

240 County Road Ipswich, MA 01938-2723 Tel 978-927-5054 Fax 978-921-1350 www.neb.com info@neb.com

## New England Biolabs Certificate of Analysis

Product Name: I-Ceul
Catalog Number: R0699L
Concentration: 5,000 U/ml

Unit Definition: One unit is defined as the amount of enzyme required to cleave 1 µg

of pBHS Scal-linearized Control Plasmid in 3 hours at 37°C in a

total reaction volume of 50 μl.

Packaging Lot Number: 10156927
Expiration Date: 07/2024
Storage Temperature: -20°C

Storage Conditions: 300 mM NaCl, 10 mM Tris-HCl (pH 7.4), 1 mM DTT, 0.1 mM EDTA, 50%

Glycerol, 500 μg/ml BSA

Specification Version: PS-R0699S/L v1.0

I-Ceul Component List				
<b>NEB Part Number</b>	Component Description	Lot Number	Individual QC Result	
R0699LVIAL	I-Ceul	10156926	Pass	
N0423SVIAL	pBHS Scal-linearized Control Plasmid	10156925	Pass	
B6004SVIAL	rCutSmart™ Buffer	10151374	Pass	

Assay Name/Specification	Lot # 10156927
Ligation and Recutting (Terminal Integrity) After a 10-fold over-digestion of pBHS-Scal DNA with I-CeuI, >95% of the DNA fragments can be ligated with T4 DNA ligase in 16 hours at 16°C. Of these ligated fragments, >95% can be recut with I-CeuI.	Pass
Non-Specific DNase Activity (16 Hour) A 50 µl reaction in CutSmart™ Buffer containing 1 µg of pBHS-Scal DNA and a minimum of 50 Units of I-Ceul incubated for 16 hours at 37°C results in a DNA pattern free of detectable nuclease degradation as determined by agarose gel electrophoresis.	Pass
Endonuclease Activity (Nicking) A 50 μl reaction in CutSmart <sup>™</sup> Buffer containing 1 μg of supercoiled PhiX174 DNA and a minimum of 15 Units of I-Ceul incubated for 4 hours at 37°C results in <20% 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	Pass



R0699L / Lot: 10156927

Page 1 of 2

Assay Name/Specification	Lot # 10156927
double-stranded [ 3H] E. coli DNA and a minimum of 50 units of I-Ceul 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.

One or more products referenced in this document may be covered by a 3rd-party trademark. Please visit www.neb.com/trademarks for additional information.

Penghua Zhang Production Scientist

13 Jul 2022

Michael Tonello

Packaging Quality Control Inspector

13 Jul 2022

