

# Certificate of Analysis



<b>Compound Name</b>	<b>Uridine 5'-triphosphate (UTP), 100 mM sodium salt solution</b>
<b>CAS Number</b>	<b>19817-92-6</b>
<b>Catalog Number</b>	<b>UTP_100ML UTP_1000ML</b>
<b>Lot Number</b>	<b>101.613</b>
<b>Formula</b>	<b>C<sub>9</sub>H<sub>12</sub>N<sub>2</sub>O<sub>15</sub>P<sub>3</sub></b>
<b>Formula Weight</b>	<b>481.11 g/mol</b>
<b>Storage</b>	<b>at -20°C</b>
<b>Stability</b>	<b>24 months from Certification Date</b>

	<b>Test</b>	<b>Specification</b>	<b>Results</b>
<b>Biophysical</b>	Appearance	clear colorless solution	conforms
	Concentration <sup>(1)</sup> (A <sub>262 nm</sub> , 22 °C, pH 7.0, ε = 9.8 l x mmol <sup>-1</sup> x cm <sup>-1</sup> )	100 mM ± 2%	101 mM
	A <sub>250 nm</sub> / A <sub>260 nm</sub> (22 °C, pH 7.0)	0.74 ± 0.03	0.72
	A <sub>280 nm</sub> / A <sub>260 nm</sub> (22 °C, pH 7.0)	0.38 ± 0.02	0.39
	pH (22 °C)	8.0 ± 0.2	8.0
<b>HPLC</b>	UTP (C18-RP-UV, 262 nm)	≥ 99.0% (area)	99.7%
	UDP (C18-RP-UV, 262 nm)	≤ 1.0% (area)	0.2%
<b>Functional</b>	in vitro Transcription (T7 RNA polymerase, 1423 bp template)	visible RNA fragment after 5 min incubation	conforms
	DNases, RNases, Nicking Activity (FRET)	not detectable	conforms
	Proteases (UV-Vis)	not detectable	conforms

Certification Date: 2017, Dezember 15

Sebastian Buegener, Quality Control