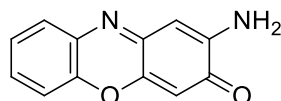


Questioniomycin A

Code No.: **BIA-Q1525**

Pack sizes: **1 mg, 5 mg**



Synonyms : 2-Amino-3H-phenoxazin-3-one, 2-Aminophenoxazone, AV Toxin C, NSC 94945

Specifications

CAS #	: 1916-59-2
Molecular Formula	: C ₁₂ H ₈ N ₂ O ₂
Molecular Weight	: 212.2
Source	: Unidentified fungus
Appearance	: Red to red brown solid
Purity	: >95% by HPLC
Long Term Storage	: -20°C
Solubility	: Soluble in ethanol, methanol, DMF or DMSO. Limited water solubility.

Application Notes

Questioniomycin A is a phenoxazine produced by several *Streptomyces* species and some fungi and bacteria. Questioniomycin A is weakly active against bacteria, fungi, plants and tumor cell lines, and inhibits aromatase and sulfatases. Questioniomycin, like other phenoxazines, stimulates cell growth and turnover in vitro, an activity possibly related to their ability to form stable free radicals. More recently, questioniomycin A has been shown to inhibit pulmonary metastasis caused by mouse melanoma cells. Questioniomycin A and related phenoxazines are important dereplication standards in discovery research to eliminate leads due to high amounts of weakly potent actives.

References

1. The new antibiotics, questioniomycins A and B. Anzai K. et al., J. Antibiot. 1960, 13, 125.
2. Studies on cell growth stimulating substances of low molecular weight. Imai S. et al., J. Antibiot. 1993, 46, 1232.
3. 2-Aminophenoxazine-3-one prevents pulmonary metastasis of mouse B16 melanoma cells in mice. Hongo T. J. Pharmacol. Sci. 2010, 114, 63.