

TECHNICAL DATA

PR-705 Fuel Tank Channel Sealant

Description

PR-705 is a non-curing fuel tank channel sealant. It has a service temperature range from -65°F (-54°C) to 220°F (104°C). This material is designed for sealing aircraft fuel tanks utilizing a channel/groove design with gaps up to 5 mils wide. The material offers excellent resistance to water and hydrocarbon aircraft fuels like JP-4 or JP-8.

PR-705 is a one-part, polysulfide compound. The material is a heavy, putty-like compound suitable for application by high pressure injection gun.

The following tests are in accordance with AMS 3283 specification test methods.

Application Properties (Typical)

Color	White
Reinjection time, seconds, 2800 psi	10
Pressure rupture, psi (inches Hg)	3.58 (7.3)

Performance Properties (Typical)

Specific gravity, maximum	1.44
Nonvolatile content, %	99
Fuel resistance, 14 days @ 140°F (60°C), volume change, %	
AMS 2629 Type I JRF immersion	27
TT-S-735 Type III JRF immersion	2
Weight loss, 14 days @ 140°F (60°C) immersion + 24 hrs @ 200°F (93°C), %	
AMS 2629 Type I JRF immersion	5
TT-S-735 Type III JRF immersion	3
Cohesion/adhesion, %	100
Corrosion	None
Plastometer extrusion force, lbs (Newtons meter/meter)	290 (1290)
Low temperature flexibility @ -65°F (-54°C) No cracking or checking	
Cold flow	None

Note: The application and performance property values above are typical for the material, but not intended for use in specifications or for acceptance inspection criteria because of variations in testing methods, conditions and configurations.

Surface Preparation

Immediately before applying sealant to primed substrates, the surfaces should be cleaned with solvents. Contaminants such as dirt, grease, and/or processing lubricants must be removed prior to sealant application.

For a more thorough discussion of proper surface preparation, please consult the SAE Aerospace Information Report AIR 4069. This document is available through SAE, 400 Commonwealth Avenue, Warrendale, PA 15096-0001.

Packaging Options

PR-705 is supplied in 6 oz. Semco® cartridges.

Application Method

A maximum pressure of 2800 lbs (12,455 Newtons) is used at an air pressure of approximately 40 psi (276 K-Pa) using a model 223 Grover-Smith injection gun with a Semco® cartridge adapter kit #226356. This material is compatible with polyfluoro and polycyanosiloxane-based channel sealants as well as polysulfides.

Storage Life

The storage life of PR-705 is at least 12 months when stored at temperatures below 80°F (27°C) in the original, unopened containers.

Health Precautions

This product is safe to use and apply when recommended precautions are followed. Before using this product, read and understand the Material Safety Data Sheet (MSDS), which provides information on health, physical and environmental hazards, handling precautions and first aid recommendations. An MSDS is available on request. Avoid overexposure. Obtain medical care in case of extreme overexposure.

For industrial use only. Keep away from children.

Additional information can be found at:
www.ppgaerospace.com

For sales and ordering information call
1-800-AEROMIX (237-6649).

PR-705 Fuel Tank Channel Sealant

Semco is a trademark of PRC-DeSoto International, Inc., registered with the U.S. Patent Office.

All recommendations, statements, and technical data contained herein are based on tests we believe to be reliable and correct, but accuracy and completeness of said tests are not guaranteed and are not to be construed as a warranty, either expressed or implied. User shall rely on his own information and tests to determine suitability of the product for the intended use and assumes all risks and liability resulting from his use of the product. Seller's and manufacturer's sole responsibility shall be to replace that portion of the product of this manufacturer which proves to be defective. Neither seller nor manufacturer shall be liable to the buyer or any third person for any injury, loss, or damage directly or indirectly resulting from use of, or inability to use, the product. Recommendations or statements other than those contained in a written agreement signed by an officer of the manufacturer shall not be binding upon the manufacturer or seller.

Printed in U.S.A.

PRC-DeSoto International, Inc.
12780 San Fernando Road
Sylmar, CA 91342
Telephone (818) 362-6711
Toll Free (800) AEROMIX
www.ppgaerospace.com

Issue Date: 09/09
Supersedes: 06/09
Lit: 0106