



PRODUCT INFORMATION

EZ-10 SPIN COLUMN DNA CLEANUP MINIPREPS KIT

Components	BS367, 50 Preps	BS368, 100 Preps
Cleanup Solution	20 ml	40 ml
Wash Solution	12 ml	24 ml
Elution Buffer	5 ml	10 ml
Column	50	100
2.0 ml Collection Tube	50	100
Protocol	1	1

1. Before use, add 48 ml of 100% of ethanol to 12 ml Wash Solution for BS367, or add 96 ml of 100% ethanol to 24 ml Wash Solution for BS368. For other volumes of wash solution, simply add enough ethanol to make a 4:1 ratio (volume of added ethanol : volume of Wash Solution = 4:1).
2. Elution Buffer is 2.0 mM Tris-HCl pH 8.0~8.5. Although TE buffer pH 8.0 or water can be used, yield is generally 20% lower.

Storage: The kit is stable for 12 months at room temperature. For longer storage, keep all contents of the kit cold.

Principle:

This DNA Cleanup kit provides a simple, efficient method for purification of DNA fragments from variable enzymatic reactions such as cDNA synthesis, ligation, restriction digestions, tailing, PCR*, alkaline phosphatase, nick translation, due terminators products from PCR** reaction mixture. It is also an ideal tool to desalt the solution of DNA as well as to remove residual organic solvents or unincorporated nucleotides or primers (<40-mer) from reaction mixture. The kit utilizes a technology which adsorbs selectively up to 10ug DNA fragments in the column in the presence of specialized binding buffers. Nucleotides, enzymes, mineral oil and other impurities do not bind to the columns in the plate. DNA fragments can be eluted readily with elution buffer.

Application:

- DNA Cleanup from the enzymatic reactions
- Removal of nucleotides and primers (<40-mer)

Features:

- Rapid and economical. Entire procedure takes 40 minutes.
- High yields (60-80%). It is suitable to recover 100 bp-40 kb DNA fragments.
- Efficient removal of contaminants. Purified DNA can be used in any downstream applications such as sequencing, labeling, restriction enzymatic digestions, ligations or transformations.
- No phenol / chloroform extraction or ethanol precipitation

Procedure for Purification of DNA Products:

1. Transfer DNA mixture to a 1.5 ml microfuge tube and add 3 volumes of Cleanup Solution .
2. Place a column into a 2.0 ml collection tube. Transfer the above mixture solution to the column, and let the column stand at room temperature for 2 minutes. Spin at 5000 rpm for 1 minute.



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3. Discard flow-through. Add 500 ul Wash Solution to the column and spin at 8,000 rpm for 1 minute. Discard flow-through and place column back to the same collection tube.
4. Add 500 ul Wash Solution to the column, spin at 8,000 rpm for 1 minute. Discard flow-through and spin once more to remove residue of Wash Solution.
5. Transfer column to a clean 1.5 ml microtube. Add 30-50ul Elution Buffer or water onto the center part of the column, incubate at 50°C for 2 minutes. Spin down at 10,000 rpm for 1 minute. Purified DNA including PCR* product is ready for use or kept at – 20°C.

Note:

1. Incubation at 37-50 °C can improve recovery yield.
2. If PCR* reaction mixture contain seriously non-specific amplified DNA fragments, use of DNA Gel Extraction Kit is recommended.
3. This kit can not remove the template and primers with chain length longer than 50-mer.

* The Polymerase Chain Reaction (PCR) is covered by patents owned by Hoffman-La Roche Inc.