

MATERIAL SAFETY DATA SHEET

MANGANESE METAL FLAKES

(Extra Pure)

MSDS CAS : -7439-96-5

Section 1: Chemical Product and Company Identification

Section 1: Chemical Product

Product Name : MANGANESE METAL FLAKES

CAS#: 7439-96-5

C.I. No.: Not available.

Synonym : Not available.

Chemical Name: Not available.

Chemical Formula: Not available.

Brand: OXFORD

Details Of The Supplier Of The Safety Data Sheet:

Company identification: **OXFORD LAB FINE CHEM LLP**
Unit. No. 12, 1st Floor, Neminath Industrial Estate No. 6,
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Tel: 91-250-2390989
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Section 2: Composition and Information on Ingredients

Composition:

Name	CAS #	% by Weight
MANGANESE METAL FLAKES	7439-96-5	100

Section 3: Hazards Identification

Classification of the substance or mixture

Classification according to Regulation (EC) No 1999/45

Classification : F; R11
R15

Hazard Class and Category Code(s), Regulation (EC) No 1272/2008 (CLP)

Health hazards : Substances and mixtures, which in contact with water, emit flammable gases -Category 1 - Danger (CLP : Water-react. 1) H260
Flammable solids - Category 1 - Danger (CLP : Flam. Sol. 1) H228

Other hazards : The substance does not fulfil the criteria to be identified as PBT substance or vPvB substance according to Annex XIII of Regulation REACH.

Section 4: First Aid Measures

Description of first aid measures

Inhalation

Assure fresh air breathing. Allow the victim to rest.

Skin contact

Remove affected clothing and wash all exposed skin area with mild soap and water, followed by warm water rinse. Brush off loose particles from skin. Immerse in cool water, wrap in wet bandages.

Eye contact

Rinse immediately with plenty of water. Obtain medical attention if pain, blinking or redness persist.

Ingestion : Obtain emergency medical attention. Do NOT induce vomiting. Rinse mouth.

Most important symptoms and effects, both acute and delayed

Symptoms relating to use : Not expected to present a significant hazard under anticipated conditions of normal use.

Indication of any immediate medical attention and special treatment needed

General information : Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).

Section 5: Fire and Explosion Data

Extinguishing media

Extinguishing media

Suitable extinguishing media : Foam, Dry powder, Carbon dioxide, Water spray, Sand.

Unsuitable extinguishing media : Do not use a heavy water stream.

Surrounding fires : Use water spray or fog for cooling exposed containers.

Special hazards arising from the substance or mixture

Flammable class : Flammable solid.

Hazardous combustion products : Under fire conditions, hazardous fumes will be present.

Advice for fire-fighters

Protection against fire : Do not enter fire area without proper protective equipment, including respiratory protection.

Special procedures : Exercise caution when fighting any chemical fire. Avoid (reject) fire-fighting water to enter environment.

Section 6: Accidental Release Measures

Personal precautions, protective equipment and emergency procedures

For emergency responders : Equip cleanup crew with proper protection.
Ventilate area.

For non-emergency personnel : Evacuate unnecessary personnel.

Environmental precautions

Environmental precautions : Prevent entry to sewers and public waters. Notify authorities if product enters sewers or public waters.

Methods and materials for containment and cleaning up

Clean up methods : On land, sweep or shovel into suitable containers. Minimize generation of dust. Store away from other materials.

Section 7: Handling and Storage

Precautions for safe handling

Handling : Wash hands and other exposed areas with mild soap and water before eat, drink or smoke and when leaving work. Handle empty containers with care because residual vapours are flammable. Protect from moisture. Handle under inert gas. Keep away from any possible contact with water, because of violent reaction and possible flash fire.

Technical protective measures

: Provide good ventilation in process area to prevent formation of vapour.

Proper grounding procedures to avoid static electricity should be followed. Use explosion-proof electrical, ventilating, lighting, ..., equipment.

Special precautions

: No naked lights. No smoking.

Conditions for safe storage, including any incompatibilities

Storage

: Keep only in the original container in a cool, well ventilated place. Keep container closed when not in use. Keep in fireproof place. Protect from moisture. Ground/ bond container and receiving equipment. Store in a dry place. Keep away from any possible contact with water, because of violent reaction and possible flash fire.

Storage - away from

: Strong bases. Strong acids. Sources of ignition. Direct sunlight.

Specific end uses

Specific end use(s)

: None.

Section 8: Exposure Controls/Personal Protection

Personal protection

- Respiratory protection
- Hand protection
- Eye protection
- Others

: Avoid all unnecessary exposure.

: Wear approved mask.

: Wear protective gloves.

: Chemical goggles or safety glasses.

: When using, do not eat, drink or smoke.

Control parameters

Occupational Exposure Limits

: No data available.

