

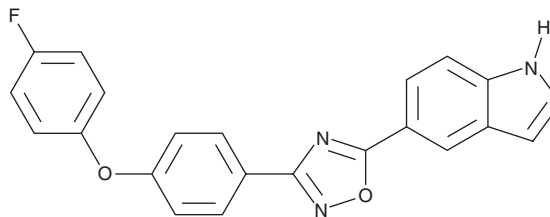
PRODUCT INFORMATION



CAY10742

Item No. 29800

CAS Registry No.: 1649473-91-5
Formal Name: 5-[3-[4-(4-fluorophenoxy)phenyl]-1,2,4-oxadiazol-5-yl]-1H-indole
MF: C₂₂H₁₄FN₃O₂
FW: 371.4
Purity: ≥98%
UV/Vis.: λ_{max}: 262 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

CAY10742 is supplied as a crystalline solid. A stock solution may be made by dissolving the CAY10742 in the solvent of choice, which should be purged with an inert gas. CAY10742 is soluble in organic solvents such as DMSO and dimethyl formamide (DMF). The solubility of CAY10742 in these solvents is approximately 10 and 11 mg/ml, respectively.

CAY10742 is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, CAY10742 should first be dissolved in DMF and then diluted with the aqueous buffer of choice. CAY10742 has a solubility of approximately 0.3 mg/ml in a 1:2 solution of DMF:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

Description

CAY10742 is an orally bioavailable oxadiazole antibiotic.¹ It is active against the Gram-positive bacteria *S. aureus*, *S. epidermidis*, *S. haemolyticus*, *B. cereus*, *B. licheniformis*, *E. faecalis*, and *E. faecium* (MICs = 1-4 µg/ml), including laboratory strains and clinical isolates with varying degrees of resistance to methicillin, vancomycin, linezolid, and other antibiotics. CAY10742 (40 mg/kg) reduces the number of bacteria in mouse neutropenic thigh models of linezolid-sensitive or -resistant methicillin-resistant *S. aureus* (MRSA) infection.

Reference

1. Boudreau, M.A., Ding, D., Meisel, J.E., *et al.* Structure-activity relationship for the oxadiazole class of antibacterials. *Med. Chem. Lett.* **11**(3), 322-326 (2019).

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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