ARG22278
anti-Cav 1.3 antibody [S48A-9]

Package: 50 µg
Store at: -20°C

Summary

Product Description	Mouse Monoclonal antibody [S48A-9] recognizes Cav 1.3
Tested Reactivity	Hu, Ms, Rat
Tested Application	ICC/IF, IHC-P, IP, WB
Specificity	Detects ~250kDa. No cross-reactivity against Cav1.2.
Host	Mouse
Clonality	Monoclonal
Clone	S48A-9
Isotype	IgG2a, kappa
Target Name	Cav 1.3
Species	Rat
Immunogen	Fusion protein around aa. 859-875 of Rat CaV1.3
Conjugation	Un-conjugated
Alternate Names	SANDD; CCHL1A2; Cav1.3; CACN4; PASNA; CACNL1A2; Calcium channel, L type, alpha-1 polypeptide, isoform 2; Voltage-dependent L-type calcium channel subunit alpha-1D; CACH3; Voltage-gated calcium channel subunit alpha Cav1.3

Application Instructions

Application table

Application	Dilution
ICC/IF	1:100
IHC-P	1:100
IP	Assay-dependent
WB	1:1000

Application Note: * The dilutions indicate recommended starting dilutions and the optimal dilutions or concentrations should be determined by the scientist.

Properties

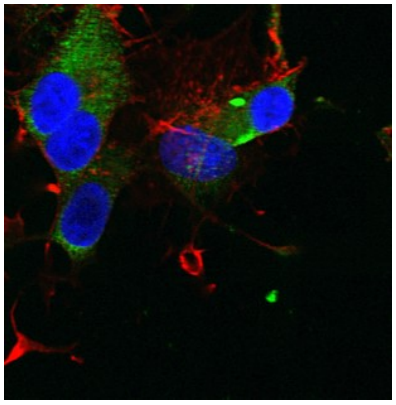
Form	Liquid
Purification	Purification with Protein G.
Buffer	PBS (pH 7.4), 0.09% Sodium azide and 50% Glycerol
Preservative	0.09% Sodium azide
Stabilizer	50% Glycerol

Concentration	1 mg/ml
Storage instruction	For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use.
Note	For laboratory research only, not for drug, diagnostic or other use.

Bioinformation

Gene Symbol	Cacna1d
Gene Full Name	calcium channel, voltage-dependent, L type, alpha 1D subunit
Background	Voltage-dependent calcium channels mediate the entry of calcium ions into excitable cells, and are also involved in a variety of calcium-dependent processes, including muscle contraction, hormone or neurotransmitter release, and gene expression. Calcium channels are multisubunit complexes composed of alpha-1, beta, alpha-2/delta, and gamma subunits. The channel activity is directed by the pore-forming alpha-1 subunit, whereas the others act as auxiliary subunits regulating this activity. The distinctive properties of the calcium channel types are related primarily to the expression of a variety of alpha-1 isoforms, namely alpha-1A, B, C, D, E, and S. This gene encodes the alpha-1D subunit. Several transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Dec 2012]
Function	Voltage-sensitive calcium channels (VSCC) mediate the entry of calcium ions into excitable cells and are also involved in a variety of calcium-dependent processes, including muscle contraction, hormone or neurotransmitter release, gene expression, cell motility, cell division and cell death. The isoform alpha-1D gives rise to L-type calcium currents. Long-lasting (L-type) calcium channels belong to the 'high-voltage activated' (HVA) group. They are blocked by dihydropyridines (DHP), phenylalkylamines, benzothiazepines, and by omega-agatoxin-IIIA (omega-Aga-IIIA). They are however insensitive to omega-conotoxin-GVIA (omega-CTx-GVIA) and omega-agatoxin-IVA (omega-Aga-IVA). [UniProt]
Calculated Mw	245 kDa
Cellular Localization	Cell membrane, Membrane

Images



ARG22278 anti-Cav 1.3 antibody [S48A-9] ICC/IF image

Immunofluorescence: Neuroblastoma cell stained with ARG22278 anti-Cav 1.3 antibody [S48A-9] (red) at 1:50 dilution.