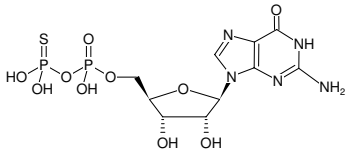
DATA SHEET

Jena Bioscience

GDPβS

Guanosine-5'-(β-thio)-diphosphate, Sodium salt

Cat. No.	Amount
NU-427-5	5 mg
NU-427-25	25 mg



Structural formula of GDPβS

For general laboratory use.

Shipping: shipped on dry ice

Storage Conditions: store at -20 °C

Shelf Life: 6 months after date of delivery

Molecular Formula: $C_{10}H_{15}N_5O_{10}P_2S$ (free acid)

Molecular Weight: 459.26 g/mol (free acid)

Exact Mass: 459.00 g/mol (free acid)

Purity: ≥ 90 % (HPLC)

Form: solid

Color: white to off-white

Spectroscopic Properties: λ_{max} 252 nm, ε 13.7 L $mmol^{-1}$ cm^{-1} (Tris-HCl pH 7.5)

Please note: For reasons of stability, please make sure that the pH value of a solution of this product never drops below 7.0. This can be achieved by dissolving the nucleotide in a buffer of your choice (50 - 100 mM, pH 7 - 10). Dissolve and adjust concentration photometrically.

Selected References:

Chang *et al.* (2005) Nitric Oxide-dependent Allosteric Inhibitory Role of a Second Nucleotide Binding Site in Soluble Guanylyl Cyclase. *J. Biol. Chem.* **280 (12)**:11513.

Balttus *et al.* (2002) Spontaneous release of GDP from Gi proteins and inhibition of adenylyl cyclase in cardiac sarcolemmal membranes. *Naunyn Schmiedebergs Arch. Pharmacol.* **365 (1)**:50.

Burgos *et al.* (2000) Guanine nucleotides block agonist-driven 45Ca2+ influx in chick embryo retinal explants. *Neuroreport.* **11 (10)**:2303.

Peterson *et al.* (1999) GTP (gammaS) and GDP (betaS) as electron donors: new wine in old bottles. *Life Sci.* **65 (11)**:1135.