

## 1. Product Identification

**Product Name:** PF-S02

**Chemical Name:** Polytetrafluoroethylene (PTFE)

**CAS No.:** 9002-84-0

**Polymerization Method:** Suspension Polymerization

**Processing Method:** Compression Molding

PF-S02 is a middle-particle PTFE suspension molding grade designed for general industrial molding applications requiring stable mechanical performance and controlled thermal stability.

## 2. Typical Applications

Final part validation remains the responsibility of the processor.

- PTFE sheets and rods
- Molded gaskets
- Bearings
- Pre-sintered materials
- Industrial sealing components

Final product qualification remains the responsibility of the processor.

## 3. Typical Properties Of PTFE Suspension Molding Powder PF-106 (Data not for specification purposes)

| Property                         | Unit               | Typical Value | Test Method |
|----------------------------------|--------------------|---------------|-------------|
| Appearance                       | —                  | White powder  | Visual      |
| Tensile Strength $\geq$          | MPa                | 27            | ASTM D4894  |
| Elongation at Break $\geq$       | %                  | 250           | ASTM D4894  |
| Average Particle Size            | $\mu\text{m}$      | 150 - 300     | ASTM D4894  |
| Bulk Density                     | g/L                | 500 $\pm$ 100 | ASTM D4894  |
| Moisture Content $\leq$          | %                  | 0.030         |             |
| Melting Point                    | $^{\circ}\text{C}$ | 327 $\pm$ 5   |             |
| Standard Specific Gravity        | g/cm <sup>3</sup>  | 2.120 – 2.170 | ASTM D4894  |
| Thermal Instability Index $\leq$ |                    | 30            |             |

## 4. Key Performance Characteristics

- Stable mechanical performance
- Controlled thermal stability
- Good moldability
- Excellent chemical resistance
- Continuous service temperature up to 260°C
- Suitable for medium-particle molding applications

## 5. Processing Recommendations

Recommended method: **Compression Molding**

Typical process steps:

- Cold preforming
- Sintering above melting temperature (~327°C)
- Controlled cooling

Processing conditions should be optimized according to part geometry and final performance requirements.

## 6. Packaging

- Double-layer polyethylene inner bag
- Rigid outer drum
- Net weight: 25 kg per drum
- Each drum supplied with batch identification and certificate of analysis

## 7. Storage And Handling

- Store in a clean, dry, well-ventilated warehouse
- Protect from moisture and contamination
- Avoid heavy vibration and mechanical impact during transport
- Not classified as dangerous goods under ADR, IMDG, or IATA

## 8. Regulatory Information (EU Compliance Statement)

- The product does not intentionally contain SVHC substances above 0.1% (w/w) as defined under REACH (EC) No 1907/2006.
- Compliant with RoHS Directive 2011/65/EU (as amended).
- Not classified as hazardous under CLP Regulation (EC) No 1272/2008.
- Safety Data Sheet available upon request.

Formal Declarations of Compliance can be provided upon request.

---

## QUZHOU DFS CHEM CO., LTD.

### LOCATION

No 288, Qinjiang East Road, Kecheng  
Quzhou, Zhejiang, China

### CONTACT US

Phone: +86 13957007557  
Email: [info@peonyptfe.com](mailto:info@peonyptfe.com)