

# Stock Solution



TD-S Revision 2.0

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## 1M HEPPSO Buffer - 1 L

### Instructions

1. Dissolve 268.33 g of HEPPSO ([HEPPSO, GoldBio Catalog # H-480](#) [CAS 68399-78-0, mw. = 268.33]) in 750 mL of dH<sub>2</sub>O.
2. Adjust to desired pH using 10N NaOH.
3. Fill to final volume of 1 L with dH<sub>2</sub>O.
4. Filter sterilize (recommended) or autoclave.
5. Store at 4°C.

To make a 1 L solution of 1M HEPPSO, use the table below to estimate the required volume of base for a given pH:

Starting pH: 5.89  
Adjust pH with: 10N NaOH

pH	7.1	7.2	7.3	7.4	7.5	7.6	7.7	7.8	7.9	8	8.1	8.2	8.3	8.4	8.5
mL	3.9	5.0	6.4	8.2	10.7	13.3	16.2	19.5	24.3	28.3	33.5	38.8	43.3	49.0	56.0

**Note: This data was collected in GoldBio labs using GoldBio reagents and calculated using 100 ml volumes. All reagent volumes recorded above were adjusted accordingly to create this protocol.**

HEPPSO pKa at 25°: 7.85  
HEPPSO pH range: 7.1 – 8.5  
d(pKa)/dT value: -0.010