

## dNTP Mix (Lithium salts)

NU-0010-10 • NU-0010-50 • NU-0010-100

Eurogentec products are sold for research or laboratory use only and are not to be administrated to humans or used for medical diagnostics.

### Description

The 20 mM dNTP Mix (Lithium salts) contains each dNTP (dATP, dCTP, dGTP, dTTP) at a concentration of 5 mM.

Each vial contains 20 µmol (1 x 1000 µl) dNTP Mix i.e. 5 µmol of each. Ready to use.

### Package content

Reagent	Reference	Volume	Quantity
dNTP Mix (Lithium Salts)	NU-0010-10	1 x 1ml	1 x 20 µmol dNTPs
	NU-0010-50	5 x 1 ml	5 x 20 µmol dNTPs
5 mM each dNTP	NU-0010-100	10 x 1 ml	10 x 20 µmol dNTPs

### Shipping conditions

dNTP Mix Shipped on dry ice

### Storage

Store the dNTP Mix at -20°C or -70°C, in a constant temperature freezer. Avoid multiple freeze/ thaw cycles.

For long-term usage, aliquoting is recommended.

### Purity

dNTPs are enzymatically produced from nucleotide monophosphates by a process of phosphorylation. This process uses highly specific enzymatic systems, which eliminate impurities and PCR inhibitors such as modified nucleotides and pyrophosphates. dNTPs are purified with preparative HPLC and are at least 99 % pure.

### Typical analysis

Lithium salts, ≥99% deoxynucleoside triphosphates (HPLC, area ≥ 99%), ≤1 % deoxynucleoside mono-phosphates and deoxynucleoside diphosphates.

### Quality control

dNTPs are tested for the absence of DNase, RNase, protease and nicking activity. Each batch is validated rigorously for purity by HPLC, and tested for performance in a wide range of PCR templates, including a long-distance 20 kb functional test.

### dNTP characteristics

Deoxynucleotide	Molecular Weight (g/mol)	Molar Extinction
dATP	535.2	1 µmol = 15,3 (A <sub>260</sub> )
dGTP	533.2	1 µmol = 13,7 (A <sub>252</sub> )
dCTP	511.1	1 µmol = 9,6 (A <sub>272</sub> )
dTTP	505.9	1 µmol = 8,4 (A <sub>260</sub> )

### Reaction conditions

For direct use in DNA synthesis *in vitro*.

Add the dNTP Mix directly into the reaction mixture.

For primer extension technology, add 4 µl of dNTP Mix in a total 100 µl reaction volume to give a final concentration of 200 µM of each dNTP.

Number of reactions: 250

For long-range application, adjust accordingly.

---

## Related products

Reagent	Pack. size	Reference
Mupid®-One electrophoresis system	1	MU-0041
Diamond Taq® (5U/µl)	1000 U	TAQ-I021-1000
HGS Diamond Taq® (5U/µl)	1000 U	TAQ-I011-1000+
GoldStar Mix 2x	5 x 1 ml 200 RXNs	PK-0064-02
Red'y'Gold Mix 2x	5 x 1 ml 200 RXNs	PK-0064-02R
SmartLadder	1000 lanes	MW-1700-10

**For further information please contact our  
Customer Help Desk**

info@eurogentec.com  
+32 4 372 76 65