



A 3M Company

Dyneon™

Fluoroelastomer

FLS 2650

Features and Benefits

- Composition: terpolymer of vinylidene fluoride, hexafluoropropylene, and tetrafluoroethylene; plus cure site monomer
- Low volume swell, high fluorine terpolymer
- Can be used in blends with fluorosilicone, silicone, EDPM and other peroxide curable elastomers
- Process targets: transfer and compression molding
- Peroxide cure technology
- Slightly improved water and steam resistance over conventional fluoroelastomers
- Vulcanization of thick cross-section parts without fissuring

Typical Properties (Data not for specification purposes)

Fluorine Content [QCM 50.18.6.C]	70.3%
Specific Gravity [QCM 14.10.C]	1.89
Color	Translucent Amber
Solubility	Partially soluble in low molecular weight ketones and esters
Mooney Viscosity ML 1 + 10 @ 121°C (250°F) [QCM 2.14.4.C]	Approx. 50

Recommended Processing Procedures

Dyneon FLS 2650 can be compounded using standard water cooled internal mixers or two-roll mills with standard fillers and ingredients utilized in typical fluoroelastomer formulations. The “dry” ingredients should be blended before adding to the masticated gum. For best results, FLS 2650 should be banded on the mill several minutes prior to adding the blended dry ingredients. Once mixed, the compounded stocks have good scorch resistance and storage stability.

Product Form

FLS 2650 is packaged in slab form and is available in a returnable bulk shipping container system for 1,320 lbs (600 kg) of material. The bulk container system is comprised of 48 individual green polyethylene bags containing 27.5 lbs (12.5 kg) of product. Smaller quantities are available in 55.1 lb (25.0 kg) boxes.

Safety/Toxicology

Follow recommended handling precautions for use of Dyneon fluoroelastomers. General handling precautions include: (1) Store and use all Dyneon fluoroelastomers only in well ventilated areas. (2) Do not smoke in areas contaminated with dust from Dyneon fluoroelastomers. (3) Avoid eye contact. (4) After handling Dyneon fluoroelastomers wash any contacted skin with soap and water.

Potential hazards, including evolution of toxic vapors, do exist during compounding or processing under high temperature conditions. Before processing Dyneon fluoroelastomers, consult the product MSDS (Material Safety Data Sheet) and follow all label directions and handling precautions. You should also read and follow all directions from other compound ingredient suppliers. Material Safety Data Sheets on Dyneon products are available from your Dyneon Sales Representative or by dialing 651-733-5353.

