CHARING 长林建业

MATERIAL SAFEFY DATA SHEET

Version1.3 Date of last alteration:05/24/2025

1. Chemical Product and Company Identification

Product Name : Calcium Formate
Other name : Formic acid, calcium salt, calcium diformate, Feed Additive
Recommended Uses : Building industry, