

LaboPass™ RNase Inhibitor

Cat. No CMRN002

2,000 unit (40 unit/μl)

Cat. No CMRN010

10,000 unit (40 unit/μl)

Lot No.

Note: For laboratory use only

Description

LaboPass™ RNase Inhibitor is a 50 kDa recombinant protein of murine origin which is purified from a recombinant *E.coli* strain expressing a cloned murine gene. The inhibitor specifically inhibits RNase A, B and C by binding at a 1:1 ratio with high affinity, but not against RNase 1, RNase T1, S1 nuclease or RNase H. Additionally, it does not interfere with the activity of Taq polymerase, SP6, T7, and T3 RNA Polymerases, AMV or M-MLV Reverse Transcriptase. Murine RNase inhibitor which lacks a pair of cysteines identified in the human/porcine inhibitor is more resistant to oxidation. So it is more stable at low reducing condition (2-mercaptoethanol, DTT, DTE, etc) compared to other source inhibitors.

Contents

• RNase Inhibitor (40 unit/μl)

CMRN002

2,000 unit

CMRN010

10,000 unit

Store at -20°C

Applications

- cDNA synthesis
- RT-PCR or qRT-PCR
- *in vitro* transcription
- *in vitro* translation
- Other applications where the integrity of RNA is required

Unit Definition

One unit is defined as the amount of the inhibitor required to inhibit the activity of 5 ng of RNase A by 50 %. Activity is measured by the inhibition of hydrolysis of cytidine 2', 3'-cyclic monophosphate (2', 3'-cyclic CMP) by RNase A

Storage Buffer

20 mM HEPES-KOH (pH 7.5), 50 mM KCl, 8 mM DTT, 50 % (v/v) Glycerol