

Erythromycin

Cell Culture Tested

Product Code: TC024

Product Description:

Molecular Weight: 733.93

Molecular Formula: $C_{37}H_{67}NO_{13}$

CAS No: 114-07-8

Synonym: E-Mycin, Erythrocin

Erythromycin is a macrolide antibiotic produced by *Streptomyces erythreus*. It is a broad spectrum antibiotic with bacteriostatic action against a wide range of Gram positive and to a lesser extent some Gram negative bacteria, *Mycoplasma* spp, *Chlamydia*, *Rickettsia* spp. and Spirochetes.

Erythromycin inhibits protein synthesis by binding reversibly to the 50S subunit of the ribosome, resulting in blockage of the transpeptidation or translocation reactions. Erythromycin interferes with aminoacyl translocation, preventing the transfer of tRNA bound at the A site to the P site of rRNA complex.

In cell culture, Erythromycin is used as an antibacterial agent to prevent contamination.

Directions:

Preparation instructions:

For cell culture applications, Erythromycin solutions can be prepared as per required concentrations in water, ethanol and 2N hydrochloric acid.

Solutions can be sterilized by filtering through a sterile membrane filter with porosity of 0.22 microns or less.

Quality Control:

Appearance

Colorless or white to yellow hygroscopic crystals or powder.

Solubility

Clear, colorless solution at 1 gm in 100 ml of ethanol.

Antibiotic sensitivity Test

Passes

Potency

NLT 850 µg/mg

Assay (HPLC)

NLT 98%

Cell Culture Test

Passes

Storage and Shelf Life:

Store below 30°C in air tight containers and away from bright light.

Store the stock solution of Erythromycin at 2 - 8°C.

Shelf life is 36 months.

Use before expiry date given on the product label.

Disclaimer :

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