



**1** Dampers listed below are from 1000s of "off the shelf" inventory dampers, for preventing pipe systems converting diaphragm changeover pause, into pressure pulses. Prices are tabulated for you at [www.pulseguard.com](http://www.pulseguard.com). Call toll free 1-888-DAMPERS(326-7377) for discounts etc. Choose a damper matching your pump connection size, for standard damping. Or allow us to calculate for you, from your smoothness required and your system data.



When you see a damper or a pump of particular interest, please request literature dedicated to that subject.

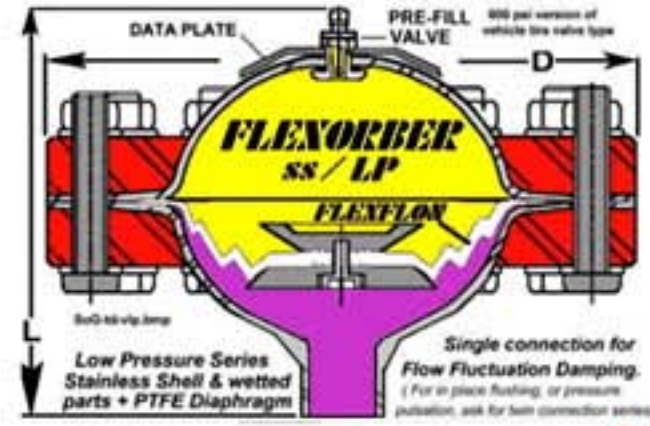
**2.** Where no OSHA requirement for in place flush before service, nor process need for 1st in 1st out, constant temp., change of liquid pumped, interception of pressure pulsation, or preventing sedimentation; use second connection to save a "T" for RV, PI, or System Drain. 2 connection dampers are standard lowest cost.



**Flexorber ss / LP with "FlexFlon" / PTFE diaphragm**  
 Fit, pre-fill, and forget; no continual extra compressor horse power to waste  
 No machined Teflon bellows to keep cracking up. Longer life + lower spares cost.

Please State Material preferences and model Number below when ORDERING :	Connections To Pump to Sys.	Connct. Type	Length Diam		Weight	Vol.	Pres.	Wetted	Spares Kit
			L Inch.	D Inch					
AODD-Sog 15	3/8"x1/4"/M NPT/		6.0	6.5	15	15i	300p	316	DW123BF tfe
AODD-Sog 30	1/2"x3/8"/M NPT/		7.0	7.8	20	30i	300p	316	DW143BF tfe
AODD-Sog 60	3/4"x1/2"/M NPT/		8.0	8.2	19	60i	250p	316	DW175BF tfe
AODD-Sog 150	1.0 /M NPT/		8.5	11.8	28	150i	150p	316	DW223BF tfe
AODD-Sog 230	2.0 /M NPT/		9.3	13.8	56	230i	150p	316	DW268BF tfe
AODD-Sog 350	2.5 /M NPT/		10.5	17	80	350i	150p	316	DW305BF tfe
AODD-Sog Vlp450/+PB10	3.0" x3.0"/37" BW/14.2		18	18	160	450i	200p	316L	DF345 E3 DuPont Teflon
AODD-Sog Vlp900/+PB12	4.0" x4.0"/37" BW/18		24	24	290	900i	150p	316L	DF450 E3 DuPont Teflon

PVDF / TFE coated / lined liquid side shells are available. - these have an ANSI B16.5 face to accept your Kynar or other connection blocks



**CAPACITANCE + DIRECTION CHANGE IMPEDANCE** 4 bolt quick release Twin Connection Flow Through PB pipe base option Normally welded permanently into pipe system



**Flexorber -Plas** The Safety of a metal Cushion Chamber and boltings support, plus the compatibility of plastics & FlexFlon

Please State Material preferences and model Number below when ORDERING :	Connections To Pump to Sys.	Connct. Type	Length Diam		Weight	Vol.	Pres.	Wetted	Spares Kit
			L Inch.	D Inch					
AODD-SoP 30	0.5 x 0.5 FNPT/		7.0	7.8	12	30i	125p	GF-PP	DW143BF tfe
AODD-SoP 75	0.75 x 0.5 FNPT/		7.5	10.9	19	75i	125p	GF-PP	DW187BF tfe
AODD-SoP 150	1.0 x 0.75 FNPT/		9	11.8	25	150i	125p	GF-PP	DW223BF tfe
AODD-SoP 350	1.5 x 1.0 FNPT/		10.5	17	80	350i	125p	GF-PP	DW305BF tfe

**PipeGuard ss / LP** Longer life, Lower cost than Plastic, & safer.

Please State Material preferences and model Number below when ORDERING :	Connection to Sys.	Connct. Type	Length Diam		Weight	Vol.	Pres.	Wetted	Spares Kit
			L Inch.	D Inch					
AODD-PigLPss 15	0.5	F npt	7.5	2.5	5.5	15i	500p	316L	B57x98 ?
AODD-PigLPss 40	1.0	F npt	11.2	3.5	15	40i	500p	316L	B63x190 ?
AODD-PigLPss 100	1.5	M npt	13.3	4.5	23	100i	500p	316L	B98x232 ?
AODD-PigLPss 180	2.0	M npt	16	5.5	32	180i	500p	316L	B123x295 ?
AODD-PigLPss 300	2.5	M npt	22	6.2	55	300i	400p	316L	B139x325 ?
AODD-PigLPss 693	3.0	M npt	24	8.6	78	693i	350p	316L	B195x360 ?

