

## Polypropylene H362-09RS

### Subgroup:

Homopolymer Resin

### Description:

BRASKEM H362-09RS Polypropylene Resin is a homopolymer suited for high output, fast running cast film lines. BRASKEM H362-09RS has optimized rheology for fast extrusion (high output) providing good film properties like easy film winding and cutting performance, as well as good printing after corona treatment. Films based on BRASKEM H362-09RS in exhibit excellent optical properties, notably transparency and gloss. The grade contains slip and oleamide additives. The resin is well suited for the production of transparent films with a thickness range of 15-150 microns.

### Applications:

- Film for food packaging (bakery, snacks)
- Other film e.g. textile packaging (shirts, hosiery, blankets, sweaters), stationary

### Process:

- Cast film

| Physical                            | Nominal Value<br>(English) | Nominal Value (SI)      | Test Method |
|-------------------------------------|----------------------------|-------------------------|-------------|
| Density                             | 0.900 g/cm <sup>3</sup>    | 0.900 g/cm <sup>3</sup> | ISO 1183    |
| Melt Mass-Flow Rate (230°C/2.16 kg) | 9.5 g/10 min               | 9.5 g/10 min            | ISO 1133    |

| Mechanical                               | Nominal Value<br>(English) | Nominal Value (SI) | Test Method |
|--|----------------------------|--------------------|-------------|
| Tensile Stress (Yield, Injection Molded) | 4350 psi                   | 30 MPa             | ISO 527-2   |
| Tensile Strain (Yield, Injection Molded) | 12 %                       | 12 %               | ISO 527-2   |
| Flexural Modulus (Injection Molded)      | 174000 psi                 | 1200 MPa           | ISO 178     |

| Films                                     | Nominal Value<br>(English) | Nominal Value (SI) | Test Method  |
|---|----------------------------|--------------------|--------------|
| Film Thickness - Tested                   | 2 mil                      | 50 µm              |              |
| Tensile Modulus                           |                            |                    | ISO 527-3    |
| 1% Secant, MD: 1.2 mil (50 µm), Cast Film | 91700 psi                  | 632 MPa            |              |
| 1% Secant, TD: 1.2 mil (50 µm), Cast Film | 102000 psi                 | 703 MPa            |              |
| Tensile Stress                            |                            |                    | ISO 527-3    |
| MD: Break, 2.0mil (50µm), Cast Film       | 5660 psi                   | 39 MPa             |              |
| TD: Break, 2.0mil (50µm), Cast Film       | 4060 psi                   | 28 MPa             |              |
| Tensile Elongation                        |                            |                    | ISO 527-3    |
| MD: Break, 2.0mil (50µm), Cast Film       | 530%                       | 530%               |              |
| TD: Break, 2.0mil (50µm), Cast Film       | 520%                       | 520%               |              |
| Dart Drop Impact                          |                            |                    | ISO 7765-1   |
| 2.0mil (50µm), Cast Film                  | 190g                       | 190g               |              |
| Film Puncture Energy (1.2 mil (30 µm))    | 24.8 in·lb                 | 2.8 J              | ASTM D5748 * |
| Film Puncture Force (1.2 mil (30 µm))     | 13.7 lbf                   | 61 N               | ASTM D5748 * |

| Impact                         | Nominal Value<br>(English) | Nominal Value (SI)  | Test Method |
|--------------------------------|----------------------------|---------------------|-------------|
| Charpy Notched Impact Strength |                            |                     | ISO 179/eA  |
| 73°F (23°C), Injection Molded  | 2.4 ft·lb/in <sup>2</sup>  | 5 kJ/m <sup>2</sup> |             |

| Thermal                       | Nominal Value<br>(English) | Nominal Value (SI) | Test Method   |
|-------------------------------|----------------------------|--------------------|---------------|
| Heat Deflection Temperature   |                            |                    | ISO 75-2/B ** |
| 66 psi (0.45 MPa), Unannealed | 230 °F                     | 110 °C             |               |
| Vicat Softening Temperature   | 304 °F                     | 151 °C             | ISO 306/A **  |

| Optical                                    | Nominal Value<br>(English) | Nominal Value (SI) | Test Method |
|--|----------------------------|--------------------|-------------|
| Gloss (45°, 1.97 mil (50.0 µm), Cast Film) | 75                         | 75                 | ASTM D2457  |
| Haze (1.97 mil (50.0 µm), Cast Film)       | 5 %                        | 5 %                | ASTM D1003  |

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

\*\* Cast film

\*\* Injection Molded

### Regulatory Information:

BRASKEM H362-09RS Polypropylene Resin complies with European Commission Regulation (EU) No 10/2011.

The appropriate regulations should be consulted for more detailed information.

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