

mGluR-1a/b (G-13): sc-47130

BACKGROUND

The mGluR proteins (metabotropic glutamate receptors) are members of the G protein-coupled receptor family and are functionally and pharmacologically distinct from the GluR proteins (ionotropic glutamate receptors). The eight currently known mGluR proteins are mediated by two G proteins with opposing regulation of adenylate cyclase pathways. The activities of mGluR-1 and mGluR-5 are mediated by a G protein that activates a phosphatidylinositol-calcium second messenger system and generates a calcium-activated chloride current. The remainder of the eight subtypes of mGluR have an activity mediated by a G protein that inhibits adenylate cyclase activity. mGluR-1, which can form a homodimer, acts as a receptor for glutamate. It may also be involved in glutamate activity in the CNS.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: GRM1 (human) mapping to 6q24.3; Grm1 (mouse) mapping to 10 A1.

SOURCE

mGluR-1a/b (G-13) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an extracellular domain of mGluR-1 of human origin.

STORAGE

Store at 4° C, ****DO NOT FREEZE****. Stable for one year from the date of shipment. Non-hazardous. No MSDS required.

PRODUCT

Each vial contains 200 µg IgG in 1.0 ml of PBS with < 0.1% sodium azide and 0.1% gelatin.

Blocking peptide available for competition studies, sc-47130 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

mGluR-1a/b (G-13) is recommended for detection of mGluR-1a/b of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

mGluR-1a/b (G-13) is also recommended for detection of mGluR-1a/b in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for mGluR-1a/b siRNA (h): sc-61026, mGluR-1a/b siRNA (m): sc-61027, mGluR-1a/b shRNA Plasmid (h): sc-61026-SH, mGluR-1a/b shRNA Plasmid (m): sc-61027-SH, mGluR-1a/b shRNA (h) Lentiviral Particles: sc-61026-V and mGluR-1a/b shRNA (m) Lentiviral Particles: sc-61027-V.

Molecular Weight of mGluR-1a/b nonreduced dimeric form: 260/270 kDa.

Molecular Weight of mGluR-1a/b reduced monomeric form: 135 kDa.

Positive Controls: mouse cerebellum extract: sc-2403, mouse brain extract: sc-2253 or rat brain extract: sc-2392.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use donkey anti-goat IgG-HRP: sc-2020 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible donkey anti-goat IgG-HRP: sc-2033 (dilution range: 1:2000-1:5000), Cruz Marker™ Molecular Weight Standards: sc-2035, TBS Blotto A Blocking Reagent: sc-2333 and Western Blotting Luminol Reagent: sc-2048. 2) Immunofluorescence: use donkey anti-goat IgG-FITC: sc-2024 (dilution range: 1:100-1:400) or donkey anti-goat IgG-TR: sc-2783 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

RESEARCH USE

For research use only, not for use in diagnostic procedures.

PROTOCOLS

See our web site at www.scbt.com or our catalog for detailed protocols and support products.


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 Satisfation
 Guaranteed

Try **mGluR-1a/b (1F7): sc-293437**, our highly recommended monoclonal alternative to mGluR-1a/b (G-13).