# PRODUCT INFORMATION



## Isavuconazonium (sulfate)

Item No. 23950

CAS Registry No.: 946075-13-4

Formal Name: N-methyl-glycine, [2-[[[1-[1-[(2R,3R)-

3-[4-(4-cyanophenyl)-2-thiazolyl]-2-(2,5-difluorophenyl)-2-hydroxybutyl]-4H-1,2,4-triazolium-4-yl]ethoxy] carbonyl]methylamino]-3-pyridinyl]

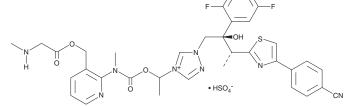
methyl ester, monosulfate

MF:  $C_{35}H_{35}F_{2}N_{8}O_{5}S \bullet HO_{4}S$ FW: 814.8 **Purity:** 

UV/Vis.:  $\lambda_{max}$ : 273 nm Supplied as: A crystalline solid

-20°C Storage: Stability: ≥4 years

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



### **Laboratory Procedures**

Isavuconazonium (sulfate) is supplied as a crystalline solid. A stock solution may be made by dissolving the isavuconazonium (sulfate) in the solvent of choice, which should be purged with an inert gas. Isavuconazonium (sulfate) is soluble in organic solvents such as ethanol and DMSO. The solubility of isavuconazonium (sulfate) in these solvents is approximately 10 and 20 mg/ml, respectively.

Isavuconazonium (sulfate) is sparingly soluble in aqueous buffers. For maximum solubility in aqueous buffers, isavuconazonium (sulfate) should first be dissolved in DMSO and then diluted with the aqueous buffer of choice. Isavuconazonium (sulfate) has a solubility of approximately 0.16 mg/ml in a 1:5 solution of DMSO:PBS (pH 7.2) using this method. We do not recommend storing the aqueous solution for more than one day.

## Description

Isavuconazonium is a prodrug form of the azole antifungal isavuconazole (ISA).<sup>1</sup> Oral administration of isavuconazonium increases survival in rat models of azole-susceptible and -resistant A. fumigatus infection when administered at doses ranging from 0.25 to 512 mg/kg per day (ISA-equivalent = 0.12-245.8 mg/kg per day). Isavuconazonium reduces fungal burden and organism-mediated pulmonary injury and increases survival in a rabbit model of experimental invasive pulmonary aspergillosis when administered at ISA-equivalent doses ranging from 40 to 60 mg/kg.<sup>2</sup>

#### References

- 1. Seyedmousavi, S., Brüggemann, R.J.M., Meis, J.F., et al. Pharmacodynamics of isavuconazole in an Aspergillus fumigatus mouse infection model. Antimicrob. Agents Chemother. 59(5), 2855-2866 (2015).
- 2. Petraitis, V., Petraitiene, R., Moradi, P.W., et al. Pharmacokinetics and concentration-dependent efficacy of isavuconazole for treatment of experimental invasive pulmonary aspergillosis. Antimicrob. Agents Chemother. 60(5), 2718-2726 (2016).

WARNING
THIS PRODUCT IS FOR RESEARCH ONLY - NOT FOR HUMAN OR VETERINARY DIAGNOSTIC OR THERAPEUTIC USE.

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

subject to Cayman's Terms and Conditions. Complete Terms and Conditions including Warranty and Limitation of Liability information Buyer agrees to purchase the material can be found on our website.

Copyright Cayman Chemical Company, 12/13/2022

#### **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