Creative Enzymes®

Recombinant Acidianus ambivalens Sulfur oxygenase/reductase

Cat. No. EXWM-0574

Lot. No. (See product label)

Introduction

Description	This enzyme, which is found in thermophilic microorganisms, contains one mononuclear none-heme iron centre per subunit. Elemental sulfur is both the electron donor and one of the two known acceptors, the other being oxygen. Thiosulfate is also observed as a product, but is likely formed non-enzymically by a reaction between sulfite and sulfur. This enzyme differs from EC 1.13.11.18, sulfur dioxygenase and EC 1.12.98.4, sulfhydrogenase, in that both activities occur simultaneously.

Product Information

Species	Acidianus ambivalens
Source	E.coli
Form	Liquid or Lyophilized powder
EC Number	EC 1.13.11.55
CAS No.	120598-92-7
Molecular Weight	35.3kDa
Purity	Greater than 85% as determined by SDS-PAGE.
Activity	Not detected
Reaction	4 sulfur + 4 H2O + O2 = 2 hydrogen sulfide + 2 sulfite
Notes	This item requires custom production and lead time is between 5-9 weeks. We can custom produce according to your specifications.

Storage and Shipping Information

Storage	Store at -20°C/-80°C upon receipt, aliquoting is necessary for mutiple use. Avoid repeated freeze-thaw cycles.