

## Product Information

### 4-Methylumbelliferyl Phosphate (4-MUP) Liquid Substrate System

Catalog Number **M3168**  
Storage Temperature 2–8 °C

#### Product Description

4-Methylumbelliferyl Phosphate (4-MUP) is a substrate for alkaline phosphatase that forms the soluble fluorescent reaction product methylumbelliferone. The 4-Methylumbelliferyl Phosphate (4-MUP) Liquid Substrate System combines 4-methylumbelliferyl phosphate (4-MUP) and buffer in a single solution, a ready to use reagent for procedures utilizing the alkaline phosphatase enzyme label.

Appearance	Clear, colorless solution
pH	10.0 (range 9.8–10.2)
Concentration	≥0.5 mM
Package Size	100 mL bottles Custom packaging and bulk purchase information is available upon request

#### Precautions and Disclaimer

This product is for R&D use only, not for drug, household, or other uses. Please consult the Safety Data Sheet for information regarding hazards and safe handling practices.

#### Storage/Stability

Store the product at 2–8 °C. Protect from light.

#### Procedure

Allow reagent to come to room temperature prior to dispensing. Do not add any additional ingredients to the solution. The 4-Methylumbelliferyl Phosphate (4-MUP) Liquid Substrate System incorporates 4-Methylumbelliferyl Phosphate and buffer in a single solution, a ready to use reagent for procedures utilizing the alkaline phosphatase enzyme label. Fluorescence can be measured with excitation at 360 nm and emission at 440 nm. Also, the fluorescent end product may also be observed using a UV light source.

#### Reference

1. Rose, N. et al., (eds.), Manual of Clinical Laboratory Immunology, 3rd. ed., American Society of Microbiology, (Washington, D.C.: 1986).

GY,GA,MAM 09/14-1