

GABA A Receptor beta 1 Antibody

Rabbit mAb Catalog # AP91689

Product Information

Application WB **Primary Accession** P18505

Reactivity Rat, Human, Mouse

Clonality Monoclonal

Other Names GABA-A receptor, beta-1 polypeptide; Gabrb-1; GABRB1; GARB1;

Isotype Rabbit IgG Host Rabbit 54235 Calculated MW

Additional Information

Dilution WB 1:500~1:2000 **Purification** Affinity-chromatography

Immunogen A synthesized peptide derived from human GABA A Receptor beta 1

GABA, the major inhibitory neurotransmitter in the vertebrate brain, mediates Description

neuronal inhibition by binding to the GABA/benzodiazepine receptor and

opening an integral chloride channel.

Storage Condition and Buffer Rabbit IgG in phosphate buffered saline, pH 7.4, 150mM NaCl, 0.02% sodium

azide and 50% glycerol. Store at +4°C short term. Store at -20°C long term.

Avoid freeze / thaw cycle.

Protein Information

Name GABRB1 (HGNC:4081)

Function Beta subunit of the heteropentameric ligand-gated chloride channel gated

> by gamma-aminobutyric acid (GABA), a major inhibitory neurotransmitter in the brain (PubMed: 10449790, PubMed: 16412217, PubMed: 26950270). GABA-gated chloride channels, also named GABA(A) receptors (GABAAR), consist of five subunits arranged around a central pore and contain one or two GABA active binding sites located at the alpha and beta subunit

interfaces, depending on subunit composition (By similarity). When activated by GABA, GABAARs selectively allow the flow of chloride anions across the cell

membrane down their electrochemical gradient (PubMed: 10449790,

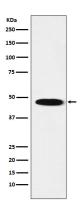
PubMed: 16412217, PubMed: 26950270). Chloride influx into the postsynaptic neuron following GABAAR opening decreases the neuron ability to generate a

new action potential, thereby reducing nerve transmission

(PubMed:16412217, PubMed:26950270). Beta-containing GABAARs can simultaneously bind GABA and histamine where histamine binds at the interface of two neighboring beta subunits, which may be involved in the regulation of sleep and wakefulness (By similarity).

Postsynaptic cell membrane {ECO:0000250|UniProtKB:P08220}; Multi-pass membrane protein {ECO:0000250|UniProtKB:P08220}. Cell membrane; Multi-pass membrane protein {ECO:0000250|UniProtKB:P08220}

Images



Western blot analysis of GABA A Receptor beta 1 expression in Human cerebellum lysate.

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