

TCCR Antibody

Catalog # ASC10146

Specification

TCCR Antibody - Product Information

Application Primary Accession Other Accession Reactivity Host Clonality Isotype Calculated MW Application Notes

WB, IHC-P, IF, E <u>Q6UWB1</u> <u>NP_004834</u>, <u>4759328</u> Human Rabbit Polyclonal IgG 70 kDa KDa TCCR antibody can be used for detection of TCCR by Western blot at 1 μg/mL. An approximately 70 kDa band can be detected. Antibody can also be used for immunohistochemistry starting at 10 μg/mL. For immunofluorescence start at 20 μg/mL.

TCCR Antibody - Additional Information

Gene ID 9466 Other Names TCCR Antibody: CRL1, TCCR, WSX1, IL27R, IL-27RA, zcytor1, CRL1, UNQ296/PRO336, Interleukin-27 receptor subunit alpha, Cytokine receptor WSX-1, IL-27 receptor subunit alpha, interleukin 27 receptor, alpha

Target/Specificity IL27RA;

Reconstitution & Storage

TCCR antibody can be stored at 4°C for three months and -20°C, stable for up to one year. As with all antibodies care should be taken to avoid repeated freeze thaw cycles. Antibodies should not be exposed to prolonged high temperatures.

Precautions TCCR Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

TCCR Antibody - Protein Information

Name IL27RA

Synonyms CRL1, TCCR, WSX1

Function

Receptor for IL27. Requires IL6ST/GP130 to mediate signal transduction in response to IL27. This



signaling system acts through STAT3 and STAT1. Acts as a receptor for the neuroprotective peptide humanin as part of a complex with IL6ST/GP130 and CNTFR (PubMed:19386761). Involved in the regulation of Th1-type immune responses. Also appears to be involved in innate defense mechanisms.

Cellular Location

Membrane; Single-pass type I membrane protein.

Tissue Location

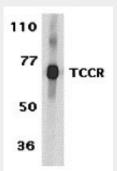
Highly expressed in lymphoid tissues such as spleen, lymph nodes and peripheral blood leukocytes. Weakly expressed in other tissues examined including heart, brain, fetal and adult lung, liver, skeletal muscle, kidney, pancreas, prostate, testis, ovary, small intestine, kidney and colon. In the lymphoid system, higher level expression in CD4+ T-cell subsets than in CD8+ T-cell subsets. Also weaker expression in CD19+ B-cells and monocytes

TCCR Antibody - Protocols

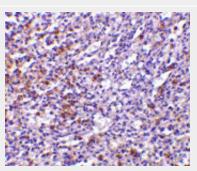
Provided below are standard protocols that you may find useful for product applications.

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

TCCR Antibody - Images

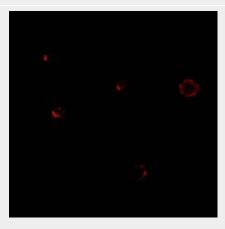


Western blot analysis of TCCR expression in human spleen tissue lysates with TCCR antibody at 1 μ g /ml.





Immunohistochemistry of TCCR in human spleen tissue with TCCR antibody at 10 µg/mL.



Immunofluorescence of TCCR in A549 cells with TCCR antibody at 20 μ g/mL.

TCCR Antibody - Background

TCCR Antibody: Upon antigen challenge, T-helper cells differentiate into two functional distinct subsets, Th1 and Th2. Th1 cells produce IL-2, IFN-gamma and lymphotoxin-beta that augment cell mediated immune response while Th2 cells secrete IL-4, IL-5, and IL-10 that enhance humoral immunity. The function of T-helper cells is regulated by cytokines. A novel cytokine receptor was recently identified and cloned. It is a new member in the type I cytokine receptor family and designated TCCR for T-cell cytokine receptor and WSX-1. TCCR deficient mice had impaired Th1 responses to protein antigen challenge, including decreased levels of IFN-gamma and Th1-dependent antibody IgG2a. TCCR is predominately expressed in thymus, spleen, lymph notes and peripheral blood leukocytes.

TCCR Antibody - References

Chen Q, Ghilardi N, Wang H, Baker T, Xie MH, Gurney A, Grewal IS and de Sauvage FJ. Development of Th1-type immune responses requires the type I cytokine receptor TCCR Nature 2000;407(6806):916-920 Sprecher,C.A., Grant,F.J., Baumgartner,J.W., Presnell,S.R., Schrader,S.K., Yamagiwa,T., Whitmore,T.E., O'Hara,P.J. and Foster,D.F. Cloning and characterization of a novel class I cytokine receptor Biochem. Biophys. Res. Commun. 1998;246(1):82-90