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ADRB1 Rabbit pAb

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Catalog # AP52101

Product Information

Application	WB, IHC-P, IHC-F, IF
Primary Accession	P08588
Reactivity	Rat, Human, Mouse
Predicted	Pig, Dog
Host	Rabbit
Clonality	Polyclonal
Calculated MW	51224
Physical State	Liquid
Immunogen	KLH conjugated synthetic peptide derived from human ADRB1
Epitope Specificity	181-250/477
Isotype	IgG
Purity	affinity purified by Protein A
Buffer	0.01M TBS (pH7.4) with 1% BSA, 0.02% Proclin300 and 50% Glycerol.
SUBCELLULAR LOCATION	Cell membrane; Multi-pass membrane protein. Note=Localized at the plasma membrane. Found in the Golgi upon GOPC overexpression.
Important Note	This product as supplied is intended for research use only, not for use in human, therapeutic or diagnostic applications.
Background Descriptions	Beta-adrenergic receptors (Beta-1 adrenoreceptor) mediate the catecholamine-induced activation of adenylate cyclase through the action of G proteins. This receptor binds epinephrine and norepinephrine with approximately equal affinity. Subcellular location cell membrane; Multi-pass membrane protein. Homologous desensitization of the receptor is mediated by its phosphorylation by beta-adrenergic receptor kinase. Belongs to the G-protein coupled receptor 1 family.

Additional Information

Gene ID	153
Other Names	Beta-1 adrenergic receptor, Beta-1 adrenoreceptor, Beta-1 adrenoceptor, ADRB1 (HGNC:285), ADRB1R, B1AR
Dilution	WB=1:500-2000,IHC-P=1:100-500,IHC-F=1:100-500,IF=1:100-500,Flow-Cyt=1ug /Test
Storage	Store at -20 °C for one year. Avoid repeated freeze/thaw cycles. When reconstituted in sterile pH 7.4 0.01M PBS or diluent of antibody the antibody is stable for at least two weeks at 2-4 °C.

Protein Information

Name	ADRB1 (HGNC:285)
Synonyms	ADRB1R, B1AR
Function	G protein-coupled receptor for catecholamines that couples to G(s) proteins to activate adenylate cyclase and cAMP-dependent pathway (PubMed:10212248, PubMed:12391161, PubMed:15358775). Binds epinephrine and norepinephrine with approximately equal affinity (PubMed:33093660). Mediates the activation of Ras via binding with cAMP-dependent RAPGEF2 (PubMed:12391161). As part of the sympathetic nervous system, plays a role in the physiologic regulation of cardiac functions such as stimulation of cardiomyocyte contraction (PubMed:11052857). Also delivers proapoptotic signals in cardiomyocytes (By similarity). Involved in the regulation of sleep/wake behaviors (PubMed:11854867, PubMed:31473062).
Cellular Location	Cell membrane {ECO:0000250|UniProtKB:P18090}; Multi-pass membrane protein Note=Colocalizes with RAPGEF2 at the plasma membrane (By similarity) Localized at the plasma membrane (By similarity). Found in the Golgi upon GOPC overexpression (PubMed:15358775). Localized to early endosomes during endocytic trafficking (PubMed:21540189) {ECO:0000250|UniProtKB:P18090, ECO:0000269|PubMed:15358775, ECO:0000269|PubMed:21540189}

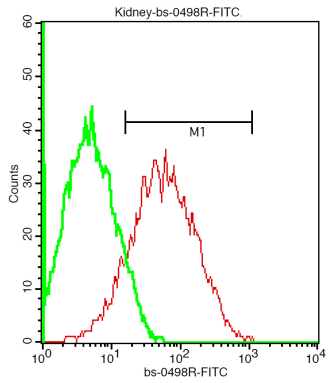
Background

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References

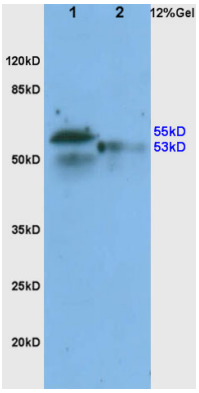
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Images

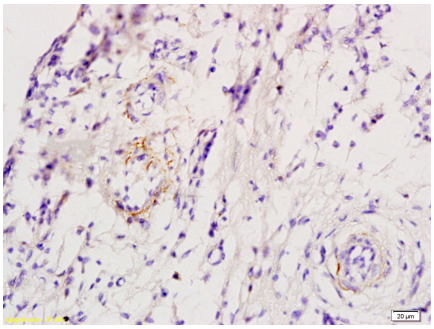


Tissue/cell: mouse kidney cell;
Incubation:
Red line: Anti-ADRB1 Polyclonal Antibody, FITC conjugated(AP52101-FITC) 1:200, 40 minutes at 37°C.
Green line: Isotype Control(AP52101-FITC, rabbit IgG/FITC) 1:200, 40 minutes at 37°C.

Sample:
Heart (Mouse) Lysate at 30 ug



Heart (Rat) Lysate at 30 ug
Primary: Anti- ADRB1(AP52101) at 1/200 dilution
Secondary: HRP conjugated Goat-Anti-rabbit IgG (AP52101-HRP) at 1/3000 dilution
Predicted band size: 52 kD
Observed band size: 55 kD



Tissue/cell: skin of rat foot; 4% Paraformaldehyde-fixed and paraffin-embedded;
Antigen retrieval: citrate buffer (0.01M, pH 6.0), Boiling bathing for 15min; Block endogenous peroxidase by 3% Hydrogen peroxide for 30min; Blocking buffer (normal goat serum,C-0005) at 37℃ for 20 min;
Incubation: Anti-ADRB1 Polyclonal Antibody, Unconjugated(AP52101) 1:200, overnight at 4°C, followed by conjugation to the secondary antibody(SP-0023) and DAB(C-0010) staining

Please note: All products are 'FOR RESEARCH USE ONLY. NOT FOR USE IN DIAGNOSTIC OR THERAPEUTIC PROCEDURES'.