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AR-β2 Polyclonal Antibody
Catalog # AP73231

Specification

AR-β2 Polyclonal Antibody - Product Information

Application	**WB**
Primary Accession	P07550
Reactivity	**Human, Mouse, Rat**
Host	**Rabbit**
Clonality	**Polyclonal**

AR-β2 Polyclonal Antibody - Additional Information

Gene ID 154

Other Names
ADRB2; ADRB2R; B2AR; Beta-2 adrenergic receptor; Beta-2 adrenoreceptor; Beta-2 adrenoceptor

Dilution
WB~~Western Blot: 1/500 - 1/2000. ELISA: 1/5000. Not yet tested in other applications.

Format
Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.09% (W/V) sodium azide.

Storage Conditions
-20℃

AR-β2 Polyclonal Antibody - Protein Information

Name ADRB2 (HGNC:286)

Synonyms ADRB2R, B2AR

Function
G protein-coupled receptor for catecholamines that couples to both G(s) and G(i) proteins, activating bifurcated signaling pathways (PubMed:2831218, PubMed:7915137). ADRB2 binds epinephrine (Epi) with an approximately 30-fold greater affinity than norepinephrine (NE) (PubMed:2831218, PubMed:33093660, PubMed:7915137). In the heart, Epi- and NE-activated ADRB2 induces rapid and slow cardiomyocyte contraction rate, respectively (By similarity). Both NE and Epi promote coupling to G(s)/PKA pathway to regulate myocyte contraction rate (By similarity). Epi also promotes ADRB2 coupling to G(i) proteins to exert cardioprotective effects especially in the conditions of hypoxia and oxidative stress through the G(i)/PI3K/Akt signaling pathway (By similarity). ADRB2-G(s) signaling delivers proapoptotic signals in cardiomyocytes although G(i)-mediated survival effect appears to predominate (By

similarity). ADRB2 also transduces signals independently of PKA to regulate cellular pH by modulating Na(+)/H(+) exchanger SLC9A3 function (PubMed:9560162).

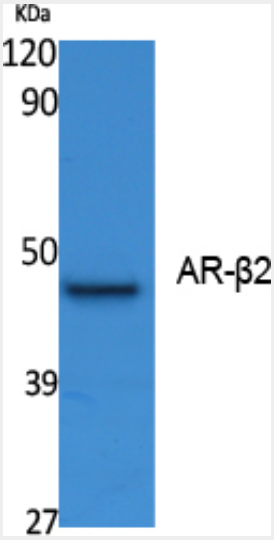
Cellular Location
Cell membrane; Multi-pass membrane protein. Golgi apparatus. Note=Colocalizes with VHL at the cell membrane (PubMed:19584355). Activated receptors are internalized into endosomes prior to their degradation in lysosomes (PubMed:20559325). Activated receptors are also detected within the Golgi apparatus (PubMed:27481942).

AR-β2 Polyclonal Antibody - Protocols

Provided below are standard protocols that you may find useful for product applications.

- Western Blot
- Blocking Peptides
- Dot Blot
- Immunohistochemistry
- Immunofluorescence
- Immunoprecipitation
- Flow Cytomety
- Cell Culture

AR-β2 Polyclonal Antibody - Images



Western Blot analysis of extracts from K562 cells, using AR-β2 Polyclonal Antibody.. Secondary antibody was diluted at 1:20000

AR-β2 Polyclonal Antibody - Background

Beta-adrenergic receptors mediate the catecholamine- induced activation of adenylate cyclase through the action of G proteins. The beta-2-adrenergic receptor binds epinephrine with an approximately 30-fold greater affinity than it does norepinephrine.