



# EARTH SHIELD®



Waterstops for Chemical, Industrial, & Environmental Applications



**Earth Shield® Ribbed Centerbulb is the de facto industry standard, utilized on most jobs for its proven fluid-sealing properties.**

Waterstops play a critical role in the integrity of concrete structures. They provide a fluid-tight diaphragm when embedded in, and running through concrete joints.



**Earth Shield® Thermoplastic Vulcanizate Waterstop (TPV / TPER)**, by JP Specialties, Inc., greatly expands the scope of conventional waterstop by offering unmatched chemical resistance to a broad spectrum of aggressive chemicals, solvents, and hot petroleum oils. Manufactured NSF certified, EPA-compliant waterstop profiles are available for new construction and retrofit, as well as the tools and accessories for proper field installation.

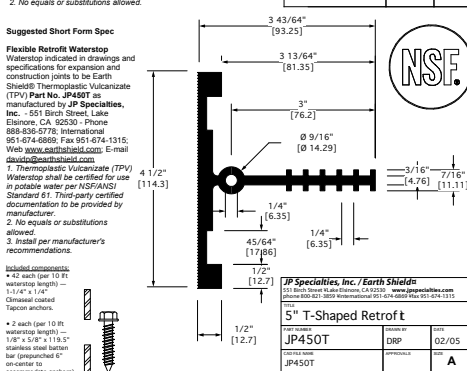
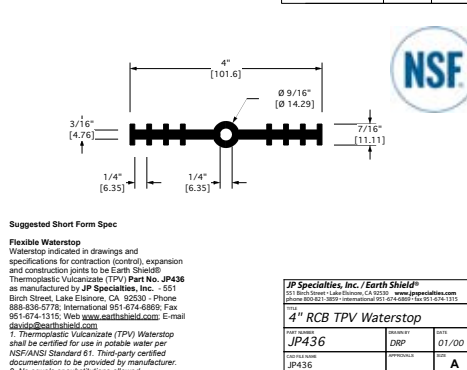
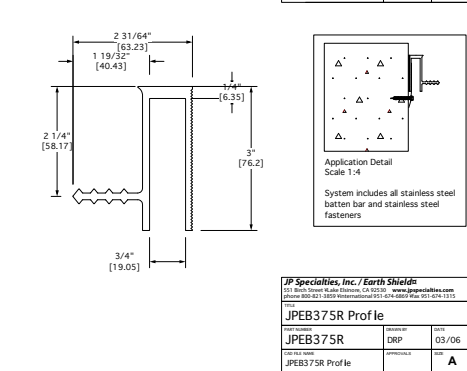
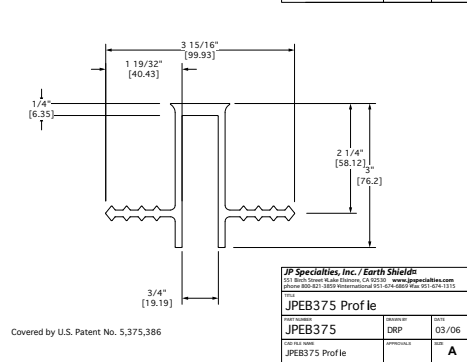
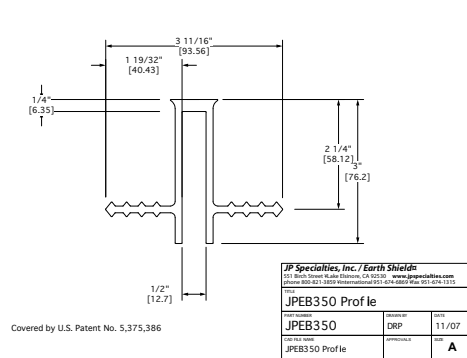
