

Monoclonal Antibody to CD21 - PE

- Alternate names:** C3DR, C3d receptor, CR2, Complement C3d receptor, Complement receptor type 2, Dendritic Cell Marker, EBV Receptor, Epstein-Barr virus receptor
- Catalog No.:** AM05516RP-N
- Quantity:** 100 Tests
- Background:** CD21 also known as complement receptor 2 (CR2), C3d receptor or EBV receptor is a 140 kDa protein. CD21 is a glycosylated type I transmembrane protein consisting of an extracellular face of a series of 15 or 16 CCP domains. CD21 is the receptor for complement components C3d and iC3b as well as the Epstein-Barr virus (EBV) glycoprotein gp350/220. The soluble CD21 (sCD21) was shown to efficiently trigger CD23 signalling pathways in human monocytes. By inducing release of proinflammatory cytokines and upregulating expression of molecules involved in antigen presentation, sCD21 modulates critical monocyte functions that may be relevant to allergic and inflammatory disorders.
- Uniprot ID:** [Q8HY44](#)
- NCBI:** [9913](#)
- Host / Isotype:** Mouse / IgG1
- Clone:** CC21
- Format:** **State:** Lyophilized purified IgG fraction
Purification: Affinity Chromatography on Protein G
Buffer System: PBS
Preservatives: 0.09% Sodium Azide
Stabilizers: 1% BSA, 5% Sucrose
Label: PE – R. Phycoerythrin (RPE)
Reconstitution: Restore with 1ml distilled water.
- Applications:** **Flow Cytometry:** Use 10 µl of 1/10 diluted antibody to label 10⁶ 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 CD21 cell surface antigen.
Species: Bovine, Goat, Sheep.
Other species not tested.
- Storage:** Prior to and following reconstitution store the antibody at 2-8°C.
DO NOT FREEZE!
This product is photosensitive and should be protected from light.
Shelf life: one year from despatch.
- General Readings:** 1. Howard CJ, Morrison WI, Bensaid A, Davis W, Eskra L, Gerdes J, et al. Summary of workshop findings for leukocyte antigens of cattle. Vet Immunol Immunopathol. 1991 Jan;27(1-3):21-7. PubMed PMID: 1902342.

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3. Sopp, P. & Howard, C.J. (2001) IFN gamma and IL-4 production by CD4, CD8, and WC1 gamma-delta TCR+ cells from cattle lymph nodes and blood. *Vet. Immunol. Immunopathol.* 81: 85-96.
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9. Richt JA, Kasinathan P, Hamir AN, Castilla J, Sathiyaseelan T, Vargas F, et al. Production of cattle lacking prion protein. *Nat Biotechnol*. 2007 Jan;25(1):132-8. Epub 2006 Dec 31. PubMed PMID: 17195841.
10. Brujeni GN, Poorbazargani TT, Nadin-Davis S, Toloos M, Barjesteh N. Bovine immunodeficiency virus and bovine leukemia virus and their mixed infection in Iranian Holstein cattle. *J Infect Dev Ctries*. 2010 Oct 4;4(9):576-9. PubMed PMID: 21045371.
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12. Pilla, R. et al. (2012) Long-term study of MRSA ST1, t127 mastitis in a dairy cow. *Vet Rec*. Mar 1. [Epub ahead of print]
13. Chattha KS, Hodgins DC, DeLay J, Antoine N, Shewen PE. Immunohistochemical investigation of cells expressing CD21, membrane IgM, CD32 and a follicular dendritic cell marker in the lymphoid tissues of neonatal calves. *Vet Immunol Immunopathol*. 2010 Oct 15;137(3-4):284-90. doi: 10.1016/j.vetimm.2010.05.004. Epub 2010 Jun 16. PubMed PMID: 20557949.
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