



ENGAGE™ 7277

Polyolefin Elastomer

Overview ENGAGE™ 7277 is a general purpose copolymer designed to provide good cost/performance balance in polymer modification applications

Main Characteristics:

- Pellet form
- Talc dusted (untreated, 1 µm)

Applications:

- Polymer modification

| Physical | Nominal Value (English) | Nominal Value (SI) | Test Method |
|--|-------------------------|-------------------------|-------------|
| Density | 0.880 g/cm ³ | 0.880 g/cm ³ | ASTM D792 |
| Melt Index (190°C/2.16 kg) | 0.80 g/10 min | 0.80 g/10 min | ASTM D1238 |
| Mooney Viscosity (ML 1+4, 250°F (121°C)) | 24 MU | 24 MU | ASTM D1646 |
| Mechanical | Nominal Value (English) | Nominal Value (SI) | Test Method |
| Tensile Modulus - 100% Secant ¹ (Compression Molded) | 537 psi | 3.70 MPa | ASTM D638 |
| Tensile Strength ¹ (Break, Compression Molded) | 2020 psi | 13.9 MPa | ASTM D638 |
| Tensile Elongation ¹ Break, Compression Molded | 720 % | 720 % | ASTM D638 |
| Flexural Modulus | | | ASTM D790 |
| 1% Secant : Compression Molded | 3260 psi | 22.5 MPa | |
| 2% Secant : Compression Molded | 3150 psi | 21.7 MPa | |
| Elastomers | Nominal Value (English) | Nominal Value (SI) | Test Method |
| Tear Strength ² | 304 lbf/in | 53.2 kN/m | ASTM D624 |
| Hardness | Nominal Value (English) | Nominal Value (SI) | Test Method |
| Durometer Hardness | | | ASTM D2240 |
| Shore A, 1 sec, Compression Molded | 80 | 80 | |
| Shore D, 1 sec, Compression Molded | 26 | 26 | |
| Thermal | Nominal Value (English) | Nominal Value (SI) | Test Method |
| Glass Transition Temperature | -47.2 °F | -44.0 °C | Dow Method |
| Vicat Softening Temperature | 122 °F | 50.0 °C | ASTM D1525 |
| Melting Temperature (DSC) ³ | 147 °F | 64.0 °C | Dow Method |
| Peak Crystallization Temperature (DSC) | 122 °F | 50.0 °C | Dow Method |

Additional Information

Properties measured on product without talc dusting.

Notes

These are typical properties only and are not to be construed as specifications. Users should confirm results by their own tests.

¹ 20 in/min (510 mm/min)

² Die C

³ 10°C/min

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