PRODUCT SPECIFICATION SHEET

0.5M EGTA, pH 8.0

Catalog Number: E004-1000 **Size:** 1000 mL **Form:** Liquid, ready-to-use

1. Product Description

CELLPICK 0.5M EGTA, pH 8.0 is a premium, ready-to-use chelating agent specifically designed for the highly selective sequestration of calcium ions (Ca^{2+}). Unlike standard EDTA, EGTA exhibits a significantly lower affinity for magnesium ions (Mg^{2+}), making it the reagent of choice for protocols where magnesium-dependent enzymatic activity (such as ATP-dependent reactions) must be preserved while inhibiting calcium-dependent processes.

Because EGTA powder is notoriously difficult to dissolve, requiring time-consuming pH adjustments, this sterile, pre-mixed liquid formulation eliminates tedious preparation steps and ensures maximum consistency and reproducibility across sensitive biological assays.

2. Specifications

Concentration	0.5 M
Composition	500 mM Na_2EGTA, pH adjusted to 8.0 with sodium hydroxide, sterile solution.
pH	8.0 ± 0.1
Appearance	Clear, colorless liquid
Storage Conditions	2–8°C (Refrigerated)

3. Recommended Applications & Usage

This highly specialized buffer is frequently used in cell biology and biochemistry workflows. Key applications include the preparation of specific enzyme assay buffers (e.g., adenylate cyclase and calcium-dependent protein kinases), in vivo intracellular calcium signaling studies, and specialized protein extraction protocols.

Usage: Add the appropriate volume directly to your working solutions, cell culture media, or extraction buffers to achieve the desired final EGTA concentration. No further heating, stirring, or pH adjustment is required before use.

4. Ordering Information

Catalog Number	Product Name	Packaging Unit
E004-1000	0.5M EGTA, pH 8.0	1000 mL