

Product datasheet for RC205939L2

OriGene Technologies, Inc.

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HLAE (HLA-E) (NM_005516) Human Tagged Lenti ORF Clone

Product data:

Product Type: Expression Plasmids

Product Name: HLAE (HLA-E) (NM 005516) Human Tagged Lenti ORF Clone

Tag: mGFP Symbol: HLAE

Synonyms: HLA-6.2; QA1

Mammalian Cell None

Selection:

Vector:pLenti-C-mGFP (PS100071)E. coli Selection:Chloramphenicol (34 ug/mL)

ORF Nucleotide The ORF insert of this clone is exactly the same as(RC205939).

Sequence:

Restriction Sites: Sgfl-Mlul

Cloning Scheme:





^{*} The last codon before the Stop codon of the ORF.

ACCN: NM_005516

ORF Size: 1074 bp



OTI Disclaimer:

Due to the inherent nature of this plasmid, standard methods to replicate additional amounts of DNA in E. coli are highly likely to result in mutations and/or rearrangements. Therefore, OriGene does not guarantee the capability to replicate this plasmid DNA. Additional amounts of DNA can be purchased from OriGene with batch-specific, full-sequence verification at a reduced cost. Please contact our customer care team at customercom or by calling 301.340.3188 option 3 for pricing and delivery.

The molecular sequence of this clone aligns with the gene accession number as a point of reference only. However, individual transcript sequences of the same gene can differ through naturally occurring variations (e.g. polymorphisms), each with its own valid existence. This clone is substantially in agreement with the reference, but a complete review of all prevailing variants is recommended prior to use. More info

OTI Annotation:

This clone was engineered to express the complete ORF with an expression tag. Expression varies depending on the nature of the gene.

Components:

Cytogenetics:

The ORF clone is ion-exchange column purified and shipped in a 2D barcoded Matrix tube containing 10ug of transfection-ready, dried plasmid DNA (reconstitute with 100 ul of water).

Reconstitution Method:

- 1. Centrifuge at 5,000xg for 5min.
- 2. Carefully open the tube and add 100ul of sterile water to dissolve the DNA.
- 3. Close the tube and incubate for 10 minutes at room temperature.
- 4. Briefly vortex the tube and then do a quick spin (less than 5000xg) to concentrate the liquid at the bottom.
- 5. Store the suspended plasmid at -20°C. The DNA is stable for at least one year from date of shipping when stored at -20°C.

RefSeq: <u>NM 005516.4, NP 005507.3</u>

6p22.1

 RefSeq Size:
 2679 bp

 RefSeq ORF:
 1077 bp

 Locus ID:
 3133

 UniProt ID:
 P13747

Domains: MHC_I, ig, IGc1
Protein Families: Transmembrane

Protein Pathways: 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, Viral myocarditis

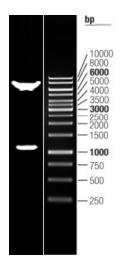
MW: 40.1 kDa



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, Jul 2008]

Product images:



Double digestion of RC205939L2 using Sgfl and Mlul $\,$