

Anti-Frizzled-2 antibody



Description

Frizzled-2 is a protein encoded by the FZD2 gene which is approximately 63,5 kDa. Frizzled-2 is localised to the cell membrane and is involved in CDK-mediated phosphorylation and removal of Cdc6, Wnt signalling pathway and pluripotency and mTOR signalling pathway. It is a receptor for Wnt proteins and is coupled to the beta-catenin canonical signalling pathway, which leads to the activation of disheveled proteins, inhibition of GSK-3 kinase, nuclear accumulation of beta-catenin and activation of Wnt target genes. Frizzled-2 is widely expressed, it is mainly found in heart, placenta, skeletal muscle, lung, kidney, pancreas, prostate, testis, ovary and colon. Mutations in the FZD2 gene result in omdysplasia. STJ93141 was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen. This polyclonal antibody detects endogenous levels of Frizzled-2 protein.

Model	STJ93141
Host	Rabbit
Reactivity	Human, Mouse, Rat
Applications	ELISA, IF, WB
Immunogen	Synthesized peptide derived from human Frizzled-2
Immunogen Region	180-260 aa, Internal
Gene ID	2535
Gene Symbol	FZD2
Dilution range	WB 1:500-1:2000IF 1:200-1:1000ELISA 1:40000
Specificity	Frizzled-2 Polyclonal Antibody detects endogenous levels of Frizzled-2

protein.

Tissue Specificity	Widely expressed. In the adult, mainly found in heart, placenta, skeletal muscle, lung, kidney, pancreas, prostate, testis, ovary and colon. In the fetus, expressed in brain, lung and kidney. Low levels in fetal liver.
Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Note	For Research Use Only (RUO).
Protein Name	Frizzled-2 Fz-2 hFz2 FzE2
Molecular Weight	55 kDa
Clonality	Polyclonal
Conjugation	Unconjugated
Isotype	IgG
Formulation	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Concentration	1 mg/ml
Storage Instruction	Store at -20°C, and avoid repeat freeze-thaw cycles.
Database Links	HGNC:4040OMIM:600667
Alternative Names	Frizzled-2 Fz-2 hFz2 FzE2
Function	Receptor for Wnt proteins. Most of frizzled receptors are coupled to the beta-catenin canonical signaling pathway, which leads to the activation of disheveled proteins, inhibition of GSK-3 kinase, nuclear accumulation of beta-catenin and activation of Wnt target genes. A second signaling pathway involving PKC and calcium fluxes has been seen for some family members, but it is not yet clear if it represents a distinct pathway or if it can be integrated in the canonical pathway, as PKC seems to be required for Wnt-mediated inactivation of GSK-3 kinase. Both pathways seem to involve interactions with G-proteins. May be involved in transduction and intercellular transmission of polarity information during tissue morphogenesis and/or in differentiated tissues.
Sequence and Domain Family	Lys-Thr-X-X-X-Trp motif interacts with the PDZ domain of Dvl (Disheveled) family members and is involved in the activation of the Wnt/beta-catenin signaling pathway. The FZ domain is involved in binding with Wnt ligands.
Cellular Localization	Membrane. Multi-pass membrane protein. Cell membrane
Post-translational Modifications	Ubiquitinated by ZNRF3, leading to its degradation by the proteasome.