Acrp30 (49875): sc-73669



The Power to Question

BACKGROUND

Acrp30 (adipocyte complement-related protein of 30 kDa or AdipoQ) is a secretory protein made exclusively in adipocytes with mRNA induced over 100-fold during adipocyte differentiation. Posttranscriptional modification of Acrp30 yields several oligomeric forms of varying molecular weight, including a monomer, a dimer, a trimer, a hexamer and a polymer. Acrp30 is an abundant serum protein, secreted exclusively from fat cells, and is implicated in energy homeostasis and obesity. Due to the dysregulation of Acrp30 in cases of obesity in humans and mice and the strong structural similarity to TNF α , Acrp30 is a suspected regulator of whole body energy homeostasis. In addition, regulated exocytosis of Acrp30 appears to require phosphatidylinositol-3-kinase activity, since insulin-stimulated Acrp30 secretion is blocked by pharmacologic inhibitors of this enzyme.

REFERENCES

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CHROMOSOMAL LOCATION

Genetic locus: ADIPOQ (human) mapping to 3q27; Adipoq (mouse) mapping to 16.

RESEARCH USE

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

SOURCE

Acrp30 (49875) is a rat monoclonal antibody raised against full length recombinant Acrp30 of mouse origin.

PRODUCT

Each vial contains 100 μg IgG2a in 1.0 ml PBS with < 0.1% sodium azide and protein stabilizer.

APPLICATIONS

Acrp30 (49875) is recommended for detection of Acrp30 of mouse and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000).

Suitable for use as control antibody for Acrp30 siRNA (h): sc-43600, Acrp30 siRNA (m): sc-45891, Acrp30 shRNA Plasmid (h): sc-43600-SH, Acrp30 shRNA Plasmid (m): sc-45891-SH, Acrp30 shRNA (h) Lentiviral Particles: sc-43600-V and Acrp30 shRNA (m) Lentiviral Particles: sc-45891-V.

Molecular Weight of LMW Acrp30 monomer: 30 kDa.

Molecular Weight of HMW Acrp30 polymer: greater than 250 kDa.

Positive Controls: 3T3-L1 cell lysate: sc-2243 or MIA PaCa-2 cell lysate: sc-2285.

RECOMMENDED SECONDARY REAGENTS

To ensure optimal results, the following support (secondary) reagents are recommended: 1) Immunofluorescence: use goat anti-rat IgG-FITC: sc-2011 (dilution range: 1:100-1:400) or goat anti-rat IgG-TR: sc-2782 (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.