



UHMW FILMS & TAPES

ULTRA HIGH MOLECULAR WEIGHT POLYETHYLENE FILM

APPLICATIONS

Ultra High Molecular Weight (UHMW) Polyethylene film offer a unique combination of properties that make it ideal for many tough impact wear or sliding applications. It has a coefficient of friction that rivals PTFE/Teflon® films but is 30 times more abrasion resistant. Designed for applications involving friction wear, corrosion, sticking, sliding, surface protection and noise abatement.

Ideal for covering rollers in web processing, and with chute liners where anti-friction surfaces are required. Excellent for use in automotive applications for squeak and noise reduction. Available in a variety of film thicknesses and with acrylic or rubber based adhesive systems.

FEATURES/BENEFITS

- Outstanding abrasion resistance.
- Low water vapor transmission rate.
- Superior chemical, moisture and solvent resistance.
- Rubber adhesive provides good initial tack for immediate bonding to material surface.
- High tack acrylic adhesive provides strong bonds to many painted metal and plastics surfaces.
- Paper release liner allows for custom die cut shaped parts.

TECHNICAL DATA

Backing Material	: Ultra High Molecular Weight (UHMW) Polyethylene Film
Thicknesses	: 3 mil, 5 mil, 10 mil, 15 mil, 20 mil
Color	: Translucent, Black
Elongation	: 300%
Tensile Strength	: 6,000 psi
Density	: 0.93 gm/cc
Dielectric Strength	: 3,000 volts per mil
Deformation	: 6% – 8% @ 2,000 psi, 6 hr., 122°F
Thermal Conductivity	: 0.44 @ (73°F)[(BTUin/(ft ² hr°F)]
Thermal Expansion Coefficient	: ~1.10 x 10 ⁴
Dissipation Factor	: 0.0004
Heat Distortion	: 203°F
Adhesion to Steel - Rubber	: 175 oz./inch
Temperature Range - Rubber	: 120°F to 175°F
Adhesion to Steel - Acrylic	: 60 oz./inch
Temperature Range - Acrylic	: 225°F to 300°F
Standard Widths	: 0.25" to 24"

Note: The above are typical values obtained from tests recommended by the PSTC, ASTM, or government agencies and should not be used in writing specifications. The product should be thoroughly evaluated by the user under actual conditions with intended substrates to determine if the product is suitable for the application.