

## Anti-F4/80 [Cl:A3-1 (recombinant version)] Bulk size L bAb0184-BB

This antibody is a knob-into-hole bispecific based on murine IgG2a with an Fc Silent™ mutation, featuring one arm with an anti-mouse CD3e scFv based on the clone 145-2C11.

This is a bispecific, knob-into-hole heterodimerized antibody, with one arm directed against mouse F4/80 (Fab) and one arm directed against mouse CD3e (scFv).

**Isotype and Format:** Mouse IgG2a mCD3e KIH bispecific, Fc Silent™, Kappa

Clone Number: Cl:A3-1 (recombinant version)

**Alternative Name(s) of Target:** mouse macrophage marker; EMR1 receptor; EGF-like module; Cell surface glycoprotein F4/80; EGF-like module receptor 1; Em Gpf4; TM7; Ly-71; f480; f-480; f4 80; f 480; f-

4/80; f4-80

**UniProt Accession Number of Target Protein: Q61549** 

Published Application(s): FC, IHC
Published Species Reactivity: Mouse

**Immunogen:** Thioglycollate stimulated peritoneal macrophages of mouse origin.

**Specificity:** This antibody recognises the mouse F4/80 antigen, a 160kD glycoprotein, expressed by murine macrophages.

Application Notes: The anti-F4/80 antibody, clone Cl:A3-1, has been very widely used in flow cytometry, microscopy and Western blotting since its generation by Austyn and Gordon in 1980. We are the only supplier of recombinant versions of Cl:A3-1 which, whilst having the same variable domains as the original, has been shown to block hybridoma derived anti-F4/80:APC binding to *in vitro* generated bone marrow-derived (BMDMs) and *ex vivo* splenic murine macrophages. This was tested using both the recombinant version of the original isotype (rat IgG2b) as well as a murinised version (IgG2a, Ab00106-2.0). Further testing on BMDMs shows that our Fc Silent™ rat IgG2b is a valuable new reagent which shows distinct labelling of F4/80-positive cell populations, whilst the isotype control shows no binding, suggesting that only the antigen binding domains are involved in binding, promoting precision of labelling. The murinised versions will be valuable tools in the study of the role of the murine macrophage *in vivo* without the artefacts rat-derived antigen being co-administered may harbour. Particularly the murine IgG2a (Ab00106-2.0) should be an excellent candidate for macrophage depletion studies, with the Fc Silent™ (Ab00106-2.3) version being the ideal negative control. Using our recombinant production platform, any species and

isotype are possible and our Support Team (support@absoluteantibody.com) will be glad to help you with finding the right variant to match your experimental needs.

**Antibody First Published in:** Austyn JM, Gordon S. F4/80, a monoclonal antibody directed specifically against the mouse macrophage. Eur J Immunol. 1981 Oct;11(10):805-15. PMID:7308288

**Note on publication:** Describes the making of the antibody and its specificity for macrophages (Flow Cytometry) and proposes its potential use as a marker.

## **Product Form**

**Size:** 5 mg Purified antibody in bulk size. **Purification:** Protein A affinity purified

Supplied In: PBS only.

**Storage Recommendation:** Store at 4°C for up to 3 months. Note, this antibody is provided without added preservatives, it is therefore recommed this antibody be handled under sterile conditions. For longer storage, aliquot and store at -20°C.

Concentration: See vial label

Important note – This product is for research use only. It is not intended for use in therapeutic or diagnostic procedures for humans or animals.