

TGFB1 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP12348A

Specification

TGFB1 Antibody (N-term) - Product Information

Application Primary Accession Other Accession

Reactivity Predicted Host Clonality Isotype Antigen Region WB,E <u>P01137</u> <u>P17246, P07200, P04202, P18341,</u> <u>NP_000651.3, O19011</u> Human, Mouse Bovine, Horse, Pig, Rat Rabbit Polyclonal Rabbit IgG 30-50

TGFB1 Antibody (N-term) - Additional Information

Gene ID 7040

Other Names Transforming growth factor beta-1, TGF-beta-1, Latency-associated peptide, LAP, TGFB1, TGFB

Target/Specificity

This TGFB1 antibody is generated from rabbits immunized with a KLH conjugated synthetic peptide between 30-50 amino acids of human TGFB1.

Dilution

WB~~1:2000

E~~Use at an assay dependent concentration.

Format

Purified polyclonal antibody supplied in PBS with 0.09% (W/V) sodium azide. This antibody is purified through a protein A column, followed by peptide affinity purification.

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

TGFB1 Antibody (N-term) is for research use only and not for use in diagnostic or therapeutic procedures.

TGFB1 Antibody (N-term) - Protein Information

Name TGFB1 (<u>HGNC:11766</u>)



Synonyms TGFB

Function Transforming growth factor beta-1 proprotein: Precursor of the Latency-associated peptide (LAP) and Transforming growth factor beta-1 (TGF-beta-1) chains, which constitute the regulatory and active subunit of TGF-beta-1, respectively.

Cellular Location [Latency-associated peptide]: Secreted, extracellular space, extracellular matrix

Tissue Location Highly expressed in bone (PubMed:11746498, PubMed:17827158). Abundantly expressed in articular cartilage and chondrocytes and is increased in osteoarthritis (OA) (PubMed:11746498, PubMed:17827158). Colocalizes with ASPN in chondrocytes within OA lesions of articular cartilage (PubMed:17827158)

TGFB1 Antibody (N-term) - 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>

TGFB1 Antibody (N-term) - Images



All lanes : Anti-TGFB1 Antibody (N-term) at 1:2000 dilution Lane 1: HepG2 whole cell lysate Lane 2: K562 whole cell lysate Lane 3: Raji whole cell lysate Lysates/proteins at 20 μ g per lane. Secondary Goat Anti-Rabbit IgG, (H+L), Peroxidase conjugated at 1/10000 dilution. Predicted band size : 44 kDa Blocking/Dilution buffer: 5% NFDM/TBST.

TGFB1 Antibody (N-term) - Background



TGFB1 is a member of the transforming growth factor beta (TGFB) family of cytokines, which are multifunctional peptides that regulate proliferation, differentiation, adhesion, migration, and other functions in many cell types. Many cells have TGFB receptors, and the protein positively and negatively regulates many other growth factors. The secreted protein is cleaved into a latency-associated peptide (LAP) and a mature TGFB1 peptide, and is found in either a latent form composed of a TGFB1 homodimer, a LAP homodimer, and a latent TGFB1-binding protein, or in an active form composed of a TGFB1 homodimer. The mature peptide may also form heterodimers with other TGFB family members. This gene is frequently upregulated in tumor cells, and mutations in this gene result in Camurati-Engelmann disease.

TGFB1 Antibody (N-term) - References

Perez, A.B., et al. Hum. Immunol. 71(11):1135-1140(2010) Xu, Z., et al. Biochem. Biophys. Res. Commun. 401(3):376-381(2010) Bran, G.M., et al. Anticancer Res. 30(9):3459-3463(2010) Zauli, G., et al. Blood 80(12):3036-3043(1992) Wrana, J.L., et al. Cell 71(6):1003-1014(1992)

TGFB1 Antibody (N-term) - Citations

- Anti-epileptic drug topiramate upregulates TGFβ1 and SOX9 expression in primary embryonic palatal mesenchyme cells: Implications for teratogenicity
- Identification and analysis of key genes associated with ulcerative colitis based on DNA microarray data.
- <u>CTGF siRNA ameliorates tubular cell apoptosis and tubulointerstitial fibrosis in obstructed</u> mouse kidneys in a Sirt1-independent manner.