

SAFETY DATA SHEET

1. Identification

Product identifier

NEODYMIUM CHLORIDE, 99.9%, HEXAHYDRATE

Other means of identification		
Product code	A5208	
Recommended use	professional, scientific and technical activities: other professional, scientific and technical activities	
Recommended restrictions	None known.	
Manufacturer/Importer/Supplier/Distributor information		
Company name	GFS Chemicals, Inc.	
A dalwa aa		

Company name Address	GFS Chemicals, Inc. P.O. Box 245 Powell OH 43065 US	
Telephone	Phone Toll Free Fax	740-881-5501 800-858-9682 740-881-5989
Website E-mail	www.gfschemicals.com service@gfschemicals.com	
Emergency phone number	Emergency Assistance	Chemtrec 800-424-9300

2. Hazard(s) identification

Physical hazards	Not classified.	
Health hazards	Skin corrosion/irritation	Category 2
	Serious eye damage/eye irritation	Category 2A
	Specific target organ toxicity, single exposure	Category 3 respiratory tract irritation
OSHA hazard(s)	Not classified.	
Label elements		



	\mathbf{v}
Signal word	Warning
Hazard statement	Causes skin irritation. Causes serious eye irritation. May cause respiratory irritation.
Precautionary statement	
Prevention	Use only outdoors or in a well-ventilated area. Wash thoroughly after handling. Wear protective gloves. Wear eye/face protection.
Response	IF ON SKIN: Wash with plenty of soap and water. If inhaled: Remove person to fresh air and keep comfortable for breathing. If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Call a POISON CENTER or doctor/physician if you feel unwell. If skin irritation occurs: Get medical advice/attention. If eye irritation persists: Get medical advice/attention.
Storage	Store in a well-ventilated place. Keep container tightly closed. Store locked up.
Disposal	Dispose of contents/container to an appropriate treatment and disposal facility in accordance with applicable laws and regulations, and product characteristics at time of disposal.
Hazard(s) not otherwise classified (HNOC)	Not classified.

3. Composition/information on ingredients

Substances

Hazardous components			
Chemical name	Common name and synonyms	CAS number	%
NEODYMIUM CHLORIDE		13477-89-9	100

*Designates that a specific chemical identity and/or percentage of composition has been withheld as a trade secret.

4. First-aid measures	
Inhalation	Move to fresh air. Call a POISON CENTER or doctor/physician if you feel unwell.
Skin contact	Remove contaminated clothing. Wash off with soap and plenty of water. If skin irritation occurs: Get medical advice/attention.
Eye contact	Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get medical attention if irritation develops and persists.
Ingestion	Call a POISON CENTER or doctor/physician if you feel unwell. Rinse mouth.
Most important symptoms/effects, acute and delayed	Irritation of eyes and mucous membranes. Irritant effects.
Indication of immediate medical attention and special treatment needed	Provide general supportive measures and treat symptomatically.
General information	Ensure that medical personnel are aware of the material(s) involved, and take precautions to protect themselves. If you feel unwell, seek medical advice (show the label where possible). Wash contaminated clothing before reuse.

5. Fire-fighting measures

Suitable extinguishing media	Water. Use extinguishing agent suitable for type of surrounding fire.
Unsuitable extinguishing media	None known.
Specific hazards arising from the chemical	Not applicable.
Special protective equipment and precautions for firefighters	Wear suitable protective equipment.
Fire-fighting equipment/instructions	In the event of fire, cool tanks with water spray.
Specific methods	Cool containers exposed to flames with water until well after the fire is out.

6. Accidental release measures

Personal precautions, protective equipment and emergency procedures	Keep unnecessary personnel away. Local authorities should be advised if significant spillages cannot be contained. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Keep people away from and upwind of spill/leak. Keep upwind. Keep out of low areas. Ensure adequate ventilation. Wear appropriate personal protective equipment.
Methods and materials for containment and cleaning up	This product is miscible in water. Stop the flow of material, if this is without risk. Following product recovery, flush area with water. Prevent entry into waterways, sewer, basements or confined areas. For waste disposal, see section 13 of the MSDS.
Environmental precautions	Avoid discharge into drains, water courses or onto the ground.

7. Handling and storage

Precautions for safe handling	Avoid contact with skin. Avoid contact with eyes. Wash hands thoroughly after handling.
Conditions for safe storage, including any incompatibilities	Keep container tightly closed. Keep out of the reach of children. Store in a cool, dry place out of direct sunlight.

