

# Recombinant Protein Technical Manual Recombinant Mouse Kallikrein 7/KLK7 Protein (His Tag) RPES4873

### **Product Data:**

**Product SKU:** RPES4873 **Size:** 10μg

Species: Mouse Expression host: Human Cells

**Uniprot:** Q91VE3

## **Protein Information:**

Molecular Mass: 26.1 kDa

AP Molecular Mass: 28-35 kDa

Tag: C-6His

**Bio-activity:** 

**Purity:** > 95 % as determined by SDS-PAGE

**Endotoxin:**  $< 1.0 \text{ EU per } \mu\text{g}$  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 a 0.2 μm filtered solution of 20mM HEPES,150mM NaCl,pH7.4.

**Reconstitution:** Please refer to it for detailed information.

Application:

**Synonyms:** Kallikrein-7; Klk7; Serine protease 6; Stratum corneum chymotryptic enzyme;

Thymopsin; kallikrein-related peptidase 7; PRSS6; SCCEkallikrein-7;SCCE

# Immunogen Information:

Sequence: Gln22-Arg249

# Background:

Kallikrein7, also named as stratum corneum chymotryptic enzyme (SCCE), is a secreted protein of the Kallikrein-related peptidase (KLK) family. This family contains fifteen homologous secreted serine endopeptidases and plays a significant role in various physiological processes, including skin desquamation, semen liquefaction, neural plasticity, and body fluid homeostasis. In skin KLK5, KLK 7 and KLK14 are able to degrade corneodesmosomes, which leads to desquamation of skin surface cells. KLK activation is believed to be mediated through highly organized proteolytic cascades, regulated through a series of feedback loops, inhibitors, auto-degradation and internal cleavages. Studies have shown that one potential physiological activator for KLK7 is KLK5. Along with KLK14, these three kallikreins form a proteolytic cascade in the stratum corneum. KLK7 is primarily expressed in the skin but is also detected at relatively high levels in esophagus, heart, liver, central nervous system, kidney, pancreas, mammary and salivary glands.