New England BioLabs Inc.

be INSPIRED
drive DISCOVERY
stay GENUINE

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:	*HpyAV*
Catalog Number:	*R0621L*
Concentration:	*2,000 U/ml*
Unit Definition:	*One unit is defined as the amount of enzyme required to digest 1 µg of Lambda DNA in 1 hour at 37°C in a total reaction volume of 50 µl.*
Packaging Lot Number:	*10057180*
Expiration Date:	*10/2021*
Storage Temperature:	*-20°C*
Storage Conditions:	*300 mM NaCl, 10 mM Tris-HCl, 0.5 mM NiSO4, 0.1 mM EDTA, 50 % Glycerol, 200 µg/ml BSA, (pH 7.4 @ 25°C)*
Specification Version:	*PS-R0621S/L v3.0*

HpyAV Component List			
NEB Part Number	**Component Description**	**Lot Number**	**Individual QC Result**
R0621LVIAL	HpyAV	10056712	**Pass**
B7204SVIAL	CutSmart® Buffer	10042967	**Pass**

Assay Name/Specification	Lot # 10057180
Non-Specific DNase Activity (16 Hour) A 50 µl reaction in CutSmart® Buffer containing 1 µg of Lambda DNA and a minimum of 6 units of HpyAV incubated for 16 hours at 37ºC 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 DNA with HpyAV, ~50% of the DNA fragments can be ligated with T4 DNA ligase in 16 hours at 16ºC. Of these ligated fragments, ~50% can be recut with HpyAV.	**Pass**
Exonuclease Activity (Radioactivity Release) A 50 µl reaction in CutSmart™ Buffer containing 1 µg of a mixture of single and double-stranded [³H] E. coli DNA and a minimum of 20 units of HpyAV incubated for 4 hours at 37ºC releases <0.3% of the total radioactivity.	**Pass**

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

New England BioLabs Inc.

be INSPIRED
drive DISCOVERY
stay GENUINE

240 County Road
Ipswich, MA 01938-2723

Tel 978-927-5054
Fax 978-921-1350

www.neb.com
info@neb.com

_____

Doreen Duquette
Production Scientist
14 May 2019

_____

Michael Tonello
Packaging Quality Control Inspector
31 Oct 2019

ISO 9001 Registered Quality Management
ISO 13485 Registered Medical Devices
ISO 14001 Registered Environmental Management