

## Polyurethane Specialty Products Group

# AIRTHANE® PPT-95A

## TDI-PPG Prepolymer

### Prepolymer Properties

|                  |         | Specifications | Typical       |
|------------------|---------|----------------|---------------|
| NCO (%)          |         | 6.05 - 6.55    | 6.3           |
| Viscosity (cPs)  | - 40 °C | -              | 2,100 - 2,600 |
|                  | - 70 °C | ≤ 400          | 250 - 400     |
| Specific Gravity | - 70 °C | -              | 1.06          |
| Residual TDI (%) |         | < 0.1          | -             |

### Processing Conditions

|                                    |        |
|------------------------------------|--------|
| MBOCA Level, 95% Stoichiometry (%) | 18.6   |
| Airthane Temperature (°C)          | 70     |
| Pot Life (Min.) - 75 °C            | 10     |
| Mold Temperature (°C)              | 100    |
| Demold Time (Min.)                 | 30     |
| Post Cure (Hrs./Temp. °C)          | 15/100 |

### Typical Elastomer Properties (MBOCA Cured)

|                                         |                        |
|-----------------------------------------|------------------------|
| Hardness (A)                            | 95                     |
| Modulus psi (MPa)                       |                        |
| 100% Elongation                         | 1,800 (12.4)           |
| 200% Elongation                         | 2,600 (17.9)           |
| 300% Elongation                         | 4,200 (29.0)           |
| Tensile Strength psi (MPa)              | 6,000 (41.4)           |
| Elongation (%)                          | 360                    |
| Tear Resistance PLI (N/mm)              |                        |
| Die C                                   | 400 (70)               |
| Split                                   | 90 (16)                |
| Compression Set (%), Method B:          |                        |
| 25% deflection, 22 hrs at 70 °C         | 38                     |
| Rebound (%)                             | 40                     |
| Brittleness Temperature (°C)            | - 50                   |
| Specific Gravity                        | 1.15                   |
| Linear Shrinkage (%)                    | 1.2                    |
| Linear Coefficient of Thermal (μM/M/°C) | 232.8                  |
| Expansion at 25 °C                      |                        |
| Electrical Properties                   |                        |
| Breakdown Voltage (KV)                  | 47.6                   |
| Dielectric Strength V/mil (KV/mm)       | 388                    |
| Dielectric Constant at 1,000 Hz         | 5.22                   |
| Volume Resistivity (Ohms-Cm)            | 2.6 X 10 <sup>13</sup> |
| Power Factor                            | 0.0648                 |