

Datasheet: MCA643PE BATCH NUMBER INN1608

| Description: | otion: MOUSE ANTI RAT CD44:RPE | |
|---------------|--------------------------------|--|
| Specificity: | CD44 | |
| Other names: | H-CAM, PGP-1 | |
| Format: | RPE | |
| Product Type: | Monoclonal Antibody | |
| Clone: | OX-50 | |
| Isotype: | IgG1 | |
| Quantity: | 100 TESTS | |

Product Details

Applications

This product has been reported to work in the following applications. This information is derived from testing within our laboratories, peer-reviewed publications or personal communications from the originators. Please refer to references indicated for further information. For general protocol recommendations, please visit www.bio-rad-antibodies.com/protocols.

| | Yes | No | Not Determined | Suggested Dilution |
|----------------|-----|----|----------------|--------------------|
| Flow Cytometry | • | | | Neat |

Where this antibody has not been tested for use in a particular technique this does not necessarily exclude its use in such procedures. Suggested working dilutions are given as a guide only. It is recommended that the user titrates the antibody for use in their own system using appropriate negative/positive controls.

| Target Species | Rat | | |
|-----------------|-----------------------------------|------------------------|--------------------------------|
| Product Form | Purified IgG conjugate | ed to R. Phycoerythrin | (RPE) - lyophilized |
| Reconstitution | Reconstitute with 1 m | l distilled water | |
| Max Ex/Em | Fluorophore | Excitation Max (nm) | Emission Max (nm) |
| | RPE 488nm laser | 496 | 578 |
| Preparation | Purified IgG prepared supernatant | by affinity chromatog | raphy on Protein G from tissue |
| Buffer Solution | Phosphate buffered s | aline | |
| Preservative | 0.09% Sodium Azide | | |
| Stabilisers | 1% Bovine Serum | Albumin | |

| 5% | Sucrose |
|-------|---------|
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Rat T cell blasts.

External Database Links

UniProt:

P26051 Related reagents

Entrez Gene:

25406 Cd44 Related reagents

RRID

AB 321723

Fusion Partners

Spleen cells from immunised BALB/c mice were fused with cells of the mouse NS0/1 myeloma cell line.

Specificity

Mouse anti Rat CD44 antibody, clone OX-50 recognizes the rat CD44 cell surface antigen, also known as Extracellular matrix receptor III, P90 lymphocyte homing/adhesion receptor, HUTCH-I, Hermes antigen, Hyaluronate receptor, Phagocytic glycoprotein 1, PGP-1 or Phagocytic glycoprotein I.

CD44 is a 482 amino acid ~85 kDa single pass type I transmembrane glycoprotein, expressed by T cells, B cells, macrophages and thymocytes, with expression being increased following activation.

Flow Cytometry

Use 10ul of the suggested working dilution to label 10⁶ cells in 100ul.

References

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- 4. Li, S. *et al.* (2010) Upregulation of CXCR4 favoring neural-like cells migration via AKT activation. Neurosci Res. 67: 293-9.
- 5. Stephens, L.A. *et al.* (2004) Phenotypic characterization of regulatory CD4+CD25+ T cells in rats. Int Immunol. 16: 365-75.
- 6. Rice, C.M. *et al.* (2010) Multipotent adult progenitor cell isolation and proliferation in cytokine and serum-free medium conditioned by rat B104 cells. <u>Br J Haematol. 148:</u> 441-4.
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- 8. Galtrey, C.M. *et al.* (2008) Distribution and synthesis of extracellular matrix proteoglycans, hyaluronan, link proteins and tenascin-R in the rat spinal cord. <u>Eur J Neurosci.</u> 27: 1373-90.
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- 13. Campbell, N.G. *et al.* (2016) Cell Size Critically Determines Initial Retention of Bone Marrow Mononuclear Cells in the Heart after Intracoronary Injection: Evidence from a Rat Model. PLoS One. 11 (7): e0158232.
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- 15. Rochefort, G.Y. *et al.* (2006) Multipotential mesenchymal stem cells are mobilized into peripheral blood by hypoxia. Stem Cells. 24 (10): 2202-8.
- 16. Redondo, J. *et al.* (2015) Reductions in kinesin expression are associated with nitric oxide-induced axonal damage. <u>J Neurosci Res. 93 (6): 882-92.</u>
- 17. Huang, X. *et al.* (2019) MRI Tracking of SPIO- and *Fth1*-Labeled Bone Marrow Mesenchymal Stromal Cell Transplantation for Treatment of Stroke. <u>Contrast Media Mol Imaging</u>. 2019: 5184105.
- 18. Aminzadeh, A. *et al.* (2020) Investigating The Alterations of Oxidative Stress Status, Antioxidant Defense Mechanisms, MAP Kinase and Mitochondrial Apoptotic Pathway in Adipose-Derived Mesenchymal Stem Cells from STZ Diabetic Rats. <u>Cell J. 22 (Suppl 1):</u> 38-48.

Storage

Prior to reconstitution store at +4°C. Following reconstitution store at +4°C.

DO NOT FREEZE.

This product should be stored undiluted. This product is photosensitive and should be protected from light. Should this product contain a precipitate we recommend microcentrifugation before use.

| Guarantee | 12 months from date of despatch |
|----------------------------------|--|
| Health And Safety Information | Material Safety Datasheet documentation #20487 available at: https://www.bio-rad-antibodies.com/SDS/MCA643PE 20487 |
| Regulatory | For research purposes only |

Related Products

Recommended Negative Controls

MOUSE IgG1 NEGATIVE CONTROL:RPE (MCA1209PE)

North & South Tel: +1 800 265 7376 Worldwide Tel: +44 (0)1865 852 700 Tel: +49 (0) 89 8090 95 21 То Europe America Fax: +1 919 878 3751 Fax: +44 (0)1865 852 739 Fax: +49 (0) 89 8090 95 50 find a Email: antibody_sales_us@bio-rad.com Email: antibody_sales_uk@bio-rad.com Email: antibody_sales_de@bio-rad.com

batch/lot specific datasheet for this product, please use our online search tool at: bio-rad-antibodies.com/datasheets 'M375642:210104'

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