

# **Anti-SMO / Smoothened Antibody (N-Terminus)**

Rabbit Anti Human Polyclonal Antibody Catalog # ALS17416

## **Specification**

## Anti-SMO / Smoothened Antibody (N-Terminus) - Product Information

Application WB, IHC-P Primary Accession Q99835

Predicted Human, Mouse

Host Rabbit
Clonality Polyclonal
Calculated MW 86397

## Anti-SMO / Smoothened Antibody (N-Terminus) - Additional Information

**Gene ID** 6608

Alias Symbol SMO

**Other Names** 

SMO, Frizzled family member 11, FZD11, Gx, Protein Gx, SMOH, Smoothened, Smoothened homolog

# **Target/Specificity**

Recognizes endogenous levels of Smoothened protein.

## **Reconstitution & Storage**

PBS, pH 7.3, 0.01% sodium azide, 30% glycerol. Store at -20°C. Aliquot to avoid freeze/thaw cycles.

#### **Precautions**

Anti-SMO / Smoothened Antibody (N-Terminus) is for research use only and not for use in diagnostic or therapeutic procedures.

## Anti-SMO / Smoothened Antibody (N-Terminus) - Protein Information

Name SMO

**Synonyms SMOH** 

### **Function**

G protein-coupled receptor which associates with the patched protein (PTCH) to transduce hedgehog protein signaling. Binding of sonic hedgehog (SHH) to its receptor patched prevents inhibition of smoothened (SMO) by patched. When active, SMO binds to and sequesters protein kinase A catalytic subunit PRKACA at the cell membrane, preventing PRKACA-mediated phosphorylation of GLI transcription factors which releases the GLI proteins from PRKACA-mediated inhibition and allows for transcriptional activation of hedgehog pathway target genes (By similarity). Required for the accumulation of KIF7, GLI2 and GLI3 in the cilia (PubMed:<a href="http://www.uniprot.org/citations/19592253" target="\_blank">19592253</a>/a>). Interacts



Tel: 858.875.1900 Fax: 858.875.1999

with DLG5 at the ciliary base to induce the accumulation of KIF7 and GLI2 at the ciliary tip for GLI2 activation (By similarity).

### **Cellular Location**

Cell membrane {ECO:0000250|UniProtKB:P56726}; Multi-pass membrane protein. Cell projection, cilium. Note=Cilium localization is promoted by SHH and is required for activity. {ECO:0000250|UniProtKB:P56726}

## Anti-SMO / Smoothened Antibody (N-Terminus) - Protocols

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

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

Anti-SMO / Smoothened Antibody (N-Terminus) - Images