

# **LEF1** antibody - N-terminal region

Rabbit Polyclonal Antibody Catalog # Al16257

# **Specification**

### LEF1 antibody - N-terminal region - Product Information

Application WB
Primary Accession Q9UJU2

Other Accession NM 016269, NP 057353

Reactivity Human, Mouse, Rat, Pig, Horse, Bovine,

Guinea Pig, Dog

Predicted Human, Mouse, Rat, Pig, Horse, Bovine,

**Guinea Pig, Dog** 

Host Rabbit
Clonality Polyclonal
Calculated MW 44kDa KDa

# LEF1 antibody - N-terminal region - Additional Information

**Gene ID 51176** 

Alias Symbol DKFZp586H0919, TCF1ALPHA, LEF-1, TCF10, TCF7L3

**Other Names** 

Lymphoid enhancer-binding factor 1, LEF-1, T cell-specific transcription factor 1-alpha, TCF1-alpha, LEF1

#### **Format**

Liquid. Purified antibody supplied in 1x PBS buffer with 0.09% (w/v) sodium azide and 2% sucrose.

### **Reconstitution & Storage**

Add 50 ul of distilled water. Final anti-LEF1 antibody concentration is 1 mg/ml in PBS buffer with 2% sucrose. For longer periods of storage, store at 20°C. Avoid repeat freeze-thaw cycles.

#### **Precautions**

LEF1 antibody - N-terminal region is for research use only and not for use in diagnostic or therapeutic procedures.

### LEF1 antibody - N-terminal region - Protein Information

#### Name LEF1 (HGNC:6551)

#### **Function**

Transcription factor that binds DNA in a sequence-specific manner (PubMed:<a href="http://www.uniprot.org/citations/2010090" target="\_blank">2010090</a>). Participates in the Wnt signaling pathway (By similarity). Activates transcription of target genes in the presence of CTNNB1 and EP300 (By similarity). PIAG antagonizes both Wnt-dependent and Wnt-independent activation by LEF1 (By similarity). TLE1, TLE2, TLE3 and TLE4 repress transactivation mediated by



LEF1 and CTNNB1 (PubMed:<a href="http://www.uniprot.org/citations/11266540" target="\_blank">11266540</a>). Regulates T-cell receptor alpha enhancer function (PubMed:<a href="http://www.uniprot.org/citations/19653274" target="\_blank">19653274</a>). Required for IL17A expressing gamma-delta T-cell maturation and development, via binding to regulator loci of BLK to modulate expression (By similarity). Acts as a positive regulator of odontoblast differentiation during mesenchymal tooth germ formation, expression is repressed during the bell stage by MSX1-mediated inhibition of CTNNB1 signaling (By similarity). May play a role in hair cell differentiation and follicle morphogenesis (By similarity).

#### **Cellular Location**

Nucleus {ECO:0000255|PROSITE-ProRule:PRU00267}. Note=Found in nuclear bodies upon PIASG binding.

#### **Tissue Location**

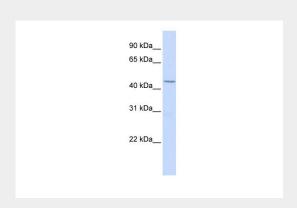
Detected in thymus. Not detected in normal colon, but highly expressed in colon cancer biopsies and colon cancer cell lines. Expressed in several pancreatic tumors and weakly expressed in normal pancreatic tissue. Isoforms 1 and 5 are detected in several pancreatic cell lines.

### LEF1 antibody - N-terminal region - Protocols

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

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

#### LEF1 antibody - N-terminal region - Images



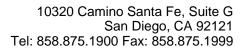
WB Suggested Anti-LEF1 Antibody Titration: 0.2-1 μg/ml

ELISA Titer: 1:312500

Positive Control: Hela cell lysate

# LEF1 antibody - N-terminal region - Background

Participates in the Wnt signaling pathway. Activates transcription of target genes in the presence of CTNNB1 and EP300. May play a role in hair cell differentiation and follicle morphogenesis. TLE1, TLE2, TLE3 and TLE4 repress transactivation mediated by LEF1 and CTNNB1. Regulates T-cell





receptor alpha enhancer function. Binds DNA in a sequence-specific manner. PIAG antagonizes both Wnt-dependent and Wnt-independent activation by LEF1 (By similarity). Isoform 3 lacks the CTNNB1 interaction domain and may be an antagonist for Wnt signaling. Isoform 5 transcriptionally activates the fibronectin promoter, binds to and represses transcription from the E-cadherin promoter in a CTNNB1- independent manner, and is involved in reducing cellular aggregation and increasing cell migration of pancreatic cancer cells. Isoform 1 transcriptionally activates MYC and CCND1 expression and enhances proliferation of pancreatic tumor cells.

# LEF1 antibody - N-terminal region - References

Waterman M.L., et al. Genes Dev. 5:656-669(1991). Hovanes K., et al. Nucleic Acids Res. 28:1994-2003(2000). Jesse S., et al. Int. J. Cancer 126:1109-1120(2010). Kobielak A., et al. Submitted (AUG-2000) to the EMBL/GenBank/DDBJ databases. Ota T., et al. Nat. Genet. 36:40-45(2004).