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P2RX7 Mouse mAb

Catalog # AP96683

Product Information

Application	WB, IHC-P
Predicted	Rat, Human, Mouse
Host	Mouse
Clonality	Monoclonal
Calculated MW	69 KDa
Immunogen	Recombinant human P2RX7 protein
Isotype	IgG2b
Purity	affinity purified by Protein A
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SIMILARITY	Belongs to the P2X receptor family.
SUBUNIT	Functional P2XRs are organized as homomeric and heteromeric trimers. Interacts with LAMA3, ITGB2, ACTB, ACTN4, SVIL, MPP3, HSPA1, HSPCB, HSPA8, PIK230 and PTPRB.
Post-translational modifications	Phosphorylation results in its inactivation.ADP-ribosylation at Arg-125 is necessary and sufficient to activate P2RX7 and gate the channel (By similarity).Palmitoylation of several cysteines in the C-terminal cytoplasmic tail is required for efficient localization to cell surface.
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	The P2X receptor family is comprised of ligand-gated ion channels that allow for the increased permeability of calcium into the cell in response to extracellular ATP. The seven P2X receptors, P2X1-P2X7, form either homomeric or heteromeric channels or both. They are characterized by intracellular amino- and carboxy-termini. P2X receptors are expressed in a wide variety of tissues, including neurons, prostate, bladder, pancreas, colon, testis and ovary. The major function of the P2X receptors is to mediate synaptic transmissions between neurons and to other tissues via the binding of extracellular ATP, which acts as a neurotransmitter. The P2X receptors may be involved in the onset of necrosis or apoptosis after prolonged exposure to high concentrations of extracellular ATP.

Additional Information

Other Names	P2X7; P2X(7); P2X7R; P2RX7_HUMAN; P2RX7; ATP receptor; P2Z receptor; Purinergic receptor; P2RX7_MOUSE; P2RX7_RAT; purinergic receptor P2X 7; purinergic receptor P2X, ligand-gated ion channel, 7
Dilution	WB=1:500-1000,IHC-P=1:100-200,Flow-Cyt=1:50-100
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Name	P2RX7 Mouse mAb
Function	The product P2RX7 belongs to the family of purinoceptors for ATP. This receptor functions as a ligand-gated ion channel and is responsible for ATP-dependent lysis of macrophages through the formation of membrane pores permeable to large molecules. Activation of this nuclear receptor by ATP in the cytoplasm may be a mechanism by which cellular activity can be coupled to changes in gene expression.

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