

Product: Genflam® XL-R CPE
General Purpose
Gendon Code: 2612 (Black)



Revision Date: Sept 24, 2019

Genflam® XL-R CPE sheathing compound has been designed to process easily on standard extruders used in the production of wire and cable products. This materials is designed to process similar to elastomeric compounds, attaining maximum output levels at relatively low shear rates. Genflam XL-R CPE is supplied as free flowing pellets, packaged in sealed foil lined boxes and does not need to be dried prior to use.

Key Features:

- Excellent flame performance
- Excellent processing
- Lead Free
- Oil Resistant

Physical Properties:

Density: 1.34 g/cm³ *
Tensile: 2300 psi (typical) *
Elongation: 330% (typical) *
Low Temp. Brittle Point: -35°C

* Samples extruded as tape with a nominal thickness of 0.070 inches, then exposed to 12 MRad beam for crosslinking.

Combustion Properties:

Limited Oxygen Index (LOI): 32%

Heat Aging:

| | 7d@100°C | 7d@121°C |
|----------------------|----------|----------|
| Tensile Retention | 106% | 101% |
| Elongation Retention | 98% | 98% |

Fluid Resistance:

| | IRM 902 – 96h@100°C |
|----------------------|---------------------|
| Tensile Retention | 52% |
| Elongation Retention | 67% |

Suggested Running Conditions:

| | | | | | |
|-------------------|--|--------------------|-----------------|--------------|-----------------|
| Extruder L/D: | 20:1 or 24:1 | Comp. Ratio: | 1.25:1 | Screen Pack: | 20 Mesh or none |
| Screw Type: | Single Flight metering, without mixing section | | | | |
| Feed Zone: | 200°F | Center Zone: | 225-240°F | Head/Die: | 250°F |
| Screw Cooling: | 165°F | Die Cooling: | Not recommended | | |
| Gradient Cooling: | Recommended | Color Concentrate: | Not applicable | | |

Processing Techniques:

Genflam XL-R CPE sheathing compound has been designed to process easily on standard extruders used in the production of wire and cable products. This material is designed to process similar to elastomeric compounds, attaining maximum output levels at relatively low shear rates. Care should be taken to ensure that screw compression ratio levels are below 1.5:1, and flow restrictions in the crosshead are kept to a minimum. Melt temperature values above 300°F (150°C) should be avoided.

The material can be extruded using either pressure or sleeving techniques. For generation of optimum physical properties, a draw down ratio of 1.25:1 can be used. Gradient cooling is also recommended for maximization of compound physical properties.

The Genflam XL-R CPE is supplied as free flowing pellets, packaged in sealed foil lined boxes and do not need to be dried prior to use. It is recommended that the foil liners be resealed after use to prevent outside contamination or water absorption during storage. If the material has been exposed to a high humidity environment, or the foil liner has not been sealed, it is recommended the material be dried for a minimum of 4 hours at 140°F (60°C) in a standard desiccant style dryer prior to use.
