

Kanamycin, HRP conjugate

DAG1208

Lot. No. (See product label)

PRODUCT INFORMATION

Product overview	Kanamycin, HRP conjugate
Antigen Description	Aminoglycosides are a family of bacterial antibiotics that are used in the treatment of specific bacterial infections. They display a concentration dependent killing action and are active against a wide range of aerobic Gram-negative bacilli. Aminoglycosides are molecules that are comprised of an amino group and a sugar group. They operate by inhibiting the bacteria from producing proteins vital to its growth. More specifically, they bind to the bacterial 30S ribosomal subunit where they prevent the translocation of the peptidyl-tRNA from the A-site to the P-site, subsequently giving rise to a misreading of mRNA resulting in the inhibition of protein synthesis. This consequently results in a disruption to the integrity of the bacterial cell membrane. In addition to their use to prevent bacterial infection, aminoglycosides have been used as growth promoters in food producing animals.
Source	Antimicrobial Drugs
Conjugate	HRP
Form	concentrate
Characteristic	Each conjugate comprises antigen covalently bound to horseradish peroxide and is suitable as a tracer in immunoassay development

PACKAGING

Storage	Can be stored at 2-8°C for up to 3 months and at -20°C for longer term storage.
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BACKGROUND

Introduction	Kanamycin (also known as kanamycin A) is an aminoglycoside antibiotic, available in oral, intravenous, and intramuscular forms, and used to treat a wide variety of infections. Kanamycin is isolated from the bacterium <i>Streptomyces kanamyceticus</i> and used in form of the sulfate.
Keywords	Kanamycin; kanamycin A; 2-(aminomethyl)- 6-[4,6-diamino-3- [4-amino-3,5-dihydroxy-6-(hydroxymethyl) tetrahydropyran-2-yl]oxy- 2-hydroxy- cyclohexoxy]- tetrahydropyran- 3,4,5-triol; D-streptomine; C00304

REFERENCES

1. "Aminoglycosides: Bacteria and Antibacterial Drugs: Merck Manual Professional". 2. Aminoglycosides versus bacteria--a description of the action, resistance mechanism, and nosocomial battleground. J Biomed Sci. 2008 Jan,15(1):5-14.