



XI'AN FUNCTION MATERIAL GROUP CO., LTD
Material Safety Data Sheet
Magnesium dihydride

1. Product and Company Identification

Trade Name:	Magnesium dihydride
Chemical Formula:	MgH ₂
Manufacturer/Supplier:	XI'AN FUNCTION MATERIAL GROUP CO., LTD
Street:	No. 69, Gazelle Valley, High-Tech Zone
City:	XI'AN
State:	Shaanxi
Zip Code:	710077
Country:	China
Tel #:	+86-29-88993870/+86-13519132051

2. Hazards Identification

Signal Word: Danger



Hazard Statements: H260 In contact with water releases flammable gases which may ignite spontaneously.
H315 Causes skin irritation.
H319 Causes serious eye irritation

Precautionary Statements: P223 Do not allow contact with water.
P231+P232 Handle and store contents under inert gas/....Protect from moisture.
P280 Wear protective gloves/protective clothing/eye protection/face protection/hearing protection/...
P264 Wash ... thoroughly after handling.
P302+P335+P334 IF ON SKIN: Brush off loose particles from skin. Immerse in cool water [or wrap in wet bandages].
P370+P378 In case of fire: Use ... to extinguish.
P302+P352 IF ON SKIN: Wash with plenty of water/...

HMIS Health Ratings (0-4):
Health: 1
Flammability: 0
Physical: 0

3. Composition

Chemical Family: Ceramic
Additional Names: Magnesium hydride

Niobium oxide (Nb₂O₅):
Percentage: 100 wt%
CAS #: 7693-27-8
EC #: 231-705-3

4. First Aid Procedures

General Treatment: Seek medical attention if symptoms persist.
Special Treatment: None
Important Symptoms: None

Inhalation: Remove victim to fresh air. Supply oxygen if breathing is difficult. Rinse
Ingestion: mouth with water. Do not induce vomiting. Seek Medical Attention.
Skin: Wash affected area with mild soap and water. Remove any contaminated
clothing.
Eyes: Flush eyes with water, blinking often for several minutes. Remove contact
lenses if present and easy to do. Continue rinsing

5. Firefighting Measures

Flammability: Non-flammable
Extinguishing Media: No special restrictions – use suitable extinguishing agent for
surrounding material and type of fire.
Spec. Fire Fighting Procedure: Use full-face, self-contained breathing apparatus with full protective
clothing to prevent contact with skin and eyes. See section 10 for
decomposition products.

6. Accidental Release Measures

If Material Is Released/Spilled: Wear appropriate respiratory and protective equipment specified in
special protection information. Isolate spill area and provide
ventilation. Vacuum up spill using a high efficiency particulate
absolute (HEPA) air filter and place in a closed container for disposal.
Take care not to raise dust.
Environmental Precautions: Isolate runoff to prevent environmental pollution.

7. Handling and Storage

Handling Conditions: Wash thoroughly after handling.
Storage Conditions: Store in a cool dry place in a tightly sealed container. Store apart from
materials and conditions listed in section 10.
Work/Hygienic Maintenance: Do not use tobacco or food in work area. Wash thoroughly before
eating and smoking. Do not blow dust off clothing or skin with
compressed air.
Ventilation: Provide sufficient ventilation to maintain concentration at or below
threshold limit.

8. Exposure Controls and Personal Protection

Permissible Exposure Limits:	N/A
Threshold Limit Value:	N/A
Special Equipment:	None
Respiratory Protection:	If the exposure limits are exceeded, irritation or other symptoms are experienced, use a full-face respirator.
Protective Gloves:	Rubber gloves
Eye Protection:	Safety glasses or goggles
Body Protection:	Protective work clothing. Wear close-toed shoes and long sleeves/pants.

9. Physical and Chemical Characteristics

Color	N/A
Form:	Powder, Granules, Pellets, Sputtering target, Custom parts
Odor:	N/A
Water Solubility:	N/A
Boiling Point:	N/A
Melting Point:	>250 °C
Flash Point:	N/A
Autoignition Temperature:	N/A
Density:	1.45 g/cc
Molecular weight:	26.32 g/mol

10. Reactivity

Stability:	None
Reacts With:	None
Incompatible Conditions:	None
Hazardous Decomposition Products:	None

11. Toxicological Information

Potential Health Effects:	
Eyes:	May cause irritation
Skin:	May cause irritation
Ingestion:	May cause irritation
Inhalation:	May cause irritation
Chronic:	N/A

Signs & Symptoms:	N/A
Aggravated Medical Conditions:	N/A

Median Lethal Dose: N/A

Carcinogen: N/A

12. Ecological Information

Aquatic Toxicity:	N/A
Persistent Bioaccumulation Toxicity:	No
Very Persistent, Very Bioaccumulative:	No
Notes:	N/A

13. Disposal Considerations

Dispose of in accordance with local, state, national, and international regulations.

14. Transportation Data

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J azardous for transportation.



Hazard Class:
Packing Group:
UN Number:
Proper Shipping Name:

4.3 Substances which, in contact with water, emit flammable gases
PG I
WP 4232"
OCI PGUKWO " J [FTκG

15. Regulatory Information

Sec 302 Extremely Hazardous: No
Sec 304 Reportable Quantities: N/A
Sec 313 Toxic Chemicals: No

16. Other Information

This safety data sheet should be used in conjunction with technical sheets. It does not replace them. The information given is based on our knowledge of this product, at the time of publication. It is given in good faith. The attention of the user is drawn to the possible risks incurred by using the product for any other purpose other than that for which it was intended. This does not in any way excuse the user from knowing and applying all the regulations governing his activity. It is the sole responsibility of the user to take all precautions required in handling the product. The aim of the mandatory regulations mentioned is to help the user to fulfill his obligations regarding the use of hazardous products.

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