 1800mm
- c. Equivalent length values of the assemblies; for Schedule 40 pipe (C=120)

Model (Length of hose)	700 mm	1000 mm	1200 mm	1500 mm	1800 mm
Equivalent Length m(ft)	7.0(23)	14.9(49)	19.2(63)	21.9(72)	27.7(91)

- d. Instructions for securing the anchoring components to the building components.  
The installation is intended for use with drop ceilings. Please refer to specific ceiling constructions such as immediate and heavy duty ceilings as described in the Standard Specification for the Manufacture, Performance, and Testing of Metal Suspension Systems for Acoustical Tile and Lay-in Panel Ceilings, ASTM C635 when installed in accordance with the Standard Practice for Installation of Metal Ceiling Suspension Systems for Acoustical Tile and Lay-In Panels, ASTM C636.
- e. Minimum Bending Radius ; 125mm
- f. Pressure Rating ; 175psi
- g. Maximum ambient temperature rating ; 150(°F)
- h. Intended use in wet systems, dry systems or both wet and dry systems ; Both
- i. Indication as to whether the hose and fittings have high flexibility or limited flexibility ; Limited Flexibility – 100cycles
- j. Intended use for direct connection to fire sprinklers – direct connection
- k. The flexible hoses with fitting are to be installed with bends only. Straight orientation is not allowed

### 3. Instructions for attaching the Flexible sprinkler hose with fittings to the anchoring components



<Schemetic of Installation>

- 1) Select the appropriate place where the <sup>11</sup>Sprinkler will be located.  
(distance between the <sup>8</sup>Carrying Bars is 200~800mm)
- 2) The <sup>11</sup>Sprinkler shall be located as close as possible to the center of the distance between the <sup>8</sup>Carrying Bars.
- 3) Put the <sup>7</sup>Square bar into a <sup>5</sup>Bracket-A.
- 4) Loosely combine the <sup>7</sup>Square Bar into the <sup>8</sup>Carrying bars using with two <sup>6</sup>Bracket-B's in such a way that the <sup>7</sup>Square bar to be crossed the location where the <sup>11</sup>Sprinkler is located. Then tighten it carefully by using a hand with a torque of 2.45 N.m (25kgf-cm).
- 5) On one end of the <sup>1</sup>Flexible Hose, connect 1 inch male fitting(PT) of the <sup>4</sup>Nipple to the <sup>10</sup>Branch Line where the sprinkler system piping line(<sup>10</sup>Branch Line) will be connected.
- 6) And connect the <sup>2</sup>Slip Nut of the <sup>1</sup>Flexible Hose to the 1 inch male fitting(PF) by hand-tighten, then tighten it carefully by using a wrench with a torque of 24.50 N.m (250kgf-cm).

- 7) Connect another <sup>②</sup>Slip Nut end(1 inch male fitting(PF)) of the <sup>①</sup>Flexible Hose with a <sup>③</sup>Reducer by hand-tighten, then tighten it carefully by using a wrench with a torque of 24.50 N.m (250kgf-cm).
  
- 8) Bend the connected <sup>①</sup>Flexible Hose with <sup>④</sup>Nipple and <sup>③</sup>Reducer smoothly.  
The <sup>①</sup>Flexible Hose shall not be twisted and the arc shall be large radius(Minimum Bending radius is 125mm). The Maximum number of 90° degree bending is 1~3 according to a length of <sup>①</sup>Flexible Hose.
  
- 9) Insert a <sup>③</sup>Reducer into the <sup>⑤</sup>Bracket-A and loosely tighten wing bolt. Then tighten it carefully by using a hand with a torque of 9.81 N.m (100kgf-cm).
  
- 10) Connect the <sup>⑩</sup>Sprinkler to a <sup>③</sup>Reducer in accordance with the sprinkler manufacturer's installation instructions.