

## Nylene® PAC900-120U

Polymeric Resources Corporation (PRC) - Polyamide 6

### General Information

#### Product Description

- Nylene PAC900-120U is a high viscosity copolymer of nylon 6 and 6,9.
- PAC900-120U has many of the properties desirable in nylon 6 coupled with the advantages of a copolymer, which include lower processing temperatures.

#### General

|                   |  |
|-------------------|--|
| Material Status   | • Commercial: Active   |
| Availability      | • North America  |
| Features          | • Copolymer • High Viscosity   |
| Uses              | • Cable Jacketing • Fishing Applications • Monofilaments<br>• Coating Applications • Lawn & Garden Equipment • Wire & Cable Applications |
| Forms             | • Pellets  |
| Processing Method | • Filament Extrusion • Film Extrusion • Wire & Cable Extrusion   |

### Properties <sup>1</sup>

| Physical                        | Nominal Value | Unit     | Test Method |
|---------------------------------|---------------|----------|-------------|
| Density / Specific Gravity      | 1.11          |          | ASTM D792   |
| Relative Viscosity <sup>2</sup> | 120           |          | ASTM D789   |
| Mechanical                      | Nominal Value | Unit     | Test Method |
| Tensile Strength (Yield)        | 6670          | psi      | ASTM D638   |
| Tensile Elongation (Break)      | 270           | %        | ASTM D638   |
| Flexural Modulus                | 245000        | psi      | ASTM D790   |
| Impact                          | Nominal Value | Unit     | Test Method |
| Notched Izod Impact (73°F)      | 1.6           | ft-lb/in | ASTM D256   |
| Thermal                         | Nominal Value | Unit     | Test Method |
| Peak Melting Temperature        | 392           | °F       | ASTM D3418  |

### Processing Information

| Extrusion              | Nominal Value | Unit |
|------------------------|---------------|------|
| Drying Temperature     | 149           | °F   |
| Drying Time            | 2.0 to 4.0    | hr   |
| Suggested Max Re grind | 25            | %    |
| Cylinder Zone 1 Temp.  | 450 to 469    | °F   |
| Cylinder Zone 3 Temp.  | 469 to 489    | °F   |
| Cylinder Zone 5 Temp.  | 444 to 475    | °F   |
| Melt Temperature       | 480 to 500    | °F   |
| Die Temperature        | 480 to 500    | °F   |

### Notes

<sup>1</sup> Typical properties: these are not to be construed as specifications.

<sup>2</sup> Formic Acid

