

Summary

Production Name	AVP Receptor V2 Rabbit Polyclonal Antibody
Description	Rabbit Polyclonal Antibody
Host	Rabbit
Application	WB,IF-P,IF-F,ICC/IF,ELISA
Reactivity	Human,Rat,Mouse
Reactivity	Human, Rat, Mouse

Performance

Conjugation	Unconjugated
Modification	Unmodified
lsotype	lgG
Clonality	Polyclonal
Form	Liquid
Storage	Store at 4°C short term. Aliquot and store at -20°C long term. Avoid freeze/thaw
	cycles.
Buffer	Liquid in PBS containing 50% glycerol, 0.5% BSA and 0.02% New type preservative N.
Purification	Affinity purification

Immunogen

Gene Name	AVPR2
Alternative Names	AVPR2; ADHR; DIR; DIR3; V2R; Vasopressin V2 receptor; V2R; AVPR V2; Antidiuretic
	hormone receptor; Renal-type arginine vasopressin receptor
Gene ID	554.0
SwissProt ID	P30518.The antiserum was produced against synthesized peptide derived from human
	AVPR2. AA range:72-121

Application

Dilution Ratio	WB 1:500-1:2000, IF-P/IF-F/ICC/IF 1:200-1:1000, ELISA 1:10000.Not yet tested in other
	applications.



Molecular Weight 38kDa

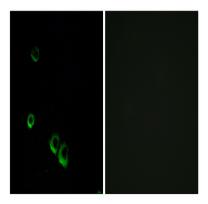
Background

This gene encodes the vasopressin receptor, type 2, also known as the V2 receptor, which belongs to the seventransmembrane-domain G protein-coupled receptor (GPCR) superfamily, and couples to Gs thus stimulating adenylate cyclase. The subfamily that includes the V2 receptor, the V1a and V1b vasopressin receptors, the oxytocin receptor, and isotocin and mesotocin receptors in non-mammals, is well conserved, though several members signal via other G proteins. All bind similar cyclic nonapeptide hormones. The V2 receptor is expressed in the kidney tubule, predominantly in the distal convoluted tubule and collecting ducts, where its primary property is to respond to the pituitary hormone arginine vasopressin (AVP) by stimulating mechanisms that concentrate the urine and maintain water homeostasis in the organism. When the function of this gene is lost, the disease Nephrogenic Diabetes Insipidus disease: Defects in AVPR2 are the cause of diabetes insipidus nephrogenic X-linked (XNDI) [MIM:304800]; also known as diabetes insipidus nephrogenic type 1. XNDI is caused by the inability of the renal collecting ducts to absorb water in response to arginine vasopressin. It is characterized by excessive water drinking (polydypsia), excessive urine excretion (polyuria), persistent hypotonic urine, and hypokalemia., disease: Defects in AVPR2 are the cause of nephrogenic syndrome of inappropriate antidiuresis (NSIAD) [MIM:300539]. This disorder is characterized by an inability to excrete a free water load, with inappropriately concentrated urine and resultant hyponatremia, hypoosmolarity, and natriuresis, function: Receptor for arginine vasopressin. The activity of this receptor is mediated by G proteins which activate adenylate cyclase.,online information:AVPR2 pages, similarity: Belongs to the G-protein coupled receptor 1 family., tissue specificity: Kidney.,

Research Area

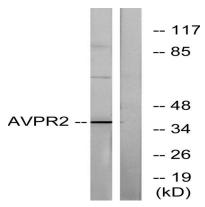
Neuroactive ligand-receptor interaction;

Image Data

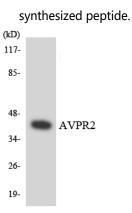


Immunofluorescence analysis of MCF7 cells, using AVPR2 Antibody. The picture on the right is blocked with the synthesized peptide.





Western blot analysis of lysates from RAW264.7 cells, using AVPR2 Antibody. The lane on the right is blocked with the





Note

For research use only.