

INSTALLATION AND SERVICE MANUAL

# EMERGENCY VALVE

EM-\*\*\* SERIES

(former "AS-\*\*\*" SERIES)

FUJI ENGINEERING CO.,LTD.

## 1. OVERVIEW

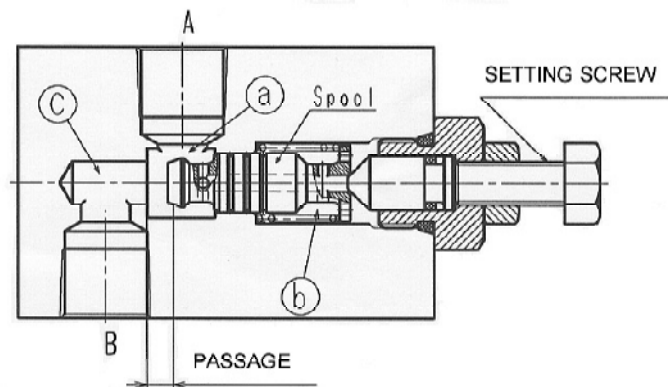
This valve automatically shut the flow in the direction from port A to port B by the flow resistance when the hose or pipe connected to port B is broken.

## 2. SPECIFICATIONS

Model	Port size	Max. setting flow rate (Litre/min)	Max.pressure (MPa)	Net weight (kg)
EM-03T · G	03 (3/8)	50	35	1.5
EM-04T · G · F	04 (1/2)	80		2.6
EM-06T · G · F	06 (3/4)	120		4.7
EM-10F	10 (1-1/4)	350		16
EM-12F	12 (1-1/2)	500		25

## 3. WOKING PRINCIPLE

As illustrated in the strucutal drawing, this valve shuts the fluid that flows in the direction from port A to port B, when the flow rate exceeds the rate set by the setting screw. Because flow resistance causes in the chamber (a), the pressure in the chamber (b) will be the same as chamber (a). Then the pressure in chamber (b) will be higher than chamber (c). Thus the spool is pushed to left, overcoming the spring tension force, which shuts the passage between port A and port B.



## 4. HANDING INSTRUCTIONS

(Setting)

Turn the setting screw counterclockwise (CCW) to find the position where "EM-\*\*\*" does not shut the circuit. Lock the screw using the lock nut. After this setting, flow

the fluid at the rate over this setting to confirm that “EM-\*\*\*” shuts the circuit as expected.

Place your purchase order indicating the setting rate. “EM-\*\*\*” will be set at our factory before shipping.

Example: Model EM-06T-80      Set rate 80 Litre / minute

(Connection)

“EM-\*\*\*” shuts the flow in the direction from port A to port B.

“EM-\*\*\*” allows the free flow in the direction from port B to port A.

(How to Reset this Valve)

Turn the pump on. Then, the pressure of the port B is higher. Now, this valve is reset.

## 5. NOTES ON HANDLING

- a) Understand the difference between port A and port B.
- b) Lock the setting screw using the lock nut.
- c) Keep regularly scheduled maintenance on fluid in order to avoid malfunction of “EM-\*\*\*” which is caused by contamination. It is strongly recommended that you confirm once in one or two months whether the “EM-\*\*\*” operates expectedly or not.

= WARNING=



Pay special attention to injury and damage to human body when you install “EM-\*\*\*” to the hydraulic system and after the installation to the hydraulic system. Take all possible actions to avoid personal injury or damage when you approach the hydraulic system and/or table lifter(s) before, during and after the installation.