**BACKGROUND**

Advanced glycosylation end products of proteins (AGEs) are non-enzymatically glycosylated proteins that are associated with a variety of conditions, including diabetes and other vascular disorders, as well as amyloidosis. These proteins regulate cellular functions via specific cell surface acceptor molecules, such as RAGE. RAGE is a type 1 membrane protein that is found on the surface of endothelial cells, mononuclear phagocytes and vascular smooth muscle cells. Binding of AGEs to RAGE results in the induction of cellular oxidant stress and activation of the transcription factor NFκB. Evidence suggests that the induction of oxidant stress results in the activation of an intracellular cascade involving p21 ras and MAP kinase, which leads to activation of transcription.

**CHROMOSOMAL LOCATION**

Genetic locus: AGER (human) mapping to 6p21.32; Ager (mouse) mapping to 17 B 1.

**SOURCE**

RAGE (N-16) is an affinity purified goat polyclonal antibody raised against a peptide mapping at the N-terminus of RAGE 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-8230 P, (100 µg peptide in 0.5 ml PBS containing <0.1% sodium azide and 0.2% BSA).

**APPLICATIONS**

RAGE (N-16) is recommended for detection of RAGE of mouse, rat and 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).

RAGE (N-16) is also recommended for detection of RAGE in additional species, including bovine and porcine.

Suitable for use as control antibody for RAGE siRNA (h): sc-36374, RAGE siRNA (m): sc-36375, RAGE shRNA Plasmid (h): sc-36374-SH, RAGE shRNA Plasmid (m): sc-36375-SH, RAGE shRNA (h) Lentiviral Particles: sc-36374-V and RAGE shRNA (m) Lentiviral Particles: sc-36375-V.

Molecular Weight of RAGE: 46 kDa.

**RESEARCH USE**

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

**DATA**

RAGE (N-16): sc-8230. Western blot analysis of RAGE expression in mouse lung tissue extract.

RAGE (N-16): sc-8230. Immunofluorescence staining of methanol-fixed A549 cells showing membrane staining.

**SELECT PRODUCT CITATIONS**


**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.

Try RAGE (A-9): sc-365154 or RAGE (RD9C2): sc-33662, our highly recommended monoclonal alternatives to RAGE (N-16). Also, for AC, HRP, FITC, PE, Alexa Fluor® 488 and Alexa Fluor® 647 conjugates, see RAGE (A-9): sc-365154.