

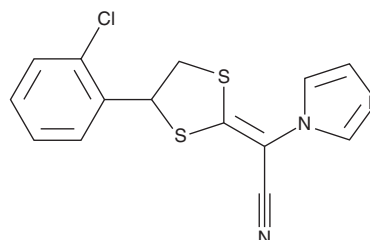
PRODUCT INFORMATION



Lanoconazole

Item No. 42532

CAS Registry No.: 101530-10-3
Formal Name: αE-[4-(2-chlorophenyl)-1,3-dithiolan-2-ylidene]-1H-imidazole-1-acetonitrile
Synonyms: NND-318, TJN-318
MF: C₁₄H₁₀ClN₃S₂
FW: 319.8
Purity: ≥98%
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

Lanoconazole is supplied as a solid. A stock solution may be made by dissolving the lanoconazole in the solvent of choice, which should be purged with an inert gas. Lanoconazole is soluble (≥10 mg/ml) in DMSO.

Description

Lanoconazole is an imidazole antifungal agent.¹ It is active against several strains of *T. mentagrophytes* and *T. rubrum* (mean MICs = 0.025 and 0.0054 µg/ml, respectively). Lanoconazole (10 µM) inhibits *S. cerevisiae* β-glucan-induced IL-8 release in primary human epidermal keratinocytes and phytohemagglutinin-induced IFN-γ and IL-2 release in primary human peripheral blood mononuclear cells (PBMCs).² *In vivo*, lanoconazole (20 µl of a 3% solution) decreases ear thickness in a mouse model of irritant dermatitis induced by phorbol 12-myristate 13-acetate (TPA; Item No. 10008014). Topical application of lanoconazole (0.5%) decreases *T. mentagrophytes* infection score intensity in a guinea pig model of tinea pedis.¹

References

1. Niwano, Y., Kuzuhara, N., Kodama, J., *et al.* In vitro and in vivo antidermatophyte activities of NND-502, a novel optically active imidazole antimycotic agent. *Antimicrob. Agents and Chemother.* **42(4)**, 967-970 (1998).
2. Uratsuji, H., Nakamura, A., Yamada, Y., *et al.* Anti-inflammatory activity of lanoconazole, a topical antifungal agent. *Mycoses* **58(4)**, 197-202 (2015).

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, 01/13/2025

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