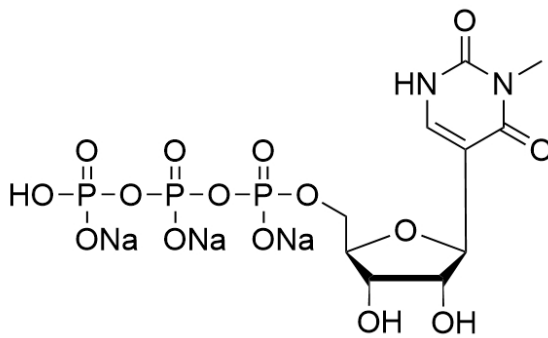


## Product Description

N1-Me-pUTP is one of the most commonly used modified nucleoside triphosphates. It introduces methylation to the pseudouridine structure, a structural analog modification that alters the conformation and immunogenicity of RNA. This modification changes the linkage between the ribose and uracil from a C-N bond to a C-C bond and adds a methyl group at the N1 position of the base. This modification effectively evades recognition by immune sensors (such as TLR3, TLR7, etc.), significantly reducing the innate immune response; it also resists nuclease degradation and enhances ribosome binding to mRNA, increasing protein translation efficiency by several to tens of times. It is primarily applied in research fields such as mRNA vaccines, gene therapy, protein replacement therapy, and cell reprogramming. This product is manufactured in accordance with GMP requirements.

## Product Information

Molecular Weight	564.11
CAS	1428903-59-6 (free acid)
Molecular Formula	C <sub>10</sub> H <sub>14</sub> N <sub>2</sub> Na <sub>3</sub> O <sub>15</sub> P <sub>3</sub>
Concentration	100 mM±3 mM
Purity	≥99% (by HPLC)
λ <sub>max</sub>	272 nm±2 nm
Structural Formula	

## Storage

Store at -20±5°C.

## Notes

1. Vortex before use. Avoid freeze-thaw cycles.
2. For your safety and health, please wear personal protective equipment, such as lab coats and disposgloves, when using this product.