



DP (M-47): sc-67278

BACKGROUND

DP (prostanoid DP receptor or prostaglandin D2 receptor), also known as AS1 or ASRT1, is a member of the G protein-coupled receptor 1 family. It localizes to the cell membrane and is widely expressed, found in platelet cells and tissues such as lung, nasal mucosa, small intestine and retina. DP functions as one of the two receptors for prostaglandin D2 (the other being CRTH2). Responses mediated by DP include mucin secretion, vasorelaxation via synthesis of intracellular cAMP, inhibition of platelet aggregation and the lowering of intraocular pressure. DP also plays an important role in eosinophil trafficking and may serve as a target protein in the treatment of allergic disease. Variations in the gene encoding DP are implicated in the susceptibility to asthma-related traits including symptoms such as wheezing, coughing and dyspnea.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: PTGDR (human) mapping to 14q22.1; Ptgdr (mouse) mapping to 14 C1.

SOURCE

DP (M-47) is a rabbit polyclonal antibody raised against amino acids 216-262 mapping within an extracellular domain of DP of mouse origin.

RESEARCH USE

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

PRODUCT

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

APPLICATIONS

DP (M-47) is recommended for detection of prostanoid DP receptor of mouse, rat and, to a lesser extent, human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1–2 µg per 100–500 µg of total protein (1 ml of cell lysate)], 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).

Suitable for use as control antibody for DP siRNA (h): sc-62226 and DP siRNA (m): sc-62227.

Molecular Weight of DP: 40 kDa.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Western Blotting: use goat anti-rabbit IgG-HRP: sc-2004 (dilution range: 1:2000-1:100,000) or Cruz Marker™ compatible goat anti-rabbit IgG-HRP: sc-2030 (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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) Immunofluorescence: use goat anti-rabbit IgG-FITC: sc-2012 (dilution range: 1:100-1:400) or goat anti-rabbit IgG-TR: sc-2780 (dilution range: 1:100-1:400) with UltraCruz™ Mounting Medium: sc-24941.

STORAGE

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

PROTOCOLS

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