



MP Biomedicals, LLC

29525 Fountain Parkway
Solon, Ohio 44139

Telephone: 440/337-1200
Toll Free: 800/854-0530
Fax: 440/337-1180
mailto: biotech@mpbio.com
web: <http://www.mpbio.com>

TECHNICAL INFORMATION

ENZYME SYSTEMS PRODUCTS

a division of



Technical Data Sheet

Ca

Protocol for Thiobenzyl Catalog Products

Storage

As a solid, the material can be stored at room temperature. The SB- product is hygroscopic, and if not stored in a desiccator, the product will turn gummy.

Solubility:

The SB- product is soluble in common solvents. MP Biomedicals recommends either DMSO or DMF.

Materials:

- Buffer of choice for relevant enzyme
- 0.13 M 5,5'-dithiobis (2-nitrobenzoic acid) (DTNB)
- 20 mM SB-product in distilled water

Method:

Add 470 μ l of buffer, 25 μ l of SB-product and 5 μ l of DTNB. Follow changes in absorbance at 412nm.

NOTE: Alternative method for thiobenzyl esters uses 6mM of 4,4'-dithiopyridine (DTP) in DMSO.

References:

- M.S. Paternack & H.N. Eisen (1996). A novel serine esterase expressed in cytotoxic T lymphocytes. *Nature* **314**: 743-745
- G.D. Green & E Shaw (1979). Thibenzoyloxycarbonyl-L-lysine, substrate for a sensitive colorimetric assay of trypsin-like enzymes. *Anal. Biochem.* **93**: 223-226