

CTRP3 (C-16): sc-46813

BACKGROUND

The complement component proteins, C1, C3, C4 and C5, are potent anaphylatoxins that are released during complement activation. Binding of these proteins to their respective G protein-coupled receptors induces proinflammatory events, such as cellular degranulation, smooth muscle contraction, arachidonic acid metabolism, cytokine release, leukocyte activation and cellular chemotaxis. CTRP3, also designated C1qR(p) or CD93, is a type I cell surface glycoprotein that mediates the enhancement of phagocytic activity. CTRP3 binds to several ligands, including the complement protein C1q, mannose-binding lectin (MBL), and pulmonary surfactant protein A (SPA). CTRP3 is expressed in cells of myeloid lineage, endothelial cells, and platelets. In addition to its role in phagocytosis, CTRP3 may be involved in cellular adhesion. Complement C1q tumor necrosis factor-related protein 3 (CTRP3), also known as CORS26, has a trimeric structure and can assemble into hexameric or higher order molecular forms.

REFERENCES

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- Weigert, J., Neumeier, M., Schäffler, A., Fleck, M., Schölmerich, J., Schütz, C. and Buechler, C. 2005. The adiponectin paralog CORS-26 has anti-inflammatory properties and is produced by human monocytic cells. *FEBS Lett.* 579: 5565-5570.
- SWISS-PROT/TrEMBL (Q9BXJ4). World Wide Web URL: <http://www.expasy.ch/sprot/sprot-top.html>

CHROMOSOMAL LOCATION

Genetic locus: C10TNF3 (human) mapping to 5p13.2; C1qtnf3 (mouse) mapping to 15 A1.

SOURCE

CTRP3 (C-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the C-terminus of CTRP3 of human origin.

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-46813 P, (100 µg peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

APPLICATIONS

CTRP3 (C-16) is recommended for detection of mature CTRP3 and CORS26 precursor 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).

CTRP3 (C-16) is also recommended for detection of mature CTRP3 and CORS26 precursor in additional species, including equine, canine, bovine, porcine and avian.

Suitable for use as control antibody for CTRP3 siRNA (h): sc-60297, CTRP3 siRNA (m): sc-60298, CTRP3 shRNA Plasmid (h): sc-60297-SH, CTRP3 shRNA Plasmid (m): sc-60298-SH, CTRP3 shRNA (h) Lentiviral Particles: sc-60297-V and CTRP3 shRNA (m) Lentiviral Particles: sc-60298-V.

Molecular Weight of CTRP3: 27 kDa.

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.

STORAGE

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

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.