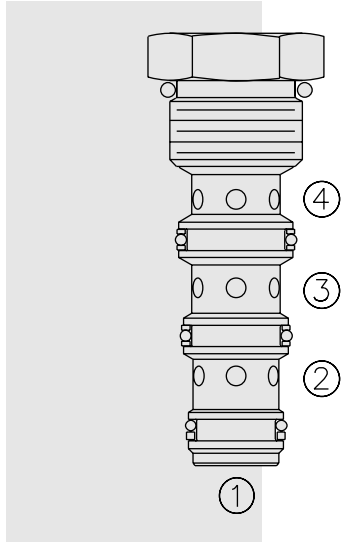
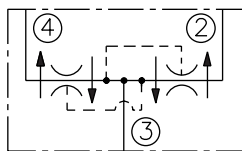


## FD10-45 Flow Divider/Combiner, Heavy Duty,

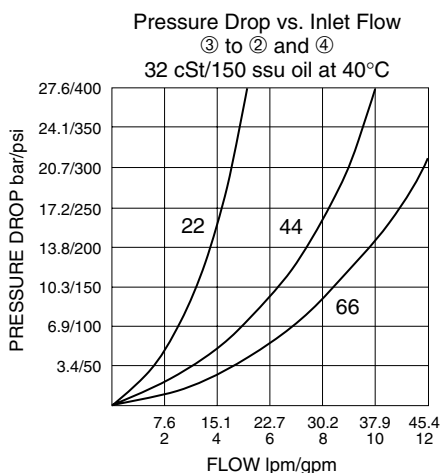


### SYMBOLS

#### USAS/ISO:



### PERFORMANCE (Cartridge Only)



### DESCRIPTION

A heavy duty, multifunction, screw-in, cartridge-style, spool-type flow divider/combiner.

### OPERATION

In the dividing mode, the **FD10-45** will divert input flow from port ③ to ports ② and ④, based on the ratio specified, regardless of operating pressure. When the flow direction is reversed the valve will combine flows from ② and ④ to port ③.

The **FD10-45** provides synchronizing flow in both the dividing and combining modes at “bottomed” conditions in cylinder applications and at “stalled” conditions in motor applications.

### FEATURES

- Hardened parts for long life.
- Quiet, modulated response.
- Wide operating flow range.
- Synchronizing in dividing and combining modes.
- Industry common cavity.

### RATINGS

**Operating Pressure:** 240 bar (3500 psi)

#### Flow Options:

Input Flow: 15.1 lpm (4 gpm); Ratio: 50:50; Model Code: 22

Input Flow: 22.7 lpm (6 gpm); Ratio: 50:50; Model Code: 33

Input Flow: 34.1 lpm (9 gpm); Ratio: 50:50; Model Code: 44

Input Flow: 45.4 lpm (12 gpm); Ratio: 50:50; Model Code: 66

**Flow Accuracy:** 10% from 25–100% of maximum rated flow

**Temperature:** -40 to 120°C

**Filtration:** See page 9.010.1

**Fluids:** Mineral-based or synthetics with lubricating properties at viscosities of 7.4 to 420 cSt (50 to 2000 ssu)

**Installation:** No restrictions; See page 9.020.1. Note: Standard 10 size 4-way bodies should not be used with this product. See page 8.010.1 for special flow divider bodies.

