

**Durethan® BKV20GH3.0 000000**  
**PA6-GF20**

Envalior

Injection Molding, 20% Glass Reinforced, Heat Stabilized, Excellent Surface Properties

ISO 1043 PA6-GF20

| Rheological properties      | dry / cond | Unit | Test Standard   |
|-----------------------------|------------|------|-----------------|
| <b>ISO Data</b>             |            |      |                 |
| Molding shrinkage, parallel | 0.3 / *    | %    | ISO 294-4, 2577 |
| Molding shrinkage, normal   | 0.7 / *    | %    | ISO 294-4, 2577 |

| Mechanical Properties                   | dry / cond  | Unit              | Test Standard |
|-----------------------------------------|-------------|-------------------|---------------|
| <b>ISO Data</b>                         |             |                   |               |
| Tensile Modulus                         | 7600 / 4700 | MPa               | ISO 527       |
| Stress at Break                         | 150 / 100   | MPa               | ISO 527       |
| Strain at Break                         | 3 / 7       | %                 | ISO 527       |
| Impact Strength (Charpy), +23°C         | 45 / 60     | kJ/m <sup>2</sup> | ISO 179/1eU   |
| Impact Strength (Charpy), -30°C         | 40 / 40     | kJ/m <sup>2</sup> | ISO 179/1eU   |
| Notched Impact Strength (Charpy), +23°C | - / 10      | kJ/m <sup>2</sup> | ISO 179/1eA   |
| Notched Impact Strength (Charpy), -30°C | - / 10      | kJ/m <sup>2</sup> | ISO 179/1eA   |

| Thermal Properties                          | dry / cond | Unit  | Test Standard  |
|---------------------------------------------|------------|-------|----------------|
| <b>ISO Data</b>                             |            |       |                |
| Melting Temperature (10°C/min)              | 222 / *    | °C    | ISO 11357-1/-3 |
| Temp. of deflection under load (1.80 MPa)   | 195 / *    | °C    | ISO 75-1/-2    |
| Temp. of deflection under load (0.45 MPa)   | 215 / *    | °C    | ISO 75-1/-2    |
| Coeff. of Linear Therm. Expansion, parallel | 20 / *     | E-6/K | ISO 11359-1/-2 |
| Coeff. of Linear Therm. Expansion, normal   | 90 / *     | E-6/K | ISO 11359-1/-2 |

| Other Properties | dry / cond | Unit              | Test Standard |
|------------------|------------|-------------------|---------------|
| <b>ISO Data</b>  |            |                   |               |
| Density          | 1280 / -   | kg/m <sup>3</sup> | ISO 1183      |

| Test specimen production            | Value | Unit | Test Standard |
|-------------------------------------|-------|------|---------------|
| <b>ISO Data</b>                     |       |      |               |
| Injection Molding, melt temperature | 280   | °C   | ISO 294       |
| Injection Molding, mold temperature | 80    | °C   | ISO 294       |

| Processing Recommendation Injection Molding | Value     | Unit | Test Standard |
|---------------------------------------------|-----------|------|---------------|
| Pre-drying - Temperature                    | 80        | °C   | -             |
| Pre-drying - Time                           | 2 - 6     | h    | -             |
| Processing humidity                         | ≤0.12     | %    | -             |
| Melt temperature                            | 270 - 290 | °C   | -             |
| Mold temperature                            | 80 - 120  | °C   | -             |

**Characteristics**
**Processing**

Injection Molding

**Additives**

Release agent

**Delivery form**

Pellets

**Special Characteristics**

UV stablized, Heat aging stabilized

**Injection Molding**
**PREPROCESSING**

Residual moisture content: 0.03 - 0.12%

Drying temperature dry air dryer: 80 °C

Drying time dry air dryer 2 - 6 h

**PROCESSING**

Melt temperature (Tmin - Tmax): 270 - 290 °C

Mold temperature: 80 - 120 °C