

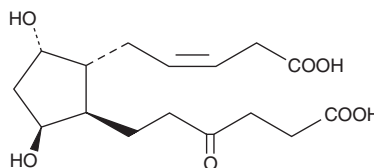
# PRODUCT INFORMATION



## PGDM

Item No. 13454

**CAS Registry No.:** 133161-96-3  
**Formal Name:** 9 $\alpha$ ,11 $\beta$ -dihydroxy-15-oxo-13,14-dihydro-2,3,18,19-tetranorprostan-1,20-dioic acid  
**Synonym:** Prostaglandin D Metabolite  
**MF:** C<sub>16</sub>H<sub>24</sub>O<sub>7</sub>  
**FW:** 328.4  
**Purity:**  $\geq$ 90% (mixture)  
**Supplied as:** A solution in methyl acetate  
**Storage:** -80°C  
**Stability:**  $\geq$ 6 months



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

### Laboratory Procedures

PGDM is supplied as a solution in methyl acetate. To change the solvent, simply evaporate the methyl acetate under a gentle stream of nitrogen and immediately add the solvent of choice. Solvents such as ethanol, DMSO, and dimethyl formamide purged with an inert gas can be used. The solubility of PGDM in these solvents is approximately 50 mg/ml.

PGDM is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, the methyl acetate solution of PGDM should be diluted with the aqueous buffer of choice. The solubility of PGDM in PBS (pH 7.2) is approximately 1 mg/ml. We do not recommend storing the aqueous solution for more than one day.

### Description

Prostaglandin D<sub>2</sub> (PGD<sub>2</sub>) plays a pharmacological role in allergic and asthmatic anaphylaxis, normal physiological sleep and lowering of body temperature, as well as inhibits platelet aggregation and relaxes vascular smooth muscle.<sup>1</sup> PGDM is a major urinary metabolite of PGD<sub>2</sub> with a unique lower sidechain that readily undergoes reversible cyclization.<sup>2</sup> It is used as a biomarker to assess endogenous production of PGD<sub>2</sub>.

### References

1. Giles, H. and Leff, P. The biology and pharmacology of PGD<sub>2</sub>. *Prostaglandins* **35**(2), 277-300 (1988).
2. Morrow, J.D., Prakash, C., Awad, J.A., *et al.* Quantification of the major urinary metabolite of prostaglandin D<sub>2</sub> by a stable isotope dilution mass spectrometric assay. *Anal. Biochem.* **193**(1), 142-148 (1991).

#### 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.

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