**Cavity:** VC10-4 (Variation “A”); See page 9.110.1

**Cavity Tool:** CT10-4X; See page 8.600.1

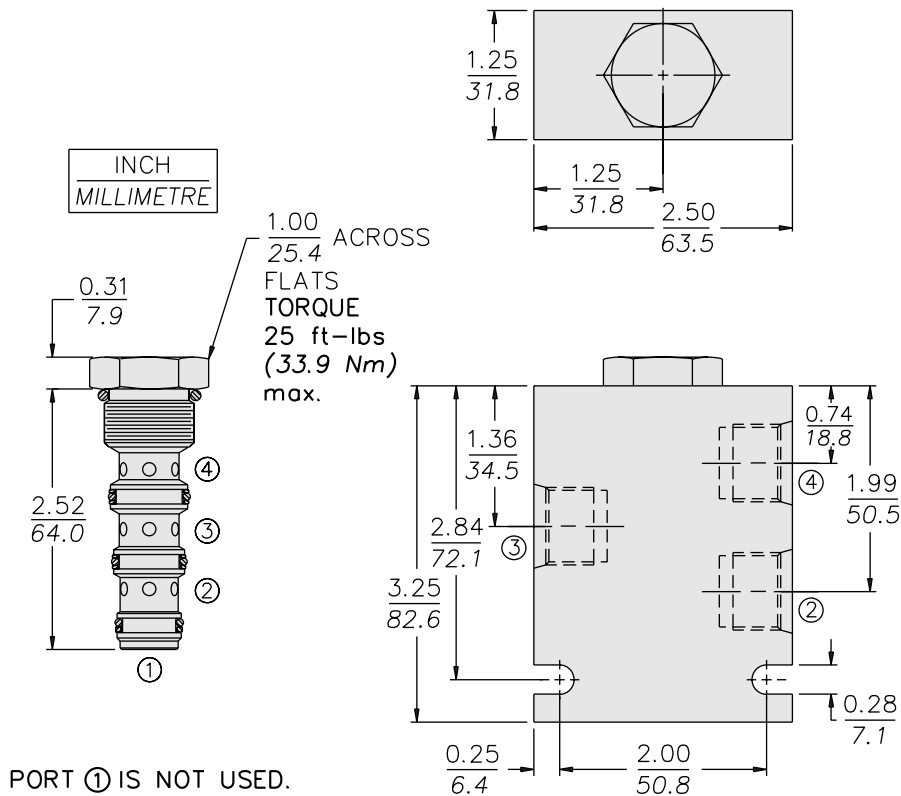
**Seal Kit:** SK10-4X-MMT; See page 8.650.1

**Note:** This new FDxx-45 flow divider incorporates the features of the older FDxx-40, FDxx-41 and FDxx-42 flow dividers in one product. It is designed to supersede the older models. OEM's are encouraged to consider this newer, more robust and versatile model for new applications.

# Multifunction

# FD10-45

## DIMENSIONS



## MATERIALS

**Cartridge:** Weight: 0.10 kg. (0.23 lbs.); Steel with hardened work surfaces. Zinc-plated exposed surfaces. Buna N O-rings and polyester elastomer back-ups standard.

**Special Ported Body:** Weight: 0.34 kg. (0.75 lbs.); Anodized high-strength 6061 T6 aluminum alloy, rated to 240 bar (3500 psi); See page 8.010.1. Ductile iron and steel bodies available; consult factory.

## TO ORDER

FD10-45 -

### Special Ported Bodies

- Cartridge Only **0**
- SAE 6 (All Ports) **6T**
- SAE 8 ③; **8D**
- SAE 6 ② & ④
- 1/4 in. BSP\* (All Ports) **2B**
- 3/8 in. BSP\* (All Ports) **3B**
- 1/2 in. BSP\* ③; **5B**
- 3/8 in. BSP\* ② & ④

\*BSP Body; U.K. Mfr. Only

NOTE: Standard 10-size 4-way bodies should not be used for flow dividers. See special flow divider bodies, page 8.010.1.

### Dividing/Combining Ratio

- 22** 50:50 rated @ 15.1 lpm (4 gpm) input
- 33** 50:50 rated @ 22.7 lpm (6 gpm) input
- 44** 50:50 rated @ 34.1 lpm (9 gpm) input
- 66** 50:50 rated @ 45.4 lpm (12 gpm) input

NOTE: Additional ratios and/or input flow sizings available for OEM applications. Consult factory.

### Seals

- N** Buna N (Std.)
- V** Fluorocarbon