

Pressure Control Equipment: Pulsation Dampeners



**APPLICATIONS
& BENEFITS**

Flowguard pulsation dampeners extend pump life and enhance piping system performance by controlling pressure and flow pulsations. Well-suited for common high pressure requirements including methanol, corrosion and wax inhibitor injection, Flowguard dampeners offer the best quality available for chemical injection and smaller-flow industrial applications.

When installed immediately downstream of reciprocating and other positive displacement pumps, Flowguard dampeners allow smooth, steady flow of fluid and reduced pipe vibration and noise. Additionally, Flowguard pulsation dampeners:

- Increase pump efficiency by allowing greater pump speeds, yielding higher flow rates.
- Increase system capacity. Smooth pipes can handle greater flow without changing pipework.
- Improve metering, dosing, spraying and mixing applications. Continuous product flow means less slugging, accurate dosing, and even spray patterns and more effective mixing.
- Protect instrumentation from damaging pressure surges while allowing more stable, accurate and reliable readings.
- Prevent cavitation—virtually eliminating acceleration losses where NPSH is low.

KEY FEATURES

Flowguard pulsation dampeners enjoy a long tradition of quality and performance. Offering efficient design, easy maintenance and economical pricing, Flowguard is the dampener of choice for nearly every major metering pump manufacturer. Units are manufactured standard with 316 stainless steel housing, and a wide range of sizes and materials suit most process applications. Flowguard offers:

- **Off-the-shelf delivery** of most sizes and elastomer choices.
- **Short lead times** for most industry specifications and requirements.
- **Elastomeric, PTFE and 316 SS Bellows diaphragm designs** to handle most applications.
- **Custom designs** to suit any temperature, pressure, process liquid compatibility and connection type.

ENGINEERING DATA

FD SERIES

Model	Pressure (psi)	Diameter (inches)	Height (inches)	Weight (lb)
FD 10	870	5.7	6.1	13
FD 20	508	6.9	7.12	18
FD 30	508	8.9	8.3	22
FD 40	508	9.8	9.9	33
FD 50	363	11.8	11.5	42
FD 60	363	14.9	14.25	55
FD 80	363	19.7	18.7	77

FG (DS) SERIES

Model	Pressure (psi)	Diameter (inches)	Height (inches)	Weight (lb)
FG (DS) 10	4406	2.61	5.43	6.6
FG (DS) 20	4435	3.24	6.77	11
FG (DS) 30	3272	3.74	8.82	17.6
FG (DS) 40	2835	4.72	8.86	26.4
FG (DS) 50	1992	4.50	14.69	39.6
FG (DS) 57	1658	5.56	16.34	41.8
FG (DS) 60	858	6.63	16.06	50.6
FG (DS) 70	858	6.63	20.39	55
FG (DS) 80	771	6.63	25.98	105.6

THE FLOWGUARD ADVANTAGE

With off-the-shelf availability, dependable service life and a large selection of standard and custom-engineered designs, Flowguard is the industry choice for chemical injection pump packages. Efficient by design, our units are easy to use, easy to maintain and extremely effective as pulsation dampeners, thermal expansion compensators and surge absorbers for a variety of smaller-flow industrial applications.