8. Exposure controls/personal protection

Occupational exposure limits	No exposure limits noted for ingredient(s).	
Biological limit values	No biological exposure limits noted for the ingredient(s).	
Appropriate engineering controls	Provide eyewash station.	
Individual protection measures, such as personal protective equipment		
Eye/face protection	Wear eye/face protection.	
Skin protection		
Hand protection	Wear protective gloves.	

Material name: NEODYMIUM CHLORIDE, 99.9%, HEXAHYDRATEA5208Version #: 01Revi

Other	Wear suitable protective clothing. Wear protective gloves.
Respiratory protection	In case of insufficient ventilation, wear suitable respiratory equipment.
Thermal hazards	Not available.
General hygiene considerations	Avoid contact with eyes. Avoid contact with skin. Wash hands before breaks and immediately after handling the product. Keep away from food and drink. Handle in accordance with good industrial hygiene and safety practice.

9. Physical and chemical properties

- -	
Appearance	Crystalline. Deliquescent.
Physical state	Solid.
Form	Solid.
Color	Light purple
Odor	Odorless.
Odor threshold	Not available.
рН	Not available.
Melting point/freezing point	255.2 °F (124 °C) Literature
Initial boiling point and boiling range	Not available.
Flash point	Not available.
Evaporation rate	Not available.
Flammability (solid, gas)	Not applicable.
Upper/lower flammability or ex	xplosive limits
Flammability limit - lower (%)	Not available.
Flammability limit - upper (%)	Not available.
Explosive limit - lower (%)	Not available.
Explosive limit - upper (%)	Not available.
Vapor density	Not available.
Relative density	Not available.
Solubility(ies)	71 % at 13 °C
Partition coefficient (n-octanol/water)	Not available.
Auto-ignition temperature	Not available.
Decomposition temperature	Not available.
Viscosity	Not available.
Other information	
Molecular formula	NdCl3.6H2O
Molecular weight	358.7

10. Stability and reactivity

Reactivity	Not available.
Chemical stability	Material is stable under normal conditions.
Possibility of hazardous reactions	No dangerous reaction known under conditions of normal use.
Conditions to avoid	None under normal conditions.
Incompatible materials	None known.
Hazardous decomposition products	No hazardous decomposition products are known.

11. Toxicological information

Information on likely routes of exposure

Ingestion	Due to lack of data the classification is not possible.
Inhalation	May cause irritation to the respiratory system.

Skin contact	Not available.
Eye contact	Causes serious eye irritation.
Symptoms related to the physical, chemical and toxicological characteristics	Irritant effects.
Information on toxicological ef	ifects
Acute toxicity	Not available.
Skin corrosion/irritation	Causes skin irritation.
Serious eye damage/eye irritation	Causes serious eye irritation.
Respiratory sensitization	Due to lack of data the classification is not possible.
Skin sensitization	Due to lack of data the classification is not possible.
Germ cell mutagenicity	Due to lack of data the classification is not possible.
Carcinogenicity	This product is not considered to be a carcinogen by IARC, ACGIH, NTP, or OSHA.
Reproductive toxicity	Due to lack of data the classification is not possible.
Specific target organ toxicity - single exposure	Respiratory tract irritation.
Specific target organ toxicity - repeated exposure	Due to lack of data the classification is not possible.
Aspiration hazard	Due to lack of data the classification is not possible.

12. Ecological information

Ecotoxicity	No ecotoxicity data noted for the ingredient(s).
Persistence and degradability	No data is available on the degradability of this product.
Bioaccumulative potential	Not available.
Mobility in soil	Not available.
Other adverse effects	Not available.

13. Disposal considerations

Disposal instructions	Collect and reclaim or dispose in sealed containers at licensed waste disposal site. Dilute waste in large quantities of water and flush into sewer connected to wastewater treatment system in compliance with applicable laws and regulations. Do not contaminate ponds, waterways or ditches with chemical or used container. Dispose of contents/container in accordance with local/regional/national/international regulations.
Local disposal regulations	Not available.
Hazardous waste code	Not regulated.
Waste from residues / unused products	Dispose of in accordance with local regulations. Empty containers or liners may retain some product residues. This material and its container must be disposed of in a safe manner (see: Disposal instructions).
Contaminated packaging	Empty containers should be taken to an approved waste handling site for recycling or disposal. Since emptied containers may retain product residue, follow label warnings even after container is emptied.

