

## TECHNICAL INFORMATION

### WS-8070 Class B Corrosion Inhibitive Sealant

#### Product Description

WS-8070 Class B is a two part Manganese cured polysulfide sealant designed to provide excellent corrosion inhibitive characteristics. The product has a service temperature of -65°F to 250°F (-54°C to 121°C). WS-8070 Class B has excellent retention of physical properties when exposed to aviation fuel and oils. It is a thixotropic paste with non-sag characteristics an able to be applied by an extrusion gun or with spatula.

#### Typical Application

Fillet and faying surface sealing of aircraft structure to prevent the effects of corrosion from occurring through water intrusion and dissimilar metal interaction.

#### Specification:

- ♦ MIL-PRF-81733 Qualified

#### Application Properties

Typical @77°F (25°C) 50% RH  
 Slump, inches 0.1-0.2 B-1/2, B-2, B-4  
 Base Viscosity Poise, 8,000-12,000  
 Brookfield #7 spindle @ 2 rpm

#### Color

Part A Black  
 Part B Yellow  
 Mixed Gray

#### Mix Ratio

by weight 100 parts base (Part B) to 10 parts accelerator (Part A)  
 by volume 100 parts base (Part B) to 8.39 parts accelerator (Part A)

Specific Gravity 1.46  
 Final hardness 48 Shore A  
 Nonvolatile content 95%

#### Cure Profile:

	<u>B-1/2</u>	<u>B-2</u>
Application Life (hrs)	1/2	2
Tack free time (hrs)	5-6	6-7
Cure time to 30 Shore A (hrs)	24	48

#### Performance Properties

Typical 14 days @ 75°F (25°C), 50% RH  
 (tested per MIL-PRF-81733)

Tensile Strength (psi)	430
Elongation %	330
Corrosion	Excellent protection of dissimilar metals
Low temp flexibility	No cracking, checking or loss of adhesion @ -65°F
Repairability	Excellent to both self and other sealants
Fungus Resistant	Non-nutrient
Thermal Stability	No blistering, cracking or hardness deviation after 320°F for 48 hrs

#### Peel Strength

<u>Substrate</u>	<u>Adhesion</u>
Pli, 100% cohesive failure AMS2629 JRF 2 day immersion @ 140°F (60°C)/	
MIL-A-8625 (Anodized Alum)	32
MIL-T-9046 (Titanium & AMS3100 primer) 3%NaCl, 2 Days @ 140°F (60°C)	31
MIL-A-8625 (Anodized Alum)	41
MIL-T-9046 (Titanium & AMS3100 primer)	40

All peel test were performed to the requirements of MIL-PRF-81733D.  
 Specification Requirements = 15 pli 100% CF

Note: All values are typical and are not intended for specification use or for acceptance inspection criteria.

## **SURFACE PREPARATION**

All surfaces must be cleaned with solvent capable of removing contaminants such as dirt and grease. Apply solvent using a lint free cloth per AMS3814. Contaminants must be removed prior to sealant application.

## **PACKAGING**

WS-8070 Class B is supplied in two part kits or injection cartridges ready to mix.

## **MIXING INSTRUCTIONS**

Mix the two part kits and two part sealant injection cartridges as indicated on the container label. Do not forget to thoroughly mix Part A (curing agent) of the two part kits to uniformity before blending with Part B (base). Avoid leaving unmixed material around the side and bottom of the mixing container.

## **STORAGE LIFE**

The shelf life of WS-8070 Class B is 9 months from the date of shipment when stored below 80°F (27°C) in the original unopened container

## **HEALTH PRECAUTIONS**

This product is considered to be safe when recommended precautions are followed. Read the MSDS (Material Safety Data Sheet) for information on handling precautions, hazardous ingredients and first aid procedures. After use of his product, always wash your hands before eating or smoking. If you need an MSDS, this is always available on request. In case of overexposure, be sure to obtain medical care.

Keep away from children. This product is intended for industrial use only.

## **ADDITIONAL INFORMATION**

Visit our web site at:

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

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