

TRPV6 Antibody (Center)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AW5014

Product Information

Application WB **Primary Accession Q9H1D0** Reactivity Human Host Rabbit Clonality polyclonal Calculated MW 87286 Isotype Rabbit IgG **Antigen Source HUMAN**

Additional Information

Gene ID 55503

Antigen Region 352-385

Other Names Transient receptor potential cation channel subfamily V member 6, TrpV6,

CaT-like, CaT-L, Calcium transport protein 1, CaT1, Epithelial calcium channel

2, ECaC2, TRPV6, ECAC2

Dilution WB~~1:1000

Target/Specificity This TRPV6 antibody is generated from a rabbit immunized with a KLH

conjugated synthetic peptide between 352-385 amino acids from the Central

region of human TRPV6.

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 TRPV6 Antibody (Center) is for research use only and not for use in diagnostic

or therapeutic procedures.

Protein Information

Name TRPV6

Synonyms ECAC2

Function

Calcium selective cation channel that mediates Ca(2+) uptake in various tissues, including the intestine (PubMed:11097838, PubMed:11248124, PubMed:11278579, PubMed:15184369, PubMed:23612980, PubMed:29258289). Important for normal Ca(2+) ion homeostasis in the body, including bone and skin (By similarity). The channel is activated by low internal calcium level, probably including intracellular calcium store depletion, and the current exhibits an inward rectification (PubMed:15184369). Inactivation includes both a rapid Ca(2+)-dependent and a slower Ca(2+)-calmodulin-dependent mechanism; the latter may be regulated by phosphorylation. In vitro, is slowly inhibited by Mg(2+) in a voltage-independent manner. Heteromeric assembly with TRPV5 seems to modify channel properties. TRPV5-TRPV6 heteromultimeric concatemers exhibit voltage-dependent gating.

Cellular Location

Cell membrane; Multi-pass membrane protein

Tissue Location

Expressed at high levels in the gastrointestinal tract, including esophagus, stomach, duodenum, jejunum, ileum and colon, and in pancreas, placenta, prostate and salivary gland Expressed at moderate levels in liver, kidney and testis. Expressed in trophoblasts of placenta villus trees (at protein level) (PubMed:23612980). Expressed in locally advanced prostate cancer, metastatic and androgen-insensitive prostatic lesions but not detected in healthy prostate tissue and benign prostatic hyperplasia

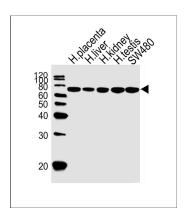
Background

Calcium selective cation channel probably involved in Ca(2+) uptake in various tissues, including Ca(2+) reabsorption in intestine. The channel is activated by low internal calcium level, probably including intracellular calcium store depletion, and the current exhibits an inward rectification. Inactivation includes both, a rapid Ca(2+)-dependent and a slower Ca(2+)-calmodulin- dependent mechanism, the latter may be regulated by phosphorylation. In vitro, is slowly inhibited by Mg(2+) in a voltage-independent manner. Heteromeric assembly with TRPV5 seems to modify channel properties. TRPV5-TRPV6 heteromultimeric concatemers exhibit voltage-dependent gating (By similarity).

References

Peng J.-B.,et al.Biochem. Biophys. Res. Commun. 278:326-332(2000). Wood R.J.,et al.BMC Physiol. 1:11-11(2001). Peng J.-B.,et al.Genomics 76:99-109(2001). Wissenbach U.,et al.J. Biol. Chem. 276:19461-19468(2001). Peng J.-B.,et al.Submitted (MAR-2001) to the EMBL/GenBank/DDBI databases.

Images



Western blot analysis of lysates from human placenta, liver, kidney, testis tissue and SW480 cell line (from left to right), using TRPV6 Antibody (Center) (Cat. #AW5014). AW5014 was diluted at 1:1000 at each lane. A goat anti-rabbit IgG H&L(HRP) at 1:10000 dilution was used as the secondary antibody.

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