

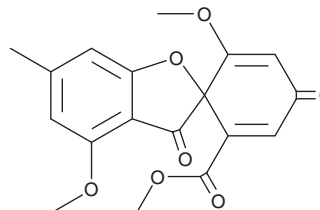
PRODUCT INFORMATION



Trypacidin

Item No. 33079

CAS Registry No.: 1900-29-4
Formal Name: (-)-4,6'-dimethoxy-6-methyl-3,4'-dioxo-spiro[benzofuran-2(3H),1'-[2,5]cyclohexadiene]-2'-carboxylic acid, methyl ester
MF: $C_{18}H_{16}O_7$
FW: 344.3
Purity: $\geq 95\%$
Supplied as: A solid
Storage: -20°C
Stability: ≥ 4 years
Item Origin: Fungus/*Aspergillus* sp.



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

Laboratory Procedures

Trypacidin is supplied as a solid. A stock solution may be made by dissolving the trypacidin in the solvent of choice, which should be purged with an inert gas. Trypacidin is soluble in organic solvents such as methanol and DMSO.

Description

Trypacidin is a fungal metabolite originally isolated from *A. fumigatus*.¹ It is active against *B. subtilis* and *M. bovis* (MICs = 12.5 and 1.25 $\mu\text{g/ml}$, respectively), as well as *T. cruzi* and *T. gondii* (MICs = 5-10 and 10-20 $\mu\text{g/ml}$, respectively).^{1,2} It reduces viability and induces lysis of A549 human lung cancer cells ($\text{IC}_{50}\text{s} = 7.4 \mu\text{M}$ for both).³ Trypacidin increases survival in a mouse model of *T. gondii* infection when administered in six doses of 12.5 mg/kg each.¹

References

1. Balan, J., Ebringer, L., Nemec, P., *et al.* Antiprotozoal antibiotics. II. Isolation and characterization of trypacidin, a new antibiotic, active against *Trypanosoma cruzi* and *Toxoplasma gondii*. *J. Antibiot. (Tokyo)* **16**, 157-160 (1963).
2. Song, Z., Liu, Y., Gao, J., *et al.* Antitubercular metabolites from the marine-derived fungus strain *Aspergillus fumigatus* MF029. *Nat. Prod. Res.* 1-8 (2019).
3. Gauthier, T., Wang, X., Dos Santos, J.S., *et al.* Trypacidin, a spore-borne toxin from *Aspergillus fumigatus*, is cytotoxic to lung cells. *PLoS One* **7**(2), e29906 (2012).

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, 08/11/2023

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