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: CviKI-1

Catalog #: R0710S/L

Concentration: 5,000 units/ml

Unit Definition: One unit is defined as the amount of enzyme required to digest 1 μ g of pBR322 DNA in 1 hour at 37°C in a total reaction

volume of 50 μ l.

 Lot #:
 0031412

 Assay Date:
 12/2014

 Expiration Date:
 12/2016

 Storage Temp:
 -20 °C

Storage Conditions: 50 mM NaCl, 10 mM Tris-HCl (pH 7.4), 1 mM DTT, 0.1 mM EDTA, 50% Glycerol, 200 µg/ml BSA

Specification Version: PS-R0710S/L v1.0
Effective Date: 30 Sep 2013

Assay Name/Specification (minimum release criteria)	Lot #0031412
Ligation and Recutting (Terminal Integrity) - After a 5-fold over-digestion of pBR322 DNA with CviKI-1, ~75% 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 CviKI-1.	Pass
Non-Specific DNase Activity (16 hour) - A 50 μl reaction in CutSmart TM Buffer containing 1 μg of pBR322 DNA and a minimum of 5 Units of CviKI-1 incubated for 16 hours at 37°C results in a DNA pattern free of detectable nuclease degradation as determined by agarose gel electrophoresis. NOTE: although no nuclease degradation is detected under these conditions, extended incubations and/or high concentrations of this enzyme may result in star activity. See the product FAQ for recommended reaction conditions for this enzyme.	Pass

Authorized by Derek Robinson 30 Sep 2013







Inspected by Kerri Sakowski 31 Dec 2014

Korai Sakowski

^{*} The BSA in this product has been granted an EDQM "Certificate of Suitability" from the European Directorate for the Quality of Medicines (# R1-CEP-2003-204-Rev00) and has been granted a USDA Certificate for Export of Bovine Blood Plasma/Serum for Manufacture into Pharmaceutical Products.