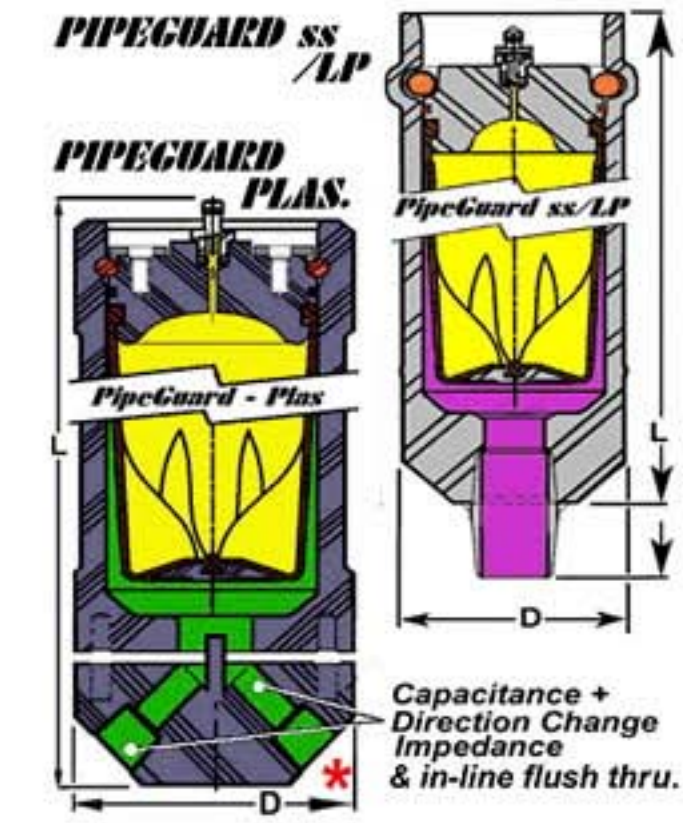
**PipeGuard - Plas** Only for applications in which there is no danger in the event of low temperature impact fracture.

Please State Material preferences and model Number below when ORDERING :	Connections To Pump to Sys.	Connct. Type	Length Diam		Weight	Vol.	Pres.	Wetted	Spares Kit
			L Inch.	D Inch					
AODD-PigPlas 40	0.75 x 0.75 F npt/		12.5	3.5	6	40i	150p	-PP	B63 x190 ?
AODD-PigPlas 90	1.0 x 1.0 Socket/		15	5.3	9	90i	150p	-PP	B98 x232 ?
AODD-PigPlas180	1.5 x 1.5 Socket/		13	7.5	20	180i	125p	-PP	B139x178 ?
AODD-PigPlas488	2.0x2.0 Socket/		22	7.5	23	488i	125p	-PP	B139x420 ?
AODD-PigPlas1000	3.0 Flg Face/		34	8.6	68	1000i	102p	-PP	B195x720 ?
AODD-PigPlas3000	4.0 Flg Face/		37	11	96	3000i	90p	-PP	B250x775 ?

**PumpGuard - Plas or "Clear-Flow" and "PermaCushion" Foam**

Please State Material preferences and model Number below when ORDERING :	Connections To Pump to Sys.	Connct. Type	Length Diam		Weight	Vol.	Pres.	Wetted	Spares Kit
			L Inch.	D Inch					
AODD-Pug 690	2 x 2 Mnpt/		64	6.6	100	3g	200p	316L	T74x58x1562x122 ?
AODD-Pug 1155	3 x 3 150 #/		55	8.6	200	5g	200p	316L	T120x100x1210x190 ?
AODD-Pug 2310	4 x 4 150 #/		45	10.7	350	10g	200p	316L	T120x100x1040x252 ?
AODD-Pug 3465	6 x 6 150 #/		45	12.7	450	15g	200p	316L	T185x165x1040x242 ?
AODD-Pug 4620	8 x 8 150 #/		65	14	950	20g	200p	316L	T239x219x1550x260 ?

A20 = Alloy 20, H22 = Hasteloy 22, Ti2 = Titanium 2, Tan = Tantalum, Zir Zirconium, DSS = Duplex Stainless, SDSS = Super Duplex.  
 \* The question mark "?" = Letters, showing your choice of compatible elastomer, add the letter to ordering PL Nbr. - N=Buna N, E=EP, H=Hypalon, x V=Fluoro-Carbon, x x= addition to cost



\* For piping bases GOTO [http://www.pulseguard.com/pulsation\\_dampening/select\\_smooth\\_percent/flow\\_or\\_pressure/find\\_pump\\_ficalc\\_damper\\_volume/select\\_pipe\\_method/pipe\\_method.htm](http://www.pulseguard.com/pulsation_dampening/select_smooth_percent/flow_or_pressure/find_pump_ficalc_damper_volume/select_pipe_method/pipe_method.htm)