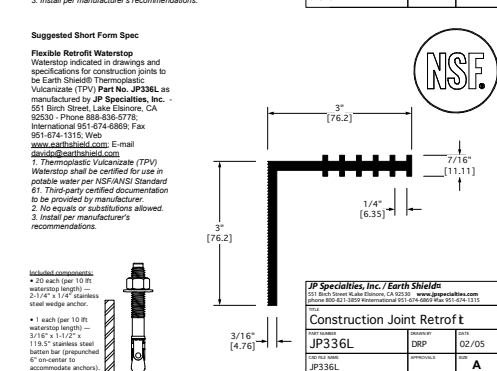
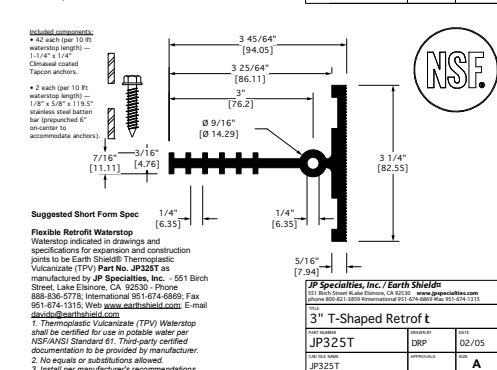
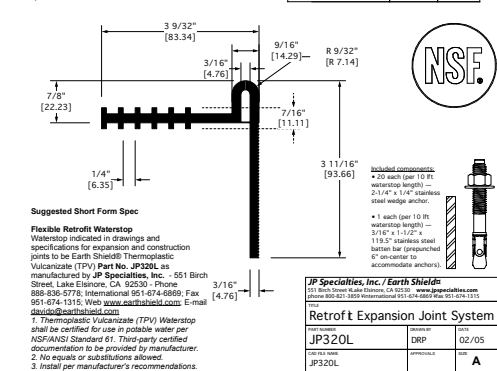
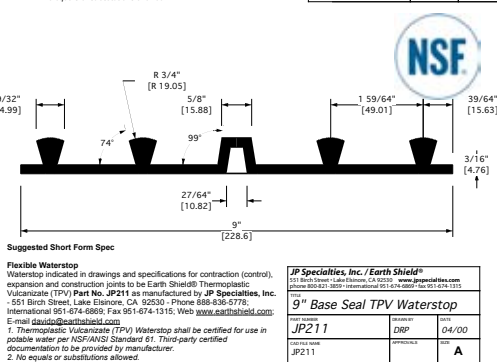
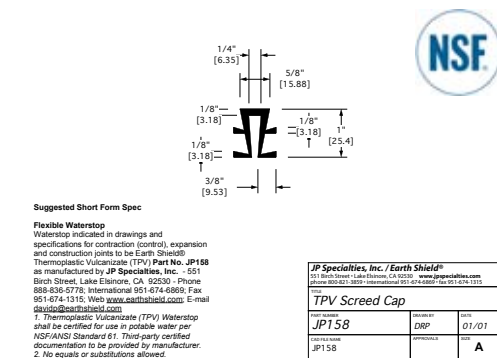
Property	Test Method	Required Results
Specific Gravity	ASTM D792	.96
Shore A Hardness (5 sec.)	ASTM D2240	90±3 at 77°F
Tensile Strength	ASTM D412	2,300 psi
Ultimate Elongation	ASTM D412	530%
100% Modulus	ASTM D746	1,000 psi
Tear Strength	ASTM D624	278 pli at 77°F
Compression Set	ASTM D395	29% at 77°F
Brittle Point	ASTM D746	-78°F
Drinking Water Safe	NSF/ANSI 61	Waterstop certified by NSF for use in potable water
Ozone Resistance	ASTM D1171	Passed, no cracking at 500 pphm
Chemical Resistance	ASTM D471	Meet or exceed specific testing standards for contained fluids as required by Owner and certified by Manufacturer
Green Certification	GreenSpec	Approved

**Earth Shield® Chemical Resistant Waterstop**  
P.O. Box 1507, Lake Elsinore, CA 92531  
Phone: 888-836-5778; International: 951-674-6869  
Fax: 951-674-1315



