



Fine Gas Company Limited

Material Safety Data Sheet: Nitrogen (N2)

1	Product	Nitrogen (N2)
2	Hazard Identification	High Pressure Gas. Can cause rapid suffocation
3	Potential Health Effects	
3.1	Breathing	In high concentrations, may cause Asphyxiation. Symptoms may include loss of mobility and consciousness. Patient may not be aware of this and it may bring about so quickly that patient may not be able to protect him / her self
3.2	Contact	Nil
4	Aggravated Medical Condition	Exposure to oxygen deficient atmosphere may cause Dizziness, Salivation, Nausea, Vomiting, Loss of mobility and consciousness
5	First Aid Measures	Move to fresh air. If breathing is stopped or irregular, administer artificial respiration. Get medical advice immediately.
5.1	Eye Contact	Nil
5.2	Skin Contact	Nil
6	Fire Fighting Measures	
6.1	General	Product is non-flammable and doesn't support combustion. Upon exposure to intense heat or flame, cylinder will vent rapidly and can rupture violently. Move away from the cylinder and cool it with water from a protected position. Stop flow of product if possible. Keep adjacent cylinders cool by spraying large amount of water
6.2	Specific Hazard	Wear self contained breathing apparatus for fire fighting / rescue operation if necessary
7	Accidental Release Measures	May accumulate in confined spaces. Evacuate personnel's to safe areas. Don't discharge gas in any place where its accumulation can be dangerous. Prevent leakage if safe to do so
8	Handling & Storage	Nitrogen Gas is a compressed gas. So, protect cylinders from physical damage like dragging, rolling, sliding, dropping etc. Don't allow storage area temperature to reach more than 50 °C (122 °F). Only experienced and trained personnel are allowed to handle compressed gases. Use trolley or cart for moving cylinder even for a shorter distance. Ensure complete gas system has been checked for leakages, pressure rating and materials before use. Open valve of the cylinder slowly. In case, the user feels any difficulty in the operation of the cylinder valve, never use the cylinder or try to repair / modify its valves or safety relief devices. Close valve after use or when cylinder is empty. Don't subject cylinder to any mechanical shock or lifting it by its valve. Don't use cylinders for uses for which they are not designed or specified. Never strike an arc on a compressed gas cylinder or making it a part of the electrical circuit. Don't allow any ignition, spark or flame in the cylinder handling & storage area. Never recompress the gas or its mixture or transfer gas from one cylinder to another. Never use any electrical or any other heating device to raise the pressure of the gas cylinder. Cylinders should be stored in a purpose built compound which should be well ventilated, preferably in an open air. Stored cylinders should be periodically checked for general condition or leakage. Always safe guard cylinders from rust and extreme weather conditions. Full and empty cylinders should be properly segregated in the storage area. Display board should be hanged outside storage & handling area of "No Smoking / Open Flames". Never permit oil, grease and other combustible materials on cylinder valve /spindle Secure cylinder vertically & properly to prevent them from toppling Use cylinders on First In First Out basis. All electrical equipment in the storage area should be compatible with the gas stored
9	Personal Protective Equipment	
9.1	Hands Protection	Work gloves are recommended while handling cylinders
9.2	Eyes Protection	Safety Glasses are recommended for eyes protection
9.3	Skin & Body Protection	Wear appropriate personal protective equipment like Safety Shoes when handling cylinders
10	Physical & Chemical Properties	
10.1	Physical Status	Compressed Gas
10.2	Colour	Colourless
10.3	Odour	Odourless
10.4	Boiling Point	-196 °C (-321 °F)
11	Stability & Reactivity	Stable under normal conditions