

Niemann Pick C1 Antibody
Rabbit mAb
Catalog # AP91596

Specification

Niemann Pick C1 Antibody - Product Information

Application	WB, IHC, FC, ICC
Primary Accession	O15118
Reactivity	Rat
Clonality	Monoclonal
Other Names	
Niemann Pick C1 protein precursor; NPC; NPC1;	
Isotype	Rabbit IgG
Host	Rabbit
Calculated MW	142167 Da

Niemann Pick C1 Antibody - Additional Information

Purification	Affinity-chromatography
Immunogen	A synthesized peptide derived from human Niemann Pick C1
Description	Involved in the intracellular trafficking of cholesterol. May play a role in vesicular trafficking in glia, a process that may be crucial for maintaining the structural and functional integrity of nerve terminals.
Storage Condition and Buffer	Rabbit IgG in phosphate buffered saline , pH 7.4, 150mM NaCl, 0.02% sodium azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term. Avoid freeze / thaw cycle.

Niemann Pick C1 Antibody - Protein Information

Name NPC1 ([HGNC:7897](#))

Function

Intracellular cholesterol transporter which acts in concert with NPC2 and plays an important role in the egress of cholesterol from the endosomal/lysosomal compartment (PubMed:[10821832](http://www.uniprot.org/citations/10821832), PubMed:[12554680](http://www.uniprot.org/citations/12554680), PubMed:[18772377](http://www.uniprot.org/citations/18772377), PubMed:[27238017](http://www.uniprot.org/citations/27238017), PubMed:[9211849](http://www.uniprot.org/citations/9211849), PubMed:[9927649](http://www.uniprot.org/citations/9927649)). Unesterified cholesterol that has been released from LDLs in the lumen of the late endosomes/lysosomes is transferred by NPC2 to the cholesterol-binding pocket in the N-terminal domain of NPC1 (PubMed:[18772377](http://www.uniprot.org/citations/18772377)),

PubMed: 19563754, PubMed: 27238017, PubMed: 27378690, PubMed: 28784760, PubMed: 9211849, PubMed: 9927649. Cholesterol binds to NPC1 with the hydroxyl group buried in the binding pocket (PubMed: 19563754). Binds oxysterol with higher affinity than cholesterol. May play a role in vesicular trafficking in glia, a process that may be crucial for maintaining the structural and functional integrity of nerve terminals (Probable). Inhibits cholesterol-mediated mTORC1 activation through its interaction with SLC38A9 (PubMed: 28336668).

Cellular Location

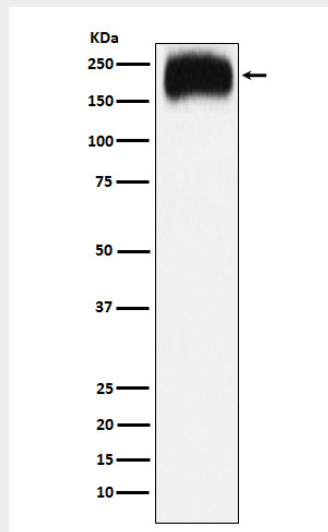
Late endosome membrane; Multi-pass membrane protein. Lysosome membrane; Multi-pass membrane protein

Niemann Pick C1 Antibody - Protocols

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

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

Niemann Pick C1 Antibody - Images



Western blot analysis of Niemann Pick C1 expression in HepG2 cell lysate.