

HDPE TECHNICAL INFORMATION

The following standard PowerSeal products have been evaluated and approved for use with high density polyethylene pipe based upon certain modifications and restrictions related to the unique properties of HDPE pipe compared with more commonly used rigid pipe materials.



Products shown in the HDPE section are the only products suitable for HDPE applications. Do not use products in other sections on HDPE pipe.

PRODUCT RESTRICTIONS WHEN USED WITH HDPE

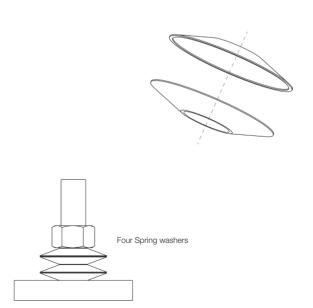
- •Maximum operating pressure: 150 PSI (150 Mpa)
- •Temperatures ranges: 32° 75°F (0° 23.9° C)
- •Manufacturing standard: AWWA/ANSI C906-90
- •Underground service only
- Pipe Stiffeners must be placed in each pipe end when used on mechanical bolt on fittings
- Clamp and sleeve width must exceed pipe diameter
- Pipe SDR (wall thickness) no more than 17 (PN-10)
- •Each bolt must have four spring washers

KEY PROPERTIES INHERENT WITH HDPE

- Toe in happens when HDPE is cut which can alter the ability of any sleeve or saddle to seal and affect the installation of stiffeners.
- The coefficient of thermal expansion is over 10 times that of ductile and steel pipe and 3 times as much as PVC. This equates to the possibility of shrinkage at these same levels versus these types of pipes when it gets cold. This raises the chances of a fitting loosening on it. It also has a tendency to shrink lengthwise 1 inch (25.4mm) per 100 feet (30.48m) of pipe with a 10°F (5.5° C) reduction temperature. This results in the pipe pulling out of fittings.
- A low coefficient of friction makes the exterior surface of the pipe very smooth or slick which results in gasket fittings being prone to rotation or movement on the pipe.
- Pipe systems must be engineered to allow for pipe movements so to limit fittings movement.



All bolts will be supplied with four spring washer.



SPRING WASHERS

NOTICE!!

PowerSeal does not warrant products used when the installation does not conform to any of the restrictions listed above. Contact our engineering department if you have questions about using our products on HDPE.



3414AS-PE ALL STAINLESS WIDE RANGE SADDLE

PANEL & LIFTER BAR: Type 304 (18-8) Stainless Steel per ASTM

A240.

BOLTS & NUTS: T Type 304 (18-8) Stainless Steel per ASTM A193 and A194. NOTE: Hex nuts are furnished with fusion bonded coating to prevent seizing and galling.

WASHERS: Stainless Steel per ASTM A240, type 304. Special spring

type.

LUGS: Type 304 (18-8) Stainless Steel per ASTM A240. **OUTLET:** Type 304 (18-8) Stainless Steel per ASTM A276.

GASKET: NBR per ASTM D2000; Patented TwinSeal® dual o-ring design incorporating both hydrostatic and mechanical forces to affect a dynamic seal.



Nominal	Nominal Pipe Size		Pipe OD Range		Width			List
Inches	MM	Inches	MM	Inches	MM	outlet size	Catalog Number	Price
4	100	4.50 - 5.10	114 - 130	8	200	3/4 CC	3414040075TB-PE	\$ 199.60
						3/4 NPT	3414040075TC-PE	
						1 CC	3414040100TD-PE	
						1 NPT	3414040100TE-PE	
						1 1/4 CC	3414040125TF-PE	\$ 383.00
						1 1/4 NPT	3414040125TG-PE	
						1 1/2 CC	3414040150TH-PE	
						1 1/2 NPT	3414040150TI-PE	
						2 CC	3414040200TJ-PE	
						2 NPT	3414040200TK-PE	
	125	5.54 - 6.14	141 - 156	8	200	3/4 CC	3414050075TB-PE	\$ 269.00
						3/4 NPT	3414050075TC-PE	
						1 CC	3414050010TD-PE	
						1 NPT	3414050100TE-PE	
5						1 1/4 CC	3414050125TF-PE	\$ 386.80
3						1 1/4 NPT	3414050125TG-PE	
						1 1/2 CC	3414050150TH-PE	
						1 1/2 NPT	3414050150TI-PE	
						2 CC	3414050200TJ-PE	
						2 NPT	3414050200TK-PE	
	150	6.63 - 7.23	168 - 184	8	200	3/4 CC	3414060075TB-PE	\$ 282.90
						3/4 NPT	3414060075TC-PE	
						1 CC	3414060100TD-PE	
						1 NPT	3414060100TE-PE	
						1 1/4 CC	3414060125TF-PE	\$ 398.00
6						1 1/4 NPT	3414060125TG-PE	
						1 1/2 CC	3414060150TH-PE	
						1 1/2 NPT	3414060150TI-PE	
						2 CC	3414060200TJ-PE	
						2 NPT	3414060200TK-PE	

3414AS-PE ALL STAINLESS WIDE RANGE SADDLE

Nominal Pipe Size		Pipe OD Range		Width				List
Inches	MM	Inches	MM	Inches	ММ	outlet size	Catalog Number	Price
0	200	8.63 - 9.83	219 - 250	8	200	3/4 CC	3414080075TB-PE	\$ 287.00
						3/4 NPT	3414080075TC-PE	
						1 CC	3414080100TD-PE	
						1 NPT	3414080100TE-PE	
						1 1/4 CC	3414080125TF-PE	\$ 415.00
8						1 1/4 NPT	3414080125TG-PE	
						1 1/2 CC	3414080150TH-PE	
						1 1/2 NPT	3414080150TI-PE	
						2 CC	3414080200TJ-PE	
						2 NPT	3414080200TK-PE	
	250	10.75 - 11.95	273 - 304	8	200	3/4 CC	3414100075TB-PE	\$ 349.60
						3/4 NPT	3414100075TC-PE	
						1 CC	3414100100TD-PE	
						1 NPT	3414100100TE-PE	
10						1 1/4 CC	3414100125TF-PE	\$ 437.50
10						1 1/4 NPT	3414100125TG-PE	
						1 1/2 CC	3414100150TH-PE	
						1 1/2 NPT	3414100150TI-PE	
						2 CC	3414100200TJ-PE	
						2 NPT	3414100200TK-PE	
	300	12.75 - 13.95	324 - 354	8	200	3/4 CC	3414120075TB-PE	\$ 357.60
						3/4 NPT	3414120075TC-PE	
						1 CC	3414120100TD-PE	
						1 NPT	3414120100TE-PE	
12						1 1/4 CC	3414120125TF-PE	\$ 462.10
12						1 1/4 NPT	3414120125TG-PE	
						1 1/2 CC	3414120150TH-PE	
						1 1/2 NPT	3414120150TI-PE	
						2 CC	3414120200TJ-PE	
						2 NPT	3414120200TK-PE	

HOW TO ORDER: Choose nominal pipe size x outlet size and thread configuration. EXAMPLE:8" HDPE O.D. 9.05 with 3/4 CC outlet order 3414AS-PE - 8 x 3/4 CC. **Part Number:** 3414080075TB-PE.