

1. PRODUCT AND COMPANY IDENTIFICATION

**Product Name** OPEN ROAD PLUS  
**Recommended Use** Ice melting compound  
**Information on Manufacturer**  
 CHEMSEARCH DIV. OF NCH CORP.  
 BOX 152170  
 IRVING, TX 75015

**Product Code** 0288  
**Chemical Nature** Aqueous solution of metal salts  
**Emergency Telephone Number**  
 CHEMTREC® 800-424-9300

2. HAZARDS IDENTIFICATION

**Emergency Overview**

Caution  
 May cause skin irritation  
 May cause eye irritation  
 May cause irritation of respiratory tract  
 May be harmful if swallowed

**Physical State** Liquid

**Odor** Odorless

**Color** Green  
**Potential Health Effects**  
**Principle Route of Exposure**  
**Primary Routes of Entry**  
**Acute Effects**  
     **Eyes**  
     **Skin**  
     **Inhalation**  
     **Ingestion**  
**Chronic Effects**  
**Target Organ Effects**  
**Aggravated Medical Conditions**  
**Potential Environmental Effects**

Skin contact, Eye contact.  
 Skin Absorption  
 May cause eye irritation  
 May cause skin irritation. May be absorbed through the skin in harmful amounts  
 May cause irritation of respiratory tract  
 Ingestion may cause gastrointestinal irritation, nausea, vomiting, and diarrhea  
 None known  
 None known  
 Skin disorders, Respiratory disorders.  
 See Section 12 for additional Ecological information

3. COMPOSITION / INFORMATION ON INGREDIENTS

Component	CAS-No
Magnesium Chloride Hexahydrate	7791-18-6

4. FIRST AID MEASURES

**General Advice** Avoid contact with skin, eyes, and clothing. Avoid breathing vapors, mist, or gas  
**Eye Contact** Rinse thoroughly with plenty of water, also under the eyelids. Get medical attention if irritation develops and persists  
**Skin Contact** Wash off immediately with plenty of water. Get medical attention if irritation develops and persists  
**Inhalation** If inhaled, remove to fresh air. Get medical attention if symptoms occur  
**Ingestion** Drink 1 or 2 glasses of water. Do not induce vomiting. Get medical attention if symptoms occur  
**Notes to Physician** Treat symptomatically

5. FIRE-FIGHTING MEASURES

**Flash Point** 201°F/94°C **Method** Seta closed cup  
**Autoignition Temperature** No information available  
**Suitable Extinguishing Media** Water spray. Carbon dioxide (CO2). Dry chemical. Foam. Alcohol-resistant foam. Use extinguishing measures that are appropriate to local circumstances and the surrounding environment  
**Specific Hazards Arising from the Chemical** Material can create slippery conditions  
**Protective Equipment and Precautions for Firefighters** As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear

<b>NFPA</b>	<b>Health</b>	1	<b>Flammability</b>	1	<b>Instability</b>	0
<b>HMIS</b>	<b>Health</b>	1	<b>Flammability</b>	1	<b>Instability</b>	0

6. ACCIDENTAL RELEASE MEASURES

**Personal Precautions** Use personal protective equipment. Prevent further leakage or spillage if safe to do so. Material can create slippery conditions  
**Environmental Precautions** Do not flush into surface water or sanitary sewer system  
**Methods for Containment** Contain spillage, soak up with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and transfer to a container for disposal according to local / national regulations (see section 13)  
**Methods for Cleaning Up** Pick up and transfer to properly labeled containers  
**Neutralizing Agent** Not applicable

7. HANDLING AND STORAGE

**Handling** Avoid contact with skin, eyes, and clothing. Avoid breathing vapors or mists  
**Storage** Store in original container. Keep containers tightly closed in a dry, cool and well-ventilated place. Do not freeze

<b>Storage Temperature</b>	<b>Minimum</b>	35°F/2°C	<b>Maximum</b>	120°F/49°C
<b>Storage Conditions</b>	<b>Indoor</b>	X	<b>Outdoor</b>	
			<b>Heated</b>	
				<b>Refrigerated</b>

## 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

## Exposure Guidelines

Component	ACGIH TLV	OSHA PEL	NIOSH
Magnesium Chloride Hexahydrate	No data available	No data available	No data available

