

Bacitracin, HRP conjugate

Cat.No:DAG1043

Lot. No. (See product label)

PRODUCT INFORMATION

Storage	Can be stored at 2-8°C for up to 3 months and at -20°C for longer term storage.
Antigen Description	Bacitracin is a mixture of related cyclic polypeptides produced by a member of the <i>Bacillus subtilis</i> group. Unlike most antibiotics its use is limited in oral administration and typical methods of application are by adsorption through the skin where the drug degrades the bacterial cell wall in Gram positive bacteria by blocking the dephosphorylation of the C55-isoprenyl pyrophosphate, an important molecule in the process of building the bacterial cell wall. Its main application is for fowl animals such as chickens in the form of an antibiotic drug and no MRLs have yet been established for this drug.
conjugate	HRP
Source	Antimicrobial Drugs
Form	concentrate
Characteristic	Each conjugate comprises antigen covalently bound to horseradish peroxide and is suitable as a tracer in immunoassay development

Background

Introduction	Bacitracin is a mixture of related cyclic polypeptides produced by organisms of the licheniformis group of <i>Bacillus subtilis</i> var Tracy, isolation of which was first reported in 1945. As a toxic and difficult-to-use antibiotic, bacitracin does not work well orally. However, it is very effective topically, and is a common ingredient of eye and skin antibiotic preparations. Its action is on Gram-positive cell walls. It can cause contact dermatitis and cross-reacts with allergic sensitivity to sulfa-drugs. When given intramuscularly, bacitracin's absorption is rapid and complete, but its nephrotoxicity (kidney damage potential) has limited its use to infants only, and then in very specific circumstances. In 2010 it was approved by the US FDA by this route for the very narrow indication of treatment of infants with staphylococcal pneumonia and empyema when due to organisms shown to be susceptible to bacitracin. It can only be used where adequate laboratory facilities are available for checking the drug's concentration in blood.
Keywords	ayfivin; baciguent; baciliquin; bacitekointment; mycitracinpluspainreliever; penitracin; Ginebatin; Bacitracin