For Research Use Only

TRPM4 Polyclonal antibody

Catalog Number:21985-1-AP

2 Publications



Purification Method:

WB 1:500-1:3000 IHC 1:50-1:500

Antigen affinity purification

Recommended Dilutions:

Basic Information

 Catalog Number:
 GenBank Accession Number:

 21985-1-AP
 BC132727

 Size:
 GeneID (NCBI):

 1000 μ g/ml
 54795

 Source:
 UNIPROT ID:

 Rabbit
 Q8TD43

 Isotype:
 Full Name:

IgG transient receptor potential cation
Immunogen Catalog Number: channel, subfamily M, member 4

130~150 kDa

AG17132 Calculated MW: 1214 aa, 134 kDa
Observed MW:

Applications

Tested Applications: WB, IHC, ELISA Cited Applications:

Species Specificity: human, mouse Cited Species:

Note-IHC: suggested antigen retrieval with TE buffer pH 9.0; (*) Alternatively, antigen retrieval may be performed with citrate buffer pH 6.0

Positive Controls:

WB: 37°C incubated HEK-293 cells,

IHC: mouse brain tissue,

Background Information TR

TRPM4 is a Calcium-activated nonselective cation channel. It is activated by increase in intracellular Ca2+, mediates transport of monovalent cations (Na+ > K+ > Cs+ > Li+), leading to depolarize the membrane. It thereby plays a central role in cadiomyocytes, neurons from entorhinal cortex, dorsal root and vomeronasal neurons, endocrine pancreas cells, kidney epithelial cells, cochlea hair cells etc. TRPM4 participates in T-cell activation by modulating Ca2+ oscillations after T lymphocyte activation, which is required for NFAT-dependent IL2 production. It's also involved in myogenic constriction of cerebral arteries.

Notable Publications

Author	Pubmed ID	Journal	Application
Fengxiang Ye	38103473	Tissue Cell	WB
Xiaoshi Ma	38022698	Comput Struct Biotechnol J	IF

Storage

Storage:

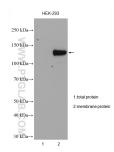
Store at -20°C. Stable for one year after shipment.

Storage Buffer:

PBS with 0.02% sodium azide and 50% glycerol pH 7.3.

Aliquoting is unnecessary for -20°C storage

Selected Validation Data



HEK-293 cells(total protein heated at 100°C, membrane protein incubated at 37°C) were subjected to SDS PAGE followed by western blot with 21985-1-AP (TRPM4 antibody) at dilution of 1:1500 incubated at room temperature for 1.5 hours.



Immunohistochemical analysis of paraffinembedded mouse brain tissue slide using 21985-1-AP (TRPM4 antibody) at dilution of 1:200 (under 40x lens). Heat mediated antigen retrieval with Tris-EDTA buffer (pH 9.0).