Recombinant KLK8 protein (His tag)

Catalog Number	544128
Synonyms	hK8; Neuropsin; NP; Ovasin; Serine protease 19; Serine protease TADG-14; Tumor-associated differentially expressed gene 14 protein
Species	Human
Expression System	E. coli
Accession	O60259
Molecular Weight	Predictes a molecular mass of 26.11 kDa. In SDS-PAGE under reducing conditions, it migrates as an approximately 26 kDa band.

Product Information

Sequence Region	33-260
Form	Lyophilized powder
Formulation	Lyophilized from sterile PBS, pH 7.4
Purity	>86%, 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 33-260 aa (O60259) 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	Introducing the recombinant human Kallikrein-8 (hK8) fragment (residues 33-260), a highly purified protein encompassing the complete Peptidase S1 domain. This product is an essential tool for researchers studying serine protease activity, neural development, synaptic plasticity, and skin biology, offering a focused approach to investigate domain-specific functions in vitro. Kallikrein-8 (hK8), also known as Neuropsin, is a serine protease (EC 3.4.21.118) involved in diverse physiological processes. It degrades extracellular matrix components including fibronectin, collagen IV, and fibrinogen, and cleaves L1CAM during neural activity. hK8 promotes neurite outgrowth, regulates hippocampal synaptic plasticity and long-term potentiation, and is critical for memory acquisition. Additionally, it contributes to skin desquamation and keratinocyte proliferation, and plays a role in secondary pathogenesis following spinal cord injury. The protein is primarily secreted but also localizes to the cytoplasm in keratinocytes, reflecting its multifunctional roles in both extracellular and intracellular contexts.