



Monensin Sodium Salt PRODUCT DATA SHEET

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Product Name:	Monensin Sodium Salt
Product Number:	M083
CAS Number:	22373-78-0
Molecular Formula:	$C_{36}H_{61}NaO_{11}$
Molecular Weight:	692.85
Solubility:	Soluble in chloroform, methanol, and other organic solvents and only slightly soluble in water.
Source:	Streptomyces cinnamomensis.
Description:	<p>Monensin is a naturally occurring ionophore, commonly used in ruminant animal feed as a nonhormonal growth promoter and coccidiostat. It is a polyether antibiotic used against Gram-negative bacteria and has antiparasitic activity for dystentery prevention.</p> <p>Monensin Sodium Salt is soluble in chloroform, methanol, and other organic solvents and only slightly soluble in water.</p> <p>This product is considered a dangerous good. Quantities above 1 g may be subject to additional shipping fees. Please contact us for questions.</p>
Mechanism of Action:	As an ionophore, Monensin can disrupt the natural ion gradients such as Ca^{2+} , Mg^{2+} , K^+ and Na^+ , and affect transmembrane ion transport.

References:

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Griffiths G, Quinn P, Warren G (1983) Dissection of the Golgi complex. I. Monensin inhibits the transport of viral membrane proteins from medial to trans Golgi cisternae in baby hamster kidney cells infected with Semliki Forest virus. *J Cell Biol.* 1983 Mar;96(3):835-50. PMID 6682112

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