

ANALOGUE SET DATA SHEET

Code No.: BIA-MS5011

Tetracycline Degradation Set

Specifications

Each set contains 1 x 1mg vial of each of the following products:

| Vial # | Compound | Code No. | CAS# | Mol. Formula | Mol. Wt. |
|--------|--------------------------------------|-----------|------------|---|----------|
| 1 | Tetracycline | BIA-T1334 | 60-54-8 | $C_{22}H_{24}N_2O_8$ | 444.4 |
| 2 | Anhydrotetracycline hydrochloride | BIA-A1340 | 13803-65-1 | C ₂₂ H ₂₃ CIN ₂ O ₇ | 462.9 |
| 3 | Epianhydrotetracycline hydrochloride | BIA-E1341 | 4465-65-0 | C22H23CIN2O7 | 462.9 |
| 4 | Epitetracycline hydrochloride | BIA-E1339 | 23313-80-6 | C ₂₂ H ₂₅ CIN ₂ O ₈ | 480.9 |

Long Term Storage : -20°C, protect from light

Stability : Stable for more than 1 year when stored at -20°C, protected from light

Short Term Storage : Stable at ambient temperature for 1-2 weeks, protected from light

Shipping : Ambient temperature

Purity : Minimum purity of >95% by HPLC

Solubility : Methanol, ethanol, DMSO and water

Product Description: Tetracycline is a potent broad spectrum antibiotic that has played a pivotal role in human and animal health for over 60 years. Tetracycline is a linear tetracycle which can be degraded under various conditions, such as acidity, alkalinity, heat, oxidation, light and temperature. The degradation products are not biologically inert; rather, they are oxidative and isomeric analogues with unique physical and chemical properties that are not well characterised. The Tetracycline Degradation Set provides the major degradation products described in the literature as a tool for understanding and monitoring the fate of tetracycline on storage and in biological systems.

Updated: 8 September 2014