14. Transport information

DOT

Not regulated as a hazardous material by DOT.

ΙΑΤΑ

Not regulated as a dangerous good.

IMDG

Not regulated as a dangerous good.

Transport in bulk according
to Annex II of MARPOLNo information available.73/78 and the IBC Code

15. Regulatory information

US federal regulations

CERCLA/SARA Hazardous Substances - Not applicable.

All components are on the U.S. EPA TSCA Inventory List.

	gulated Substances (29 CFR 1910.1001-1050)	
Not on regulatory list.		
CERCLA Hazardous Subst	ance List (40 CFR 302.4)	
Not listed.		
	Reauthorization Act of 1986 (SARA)	
Hazard categories	Immediate Hazard - Yes Delayed Hazard - No Fire Hazard - No Pressure Hazard - No Reactivity Hazard - No	
SARA 302 Extremely hazardous substance	No	
SARA 311/312 Hazardous chemical	Νο	
ther federal regulations		
-	on 112 Hazardous Air Pollutants (HAPs) List	
• •	on 112(r) Accidental Release Prevention (40 CFR 68.130)	
Not regulated. Safe Drinking Water Act	Not regulated.	
(SDWA) Drug Enforcement Admin Chemical Code Number	istration (DEA). List 2, Essential Chemicals (21 CFR 1310.02(b)	and 1310.04(f)(2) and
Not listed.	istration (DEA). List 1 & 2 Exempt Chemical Mixtures (21 CFR 1	L310.12(c))
Not regulated.		
DEA Exempt Chemical Mix Not regulated.	xtures Code Number	
Food and Drug Administration (FDA)	Not regulated.	
JS state regulations	California Safe Drinking Water and Toxic Enforcement Act of 1986 (I is not known to contain any chemicals currently listed as carcinogen	
US. Massachusetts R	rK - Substance List	
Not regulated. US. New Jersey Work	er and Community Right-to-Know Act	
Not regulated.		
•	(- Hazardous Substances	
Not regulated. US. Rhode Island RTH	(
Not regulated.	-	
US. California Proposition	65	
•	sition 65 - Carcinogens & Reproductive Toxicity (CRT): Listed s	ubstance
Not listed.		
nternational Inventories		
nternational Inventories	Inventory name	On inventory (yes/no
nternational Inventories Country(s) or region Australia	Inventory name Australian Inventory of Chemical Substances (AICS)	On inventory (yes/no) Y
Country(s) or region	Australian Inventory of Chemical Substances (AICS)	
Country(s) or region Australia Canada	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL)	Y
Country(s) or region Australia	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL) Non-Domestic Substances List (NDSL)	Y Y I
Country(s) or region Australia Canada Canada	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL)	Y Y I Y
Country(s) or region Australia Canada Canada China	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL) Non-Domestic Substances List (NDSL) Inventory of Existing Chemical Substances in China (IECSC) European Inventory of Existing Commercial Chemical Substances	Ŷ
Country(s) or region Australia Canada Canada China Europe	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL) Non-Domestic Substances List (NDSL) Inventory of Existing Chemical Substances in China (IECSC) European Inventory of Existing Commercial Chemical Substances (EINECS)	Y Y Y Y Y
Country(s) or region Australia Canada Canada China Europe	Australian Inventory of Chemical Substances (AICS) Domestic Substances List (DSL) Non-Domestic Substances List (NDSL) Inventory of Existing Chemical Substances in China (IECSC) European Inventory of Existing Commercial Chemical Substances (EINECS) European List of Notified Chemical Substances (ELINCS)	Y Y I Y Y

Country(s) or region	Inventory name	On inventory (yes/no)*
Philippines	Philippine Inventory of Chemicals and Chemical Substances (PICCS)	Yes
United States & Puerto Rico	Toxic Substances Control Act (TSCA) Inventory	Yes
*A "Yes" indicates this product co	omplies with the inventory requirements administered by the governing country(s))

16. Other information, including date of preparation or last revision

Issue date	May-09-2013
Version #	01
Further information	Not available.
Disclaimer	The information in the sheet was written based on the best knowledge and experience currently available. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.
Revision Information	Product and Company Identification: Product and Company Identification