

**Iupilon E-2001**

PC

Mitsubishi Engineering-Plastics Corporation

| Processing/Physical Characteristics | Value | Unit                   | Test Standard   |
|-------------------------------------|-------|------------------------|-----------------|
| <b>ISO Data</b>                     |       |                        |                 |
| Melt volume-flow rate, MVR          | 5     | cm <sup>3</sup> /10min | ISO 1133        |
| Temperature                         | 300   | °C                     | -               |
| Load                                | 1.2   | kg                     | -               |
| Melt flow index, MFI                | 5.3   | g/10min                | ISO 1133        |
| Temperature                         | 300   | °C                     | -               |
| Load                                | 1.2   | kg                     | -               |
| Molding shrinkage, parallel         | 0.6   | %                      | ISO 294-4, 2577 |
| Molding shrinkage, normal           | 0.6   | %                      | ISO 294-4, 2577 |

| Mechanical properties                 | Value | Unit              | Test Standard |
|---------------------------------------|-------|-------------------|---------------|
| <b>ISO Data</b>                       |       |                   |               |
| Tensile Modulus                       | 2400  | MPa               | ISO 527       |
| Yield stress                          | 60    | MPa               | ISO 527       |
| Yield strain                          | 5.4   | %                 | ISO 527       |
| Strain at break                       | 110   | %                 | ISO 527       |
| Flexural modulus, 23°C                | 2300  | MPa               | ISO 178       |
| Flexural strength                     | 93    | MPa               | ISO 178       |
| Charpy impact strength, +23°C         | N     | kJ/m <sup>2</sup> | ISO 179/1eU   |
| Charpy notched impact strength, +23°C | 88    | kJ/m <sup>2</sup> | ISO 179/1eA   |

| Thermal properties                          | Value | Unit  | Test Standard  |
|---|-------|-------|----------------|
| <b>ISO Data</b>                             |       |       |                |
| Temp. of deflection under load, 1.80 MPa    | 131   | °C    | ISO 75-1/-2    |
| Temp. of deflection under load, 0.45 MPa    | 145   | °C    | ISO 75-1/-2    |
| Coeff. of linear therm. expansion, parallel | 65    | E-6/K | ISO 11359-1/-2 |
| Coeff. of linear therm. expansion, normal   | 66    | E-6/K | ISO 11359-1/-2 |

| Electrical properties       | Value | Unit  | Test Standard |
|-----------------------------|-------|-------|---------------|
| <b>ISO Data</b>             |       |       |               |
| Relative permittivity, 1MHz | 3.1   | -     | IEC 62631-2-1 |
| Dissipation factor, 1MHz    | 90    | E-4   | IEC 62631-2-1 |
| Volume resistivity          | 3E14  | Ohm*m | IEC 62631-3-1 |
| Surface resistivity         | 6E15  | Ohm   | IEC 62631-3-2 |
| Electric strength           | 31    | kV/mm | IEC 60243-1   |
| Comparative tracking index  | 325   | -     | IEC 60112     |

| Other properties | Value | Unit              | Test Standard  |
|------------------|-------|-------------------|----------------|
| Water absorption | 0.24  | %                 | Sim. to ISO 62 |
| Density          | 1200  | kg/m <sup>3</sup> | ISO 1183       |

| Processing Recommendation Extrusion | Value     | Unit | Test Standard |
|-------------------------------------|-----------|------|---------------|
| Pre-drying - Temperature            | 120       | °C   | -             |
| Pre-drying - Time                   | 4 - 8     | h    | -             |
| Mold temperature                    | 80 - 110  | °C   | -             |
| Zone 1                              | 280 - 310 | °C   | -             |
| Zone 2                              | 280 - 310 | °C   | -             |
| Zone 3                              | 280 - 310 | °C   | -             |
| Nozzle temperature                  | 280 - 310 | °C   | -             |

**Characteristics****Processing**

Other Extrusion

**Applications**

General Purpose

**Certifications**

Food contact, Food approval FDA 21 CFR, Drinking water contact

**Regional Availability**

North America, Europe, Asia Pacific, South and Central America, Near East/Africa