

SNX3 Antibody (Center) Blocking Peptide
Synthetic peptide
Catalog # BP18477c**Specification**

SNX3 Antibody (Center) Blocking Peptide - Product InformationPrimary Accession [O60493](#)**SNX3 Antibody (Center) Blocking Peptide - Additional Information****Gene ID** 8724**Other Names**

Sorting nexin-3, Protein SDP3, SNX3

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.

SNX3 Antibody (Center) Blocking Peptide - Protein Information**Name** SNX3 {ECO:0000303|PubMed:30213940, ECO:0000312|HGNC:HGNC:11174}**Function**

Phosphoinositide-binding protein required for multivesicular body formation. Specifically binds phosphatidylinositol 3-phosphate (PtdIns(P3)). Can also bind phosphatidylinositol 4-phosphate (PtdIns(P4)), phosphatidylinositol 5-phosphate (PtdIns(P5)) and phosphatidylinositol 3,5-bisphosphate (PtdIns(3,5)P2) (By similarity). Plays a role in protein transport between cellular compartments. Together with RAB7A facilitates endosome membrane association of the retromer cargo-selective subcomplex (CSC/VPS). May in part act as component of the SNX3-retromer complex which mediates the retrograde endosome-to-TGN transport of WLS distinct from the SNX-BAR retromer pathway (PubMed:21725319, PubMed:24344282, PubMed:30213940). Promotes stability and cell surface expression of epithelial sodium channel (ENAC) subunits SCNN1A and SCNN1G (By similarity). Not involved in EGFR degradation. Involved in the regulation of phagocytosis in dendritic cells possibly by regulating EEA1 recruitment to the nascent phagosomes (PubMed:23237080). Involved in iron homeostasis through regulation of endocytic recycling of the transferrin receptor TFRC presumably by delivering the transferrin:transferrin receptor complex to recycling endosomes; the function may involve the CSC retromer subcomplex (By similarity). In the case of Salmonella

enterica infection plays a role in maturation of the Salmonella-containing vacuole (SCV) and promotes recruitment of LAMP1 to SCVs (PubMed:20482551).

Cellular Location

Early endosome. Cytoplasmic vesicle, phagosome. Note=Colocalizes to clathrin-coated endosomal vesicles morphologically distinct from retromer-decorated non-branched endosomal tubule structures (PubMed:21725319) Colocalizes with EEA1 on nascent phagosomes in dendritic cells but competes with EEA1 for binding to phagosomal membrane (PubMed:23237080). In the case of Salmonella enterica infection localizes to Salmonella-containing vacuoles (SCVs) from which SNX3-containing tubules form 30-60 min after infection (PubMed:20482551).

SNX3 Antibody (Center) Blocking Peptide - Protocols

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

- [Blocking Peptides](#)

SNX3 Antibody (Center) Blocking Peptide - Images

SNX3 Antibody (Center) Blocking Peptide - Background

This gene encodes a member of the sorting nexin family. Members of this family contain a phox (PX) domain, which is a phosphoinositide binding domain, and are involved in intracellular trafficking. This protein does not contain a coiled coil region, like most family members. This protein interacts with phosphatidylinositol-3-phosphate, and is involved in protein trafficking.

SNX3 Antibody (Center) Blocking Peptide - References

Jugessur, A., et al. PLoS ONE 5 (7), E11493 (2010) :Pons, V., et al. PLoS Biol. 6 (9), E214 (2008) :Vieira, A.R., et al. Genet. Med. 10(9):668-674(2008) Dong, H., et al. Acta Biochim. Biophys. Sin. (Shanghai) 39(7):540-546(2007) Kumar, R.A., et al. BMC Med. Genet. 8, 48 (2007) :