

Product datasheet

Recombinant *S. cerevisiae* T4 DNA Ligase protein ab68649

製品の概要

製品名	Recombinant <i>S. cerevisiae</i> T4 DNA Ligase protein
タンパク質長	Full length protein

製品の詳細

由来	Recombinant
由来	Escherichia coli
アミノ酸配列	
生物種	Saccharomyces cerevisiae

特性

Our [Abpromise guarantee](#) covers the use of **ab68649** in the following tested applications.

The application notes include recommended starting dilutions; optimal dilutions/concentrations should be determined by the end user.

生理活性	167,000 U/ml. Unit Definition: One unit is defined as the amount of enzyme required to give 50% ligation of Hind III fragments of lambda DNA (5' DNA termini concentration of 0.12 μM, 300 μg/ml) in a total reaction volume of 20 μl in 30 minutes at 16 °C in 1X T4 DNA Ligase Reaction Buffer: (50mM Tris-HCl (pH 7.8 at 25°C), 10mM Magnesium chloride, 10mM DTT, 1mM ATP, 25 μg/ml BSA and DNA (0.1 to 1 μM in 5' termini)).
アプリケーション	Functional Studies
製品の状態	Liquid
備考	T4 DNA Ligase can be inactivated by incubation at 65°C for 10 minutes. Optimal ligation occurs at 16°C. To dilute T4 DNA Ligase that will subsequently be stored at -20°C, 50% glycerol storage buffer should be used; to dilute for immediate use, 1x T4 DNA Ligase reaction buffer can be used. T4 DNA Ligase is strongly inhibited by NaCl or KCl if the concentration is > 200mM. Ligation of blunt-ended and single-base pair overhang fragments requires about 50 times as much enzyme to achieve the same extent of ligation as cohesive-end DNA fragments. Blunt-end ligation may be enhanced by addition of PEG 4000 (10% w/v final concentration) or hexamine chloride, or by reducing the ATP concentration to 50 μM. This protein can be used in Cloning of restriction fragments and joining linkers and adapters to blunt-ended DNA.

前処理および保存

保存方法および安定性

Shipped at 4°C. Upon delivery aliquot and store at -20°C. Avoid freeze / thaw cycles.

Preservative: None

Constituents: 50% Glycerol, 200µg/ml BSA, 50mM Potassium chloride, 10mM Tris HCl, 1mM DTT, 0.1mM EDTA, pH 7.4

This product is an active protein and may elicit a biological response in vivo, handle with caution.

Please note: All products are "FOR RESEARCH USE ONLY AND ARE NOT INTENDED FOR DIAGNOSTIC OR THERAPEUTIC USE"

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