RYK Antibody – Rabbit Polyclonal

PRODUCT OVERVIEW

Product Name	RYK, Polyclonal Antibody
Full Product Name	RYK Rabbit Polyclonal Antibody
Product Gene Name	anti-RYK antibody
Product Synonym Gene Name	JTK5A
Product Synonym Names	BH6842; Tyrosine-protein kinase RYK (EC 2.7.10.1)
Clonality	Polyclonal
Host	Rabbit
Species Reactivity	Human, Mouse
Form/Format	Liquid in PBS containing 50% glycerol, and 0.02% sodium azide.
Purity/Purification	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Concentration	1mg/ml (lot specific)
Specificity	RYK Polyclonal Antibody detects endogenous levels of protein.
Preparation and Storage	Store at -20 degree C/1 year
Molecular Weight	~66 kDa
Chromosome Location	Chromosome: 3; NC_000003.11 (133875978..133969586, complement). Location: 3q22
OMIM	600524
3D Structure	ModBase 3D Structure for P34925
Immunogen	Synthesized peptide derived from human protein. at AA range: 150-230
Modification	Unmodified/Total
Applications Tested/Suitable for anti-RYK antibody	Western Blot (WB), ELISA (EIA)
Application Notes for anti-RYK antibody	WB: 1:500-2000 ELISA: 1:5000-20000
Related Product Information for anti-RYK antibody	The protein encoded by this gene is an atypical member of the family of growth factor receptor protein tyrosine kinases, differing from other members at a number of conserved residues in the activation and nucleotide binding domains. This gene product belongs to a subfamily whose members do not appear to be regulated by phosphorylation in the activation segment. It has been suggested that mediation of biological activity by recruitment of a signaling-competent auxiliary protein may occur through an as yet uncharacterized mechanism. The encoded protein has a leucine-rich extracellular domain with a WIF-type Wnt binding region, a single transmembrane domain, and an intracellular tyrosine kinase domain. This protein is involved in stimulating Wnt signaling pathways such as the regulation of axon pathfinding. Alternative splicing results in multiple transcript variants encoding distinct isoforms
Other Notes	Small volumes of anti-RYK antibody vial(s) may occasionally become entrapped in the seal of the product vial during shipment and storage. If necessary, briefly centrifuge the vial on a tabletop centrifuge to dislodge any liquid in the container`s cap. Certain products may require to ship with dry ice and additional dry ice fee may apply.

Searchable Terms for RYK purchase	MBS9516769 is an antibody targeting RYK. Also known as RYK Rabbit Polyclonal Antibody. Reactive in Human, Mouse. Host: Rabbit.

ADDITIONAL DETAILS

NCBI/Uniprot data below describe general gene information for RYK. It may not necessarily be applicable to this product.

NCBI GI #	116805325
NCBI GeneID	6259
NCBI Accession #	NP_001005861.1
UniProt Primary Accession #	P34925
UniProt Secondary Accession #	Q04696
UniProt Related Accession #	P34925
GenBank Nucleotide #	NM_001005861
NCBI Official Full Name	Homo sapiens receptor-like tyrosine kinase (RYK), transcript variant 1, mRNA
NCBI Official Synonym Full Names	receptor-like tyrosine kinase
NCBI Official Symbol	RYK
NCBI Official Synonym Symbols	JTK5; RYK1; JTK5A; D3S3195
UniProt Protein Name	Tyrosine-protein kinase RYK
Protein Family	Tyrosine-protein kinase
UniProt Gene Name	RYK
UniProt Synonym Gene Names	JTK5A
UniProt Entry Name	RYK_HUMAN
NCBI Protein Information	tyrosine-protein kinase RYK; hydroxyaryl-protein kinase; JTK5A protein tyrosine kinase
NCBI Summary for RYK	The protein encoded by this gene is an atypical member of the family of growth factor receptor protein tyrosine kinases, differing from other members at a number of conserved residues in the activation and nucleotide binding domains. This gene product belongs to a subfamily whose members do not appear to be regulated by phosphorylation in the activation segment. It has been suggested that mediation of biological activity by recruitment of a signaling-competent auxiliary protein may occur through an as yet uncharacterized mechanism. The encoded protein has a leucine-rich extracellular domain with a WIF-type Wnt binding region, a single transmembrane domain, and an intracellular tyrosine kinase domain. This protein is involved in stimulating Wnt signaling pathways such as the regulation of axon pathfinding. Alternative splicing results in multiple transcript variants encoding distinct isoforms. [provided by RefSeq, Feb 2012]

