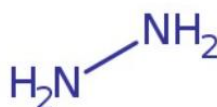


Morpholine



CAS No.	110-91-8	EINECS No.	203-815-1
Molecular Formula	C ₄ H ₉ NO	Molecular Weight	87.12

Structural Formula



Product Features

Colorless liquid at room temperature, with hygroscopic and special amine taste, Morpholine can be miscible with water in any proportion, easily soluble in aromatics, alcohols, ketones, ethers and organic solvents, slightly soluble in mineral oil and aliphatic hydrocarbons, with slight toxicity. Morpholine reacts with inorganic acids to form salts, and with organic acids to form salts or amides. Morpholine can react with ethylene oxide and ketone or set off Alkylated reaction or Willgerodt reaction.

Technical Specification




Parameter	Standard
Active content, %	99% min
Boiling range(5-95%), °C	126-130
Color (APHA)	10 max
Moisture %	0.3 max

Applications & Usage



Morpholine is mainly used to manufacture rubber accelerant (such as NOBS, OTOS and MDS), sulfuration agent (like DT-DM), cleanser, descaling agent, antirust, anti-scorching agent, antiseptic, surfactant, textile printing & dyeing agent, optical bleaching agent, chemical plating bath, antioxidant, hydrolyzing agent, initiator, developer, fruit preserving agent, deodorizer, brightener and organic solvents. Morpholine is widely used in many industries such as medicine, pesticide, animal medicine, petroleum and extraction of coke aromatic hydrocarbont.

In foreign countries, a great deal of Morpholine is used for antirust, descaling and metal cleaning, especially for antirust and anticorrosive in high temperature conditions. In boiler maintenance fields, amount of Morpholine is also used as descaling agent. Owing to its unique chemical characters, Morpholine has become one of the most important fine petroleum chemical products.

Package & Storage

200L plastic Drum	200L Galvanized Iron Drum	ISO Tank
		
Storage for 12 months in shady room and dry place.		

Hazard & Safety Precaution

Hazard Information	Safety Precaution
 Flammable , Corrosive Class 8(3) , UN2054	
Once contacted with eye and skin, flush with plenty of clean water.	

Alternative Name / Synonyms

- 1-Oxa-4-azacyclohexane
- Diethylene imidoxide
- Diethyleneimide oxide