

CD14 Antibody (N-term) Blocking Peptide Synthetic peptide

Catalog # BP6294a

Specification

CD14 Antibody (N-term) Blocking Peptide - Product Information

Primary Accession

<u>P08571</u>

CD14 Antibody (N-term) Blocking Peptide - Additional Information

Gene ID 929

Other Names

Monocyte differentiation antigen CD14, Myeloid cell-specific leucine-rich glycoprotein, CD14, Monocyte differentiation antigen CD14, urinary form, Monocyte differentiation antigen CD14, membrane-bound form, CD14

Target/Specificity

The synthetic peptide sequence used to generate the antibody AP6294a was selected from the N-term region of human CD14. 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.

CD14 Antibody (N-term) Blocking Peptide - Protein Information

Name CD14

Function

Coreceptor for bacterial lipopolysaccharide (PubMed:1698311, PubMed:23264655). In concert with LBP, binds to monomeric lipopolysaccharide and delivers it to the LY96/TLR4 complex, thereby mediating the innate immune response to bacterial lipopolysaccharide (LPS) (PubMed:20133493, PubMed:23264655, PubMed:20133493, PubMed:23264655, PubMed:22265692). Acts via MyD88, TIRAP and TRAF6, leading to NF-kappa-B activation, cytokine secretion and the inflammatory response (PubMed:<a href="http://www.uniprot.org/citations/8612135"



target="_blank">8612135). Acts as a coreceptor for TLR2:TLR6 heterodimer in response to diacylated lipopeptides and for TLR2:TLR1 heterodimer in response to triacylated lipopeptides, these clusters trigger signaling from the cell surface and subsequently are targeted to the Golgi in a lipid-raft dependent pathway (PubMed:16880211). Binds electronegative LDL (LDL(-)) and mediates the cytokine release induced by LDL(-) (PubMed:23880187).

Cellular Location

Cell membrane; Lipid-anchor, GPI-anchor. Secreted. Membrane raft. Golgi apparatus. Note=Secreted forms may arise by cleavage of the GPI anchor.

Tissue Location

Detected on macrophages (at protein level) (PubMed:1698311). Expressed strongly on the surface of monocytes and weakly on the surface of granulocytes; also expressed by most tissue macrophages.

CD14 Antibody (N-term) Blocking Peptide - Protocols

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

<u>Blocking Peptides</u>

CD14 Antibody (N-term) Blocking Peptide - Images

CD14 Antibody (N-term) Blocking Peptide - Background

CD14 is a surface protein preferentially expressed on monocytes/macrophages. It binds lipopolysaccharide binding protein and recently has been shown to bind apoptotic cells.

CD14 Antibody (N-term) Blocking Peptide - References

Donati,M., J. Periodontol. 79 (3), 517-524 (2008)Yuan,F.F., Immunol. Cell Biol. 86 (3), 268-270 (2008)Setoguchi,M., Biochim. Biophys. Acta 1008 (2), 213-222 (1989)Goyert,S.M., Science 239 (4839), 497-500 (1988)