Section 9: Physical and Chemical Properties

Information on basic physical and chemical properties

Physical state at 20 °C	: Solid
Colour	: Bright Silver Grey
Odour	: N/A
Odour threshold	: No data available.
pH value	: N/A
Melting point [°C]	: 1260°C
Decomposition point [°C]	: N/A
Critical temperature [°C]	: N/A
Auto-ignition temperature [°C]	: N/A
Flammability (solid, gas)	: Flammable solid.
Flash point [°C]	: N/A
Boiling point [°C]	: 1900°C
Initial boiling point [°C]	: N/A
Final boiling point [°C]	: N/A
Evaporation rate	: N/A
Vapour pressure [20°C]	: N/A
Vapour pressure mm/Hg	: N/A
Vapour density	: N/A
Density [g/cm ³]	: 7,3
Relative density, gas (air=1)	: N/A
Relative density, liquid (water=1)	: N/A
Solubility in water [% weight]	: Reacts with water
Solubility in water	: No data available.
Log Pow octanol / water at 20°C	: No data available.
Solubility	: N/A
Viscosity at 40°C [mm ² /s]	: N/A

Other information

Explosive properties	: N/A
Explosion limits - upper [%]	: N/A
Explosion limits - lower [%]	: N/A
Oxidising properties	: No data available.

Section 10: Stability and Reactivity Data

Reactivity

Reactivity : Not established.

Chemical stability

Chemical stability : Stable under recommended storage conditions.

Possibility of hazardous reactions

Hazardous reactions : In contact with water releases flammable gases which may ignite spontaneously.

Conditions to avoid

Conditions to avoid : Direct sunlight. Extremely high or low temperatures. Open flame. Overheating. Heat. Sparks.

Incompatible materials

Materials to avoid : Strong acids. Strong bases.

Hazardous decomposition products

Hazardous decomposition products : Fumes. Carbon monoxide. Carbon dioxide. May release flammable gases.

Section 11: Toxicological Information

Information on toxicological effects

Acute toxicity

- | | |
|--------------|---|
| • Inhalation | : Based on available data, the classification criteria are not met. |
| • Dermal | : Based on available data, the classification criteria are not met. |
| • Ingestion | : Based on available data, the classification criteria are not met. |
| Corrosion | : Based on available data, the classification criteria are not met. |
| Irritation | : Based on available data, the classification criteria are not met. |

Section 11: Toxicological Information

Sensitization	: Based on available data, the classification criteria are not met.
Mutagenicity	: Based on available data, the classification criteria are not met.
Carcinogenicity	: Based on available data, the classification criteria are not met.
Toxic for reproduction	: Based on available data, the classification criteria are not met.
STOT-single exposure	: Based on available data, the classification criteria are not met.
STOT-repeated exposure	: Based on available data, the classification criteria are not met.
Aspiration hazard	: Based on available data, the classification criteria are not met.

Section 12: Ecological Information

Toxicity

Toxicity information : Not established.

Persistence – degradability

Persistence - degradability : Biodegradable.

Bioaccumulative potential

Bioaccumulative potential : Not established.

Mobility in soil

Mobility in soil : Not established.

Results of PBT and vPvB assessment

Results of PBT and vPvB assessment : The substance does not fulfil the criteria to be identified as PBT substance or vPvB substance according to Annex XIII of Regulation REACH.

Other adverse effects

Environmental precautions : Avoid release to the environment.

Section 13: Disposal Considerations

Waste treatment methods

General : Avoid release to the environment. Dispose in a safe manner in accordance with local/national regulations. Dispose of this material and its container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.

Special precautions : Handle empty containers with care because residual vapours are flammable.

Section 14: Transport Information

Land transport (ADR-RID)

Proper shipping name	: METALLIC SUBSTANCE, WATER-REACTIVE, N.O.S.
UN N°	: 3208
H.I. nr	: -
ADR – Class	: 4.3
Labelling – Transport	: 4.3 : Contact with water liberates highly flammable gases.
ADR – Group	: I

Sea transport (IMDG) [English only]

Proper shipping name	: METALLIC SUBSTANCE, WATER-REACTIVE, N.O.S.
UN N°	: 3208
IMO-IMDG - Class or division	: 4.3 : Contact with water liberates highly flammable gases.
IMO-IMDG - Packing group	: I

Air transport (ICAO-IATA) [English only]

Proper shipping name	: METALLIC SUBSTANCE, WATER-REACTIVE, N.O.S.
UN N°	: 3208
IATA - Class or division	: 4.3 : Contact with water liberates highly flammable gases.
IATA - Packing group	: I

Section 15: Other Regulatory Information

Safety, health and environmental regulations/legislation specific for the substance or mixture

Safety, health and environmental : Ensure all national/local regulations are observed.
regulations/legislation specific for
the substance or mixture

REACH Restrictions - Annex XVII : The components of this product are not subject to restrictions.

REACH Authorisation - Annex XIV : The components of this product are not subject to authorization.

Chemical Safety Assessment

Chemical Safety Assessment : It has not been carried out.

Section 16 - Additional Information

References: Not available.

Other Special Considerations: Not available.

Disclaimer:

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