

DESCRIPTION

BMI-2500 has been designed to extend the range of applications suitable for use with the Designer Molecules, Inc. imide extended bismaleimide oligomers to those in need of higher Tg and modulus. The material has excellent low pH hydrolytic resistance and thermal stability. As an additive it can improve rheological properties by increasing the thixotropic properties of a liquid monomer composition. This feature in turn can help to reduce resin bleed out on a variety of surfaces. It is soluble in most aromatic and aliphatic solvents such as toluene, xylene, NMP, etc. It can be processed in a resin system as a solid or dissolved in a solvent.

HIGHLIGHTS

| | |
|---------------|---|
| • Toughener | • Increased Tg and modulus for demanding applications |
| • Hydrophobic | • Superior thermal stability |

TYPICAL PHYSICAL AND CHEMICAL PROPERTIES

| PROPERTY | METHOD | RESULT |
|--|---------------------------------------|----------------------------|
| Appearance at Room Temperature | Visual | Light yellow glassy powder |
| Functionality | | 2 |
| Glass Transition | TMA | 139 °C |
| Glass Transition | DMA | 142 °C |
| CTE α_1 / α_2 | TMA | 89 ppm/°C / 189 ppm/°C |
| Modulus @ | DMA | 1.05 GPa |
| Melting Point (typical) | DSC | 80 °C |
| Weight Loss @ 300°C | TGA | < 0.5 % |
| Decomposition Temperature – Td (5%) | TGA | 438 °C |
| Dielectric Constant (Dk) | Cavity Perturbation Method @ 20GHz | 2.3 |
| Dissipation Factor (Df) | | 0.0015 |
| Water Absorption | Immersion 23 °C/24 hr. | 0.25 % |
| Continuous Operating Temperature (approximate) | | < 180 °C |
| Recommended Storage Temp | | 25 °C or below |

Data is for reference only and may vary depending on testing method used.

RECOMMENDED FORMULATION AND USE:

BMI-2500 is recommended for use as an additive to increase flexibility, hydrophobicity and thixotropy. When used as a base resin, it can produce films that are tough, flexible and demonstrate good peel strength. BMI-2500 is compatible with PPE and Acrylates for free radical reaction and epoxy with anionic cure.

CONTACT:

REQUEST A SAMPLE OR PLACE AN ORDER

Customer Support

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REF: DMI Part Number: R1316