

Active Recombinant Human KLK5 protein, His-tagged

Cat. No. KLK5-25H Lot. No. (See product label)

SPECIFICATION

Product Overview Recombinant Human KLK5(Ile67-Ser293) fused with His tag at C-terminal was expressed in NS0.

Species Human

Source Mammalian Cells

ProteinLength 67-293 a.a.

Description Human tissue Kallikrein 5 (hK5, also known as stratum corneum tryptic enzyme) is a serine protease of the human tissue Kallikrein gene family. The deduced amino acid sequence of human KLK5 consists of a signal peptide (Met1 to Gly22), a pro region (Val23 to Arg66) and a mature/active enzyme (Ile67 to Ser293). KLK5 is expressed mainly in skin, breast, brain and testis and to a lesser extent in many other tissues. KLK5 overexpression is an indicator of poor prognosis in ovarian cancer. hK5 is a candidate physiological activator of hK7 in the stratum corneum. Indeed, rhK5 can be used to activate rhK7 by incubating rhK5 with recombinant human (rh) K7 (both at 0.1 mg/mL) in 25 mM MES, 0.15 M NaCl, pH 5.5, at 37 centigrade overnight.

Predicted N Terminal Ile67

Form Supplied as a 0.2 µm filtered solution in MES, NaCl and Glycerol.

Bio-activity Measured by its ability to cleave the fluorogenic peptide substrate Boc-VPR-AMC. The specific activity is >200 pmol/min/g.

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA

Molecular Mass	Predicted Molecular Mass: 31 kDa; SDS-PAGE: 40 kDa, reducing conditions.
Endotoxin	<1.0 EU per 1 µg of the protein by the LAL method.
Purity	>95%, by SDS-PAGE under reducing conditions and visualized by silver stain
Storage	Avoid repeated freeze-thaw cycles. 6 months from date of receipt, -20 to -70 centigrade as supplied. 3 months, -20 to -70 centigrade under sterile conditions after opening.

GENE INFORMATION

Gene Name	KLK5 kallikrein-related peptidase 5 [Homo sapiens]
Official Symbol	KLK5
Synonyms	KLK5; kallikrein-related peptidase 5; kallikrein 5; kallikrein-5; KLK L2; SCTE; kallikrein-like protein 2; stratum corneum tryptic enzyme; KLKL2; KLK-L2;
Gene ID	25818
mRNA Refseq	NM_001077491
Protein Refseq	NP_001070959
MIM	605643
UniProt ID	Q9Y337
Chromosome	19q13.33

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA



Location

Function

peptidase activity; protein binding; serine-type endopeptidase activity; serine-type endopeptidase activity; serine-type peptidase activity;

 Tel: 1-631-559-9269 1-516-512-3133

 Email: info@creative-biomart.com  Fax: 1-631-938-8127

 45-1 Ramsey Road, Shirley, NY 11967, USA