

HLA-E monoclonal antibody, clone MEM-E/07

Catalog # MAB3631

Size 100 ug

Specification

Product Description	Mouse monoclonal antibody raised against recombinant HLA-E.
Immunogen	Recombinant protein corresponding to human HLA-E.
Host	Mouse
Reactivity	Human
Specificity	This antibody recognized native surface-expressed HLA-E, but not denaturated heavy chain of HLA-E. HLA-E belongs to the MHC Class I molecules (MHC Class Ib; nonclassical) and it is expressed on many types of the human cells. The published results revealed that This antibody cross-reacts with some classical MHC Class I molecules (MHC Class Ia) : HLA-B7 (strongly), HLA-B8 (moderately), HLA-B27, -B44 (weakly).
Form	Liquid
Purification	Protein A affinity chromatography
Purity	>95% (by SDS-PAGE)
Isotype	IgG1
Recommend Usage	Flow Cytometry (10 ug/mL) Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections) (10 ug/mL) Immunoprecipitation (10 ug/mL) The optimal working dilution should be determined by the end user.
Storage Buffer	In PBS, pH 7.4 (0.09% sodium azide)
Storage Instruction	Store at 4°C. Do not freeze.
Note	This product contains sodium azide: a POISONOUS AND HAZARDOUS SUBSTANCE which should be handled by trained staff only.

Applications

- Immunohistochemistry (Formalin/PFA-fixed paraffin-embedded sections)
- Immunoprecipitation
- Flow Cytometry

Gene Info — HLA-E

Entrez GeneID [3133](#)

Gene Name HLA-E

Gene Alias DKFZp686P19218, EA1.2, EA2.1, HLA-6.2, MHC, QA1

Gene Description major histocompatibility complex, class I, E

Omim ID [143010](#)

Gene Ontology [Hyperlink](#)

Gene Summary HLA-E belongs to the HLA class I heavy chain paralogues. This class I molecule is a heterodimer consisting of a heavy chain and a light chain (beta-2 microglobulin). The heavy chain is anchored in the membrane. HLA-E binds a restricted subset of peptides derived from the leader peptides of other class I molecules. The heavy chain is approximately 45 kDa and its gene contains 8 exons. Exon one encodes the leader peptide, exons 2 and 3 encode the alpha1 and alpha2 domains, which both bind the peptide, exon 4 encodes the alpha3 domain, exon 5 encodes the transmembrane region, and exons 6 and 7 encode the cytoplasmic tail. [provided by RefSeq]

Other Designations HLA class I histocompatibility antigen, E alpha chain|MHC HLA-E alpha-1|MHC HLA-E alpha-2.1|MHC class I antigen|OTTHUMP00000029214|lymphocyte antigen

Publication Reference

- [HLA-E surface expression is independent of the availability of HLA class I signal sequence-derived peptides in human tumor cell lines.](#)

Palmisano GL, Contardi E, Morabito A, Gargaglione V, Ferrara GB, Pistillo MP.

Human Immunology 2005 Jan; 66(1):1.

Application: Flow Cyt, Human, MG63, CACO2, MCF-7, CHP212, U2OS, HELA, AEH, 221-A3, 221-Cw1, 221-G, 220-TPN, 221-WT cells

Pathway

- [Allograft rejection](#)
- [Antigen processing and presentation](#)
- [Autoimmune thyroid disease](#)
- [Cell adhesion molecules \(CAMs\)](#)
- [Endocytosis](#)
- [Graft-versus-host disease](#)
- [Natural killer cell mediated cytotoxicity](#)
- [Type I diabetes mellitus](#)

Disease

- [Abortion](#)
- [Acute Disease](#)
- [Anemia](#)
- [Bacterial Infections](#)
- [Behcet Syndrome](#)
- [Bone Marrow Diseases](#)
- [Carcinoma](#)
- [Chorioamnionitis](#)
- [Coronary Aneurysm](#)
- [Cytomegalovirus Infections](#)
- [Fetal Membranes](#)
- [Genetic Predisposition to Disease](#)
- [Graft vs Host Disease](#)
- [HIV Infections](#)

- [Lupus Erythematosus](#)
- [Mucocutaneous Lymph Node Syndrome](#)
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