info@arigobio.com

ARG46495
anti-SLC29A4 / PMAT antibody

Package: 50 µg
Store at: -20°C

Summary

Product Description	Rabbit Polyclonal antibody recognizes SLC29A4 / PMAT
Tested Reactivity	Hu
Tested Application	IHC-P, WB
Host	Rabbit
Clonality	Polyclonal
Isotype	IgG
Target Name	SLC29A4 / PMAT
Species	Human
Immunogen	A 18 amino acid synthetic peptide within the last 50 amino acids of human SLC29A4 / PMAT.
Conjugation	Un-conjugated
Alternate Names	SLC29A4; solute carrier family 29 (equilibrative nucleoside transporter), member 4; Solute carrier family 29 member 4; Equilibrative nucleoside transporter 4; ENT4; PMAT

Application Instructions

Application table

Application	Dilution
IHC-P	Assay-dependent
WB	Assay-dependent

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

Observed Size: 58 kDa

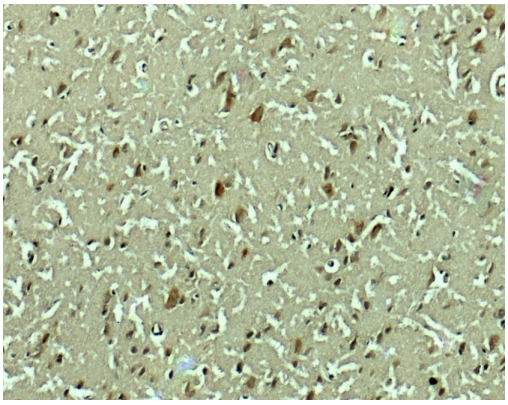
Properties

Form	Liquid
Purification	Affinity chromatography purified
Buffer	PBS and 0.02% Sodium azide.
Preservative	0.02% Sodium azide
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 -545°C or below. 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

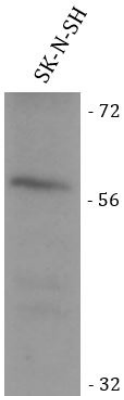
Gene Symbol	SLC29A4
Gene Full Name	solute carrier family 29 (equilibrative nucleoside transporter), member 4
Background	This gene encodes a member of the SLC29A/ENT transporter protein family. The encoded membrane protein catalyzes the reuptake of monoamines into presynaptic neurons, thus determining the intensity and duration of monoamine neural signaling. It has been shown to transport several compounds, including serotonin, dopamine, and the neurotoxin 1-methyl-4-phenylpyridinium. Alternative splicing results in multiple transcript variants. [provided by RefSeq, Jul 2014]
Function	Electrogenic voltage-dependent transporter that mediates the transport of a variety of endogenous bioactive amines, cationic xenobiotics and drugs (PubMed:15448143, PubMed:16099839, PubMed:16873718, PubMed:17018840, PubMed:17121826, PubMed:20592246, PubMed:20858707, PubMed:22396231, PubMed:31537831). Utilizes the physiologic inside-negative membrane potential as a driving force to facilitate cellular uptake of organic cations (PubMed:15448143, PubMed:20592246, PubMed:22396231). Functions as a Na(+)- and Cl(-)-independent bidirectional transporter (PubMed:15448143, PubMed:16099839, PubMed:22396231, PubMed:31537831). Substrate transport is pH-dependent and enhanced under acidic condition, which is most likely the result of allosteric changes in the transporter structure (PubMed:16873718, PubMed:17018840, PubMed:20592246, PubMed:22396231, PubMed:31537831). Implicated in monoamine neurotransmitters uptake such as serotonin, dopamine, adrenaline/epinephrine, noradrenaline/norepinephrine, histamine and tyramine, thereby supporting a role in homeostatic regulation of aminergic neurotransmission in the central nervous system (PubMed:15448143, PubMed:16099839, PubMed:17018840, PubMed:17121826, PubMed:20858707, PubMed:22396231). Also responsible for the uptake of bioactive amines and drugs through the blood-cerebrospinal fluid (CSF) barrier, from the CSF into choroid plexus epithelial cells, thereby playing a significant role in the clearance of cationic neurotoxins, xenobiotics and metabolic waste in the brain (By similarity). Involved in bidirectional transport of the purine nucleoside adenosine and plays a role in the regulation of extracellular adenosine concentrations in cardiac tissues, in particular during ischemia (PubMed:16873718, PubMed:20592246, PubMed:31537831). May be involved in organic cation uptake from the tubular lumen into renal tubular cells, thereby contributing to organic cation reabsorption in the kidney (PubMed:17018840). Also transports guanidine (PubMed:16099839). [UniProt]
Calculated Mw	58 kDa
PTM	Glycoprotein. [UniProt]
Cellular Localization	Cell membrane. [UniProt]

Images



ARG46495 anti-SLC29A4 / PMAT antibody IHC-P image

Immunohistochemistry: Human brain stained with ARG46495 anti-SLC29A4 / PMAT antibody.



ARG46495 anti-SLC29A4 / PMAT antibody WB image

Western blot: SK-N-SH stained with ARG46495 anti-SLC29A4 / PMAT antibody.