

## Properties

### **B1300**

PBT/ABS resin

Standard

| Properties                              | Test methods  | Test conditions | Units             |         |
|---|---------------|-----------------|-------------------|---------|
| Mold shrinkage                          | Daicel method | -               | %                 | 0.5-0.8 |
| Tensile strength                        | ISO 527       | -               | MPa               | 38      |
| Flexural strength                       | ISO 178       | -               | MPa               | 57      |
| Flexural modulus                        | ISO 178       | -               | MPa               | 1800    |
| Notched Charpy impact strength          | ISO 179/1eA   | 23 deg C        | kJ/m <sup>2</sup> | 10      |
| Notched Izod impact strength            | ASTM D256     | 23 deg C/6.4mm  | J/m               | 60      |
| Deflection temperature under load       | ISO 75        | 1.80MPa         | deg C             | 80      |
| Deflection temperature under load       | ASTM D648     | 1.82MPa/6.4mm   | deg C             | 90      |
| Deflection temperature under load       | ISO 75        | 0.45MPa         | deg C             | 100     |
| Deflection temperature under load       | ASTM D648     | 0.46MPa/6.4mm   | deg C             | 100     |
| Coefficient of linear thermal expansion | ISO 11359     | MD              | X1E-5/deg C       | 10      |
| Coefficient of linear thermal expansion | ISO 11359     | TD              | X1E-5/deg C       | -       |
| Water absorption                        | ISO 62        | -               | %                 | 0.15    |
| Density                                 | ISO 1183      | -               | g/cm <sup>3</sup> | 1.12    |

Note

- Test methods such as ISO standards are fully or almost compliant with the standards.
- Values are typical, not quality assured.

### **Typical settings for processing**

| Preliminary drying    | Barrel temperature(deg C) |         |         |         | Screw rotation (rpm) | Back pressure (MPa) | Mold temperature (deg C) |
|-----------------------|---------------------------|---------|---------|---------|----------------------|---------------------|--------------------------|
|                       | Nozzle                    | Front   | Middle  | Back    |                      |                     |                          |
| 3-5hrs<br>80-120deg C | 230-250                   | 240-250 | 220-240 | 190-230 | 50-90                | 5-20                | 60-80                    |