

LTBP1 Antibody (C-term)

Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP7780B

Product Information

Application WB, IHC-P, E **Primary Accession** Q14766

Reactivity Human, Mouse

HostRabbitClonalityPolyclonalIsotypeRabbit IgGClone NamesRB14971Calculated MW186796Antigen Region1493-1525

Additional Information

Gene ID 4052

Other Names Latent-transforming growth factor beta-binding protein 1, LTBP-1,

Transforming growth factor beta-1-binding protein 1, TGF-beta1-BP-1, LTBP1

Target/Specificity This LTBP1 antibody is generated from rabbits immunized with a KLH

conjugated synthetic peptide between 1493-1525 amino acids from the

C-terminal region of human LTBP1.

Dilution WB~~1:1000 IHC-P~~1:100~500 E~~Use at an assay dependent concentration.

Format Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide.

This antibody is prepared by Saturated Ammonium Sulfate (SAS) precipitation

followed by dialysis against PBS.

Storage Maintain refrigerated at 2-8°C for up to 2 weeks. For long term storage store

at -20°C in small aliquots to prevent freeze-thaw cycles.

Precautions LTBP1 Antibody (C-term) is for research use only and not for use in diagnostic

or therapeutic procedures.

Protein Information

Name LTBP1 (HGNC:6714)

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:2022183, PubMed:8617200, PubMed:8939931). 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:15184403, PubMed:8617200, PubMed:8939931). Outcompeted by LRRC32/GARP for binding to LAP regulatory chain of TGF-beta (PubMed:22278742).

Cellular Location Secreted. Secreted, extracellular space, extracellular matrix

Tissue Location Expressed in the aorta (at protein level) (PubMed:17293099). Isoform Long:

Expressed in fibroblasts (PubMed:17293099).

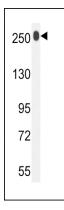
Background

LTBP1 may be involved in the assembly, secretion and targeting of TGFB1 to sites at which it is stored and/or activated. This protein may play critical roles in controlling and directing the activity of TGFB1, and it may have a structural role in the extra cellular matrix (ECM).

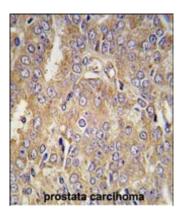
References

Olofsson A., J. Biol. Chem. 270:31294-31297(1995) Kanzaki T., Cell 61:1051-1061(1990) Isogai Z., J. Biol. Chem. 278:2750-2757(2003) Oklu R., Biochem. J. 352:601-610(2000)

Images



LTBP1 Antibody (C-term) (Cat.#AP7780b) western blot analysis in mouse bladder tissue lysates (35ug/lane). This demonstrates the LTBP1 antibody detected the LTBP1 protein (arrow).



Formalin-fixed and paraffin-embedded human prostata carcinoma tissue reacted with LTBP1 antibody (C-term) (Cat.#AP7780b), which was peroxidase-conjugated to the secondary antibody, followed by DAB staining. This data demonstrates the use of this antibody for immunohistochemistry; clinical relevance has not been evaluated.

Citations

• Proteomic profiling of androgen-independent prostate cancer cell lines reveals a role for protein S during the development of high grade and castration-resistant prostate cancer.

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