

pBR322 DNA– BstNI Digest



1-800-632-7799
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N3031S 060120414041

N3031S

50 gel lanes (50 µg) Lot: 0601204 Exp: 4/14

1,000 µg/ml Store at –20°C

1.5 ml Gel Loading

Dye, Blue (6X) Store at 25°C

Description: The BstNI Digest of pBR322 DNA yields 6 fragments suitable for use as molecular weight standards for agarose gel electrophoresis (1,2).

Supplied in: 10 mM Tris-HCl (pH 8.0),
1 mM EDTA.

Reagents supplied:

6X Gel Loading Dye, Blue

1X Gel Loading Dye, Blue:

2.5% Ficoll-400

11 mM EDTA

3.3 mM Tris-HCl (pH 8.0@25°C)

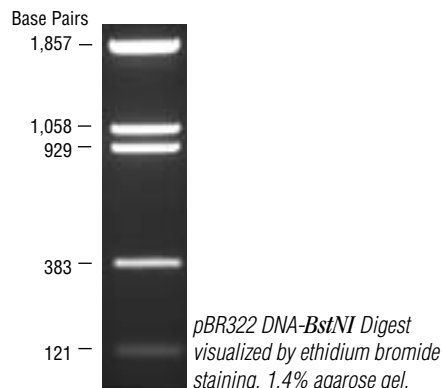
0.017% SDS

0.015% bromophenol blue

Preparation: Prepared from *E. coli* ER2420 (dam⁺ dcm⁺ EcoKM⁻) by a standard plasmid purification procedure, the double-stranded DNA is digested to completion with BstNI, phenol extracted and equilibrated to 10 mM Tris-HCl (pH 8.0) and 1 mM EDTA.

Usage Recommendation: The approximate mass of DNA in each of the bands in our pBR322 DNA-BstNI Digest is as follows (assuming a 1.0 µg loading):

Fragment	Base Pairs	DNA Mass
1	1,857	426 ng
2	1,058	243 ng
3	929	213 ng
4	383	88 ng
5	121	28 ng
6	13	3 ng



Note: For long term storage, store at –20°C. If samples need to be diluted, use TE or other buffer of minimal ionic strength. DNA may denature if diluted in dH₂O.

Suggested protocol for loading a sample:

The following protocol is recommended for a 5 mm wide lane.

1. Prepare loading mixture:

Distilled water	4 µl
6X Blue Loading Dye	1 µl
DNA Ladder	1 µl
Total volume	6 µl

2. Mix gently
3. Load onto the agarose gel

Note: The components of the mixture should be scaled up or down, depending on the width of the agarose gel.

References:

1. Sutcliffe, J. G. (1978) Cold Spring Harbor Symp. Quant. Bio. 43:77–90.
2. Peden, K. W. C. (1983) *Gene* 22, 277–280.
3. Forster, A.C. et al. (1985) *Nucl. Acids Res.* 13, 745-761

CERTIFICATE OF ANALYSIS

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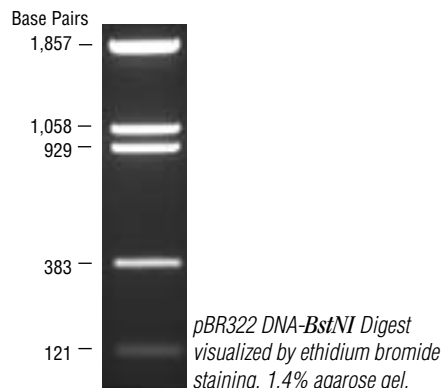
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