

## Instructions for protease K solution (10mg/mL)

**Item No. :** P1120

**Specification:** 1mL/5mL

**Storage:** -20°C storage, valid for at least 12 months.

### Product Description:

Proteinase K, Chinese name proteinase K. Imported product configuration, no DNase, no RNase, can be used directly. Can be used to digest various proteins. It can be used in various common molecular biology, cell biology and other related experiments, such as genomic DNA extraction, digestion and removal of enzymes.

Enzyme activity, >30U/mg. The amount of protease K required to hydrolyze substrate casein to 1μmol tyrosine per minute at 37°C and pH 7.5, defined as one unit (U) protease K enzyme activity.

It is effective over a wide pH range, with the effective pH range being pH 4.0-12.5 and the optimal pH range being pH7.5-8.0. The optimal reaction temperature of protease K is 65°C, but protease K itself degrades very rapidly at 65°C or higher. In many cases, the reaction temperature is 50-55°C.

Protease K shows higher enzyme activity in the presence of 0.2-1% SDS or about 10mM urea. The commonly used working concentration of protease K is 0.05-1mg/mL, depending on whether the buffer used contains SDS, urea, whether the pH is suitable, whether the temperature is suitable and other factors to determine the specific working concentration. The commonly used concentrations of EDTA, Triton X-100, Tween 20, Sarkosyl and guanidine hydrochloride have little effect on the activity of protease K.

### What to watch for:

If the amount used each time is small, it can be used after appropriate packaging.

For your safety and health, please wear a lab coat and disposable gloves.

### Related products:

<i>N1010</i>	<i>Nucleic Acid Purification Column (purified)</i>
<i>P1011</i>	<i>Phenol: Chloroform: isoamyl alcohol = 25:24:1 (PH&lt;5.0)</i>
<i>P1012</i>	<i>phenol: Chloroform: isoamyl alcohol = 25:24:1 (PH&gt;7.8)</i>
<i>R1020</i>	<i>yeast wall breaking enzyme solution</i>
<i>R1030RNase</i>	<i>A solution (10mg/ml)</i>

### Related literature:

- [1] Jun Guo,Cai Li,Chunxiao Yang,et al. Liraglutide reduces hepatic glucolipototoxicity-induced liver cell apoptosis through NRF2 signaling in Zucker diabetic fatty rats. Molecular Medicine Reports. April 2018. (IF 1.851)

**Note:** Please refer to the official website of Solarbio for more information on the use of this product.