

Catalog # BP7392a

**GGTLA1 Antibody (N-term) Blocking Peptide** Synthetic peptide

Specification

# **GGTLA1** Antibody (N-term) Blocking Peptide - Product Information

Primary Accession

<u>P36269</u>

## GGTLA1 Antibody (N-term) Blocking Peptide - Additional Information

Gene ID 2687

#### **Other Names**

Gamma-glutamyltransferase 5, GGT 5, Gamma-glutamyl transpeptidase-related enzyme, GGT-rel, Gamma-glutamyltransferase-like activity 1, Gamma-glutamyltranspeptidase 5, Glutathione hydrolase 5, Leukotriene-C4 hydrolase, Gamma-glutamyltransferase 5 heavy chain, Gamma-glutamyltransferase 5 light chain, GGT5, GGTLA1

### Target/Specificity

The synthetic peptide sequence used to generate the antibody <a href=/products/AP7392a>AP7392a</a> was selected from the N-term region of human GGTLA1. A 10 to 100 fold molar excess to antibody is recommended. Precise conditions should be optimized for a particular assay.

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.

### **GGTLA1** Antibody (N-term) Blocking Peptide - Protein Information

Name GGT5

Synonyms GGTLA1

Function

Cleaves the gamma-glutamyl peptide bond of glutathione and glutathione-S-conjugate such as leukotriene C4 (PubMed:<a href="http://www.uniprot.org/citations/21447318" target="\_blank">21447318</a>). Does not cleaves gamma-glutamyl compounds such as gamma-glutamyl leucine (PubMed:<a href="http://www.uniprot.org/citations/21447318" target="\_blank">21447318</a>). Does not cleaves gamma-glutamyl compounds such as gamma-glutamyl leucine (PubMed:<a href="http://www.uniprot.org/citations/21447318" target="\_blank">21447318</a>). May also catalyze a transpeptidation reaction in addition to the hydrolysis reaction, transferring the gamma-glutamyl moiety to an acceptor amino acid to form a new gamma-glutamyl compound (PubMed:<a href="http://www.uniprot.org/citations/21447318"



target="\_blank">21447318</a>). Acts as a negative regulator of geranylgeranyl glutathione bioactivity by cleaving off its gamma-glutamyl group, playing a role in adaptive immune responses (PubMed:<a href="http://www.uniprot.org/citations/30842656" target="\_blank">30842656</a>).

Cellular Location Membrane {ECO:0000250|UniProtKB:Q9Z2A9}; Single- pass type II membrane protein {ECO:0000250|UniProtKB:Q9Z2A9}

## **GGTLA1** Antibody (N-term) Blocking Peptide - Protocols

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

#### <u>Blocking Peptides</u>

GGTLA1 Antibody (N-term) Blocking Peptide - Images

#### **GGTLA1 Antibody (N-term) Blocking Peptide - Background**

This gene is a member of gamma-glutamyl transpeptidase enzymes. This enzyme consists of a heavy and a light chain, and is able to hydrolyze the gamma-glutamyl moiety of glutathione. It converts leukotriene C4 to leukotriene D4, however, it doesn't convert synthetic substrates that are commonly used to assay gamma-glutamyl transpeptidase.

### **GGTLA1** Antibody (N-term) Blocking Peptide - References

Heisterkamp, N., Hum. Genet. 123 (4), 321-332 (2008) Enoiu, M., Free Radic. Biol. Med. 29 (9), 825-833 (2000)