

POM Copolymer Rod

Formula: Acetal - Copolymer POMC

Diameter: 25mm

Length: 500mm

Colour: Natural

UOM Code: 037-076-70

SKU: 1000004932-group

Product Code: OX30-RD-000125

Material Properties for Polymers

Chemical Resistance

| Element | Value |
|--------------------------|-------------|
| Acids - concentrated | Poor |
| Acids - dilute | Good-Fair |
| Alcohols | Good-Fair |
| Alkalis | Good |
| Aromatic hydrocarbons | Good |
| Greases and Oils | Good |
| Halogenated Hydrocarbons | Good-Poor |
| Halogens | Poor |
| Ketones | Good - Fair |

Electrical Properties

| Element | Value |
|---|------------------|
| Dielectric constant @ 1MHz | 3.7-4.4 |
| Dissipation factor @ 1MHz | 0.006-0.18 |
| Dielectric strength(kV mm ²) | 20@2.3mm |
| Surface resistivity(Ohm/sq) | 10 ^{1?} |
| Volume resistivity(Ohmcm) | 10 ^{1?} |

Physical Properties

| Element | Value |
|--------------|-------|
| Flammability | HB |

| Element | Value |
|---------------------------------------|--------------|
| Radiation resistance | Poor |
| Resistance to Ultra-violet | Poor |
| Limiting oxygen index(%) | 15 |
| Water absorption - equilibrium(%) | 0.6-0.8 |
| Water absorption - over 24 hours(%) | 0.2-0.25 |
| Density(gcm ³) | 1.41 |

Mechanical Properties

| Element | Value |
|---|--------------|
| Hardness - Rockwell | M80 |
| Poisson's ratio | 0.35 |
| Elongation at break(%) | 15-40 |
| Tensile modulus(GPa) | 2.3-2.8 |
| Izod impact strength(J m ⁻¹) | 70-80 |
| Tensile strength(MPa) | 60-70 |

Thermal Properties

| Element | Value |
|---|---------------|
| Heat-deflection temperature - 0.45MPa(C) | 160 |
| Heat-deflection temperature - 1.8MPa(C) | 110 |
| Lower working temperature(C) | -40 |
| Upper working temperature(C) | 80-120 |
| Specific heat(J K ⁻¹ kg ⁻¹) | 1500 |
| Thermal conductivity(W m ⁻¹ K ⁻¹) | 0.23-0.3@23°C |
| Coefficient of thermal expansion(x10 ⁻⁴ K ⁻¹) | 80-120 |