

New England Biolabs Certificate of Analysis

Product Name: *Gel Loading Dye, Blue (6X)*
Catalog #: *B7021S*
Concentration: *6X Concentrate*
Lot #: *0141802*
Assay Date: *02/2018*
Expiration Date: *02/2021*
Storage Temp: *25°C*
Composition (1X): *2.5% Ficoll[®]-400, 11 mM EDTA, 3.3 mM Tris-HCl, 0.017% SDS, 0.015% Bromophenol Blue, (pH 8.0 @ 25°C)*
Specification Version: *PS-B7021S v1.0*
Effective Date: *13 Apr 2018*

Assay Name/Specification (minimum release criteria)	Lot #0141802
Endonuclease Activity (Nicking) - A 50 µl reaction in CutSmart [®] Buffer containing 1 µg of supercoiled PhiX174 DNA and a minimum of 10 µl of Gel Loading Dye, Blue (6X) incubated for 4 hours at 37°C results in <10% conversion to the nicked form as determined by agarose gel electrophoresis.	Pass
Exonuclease Activity (Radioactivity Release) - A 50 µl reaction in CutSmart [®] Buffer containing 1 µg of a mixture of single and double-stranded [³ H] <i>E. coli</i> DNA and a minimum of 10 µl of Gel Loading Dye, Blue (6X) incubated for 4 hours at 37°C releases <0.1% of the total radioactivity.	Pass
Non-Specific DNase Activity (16 Hour) - A 50 µl reaction in CutSmart [®] Buffer containing 1 µg of digested 2-Log Ladder DNA and a minimum of 10 µL of Gel Loading Dye, Blue (6X) incubated for 16 hours at 37°C results in a DNA pattern free of detectable nuclease degradation as determined by agarose gel electrophoresis.	Pass
RNase Activity (Extended Digestion) - A 10 µl reaction in NEBuffer 4 containing 40 ng of a 300 base single-stranded RNA and a minimum of 1 µl of Gel Loading Dye, Blue (6X) is incubated at 37°C. After incubation for 16 hours, >90% of the substrate RNA remains intact as determined by gel electrophoresis using fluorescent detection.	Pass



Authorized by
Derek Robinson
13 Apr 2018



Inspected by
Tony Spear-Alfonso
23 Feb 2018

