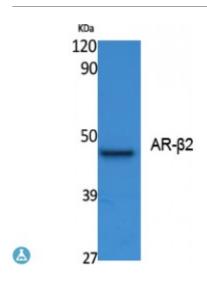


## Anti-AR-beta antibody



**Description** Rabbit polyclonal to AR-beta2.

Model STJ96413

**Host** Rabbit

**Reactivity** Human, Mouse, Rat

**Applications** ELISA, WB

**Immunogen** Synthesized peptide derived from human AR-beta2 around the non-

phosphorylation site of S355/S356.

**Immunogen Region** 300-380 aa

**Gene ID** <u>154</u>

Gene Symbol ADRB2

**Dilution range** WB 1:500-1:2000ELISA 1:5000

**Specificity** AR-beta2 Polyclonal Antibody detects endogenous levels of AR-beta2

protein.

**Purification** The antibody was affinity-purified from rabbit antiserum by affinity-

chromatography using epitope-specific immunogen.

**Note** For Research Use Only (RUO).

Protein Name Beta-2 adrenergic receptor Beta-2 adrenoreceptor Beta-2 adrenoceptor

Molecular Weight 46 kDa

**Clonality** Polyclonal

**Conjugation** Unconjugated

**IgG Isotype** 

**Formulation** Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.

Concentration 1 mg/ml

Store at -20°C, and avoid repeat freeze-thaw cycles. **Storage Instruction** 

HGNC:286OMIM:109690 **Database Links** 

**Alternative Names** Beta-2 adrenergic receptor Beta-2 adrenoreceptor Beta-2 adrenoceptor

Beta-adrenergic receptors mediate the catecholamine-induced activation of **Function** 

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.

**Cellular Localization** Cell membrane Early endosome. Colocalizes with VHL at the cell membrane.

Activated receptors are internalized into endosomes prior to their degradation

in lysosomes.

Palmitoylated; may reduce accessibility of Ser-345 and Ser-346 by anchoring Post-translational

Cys-341 to the plasma membrane. Agonist stimulation promotes

depalmitoylation and further allows Ser-345 and Ser-346 phosphorylation. Phosphorylated by PKA and BARK upon agonist stimulation, which mediates homologous desensitization of the receptor. PKA-mediated phosphorylation seems to facilitate phosphorylation by BARK.; Phosphorylation of Tyr-141 is

induced by insulin and leads to supersensitization of the receptor.

Polyubiquitinated. Agonist-induced ubiquitination leads to sort internalized receptors to the lysosomes for degradation. Deubiquitination by USP20 and USP33, leads to ADRB2 recycling and resensitization after prolonged agonist

stimulation. USP20 and USP33 are constitutively associated and are

dissociated immediately after agonist stimulation. Ubiquitination by the VHL-E3 ligase complex is oxygen-dependent. Hydroxylation by EGLN3 occurs only under normoxia and increases the interaction with VHL and the

subsequent ubiquitination and degradation of ADRB2.

**Modifications**