PRODUCT INFORMATION

Expression system E.coli

Domain 176-277aa

UniProt No. P42574

NCBI Accession No. NP_116786

Alternative Names Caspase 3, CPP32, CPP32B, SCA-1

PRODUCT SPECIFICATION

Molecular Weight 12 kDa (103aa)

Concentration 0.5mg/ml (determined by Bradford assay)

Formulation

Liquid in. 20mM Tris-HCl buffer (pH 8.0) containing 0.4M urea, 10% glycerol

Purity > 80% by SDS-PAGE

Tag Non-Tagged

Application SDS-PAGE

Storage Condition

Can be stored at +2C to +8C for 1 week. For long term storage, aliquot and store at -20C to -80C. Avoid repeated freezing and thawing cycles.

BACKGROUND

Description

CASP3 is a protein which is a member of the cysteine-aspartic acid protease (caspase) family. Sequential activation of caspases plays a central role in the execution-phase of cell apoptosis. Caspases exist as inactive proenzymes which undergo proteolytic processing at conserved aspartic residues to produce two subunits, large and small, that dimerize to form the active enzyme. This protein cleaves and activates caspases 6, 7 and 9, and the protein itself is processed by caspases 8, 9 and 10. It is the predominant caspase involved in the cleavage of amyloid-beta 4A precursor protein, which is associated with neuronal death in Alzheimer's disease. Recombinant



human CASP3 protein, fused to His-tag at N-terminus, was expressed in E. coli.

Amino acid Sequence

MSGVDDDMAC HKIPVEADFL YAYSTAPGYY SWRNSKDGSW FIQSLCAMLK QYADKLEFMH ILTRVNRKVA TEFESFSFDA TFHAKKQIPC IVSMLTKELY FYH

General References

Harrington HA, Ho KL, et al. (2008). Theor Biol Med Model. 10 5:26.

DATA

SDS-PAGE



3ug by SDS-PAGE under reducing condition and visualized by coomassie blue stain.