

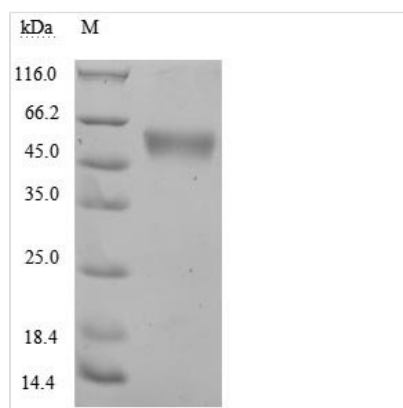


# Recombinant Human NKG2-D type II integral membrane protein (KLRK1), partial (Active)

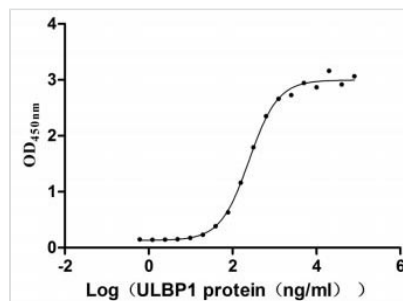
<b>Product Code</b>	CSB-MP012474HU1
<b>Relevance</b>	Function as an activating and costimulatory receptor involved in immunosurveillance upon binding to various cellular stress-inducible ligands displayed at the surface of autologous tumor cells and virus-infected cells. Provides both stimulatory and costimulatory innate immune responses on activated killer (NK) cells, leading to cytotoxic activity. Acts as a costimulatory receptor for T-cell receptor (TCR) in CD8+ T-cell-mediated adaptive immune responses by amplifying T-cell activation. Stimulates perforin-mediated elimination of ligand-expressing tumor cells. Signaling involves calcium influx, culminating in the expression of TNF-alpha. Participates in NK cell-mediated bone marrow graft rejection. May play a regulatory role in differentiation and survival of NK cells. Binds to ligands belonging to various subfamilies of MHC class I-related glycoproteins including MICA, MICB, RAET1E, RAET1G, RAET1L/ULBP6, ULBP1, ULBP2, ULBP3 (ULBP2>ULBP1>ULBP3) and ULBP4.
<b>Abbreviation</b>	Recombinant Human KLRK1 protein, partial (Active)
<b>Storage</b>	The shelf life is related to many factors, storage state, buffer ingredients, storage temperature and the stability of the protein itself. Generally, the shelf life of liquid form is 6 months at -20°C/-80°C. The shelf life of lyophilized form is 12 months at -20°C/-80°C.
<b>Uniprot No.</b>	P26718
<b>Storage Buffer</b>	Lyophilized from a 0.2 µm filtered PBS, 6% Trehalose, pH 7.4
<b>Product Type</b>	Others
<b>Immunogen Species</b>	Homo sapiens (Human)
<b>Biological Activity</b>	①Measured by its binding ability in a functional ELISA. Immobilized KLRK1 at 10 µg/ml can bind human ULBP1 (CSB-MP887177HU), the EC <sub>50</sub> of human KLRK1 protein is 222.4-276.0 ng/ml.②Human KLRK1 protein Fc tag (CSB-MP012474HU1) captured on COOH chip can bind Human ULBP1 protein Fc/myc tag (CSB-MP887177HU) with an affinity constant of 2.27 nM as detected by LSPR Assay.③Measured by its binding ability in a functional ELISA. Immobilized KLRK1 at 10 µg/ml can bind human Biotinylated ULBP1(CSB-MP887177HUj1-B), the EC <sub>50</sub> is 4.254-7.295 ng/ml.
<b>Purity</b>	≥ 90% as determined by SDS-PAGE. ≥ 90% as determined by SEC-HPLC.
<b>Sequence</b>	FLNSLFNQEVQIPLTESYCGPCPKNWICYKNNCYQFFDESKNWWYESQASCMS QNASLLKVYSKEDQDLLKLVKSYHWMGLVHIPTNGSWQWEDGSILSPNLLTIIIE MQKGDICALYASSFKGYIENCSTPNTYICMQRTV
<b>Research Area</b>	Cancer



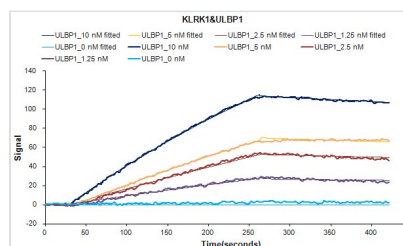
<b>Source</b>	Mammalian cell
<b>Target Names</b>	KLRK1
<b>Expression Region</b>	78-216aa
<b>Notes</b>	Repeated freezing and thawing is not recommended. Store working aliquots at 4°C for up to one week.
<b>Tag Info</b>	C-terminal hFc1-tagged
<b>Mol. Weight</b>	43.6 kDa
<b>Protein Length</b>	Partial

**Image**


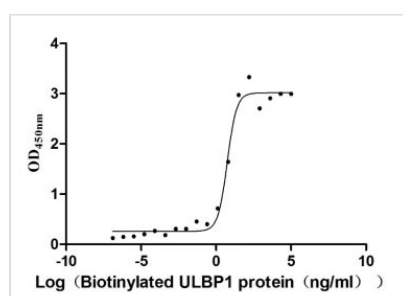
(Tris-Glycine gel) Discontinuous SDS-PAGE (reduced) with 5% enrichment gel and 15% separation gel.



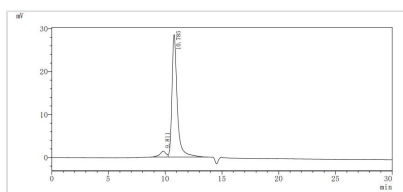
**Activity**  
Measured by its binding ability in a functional ELISA. Immobilized KLRK1 at 10 µg/ml can bind human ULBP1 (CSB-MP887177HU), the EC<sub>50</sub> of human KLRK1 protein is 222.4-276.0 ng/ml.



Human KLRK1 protein Fc tag (CSB-MP012474HU1) captured on COOH chip can bind Human ULBP1 protein Fc/myc tag (CSB-MP887177HU) with an affinity constant of 2.27 nM as detected by LSPR Assay.



**Activity**  
Measured by its binding ability in a functional ELISA. Immobilized KLRK1 at 10 µg/ml can bind human Biotinylated ULBP1(CSB-MP887177HUj1-B), the EC<sub>50</sub> is 4.254-7.295 ng/ml.



The purity of KLRK1 was greater than 90% as determined by SEC-HPLC.

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**Endotoxin**

Less than 1.0 EU/ug as determined by LAL method.

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**Shelf Life**

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