

## Technical Data Sheet ThreadPaste 441

February 2020

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### Product Description

**Hernon® Threadpaste 441** is a single component anaerobic thread-locking compound designed for applications subject to operating temperatures to 300°F.

The product delivers high strength locking and sealing on screws, nuts, bolts, studs and fittings. Excellent break-loose and prevailing torque values assure maximized resistance to transverse vibration loosening at elevated temperatures.

### Typical Properties (Uncured)

Property	Value	
Chemical Type	Dimethacrylate ester	
Appearance	Red fluorescent paste	
Viscosity @ 77°F (25°C), cP	spindle B, 0.5 rpm	600,000-1,000,000
	spindle B, 5 rpm	50,000-100,000
Specific gravity	1.1	
Flash point	See SDS	

### Typical Properties (Cured)

Property	Value
Temperature Range, °F	-65 to 300
Set time, Steel, minutes	≤20 min

### Typical Cured Performance

#### Torque Strength

Cured and tested at 22°C on 3/8 x 16 steel grade 5 bolts and type 2 nuts

Cure	Torque	N <sub>m</sub> (in-lb)
24 Hours	Breakaway	11.3 to 28.2 (100 to 250)
	Prevailing	11.3 to 28.2 (100 to 250)

### Typical Environmental Resistance

Cured for 72 hours  
3/8 x 16 Plated Steel Nuts and Bolts  
Breakaway torque was measured.

#### Chemical/Solvent Resistance

Aged 1000 hours under conditions indicated and tested at 22°C.

Chemical/Solvent	Temperature, °C	% of Initial Strength
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Gasoline	22	85
Brake Fluid	22	73
Ethanol	22	124
Acetone	22	58
Ethanol Fuel	22	101
DEF	22	135
Motor Oil	125	61
Ethylene Glycol:Water 50:50	95	124

### General Information

This product is not recommended for use in pure oxygen and/or oxygen rich systems and should not be selected as a sealant for chlorine or other strong oxidizing materials.

For safe handling information on this product, consult the Safety Data Sheet (SDS).

Where aqueous washing systems are used to clean the surfaces before bonding, it is important to check for compatibility of the washing solution with the adhesive. In some case, these aqueous washes can affect the cure and performance of the adhesive.

This product is not normally recommended for use on plastics (particularly thermoplastic materials where stress cracking of the plastic could result). It is recommended to confirm compatibility of the product with such substrates.

#### Directions for Use

For best performance surfaces should be clean and free of grease. **Threadpaste 441** should be applied to the bolt in sufficient quantity to fill all engaged threads.

#### Disassembly and Cleanup

To aid in disassembly anaerobic compounds can be weakened by heating to temperatures above 500°F (260°C). Once disassembled, cured adhesive can be removed with **Hernon® Gasket Remover 30**.

#### Storage

**Threadpaste 441** should be stored in a cool, dry location in unopened containers at a temperature between 45°F to 85°F (7°C to 29°C) unless otherwise labeled. Optimal storage is at the lower half of this temperature range. To prevent contamination of unused material, do not return any material to its original container.

### **Dispensing Equipment**

**Hernon®** offers a complete line of semi and fully automated dispensing equipment. Contact **Hernon® Sales** for additional information.

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