

Stock Solution



TD-S Revision 2.0

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1M PMSF Stock Solution

Instructions

1. Weigh 17.42 g PMSF ([Phenylmethylsulfonyl fluoride, GoldBio Catalog # P-470](#), [CAS 329-98-6, mw. = 174.19 g/mol]).
2. Add DMSO to a final volume of 100 ml. Dissolve completely.
3. Stocks may be kept at -20°C for up to 6 months.
4. PMSF is used at a final concentration of 0.1- 1.0mM

Note: PMSF is hygroscopic and is highly unstable in aqueous solutions. A typical working solution of PMSF is 1mM.

Note: PMSF is an anti-protease! Do not allow to come into contact with skin.

Note: PMSF is inactivated in aqueous solutions. The rate of inactivation increases with increasing pH and is faster at 25°C than at 4°C. The half-life of a 20mM aqueous solution of PMSF is ~35 minutes at pH 8.0. This short half-life means that aqueous solutions of PMSF can be safely discarded after they have been rendered alkaline (pH >8.6) and stored for several hours at room temperature.