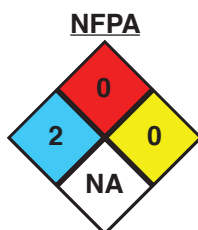


MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate



HMIS

HEALTH	2
FLAMMABILITY	0
REACTIVITY	0
PERSONAL PROTECTION	C

1. Product And Company Identification

Supplier

DF Goldsmith Chemical and Metal
909 Pitner Avenue
Evanston, IL 60202, USA

Telephone Number: 847-869-7800

FAX Number: 847-869-2531

E-mail: goldchem@aol.com

Web Site: www.dfgoldsmith.com

Manufacturer

DF Goldsmith Chemical and Metal
909 Pitner Avenue
Evanston, IL 60202, USA

Telephone Number: 847-869-7800

FAX Number: 847-869-2531

E-mail: goldchem@aol.com

Web Site: www.dfgoldsmith.com

Supplier Emergency Contacts & Phone Number

Chemtrac: 800-424-9300

Supplier Emergency Contacts & Phone Number

Chemtrac: 800-424-9300

Issue Date: 03/26/2008

Product Name: Rhodium (III) Chloride Hydrate

Chemical Name: Rhodium (III) Chloride/Rhodium Trichloride

CAS Number: 20765-98-4

Chemical Family: Platinum Group Metal Salts

Chemical Formula: RhCl₃.3H₂O

MSDS Number: 45-482

Product Code: 45-482

Synonyms

NA

2. Composition/Information On Ingredients

Ingredient Name	CAS Number	Percent Of Total Weight
Rhodium (III) Chloride Hydrate	20765-98-4	99

EMERGENCY OVERVIEW

Harmful

Harmful if swallowed. Risk of serious damage to eyes if exposed to the powder.

Target Organs: Nerves. Blood

3. Hazards Identification

Primary Routes(s) Of Entry

Inhalation: Likely

Skin: Likely

Ingestion: Likely

MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

3 Hazards Identification (cont)

Eye Hazards

Causes eye irritation.

Skin Hazards

Causes skin irritation.

Ingestion Hazards

Harmful if swallowed.

Inhalation Hazards

Causes respiratory tract irritation. May cause nose, throat, and lung irritation.

Subchronic (Target Organ Effects)

Nerves and Blood.

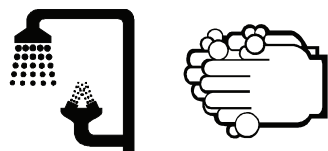
Conditions Aggravated By Exposure

May cause irritation of the respiratory system. Maintain housekeeping and personal hygiene to minimize exposure and prevent sensitization.

Conditions Aggravated By Overexposure

To the best of our knowledge, the chemical, and toxicological properties have not been thoroughly investigated.

First Aid (Pictograms)



4. First Aid Measures

Eye

Flush for 15 minutes with plenty of water. If discomfort occurs or persists, contact a physician.

Skin

Flush area for 15 minutes with water and wash with soap and water. If discomfort occurs or persists, contact a physician. Remove contaminated clothing and shoes and wash before reuse.

Ingestion

Not expected to be a problem in industry. However if swallowed and discomfort occurs, contact a physician.

Inhalation

Remove to fresh air immediately. If discomfort occurs or persists, contact a physician.

Fire Fighting (Pictograms)



MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

5. Fire Fighting Measures

Flash Point Method: NA

Flammability Class: NA

Fire And Explosion Hazards

Use proper safety equipment. Can decompose to emit toxic hydrochloric acid or chlorine vapor.

Extinguishing Media

Use water spray, foam, dry chemical, carbon dioxide or medium to fight primary source.

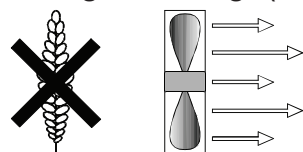
Fire Fighting Instructions

NIOSH/MSHA approved self-contained breathing apparatus and full protective clothing

6. Accidental Release Measures

Sweep or soak up and place in sealed container for reclamation or disposal. Person protected with full face shield and proper respirator for chlorine and dust. Ventilate area and wash spill site after pick up is complete.

Handling and Storage (Pictograms)



7. Handling and Storage

Handling And Storage Precautions

Avoid contact with eyes, prolonged or repeated contact with skin. Avoid breathing dust. Use compatible chemical-resistant gloves. Wash hands thoroughly after handling.

Handling Precautions

Avoid breathing dust or solution spray. Avoid contact with eyes. Avoid contact with skin and clothing.

Storage Precautions

Do not store directly on ground. Keep Tightly Closed.

Work/Hygienic Practices

Use good personal hygiene. Wash thoroughly after handling. Wash thoroughly with soap and water after handling.

