

TECK (YY05): sc-80344

BACKGROUND

Chemokines are likely to play an important role in regulating the trafficking of developing T cells within the thymus. Chemokine C-C thymus expressed chemokine (TECK), also designated chemokine ligand 25 (CCL25), small inducible cytokine A25, chemokine β -15 or CK β -15, is expressed predominantly in thymic dendritic cells, thymic epithelial cells and in the small intestine. TECK, a CCR9 ligand, has suppressive activity against immature subsets of myeloid progenitors which have been stimulated to proliferate by multiple growth factors. TECK delivers signals through CCR9, which is important for the navigation of developing thymocytes. Bone marrow pre-pro-B cells and cells capable of generating pro-B colonies in the presence of interleukin-7 and Flt-3 ligand migrate to TECK, a response lost in later stages of B cell development.

REFERENCES

1. Broxmeyer, H.E., et al. 1999. Effects of C-C, C-X-C, C and CX3C chemokines on proliferation of myeloid progenitor cells, and insights into SDF-1-induced chemotaxis of progenitors. *Ann. N.Y. Acad. Sci.* 872: 142-162.
2. Zabel, B.A., et al. 1999. Human G protein-coupled receptor GPR-9-6/C-C chemokine receptor 9 is selectively expressed on intestinal homing T lymphocytes, mucosal lymphocytes and thymocytes and is required for thymus-expressed chemokine-mediated chemotaxis. *J. Exp. Med.* 190: 1241-1256.
3. Wurbel, M.A., et al. 2000. The chemokine TECK is expressed by thymic and intestinal epithelial cells and attracts double- and single-positive thymocytes expressing the TECK receptor CCR9. *Eur. J. Immunol.* 30: 262-271.
4. Norment, A.M., et al. 2000. Murine CCR9, a chemokine receptor for thymus-expressed chemokine that is upregulated following pre-TCR signaling. *J. Immunol.* 164: 639-648.
5. Yu, C.R., et al. 2000. CCR9A and CCR9B: two receptors for the chemokine CCL25/TECK/CK β -15 that differ in their sensitivities to ligand. *J. Immunol.* 164: 1293-1305.
6. Gosling, J., et al. 2000. Cutting edge: identification of a novel chemokine receptor that binds dendritic cell- and T cell-active chemokines including ELC, SLC and TECK. *J. Immunol.* 164: 2851-2856.
7. Bowman, E.P., et al. 2000. Developmental switches in chemokine response profiles during B cell differentiation and maturation. *J. Exp. Med.* 191: 1303-1318.

CHROMOSOMAL LOCATION

Genetic locus: Ccl25 (mouse) mapping to 8 A1.1.

SOURCE

TECK (YY05) is a rat monoclonal antibody raised against full length recombinant TECK of mouse origin.

PRODUCT

Each vial contains 100 μ g IgG_{2a} in 1.0 ml PBS with < 0.1% sodium azide and 0.1% gelatin.

APPLICATIONS

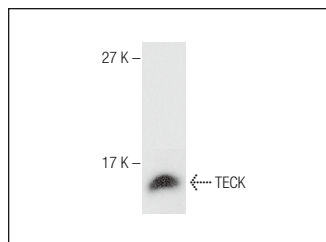
TECK (YY05) is recommended for detection of TECK of mouse origin by Western Blotting (starting dilution 1:200, dilution range 1:100-1:1000), immunoprecipitation [1-2 μ g per 100-500 μ g of total protein (1 ml of cell lysate)], immunofluorescence (starting dilution 1:50, dilution range 1:50-1:500), immunohistochemistry (including paraffin-embedded sections) (starting dilution 1:50, dilution range 1:50-1:500) and solid phase ELISA (starting dilution 1:30, dilution range 1:30-1:3000); non cross-reactive with other chemokines.

Suitable for use as control antibody for TECK siRNA (m): sc-39372, TECK shRNA Plasmid (m): sc-39372-SH and TECK shRNA (m) Lentiviral Particles: sc-39372-V.

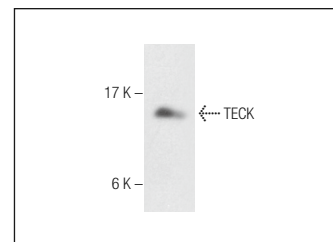
Molecular Weight of TECK: 17 kDa.

Positive Controls: RAW 264.7 whole cell lysate: sc-2211.

DATA



TECK (YY05): sc-80344. Western blot analysis of TECK expression in RAW 264.7 whole cell lysate.



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SELECT PRODUCT CITATIONS

1. Fiume, G., et al. 2015. Impairment of T cell development and acute inflammatory response in HIV-1 Tat transgenic mice. *Sci. Rep.* 5: 13864.
2. Huang, Y., et al. 2016. Abrogation of CC chemokine receptor 9 ameliorates ventricular remodeling in mice after myocardial infarction. *Sci. Rep.* 6: 32660.
3. Umar, S., et al. 2011. CCL25 and CCR9 is a unique pathway that potentiates pannus formation by remodeling RA macrophages into mature osteoclasts. *Eur. J. Immunol.* 41: 903-914.

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 for detailed protocols and support products.