

ARG22577 anti-CD8 antibody [OX-8] (low endotoxin)

Package: 100 μg Store at: -20°C

| Summary | |
|---------------------|---|
| Product Description | Azide free and low endotoxin Mouse Monoclonal antibody [OX-8] recognizes CD8 This antibody recognizes the rat CD8 alpha cell surface antigen, expressed by a subset of T lymphocytes, most thymocytes and the majority of NK cells. Clone MRC OX-8 is suitable for use in in vitro blocking studies (Popov et al.2001).Mouse anti Rat CD8 α , clone MRC OX-8 has been described reacting with paraffin-embedded material following PLP Fixation (periodate-lysine paraformaldehyde) (Whiteland et al. 1995).Mouse anti Rat CD8 α , clone MRC OX-8 is routinely tested in flow cytometry on rat splenocytes. |
| Tested Reactivity | Rat |
| Tested Application | FACS, FuncSt, IHC-Fr, IHC-P, IP, WB |
| Host | Mouse |
| Clonality | Monoclonal |
| Clone | OX-8 |
| lsotype | lgG1 |
| Target Name | CD8 |
| Species | Rat |
| Immunogen | Rat thymocyte membrane glycoproteins. |
| Conjugation | Un-conjugated |
| Alternate Names | T-cell surface glycoprotein CD8 alpha chain; Leu2; p32; T-lymphocyte differentiation antigen T8/Leu-2; CD8; MAL; CD antigen CD8a |

Application Instructions

| Application table | Application | Dilution |
|-------------------|---|--|
| | FACS | Neat |
| | FuncSt | Assay-dependent |
| | IHC-Fr | Assay-dependent |
| | IHC-P | Assay-dependent |
| | IP | Assay-dependent |
| | WB | Assay-dependent |
| Application Note | sections. This product does not r paraffin embedded sections. FACS: Use 10ul of the suggested | uire protein digestion pre-treatment of paraffin embedded equire antigen retrieval using heat treatment prior to staining of working dilution to label 10^6 cells in 100ul. ended starting dilutions and the optimal dilutions or concentrations entist. |

Properties

| Form | Liquid |
|---------------------|---|
| Purification | Purification with Protein A. |
| Purification Note | Low endotoxin |
| Buffer | PBS |
| Concentration | 1 mg/ml |
| Storage instruction | For continuous use, store undiluted antibody at 2-8°C for up to a week. For long-term storage, aliquot and store at -20°C or below. Storage in frost free freezers is not recommended. Avoid repeated freeze/thaw cycles. Suggest spin the vial prior to opening. The antibody solution should be gently mixed before use. |
| Note | For laboratory research only, not for drug, diagnostic or other use. |

Bioinformation

| Gene Symbol | Cd8a |
|----------------|---|
| Gene Full Name | CD8a molecule |
| Background | CD8 antigen is a cell surface glycoprotein found on most cytotoxic T lymphocytes that mediates efficient cell-cell interactions within the immune system. The CD8 antigen acts as a coreceptor with the T-cell receptor on the T lymphocyte to recognize antigens displayed by an antigen presenting cell in the context of class I MHC molecules. The coreceptor functions as either a homodimer composed of two alpha chains or as a heterodimer composed of one alpha and one beta chain. Both alpha and beta chains share significant homology to immunoglobulin variable light chains. This gene encodes the CD8 alpha chain. Multiple transcript variants encoding different isoforms have been found for this gene. [provided by RefSeq, Nov 2011] |
| Function | CD8 is an integral membrane glycoprotein that plays an essential role in the immune response and serves multiple functions in responses against both external and internal offenses. In T-cells, functions primarily as a coreceptor for MHC class I molecule:peptide complex. The antigens presented by class I peptides are derived from cytosolic proteins while class II derived from extracellular proteins. Interacts simultaneously with the T-cell receptor (TCR) and the MHC class I proteins presented by antigen presenting cells (APCs). In turn, recruits the Src kinase LCK to the vicinity of the TCR-CD3 complex. LCK then initiates different intracellular signaling pathways by phosphorylating various substrates ultimately leading to lymphokine production, motility, adhesion and activation of cytotoxic T-lymphocytes (CTLs). This mechanism enables CTLs to recognize and eliminate infected cells and tumor cells. In NK-cells, the presence of CD8A homodimers at the cell surface provides a survival mechanism allowing conjugation and lysis of multiple target cells. CD8A homodimer molecules also promote the survival and differentiation of activated lymphocytes into memory CD8 T-cells. [UniProt] |
| Highlight | Related products: <u>CD8 antibodies;</u> <u>CD8 ELISA Kits;</u> <u>CD8 Duos / Panels;</u> <u>Anti-Mouse IgG secondary antibodies;</u> Related news: <u>New antibody panels and duos for Tumor immune microenvironment</u> <u>Tumor-Infiltrating Lymphocytes (TILs)</u> <u>Detecting exosomal HMGB1 for ICD research</u> |
| Research Area | Developmental Biology antibody; Immune System antibody; Cytotoxic T antibody; Cytotoxic T Cell Surface Study antibody; Tumor-infiltrating Lymphocyte Study antibody |
| Calculated Mw | 26 kDa |
| РТМ | All of the five most C-terminal cysteines form inter-chain disulfide bonds in dimers and higher multimers, while the four N-terminal cysteines do not. |