UniProt Comments for RYK	Function: May be a coreceptor along with FZD8 of Wnt proteins, such as WNT1, WNT3, WNT3A and WNT5A. Involved in neuron differentiation, axon guidance, corpus callosum establishment and neurite outgrowth. In response to WNT3 stimulation, receptor C-terminal cleavage occurs in its transmembrane region and allows the C-terminal intracellular product to translocate from the cytoplasm to the nucleus where it plays a crucial role in neuronal development. Ref.5 Catalytic activity: ATP + a [protein]-L-tyrosine = ADP + a [protein]-L-tyrosine phosphate. Subunit structure: Interacts with DVL1 (via PDZ domain). Ref.5 Subcellular location: Membrane; Single-pass type I membrane protein By similarity. Nucleus By similarity. Cytoplasm By similarity. Note: In cells that have undergone neuronal differentiation, the C-terminal cleaved part is translocated from the cytoplasm to the nucleus By similarity. Tissue specificity: Observed in all the tissues examined. Domain: The extracellular WIF domain is responsible for Wnt binding By similarity. Post-translational modification: Proteolytically cleaved, in part by presenilin, in response to WNT3 stimulation. Cleavage occurs during neuronal differentiation. Ref.6 Sequence similarities: Belongs to the protein kinase superfamily. Tyr protein kinase family.Contains 1 protein kinase domain.Contains 1 WIF domain. Caution: According to some authors, has impaired kinase activity (Ref.4).
Research Articles on RYK	**1.** RYK and VANGL2 proteins form a complex, whereas RYK also activated RhoA, a downstream effector of PCP signaling.
Precautions	All of MyBioSource's Products are for scientific laboratory research purposes and are not for diagnostic, therapeutics, prophylactic or in vivo use. Through your purchase, you expressly represent and warrant to MyBioSource that you will properly test and use any Products purchased from MyBioSource in accordance with industry standards. MyBioSource and its authorized distributors reserve the right to refuse to process any order where we reasonably believe that the intended use will fall outside of our acceptable guidelines.
Disclaimer	While every efforts were made to ensure the accuracy of the information provided in this datasheet, MyBioSource will not be liable for any omissions or errors contained herein. MyBioSource reserves the right to make changes to this datasheet at any time without prior notice. It is the responsibility of the customer to report product performance issues to MyBioSource within 30 days of receipt of the product. Please visit our Terms & Conditions page for more information.
Product Note	Select online data sheet information is drawn from bioinformatics databases, occasionally resulting in ambiguous or non-relevant product information. It is the responsibility of the customer to review, verify, and evaluate the information to make sure it matches their requirements before purchasing the kit. Our ELISA Kit assays are dynamic research tools and sometimes they may be updated and improved. If the format of this assay is important to you then please request the current manual or contact our technical support team with a presales inquiry before placing an order. We will confirm the current details of the assay. We cannot guarantee the sample manual posted online is the most current manual, it is intended to serve as an example only. Please refer to the instructions For Use provided with the assay kit for precise details.

For Research Use Only. Not for use in diagnostic or therapeutic procedures.

MyBioSource | Tel: +1.858.633.0165 | Fax: +1.858.633.0166 | mybiosource.com/contact-us
Online datasheet: https://www.mybiosource.com/polyclonal-human-mouse-antibody/ryk/9516769