

HM13 Antibody (C-term) Blocking Peptide

Synthetic peptide Catalog # BP14392b

Specification

HM13 Antibody (C-term) Blocking Peptide - Product Information

Primary Accession

Q8TCT9

HM13 Antibody (C-term) Blocking Peptide - Additional Information

Gene ID 81502

Other Names

Minor histocompatibility antigen H13, 3423-, Intramembrane protease 1, IMP-1, IMPAS-1, hIMP1, Presenilin-like protein 3, Signal peptide peptidase, HM13, H13, IMP1, PSL3, SPP

Format

Peptides are lyophilized in a solid powder format. Peptides can be reconstituted in solution using the appropriate buffer as needed.

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C.

Precautions

This product is for research use only. Not for use in diagnostic or therapeutic procedures.

HM13 Antibody (C-term) Blocking Peptide - Protein Information

Name HM13

Synonyms H13, IMP1, PSL3, SPP

Function

Catalyzes intramembrane proteolysis of some signal peptides after they have been cleaved from a preprotein, resulting in the release of the fragment from the ER membrane into the cytoplasm. Required to generate lymphocyte cell surface (HLA-E) epitopes derived from MHC class I signal peptides (PubMed:11714810). May be necessary for the removal of the signal peptide that remains attached to the hepatitis C virus core protein after the initial proteolytic processing of the polyprotein (PubMed:1214519912077416). Involved in the intramembrane cleavage of the integral membrane protein PSEN1 (PubMed:12077416/a>, PubMed:11714810/a>, PubMed:14741365/a>). Cleaves the integral membrane protein XBP1 isoform 1 in a DERL1/RNF139-dependent manner (PubMed:25239945/a>). May play a role in graft rejection (By similarity).



Cellular Location

Endoplasmic reticulum membrane; Multi-pass membrane protein. Membrane; Multi-pass membrane protein; Lumenal side

Tissue Location

Widely expressed with highest levels in kidney, liver, placenta, lung, leukocytes and small intestine and reduced expression in heart and skeletal muscle. Expressed abundantly in the CNS with highest levels in thalamus and medulla

HM13 Antibody (C-term) Blocking Peptide - Protocols

Provided below are standard protocols that you may find useful for product applications.

• Blocking Peptides

HM13 Antibody (C-term) Blocking Peptide - Images

HM13 Antibody (C-term) Blocking Peptide - Background

The protein encoded by this gene, which localizes to theendoplasmic reticulum, catalyzes intramembrane proteolysis of somesignal peptides after they have been cleaved from a preprotein. This activity is required to generate signal sequence-derived humanlymphocyte antigen-E epitopes that are recognized by the immunesystem, and to process hepatitis C virus core protein. The encodedprotein is an integral membrane protein with sequence motifscharacteristic of the presenilin-type aspartic proteases. Multipletranscript variants encoding several different isoforms have beenfound for this gene.

HM13 Antibody (C-term) Blocking Peptide - References

Sato, T., et al. Biochemistry 45(28):8649-8656(2006)Loureiro, J., et al. Nature 441(7095):894-897(2006)Urny, J., et al. Biochim. Biophys. Acta 1759 (3-4), 159-165 (2006) :Friedmann, E., et al. J. Biol. Chem. 279(49):50790-50798(2004)Soares, M.R., et al. FEBS Lett. 560 (1-3), 134-140 (2004) :