Creative Enzymes®

o-Phenylenediamine

Cat. No. CSUB-0412

Lot. No. (See product label)

Introduction

Applications	o-Phenylenediamine Free Base is a peroxidase substrate suitable for use in ELISA procedures. The substrate produces a soluble end product that is orange-brown in color and can be read spectrophotometrically at 450 nm. The OPD reaction may be stopped with 3 N HCl or 3 M H2SO4 and read at 492 nm.
Synonyms	1, 2-Diaminobenzene; 1, 2-Phenylenediamine; OPD

Product Information

Form	tablet
EC Number	202-430-6
CAS No.	95-54-5
Molecular Formula	C6H8N2
Molecular Weight	108.14
Impurities	λex 337 nm; λem 417 nm (after derivatization)
Vapor pressure	0.01 mmHg (25 °C)
mp	100-102 °C
bp	256-258 °C
Substrates	Peroxidase Substrates
Vapor Density	3.7 (vs air)

Usage and Packaging

Reconstitution	Dissolve one tablet in 0.05 M phosphate-citrate buffer, pH 5.0, to the desired concentration (typically an OPD concentration of 0.4 mg/ml is used). Add 40 µl of fresh 30% hydrogen peroxide per 100 ml of substrate buffer solution, immediately prior to use. Tablets are individually packaged in foil packets.

Storage and Shipping Information

Storage	2-8°C