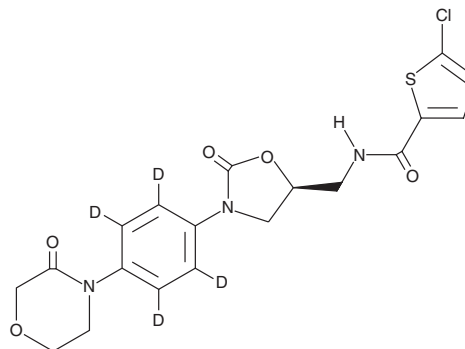


PRODUCT INFORMATION



Rivaroxaban-d₄ Item No. 22563

CAS Registry No.: 1132681-38-9
Formal Name: 5-chloro-N-[[[(5S)-2-oxo-3-[4-(3-oxo-4-morpholinyl)phenyl]-2,3,5,6-d₄]-5-oxazolidinyl]methyl]-2-thiophenecarboxamide
MF: C₁₉H₁₄ClD₄N₃O₅S
FW: 439.9
Chemical Purity: ≥98% (Rivaroxaban)
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

Rivaroxaban-d₄ is intended for use as an internal standard for the quantification of rivaroxaban (Item No. 16043) 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).

Rivaroxaban-d₄ is supplied as a solid. A stock solution may be made by dissolving the rivaroxaban-d₄ in the solvent of choice, which should be purged with an inert gas. Rivaroxaban-d₄ is soluble in the organic solvent DMSO.

Description

Rivaroxaban is an orally active, direct inhibitor of Factor Xa (K_i = 0.4 nM), which is a crucial component of the intrinsic and extrinsic pathways of the blood coagulation cascade.¹ It demonstrates >10,000-fold greater selectivity for Factor Xa compared to other related serine proteases. In various animal arterial and venous thrombosis models, rivaroxaban is reported to inhibit thrombin formation without prolonging bleeding time. Formulations containing rivaroxaban have been used as an anticoagulant in the prevention of stroke and the treatment of venous thromboembolisms.^{2,3}

References

1. Turpie, A.G.G. Oral, direct factor Xa inhibitors in development for the prevention and treatment of thromboembolic diseases. *Arterioscler. Thromb. Vasc. Biol.* **27(6)**, 1238-1247 (2007).
2. Babilonia, K. and Trujillo, T. The role of prothrombin complex concentrates in reversal of target specific anticoagulants. *Thromb. J.* **12:8** (2014).
3. Turpie, A.G.G. Rivaroxaban as an oral anticoagulant for stroke prevention in atrial fibrillation. *Ther. Clin. Risk Manag.* **10**, 197-205 (2014).

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

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