

PRODUCT INFORMATION



S18886

Item No. 14059

CAS Registry No.: 165538-40-9
Formal Name: (6R)-6-[[[(4-chlorophenyl)sulfonyl]amino]-5,6,7,8-tetrahydro-2-methyl-1-naphthalenepropanoic

Synonyms: Terutroban, Triplion

MF: C₂₀H₂₂ClNO₄S

FW: 407.9

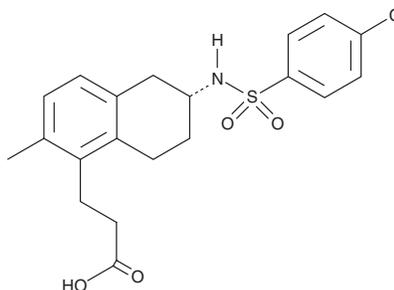
Purity: ≥98%

UV/Vis.: λ_{max}: 223 nm

Supplied as: A crystalline solid

Storage: -20°C

Stability: ≥4 years



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

Laboratory Procedures

S18886 is supplied as a crystalline solid. A stock solution may be made by dissolving the S18886 in the solvent of choice, which should be purged with an inert gas. S18886 is soluble in organic solvents such as ethanol, DMSO, and dimethyl formamide (DMF). The solubility of S18886 in ethanol is approximately 2 mg/ml, and approximately 30 mg/ml in DMSO and DMF.

S18886 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, S18886 should first be dissolved in DMSO and then diluted with the aqueous buffer of choice. S18886 has a solubility of approximately 0.5 mg/ml in a 1:1 solution of DMSO:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

The lipid mediator thromboxane A₂ (TXA₂) plays a key role in platelet aggregation and vascular and bronchial smooth muscle constriction. The actions of TXA₂ are mediated by its specific G protein coupled-receptor, referred to as the TXA₂ receptor or TP. S18886 is an orally active, long-acting antagonist of the TP receptor with an IC₅₀ value of 16.4 nM.¹ It inhibits TP receptor-mediated vascular contractions, platelet aggregation, and adhesion and infiltration of monocytes/macrophages in various pre-clinical and clinical models of thrombosis or atherosclerosis.²⁻⁵ S18886 is the active isomer of the potent TP receptor antagonist, S18204.⁶ Antagonists of TP receptors have advantages over aspirin (Item No. 70260) as they not only block the effect of TXA₂ on platelets, but also inhibit other ligands such as prostaglandin endoperoxides and isoprostanes.^{2,5}

References

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2. Jones, R.L., Giembycz, M.A., and Woodward, D.F. *Br. J. Pharmacol.* **158**(1), 104-145 (2009).
3. Hong, T.-T., Huang, J., Driscoll, E., *et al.* *J. Cardiovasc. Pharmacol.* **48**(5), 239-248 (2006).
4. Osende, J.I., Shimbo, D., Fuster, V., *et al.* *J. Thromb. Haemost.* **2**(3), 492-498 (2004).
5. Cayatte, A.J., Du, Y., Oliver-Krasinski, J., *et al.* *Arterioscler. Thromb. Vasc. Biol.* **20**(7), 1724-1728 (2000).
6. Simonet, S., Descombes, J.-J., Vallez, M.O., *et al.* *Adv. Exp. Med. Biol.* **433**, 173-176 (1997).

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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