**BioVision** O7/14 For research use only

## Enterokinase, Light Chain, human recombinant

**CATALOG #:** 7529-10 10 μg 7529-50 50 μg 7529-500 500 μg

**ALTERNATE NAMES:** Enteropeptidase, Serine protease 7, Transmembrane

protease serine 15

SOURCE: E.Coli

**PURITY:** ≥90% by SDS-PAGE and SEC analyses

MOL. WEIGHT: 26.3 kDa

FORM: Liquid

FORMULATION: 0.5 mg/ml in 25 mM Tris, 50 mM NaCl (pH 8.0)

containing 50% glycerol.

**STORAGE CONDITIONS:** Stable for 1 year when stored at -80°C. Use as provided, or dilute to 0.1-0.2 mg/ml with 25 mM Tris, 50 mM NaCl (pH 8.0) containing 50% glycerol. Aliquot and store at -80°C. Avoid repeated freeze and thaw cycles as this may reduce its overall activity over time.

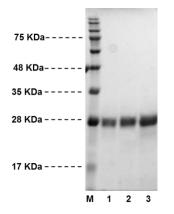
**ACTIVITY ASSAY**: BioVision's Enterokinase, Light Chain, has been tested for its ability to cleave a fluorogenic substrate Ac-DDDDK-AFC (Catalog # K758-100).

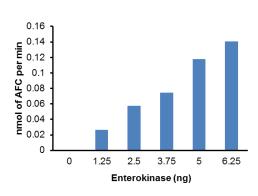
**SPECIFIC ACTIVITY:** >12,000 mU/mg (1 U = Cleavage of 1  $\mu$ mole per min of Ac-DDDDK-AFC at 37°C in 50 mM Tris, 1 mM CaCl<sub>2</sub>, 0.1% Tween 20, pH 8.0).

**DESCRIPTION**: Enterokinase (EC 3.4.21.9) is a serine protease involved in the activation of trypsinogen to trypsin, which in turn results in the activation of various digestive enzymes. It recognizes a highly specific amino acid sequence 'DDDDK' and cleaves after the lysine residue. High specific activity of enterokinase has been utilized in cleaving a variety of native or fusion protein tags containing the above recognition motif.

**INHIBITORS**: Enterokinase is inhibited in the presence of the protease inhibitors, such as Aprotinin, PMSF and benzamidine. Excess amount of imidazole (>50 mM) and/or NaCl (>250 mM) reversibly interferes and inhibits enterokinase activity.

APPLICATIONS: Recombinant Enterokinase can be used for protein digestion, protein





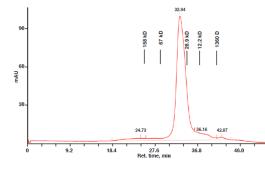
SDS-PAGE (12%) of h-Enterokinase:

M: Protein Marker

1: h-Enterokinase (6 µg) 2: h-Enterokinase (9 µg)

3: h-Enterokinase (12 µg)

Activity of h-Enterokinase was measured by Enterokinase Activity Assay Kit (K758-100).



SEC analysis of h-Enterokinase using a Superdex 200 HR 10/30 column at 0.5 ml/min in 50 mM Tris and 0.25 M NaCl pH 7.6.

## **RELATED PRODUCTS:**

- Enterokinase, human recombinant, lyophilized (Cat. No. 7136-10, 50)
- Enterokinase Activity Fluorometric Assay Kit (Cat. No. K758-100)
- Enterokinase Inhibitor Screening Kit (Cat. No. K759-100)
- Enterokinase Cleavage Kit (Cat. No. K760-100)
- Trypsin, Human Pancreas (Cat. No. 7292- 50)

FOR RESEARCH USE ONLY! Not to be used in humans.

