

Glutathione Reductase from baker's yeast

Cat: G8810

Storage: Store at 2-8°C, valid for 2 years, and this product is offered as an ammonium sulfate suspension. Diluted stock solutions should not be prepared.

Product Information

CAS: 9001-48-3

Enzyme Commission (EC) Number: 1.6.4.2

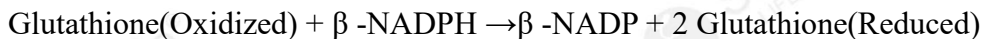
English name: Glutathione Reductase

Enzymatic Activity: 100-300 units/mg protein

Molecular Weight: 124 kDa

Introduction

Glutathione reductase from Baker's yeast is a flavoprotein homodimer consisting of two equal subunits. Each subunit has one mole of FAD which is noncovalently bound. Glutathione reductase is also a sulfhydryl protein containing a total of six sulfhydryl groups. The enzyme catalyzes the following reaction:



The K_m values for the enzyme are: oxidized glutathione (61 μM) and $\beta\text{-NADPH}$ (7.6 μM).

Glutathione reductase is inhibited by the following inhibitors:

N-alkylmaleimides; benzylselenosulphate; 2-chloroethylisocyanate; Cu^{2+} ; 2,4-dihydroxybenzylamine; 1-fluoro-2,4-dinitrobenzene; p-nitrobenzylselenosulphate; 2-triazine-5-nitrofur

Unit Definition

One unit will reduce 1.0 μmole of oxidized glutathione per min at pH 7.6 at 25 °C.

Physical form

Suspension in 3.6 M $(\text{NH}_4)_2\text{SO}_4$, pH 7.0, containing 0.1 mM dithiothreitol

Note

1. The product information is for reference only. If you have any questions, please call 400-968-6088 for consultation.
2. The products are all for scientific research use only. Do not use it for medical, clinical diagnosis or treatment, food and cosmetics, etc. Do not store them in ordinary residential areas.
3. For your safety and health, please wear laboratory clothes, disposable gloves and masks to operate.