

**Anti-CD8A Antibody**  
**Recombinant Rabbit Monoclonal Antibody**  
**Catalog # AH13606**

### Specification

#### Anti-CD8A Antibody - Product Information

Application	IHC-P, IF, FC
Primary Accession	<a href="#">P01732</a>
Other Accession	<a href="#">85258</a>
Reactivity	Human
Host	Rabbit
Clonality	Monoclonal
Isotype	Rabbit / IgG, kappa
Calculated MW	25729

#### Anti-CD8A Antibody - Additional Information

##### Gene ID 925

##### Other Names

CD8 antigen, alpha polypeptide (p32), T8/Leu-2 T-lymphocyte differentiation antigen, Ly3, LYT3, MAL, T-cell surface glycoprotein CD8 alpha chain

##### Application Note

<span class ="dilution\_IHC-P">IHC-P~~N/A</span><br /><span class ="dilution\_IF">IF~~1:50~200</span><br /><span class ="dilution\_FC">FC~~1:10~50</span>

##### Format

200ug/ml of recombinant MAb purified by Protein A. Prepared in 10mM PBS with 0.05% BSA & 0.05% azide. Also available WITHOUT BSA & azide at 1.0mg/ml.

##### Storage

Store at 2 to 8°C. Antibody is stable for 24 months.

##### Precautions

Anti-CD8A Antibody is for research use only and not for use in diagnostic or therapeutic procedures.

#### Anti-CD8A Antibody - Protein Information

##### Name CD8A

##### Synonyms MAL

##### Function

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.

#### **Cellular Location**

[Isoform 1]: Cell membrane; Single-pass type I membrane protein Note=CD8A localizes to lipid rafts only when associated with its partner CD8B.

#### **Tissue Location**

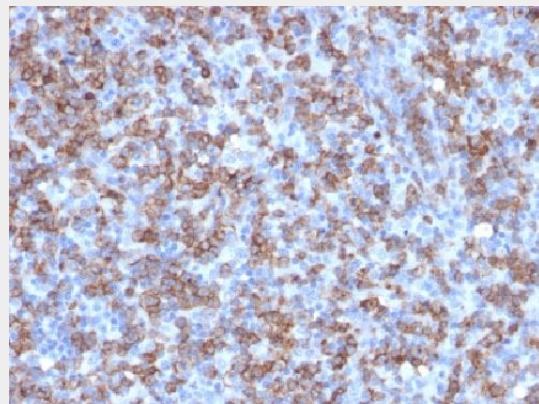
CD8 on thymus-derived T-cells usually consists of a disulfide-linked alpha/CD8A and a beta/CD8B chain. Less frequently, CD8 can be expressed as a CD8A homodimer. A subset of natural killer cells, memory T-cells, intraepithelial lymphocytes, monocytes and dendritic cells expresses CD8A homodimers. Expressed at the cell surface of plasmacytoid dendritic cells upon herpes simplex virus-1 stimulation

#### **Anti-CD8A Antibody - Protocols**

Provided below are standard protocols that you may find useful for product applications.

- [Western Blot](#)
- [Blocking Peptides](#)
- [Dot Blot](#)
- [Immunohistochemistry](#)
- [Immunofluorescence](#)
- [Immunoprecipitation](#)
- [Flow Cytometry](#)
- [Cell Culture](#)

#### **Anti-CD8A Antibody - Images**



#### **Anti-CD8A Antibody - Background**

CD8 is a cell surface receptor expressed either as a heterodimer with the CD8 beta chain (CD8

alpha/beta) or as a homodimer (CD8 alpha/alpha). A majority of thymocytes and a subpopulation of mature T cells and NK cells express CD8a. CD8 binds to MHC class 1 and through its association with protein tyrosine kinase p56lck plays a role in T cell development and activation of mature T cells. For mature T-cells, CD4 and CD8 are mutually exclusive, so anti-CD8, generally used in conjunction with anti-CD4. It is a useful marker for distinguishing helper/inducer T-lymphocytes, and most peripheral T-cell lymphomas are CD4+/CD8-. Anaplastic large cell lymphoma is usually CD4+ and CD8-, and in T-lymphoblastic lymphoma/leukemia, CD4 and CD8 are often co-expressed. CD8 is also found in littoral cell angioma of the spleen.