



SAFETY DATA SHEET

Revision date 16-July-2020

Section 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

Product Identifier

CAS No.	12070-14-3
Product Name	Zirconium carbide
Molecular Formula	ZrN

Relevant identified uses of the substance or mixture and uses advised against

Recommended use	Laboratory chemicals.
Used advised against	Not intended for diagnostic or therapeutic use.

Details of the supplier

Company name	Hunan Huawei Jingcheng Material Technology Co., Ltd.
Address	Room 516, Hunan International Business Center, Jintai Plaza, East Second Ring, Furong District, Changsha City, Hunan Province, China.
Website	www.hnjc-metal.com
Telephone	0086-731-85124338

Emergency telephone number

Chemtrec
0086-731-85124338

Section 2: HAZARDS IDENTIFICATION

Label Elements

Signal Word: Danger



Hazard statement(s)

H228	Flammable solid.
H302 + H312 + H332	Harmful if swallowed, in contact with skin or if inhaled

Precautionary statement(s)

P210	Keep away from heat/sparks/open flames/hot surfaces. - No smoking.
P240	Ground/bond container and receiving equipment.
P241	Use explosion-proof electrical/ ventilating/ lighting/ equipment.
P261	Avoid breathing dust/ fume/ gas/ mist/ vapors/ spray.
P264	Wash skin thoroughly after handling.

P270	Do not eat, drink or smoke when using this product.
P271	Use only outdoors or in a well-ventilated area.
P280	Wear protective gloves/ protective clothing/ eye protection/ faceprotection.
P301 + P312	IF SWALLOWED: Call a POISON CENTER or doctor/ physician if you feel unwell.
P302 + P352	IF ON SKIN: Wash with plenty of soap and water.
P304 + P340	IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.
P312	Call a POISON CENTER or doctor/ physician if you feel unwell.
P322	Specific measures (see supplemental first aid instructions on this label).
P330	Rinse mouth.
P363	Wash contaminated clothing before reuse.
P370 + P378	In case of fire: Use dry sand, dry chemical or alcohol-resistant foam for extinction.
P501	Dispose of contents/ container to an approved waste disposal plant.

Hazards not otherwise classified (HNOC) or not covered by GHS

None

Section 3: COMPOSITION/INFORMATION ON INGREDIENTS

Chemical characterization: Substances

CAS No. : 12070-14-3

Description :Zirconium carbide

Section 4: FIRST AID MEASURES

Description of first aid measures

General advice	Consult a physician if necessary.
Inhalation	If breathed in, move person into fresh air. If not breathing, give artificial respiration.
Skin Contact	Wash skin with soap and water.
Eye contact	Wash with plenty of water.
Ingestion	Never give anything by mouth to an unconscious person. Clean mouth with water.
Self-Protection of the First Aider	Ensure that medical personnel are aware of the material(s) involved, take precautions to protect themselves and prevent spread of contamination.

Most important symptoms and effects, both acute and delayed

Symptoms No information available. None reasonably foreseeable. May cause allergic skin reaction. Symptoms of allergic reaction may include rash, itching, swelling, trouble breathing, tingling of the hands and feet, dizziness, lightheadedness, chest pain, muscle pain or flushing

Indication of any immediate medical attention and special treatment needed

Note to physicians Treat symptomatically.

Section 5: FIRE FIGHTING MEASURES

Extinguishing media:Sand, dry powder type agents designed for metal powder fires.

Suitable extinguishing agents:

Use water spray, alcohol-resistant foam, dry chemical or carbon dioxide.

Special hazards arising from the substance or mixture: .Not Applicable

Advice for firefighters:Do not apply water to burning material. Full emergency equipment with self-contained breathing

apparatus must be worn by firefighters. During a fire, irritating and toxic gases and aerosols may be generated by thermal decomposition and combustions.

Protective equipment: No special measures required.

Section 6: ACCIDENTAL RELEASE MEASURES

Personal precautions, protective equipment and emergency procedures

Personal precautions Ensure adequate ventilation, especially in confined areas.

For emergency responders Use personal protection recommended in Section 8.

