

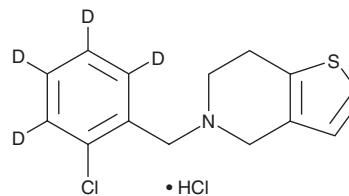
PRODUCT INFORMATION



Ticlopidine-d₄ (hydrochloride)

Item No. 33467

CAS Registry No.: 2932627-17-1
Formal Name: 5-[(2-chlorophenyl-d₄)methyl]-4,5,6,7-tetrahydrothieno[3,2-c]pyridine, monohydrochloride
MF: C₁₄H₁₀ClD₄NS • HCl
FW: 304.3
Chemical Purity: ≥98% (Ticlopidine)
Deuterium Incorporation: ≥99% deuterated forms (d₁-d₄); ≤1% d₀
Supplied as: A 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

Ticlopidine-d₄ (hydrochloride) is intended for use as an internal standard for the quantification of ticlopidine (Item No. 20770) by GC- or LC-MS. The accuracy of the sample weight in this vial is between 5% over and 2% under the amount shown on the vial. If better precision is required, the deuterated standard should be quantitated against a more precisely weighed unlabeled standard by constructing a standard curve of peak intensity ratios (deuterated versus unlabeled).

Ticlopidine-d₄ (hydrochloride) is supplied as a solid. A stock solution may be made by dissolving the ticlopidine-d₄ (hydrochloride) in the solvent of choice, which should be purged with an inert gas. Ticlopidine-d₄ (hydrochloride) is soluble in methanol and DMSO.

Description

Ticlopidine is a thienopyridine P2Y₁₂ receptor antagonist.¹ It inhibits aggregation of human platelets induced by collagen, arachidonic acid (Item No. 90010), and ADP (Item No. 16778; IC₅₀s = 75, 600, and 1,300 μM, respectively).² It also inhibits ADP-induced aggregation of rat platelets and decreases thrombus weight *in vivo* in a rat model of arterio-venous shunt thrombosis when administered at a dose of 100 mg/kg.³ Ticlopidine (300 mg/kg) inhibits healing of acetic acid-induced gastric ulcers in rats.⁴ Formulations containing ticlopidine have been used in the prevention of thrombotic stroke.

References

1. Porto, I., Giubilato, S., De Maria, G.L., *et al.* Platelet P2Y₁₂ receptor inhibition by thienopyridines: Status and future. *Expert Opin. Investig. Drugs* **18**(9), 1317-1332 (2009).
2. Bruno, J.J. The mechanisms of action of ticlopidine. *Thromb. Res. Suppl.* **4**, 59-67 (1983).
3. Sugidachi, A., Asai, F., Ogawa, T., *et al.* The *in vivo* pharmacological profile of CS-747, a novel antiplatelet agent with platelet ADP receptor antagonist properties. *Br. J. Pharmacol.* **129**(7), 1439-1446 (2000).
4. Ma, L., Elliott, S.N., Cirino, G., *et al.* Platelets modulate gastric ulcer healing: Role of endostatin and vascular endothelial growth factor release. *Proc. Nat. Acad. Sci. USA* **98**(11), 6470-6475 (2001).

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.

Copyright Cayman Chemical Company, 09/06/2023

CAYMAN CHEMICAL

1180 EAST ELLSWORTH RD
ANN ARBOR, MI 48108 · USA

PHONE: [800] 364-9897
[734] 971-3335

FAX: [734] 971-3640

CUSTSERV@CAYMANCHEM.COM
WWW.CAYMANCHEM.COM