## Engineering Measures

Ensure adequate ventilation

## Personal Protective Equipment

## Eye/Face Protection

Safety glasses with side-shields

## Skin Protection

Neoprene gloves

## Respiratory Protection

In case of insufficient ventilation wear suitable respiratory equipment

## General Hygiene Considerations

Ensure that eyewash stations and safety showers are close to the workstation location. Wash contaminated clothing before re-use

## 9. PHYSICAL AND CHEMICAL PROPERTIES

<b>Physical State</b>	Liquid	<b>Viscosity</b>	Non viscous
<b>Color</b>	Green	<b>Odor</b>	Odorless
<b>Appearance</b>	Transparent	<b>pH</b>	7
<b>Specific Gravity</b>	1.26	<b>Evaporation Rate</b>	0.43 (Butyl acetate=1)
<b>Percent Volatile (Volume)</b>	82	<b>VOC Content (%)</b>	0
<b>VOC Content (g/l)</b>	0	<b>Vapor Pressure</b>	12.9 mmHg @ 70 °F
<b>Vapor Density</b>	0.6 (Air = 1.0)	<b>Solubility</b>	Completely soluble
<b>Boiling Point/Range</b>	244.6°F/118°C		

## 10. STABILITY AND REACTIVITY

## Chemical Stability

Stable. Hazardous polymerization does not occur

## Conditions to Avoid

None known

## Incompatible Products

No materials to be especially mentioned

## Hazardous Decomposition Products

Hydrogen chloride gas

## Possibility of Hazardous Reactions

None under normal processing

## 11. TOXICOLOGICAL INFORMATION

## Product Information

No information available

## Component Information

## Acute toxicity

Component	LD50 Oral	LD50 Dermal	LC50 Inhalation	Draize Test	Other
Magnesium Chloride Hexahydrate	8100 mg/kg ( Rat ) 2800 mg/kg ( Rat )	no data available	no data available	no data available	no data available

## Chronic Toxicity

Component	Mutagenicity	Sensitization	Developmental Toxicity	Reproductive Toxicity	Target Organ Effects
Magnesium Chloride Hexahydrate	no data available	no data available	no data available	no data available	no data available

## Carcinogenicity

There are no known carcinogenic chemicals in this product

Component	ACGIH	IARC	NTP	OSHA	Other
Magnesium Chloride Hexahydrate	not applicable	not applicable	not applicable	not applicable	not applicable

## 12. ECOLOGICAL INFORMATION

## Product Information

No information available

## Component Information

Component	Toxicity to Algae	Toxicity to Fish	Microtox	Water Flea	log Pow
Magnesium Chloride Hexahydrate	72 Hr EC50 Scenedesmus subspicatus: 2200 mg/L	96 Hr LC50 Gambusia affinis: 4210 mg/L [static]; 96 Hr LC50 Pimephales promelas: 1970-3880 mg/L [static]	no data available	24 Hr EC50 Daphnia magna: 1400 mg/L	N/A

## Persistence and Degradability

No information available

## Bioaccumulation

No information available

## Mobility

No information available

## 13. DISPOSAL CONSIDERATIONS

## Product Disposal

Dispose of in accordance with local regulations

## Container Disposal

Empty containers should be taken for local recycling, recovery or waste disposal

## 14. TRANSPORT INFORMATION

DOT	Not regulated
TDG	Not regulated
ICAO	Not regulated
IATA	Not regulated
IMDG/IMO	Not regulated

## 15. REGULATORY INFORMATION

## Inventories

TSCA	Complies
DSL	Complies

## U.S. Federal Regulations

## SARA 313

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and and Title 40n of the Code of Federal Regulations, Part 372

## SARA 311/312 Hazardous Categorization

Acute Health Hazard	Chronic Health Hazard	Fire Hazard	Sudden Release of Pressure Hazard	Reactive Hazard
Yes	No	No	No	No

## CERCLA

Component	Hazardous Substances RQs	CERCLA EHS RQs
Magnesium Chloride Hexahydrate	Not applicable	Not applicable

## Canada

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the MSDS contains all the information required by the CPR

## WHMIS Hazard Class

D2B Toxic materials



## 16. OTHER INFORMATION

Prepared By	Mike McDowell
Supersedes Date	Not applicable
Issuing Date	05/14/2009
Reason for Revision	No information available
Glossary	No information available
List of References.	No information available

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