



*Specialized in chemicals*

Hefei TNJ Chemical Industry Co.,Ltd.

B911 Xincheng Business Center,  
Qianshan Rd. Hefei 230022 China

Tel : (0086) 551 5418695

Fax: (0086) 551 5418697

Email: info@tnjchem.com

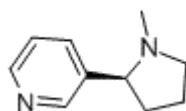
Site: www.tnjchem.com

## Technical Data Sheet

# Nicotine

### Product Information

Product Name	Nicotine
Synonyms	L-Nicotine;
CAS No.	54-11-5
EINECS No.	200-193-3
Molecular formula	C <sub>10</sub> H <sub>14</sub> N <sub>2</sub>
Molecular weight	162.23
Chemical structure	



### Physical Properties

Colorless to light yellow oily liquid. In less than 60 °C with water immiscible, easily soluble in alcohol, ether, chloroform and petroleum ether. A pyridine smelly and focal spicy, easy to moisture absorption, in air or light brown gradually. Along with the water vapor volatile.

Density	1.010g/mL at 20°C
Melting Point	-80°C
Boiling Point	243-248°C
Flashing Point	215°F
Refractive Index	1.5265
Specific optical rotation	-166° (c=neat)
Solubility	ethanol: 50 mg/mL
Water solubility	miscible
Sensitivity	Air Sensitive & Hygroscopic

## Specification

Assay	Appearance
95% min	Brown red liquid
98% min	Light yellow to reddish brown liquid
99% min	Colorless or light yellow liquid

\* Please refer to Certificate of Analysis for lot specific data.

## Safety

Nicotine is a hazard class 6.1 dangerous material, it's belong to highly toxic material  
Always refer to the Material Safety Data Sheet (MSDS)

## Applications

- (1) Used for the manufacture of the human body involved in metabolism, improve peripheral nerve function, dilation of blood vessels, the treatment of cardiovascular disease drugs, natural raw materials.
- (2) Used for the manufacture of highly efficient pesticides, for all types of pests, contact, fumigation or stomach poisoning effect is very good, because it is a natural substance, its biggest feature is no residue, does not cause secondary pollution, Medicinal properties, is to protect the ecological environment of biological activity of pesticides.
- (3) Used in the manufacture of food, nutritional health products, flavors and fragrances, cosmetics, animal feed additives.
- (4) Used for tobacco flavoring agent, for the production of electronic cigarettes, electronic cigarette oil.
- (5) Used for manufacturing weight loss drugs, smoking cessation drugs and other chemicals, biochemical reagents.
- (5) Nicotinic acid can prevent dementia
- (6) Use of nicotine control stored grain pests

## Packaging

1kg fluorinated bottles, 25kg plastic drum or as per customer's requirements

## Storage & Handling

Store in cool place. Keep container tightly closed in a dry and well-ventilated place.  
Please refer to the Materials Safety Data Sheet (MSDS) for the handling methods.

Always refer to the Material Safety Data Sheet (MSDS) for detailed information on handling and disposal.

*The information above is believed to be accurate and represents the best information currently available to us. However, we*

*make no warranty of merchant ability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no event shall we be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential or exemplary damages, howsoever arising, even if we has been advised of the possibility of such damages.*

**Hefei TNJ Chemical Industry Co.,Ltd.**

B911 Xincheng Business Center  
Qianshan Road, Hefei  
230022 Anhui  
China

Tel : (0086) 551 5418677  
Fax: (0086) 551 5418697  
Email: [info@tnjchem.com](mailto:info@tnjchem.com)  
Site: [www.tnjchem.com](http://www.tnjchem.com)