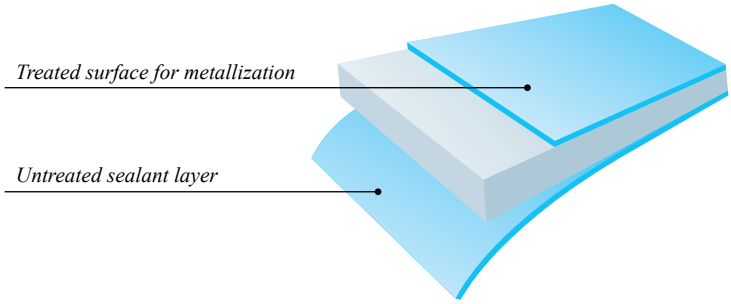
Manucor
food packaging




# Technical Data Sheet

## Bi-Oriented PolyPropylene Film (BOPP)

**S1M**

**15-30 microns**

**One-side corona treated, one-side sealable base film for metallization**

### Special Features

- High metal adhesion
- No migratory additives
- Low haze, high gloss
- High stiffness and mechanical properties

### Typical Applications

*Suitable for metallization on the treated side.*
*The untreated layer can be used for heat or cold seals.*
*The sealant is receptive to cold seals designed for untreated surfaces or can be treated in-line for other adhesives.*

| Properties | Unit | Typical Values | | | | Method |
|---|---|---|---|---|---|---|
| **Thickness** | micron | 15 | 20 | 25 | 30 | Manucor - gravimetric |
| **Unit weight** | g/m² | 13,6 | 18,2 | 22,5 | 27,3 | Manucor - gravimetric |
| **Yield** | m²/kg | 73,6 | 54,9 | 44,2 | 36,8 | Manucor method |
| **Surface tension** | dynes/cm | 38 | 38 | 38 | 38 | ASTM D 2578 |
| **Haze** | % | 1,8 | 1,9 | 2 | 2,1 | ASTM D 1003 |
| **Gloss** | % | 85 | 85 | 85 | 85 | ASTM D 2457 45° |
| **COF Dyn F-F (Untreated / Untreated)** | - | 0,35 | 0,35 | 0,35 | 0,35 | ASTM D 1894 |
| **Tensile strength at break (MD)** | N/mm² | 160 | 160 | 160 | 160 | ASTM D 882 |
| **Tensile strength at break (TD)** | N/mm² | 280 | 280 | 280 | 290 | ASTM D 882 |
| **Elongation at break (MD)** | % | 180 | 180 | 180 | 180 | ASTM D 882 |
| **Elongation at break (TD)** | % | 50 | 50 | 55 | 55 | ASTM D 882 |
| **Tensile modulus of elasticity (MD)** | N/mm² | 1800 | 1850 | 1900 | 1950 | ASTM D 882 |
| **Tensile modulus of elasticity (TD)** | N/mm² | 3600 | 3600 | 3600 | 3600 | ASTM D 882 |
| **Heat seal range (Untreated)** | °C | 105-140 | 105-140 | 105-140 | 105-140 | Manucor - 3 bar - 1" |
| **Seal strength (Untreated / Untreated)** | g/cm | 150 | 170 | 170 | 200 | Manucor - 130°C - 3 bar - 1" |
| **Shrinkage (MD)** | % | ≤5 | ≤5 | ≤5 | ≤5 | ASTM D 1204 120°C 5' |
| **Shrinkage (TD)** | % | ≤3 | ≤3 | ≤3 | ≤3 | ASTM D 1204 120°C 5' |

*Rev. Date 28/07/2015 - Please see our website www.manucor.com for the most updated version of this technical data sheet.*
*Disclaimer : Typical values describe useful product performance and are not intended for specification purposes.*