

1 M HEPES Solution

Cat. No. : PB180325

Size: 100mL

General Information

Product Form	Liquid
Concentration	1 M
pH	7.2-7.4
HEPES	238.3 g/L
Dissolvent	Purified water
Storage	2-8°C, Shading Light
Shipping	Room Temperature
Expiration date	24 months

Background

HEPES is all known as N-2-hydroxyethylpiperazine-N-2-ethane sulfonic acid, is a commonly used biological buffer. pKa (25°C) is 7.5 and an effective buffer range of pH is 6.8-8.2. The greatest advantage of HEPES is that to maintain the pH range of a solution for a longer period of time in an open environment.

HEPES cannot pass through biofilms. It is a chemical and enzymatic stable substance with limited effect on biochemical reactions, and the absorption of visible and ultraviolet light is extremely low. Therefore, it is generally considered that HEPES is an excellent biological buffer, and there is no toxic effect to the cells. The working concentration is 10-50 mM and the final concentration for cell culture is 10 mM.

Notes

1. This product is only used for scientific research or further research, not for diagnosis and treatment.
2. This product is sterilized by 0.1 μm filtration.
3. It is necessary to pay attention to the aseptic operation and avoid the pollution.
4. Store protected from light promptly after use. Studies have reported that HEPES in culture medium can generate cytotoxic hydrogen peroxide when exposed to visible light for more than 3 hours.