

PP

PP HP500N

POLYPROPYLENE HOMOPOLYMER (PP)

A polypropylene homopolymer with higher crystallinity, high rigidity, high tensile strength, high modulus, and good resistance to thermal distortion. Products made from this resin are characterized by short processing cycles, good scratch resistance, and good flow, making it well suited to the injection moulding of small household electrical appliances and general household articles.

Typical Application

- Injection moulding of small household electrical appliances (electric kettles, rice cookers, irons, heaters, hair dryers, toasters, hand dryers)
- Food containers
- Toys
- Garden equipment and vases

Product Characteristics

- Higher crystallinity with high rigidity, tensile strength, and modulus
- Good resistance to thermal distortion
- Short moulding cycle time
- Good scratch resistance and good flow

Physical Properties

Properties	Test Method	Typical Value	Unit
Melt Flow Rate (230°C/2.16kg)		12	g/10 min
Tensile Stress at Yield		35	MPa
Flexural Modulus		1550	MPa
Heat Distortion Temperature		117	°C

1. The nominal properties reported herein are typical of the product and do not reflect normal testing variance; they should not be used for specification purposes.

2. A separate producer brochure lists a lower typical tensile stress at yield (~26 MPa) for this same grade code; the higher value reported here (35 MPa) comes from the producer's detailed per-grade property table and reflects normal plant-to-plant / lot-to-lot variance across the multiple facilities that manufacture this grade.