

## Monosodium of 1-Hydroxy Ethylidene-1,1-Diphosphonic Acid (HEDP • Na)

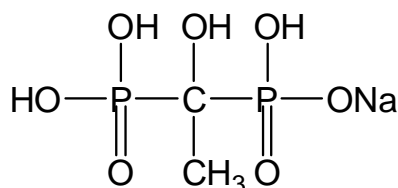
**CAS No.** 29329-71-3

**Dequest:** 2016A

**Molecular Formula:** C<sub>2</sub>H<sub>7</sub>O<sub>7</sub>P<sub>2</sub>Na

**Molecular weight:** 228

**Structural Formula:**



### Properties:

HEDP • Na is an organophosphonic acid corrosion inhibitor, it can chelate with Fe, Cu, and Zn ions. HEDP • Na can dissolve the oxidized materials, it has good scale and corrosion inhibition effects even under 250°C, it is stable under high pH value, not easy to be hydrolyzed, not easy to be decomposed under normal light and heat condition, its acid/alkaline and chloride oxidation tolerance are better than that of other organophosphonic acids. HEDP • Na can form six-ring chelating compounds with metal ions in water system, Ca<sup>2+</sup> in particular. HEDP • Na has good scale inhibition effects and obvious dissolution threshold effects. When used with other water treatment agents, the synergistic effects is better.

HEDP • Na is suitable for acidic scale inhibitor and detergent, can be used for metal surface treatment.

### Specification:

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| Appearance                       | Colorless or light yellow transparent liquid |
| Active component (HEDP) %        | 19.0-21.0                                    |
| Fe ppm                           | 20max  |
| pH value (1% water solution)     | 2.3-2.9                                      |
| Density (20°C) g/cm <sup>3</sup> | 1.11-1.21                                    |

**Usage:**

HEDP•Na is used in circulating cool water system, medium and low pressure boiler, oil field water pipelines as scale and corrosion inhibitor in fields such as power plant, chemical industry, metallurgy, fertilizer, etc.. In light woven industry, this product is used as detergent for metal and nonmetal. In dyeing industry, this product is used as peroxide stabilizer and dye-fixing agent; In non-cyanide electroplating, this product is used as chelating agent.

When used as scale inhibitor, the dosage 2-20mg/L is preferred, when used as corrosion inhibitor, the dosage 20-100mg/L is preferred, when used as cleaning agent, the dosage 1000-2000mg/L is preferred. Usually, HEDP • Na is used together with polycarboxylic acid.

**Package and Storage:**

Normally In 250kg net Plastic Drum, IBC drum can also be used as required. Storage for ten months in room shady and dry place.

**Safety Protection:**

Acidity, Avoid contact with eye and skin, once contacted, flush with water.