Creative Enzymes®

nuclear-inclusion-a endopeptidase

Cat. No. EXWM-4219

Lot. No. (See product label)

Introduction

Description	The potyviruses cause diseases in plants, and inclusion bodies appear in the host cell nuclei; protein a of the inclusion bodies is the endopeptidase. The enzyme finds practical use when encoded in vectors for the artificial expression of recombinant fusion proteins, since it can confer on them the capacity for autolytic cleavage. It is also reported that transgenic plants expressing the enzyme are resistant to viral infection. Type example of peptidase family C4.
Synonyms	potyvirus NIa protease

Product Information

Form	Liquid or lyophilized powder
EC Number	EC 3.4.22.44
CAS No.	139946-51-3
Reaction	Hydrolyses glutaminyl bonds, and activity is further restricted by preferences for the amino acids in P6 - P1' that vary with the species of potyvirus, e.g. Glu-Xaa-Xaa-Tyr-Xaa-Gln┼(Ser or Gly) for the enzyme from tobacco etch virus. The natural substrate is the viral polyprotein, but other proteins and oligopeptides containing the appropriate consensus sequence are also cleaved.
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 ℃.