

Product Data:

Product SKU: RPES0275

Size: 10µg

Species: Human

Expression host: HEK293 Cells

Uniprot: Q92876

Protein Information:

Molecular Mass: 26.6 kDa

AP Molecular Mass:

Tag: C-His

Bio-activity: Measured by its ability to cleave the fluorogenic peptide substrate Boc-QARAMC, R&D Systems, Catalog # ES014. The specific activity is > 250 pmols/min/µg. (Activation description: The proenzyme needs to be activated by Lysyl-Endopeptidase for an activated form)

Purity: > 95 % as determined by reducing SDS-PAGE.

Endotoxin: < 1.0 EU per µg of the protein as determined by the LAL method.

Storage: Lyophilized proteins are stable for up to 12 months when stored at -20 to -80°C. Reconstituted protein solution can be stored at 4-8°C for 2-7 days. Aliquots of reconstituted samples are stable at < -20°C for 3 months.

Shipping: This product is provided as lyophilized powder which is shipped with ice packs.

Formulation: Lyophilized from sterile PBS, pH 7.4

Reconstitution: Please refer to the printed manual for detailed information.

Application:

Synonyms: Kallikrein-6; Neurosin; Protease M; SP59; Serine Protease 18; Serine Protease 9; Zyme; KLK6; PRSS18; PRSS9

Immunogen Information:

Sequence: Met 1-Lys 244

Background:

KLK6 (kallikrein-related peptidase 6), also known as Klk7, belongs to the peptidase S1 family, Kallikrein subfamily. Kallikreins are a subgroup of serine proteases having diverse physiological functions. Growing evidence suggests that many kallikreins are implicated in carcinogenesis and some have potential as novel cancer and other disease biomarkers. KLK6 is a serine protease which exhibits a preference for Arg over Lys in the substrate P1 position and for Ser or Pro in the P2 position. Klk7 shows activity against amyloid precursor protein, myelin basic protein, gelatin, casein and extracellular matrix proteins such as fibronectin, laminin, vitronectin and collagen. KLK6 degrades alpha-synuclein and prevents its polymerization, indicating that KLK6 may be involved in the pathogenesis of Parkinson disease and other synucleinopathies. Klk7 may be involved in regulation of axon outgrowth following spinal cord injury. Tumor cells treated with a neutralizing KLK6 antibody migrate less than control cells, suggesting a role in invasion and metastasis.