

8176 Glass MoS₂ NFF Material Data Sheet

Product Information

8176, Glass MoS₂ NFF

A glass fibre reinforced PTFE alloy with molybdenum disulphide.

Features

The glass filler used is E-glass milled fibre with a nominal diameter of 13 microns. This ensures an even dispersion of the molybdenum disulphide, thereby improving material hardness and lubrication properties. Mouldings have a homogenous and dense structure with a smooth surface that is grey in colour.

Benefits

This grade is designed to improve the creep resistance of virgin PTFE at both low and high temperatures. Wear and friction behaviour are also improved with minimal effect on electrical properties. Compared with 8170 grade, 8176 grade has better deformation under load and improved wear resistance.

Typical Applications

- Hydraulic rod and piston seals
- Guide rings and chevron packings
- Slide bearings
- Valve seats

Avoid use with Hydrofluoric Acid (HF) and strong alkalis.

Delivery Program

This product is sealed in two-layer plastic bags inside a rigid 25kg drum. It should be stored at 22°C to 25°C for 24 hours before processing.

This grade is available as:

- Non free flow
- Free flow available under product code 8476

Physical Properties

| Property | Value | Unit |
|------------------|-------|-------------------|
| Colour | Grey | |
| Bulk Density | 500 | g/l |
| Specific Gravity | 2.22 | g/cm ³ |
| Hardness | 62-64 | Shore D |
| Tensile Strength | 19 | MPa |
| Elongation | 220 | % |
| Shrinkage | 2.2 | % |

