

cysteine desulfurase

Cat. No. EXWM-3365

Lot. No. (See product label)

Introduction

Description

A pyridoxal-phosphate protein. The sulfur from free L-cysteine is first transferred to a cysteine residue in the active site, and then passed on to various other acceptors. The enzyme is involved in the biosynthesis of iron-sulfur clusters, thio-nucleosides in tRNA, thiamine, biotin, lipoate and pyranopterin (molybdopterin). In *Azotobacter vinelandii*, this sulfur provides the inorganic sulfide required for nitrogenous metallocluster formation.

Synonyms

IscS; NIFS; NifS; SufS; cysteine desulfurylase

Product Information

Form

Liquid or lyophilized powder

EC Number

EC 2.8.1.7

CAS No.

149371-08-4

Reaction

L-cysteine + acceptor = L-alanine + S-sulfanyl-acceptor (overall reaction); (1a) L-cysteine + [enzyme]-cysteine = L-alanine + [enzyme]-S-sulfanylcysteine; (1b) [enzyme]-S-sulfanylcysteine + acceptor = [enzyme]-cysteine + S-sulfanyl-acceptor

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 it at +4 °C for short term. For long term storage, store it at -20 °C~-80 °C.