PRODUCT INFORMATION

Expression system E.coli

Domain 1-312aa

UniProt No. P78549

NCBI Accession No. NP_002519.1

Alternative Names Endonuclease III-like protein 1, NTH1, OCTS3

PRODUCT SPECIFICATION

Molecular Weight 36.6 kDa (332aa) confirmed by MALDI-TOF

Concentration 0.25mg/ml (determined by Bradford assay)

Formulation Liquid in. 20mM Tris-HCl buffer (pH 8.0) containing 40% glycerol, 0.15M NaCl, 1mM DTT

Purity > 80% by SDS-PAGE

Tag His-Tag

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

NTHL1, also known as nth endonuclease III-like protein 1, is one of the enzyme that has been shown to act on a large number of oxidatively damaged DNA sites. It has an apurinic and/or apyrimidinic endonuclease activity and a DNA N-glycosylase activity. It acts on a damaged strand, 5' from the damaged site and incises damaged DNA at cytosines, thymines and guanines. Recombinant human NTHL1 protein, fused to His-tag at N-terminus, was expressed in E. coli and purified by using conventional chromatography.



Amino acid Sequence

<MGSSHHHHHH SSGLVPRGSH> MCSPQESGMT ALSARMLTRS RSLGPGAGPR GCREEPGPLR RREAAAEARK SHSPVKRPRK AQRLRVAYEG SDSEKGEGAE PLKVPVWEPQ DWQQQLVNIR AMRNKKDAPV DHLGTEHCYD SSAPPKVRRY QVLLSLMLSS QTKDQVTAGA MQRLRARGLT VDSILQTDDA TLGKLIYPVG FWRSKVKYIK QTSAILQQHY GGDIPASVAE LVALPGVGPK MAHLAMAVAW GTVSGIAVDT HVHRIANRLR WTKKATKSPE ETRAALEEWL PRELWHEING LLVGFGQQTC LPVHPRCHAC LNQALCPAAQ GL

General References

Imai K., et al. (1998) Gene. 222:287-295 Ikeda S., et al. (1998) J. Biol. Chem. 273:21585-21593

DATA

SDS-PAGE



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