

# Smad2 (phospho-Ser465/467) rabbit pAb

Cat No.:ES13077

For research use only

## Overview

Product Name	Smad2 (phospho-Ser465/467) rabbit pAb
Host species	Rabbit
Applications	WB;ELISA;IHC
Species Cross-Reactivity	Human;Mouse;Rat
Recommended dilutions	WB 1:500-2000;IHC-p 1:50-300; ELISA 2000-20000
Immunogen	Synthesized phospho peptide around human Smad2 (Ser465 and 467)
Specificity	This antibody detects endogenous levels of Human Mouse Rat Smad2 (phospho-Ser465 or 467)
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Storage	Store at -20°C. Avoid repeated freeze-thaw cycles.
Protein Name	Smad2 (Ser465/467)
Gene Name	SMAD2 MADH2 MADR2
Cellular localization	Cytoplasm . Nucleus . Cytoplasmic and nuclear in the absence of TGF-beta. On TGF-beta stimulation, migrates to the nucleus when complexed with SMAD4 (PubMed:9865696, PubMed:21145499). On dephosphorylation by phosphatase PPM1A, released from the SMAD2/SMAD
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Clonality	Polyclonal
Concentration	1 mg/ml
Observed band	58kD
Human Gene ID	4087
Human Swiss-Prot Number	Q15796
Alternative Names	Mothers against decapentaplegic homolog 2 (MAD homolog 2) (Mothers against DPP homolog 2) (JV18-1) (Mad-related protein 2) (hMAD-2) (SMAD family member 2) (SMAD 2) (Smad2) (hSMAD2)
Background	The protein encoded by this gene belongs to the





SMAD, a family of proteins similar to the gene products of the *Drosophila* gene 'mothers against decapentaplegic' (Mad) and the *C. elegans* gene Sma. SMAD proteins are signal transducers and transcriptional modulators that mediate multiple signaling pathways. This protein mediates the signal of the transforming growth factor (TGF)-beta, and thus regulates multiple cellular processes, such as cell proliferation, apoptosis, and differentiation. This protein is recruited to the TGF-beta receptors through its interaction with the SMAD anchor for receptor activation (SARA) protein. In response to TGF-beta signal, this protein is phosphorylated by the TGF-beta receptors. The phosphorylation induces the dissociation of this protein with SARA and the association with the family member SMAD4. The association with SMAD4 is important for the translocation

Immunohistochemical analysis of paraffin-embedded human tonsil. 1, Antibody was diluted at 1:200(4° overnight). 2, Tris-EDTA,pH9.0 was used for antigen retrieval. 3,Secondary antibody was diluted at 1:200(room temperature, 45min).

