

New England Biolabs Certificate of Analysis

Product Name: Bsu36l
Catalog Number: R0524L
Concentration: 10,000 U/ml
Unit Definition: One unit is defined as the amount of enzyme required to digest 1 µg of Lambda DNA (Hind III digest) in 1 hour at 37°C in a total reaction volume of 50 µl.
Packaging Lot Number: 10067216
Expiration Date: 01/2022
Storage Temperature: -20°C
Storage Conditions: 250 mM NaCl , 10 mM Tris-HCl (7.4), 1 mM DTT , 0.1 mM EDTA , 50 % Glycerol , 0.15 % TritonX-100 , 200 µg/ml BSA
Specification Version: PS-R0524S/L v1.0

Bsu36l Component List			
NEB Part Number	Component Description	Lot Number	Individual QC Result
R0524LVIAL	Bsu36l	10063226	Pass
B7204SVIAL	CutSmart® Buffer	10064409	Pass

Assay Name/Specification	Lot # 10067216
Endonuclease Activity (Nicking) A 50 µl reaction in CutSmart™ Buffer containing 1 µg of supercoiled PhiX174 DNA and a minimum of 10 units of Bsu36l incubated for 4 hours at 37°C results in <20% conversion to the nicked form as determined by agarose gel electrophoresis.	Pass
Non-Specific DNase Activity (16 Hour) A 50 µl reaction in CutSmart™ Buffer containing 1 µg of Lambda-HindIII DNA and a minimum of 30 units of Bsu36l incubated for 16 hours at 37°C results in a DNA pattern free of detectable nuclease degradation as determined by agarose gel electrophoresis.	Pass
Ligation and Recutting (Terminal Integrity) After a 2-fold over-digestion of Lambda-HindIII DNA with Bsu36l, ~25% of the DNA fragments can be ligated with T4 DNA ligase in 4 hours at 25°C. Of these ligated fragments, >95% can be recut with Bsu36l.	Pass
Exonuclease Activity (Radioactivity Release) A 50 µl reaction in CutSmart™ Buffer containing 1 µg of a mixture of single and	Pass

Assay Name/Specification	Lot # 10067216
double-stranded [³ H] E. coli DNA and a minimum of 100 units of Bsu36I incubated for 4 hours at 37°C releases <0.1% of the total radioactivity.	

This product has been tested and shown to be in compliance with all specifications.



Anthony Francis
Production Scientist
03 Jan 2020



Jay Minichiello
Packaging Quality Control Inspector
10 Feb 2020