PRODUCTS ARE INTENDED FOR BASIC SCIENTIFIC RESEARCH ONLY!
NOT INTENDED FOR HUMAN OR ANIMAL USE!

Please visit www.biobasic.com

A world Leader in Serving Science

Bio Basic Inc. A world leader in serving science

PRODUCT INFORMATION

Ultra Fast EZ-10 Spin Column Plasmid DNA Mini-Preps Kit

Kit Content

Components	BS82014 50 Preps
Lysis Buffer-UF	50 ml
Buffer DW1 [a]	24 ml
Universal Wash Solution [b]	12 ml
Elution Buffer	5 ml
EZ-10 Spin Column	50
Collection Tube	50
Protocol	1

a) Before use, add 6ml isopropanol to Buffer DW1 in BS82014. For other volumes of Buffer DW1, simply add enough isopropanol to make a **1:4** ratio (volume of added isopropanol: volume of Buffer DW1 = 1:4).
b) Before use, add 48ml of 100% of ethanol to Universal Wash Solution in BS82014. 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).

V6.0 05/2012 20 Konrad Cres, Markham Ontario L3R 8T4 Canada
Tel: (905) 474 4493, (800) 313 7224 Fax: (905) 474 5794
Email: order@biobasic.com Web: www.biobasic.com

Introduction

The kit is designed for one step plasmid DNA purification from bacteria culture. Instead of the traditional three-buffer system, it uses one buffer solution which combines suspension, lysis and neutralization buffers. Plasmid DNA is selectively bound onto the EZ-10 Spin Column and other impurities such as salt, protein will be washed away. The bound plasmid can be eluted in ddH_2O, TE or Elution Buffer and is ready to be used for downstream applications. The kit is used for preparation of up to 6-8 µg of pure plasmid DNA.

Features

1. Fast: whole procedure takes 5-10 minutes
2. Convenient and environmentally friendly.
3. No phenol/chloroform extraction or ethanol precipitation required

Procedures

1. Add about 1.5-3.0 ml bacterial culture to a 5 ml centrifuge tube and centrifuge at 10,000 x g for 30 seconds. Drain liquid completely and keep the pellet.
2. Add 0.6-1 ml of Lysis Buffer-UF (Lysis Buffer-UF should be mixed by shaking prior to use) to the tube, vortex thoroughly for 30 seconds, incubate at room temperature for 3 minutes.
3. Transfer the lysate to an EZ-10 Spin Column. Keep the column at room temperature for 2 minutes, following by centrifugation at 10,000 x g for 2 minutes. Discard the flow-through in the Collection Tube.
4. Add 500 µl Buffer DW1 to EZ-10 spin column and centrifuge at 10,000 *x g* for 2 minutes. Discard the flow-through in the collection tube.
5. Add 500 µl Universal Wash Solution to EZ-10 spin column and centrifuge at 10,000 *x g* for 2 minutes. Discard the flow-through in the collection tube.

Bio Basic Inc. A world leader in serving science

6. Repeat Step 5 once.
7. Centrifuge at 10,000 x g for an additional 2 minutes to remove any residual Wash Solution.
8. Transfer the EZ-10 spin column into a clean 1.5ml microfuge tube; add 30-50 µl Elution Buffer. Keep it at RT for 2 minutes.

   Note: In order to increase yield, warm the Elution Buffer or ddH_2O to 60 ^{o}C before use.

9. Centrifuge at 10,000 x g for 2 minutes. Store purified DNA at -20 ^{o}C.

Storage

Transport at room temperature. Store Lysis Buffer- UF at 4 ^{o}C.

Troubleshoot

Issue	Possibilities	Suggestions
Low yield	Low antibiotic activity	Use new antibiotic storage solution or increase the quantity of antibiotics
	Partial lysis	After adding Lysis Buffer-UF, vortex until the precipitate is fully suspended
	Long Cultivation time or bacteria aging	Cultivating time do not exceed 16 hours at 37 ^{o}C
White precipitation after elution	Fungal contamination	Select single colony and spread
OD260/280 <1.8	Too much bacteria culture	Use less than 3 ml bacteria culture
	Protein contamination	Wash with Wash Solution 2x
Buffer DW1 precipitation		Before use, warm the Buffer DW1 to 60 ^{o}C

V6.0 05/2012 20 Konrad Cres, Markham Ontario L3R 8T4 Canada
Tel: (905) 474 4493, (800) 313 7224 Fax: (905) 474 5794
Email: order@biobasic.com Web: www.biobasic.com