10320 Camino Santa Fe, Suite G
San Diego, CA 92121
Tel: 858.875.1900 Fax: 858.875.1999

VAMP8 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab)
Catalog # AP20523a

Product Information

Application	WB, IHC-P, E
Primary Accession	Q9BV40
Reactivity	Human
Host	Rabbit
Clonality	Polyclonal
Isotype	Rabbit IgG
Calculated MW	11438
Antigen Region	1-30

Additional Information

Gene ID	8673
Other Names	Vesicle-associated membrane protein 8, VAMP-8, Endobrevin, EDB, VAMP8
Target/Specificity	This VAMP8 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 1-30 amino acids from the N-terminal region of human VAMP8.
Dilution	WB~~1:1000 IHC-P~~1:100 E~~Use at an assay dependent concentration.
Format	Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.
Storage	Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.
Precautions	VAMP8 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

Protein Information

Name	VAMP8 {ECO:0000303|PubMed:12130530, ECO:0000312|HGNC:HGNC:12647}
Function	SNAREs (soluble N-ethylmaleimide-sensitive factor-attachment protein receptors) are essential proteins for intracellular membrane fusion. SNAREs localized on opposing membranes assemble to form a trans-SNARE complex, an extended, parallel four-helix bundle whose assembly releases energy that drives membrane fusion. The core SNARE complex typically consists of four

	alpha-helical domains, three from target membrane SNAREs (t-SNAREs) and one from a vesicle SNARE (v- SNARE) (PubMed:23217709, PubMed:25686604, PubMed:28265073). VAMP8 is a v-SNARE that forms a SNARE complex with the t-SNARE STX11 and SNAP23. This SNARE complex plays a critical role in the regulated exocytosis of cytotoxic granules by natural killer (NK) cells and cytotoxic T- lymphocytes (PubMed:28265073). VAMP8 plays a role in autophagy where it controls organelle-organelle membrane fusion through a VAMP8, SNAP29 and STX17 SNARE complex that mediates the fusion of autophagosome and lysososome membranes (PubMed:23217709, PubMed:25686604). VAMP8 is required for dense-granule secretion in platelets (PubMed:12130530). Also plays a role in regulated enzyme secretion in pancreatic acinar cells (By similarity). Involved in the abscission of the midbody during cell division, which leads to completely separate daughter cells (By similarity). Involved in the homotypic fusion of early and late endosomes (By similarity). Also participates in the activation of type I interferon antiviral response through a TRIM6-dependent mechanism (PubMed:31694946).
Cellular Location	Lysosome membrane; Single-pass type IV membrane protein. Early endosome membrane; Single-pass type IV membrane protein. Late endosome membrane; Single-pass type IV membrane protein. Cell membrane {ECO:0000250|UniProtKB:O70404}; Single-pass type IV membrane protein. Zymogen granule membrane {ECO:0000250|UniProtKB:O70404}; Single-pass type IV membrane protein. Note=Perinuclear vesicular structures of the early and late endosomes, coated pits, and trans-Golgi (By similarity) Sub-tight junctional domain in retinal pigment epithelium cells Midbody region during cytokinesis. Lumenal oriented, apical membranes of nephric tubular cell (By similarity). Cycles through the apical but not through the basolateral plasma membrane (By similarity). Apical region of acinar cells; in zymogen granule membranes (By similarity) {ECO:0000250|UniProtKB:Q9WUF4}
Tissue Location	Platelets..

Background

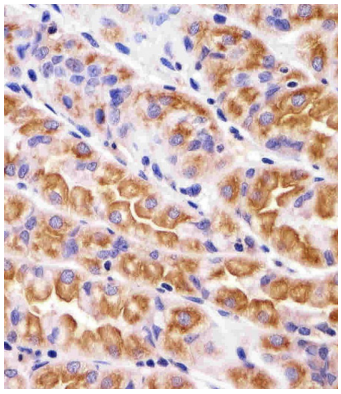
Involved in the targeting and/or fusion of transport vesicles to their target membrane. Involved for dense-granule secretion in platelets. Plays a role in regulated enzyme secretion in pancreatic acinar cells. Involved in the abscission of the midbody during cell division, which leads to completely separate daughter cells. Involved in the homotypic fusion of early and late endosomes (By similarity).

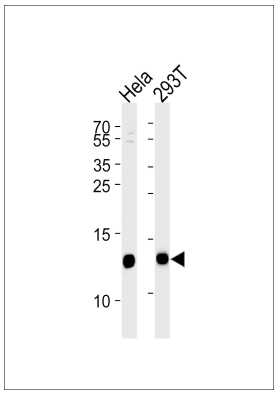
References

Wong S.H., et al. Mol. Biol. Cell 9:1549-1563(1998).
Kalnine N., et al. Submitted (MAY-2003) to the EMBL/GenBank/DDBJ databases.
Ebert L., et al. Submitted (JUN-2004) to the EMBL/GenBank/DDBJ databases.
Hillier L.W., et al. Nature 434:724-731(2005).
Polgar J., et al. Blood 100:1081-1083(2002).

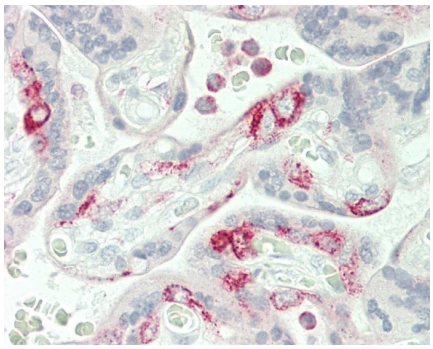
Images

Immunohistochemical analysis of paraffin-embedded H. stomach section using VAMP8 Antibody (N-term)(Cat#AP20523A). AP20523A was diluted at 1:25 dilution. A undiluted biotinylated goat polyvalent antibody was used as the secondary, followed by DAB staining.

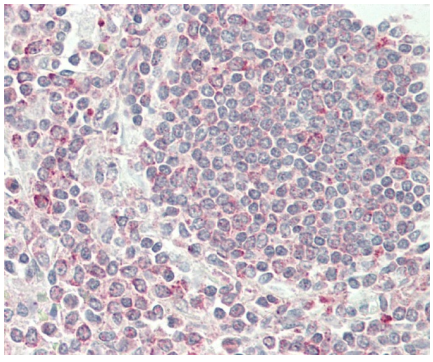




VAMP8 Antibody (N-term) (Cat. #AP20523a) western blot analysis in Hela,293T cell line lysates (35ug/lane).This demonstrates the VAMP8 antibody detected the VAMP8 protein (arrow).



Formalin-fixed and paraffin-embedded H.placenta tissue reacted with VAMP8 Antibody (N-term) (Cat#AP20523a).



Formalin-fixed and paraffin-embedded H.spleen tissue reacted with VAMP8 Antibody (N-term) (Cat#AP20523a).

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.