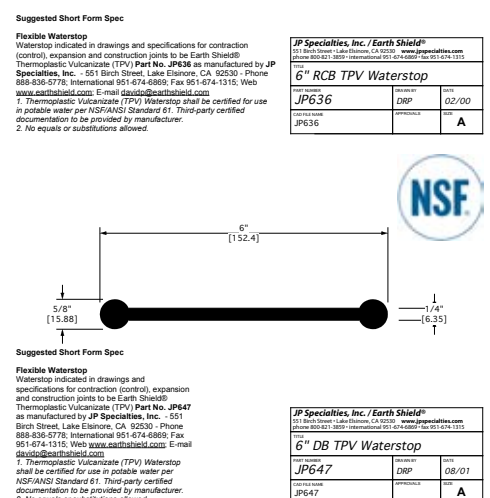
[www.earthshield.com](http://www.earthshield.com)

JP SPECIALTIES, INC.

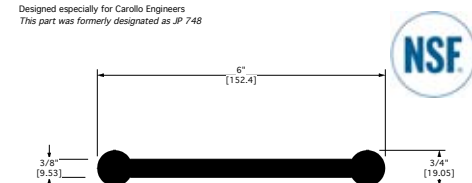


## Installation

Install Earth Shield® Thermoplastic Vulcanizate (TPV / TPER) Waterstop in all concrete joints. Waterstop should be centered in, and run the extent of the joint. All changes of directions should be prefabricated (see Shop Made Fittings), leaving only butt-welding for the field. If installing in an expansion joint, keep center bulb unembedded to allow it to accommodate movement as designed. Use #3 hog rings and tie wire to secure waterstop to reinforcing steel to avoid displacement during the concrete pour. Splice straight lengths of waterstop, and Shop Made Fittings to straight lengths, with an ST-10® In Line Waterstop Splicer with the iron temperature set to 410°F to 430°F. *More detailed installation instructions can be found in our Standard 3-part Specifications.*



Designed especially for Carollo Engineers  
This part was formerly designated as JP 748



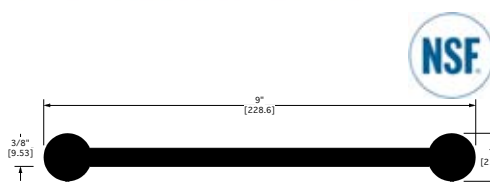
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP648 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

1. Thermoplastic Vulcanizate (TPV) Waterstop shall be certified for use in potable water per NSF/ANSI Standard 61. Third-party certified documentation to be provided by manufacturer.

2. No equals or substitutions allowed.

JP Specialties, Inc. / Earth Shield®			
551 Birch Street, Lake Elsinore, CA 92530 - <a href="http://www.earthshield.com">www.earthshield.com</a> phone 888-836-5778; International 951-674-6869; fax 951-674-1315			
6" DB TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP648	DRP	02/00	A
JP648	APPROVED		



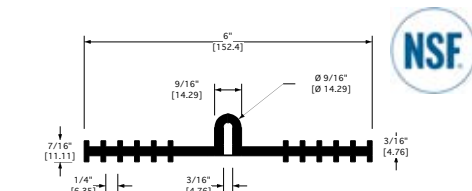
Suggested Short Form Spec

**Flexible Waterstop**  
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2. No equals or substitutions allowed.

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9" DB TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP948	DRP	11/01	A
JP948	APPROVED		



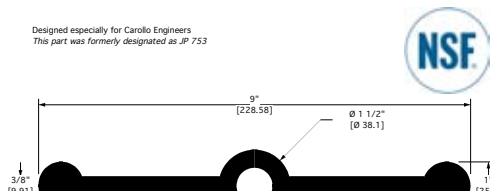
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP678 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

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2. No equals or substitutions allowed.

