

## DATA SHEET

**Exonuclease I**recombinant, *E. coli*

Cat. Nº.	Amount
<input type="checkbox"/> ENZ-100S	2.000 units
<input type="checkbox"/> ENZ-100M	2 x 2.000 units
<input type="checkbox"/> ENZ-100L	10.000 units
<input type="checkbox"/> ENZ-100XL	2 x 10.000 units

**Unit Definition:** One unit is defined as the amount of enzyme that catalyses the release of 10 nmol acid-soluble nucleotides in a total reaction volume of 50 µl within 30 minutes at 37 °C.

**Form:** liquid

**Concentration:** 20 units/µl

**Shelf Life:** 12 months

**For *in vitro* use only!**

**Shipping:**

Shipped on blue ice

**Storage Conditions:**

Store at -20 °C

**Additional Storage Conditions:**

Avoid freeze/thaw cycles.

**Applications:**

Removal of residual ssDNA, including oligonucleotides, from reaction mixtures.

**Notes:**

- does not degrade double-stranded DNA or RNA
- requires magnesium and presence of free, accessible 3'-hydroxyl-termini
- active in a wide variety of buffer conditions, allowing for direct addition of enzyme to most reaction mixtures

**Description:**

Catalyzes removal of nucleotides from single-stranded DNA in 3' → 5' direction.

**Content:****Exonuclease I**

Tris-HCl (pH 7.5), 50% (v/v) glycerol and stabilizers.

**10 X Reaction Buffer**

Glycine-KOH (pH 9.5 at 25°C), MgCl<sub>2</sub>, and stabilizers.

**Assay Conditions:**

67 mM Glycin-KOH (pH 9.5 at 25 °C), 10 mM 2-mercaptoethanol, 6,7 mM MgCl<sub>2</sub>, 0.17 mg/ml single-stranded [<sup>3</sup>H]-DNA. Incubation is at 37 °C for 10 min in a reaction volume of 50 µl.

**Related Products:**

- Recombinant Shrimp Alkaline Phosphatase (rSAP), # **ENZ-111**
- Exo+SAP kit, # **DPK-100**.

**Selected References:**

Lehman et al. (1964) J. Biol. Chem. 239:2628.

Kushne et al. (1971) Proc. Natl. Acad. Sci. USA 68:824.

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Goldmark et al. (1972) J. Biol. Chem. 247:184.

Rosamond et al. (1979) J. Biol. Chem. 254:8646.

Werle et al. (1994) Nuc. Acids Research 22 (20):4354.