

# STBP ROUND ELECTRONIC BYPASS DAMPER

## SUBMITTAL



## Round Electronic Bypass Damper with Integrated Static Pressure Control (Part # STBP)

### DESCRIPTION

The **Electronic Bypass Damper** includes a factory mounted actuator and electronic static pressure controller used to control static pressure in zoned systems. The Electronic Static Pressure Control is adjustable, controlling a modulating bypass damper to maintain static pressure as zone dampers modulate. The bypass system reduces air noise from the supply outlets caused by excessive air velocity.

When the system is satisfied, the bypass damper will remain 25% open, if intermittent fan is used. On systems utilizing continuous fan operation, bypass will modulate based on system static. Bypass controller is adjustable to maintain static pressure range from .15" - .95" W.C. The Integrated Static Pressure Control (**IPC**) includes a quick start option or may be field adjusted to specified static pressure.

The electronic bypass is a modulating damper used for bypass applications. Bypass dampers are available from 6" - 18" round and 10x10 - 40x30 rectangular, with a maximum pressure differential of 1.75" W.C.

The 6"-10" damper cylinders are fabricated from 22 gauge steel; the 12"-18" cylinders from 20 gauge steel. Each cylinder features two rolled beads, which provide maximum structural integrity. A positive air seal is accomplished through the use of a high-density foam gasket around the blade perimeter. The damper blade is bolted to a hexagonal damper shaft.

Bypass Dampers feature 24V ac actuator. The integrated electronic pressure controller operates the motor, and each actuator hat section is insulated to prevent condensation.

Bypass Dampers can be paralleled or slaved to provide additional bypass CFM when required. If slaving two or more bypass dampers, consider utilizing a larger rectangular bypass.

### TECHNICAL DATA

#### Electronic Integrated Bypass Damper

##### **Electrical:**

**Supply voltage:** 24vac

**Power consumption:** 2.3va

Input: 24vac

Outputs:

- 24vac (Run open)
- 24vac (Run closed)

##### **General:**

**Control Range:** .15" to .95" W.C.

#### By-Pass Damper

##### **Electrical:**

**Supply Voltage:** 24vac

**Power consumption:** 2va maximum (1.5W)

##### **Environmental:**

**Operating temperature:** 20 to 125° F (-7 to 52° C)

**Operating humidity:** Non-condensing

**Storage temperature:** -20 to 130° F (-29 to 54° C)

##### **General:**

**Shell:** 20-22 gauge cold rolled galvanized steel

**Shaft:** 1/2" Hexagonal aluminum

**Bushings:** Celcon

**Actuator:** Belimo

**Stroke:** 90°

**Pressure drop:** < .04" W.C. @ rated CFM

Rev 10/5/12

# STBP ELECTRONIC BYPASS DAMPER

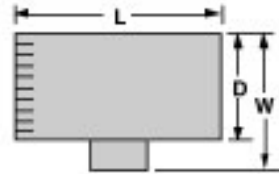
## TYPICAL CAPACITIES

Round Bypass Selection Table

Diameter	CFM
8"	560
10"	900
12"	1250
14"	1700
16"	2200
18"	2600

Dimensional Data

Part #	Diameter	Length	Width
STBP08	8"	10"	11"
STBP10	10"	12"	13"
STBP12	12"	14"	15"
STBP14	14"	16"	17"
STBP16	16"	18"	19"
STBP18	18"	20"	21"



## SENSOR LOCATION

