



SERIES "HMB" "HYDRAULIC" MASTER RELAY

OPERATION

The BWB "HMB" is a 3 way, normally closed, pilot operated, manual reset relay with manual lockout. It is normally installed near an actuator or in a control panel, and receives hydraulic or pneumatic instrument pressure (Port P) from a safety system component such as a sensing device.

During normal operation, The knob or indicator is manually pulled out, allowing instrument pressure (Port P) to hold the relay in the open position; supply pressure (Port B) passes through the outlet (Port C), and on to the actuator or system.

When the sensing device is actuated, it will bleed the instrument pressure (Port A) from the relay and the spring will push the relay into the closed position; supply pressure (Port B) becomes blocked while, the outlet (Port C) is exhausted through (Port A), thus closing the actuator or system.

Should supply pressure (Port B) be required to open the actuator or system before instrument pressure (Port P) is returned, the lockout assembly may be used. The knob or indicator is manually pulled out and the lockout stem engaged. This allows supply pressure (Port B) to pass through the outlet (Port C) and on to the actuator or system. When instrument pressure (Port P) is returned the lockout stem will automatically release and the relay will resume normal operating conditions.

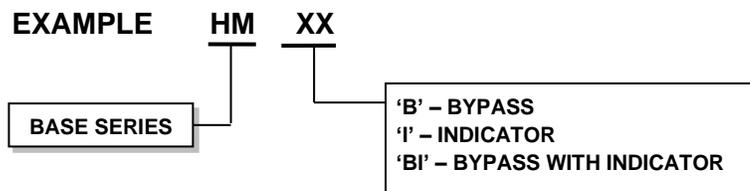
FEATURES

- 316 Stainless Steel Materials
- 100 PSI (6.89 bar) MAWP Pilot Pressure
- 150 PSI (10.34 bar) MAWP Thru Pressure
- 1/4" FNPT Threaded Ports
- Can be changed from OCS to CCS by moving O-ring (16) into the top groove on Lower Spool (4). (See figure 1-1)
- Inlet to Outlet Orifice Size : .250" (6.35mm)
- Outlet to Exhaust Orifice Size: .250" (6.35mm)

SERVICE CLASSIFICATION

Standard service: Buna Low Temp O-rings
Temperature range available upon request
Special Service: O Ring compounds to Customer Requirements

ORDERING INFORMATION



PANEL MOUNT

1 - 9/16" (33.32 mm) Diameter Hole
Maximum Panel Thickness, 0.25 Inches (6mm)

WEIGHTS

HM - 3.5 POUNDS

ALL OTHER WEIGHTS ARE AVAILABLE UPON REQUEST



INSTALLATION



Exhaust Port

PORT 'A'



Supply Inlet
30-150 PSI (2.06-10.34 Bar)
Normally Closed

PORT 'B'



Supply Outlet
30-150 PSI (2.06-10.34 Bar)

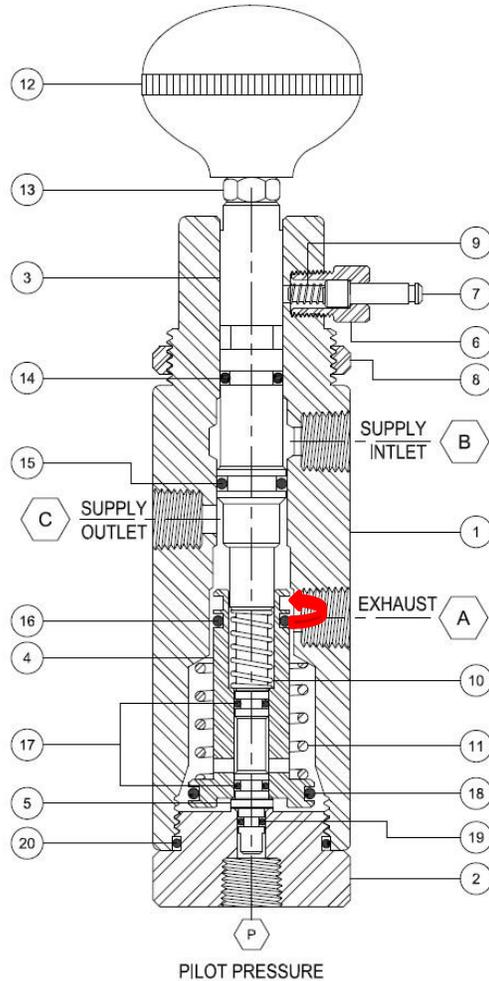
PORT 'C'



Pilot Port
30 to 100 PSI (2.06 - 6.89 Bar)

PORT 'P'

FIGURE 1-1



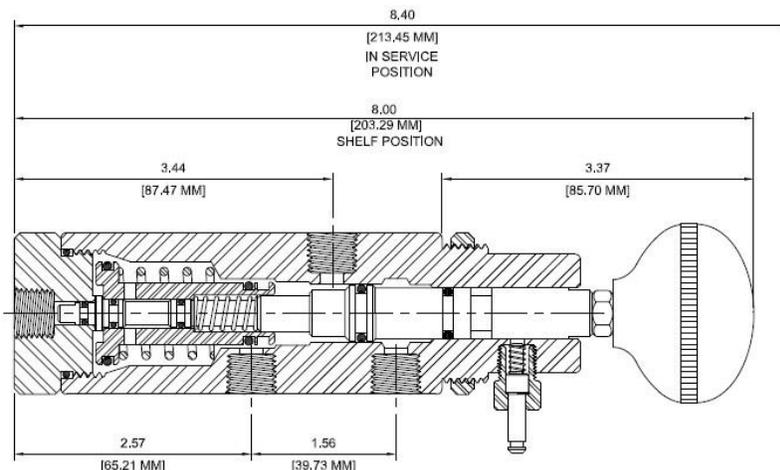
ITEM DESCRIPTION

- | ITEM | DESCRIPTION |
|------|-------------|
| 1 | BODY |
| 2 | CAP |
| 3 | UPPER SPOOL |
| 4 | LOWER SPOOL |
| 5 | INNER SPOOL |
| 6 | BYPASS BODY |
| 7 | BYPASS PIN |
| 8 | PANEL NUT |
| 9 | SPRING |
| 10 | SPRING |
| 11 | SPRING |
| 12 | KNOB |
| 13 | NUT |
| 14 | O-RING |
| 15 | O-RING |
| 16 | O-RING |
| 17 | O-RING |
| 18 | O-RING |
| 19 | O-RING |
| 20 | O-RING |

REPAIR KIT(S):

CONTAINS ALL SEALS

DIMENSIONS



Please note that Warranty and Repair Kit information on BWB Products are located on our website

Designed and Manufactured using Safe Engineering Practices