



CaV α 2 δ 3 Monoclonal Antibody

Catalog No	YP-mAb-16322
Isotype	IgG
Reactivity	Human;Rat;Mouse
Applications	WB
Gene Name	CACNA2D3
Protein Name	Voltage-dependent calcium channel subunit alpha-2/delta-3 (Voltage-gated calcium channel subunit alpha-2/delta-3) [Cleaved into: Voltage-dependent calcium channel subunit alpha-2-3; Voltage-dependent
Immunogen	Synthetic Peptide of CaV α 2 δ 3 AA range: 500-580
Specificity	CaV α 2 δ 3 protein(A210) detects endogenous levels of CaV α 2 δ 3
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source	Monoclonal, Mouse,IgG
Purification	The antibody was affinity-purified from mouse antiserum by affinity-chromatography using epitope-specific immunogen.
Dilution	WB 1:500-1:2000
Concentration	1 mg/ml
Purity	≥90%
Storage Stability	-20°C/1 year
Synonyms	Voltage-dependent calcium channel subunit alpha-2/delta-3 (Voltage-gated calcium channel subunit alpha-2/delta-3) [Cleaved into: Voltage-dependent calcium channel subunit alpha-2-3; Voltage-dependent calcium channel subunit delta-3]
Observed Band	120kD
Cell Pathway	Membrane ; Single-pass type I membrane protein .
Tissue Specificity	Only detected in brain. Not present in lung, testis, aorta, spleen, jejunum, ventricular muscle and kidney (at protein level). According to PubMed:11687876, it is brain-specific, while according to PubMed:11245980, it is widely expressed.
Function	domain:The MIDAS-like motif in the VWFA domain binds divalent metal cations and is required to promote trafficking of the alpha-1 (CACNA1) subunit to the plasma membrane by an integrin-like switch.,function:The alpha-2/delta subunit of voltage-dependent calcium channels regulates calcium current density and activation/inactivation kinetics of the calcium channel. Acts as a regulatory subunit for P/Q-type calcium channel (CACNA1A), N-type (CACNA1B), L-type (CACNA1C OR CACNA1D) but not T-type (CACNA1G).,miscellaneous:In contrast to CACNA2D1 and CACNA2D2, it does not bind gabapentin, an antiepileptic drug.,PTM:May be proteolytically processed into subunits alpha-2-3



and delta-3 that are disulfide-linked. It is however unclear whether such cleavage really takes place in vivo and has a functional role.,PTM:N-glycosylated.,similarity:Belongs to the calcium channel subunit alpha-2/delta family.

Background

calcium voltage-gated channel auxiliary subunit alpha2delta 3(CACNA2D3) Homo sapiens This gene encodes a member of the alpha-2/delta subunit family, a protein in the voltage-dependent calcium channel complex. Calcium channels mediate the influx of calcium ions into the cell upon membrane polarization and consist of a complex of alpha-1, alpha-2/delta, beta, and gamma subunits in a 1:1:1:1 ratio. Various versions of each of these subunits exist, either expressed from similar genes or the result of alternative splicing. Research on a highly similar protein in Mouse suggests the protein described in this record is cleaved into alpha-2 and delta subunits. Alternate transcriptional splice variants of this gene have been observed but have not been thoroughly characterized. [provided by RefSeq, Jul 2008],

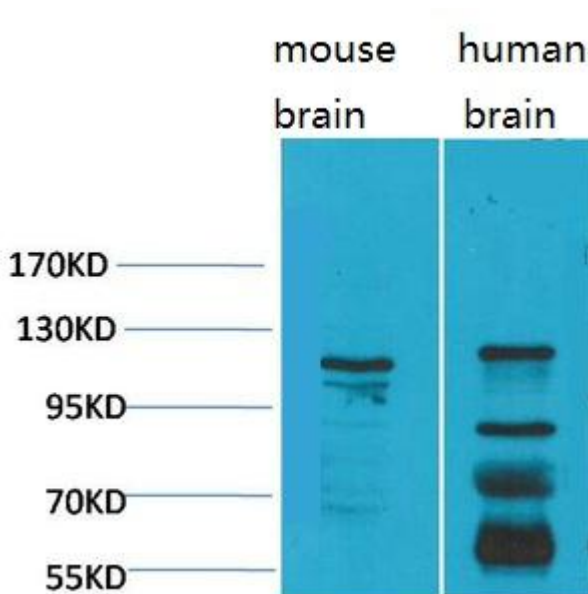
matters needing attention

Avoid repeated freezing and thawing!

Usage suggestions

This product can be used in immunological reaction related experiments. For more information, please consult technical personnel.

Products Images



Western Blot analysis of various cells using CaV α 2 δ 3 Monoclonal Antibody