Recombinant CLC2D protein (His tag)

Catalog Number	548473
Synonyms	Lectin-like NK cell receptor; Lectin-like transcript 1; LLT-1; Osteoclast inhibitory lectin
Species	Human
Expression System	E. coli
Accession	Q9UHP7
Molecular Weight	Predictes a molecular mass of 16.98 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 17 kDa band.

Product Information

Sequence Region	60-191
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>85%, by SDS-PAGE with Coomassie Brilliant Blue staining.
Endotoxin	Not tested.
Activity	Not tested.
Stability	Samples are stable for up to twelve months from date of receipt at -70℃
Protein Construction	DNA encoding 60-191 aa (Q9UHP7) were fused with 6His tag.

Storage & Handling

Reconstitution	Reconstitute at 0.25 μg/μl in sterile water for short-term storage. Reconstitution with 50% glycerol solution is recommended for longer term storage (see Stability and Storage for more details). If a different concentration is needed for your purposes please adjust the reconstitution volume as required (please note: the ion concentration of the final solution will vary according to the volume used). Note: Centrifuge vial before opening. When reconstituting, gently pipet and wash down the sides of the vial to ensure full recovery of the protein into solution.
Storage	Store it under sterile conditions at -20℃ to -80℃. It is recommended that the protein be aliquoted for optimal storage. Avoid repeated freeze-thaw cycles.
Shipping	In general, recombinant proteins are provided as lyophilized powder which are shipped at ambient temperature. Bulk packages of recombinant proteins are provided as frozen liquid. They are shipped out with blue ice unless customers require otherwise.

Description

Description	Recombinant Human C-type Lectin Domain Family 2 Member D (CLEC2D) Fragment (aa 60-191) is a high-purity protein encompassing the complete C-type lectin functional domain. This fragment serves as an essential tool for investigating immune regulation, including NK cell-mediated cytotoxicity and osteoclast inhibition, providing researchers with a targeted reagent for domain-specific functional studies. C-type lectin domain family 2 member D (CLEC2D), also known as LLT-1 or Osteoclast Inhibitory Lectin, is a single-pass type II membrane protein expressed on the cell surface in humans. It functions as a receptor for KLRB1, protecting target cells against natural killer cell-mediated lysis and modulating interferon-gamma release. Additionally, CLEC2D inhibits osteoclast formation and bone resorption, playing crucial roles in immune regulation and bone homeostasis. The protein also binds high molecular weight sulfated glycosaminoglycans, further highlighting its multifunctional nature in cellular interactions. Alternative isoforms localize to the endoplasmic reticulum, suggesting additional regulatory mechanisms.