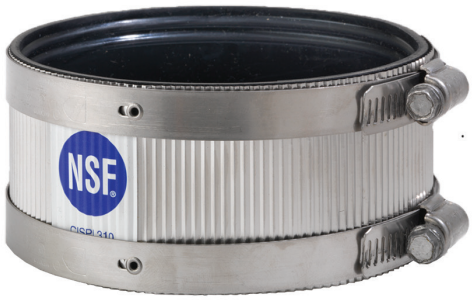
DATE: _____

ARCHITECT: _____ PROJECT: _____

CONTRACTOR: _____ ENGINEER: _____

IDEAL TRIDON CLASSIC NO-HUB COUPLINGS SUBMITTAL



The Ideal Tridon Classic No-Hub Couplings are engineered to connect no-hub cast iron pipe and fittings. These couplings are assembled in Mexico using USA components. The coupling sleeve or gasket is manufactured from a properly vulcanized virgin compound where the primary elastomer is Neoprene. The gasket is housed inside a 300 series stainless steel corrugated shield. Depending on the size of the shield, (2) or (4) 300 stainless steel clamps surround the shield and provide the sealing force. The 5/16" hex-head screws are made from 300 series stainless steel. Sizes range from 1 1/2" – 10" and are designed for both above and below grade installation and in temperature environments from -30F to 220°F. The couplings are designed for installation torque of 60 inch-pounds. The entire coupling is corrosion resistant.

FIND YOUR PART NUMBER

Size (pipe diameter)	Part Number	Number of Clamps	Coupling Width	Installation Torque	Screw Hex Size
1 ½"	621708G	2	2 1/8"	60 inch-pounds (all sizes)	5/16" (all sizes)
2"	621808G				
3"	621908G				
4"	622008G				
5"	622108G	4	3"		
6"	622208G				
8"	622308G		4"		
10"	623008G				
2" x 1½"	62R218G	2			
3" x 2"	62R328G				
4" x 3"	62R438G				

MATERIALS

Components	All Compliant to CISPI 310 and ASTM C1277
Clamp	All 300 Series AISI Stainless Steel (Band and Screw Housing)
Screw	All 300 Series AISI Stainless Steel (5/16" Hex Head / Shoulder)
Shield	All 300 Series AISI Stainless Steel
Rivets	All 300 Series AISI Stainless Steel
Gasket	Elastomeric Compound Primarily Consisting of Neoprene; Meets ***ALL*** Requirements of **ASTM C564**

Coupling Meets **ASTM C1277**

Gasket Meets **ASTM C564**

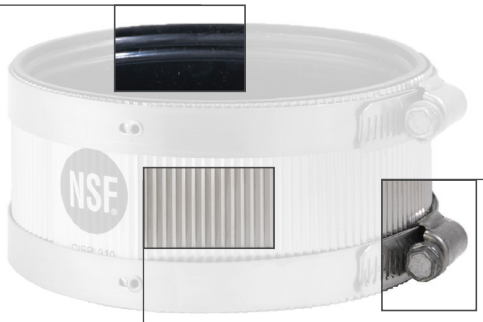
Compliant To **CISPI 310**

IAPMO Listed File # 3198

Meets CSA B602

THE GASKET

Made from high-quality elastomeric compound per ASTM C-564, the Ideal Tridon No-Hub gasket features a laterally-spaced pattern of multiple thick sealing sectors and adjacent groove sectors. When the clamps are tightened, this pattern permits the clamping bands and the shield to form a restriction impeding the movement of the shield relative to the gasket.



THE SHIELD

The 0.007" thick all 300 series stainless steel shield requires less band load to transfer pressure to the gasket, leaving more clamping load in reserve to compress the gasket.

THE CLAMPS

Standard-duty clamps with all 300 series stainless steel construction, featuring 1/2" clamp band in sizes 1 1/2 – 4" and 9/16" wide bands in sizes 5-10 with 5/16" hex-head screws, provide optimum sealing force at 60 inch-pound installation torque.

GASKET PERFORMANCE

Specific material composition requirements, workmanship, and physical testing of mechanical properties of the rubber sealing gasket have been established by ASTM C564 to ensure the prevention of damage caused by the wide varieties of environmental exposure that no-hub coupling products may experience. The specification requires all gaskets to be manufactured from a properly vulcanized virgin compound in which the primary elastomer is neoprene. The proper blend of rubber elastomers have proven effective in these gaskets maintaining their sealing properties throughout hot and cold conditions, ozone, chemical, and solvent exposure, along with the physical strength to resist damage from physical stresses such as foundation settling or other naturally occurring events. Below is a table of physical testing requirements that must be met to ensure the quality, performance, and reliability of Ideal Tridon no-hub coupling products.

TEST	GASKET PHYSICAL TESTING - MINIMUM OR MAXIMUM REQUIREMENTS		ASTM METHOD
Tensile Strength **Elongation** **Durometer**	Tests performed on new samples at room temperature (76°F ± 5°F)	1500 psi minimum 250% elongation before break 70 ± 5 points	D412: @ 20 in/min D412: @ 20 in/min D2240: Shore A
Tensile Strength **Elongation** **Durometer**	Heat-aged sample testing Test after heat aging for 96 hr @ 158°F (± 2°)	No greater than a 15% loss in strength No greater than a 20% loss in elongation before break No greater than a 10-point increase in hardness	D573
Compression Set	Test after heat aging for 22 hr @ 158°F (± 2°) at an induced deflection of 25%	25% maximum compression set after 30-minute recovery	D395: Method B
Oil Immersion	Test after immersion in IRM 903 oil for 70 hr (± 0.7 hr) @ 212°F (± 2°)	80% maximum allowable volume increase	D471
Ozone Cracking	Test and inspect after 100 (± 1) hours exposure in 100 pphm ozone concentration at 104°F (± 2°) while loop mounted to induce approximately 20% elongation.	No visible cracking at 2x magnification of the gasket	D1149: Method B
Tear Resistance	Pull sample cut from die C into 2 pieces	No less than 150 pounds per inch of thickness before tearing	D624: Die C Cutout
Water Absorption	Test after immersion in distilled water for 7 days @ 158°F (± 2°)	20% maximum allowable weight increase	D471

COUPLING PERFORMANCE

Ideal Tridon no-hub products are designed to meet or exceed specifications for couplings used in all drain, waste, and vent (DWV) no-hub cast iron pipe systems. Examples include residential or commercial sanitary applications such as hospitals or large multi-level commercial buildings, or above-and below-ground stormwater piping systems. All Ideal Tridon Classic No-Hub Couplings are designed for installation torque to 60 inch-pounds to accommodate the all 300 series stainless steel 5/16" hex-head/shoulder screw.

Coupling Meets **ASTM C1277**

Gasket Meets **ASTM C564**

Compliant To **CISPI 310**

IAPMO Listed File # 3198

Meets CSA B602

BRACING AND INSTALLATION

In applications using larger diameter pipes, it is required that adequate bracing be placed on the pipes to support the larger forces that can inherently act on the joints. Per the Cast Iron Soil Pipe and Fittings Handbook, published by the Cast Iron Soil Pipe Institute (CISPI), horizontal pipes and fittings larger than 5" nominal diameter shall be suitably braced to prevent horizontal movement. This shall be done at every branch opening or change of direction by the use of braces, blocks, rodding, or other suitable method, to prevent movement. Vertical components shall be secured at each stack base and at sufficiently close intervals to keep the system in alignment and to adequately support the pipe and its contents. Refer to local codes for specific requirements.