

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) Recombinant Antibody Catalog # APR10718

Specification

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) - Product Information

Application Primary Accession Reactivity Clonality Isotype Calculated MW FC, Kinetics, Animal Model 099523 Human, Mouse Monoclonal IgG1 146.28 KDa

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) - Additional Information

Target/Specificity Sortilin / SORT1

Endotoxin < 0.001EU/ μg,determined by LAL method.

Conjugation Unconjugated

Expression system CHO Cell

Format

Purified monoclonal antibody supplied in PBS, pH6.0, without preservative. This antibody is purified through a protein A column.

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) - Protein Information

Name SORT1 (HGNC:11186)

Function

Functions as a sorting receptor in the Golgi compartment and as a clearance receptor on the cell surface. Required for protein transport from the Golgi apparatus to the lysosomes by a pathway that is independent of the mannose-6-phosphate receptor (M6PR). Lysosomal proteins bind specifically to the receptor in the Golgi apparatus and the resulting receptor-ligand complex is transported to an acidic prelysosomal compartment where the low pH mediates the dissociation of the complex (PubMed:16787399). The receptor is then recycled back to the Golgi for another round of trafficking through its binding to the retromer. Also required for protein transport from

round of trafficking through its binding to the retromer. Also required for protein transport from the Golgi apparatus to the endosomes. Promotes neuronal apoptosis by mediating endocytosis of the proapoptotic precursor forms of BDNF (proBDNF) and NGFB (proNGFB). Also acts as a receptor for neurotensin. May promote mineralization of the extracellular matrix during osteogenic differentiation by scavenging extracellular LPL. Probably required in adipocytes for the formation



of specialized storage vesicles containing the glucose transporter SLC2A4/GLUT4 (GLUT4 storage vesicles, or GSVs). These vesicles provide a stable pool of SLC2A4 and confer increased responsiveness to insulin. May also mediate transport from the endoplasmic reticulum to the Golgi.

Cellular Location

Golgi apparatus, Golgi stack membrane; Single-pass type I membrane protein. Endosome membrane; Single-pass type I membrane protein. Endoplasmic reticulum membrane; Single-pass type I membrane protein. Nucleus membrane; Single-pass type I membrane protein. Cell membrane; Single-pass type I membrane protein; Extracellular side Lysosome membrane; Single-pass type I membrane protein. Note=Localized to membranes of the endoplasmic reticulum, endosomes, Golgi stack, lysosomes and nucleus. A small fraction of the protein is also localized to the plasma membrane. May also be found in SLC2A4/GLUT4 storage vesicles (GSVs) in adipocytes Localization to the plasma membrane in adipocytes may be enhanced by insulin

Tissue Location

Expressed in brain and prostate (at protein level). Expressed at high levels in brain, spinal cord, heart, skeletal muscle, thyroid, placenta and testis. Expressed at lower levels in lymphoid organs, kidney, colon and liver.

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) - Protocols

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

- <u>Western Blot</u>
- Blocking Peptides
- <u>Dot Blot</u>
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

Anti-Sortilin / SORT1 Reference Antibody (latozinemab) - Images



Anti-Sortilin / SORT1 Reference Antibody (latozinemab) on SDS-PAGE under reducing (R) condition. The gel was stained with Coomassie Blue. The purity of the protein is greater than 95%





The purity of Anti-Sortilin / SORT1 Reference Antibody (latozinemab)is more than 96% ,determined by SEC-HPLC.