



Applications

• WB,IHC,IF,IP,ELISA

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Neuropilin 1 (ANT0082R) Rabbit mAb

CatalogNo: ANT8113 Recombinant 🕅

Formulation: PBS,50%glycerol,0.05%Proclin 300,0.05%BSA Quantity : 100 ug/vial

Host Species Rabbit

MW • 103kD (Calculated) 135kD (Observed)

Reactivity

- Human, Mouse, Rat,
- Isotype
- IgG,Kappa

Recommended Dilution Ratios

IHC 1:200-1000 WB 1:1000-5000 IF 1:200-1000 ELISA 1:5000-20000 IP 1:50-200

Storage

Storage*	-15°C to -25°C/1 year(Do not lower than -25°C)		
Basic Information			
Clonality	Monoclonal		
Clone Number	ANT0082R		

Target Information

Immunogen Information Specificity

Endogenous

Gene name NRP1

Protein Name Neuropilin-1

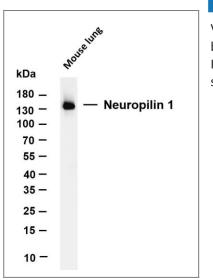
Organism	Gene ID	UniProt ID
Human	<u>8829</u> ;	<u>014786</u> ;
Mouse	<u>18186</u> ;	<u>P97333;</u>
Rat	<u>246331</u> ;	<u>Q9QWJ9</u> ;
Cytoplasmic, Membranous		

Cellular Localization

Tissue specificity [Isoform 1]: The expression of isoforms 1 and 2 does not seem to overlap. Expressed by the blood vessels of different tissues. In the developing embryo it is found predominantly in the nervous system. In adult tissues, it is highly expressed in heart and placenta; moderately in lung, liver, skeletal muscle, kidney and pancreas; and low in adult brain (PubMed:10688880, PubMed:9529250). Expressed in olfactory epithelium (at protein level) (PubMed:33082293). Expressed in the central nervous system, including olfactory related regions such as the olfactory tubercles and paraolfactory gyri (PubMed:33082293). ; [Isoform 2]: The expression of isoforms 1 and 2 does not seem to overlap. Found in liver hepatocytes, kidney distal and proximal tubules.

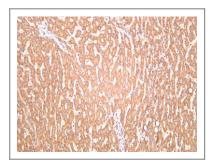
Function

Function: The membrane-bound isoform 1 is a receptor involved in the development of the cardiovascular system, in angiogenesis, in the formation of certain neuronal circuits and in organogenesis outside the nervous system. It mediates the chemorepulsant activity of semaphorins. It binds to semaphorin 3A, The PLGF-2 isoform of PGF, The VEGF-165 isoform of VEGF and VEGF-B. Coexpression with KDR results in increased VEGF-165 binding to KDR as well as increased chemotaxis. It may regulate VEGF-induced angiogenesis., Function: The soluble isoform 2 binds VEGF-165 and appears to inhibit its binding to cells. It may also induce apoptosis by sequestering VEGF-165. May bind as well various members of the semaphorin family. Its expression has an averse effect on blood vessel number and integrity., similarity: Belongs to the neuropilin family., similarity: Contains 1 F5/8 type C domain., similarity: Contains 1 MAM domain., similarity: Contains 2 CUB domains., similarity: Contains 2 F5/8 type C domains., subunit: Heterodimer with NRP2 (Probable). Binds PLXNB1., tissue specificity: The expression of isoforms 1 and 2 does not seem to overlap. Isoform 1 is expressed by the blood vessels of different tissues. In the developing embryo it is found predominantly in the nervous system. In adult tissues, it is highly expressed in heart and placenta; moderately in lung, liver, skeletal muscle, kidney and pancreas; and low in adult brain. Isoform 2 is found in liver hepatocytes, kidney distal and proximal tubules.,

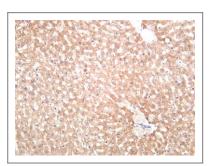


Validation Data

Various whole cell lysates were separated by 4-20% SDS-PAGE, and the membrane was blotted with anti-Neuropilin 1 (ANT0082R) antibody. The HRPconjugated Goat anti-Rabbit IgG(H + L) antibody was used to detect the antibody. Lane 1: Mouse lung Predicted band size: 103kDa Observed band size: 135kDa



Human liver was stained with Anti-Neuropilin 1 (ANT0082R) rabbit antibody



Rat liver was stained with anti-Neuropilin 1 (ANT0082R) rabbit antibody



Mouse liver was stained with anti-Neuropilin 1 (ANT0082R) rabbit antibody

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