

LRRC32 Polyclonal Antibody

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP57069

Product Information

Application IHC-P, IHC-F, IF, ICC

Primary Accession <u>Q14392</u>

Reactivity Human, Rhesus

Host Rabbit
Clonality Polyclonal
Calculated MW 71979
Physical State Liquid

Immunogen KLH conjugated synthetic peptide derived from human LRRC32

Epitope Specificity 231-330/662

Isotype IgG

Purity affinity purified by Protein A

Buffer 0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.

SUBCELLULAR LOCATION Membrane.

SIMILARITY Contains 20 LRR (leucine-rich) repeats. Contains 1 LRRCT domain. **Important Note** This product as supplied is intended for research use only, not for use in

human, therapeutic or diagnostic applications.

Background Descriptions LRRC32 is a 662 amino acid single-pass type I membrane protein that

contains 22 LRR repeats and is thought to be involved in platelet-endothelium interactions, as well as in the development of rare, benign hibernomas. The gene encoding LRRC32 maps to human chromosome 11, which houses over 1,400 genes and comprises nearly 4% of the human genome. Jervell and Lange-Nielsen syndrome, Jacobsen syndrome, Niemann-Pick disease,

hereditary angioedema and Smith-Lemli-Opitz syndrome are associated with

defects in genes that maps to chromosome 11.

Additional Information

Gene ID 2615

Other Names Transforming growth factor beta activator LRRC32, Garpin, Glycoprotein A

repetitions predominant, GARP, Leucine-rich repeat-containing protein 32, LRRC32 {ECO:0000303 | PubMed:19651619, ECO:0000312 | HGNC:HGNC:4161}

Target/Specificity Preferentially expressed in regulatory T-cells (T(regs)).

Dilution IHC-P=1:100-500,IHC-F=1:100-500,ICC=1:100-500,IF=1:100-500

Format 0.01M TBS(pH7.4) with 1% BSA, 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

Protein Information

Name LRRC32 {ECO:0000303 | PubMed:19651619,

ECO:0000312 | HGNC:HGNC:4161}

Function Key regulator of transforming growth factor beta (TGFB1, TGFB2 and TGFB3)

that controls TGF-beta activation by maintaining it in a latent state during storage in extracellular space (PubMed:19651619, PubMed:19750484, PubMed:22278742). Associates specifically via disulfide bonds with the Latency-associated peptide (LAP), which is the regulatory chain of TGF-beta, and regulates integrin-dependent activation of TGF-beta (PubMed:22278742). Able to outcompete LTBP1 for binding to LAP regulatory chain of TGF-beta (PubMed:22278742). Controls activation of TGF-beta-1 (TGFB1) on the surface of activated regulatory T-cells (Tregs) (PubMed:19651619, PubMed:19750484).

Required for epithelial fusion during palate development by regulating

activation of TGF-beta-3 (TGFB3) (By similarity).

Cellular Location Cell membrane; Single-pass type I membrane protein. Cell surface

Tissue Location Preferentially expressed in regulatory T-cells (Tregs).

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