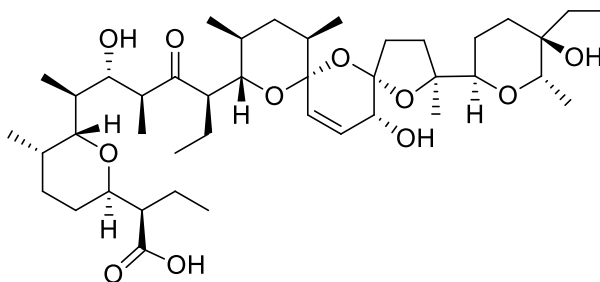


Salinomycin

Code No.: **BIA-S1307**

Pack sizes: **5 mg, 25 mg**



Synonyms : Eustin, AHR 3096, K 364, 61477

Specifications

CAS #	: 53003-10-4
Molecular Formula	: C₄₂H₇₀O₁₁
Molecular Weight	: 751
Source	: <i>Streptomyces</i> sp.
Appearance	: White solid
Purity	: >95% by HPLC
Long Term Storage	: -20°C
Solubility	: Soluble in ethanol, methanol, DMF or DMSO. Poor water solubility.

Application Notes

Salinomycin is a polyether ionophore with broad spectrum Gram positive and anti-coccidial activity. Salinomycin has a high affinity for monovalent cations, particularly potassium. Salinomycin is used to control coccidia in animals and for growth promotion in ruminants. Recently, salinomycin has been shown to inhibit cancer stem cells and is >100 times more potent than taxol. While the mechanism of action is unknown, it was noted that among the 60,000 compounds screened, another monovalent ionophore, nigericin, and a chloride channel inhibitor, avermectin, were also active.

References

1. Salinomycin, a new polyether antibiotic. Miyazaki Y. et al., J. Antibiot. 1974, 27, 814.
2. The structure of salinomycin, a new member of the polyether antibiotics. Kinashi H. Tetrahed. Lett. 1973, 49, 4955.
3. Identification of selective inhibitors of cancer stem cells by high-throughput screening. Gupta P. B. et al., Cell 2009, 138, 645.