PRODUCT INFORMATION



Tobramycin

Item No. 14596

CAS Registry No.: 32986-56-4

Formal Name: O-3-amino-3-deoxy-α-D-glucopyranosyl-

> $(1\rightarrow 6)$ -O-[2,6-diamino-2,3,6-trideoxy- α -D-ribohexopyranosyl-(1→4)]-2-deoxy-D-streptamine

Synonyms: Deoxykanamycin B, Distobram, Gernebcin,

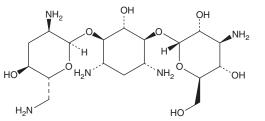
NSC 180514

MF: $C_{18}H_{37}N_5O_9$ 467.5 FW: ≥98% **Purity:**

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

Tobramycin is supplied as a crystalline solid. Aqueous solutions of tobramycin can be prepared by directly dissolving the solid in aqueous buffers. The solubility of tobramycin in PBS (pH 7.2) is approximately 10 mg/ml. We do not recommend storing the aqueous solution for more than one day.

Description

Tobramycin is an aminoglycoside antibiotic.¹ It binds to the 30S ribosomal subunit, inhibiting protein synthesis. Tobramycin is active against a variety of Gram-positive and Gram-negative bacteria, including several strains of S. aureus, P. aeruginosa, E. coli, K. pneumoniae, and Enterobacter (mean MICs = 0.2, 0.6, 1.2, 0.8, and 0.8 µg/ml, respectively). It reduces the number of colony forming units (CFUs) in several mouse models of thigh infection.² Formulations containing tobramycin have been used in the treatment of Gram-positive and Gram-negative bacterial infections.

References

- 1. Neu, H.C. Tobramycin: An overview. J. Infect. Dis. 134 Suppl. S3-S19 (1976).
- 2. Fantin, B., Leggett, J., Ebert, S., et al. Correlation between in vitro and in vivo activity of antimicrobial agents against gram-negative bacilli in a murine infection model. Antimicrob. Agents Chemother. 35(7), 1413-1422 (1991).

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.

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