

New England Biolabs Certificate of Analysis

Product Name: *NEBuilder® HiFi DNA Assembly Cloning Kit*
 Catalog Number: *E5520S*
 Packaging Lot Number: *10147016*
 Expiration Date: *03/2023*
 Storage Temperature: *Multi-temperature**
 Specification Version: *PS-E5520S v2.0*

* This product contains components with different storage temperature requirements. Please reference the applicable product specification document(s) on the Quality and Safety tab located on the product page of www.neb.com.

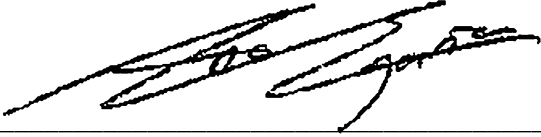
NEBuilder® HiFi DNA Assembly Cloning Kit Component List			
NEB Part Number	Component Description	Lot Number	Individual QC Result
N3041AVIAL	pUC19 Vector	10135407	Pass
N2611AVIAL	NEBuilder® Positive Control	10134428	Pass
M5520AVIAL	NEBuilder® High-Fidelity Master Mix	10132142	Pass
C2987HVIAL	NEB® 5-alpha Competent E. coli (High Efficiency)	10135382	Pass
B9020SVIAL	SOC Outgrowth Medium	10135532	Pass

Assay Name/Specification	Lot # 10147016
<p>Functional Testing (NEBuilder® HiFi DNA Assembly) 10 µl of 2X NEBuilder® HiFi DNA Assembly Cloning Kit was incubated with 0.05 pmol each of 6 DNA fragments (4 fragments of 1,000 bp, one fragment of 1,152 bp with 80 bp overlap, and a vector of 3,373 bp with a 20 bp overlap) in a final volume of 20 µl at 50°C for 60 minutes. NEB® 5-alpha Competent E. coli (High Efficiency) were transformed with 2 µl of the assembled products. Successfully assembled fragments produce an intact lacZ gene in the pACYC184 vector, and yield blue colonies on an IPTG/Xgal/Chloramphenicol plate when incubated overnight at 37°C after transformation. Greater than 100 blue colonies were observed when 1/10 of the outgrowth (500 µl) was spread on a plate.</p>	Pass
<p>* Individual Product Component Note Standard Quality Control Tests are performed for each component included in NEBuilder® HiFi DNA Assembly Cloning Kit and meet the designated specifications.</p>	Pass

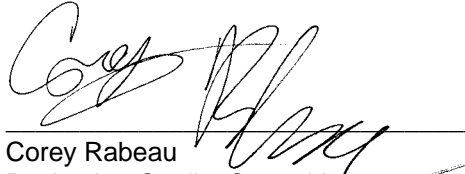
This product has been tested and shown to be in compliance with all specifications.

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.



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Production Scientist
06 Apr 2022



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06 Apr 2022