

Catalog # AF2155b

Goat Anti-VPS45 (Internal) Antibody Peptide-affinity purified goat antibody

Specification

Goat Anti-VPS45 (Internal) Antibody - Product Information

Application Primary Accession Other Accession Reactivity Predicted Host Clonality Concentration Isotype Calculated MW WB <u>O9NRW7</u> <u>NP_009190, 11311</u> Human Mouse, Rat, Pig, Dog Goat Polyclonal 100ug/200ul IgG 65077

Goat Anti-VPS45 (Internal) Antibody - Additional Information

Gene ID 11311

Other Names Vacuolar protein sorting-associated protein 45, h-VPS45, hIVps45, VPS455, VPS45A, VPS45B

Format

0.5 mg IgG/ml in Tris saline (20mM Tris pH7.3, 150mM NaCl), 0.02% sodium azide, with 0.5% bovine serum albumin

Storage

Maintain refrigerated at 2-8°C for up to 6 months. For long term storage store at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions

Goat Anti-VPS45 (Internal) Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

Goat Anti-VPS45 (Internal) Antibody - Protein Information

Name VPS45

Synonyms VPS45A, VPS45B

Function

May play a role in vesicle-mediated protein trafficking from the Golgi stack through the trans-Golgi network.

Cellular Location



Golgi apparatus membrane; Peripheral membrane protein. Endosome membrane; Peripheral membrane protein Note=Associated with Golgi/endosomal vesicles and the trans-Golgi network.

Tissue Location

Ubiquitous. Expression was highest in testis, heart and brain, intermediate in kidney, spleen, prostate, ovary, small intestine and thymus and low in lung, skeletal muscle, placenta, colon, pancreas, peripheral blood leukocytes and liver

Goat Anti-VPS45 (Internal) 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 Cytomety
- <u>Cell Culture</u>

Goat Anti-VPS45 (Internal) Antibody - Images



AF2155b (0.03 μ g/ml) staining of human placenta lysate (35 μ g protein in RIPA buffer). Primary incubation was 1 hour. Detected by chemiluminescence.

Goat Anti-VPS45 (Internal) Antibody - Background

Vesicle mediated protein sorting plays an important role in segregation of intracellular molecules into distinct organelles. Genetic studies in yeast have identified more than 40 vacuolar protein sorting (VPS) genes involved in vesicle transport to vacuoles. This gene is a member of the Sec1 domain family, and shows a high degree of sequence similarity to mouse, rat and yeast Vps45. The exact function of this gene is not known, but its high expression in peripheral blood mononuclear cells suggests a role in trafficking proteins, including inflammatory mediators.

Goat Anti-VPS45 (Internal) Antibody - References

Common and distinct roles for the binding partners Rabenosyn-5 and Vps45 in the regulation of



endocytic trafficking in mammalian cells. Rahajeng J, et al. Exp Cell Res, 2010 Mar 10. PMID 19931244.

Diversification of transcriptional modulation: large-scale identification and characterization of putative alternative promoters of human genes. Kimura K, et al. Genome Res, 2006 Jan. PMID 16344560.

The status, quality, and expansion of the NIH full-length cDNA project: the Mammalian Gene Collection (MGC). Gerhard DS, et al. Genome Res, 2004 Oct. PMID 15489334.

Complete sequencing and characterization of 21,243 full-length human cDNAs. Ota T, et al. Nat Genet, 2004 Jan. PMID 14702039.

Identification of mouse Vps16 and biochemical characterization of mammalian class C Vps complex. Kim BY, et al. Biochem Biophys Res Commun, 2003 Nov 21. PMID 14623309.