

CERCAM (Y-17): sc-246266

BACKGROUND

CERCAM (cerebral endothelial cell adhesion molecule), also known as GLT25D3 (glycosyltransferase 25 family member 3), is a 595 amino acid protein that is localized to the endoplasmic reticulum. Despite belonging to the glycosyltransferase 25 family, CERCAM has no glucosyltransferase activity and very low, if any, β -galactosyltransferase activity. CERCAM is highly expressed in secretory and nervous tissues and likely functions as a cell adhesion protein that assists leukocyte transmigration across the blood-brain barrier. There are two isoforms of CERCAM that are produced as a result of alternative splicing events.

REFERENCES

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- Steeber, D.A. and Tedder, T.F. 2000. Adhesion molecule cascades direct lymphocyte recirculation and leukocyte migration during inflammation. *Immunol. Res.* 22: 299-317.
- Starzyk, R.M., et al. 2000. Cerebral cell adhesion molecule: a novel leukocyte adhesion determinant on blood-brain barrier capillary endothelium. *J. Infect. Dis.* 181: 181-187.
- Muller, W.A. 2003. Leukocyte-endothelial-cell interactions in leukocyte transmigration and the inflammatory response. *Trends Immunol.* 24: 327-334.
- Schegg, B., et al. 2009. Core glycosylation of collagen is initiated by two $\beta(1-0)$ galactosyltransferases. *Mol. Cell. Biol.* 29: 943-952.
- Fang, W., et al. 2010. Platelet activating factor induces blood brain barrier permeability alteration *in vitro*. *J. Neuroimmunol.* 230: 42-47.

CHROMOSOMAL LOCATION

Genetic locus: CERCAM (human) mapping to 9q34.11; Cercam (mouse) mapping to 2 B.

SOURCE

CERCAM (Y-17) is an affinity purified goat polyclonal antibody raised against a peptide mapping within an internal region of CERCAM of human origin.

PRODUCT

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

Blocking peptide available for competition studies, sc-246266 P, (100 μ g peptide in 0.5 ml PBS containing < 0.1% sodium azide and 0.2% BSA).

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.

APPLICATIONS

CERCAM (Y-17) is recommended for detection of CERCAM of mouse, rat and human origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g 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).

CERCAM (Y-17) is also recommended for detection of CERCAM in additional species, including equine, canine, bovine and porcine.

Suitable for use as control antibody for CERCAM siRNA (h): sc-92783, CERCAM siRNA (m): sc-142294, CERCAM shRNA Plasmid (h): sc-92783-SH, CERCAM shRNA Plasmid (m): sc-142294-SH, CERCAM shRNA (h) Lentiviral Particles: sc-92783-V and CERCAM shRNA (m) Lentiviral Particles: sc-142294-V.

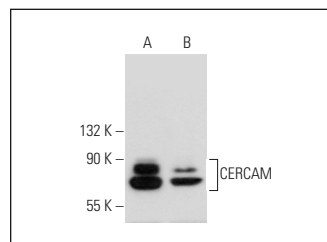
Molecular Weight of CERCAM: 68/59 kDa.

Positive Controls: U-87 MG cell lysate: sc-2411 or RT-4 whole cell lysate: sc-364257.

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) Immunoprecipitation: use Protein A/G PLUS-Agarose: sc-2003 (0.5 ml agarose/2.0 ml). 3) 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.

DATA



CERCAM (Y-17): sc-246266. Western blot analysis of CERCAM expression in U-87 MG (A) and RT-4 (B) whole cell lysates.

PROTOCOLS

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