Vasopressin receptor V_{1b} polyclonal antibody

Arginine vasopressin (AVP) is a nonapeptide hormone produced in magnocellular neurons of the hypothalamus, which functions as an antidiuretic in the kidney and systemically as a regulator of vasoconstriction, blood volume, and blood pressure. AVP acts by binding to a set of specific seven transmembrane domain-containing G-protein coupled receptors (GPCR) classified into three groups: V1a (V1), V1b (V3), and V2. V1b receptors stimulate adrenocorticotropic hormone (ACTH) release in the anterior pituitary, but may also participate in corticotropin-releasing hormone (CRH) release by the hypothalamus. The V1b receptor signals through coupling of Gq/11 alpha subunits, activating phospholipase C and release of intracellular Ca2+ via phosphoinositide second messengers. V1b receptor overexpression is a common marker for ACTH-secreting corticotropic adenomas. V2 receptors in the collecting ducts of the kidneys stimulate adenylyl cyclase activity, regulating the reabsorption of water via aquaporin channels.

This antibody is covered by our Worry-Free Guarantee.

Citations: 2

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Ordering Information

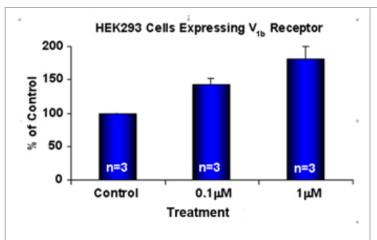
Order Online »

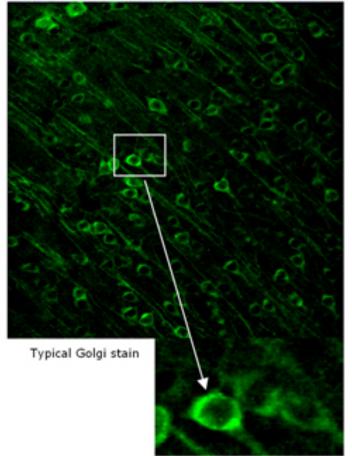
ADI-905-750-100

100µg

Manuals, SDS & CofA

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Cellular ELISA: HEK293 cells expressing V1b Receptor were treated with indicated concentrations of agonist (Vasopressin) and probed with Vasopressin Receptor (V1b) pAb (1:1000 of a stock solution of $1\mu g/\mu l$) by ELISA. Data from vehicle treated cells were taken as 100%. Results are the mean \pm SEM (n=3).



at 1:1000, and visualized at 40x.

Handling & Storage

Handling Keep on ice at all times.

Long Term Storage -20°C

Shipping Blue Ice

Regulatory Status RUO - Research Use Only

Product Details

Alternative Name AVPR1B

Application ELISA, IHC, WB

Application Notes Suitable for cell-based and membrane-based ELISA.

Predicted MW of ~47kDa. Higher MW species (~50kDa) also observed by Western blot

which reflects post-translational modification of the receptor.

Formulation Liquid. In PBS containing 50% glycerol and 0.01% sodium azide.

Host Rabbit

Immunogen Synthetic peptide corresponding to the sequence near the N-terminus of rat vasopressin

receptor V1b.

Purity Detail Peptide affinity purified.

Species Reactivity Human, Mouse, Rat

UniProt ID P48974

Worry-free Guarantee This antibody is covered by our Worry-Free Guarantee.

