

DEBEM

Model EQ 51 Automatic Diaphragm Pulsation Dampener

Use with MID, CU15 & MICR Air Operated Diaphragm Pumps

DESCRIPTION

EQ 51 automatic diaphragm pulsation dampeners feature solid construction and high performance. They are fitted to the discharge line of diaphragm pumps in order to smooth pulsating flows and can be used with liquids having high apparent viscosity even if containing suspended solids of considerable size.

EQ 51 dampeners automatically adapt to system conditions without the need for manual adjustment or calibration. The ability to minimize pulsations, vibrations and water hammer means that this component provides excellent protection and smooth system flow.

The huge choice of construction materials allows selection of optimum chemical compatibility with the fluid and/or environment without neglecting the temperature range.

Dampeners are also available for use in potentially explosive atmospheres (ATEX certification).

SPECIFICATIONS

Body Materials: PP, PVDF, PPS-V

Process Connection: 3/4" NPT Female

Air Connection: 1/4" NPT Female

Max. Air Supply Pressure: 7 bar (102 PSI)

Net Weight: PP, 0.5 Kg; PVDF, 0.5 Kg; PPS-V, 0.5 Kg

Max Temperature: PP, 60°C (140°F); PVDF & PPS-V, 95°C (203°F)

ATEX Ratings:

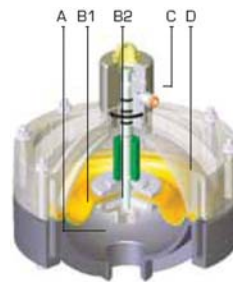
STANDARD version: Made from non-conductive plastic and/or with non-conductive center casing or from metal with non-conductive center casing.

ATEX Classification ⓂII 3/3 GD c IIB T135°C (for zone 2)

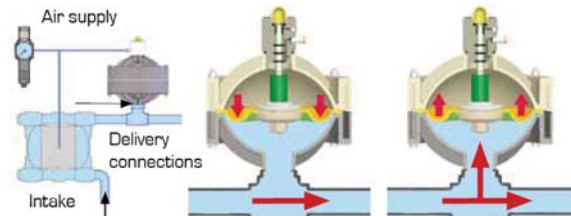
CONDUCT version: Built with pump casings and/or manifolds (PP + carbon fiber, ECTFE/PVDF + carbon fiber), made from conductive plastic and metal materials (aluminium, stainless steel). ⓂII 2/2 GD c IIB T135°C (for zone 1)



EQ51 Polypropylene



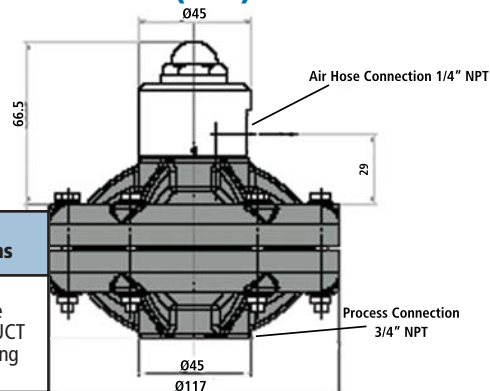
- A = expansion opening
- B1 = air-side diaphragm
- B2 = fluid-side diaphragm
- C = automatic pneumatic valve
- D = compressed-air chamber



HOW IT WORKS

The compressed air entering the back-pressure chamber behind the diaphragm creates a pneumatic cushion that adjusts automatically to compensate the shock produced by the pressure pulse of the fluid generated by the pump.

DIMENSIONS (MM)



Dampener Model	Use With Pump Model	Pump Housing Material
EQ51P (Polypropylene)	MID, CU15, MICR	PP
EQ51F (PVDF+CF)	CU15	ECTFE
	MICR	PVDF & AISI316
EQ51R (PPS-V)	MICR	ALUMINUM

ORDERING INFORMATION

ABCDE

Example: EQ51PHT

A Model	B Dampener Body	C Air Side Diaphragm	D Fluid Side Diaphragm	E Options
EQ51	P= PP FC= PVDF+CF R=PPS-V	*H= Hytrel® M= Santoprene® *Hytrel not available with PVDF dampener body	T= PTFE	-= None C= CONDUCT ATEX Rating