

SOX18 Antibody (N-term)

Affinity Purified Rabbit Polyclonal Antibody (Pab) Catalog # AP16137a

Product Information

ApplicationIF, WB, EPrimary AccessionP35713Other AccessionNP_060889.1ReactivityHuman, Mouse

Host Rabbit
Clonality Polyclonal
Isotype Rabbit IgG
Calculated MW 40891
Antigen Region 59-88

Additional Information

Gene ID 54345

Other Names Transcription factor SOX-18, SOX18

Target/Specificity This SOX18 antibody is generated from rabbits immunized with a KLH

conjugated synthetic peptide between 59-88 amino acids from the N-terminal

region of human SOX18.

Dilution IF~~1:10~50 WB~~1:1000 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 SOX18 Antibody (N-term) is for research use only and not for use in diagnostic

or therapeutic procedures.

Protein Information

Name SOX18

Function Transcriptional activator that binds to the consensus sequence

5'-AACAAG-3' in the promoter of target genes and plays an essential role in embryonic cardiovascular development and lymphangiogenesis. Activates transcription of PROX1 and other genes coding for lymphatic endothelial markers. Plays an essential role in triggering the differentiation of lymph

vessels, but is not required for the maintenance of differentiated lymphatic endothelial cells. Plays an important role in postnatal angiogenesis, where it is functionally redundant with SOX17. Interaction with MEF2C enhances transcriptional activation. Besides, required for normal hair development.

Cellular Location Nucleus {ECO:0000255 | PROSITE-ProRule:PRU00267}.

Tissue Location Detected in heart, lung, placenta, skeletal muscle, liver, kidney, spleen,

prostate, ovary, msosmall intestine and colon

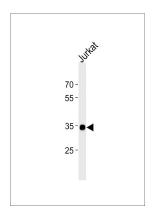
Background

This gene encodes a member of the SOX (SRY-related HMG-box) family of transcription factors involved in the regulation of embryonic development and in the determination of the cell fate. The encoded protein may act as a transcriptional regulator after forming a protein complex with other proteins. This protein plays a role in hair, blood vessel, and lymphatic vessel development. Mutations in this gene have been associated with recessive and dominant forms of hypotrichosis-lymphedema-telangiectasia.

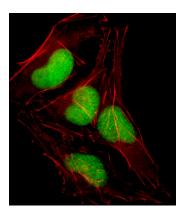
References

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Fontijn, R.D., et al. Am. J. Physiol. Heart Circ. Physiol. 294 (2), H891-H900 (2008):
Ferrell, R.E., et al. Lymphat Res Biol 6(2):69-76(2008)
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Images



SOX18 Antibody (N-term) (Cat. #AP16137a) western blot analysis in Jurkat cell line lysates (35ug/lane). This demonstrates the SOX18 antibody detected the SOX18 protein (arrow).



Fluorescent confocal image of Hela cell stained with SOX18 Antibody (N-term)(Cat#AP16137a). Hela cells were fixed with 4% PFA (20 min), permeabilized with Triton X-100 (0.1%, 10 min), then incubated with SOX18 primary antibody (1:25, 1 h at 37°C). For secondary antibody, Alexa Fluor® 488 conjugated donkey anti-rabbit antibody (green) was used (1:400, 50 min at 37°C). Cytoplasmic actin was counterstained with Alexa Fluor® 555 (red) conjugated Phalloidin (7units/ml, 1 h at 37°C). Nuclei were counterstained with DAPI (blue) (10 µg/ml, 10 min). SOX18 immunoreactivity is localized to Nucleus significantly.

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