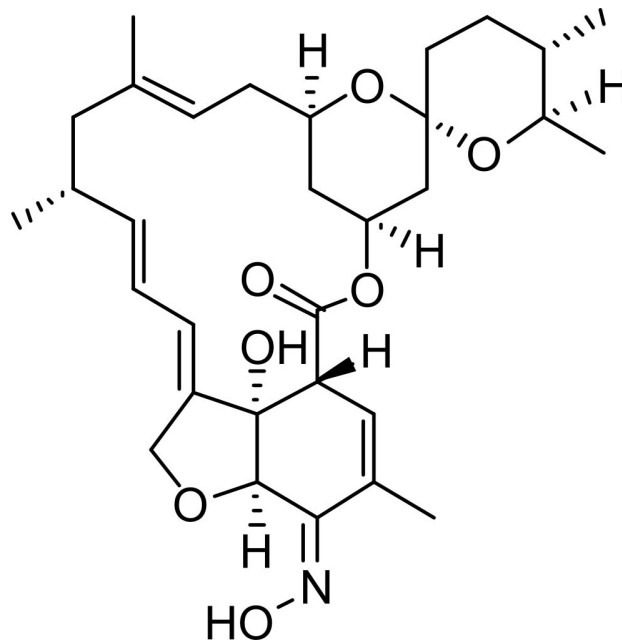


Milbemycin A3 oxime

Code No.: BIA-M1531

Pack sizes.: 1mg, 5mg



Synonyms:

5-Oxomilbemycin A3 oxime

Specifications

CAS #	: 114177-14-9
Molecular Formula	: C31H43NO7
Molecular Weight	: 541.7
Source	: -
Appearance	: White solid
Purity	: >99% by HPLC
Long Term Storage	: -20°C
Solubility	: Soluble in ethanol, methanol, DMF or DMSO. Poor water solubility.

Application Notes

Milbemycin A3 oxime is a semi-synthetic macrocyclic lactone prepared by the oxidation and oximation of milbemycin A3. Milbemycin A3 oxime is the minor component (~30%) in the commercial product milbemycin oxime, marketed for endo- and exo-parasite infections. Like the other milbemycin/avermectins, milbemycin A3 oxime acts by opening glutamate sensitive chloride channels in neurons of invertebrates leading to paralysis by hyperpolarisation of these cells and signal transfer blocking.

References

1. Synthesis of 5-keto-5-oxime derivatives of milbemycins and their activities against microfilariae. Tsukamoto Y. et al., *Agric. Biol. Chem.* 1991, 55, 2615.
2. Effects of milbemycin on adult *Toxocara canis* in dogs with experimentally induced infection. Bowman D.D. et al., *Am. J. Vet. Res.* 1988, 49, 1986.