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551 Birch Street, Lake Elsinore, CA 92530 - <a href="http://www.earthshield.com">www.earthshield.com</a> phone 888-836-5778; International 951-674-6869; fax 951-674-1315			
6" Tearweb TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP678	DRP	03/00	A
JP678	APPROVED		



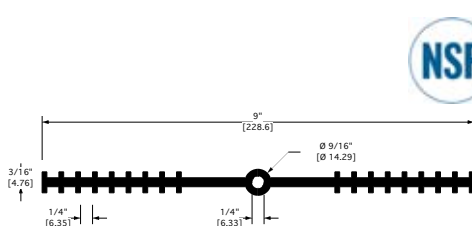
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP949 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

1. Thermoplastic Vulcanizate (TPV) Waterstop shall be certified for use in potable water per NSF/ANSI Standard 61. Third-party certified documentation to be provided by manufacturer.

2. No equals or substitutions allowed.

JP Specialties, Inc. / Earth Shield®			
551 Birch Street, Lake Elsinore, CA 92530 - <a href="http://www.earthshield.com">www.earthshield.com</a> phone 888-836-5778; International 951-674-6869; fax 951-674-1315			
9" DCB TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP949	DRP	02/00	A
JP949	APPROVED		



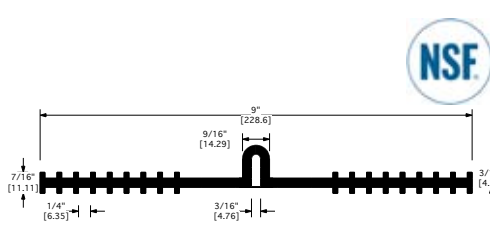
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP936 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

1. Thermoplastic Vulcanizate (TPV) Waterstop shall be certified for use in potable water per NSF/ANSI Standard 61. Third-party certified documentation to be provided by manufacturer.

2. No equals or substitutions allowed.

JP Specialties, Inc. / Earth Shield®			
551 Birch Street, Lake Elsinore, CA 92530 - <a href="http://www.earthshield.com">www.earthshield.com</a> phone 888-836-5778; International 951-674-6869; fax 951-674-1315			
9" RCB TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP936	DRP	04/00	A
JP936	APPROVED		



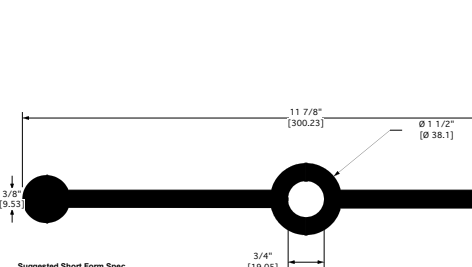
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP978 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

1. Thermoplastic Vulcanizate (TPV) Waterstop shall be certified for use in potable water per NSF/ANSI Standard 61. Third-party certified documentation to be provided by manufacturer.

2. No equals or substitutions allowed.

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9" Tearweb TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP978	DRP	12/05	A
JP978	APPROVED		



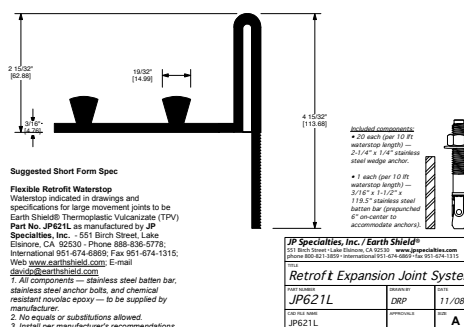
Suggested Short Form Spec

**Flexible Waterstop**  
Waterstop indicated in drawings and specifications for contraction (control), expansion and construction joints to be Earth Shield® Thermoplastic Vulcanizate (TPV) Part No. JP1149 as manufactured by JP Specialties, Inc. - 551 Birch Street, Lake Elsinore, CA 92530 - Phone 888-836-5778; International 951-674-6869; Fax 951-674-1315; Web [www.earthshield.com](http://www.earthshield.com); E-mail [info@earthshield.com](mailto:info@earthshield.com)

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2. No equals or substitutions allowed.

