



TECHNICAL DATA SHEET

Product Name: Magnesium Glycerophosphate

CAS Number: 927-20-8

Molecular Formula: C₃H₇MgO₆P

Molecular Weight: 210.37

EINECS No.: 240-235-1

EC Code: Not allocated

1. Product Description

Magnesium Glycerophosphate is a white to off-white crystalline powder used as a nutritional supplement, dietary ingredient, or food additive. It is a stable, bioavailable source of magnesium and phosphorus and is often used in pharmaceutical formulations, health foods, and beverages. It provides dual benefits of magnesium and phosphate, both essential for energy metabolism, bone health, and neurological function.

2. Specification

| Parameter | Specification |
|---------------------------------------|---------------------------|
| Appearance | White or off-white powder |
| Bulk density | 0.65g/cm ³ |
| Tapped density | 0.75g/cm ³ |
| Particle size | 60 - 100 mesh |
| Identification | Positive |
| Acidity | ≤ 1.5mL |
| Glycerol & ethanol(96%)-soluble subs. | ≤ %1.5 |
| Assay (as Mg) | 11.0% – 12.5% |
| Assay (as Glycerophosphate) | ≥ 85.0% |
| pH (1% solution) | 6.0 – 8.5 |
| Loss on Drying | ≤ 12.0% |
| Heavy Metals (Pb) | ≤ 10 ppm |
| Arsenic (As) | ≤ 1 ppm |
| Chloride | ≤ 0.15% |
| Sulfate | ≤ 0.1% |
| Microbiological Standards | |
| Total Plate Count | ≤ 1000 CFU/g |
| Yeast & Mold | ≤ 100 CFU/g |
| E. Coli | Negative |
| Salmonella | Negative |

3. Applications

Nutritional supplements – as a magnesium source

Infant formula and medical foods

Pharmaceutical preparations – magnesium tablets, capsules

Sports nutrition and fortified drinks

4. Packaging and Storage

Packaging: 25 kg net weight per fiber drum or paper bag, inner with PE liner

Shelf Life: 24 months when properly stored

Storage Conditions: Store in a cool, dry place, away from light and moisture

5. Regulatory Status

Food grade, conforms to FCC / USP standards (depending on grade)

Manufactured under ISO and HACCP-certified facilities

Non-GMO, Allergen-Free, BSE/TSE-free

