

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:	FatI
Catalog #:	R0650S/L
Concentration:	2,000 units/ml
Unit Definition:	One unit is defined as the amount of enzyme required to digest 1 μ g of pUC19 DNA in 1 hour at 55°C in a total reaction volume of 50 μ l.
<i>Lot</i> #:	0061607
Assay Date:	07/2016
Expiration Date:	7/2018
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 μ g/ml BSA
Specification Version:	PS-R0650S/L v1.0
Effective Date:	29 Oct 2013

Assay Name/Specification (minimum release criteria)	
Exonuclease Activity (Radioactivity Release) - A 50 μ l reaction in NEBuffer 2.1 containing 1 μ g of a mixture of single and double-stranded [³ H] <i>E. coli</i> DNA and a minimum of 10 units of FatI incubated for 4 hours at 55°C releases <0.1% of the total radioactivity.	Pass
Ligation and Recutting (Terminal Integrity) - After a 10-fold over-digestion of pUC19 DNA with FatI, >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 FatI.	
Non-Specific DNase Activity (16 Hour) - A 50 µl reaction in NEBuffer 2.1 containing 1 µg of pUC19 DNA and a minimum of 10 Units of FatI incubated for 16 hours at 55°C results in a DNA pattern free of detectable nuclease degradation as determined by agarose gel electrophoresis.	

* 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.

timen

Authorized by Derek Robinson 29 Oct 2013



Antherny The

Inspected by Anthony Francis 26 Jul 2016