Human Kallikrein 5/KLK5 Protein (active form)





Description	
Source	Recombinant Human Kallikrein 5/KLK5 Protein is expressed from HEK293 with His tag and Flag tag at the C-terminus.
	It contains Ile67-Ser293.
Accession	Q9Y337
Molecular Weight	The protein has a predicted MW of 31.7 kDa. Due to glycosylation, the protein migrates to 40-50 kDa based on Tris-Bis PAGE result.
Endotoxin	Less than 1 EU per μg by the LAL method.
Purity	> 95% as determined by Bis-Tris PAGE
	> 95% as determined by HPLC

Formulation and Storage

Formulation Supplied as 0.22 µm filtered solution in 50mM MES, 150mM NaCl (pH 5.5).

Storage Valid for 12 months from date of receipt when stored at -80°C. Recommend to aliquot the protein into smaller

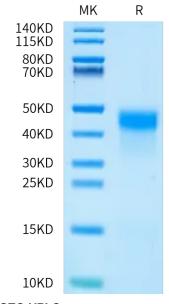
quantities for optimal storage. Please minimize freeze-thaw cycles.

Background

The inhibition of kallikrein 5 (KLK5) has been identified as a potential strategy for treatment of the genetic skin disorder Netherton syndrome, in which loss-of-function mutations in the SPINK5 gene lead to down-regulation of the endogenous inhibitor LEKTI-1 and profound skin-barrier defects with severe allergic manifestations. To aid in the development of a medicine for this target, an X-ray crystallographic system was developed to facilitate fragment-guided chemistry and knowledge-based drug-discovery approaches.

Assay Data

Bis-Tris PAGE



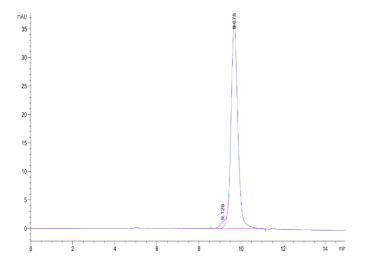
SEC-HPLC

Human Kallikrein 5 on Bis-Tris PAGE under reduced condition. The purity is greater than 95%.

Cat. No. KLK-HM605



Assay Data



The purity of Human Kallikrein 5 is greater than 95% as determined by SEC-HPLC.

Bioactivity Data

Measured by its ability to cleave the fluorogenic peptide substrate Boc-VPR-AMC. The specific activity is >200 pmol/min/µg (QC Test).