Environmental precautions

Environmental precautions Avoid discharge into drains, water courses or onto the ground.

Methods and materials for containment and cleaning up

Sweep up and shovel. Keep in suitable, closed containers for disposal.

Reference to other sections

For disposal see section 13.

Section 7: HANDLING AND STORAGE

Precautions for safe handling

Advice on safe handling Handle in accordance with good industrial hygiene and safety practice.

General Hygiene Considerations Handle in accordance with good industrial hygiene and safety practice.

Conditions for safe storage, including any incompatibilities

Storage Conditions Keep container tightly closed in a dry and well-ventilated place.

Specific end use(s)

Risk Management Methods (RMM) The information required is contained in this Material Safety Data Sheet.

Section 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Control parameters

This product does not contain any hazardous materials with occupational exposure limits established by the region specific regulatory bodies.

Exposure controls

Appropriate engineering controls

Ensure adequate ventilation, especially in confined areas. Use explosion-proof

electrical/ventilating/lighting/equipment. Ensure that eyewash stations and safety showers are close to the workstation location.

Personal protective equipment Eye/face protection

Eye/face protection

Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin protection

Handle with gloves. Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable laws and good laboratory practices. Wash and dry hands.

The selected protective gloves have to satisfy the specifications of Regulation (EU) 2016/425 and the standard EN 374 derived from it.

Body Protection

Choose body protection in relation to its type, to the concentration and amount of dangerous substances, and to the specific work-place. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Respiratory protection

Respiratory protection is not required. Where protection from nuisance levels of dusts are desired, use type N95 (US) or type P1 (EN 143) dust masks. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU).

Control of environmental exposure

No special environmental precautions required.

Section 9: PHYSICAL AND CHEMICAL PROPERTIES

- a) Appearance: solid
- b) Form: powder
- c) Odor: Oderless
- d) Water Solubility:insoluble
- e) pH: no data available
- f) Boiling point:5100°C
- g) Melting Point:3540°C
- h) Molecular weight:103.235 g/mol
- i) Initial boiling point and boiling range: no data available
- j) Flash point: no data available
- k) Evaporation rate: no data available
- l) OSHA Flammability Class: no data available
- m) Upper/lower flammability or explosive limits: no data available
- n) Vapor pressure: no data available
- o) Vapor density (air = 1): no data available
- p) Partition coefficient - noctanol/water: no data available
- q) Auto-ignition temperature: no data available
- r) Decomposition temperature: no data available
- s) Viscosity: no data available
- t) Explosive properties: no data available

Section 10: STABILITY AND REACTIVITY

Reactivity	Stable under recommended storage conditions
Reacts With	Oxidizing agents
Incompatible Conditions	N/A
Hazardous Decomposition Products	Metal oxide fume, carbon monoxide, carbon dioxide

Section 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: ACGIH A4: Not classifiable as a human carcinogen: Inadequate data

Section 12: ECOLOGICAL INFORMATION

Ecotoxicity No further relevant information available.

Persistence and degradability No information available.

Bioaccumulation No information available.

Mobility No information available.

Other adverse effects No information available

Section 13: DISPOSAL CONSIDERATIONS

13.1. Waste treatment methods

Waste from residues/unused products

Contaminated packaging Disposal should be in accordance with applicable regional, national and local laws and regulations.

Do not reuse container

Section 14: TRANSPORT INFORMATION

Hazardous: Hazardous as powder only.



Hazard Class: 4.1 Flammable solids, self-reactive substances, and solid desensitized explosives

Packing Group: III

UN Number: UN3178

Proper Shipping Name: Flammable solid, inorganic, n.o.s. (Zirconium carbide)

Section 15: REGULATORY INFORMATION

Sec 302 Extremely Hazardous: No

Sec 304 Reportable Quantities: N/A

Sec 313 Toxic Chemicals: No

Section 16: OTHER INFORMATION

This material safety data sheet complies with the requirements of Regulation (EC) No.

1907/2006 Disclaimer

The information provided in this Material Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. 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.

End of Safety Data Sheet

HUAWEI MATERIAL

Experts come from dedication.