

T2R38 Polyclonal Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP59054

Specification

T2R38 Polyclonal Antibody - Product Information

Application Primary Accession Host Clonality Calculated MW Physical State Immunogen Epitope Specificity Isotype Purity affinity purified by Protein A	IHC-P, IHC-F, IF, ICC, E <u>P59533</u> Rabbit Polyclonal 38 KDa Liquid KLH conjugated synthetic peptide derived from human T2R38/TAS2R38 151-250/333 IgG
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SUBCELLULAR LOCATION	Membrane; Multi-pass membrane protein.
SIMILARITY	Belongs to the G-protein coupled receptor T2R family.
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.

Background Descriptions

The sense of taste is essential for the survival of organisms. For example, the ability to identify sweet-tasting foods enables animals to seek out food with high nutritive value, whereas the ability to identify bitter substances enables them to avoid the ingestion of potentially harmful substances. A family of integral membrane proteins are involved in taste perception and include T1R, which is involved in sweet taste perception and T2R, which is involved in bitter taste perception. Both types of taste receptors couple to various G proteins to initiate signal transduction cascades. Specifically, T2R38 is expressed in subsets of taste receptor cells of the tongue and exclusively in gustducin-positive cells. Variations in T2R38 are associated with the ability to taste the bitter chemical phenylthiocarbamide (PTC), also called thiourea tasting.

T2R38 Polyclonal Antibody - Additional Information

Gene ID 5726

Other Names Taste receptor type 2 member 38, T2R38, PTC bitter taste receptor, Taste receptor type 2 member 61, T2R61, TAS2R38, PTC

Target/Specificity

Expressed in subsets of taste receptor cells of the tongue and exclusively in gustducin-positive cells.



Dilution

IHC-P~~N/A<br \>IHC-F~~N/A<br \>IF~~1:50~200<br \>ICC~~N/A<br \>E~~N/A

Format

0.01M TBS(pH7.4), 0.09% (W/V) sodium azide and 50% Glyce

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.

T2R38 Polyclonal Antibody - Protein Information

Name TAS2R38

Synonyms PTC

Function

Receptor that may play a role in the perception of bitterness and is gustducin-linked. May play a role in sensing the chemical composition of the gastrointestinal content. The activity of this receptor may stimulate alpha gustducin, mediate PLC-beta-2 activation and lead to the gating of TRPM5 (By similarity).

Cellular Location Membrane; Multi-pass membrane protein.

Tissue Location Expressed in subsets of taste receptor cells of the tongue and exclusively in gustducin-positive cells. Expressed in testis (PubMed:16720576).

T2R38 Polyclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- <u>Western Blot</u>
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- <u>Cell Culture</u>

T2R38 Polyclonal Antibody - Images

T2R38 Polyclonal Antibody - Citations

• Loss of CFTR function is associated with reduced bitter taste receptor-stimulated nitric oxide innate immune responses in nasal epithelial cells and macrophages