

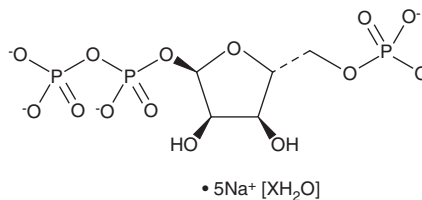
# PRODUCT INFORMATION



## 5-Phospho-D-ribose 1-diphosphate (sodium salt hydrate)

Item No. 18897

**CAS Registry No.:** 108321-05-7  
**Formal Name:** 5-(dihydrogen phosphate) 1-(trihydrogen diphosphate)  $\alpha$ -D-ribofuranose, pentasodium salt hydrate  
**Synonyms:** Phosphoribosyl Pyrophosphate, P-rib-PP, PRPP  
**MF:**  $C_5H_8O_{14}P_3 \cdot 5Na [XH_2O]$   
**FW:** 385.0  
**Purity:**  $\geq 75\%$   
**Supplied as:** A crystalline solid  
**Storage:**  $-20^\circ C$   
**Stability:**  $\geq 4$  years



Information represents the product specifications. Batch specific analytical results are provided on each certificate of analysis.

### Laboratory Procedures

5-Phospho-D-ribose 1-diphosphate (PRPP) (sodium salt hydrate) is supplied as a crystalline solid. PRPP (sodium salt hydrate) is sparingly soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide. For biological experiments, we suggest that organic solvent-free aqueous solutions of PRPP (sodium salt hydrate) be prepared by directly dissolving the crystalline solid in aqueous buffers. The solubility of PRPP (sodium salt hydrate) in PBS, pH 7.2, is approximately 10 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

PRPP is a natural intermediate involved in the pentose phosphate pathway leading to purine, pyrimidine, and histidine metabolism. It is also an intermediate in the synthesis of plant hormones, alkaloids, and other secondary metabolites from glucose. Several phosphoribosyltransferases (PRTases) use PRPP as a substrate to add a 5-phosphoribosyl group to another substrate, as in the production of adenosine monophosphate from adenine and PRPP by adenine PRTase.

#### WARNING

THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

#### SAFETY DATA

This material should be considered hazardous until further information becomes available. Do not ingest, inhale, get in eyes, on skin, or on clothing. Wash thoroughly after handling. Before use, the user must review the [complete](#) Safety Data Sheet, which has been sent via email to your institution.

#### WARRANTY AND LIMITATION OF REMEDY

Buyer agrees to purchase the material subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information can be found on our website.

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