



CERTIFICATE OF ANALYSIS

dTTP, molecular biology grade

#R0171 25 µmol

Lot: **Expiry Date:**

Concentration: 100 mM
Volume: 0.25 ml
Formula: C₁₀H₁₄N₂O₁₄P₃Na₃
Molecular Weight: 548.1

Store at -20°C

In total 1 vial.

Description

dTTP (2'-deoxythymidine 5'-triphosphate) is supplied as a 100 mM aqueous solution at pH 7.0.

Applications

For use in PCR, long PCR, RT-PCR, cDNA synthesis, primer extension, DNA sequencing, DNA labeling.

The Polymerase Chain Reaction (PCR) process is covered by U.S. patents owned by Hoffman-La Roche.

PRODUCT USE LIMITATION.

This product is developed, designed and sold exclusively *for research purposes and in vitro use only*. The product was not tested for use in diagnostics or for drug development, nor is it suitable for administration to humans or animals. Please refer to www.fermentas.com for Material Safety Data Sheet of the product.

QUALITY CONTROL ASSAY DATA

| Method | Specification | Result |
|---|--|----------|
| Purity Assay | | |
| HPLC (column C18; detection UV at 267; mobile phase: A=TEAA 0.1 M, pH 7.0; B=60% CH ₃ CN/A) | ≥99% | Conforms |
| LO test (test for detection of exo-, endo-deoxyribonuclease contaminants) | Not detectable | Conforms |
| Ribonuclease assay (test for detection of RNase contaminants using 2000 base RNA transcript as a substrate) | Not detectable | Conforms |
| Function Assay | | |
| PCR | PCR amplification of a 354 bp fragment from 50 pg of human genomic DNA | Conforms |
| pH | | |
| | 7.0-7.5 | Conforms |
| Concentration | | |
| Spectrometry (λ_{\max} 267 nm; $\epsilon = 9.6 \times 10^3 \text{ M}^{-1} \text{ cm}^{-1}$ at pH 7.0) | 100±5 mM | Conforms |

Quality authorized by:

 Jurgita Zilinskiene