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551 Birch Street, Lake Elsinore, CA 92530 - <a href="http://www.earthshield.com">www.earthshield.com</a> phone 888-836-5778; International 951-674-6869; fax 951-674-1315			
12" DCB TPV Waterstop			
Part Number	Drawn By	Date	Approved By
JP1149	DRP	11/01	A
JP1149	APPROVED		



## Thermoplastic Vulcanizate (TPV / TPER) Waterstop Basic Use

Earth Shield® Chemical Resistant Waterstops are resistant to a wide range of oils, solvents, and aggressive chemicals. Alcohol, ketones, glycols, esters, and aqueous solutions of acids, salts, and bases have little effect on Earth Shield® Thermoplastic Vulcanizate Waterstop.

Unlike polyvinyl chloride (PVC) waterstop, Earth Shield® waterstop contains no plasticizer, stabilizer, or filler to leech out when exposed to chemicals, fuels, and aggressive industrial fluids.

Earth Shield® TPV Waterstop is NSF Standard 61 Certified.

[www.earthshield.com/Waterstop\\_for\\_Concrete\\_Joints/nsf\\_certified\\_waterstop.html](http://www.earthshield.com/Waterstop_for_Concrete_Joints/nsf_certified_waterstop.html)

Earth Shield® has solved a long-standing problem for engineered concrete structures with circular protrusions, such as columns, pipes, piers, and pilasters. The problem: how to permanently seal the concrete joint when cast-in-place concrete is formed against an existing circular member. The solution: Earth Shield® Column & Pipe Fitting (part no. JP320LC1.XX\* [\*XX is the diameter in inches]) manufactured with a flexible, chemical-resistant polymer and stainless steel anchoring hardware. A single laborer on the job site can quickly install the column fitting and its associated hardware. Simply apply an epoxy gel bed to the existing surface; place the polymer ring into the epoxy gel bed; heat weld the single opening on the polymer ring using a waterstop splicing iron; and finally, complete the system with the stainless steel closure ring.





[illegible]

**Visit Earth Shield® on the Web at**  
***www.earthshield.com***  
**for all the latest information**

## Availability

[www.earthshield.com/availability.html](http://www.earthshield.com/availability.html)

Earth Shield® Chemical Resistant Waterstop is readily available from a variety of sources:

- **Preferred Regional Stocking Partners —**

We are partnered with some of the very best  
Concrete Accessories Distributors in the world.

All our preferred partners have large stocking inventories and are factory trained to provide the utmost in on-site assistance.

- **Distributor Sales** — Earth Shield® can be

special ordered from many distributor sales channels throughout the world.

***Distributed by:***

## Earth Shield® Thermoplastic Vulcanizate (TPV / TPER) Waterstop Limited Warranty

*JP Specialties, Inc. warrants to the Buyer that this product is new and will be free from defects and will perform as represented in writing subject to the two (2) following conditions: First, the application of the product and the concrete construction practices used in the application are in accordance with JP Specialties, Inc. recommendations; and, Second, the Buyer has selected the proper product for the specific application required.*

*Any information supplied in good faith by JP Specialties, Inc. with respect to its products is believed to be correct. JP Specialties, Inc. Makes no representation or warranties, expressed or implied, as to the accuracy or completeness of such information.*

*The exclusive remedies of the Buyer and the limit of the liability of JP Specialties, Inc. from any and all losses or damages resulting from the use of this product shall be either full refund of the purchase price to the Buyer of this product or the replacement of the quantity of product purchased by the Buyer at the discretion of JP Specialties, Inc.*

*All supplied testing data has been performed by independent testing laboratories. IP Specialties, Inc. has performed no tests.*

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Phone: 888-836-5778; International: 951-674-6869  
Fax: 951-674-1315



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