

Monoclonal Antibody to CD54 / ICAM1 - FITC

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| Alternate names: | ICAM-1, Intercellular adhesion molecule 1, Major Group Rhinovirus Receptor |
| Catalog No.: | SM286FX |
| Quantity: | 0.5 mg |
| Concentration: | 0.5 mg/ml |
| Background: | CD54 is a 90kD adhesion molecule belonging to the immunoglobulin superfamily. CD54 is a cell surface ligand of the lymphocyte integrin, LFA-1 and is known to play an important role in various cell-cell interactions in the immune system. |
| Uniprot ID: | Q00238 |
| NCBI: | NP_037099.1 |
| GeneID: | 25464 |
| Host / Isotype: | Mouse / IgG1 |
| Clone: | 1A29 |
| Immunogen: | Rat Ax cells (a HEV derived cell line). Remarks: Spleen cells from immunised BALB/c mice were fused with cells from the PAI mouse myeloma cell line. |
| Format: | State: Liquid purified IgG fraction Purification: Affinity Chromatography on Protein G Buffer System: PBS, pH 7.2, containing 1% BSA as stabiliser and 0.09% Sodium Azide as preservative. Label: FITC – Fluorescein Isothiocyanate Isomer 1 |
| Applications: | Flow Cytometry: Use 10 µl of 1/25-1/100 diluted antibody to label 10e6 cells in 100 µl. Other applications not tested. Optimal dilutions are dependent on conditions and should be determined by the user. |
| Specificity: | This antibody recognises the CD54 cell surface antigen, also known as intercellular adhesion molecule-1 (ICAM-1). Recent studies suggest that cross-linking of ICAM-1 using clone 1A29 induces calcium signalling. Functionally 1A29 inhibits homotypic aggregation of PHA blasts. We recommend the use of SM286LE for use in functional studies. |
| Species Reactivity: | Tested: Rat. |
| Storage: | Store the antibody undiluted at 2-8°C for one month or (in aliquots) at -20°C for longer. Avoid repeated freezing and thawing. This product is photosensitive and should be protected from light. Shelf life: one year from despatch. |
| General References: | 1. Tamatani, T & Miyasaka, M. (1990) Identification of monoclonal antibodies reactive with the rat homolog of ICAM-1, and evidence for a differential involvement of ICAM-1 in the adherence of resting versus activated lymphocytes to high endothelial cells. <i>Int. Immunol.</i> |

For research and in vitro use only. Not for diagnostic or therapeutic work.

Material Safety Datasheets are available at www.acris-antibodies.com or on request.

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2. Tamatani, T. et al. (1991) Molecular mechanisms underlying lymphocyte recirculation. II. Differential regulation of LFA-1 in interaction between lymphocytes and high endothelial cells. *Eur. J. Immunol.* 21: 855-858.
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