

New England Biolabs Certificate of Analysis

Product Name: *Lambda Exonuclease*
Catalog Number: *M0262S*
Concentration: *5,000 U/ml*
Unit Definition: *One unit is defined as the amount of enzyme required to produce 10 nmol of acid-soluble deoxyribonucleotide from double-stranded substrate in a total reaction volume of 50 µl in 30 minutes at 37°C in 1X Lambda Exonuclease Reaction Buffer with 1 µg sonicated duplex [³H]-DNA.*
Packaging Lot Number: *10069223*
Expiration Date: *03/2022*
Storage Temperature: *-20°C*
Storage Conditions: *25 mM Tris-HCl, 50 mM NaCl, 1 mM DTT, 0.1 mM EDTA, 50% Glycerol, (pH 8.0 @ 25°C)*
Specification Version: *PS-M0262S/L v1.0*

Lambda Exonuclease Component List			
NEB Part Number	Component Description	Lot Number	Individual QC Result
M0262SVIAL	Lambda Exonuclease	10069222	Pass
B0262SVIAL	Lambda Exonuclease Reaction Buffer	10062503	Pass

Assay Name/Specification	Lot # 10069223
<p>Endonuclease Activity (Nicking) A 50 µl reaction in Lambda Exonuclease Reaction Buffer containing 1 µg of supercoiled PhiX174 DNA and a minimum of 50 units of Lambda Exonuclease incubated for 4 hours at 37°C results in <10% conversion to the nicked form as determined by agarose gel electrophoresis.</p>	Pass
<p>Protein Purity Assay (SDS-PAGE) Lambda Exonuclease is ≥ 95% pure as determined by SDS-PAGE analysis using Coomassie Blue detection.</p>	Pass
<p>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 5 units of Lambda Exonuclease 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.</p>	Pass

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

John D. Greci

John Greci
Production Scientist
04 Jun 2020

Michael Tonello

Michael Tonello
Packaging Quality Control Inspector
04 Jun 2020