PRODUCT SPECIFICATION SHEET

16% Paraformaldehyde Solution

Catalog Number: P004-0500 **Size:** 500 mL **Form:** Liquid, ready-to-dilute

1. Product Description

CELLPICK 16% Paraformaldehyde (PFA) Solution is an ultra-concentrated, EM-grade fixative prepared in standard 1X Phosphate-Buffered Saline (PBS). This extremely robust master stock solution provides laboratories with maximum flexibility to formulate highly customized fixative concentrations (e.g., 8%, 4%, or 2%) required for specialized morphological studies, tissue perfusion, and electron microscopy.

By utilizing this pre-mixed, stabilized 16% formulation, researchers entirely avoid the severe inhalation hazards and extensive time associated with heating and depolymerizing raw PFA powder. The 500 mL format offers an exceptionally concentrated and economical resource for core facilities and high-demand research settings.

2. Specifications

Composition	16% (w/v) Paraformaldehyde in 1X Phosphate-Buffered Saline (PBS)
pH	7.4 ± 0.1 at 25°C
Form	Liquid, ready-to-dilute stock solution
Appearance	Clear, colorless liquid
Storage Conditions	2–8°C (Refrigerated). Protect from light.
Hazard Information	Contains Paraformaldehyde. Toxic, respiratory/skin irritant, and suspected carcinogen. Must be handled in a fume hood with proper PPE.

3. Recommended Applications & Usage

16% PFA is designed as a potent master stock for preparing working fixatives. It is essential for Electron Microscopy (EM), specialized Immunohistochemistry (IHC), and complex in vivo tissue perfusion protocols requiring high initial cross-linking density.

Usage (Dilution & Fixation): To prepare a standard 4% PFA working solution, dilute the 16% PFA stock 1:4 with sterile 1X PBS (e.g., 1 mL of 16% PFA + 3 mL of PBS) immediately before application. For standard cell fixation, apply the diluted 4% fixative to washed cells and incubate for 10–20 minutes at room temperature, followed by thorough PBS washing to remove residual fixative.

4. Ordering Information

Catalog Number	Product Name	Packaging Unit
P004-0500	16% Paraformaldehyde Solution	500 mL