



SZABO SCANDIC

Part of Europa Biosite

Produktinformation



Forschungsprodukte & Biochemikalien



Zellkultur & Verbrauchsmaterial



Diagnostik & molekulare Diagnostik



Laborgeräte & Service

Weitere Information auf den folgenden Seiten!
See the following pages for more information!



Lieferung & Zahlungsart

siehe unsere [Liefer- und Versandbedingungen](#)

Zuschläge

- Mindermengenzuschlag
- Trockeneiszuschlag
- Gefahrgutzuschlag
- Expressversand

SZABO-SCANDIC HandelsgmbH

Quellenstraße 110, A-1100 Wien

T. +43(0)1 489 3961-0

F. +43(0)1 489 3961-7

mail@szabo-scandic.com

www.szabo-scandic.com

[linkedin.com/company/szaboscandic](https://www.linkedin.com/company/szaboscandic) 

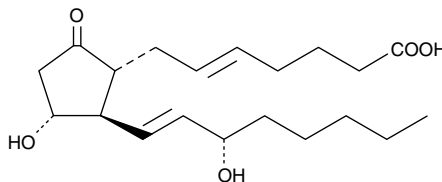
Product Information



5-*trans* Prostaglandin E₂

Item No. 14210

CAS Registry No: 36150-00-2
Formal Name: 9-oxo-11 α ,15S-dihydroxy-prosta-5E,13E-dien-1-oic acid
Synonyms: *trans*-Dinoprostone, 5,6-*trans* PGE₂
MF: C₂₀H₃₂O₅
FW: 352.5
Purity: \geq 98%
Stability: \geq 2 years at -20°C
Supplied as: A crystalline solid



Laboratory Procedures

For long term storage, we suggest that 5-*trans* PGE₂ be stored as supplied at -20°C. It should be stable for at least two years.

5-*trans* PGE₂ is supplied as a crystalline solid. A stock solution may be made by dissolving the 5-*trans* PGE₂ in an organic solvent purged with an inert gas. 5-*trans* PGE₂ is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide. The solubility of 5-*trans* PGE₂ in these solvents is approximately 100 mg/ml. 5-*trans* PGE₂ will be stable for at least six months in these solvents if stored at -20°C.

Further dilutions of the stock solution into aqueous buffers or isotonic saline should be made prior to performing biological experiments. Ensure that the residual amount of organic solvent is insignificant, since organic solvents may have physiological effects at low concentrations. Organic solvent-free aqueous solutions of 5-*trans* PGE₂ can be prepared by directly dissolving the crystalline compound in aqueous buffers. The solubility of 5-*trans* PGE₂ in PBS (pH 7.2) is approximately 5 mg/ml. We do not recommend storing the aqueous solution for more than one day.

5-*trans* PGE₂ occurs naturally in some gorgonian corals and is a common impurity in commercial lots of PGE₁.¹ It is 18 times more potent than PGE₂ in activating adenylate cyclase in NCB-20 cell homogenates.² 5-*trans* PGE₂ accelerates fibrinolysis by enhancing plasminogen activation mediated by tissue-type plasminogen activator.³ It also inhibits platelet aggregation in human PRP with an IC₅₀ of 180 nM.⁴

References

1. Bundy, G.L., Schneider, W.P., Lincoln, F.H., *et al.* Isolation of a new naturally occurring prostaglandin, 5-*trans*-PGA₂. Synthesis of 5-*trans*-PGE₂ and 5-*trans*-PGF_{2 α} . *J. Am. Chem. Soc.* **94**, 2124 (1972).
2. Hensby, C.N. and MacDermot, J. Structure-activity relationships of prostanoids that activate adenylate cyclase of neuronal hybrid cells. *Biochem. Soc. Trans.* **7**, 1302-1304 (1979).
3. Shimokawa, M., Urano, T., and Kinoshita, T. *trans*-5-Prostaglandin E₂ stimulates plasminogen activation by tissue-type plasminogen activator. *Biochim. Biophys. Acta* **1137**, 317-320 (1992).
4. Kobzar, G., Mardla, V., Järving, I., *et al.* Comparison of the inhibitory effect of E-prostaglandins in human and rabbit platelet-rich plasma and washed platelets. *Comp. Biochem. Physiol.* **106C**, 489-494 (1993).

Related Products

For a list of related products please visit: www.caymanchem.com/catalog/14210

WARNING: THIS PRODUCT IS FOR LABORATORY RESEARCH ONLY. NOT FOR ADMINISTRATION TO HUMANS. NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

SAFETY DATA

This material should be considered hazardous until information to the contrary becomes available. Do not ingest, swallow, or inhale. Do not get in eyes, on skin, or on clothing. Wash thoroughly after handling. This information contains some, but not all, of the information required for the safe and proper use of this material. 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

Cayman Chemical Company makes **no warranty or guarantee** of any kind, whether written or oral, expressed or implied, including without limitation, any warranty of fitness for a particular purpose, suitability and merchantability, which extends beyond the description of the chemicals hereof. Cayman **warrants only** to the original customer that the material will **meet our specifications at the time of delivery**.

Cayman will carry out its delivery obligations with due care and skill. Thus, in no event will Cayman have **any obligation or liability**, whether in tort (including negligence) or in contract, for any direct, indirect, incidental or consequential damages, even if Cayman is informed about their possible existence.

This limitation of liability does not apply in the case of intentional acts or negligence of Cayman, its directors or its employees.

Buyer's **exclusive remedy** and Cayman's sole liability hereunder shall be limited to a **refund** of the purchase price, or at Cayman's option, the **replacement**, at no cost to Buyer, of all material that does not meet our specifications.

Said refund or replacement is conditioned on Buyer giving written notice to Cayman within thirty (30) days after arrival of the material at its destination. Failure of Buyer to give said notice within thirty (30) days shall constitute a waiver by Buyer of all claims hereunder with respect to said material.

For further details, please refer to our **Warranty and Limitation of Remedy located on our website and in our catalog**.

Copyright Cayman Chemical Company, 08/19/2014

Cayman Chemical

Mailing address

1180 E. Ellsworth Road
Ann Arbor, MI
48108 USA

Phone

(800) 364-9897
(734) 971-3335

Fax

(734) 971-3640

E-Mail

custserv@caymanchem.com

Web

www.caymanchem.com