Other Precautions

0.01 ppm high efficiency particular respirator/supplied air respirator/self-contained breathing apparatus; 0.2 ppm same as above with full face piece; 1 ppm powdered air purifying respirator with high efficiency filter/type C supplied air respirator operated in pressure demand mode. Store in a sealed container, plastic or plastic liner, in a cool, well ventilated, dry area away from volatile acids.

Protective Clothing (Pictograms)



MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

8. Exposure Controls/Personal Protection

Engineering Controls

Ventilation: Local Exhaust: Required in handling area
Mechanical: Desirable to insure concentration of material below TLV/TWA levels
Other: Recommended

Eye/Face Protection

ANSI approved safety glasses/goggles

Skin Protection

Rubber/Neoprene (use compatible chemical-resistant gloves)

Respiratory Protection

NIOSH approved chemical cartridge respiratory for dust/mist/fume/radionuclide or self-contained breathing apparatus with full face shield.

Other/General Protection

Lab coat/apron, flame and chemical resistant protective clothing, eye wash, safety shower, and hygiene facilities for washing

9. Physical And Chemical Properties

Appearance

Dark red deliquescent crystals

Chemical Type: Mixture

Physical State: Solid

Melting Point: >100 (decomposes) °C

Molecular Weight: 263.31

Vapor Pressure: NA

Vapor Density: NA

pH Factor: NA

Solubility : Soluble

Evaporation Rate: NA

10. Stability And Reactivity

Stability : Stable

Hazardous Polymerization: Will not occur

Conditions To Avoid (Stability)

Avoid oxidizing agents.

Incompatible Materials

Mixing with mineral acids and strong reducing agents

Hazardous Decomposition Products

Hazardous decomposition products. Nature of decomposition products not known.

Conditions To Avoid (Polymerization)

Will not occur.

MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

11. Toxicological Information

Eye Effects

May cause eye irritation. Causes severe eye irritation.

Skin Effects

May cause skin irritation.

Acute Oral Effects

Ingestion: Harmful if swallowed.

Acute Inhalation Effects

Inhalation: Material may be irritating to mucous membranes and upper respiratory tract. May be harmful if inhaled.

Subchronic (Target Organ Effects)

Central Nervous System and Blood.

12. Ecological Information

No Data Available...

13. Disposal Considerations

Consult Federal EPA, State and local regulations for proper disposal/recycle/reclamation

NOTE: Chemical additions, processing, or otherwise altering this material may make the waste management information presented above incomplete, inaccurate, or otherwise inappropriate.

RCRA Information

NL

14. Transport Information

Proper Shipping Name

None

Additional Shipping Paper Description

IATA: None - Consult IATA regulation before shipping.

15. Regulatory Information

U.S. Regulatory Information

For R&D use only. Not for drug, household or other uses.

SARA Section 313 Notification

This product does not require reporting under SARA Notification.

Canadian Regulatory Information

WHMIS Classification: This product has been classified in accordance with the hazard criteria of the CPR, and the MSDS contains all the information required by the CPR.

MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

15. Regulatory Information (cont)

European Union (EU) Regulatory Information

Symbol of Danger: Xn

Indication of Danger: Harmful.

R: 22-41

Risk Statements: Harmful if swallowed. Risk of serious damage to eyes.

S: 26-36/39

Safety Statements: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

Wear suitable protective clothing and eye/face protection.

Other International Regulations

US CLASSIFICATION AND LABEL TEXT

Indication of Danger: Harmful.

Risk Statements: Harmful if swallowed. Risk of serious damage to eyes.

Safety Statements: In case of contact with eyes, rinse immediately with plenty of water and seek medical advice.

Wear suitable protective clothing and eye/face protection.

US Statements: Target organ(s): Nerves. Blood.

DSCL - Europe (Pictograms)



16. Other Information

NFPA Rating

Health: 2

Fire: 0

Reactivity: 0

Other: NA

HMIS Rating

Health: 2

Fire: 0

Reactivity: 0

Personal Protection: C

Revision/Preparer Information

MSDS Preparer: DF Goldsmith Chemical and Metal

MSDS Preparer Phone Number: 847-869-7800

This MSDS Supersedes A Previous MSDS Dated: 03/15/1998

MATERIAL SAFETY DATA SHEET

Rhodium (III) Chloride Hydrate

Disclaimer

In compliance with the OSHA Hazard Communication Standard, 29 C.F.R 1910.1200, we are providing you with a Materials Safety Data Sheet (MSDS) for the hazardous material you are purchasing.

It is your responsibility to educate your employees on the safe use of the hazardous material. With this in mind, a copy should be forwarded to the supervisor of the user or to the user themselves, and copy should be retained in your files for future reference.

DF Goldsmith Chemical and Metal makes no presentation as to the accuracy of the information in the MSDS. The information is believed to be correct; however, you (the customer), should perform your own investigation and independent verification. If you resell the product, you are responsible to forward the information in the MSDS to your customer.