Creative Enzymes®

tryptophan 5-monooxygenase

Cat. No. EXWM-0956

Lot. No. (See product label)

Introduction

Description	The active centre contains mononuclear iron(II). The enzyme is activated by phosphorylation, catalysed by a Ca2+-activated protein kinase. The 4a-hydroxytetrahydrobiopterin formed can dehydrate to 6,7-dihydrobiopterin, both spontaneously and by the action of EC 4.2.1.96, 4a-hydroxytetrahydrobiopterin dehydratase. The 6,7-dihydrobiopterin can be enzymically reduced back to tetrahydrobiopterin, by EC 1.5.1.34 (6,7-dihydropteridine reductase), or slowly rearranges into the more stable compound 7,8-dihydrobiopterin.
Synonyms	L-tryptophan hydroxylase; indoleacetic acid-5-hydroxylase; tryptophan 5-hydroxylase; tryptophan hydroxylase

Product Information

Form	Liquid or lyophilized powder
EC Number	EC 1.14.16.4
CAS No.	9037-21-2
Reaction	L-tryptophan + tetrahydrobiopterin + O2 = 5-hydroxy-L-tryptophan + 4a-hydroxytetrahydrobiopterin
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 ℃ for short term. For long term storage, store it at -20 ℃~-80 ℃.