



Point No. 8	<p>Exposure controls</p> <p>TLV (ACGIH) 1 ppm 2.9mg/m<sup>3</sup> stel 3 ppm 9mg/m<sup>3</sup></p> <p>Odour 3.5 10.16 mg/m<sup>3</sup></p> <p>Threshold ppm</p> <p>Personal Protective equipment :- PVC hand gloves, gas mask with canister, of Chlorine, B.A. Set for high conc. of Chlorine, Safety goggles, safety shoes, PVC over all set.</p>
Point No. 9	<p>Physical and chemical properties</p> <p>Physical state :- Gas/Liquid</p> <p>Appearance :- Greenish yellow</p> <p>Odour :- Irritating</p> <p>Solubility :- in water at 20°C, &lt;0.75% other, soluble in alkalis.</p> <p>vapour density :- (Air = 1), 2.482 at 0°C, 1 atm</p> <p>pH :- Acidic</p> <p>boiling range/point °C :- -34°C</p> <p>Melting/Freezing point :- -101°C</p> <p>Vapour pressure :- 4800 mm Hg at 20°C</p> <p>specific Gravity :- 1.47 at 0°C, 3.65 atm (water = 1)</p>
Point No. 10	<p>Stability and Reactivity</p> <p>Chemical Stability :- stable</p> <p>Incompatibility with other material :- ether, Turpentine, Hydrogen, metal like Al, water etc.</p> <p>Reactivity :- (i) violent reaction with alcohols, explosive reaction with metals, potentially dangerous reaction with Hydrogen, Lewis acid etc.</p> <p>Hazardous reaction products:- Toxic product generated when combustibles burn in Cl<sub>2</sub></p>
Point No. 11	<p>Toxicological information</p> <p>Route of entry :- Skin contact, skin absorption, eye contact, inhalation, acute, Inhalation – chronic, ingestion.</p> <p>Effect of exposure/symptoms :- Irritation to skin, mucous membrane of eyes, chocking and coughing on Inhalation, affects respiratory system.</p> <p>Emergency Treatment :- Remove victim to fresh air. Arrange for medical. Start artificial – respiration to restore breathing. Don't give solids or liquids to unconscious patients. Flush eyes thoroughly if exposed. Remove contaminated cloths and wash with plenty of water under safety shower.</p>
Point No. 12	Ecological information :- Marine pollutant
Point No. 13	Disposal Consideration

	<p>Waste disposal method :-</p> <p>The gas after neutralization is to be drained out is liquid effluent. In case of large spillage (liquid), cover the pool &amp; chlorine with protein foam so that release to atmosphere is minimum.</p>
Point No. 14	<p>Transport information :-</p> <p>Formula : Cl<sub>2</sub> CAS NO. 7782-50-5 U.N. No. 1017</p> <p>Regulated shipping identification name:- Chlorine Hazchem No. 2X E, Code/Label :- non flammable gas, poison, class 2</p> <p>Hazardous Waste I.D. No. 17</p>
Point No. 15	<p>Regulatory information :-</p> <p>Hazardous ingredients Chlorine CAS No. 7782 – 50 -5</p>
Point No. 16	<p>Other Information</p> <p>Information contained in this material data sheet is believed to be reliable but no representation. Guarantee or warranties of any kind are made as to its accuracy, suitability for a particular application or results to be obtained from them. It is up to the manufacture/seller to ensure that the information contained in the material safety data sheet is relevant to the product manufacture handled or sold by him as the case may be. The Government makes no warranties, expressed or implied, in respect of the adequacy of this document for any particular purpose.</p>