

ferredoxin:thioredoxin reductase

Cat. No. EXWM-1681

Lot. No. (See product label)

Introduction

Description

The enzyme contains a [4Fe-4S] cluster and internal disulfide. It forms a mixed disulfide with thioredoxin on one side, and docks ferredoxin on the other side, enabling two one-electron transfers. The reduced thioredoxins generated by the enzyme activate the Calvin cycle enzymes EC 3.1.3.11 (fructose-bisphosphatase), EC 3.1.3.37(sedoheptulose-bisphosphatase) and EC 2.7.1.19 (phosphoribulokinase) as well as other chloroplast enzymes by disulfide reduction.

Product Information

Form Liquid or lyophilized powder

EC Number EC 1.8.7.2

Reaction $2 \text{ reduced ferredoxin} + \text{thioredoxin disulfide} = 2 \text{ oxidized ferredoxin} + \text{thioredoxin} + 2 \text{ H}^+$

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.