

## Key Features

Thixotropic  
Thermally Conductive  
Electrically Insulative  
Semi-flexible  
Superior Thermal Cycling  
Hydrolytic Stability  
Long Pot Life  
Low Glass Transition Temperature  
Low Modulus  
Meets NASA Outgassing Requirements  
Solvent Resistant

## Uncured

Work Life @ 25°C: 1.5 hours  
Viscosity @ 25°C: Paste  
Shelf Life @ -40°C: 6 Months

## Cure Options

1.5 hours @ 74°C + 72 hours @ 25°C  
7 days @ 25°C

## Cured Properties

(1.5 hours @ 74°C + 72 hours @ 25°C)  
Color Dark Gray  
Shore A Hardness 92  
Shore D Hardness 45  
Glass Transition Temp (°C) -70  
Density (g/cc) 2.3  
Lap Shear 2024T3 Clad (psi) 1,300  
Tensile Strength (psi) 900  
Tensile Modulus (psi) 7,500  
Elongation (%) 20  
Storage Modulus (psi) 4,000

## Electrical Properties

(1.5 hours @ 74°C + 72 hours @ 25°C)  
Dielectric Constant 5.3 @ 10 kHz  
Dielectric Constant 5.1 @ 100 kHz  
Dielectric Constant 4.9 @ 1 MHz  
Dissipation Factor 0.032 @ 10 kHz  
Dissipation Factor 0.028 @ 100 kHz  
Dissipation Factor 0.023 @ 1 MHz  
Dielectric Strength (volts/mil) 480  
Volume Resistivity (ohm-cm) 1.0E 15 @ 500 VDC

## Product Description:

Appli-Thane<sup>®</sup> 7340, a one-component precision mixed, degassed, and frozen adhesive, was developed as a superior replacement to many aerospace epoxy systems. Epoxy systems are hard and high modulus after cure. They typically will fail when exposed to extreme thermal cycling and vibration environments. Appli-Thane<sup>®</sup> 7340 is easy to use, and will not harm, bend or break highly fragile substrates like glass and ceramic when exposed to vibration and extreme thermal cycling. Appli-Thane<sup>®</sup> 7340 is a dark gray, thermally conductive polyurethane based adhesive compound for advanced electronic assembly. This thixotropic compound is suitable for electronic bonding, staking, and may be used as a fillet as well. Appli-Thane<sup>®</sup> 7340 has a thermal conductivity of 1.0 (W/mK), and cures to a tough and flexible material with low modulus and a very low glass transition temperature (Tg). Appli-Thane<sup>®</sup> 7340 passes NASA outgassing requirements and provides thermal conductivity and strain relief for many bonding and staking applications.

## Thermal Properties

(1.5 hours @ 74°C + 72 hours @ 25°C)  
CTE below Tg (ppm/°C) 50  
CTE above Tg (ppm/°C) 121  
Glass Transition Temp (°C) -70  
Operating Temp. Range (°C) -100 to 125  
Thermal Conductivity (W/mK) 1.0

## Outgassing Properties

(Based on cure of 1.5 hours @ 74°C)  
TML (%) 0.13  
CVCM (%) 0.01  
WVR (%) 0.05

## Acoustic Properties

Velocity (m/s) 1,437  
Impedance (MRayles) 3.36  
Loss (dB/cm-MHz) -13.2  
Density (g/cc) 2.3

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