

AR- α 1A Polyclonal Antibody

Catalog No :	YT0355
Reactivity :	Human;Rat;Mouse;
Applications :	WB;IHC;IF;ELISA
Target :	AR- α 1A
Fields :	>>Calcium signaling pathway;>>cGMP-PKG signaling pathway;>>Neuroactive ligand-receptor interaction;>>AMPK signaling pathway;>>Adrenergic signaling in cardiomyocytes;>>Vascular smooth muscle contraction;>>Salivary secretion
Gene Name :	ADRA1A
Protein Name :	Alpha-1A adrenergic receptor
Human Gene Id :	148
Human Swiss Prot No :	P35348
Mouse Swiss Prot No :	P97718
Immunogen :	The antiserum was produced against synthesized peptide derived from human ADRA1A. AA range:341-390
Specificity :	AR- α 1A Polyclonal Antibody detects endogenous levels of AR- α 1A protein.
Formulation :	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% sodium azide.
Source :	Polyclonal, Rabbit,IgG
Dilution :	WB 1:500 - 1:2000. IHC 1:100 - 1:300. IF 1:200 - 1:1000. ELISA: 1:10000. Not yet tested in other applications.
Purification :	The antibody was affinity-purified from rabbit antiserum by affinity-chromatography using epitope-specific immunogen.
Concentration :	1 mg/ml

Storage Stability : -15°C to -25°C/1 year(Do not lower than -25°C)

Observed Band : 51kD

Cell Pathway : Calcium;Neuroactive ligand-receptor interaction;Vascular smooth muscle contraction;

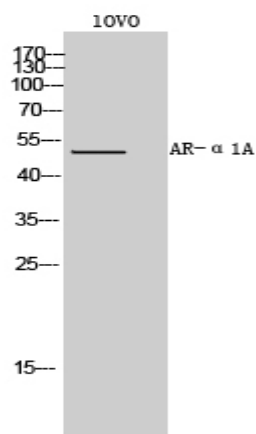
Background : Alpha-1-adrenergic receptors (alpha-1-ARs) are members of the G protein-coupled receptor superfamily. They activate mitogenic responses and regulate growth and proliferation of many cells. There are 3 alpha-1-AR subtypes: alpha-1A, -1B and -1D, all of which signal through the Gq/11 family of G-proteins and different subtypes show different patterns of activation. This gene encodes alpha-1A-adrenergic receptor. Alternative splicing of this gene generates four transcript variants, which encode four different isoforms with distinct C-termini but having similar ligand binding properties. [provided by RefSeq, Jul 2008],

Function : function:This alpha-adrenergic receptor mediates its action by association with G proteins that activate a phosphatidylinositol-calcium second messenger system. Its effect is mediated by G(q) and G(11) proteins.,PTM:Carboxyl-terminal Ser or Thr residues may be phosphorylated.,similarity:Belongs to the G-protein coupled receptor 1 family.,tissue specificity:Heart, brain, liver and prostate, but not in kidney, lung, adrenal, aorta and pituitary. Isoform 4 is the most abundant isoform expressed in the prostate with high levels also detected in liver and heart.,

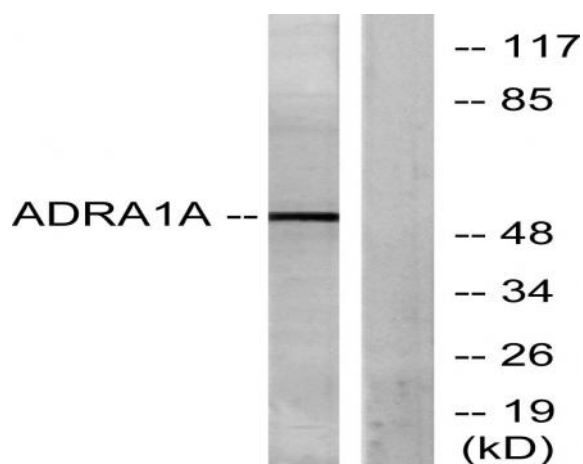
Subcellular Location : Nucleus membrane; Multi-pass membrane protein. Cell membrane ; Multi-pass membrane protein . Cytoplasm . Membrane, caveola . Location at the nuclear membrane facilitates heterooligomerization and regulates ERK-mediated signaling in cardiac myocytes. Colocalizes with GNAQ, PLCB1 as well as LAP2 at the nuclear membrane of cardiac myocytes.

Expression : Expressed in heart, brain, liver and prostate, but not in kidney, lung, adrenal, aorta and pituitary. Within the prostate, expressed in the apex, base, periurethral and lateral lobe. Isoform 4 is the most abundant isoform expressed in the prostate with high levels also detected in liver and heart.

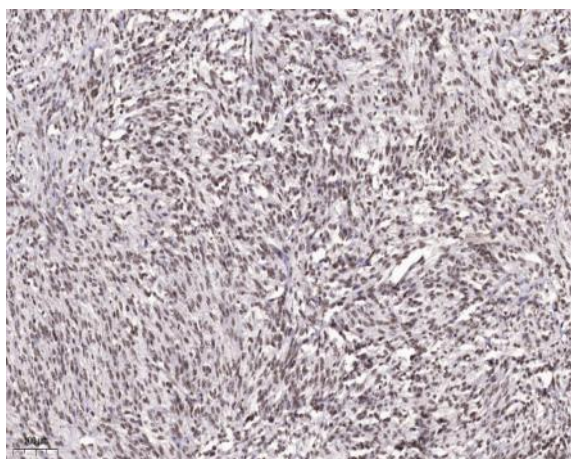
Products Images



Western Blot analysis of IOVO cells using AR-α1A Polyclonal Antibody



Western blot analysis of lysates from IOVO cells, using ADRA1A Antibody. The lane on the right is blocked with the synthesized peptide.



Immunohistochemical analysis of paraffin-embedded human Small intestinal stromal tumor. 1, Tris-EDTA, pH9.0 was used for antigen retrieval. 2 Antibody was diluted at 1:200(4° overnight). 3, Secondary antibody was diluted at 1:200(room temperature, 45min).