

3-IN-ONE® Penetrant Technical Data Sheet

Typical Physical Characteristics – USA

Appearance: Liquid
Color: Light brown liquid
Odor: Characteristic

Freeze Point/Pour Point: -71° F (-57° C)(ASTM D97)

Kinematic Viscosity @ 100° F (38° C): 1.9 cSt (ASTM D445)

Specific Gravity @ 77° F (25° C): 0.80 Boiling Point (initial): $> 300^{\circ}$ F (149° C)

Vapor Density: >1

Flash Point: 141° F (61° C)(TCC)

Percent Volatile: > 90% by weight

CARB VOCs: 24.5% by weight

Lower flammability limit: 0.6%

Upper flammability limit: 7.0%

Vapor Pressure: 2.6 mm Hg @ 20° C

Product Features

Helps free rusted parts. Quickly works on bonds that hold rusted parts together. Fast acting. Also provides lubrication and corrosion protection against further rusting.



3-IN-ONE Penetrant and the Environment

- 3-IN-ONE Penetrant Product does not contain Lead (Pb), Mercury (Hg), Cadmium (Cd), Hexavalent Chromium (Cr6), Polybrominated biphenyls (PBB), or Polybrominated diphenylether complying with the restricted substances listed in Article 4(1) of the RoHS Directive.
- 3-IN-ONE Penetrant Product contains no ingredients requiring California Prop 65 labeling such as benzene or toluene.
- 3-IN-ONE Penetrant Product complies with California VOC regulations.



Fluid Properties

Working Temperature Range: -50° F to 300° F Solubility in Water: Insoluble	Surface Cautions Always test surfaces first. Do not immerse rubber parts in product.	
Surface Compatibility		

Typical Performance - 3-IN-ONE® Penetrant Drip Oil

Safe for plastic, metal and rubber surfaces.

Typical Fortination of the Oile of Cities and Cities of Cities and Cities of		
Test Method	Property	Results
ASTM D4172	Lubricates and Protects	@ 75° F = 1.0 mm @ -50° F = 0.9 mm @ 500° F = 1.3 mm
ASTM D3233	Extreme Pressure Lubrication	< 300 lbs
ASTM B-117	Corrosion Protection (Salt Spray)	< 25% Surface Corrosion in 72 hours

SAFETY

DANGER! Contents are combustible. Keep away from heat, sparks, pilot lights, hot surfaces and open flames. Do not swallow. Avoid eye and skin contact. Avoid breathing vapors. Use only in well-ventilated area. Wash thoroughly with soap and water after use. Intentional inhalation abuse (concentrating and inhaling vapors) may be harmful or fatal. Keep out of reach of children.

Symptoms of Overexposure:

Inhalation: High concentrations may cause nasal and respiratory irritation and central nervous system effects such as headache, dizziness and nausea. Intentional abuse may be harmful or fatal.

Skin Contact: Causes skin irritation. Prolonged and/or repeated contact may produce defatting with possible dermatitis.

Eye Contact: Contact may be irritating to eyes. May cause redness and tearing.

Ingestion: This product has low oral toxicity. Swallowing may cause gastrointestinal irritation, nausea, vomiting and diarrhea. This product is an aspiration hazard. If swallowed, can enter the lungs and may cause chemical pneumonitis, severe lung damage and death.

Chronic Effects: None expected.

Carcinogen Status: None of the components are listed as a carcinogen or suspect carcinogen by IARC, NTP, ACGIH or OSHA.

Reproductive Toxicity: None of the components is considered a reproductive hazard.

REGULATORY

U.S. Federal Regulations:

CERCLA 103 Reportable Quantity: This product is not subject to CERCLA reporting requirements, however, oil spills are reportable to the National Response Center under the Clean Water Act and many states have more stringent release reporting requirements. Report spills required under federal, state and local regulations.

SARA TITLE III:

Hazard Category For Section 311/312: See SDS Section 2 for OSHA Hazard Classification.

Section 313 Toxic Chemicals: This product contains the following chemicals subject to SARA Title III Section 313 Reporting requirements: None

Section 302 Extremely Hazardous Substances (TPQ): None

EPA Toxic Substances Control Act (TSCA) Status: All of the components of this product are listed on the TSCA inventory.

VOC Regulations: This product complies with the consumer product VOC limits of CARB, the US EPA and states adopting the OTC VOC rules.

California Safe Drinking Water and Toxic Enforcement Act (Proposition 65): This product does not contain chemicals regulated under California Proposition 65.

Canadian Environmental Protection Act: One of the components is listed on the NDSL. All of the other ingredients are listed on the Canadian Domestic Substances List or exempt from notification.

