

# AUTOMATIC NON-FREEZE VALVE

MODEL NF6

#### NON-FREEZE DRAIN VALVE OPTION FOR FREE FLOAT STEAM TRAPS

#### **Benefits**

Automatic drain valve for prevention of steam trap freeze-up. Reliably drains residual condensate when provided on traps.

- 1. NF6 opens to drain residual condensate shortly after the shut-off of steam-using equipment when steam pressure in the trap decreases to approximately 3 psig.
- 2. NF6 closes steam-tight immediately after start-up of the steam-using equipment when steam pressure in the trap rises to approximately 5 psig.
- 3. The normal operation of the steam trap is unaffected by the NF6.
- 4. Built-in screen protects valve from clogging.
- 5. Valve seat and disk are stainless steel for long life.



# **Specifications**

| Model                              |     | NF6             |  |
|------------------------------------|-----|-----------------|--|
| Connection                         |     | Screwed BSPP(G) |  |
| Size (in)                          |     | 1/4             |  |
| Maximum Operating Pressure (psig)  | PMO | 285             |  |
| Maximum Operating Temperature (°F) | TMO | 428             |  |
| Maximum Allowable Pressure (psig)  | PMA | 285             |  |
| Maximum Allowable Temperature (°F) | TMA | 428             |  |
| Valve Opening Pressure (psig)      |     | арргох. 3       |  |
| Valve Closing Pressure (psig)      |     | approx. 5       |  |

Connections and sizes in bold are standard

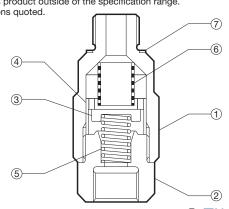


- Freezing occurs from the outlet side. When installing outlet piping, do not use thin-walled tubing.
  Use a short, thick-walled pipe discharging to atmosphere.
- 2. When used in extreme cold, due to the possibility of freezing while discharging, prevention of freezing cannot be guaranteed.

To avoid abnormal operation, accidents or serious injury, DO NOT use this product outside of the specification range. Local regulations may restrict the use of this product to below the conditions quoted.

| No.     | Description      | Material        | ASTM/AISI* | JIS    |
|---------|------------------|-----------------|------------|--------|
| 1       | Body             | Brass           | B16 C36000 | C3604  |
| 2       | Valve Seat       | Stainless Steel | AISI303    | SUS303 |
| 3       | Valve Disc       | Stainless Steel | AISI303    | SUS303 |
| 4       | Valve Disc Guide | Brass           | B16 C36000 | C3601  |
| <u></u> | Coil Spring      | Stainless Steel | AISI304    | SUS304 |
| 6       | Screen           | Stainless Steel | AISI304    | SUS304 |
| 7       | Gasket           | Copper          | B152       | C1100P |





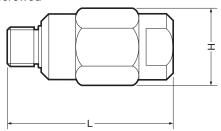
Copyright © TLV



## **Consulting & Engineering Service**

## **Dimensions**

NF6 Screwed

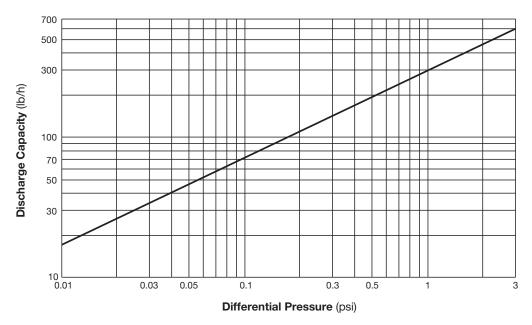


## NF6 Scrowed\*

| INI O Screwe | (in) |                               |             |
|--------------|------|-------------------------------|-------------|
| Size         | L    | Н                             | Weight (lb) |
| 1/4          | 2    | <sup>15</sup> / <sub>16</sub> | 0.19        |
|              |      |                               |             |

<sup>\*</sup> Thread: Inlet BSPP(G) 1/4 male, Outlet BSPP(G) 1/4 female, other standards available

## **Discharge Capacity**



- 1. Differential pressure is the difference between the inlet and outlet pressure of the valve.
- 2. The chart is applicable to condensate below 212 °F.



The amount of condensate discharged after opening the valve will vary according to the conditions affecting the condensate entering the product.



DO NOT DISASSEMBLE OR REMOVE THIS PRODUCT WHILE IT IS UNDER PRESSURE. Allow internal pressure of this product to equal atmospheric pressure and its surface to cool to room temperature before

disassembling or removing. Failure to do so could cause burns or other injury. READ INSTRUCTION MANUAL CAREFULLY.

## TLV: CORPORATION

13901 South Lakes Drive, Charlotte, NC 28273-6790

Phone: 704-597-9070 Fax: 704-583-1610

E-mail: tlv@tlvengineering.com

For Technical Service 1-800 "TLV TRAP"



Manufacturer

Kakogawa, Japan

is approved by LRQA Ltd. to ISO 9001/14001





ISO 9001/ISO 14001