

Thymidylate synthase Recombinant Protein | TYMS recombinant protein

Thymidylate synthase, 1-313aa, Human, His tag, E Coli

CATALOG # AAA11790	HOST E Coli	APPLICATIONS SDS-Page
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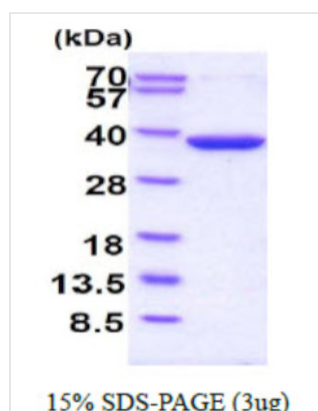
PRODUCT SYNONYMS

Thymidylate synthase; 1-313aa; Human; His tag; E Coli; HST422; TMS; TS; d TMP synthase; EC 2.1.1.45; MGC88736; Thymidylate synthetase; Tsase; TYMS; TYMS protein; Tyms thymidylate synthetase; ; TYMS recombinant protein

PRODUCT SPECIFICATIONS

Host	E Coli
Purity/Purification	> 95% by SDS-PAGE
Form/Format	Liquid. In 20mM Tris-HCl Buffer (pH 8.0) containing 10% glycerol, 1mM DTT, 0.1 M NaCl.
Concentration	1 mg/ml (determined by Bradford assay) (varies by lot)
Sequence	MGSSHHHHHH SSSLVPRGSH MPVAGSELPR RPLPPAAQER DAEPRPPHGE LQYLQIQIH LRCGVRKDDR TGTGTLNVFG MQARYSLRDE FPLLTTRVF WKGVLLELLW FIKGSTNAKE LSSKGVKIWD ANSRDFLDS LGFSTREEGD LGPVYGFQWR HFGAEYRDME SDYSGQGVQD LQRVIDTIKT NPDDRRRIIMC AAWNPRDLPLM ALPPCHALCQ FYVVNSELSQ QLYQRSGDMG LGVPFNIAFY ALLTYMIAHI TGLKPGDFIH TLGDAHIYLN HIEPLKIQIQ REPRPFPKLR ILRKVEKIDD FKAEDFQIEG YNPHTIKME MAV
Sequence Length	313
Applicable Applications for TYMS recombinant protein	SDS-PAGE
Antigen Species	Human
Tag Information	His-tag
Preparation and Storage	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

IMAGES



SDS-PAGE

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

ADDITIONAL INFORMATION

Related Product Information for TYMS recombinant protein	Thymidylate synthase is an intracellular enzyme critical for de novo synthesis of DNA. This function maintains the dTMP (thymidine-5-prime monophosphate) pool critical for DNA replication and repair. In cancer, expression of this protein is often elevated and becomes further elevated as a result of treatment with the most commonly used chemotherapeutic, 5-fluorouracil (5-Fu). Resistance or lack of response to 5-Fu is attributed to the elevation of thymidylate synthase activity. Recombinant human Thymidylate synthase protein, fused to His-tag at N-terminus, was expressed in E Coli and purified by using conventional chromatography techniques.
Product Categories/Family for TYMS recombinant protein	Enzymes & Proteases
References	Chiu TH., et al. (2009) Anticancer Res. 29 (11):4503-11. ; Pena MM., et al. (2009) J Biol Chem. 284 (46):31597-607.;

NCBI AND UNIPROT INFORMATION

NCBI GI #	4507751
NCBI GeneID	7298
NCBI Accession #	NP_001062
NCBI GenBank Nucleotide #	NM_001071.2
UniProt Accession #	P04818; Q8WYK3; Q8WYK4
Molecular Weight	37.8 kDa (333aa), confirmed by MALDI-TOF.
NCBI Official Full Name	thymidylate synthase
NCBI Official Synonym Full Names	thymidylate synthetase
NCBI Official Symbol	TYMS
NCBI Official Synonym Symbols	TS; TMS; HST422
NCBI Protein Information	thymidylate synthase
UniProt Protein Name	Thymidylate synthase
UniProt Gene Name	TYMS
UniProt Synonym Gene Names	TS; TS; TSase

For Research Use Only. Not for use in diagnostic or therapeutic procedures. Small volumes of product may become entrapped in the seal of the vial during shipment and storage; if necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the cap.