

9853 Pacific Heights Blvd. Suite D. San Diego, CA 92121, USA Tel: 858-263-4982

Email: info@abeomics.com

32-8444: Recombinant Human Thymidine Kinase, Cytosolic/TK1 (C-6His)

Gene : TK1 **Gene ID :** 7083 **Uniprot ID :** P04183

Description

Source: Human Cells.

MW:26.5kD.

Recombinant Human Thymidine kinase 1 is produced by our Mammalian expression system and the target gene encoding Met1-Asn234 is expressed with a 6His tag at the C-terminus. Thymidine kinase 1(TK1) belongs to the thymidine kinase family. It is located in the cytoplasm, and phosphorylated on Ser-13 in mitosis during post-translational modification. Two forms of this protein have been identified in animal cells, one in cytosol TK1 and one in mitochondria TK2. Thymidine kinases have a key function in the synthesis of DNA and thereby in cell division, as they are part of the unique reaction chain to introduce deoxythymidine into the DNA. Activity of the cytosolic enzyme is high in proliferating cells and peaks during the S-phase of the cell cycle, while it is very low in resting cells. TK1 acts as a homotetramer, and can transform thymidime to thymidine 5'-phosphate with the help of ATP

Product Info

Amount : $10 \mu g / 50 \mu g$

Content: Supplied as a 0.2 µm filtered solution of PBS,pH7.4.

Storage condition: Store at -20°C, stable for 6 months after receipt. Please minimize freeze-thaw cycles.

Amino Acid: MSCINLPTVLPGSPSKTRGQIQVILGPMFSGKSTELMRRVRRFQIAQYKCLVIKYAKDTRYSSSFCT

HDRNTMEALPACLLRDVAQEALGVAVIGIDEGQFFPDIVEFCEAMANAGKTVIVAALDGTFQRKPFG AILNLVPLAESVVKLTAVCMECFREAAYTKRLGTEKEVEVIGGADKYHSVCRLCYFKKASGQPAGP

DNKENCPVPGKPGEAVAARKLFAPQQILQCSPANVDHHHHHH

Application Note

Endotoxin: Less than 0.1 ng/Âμg (1 IEU/Âμg) as determined by LAL test.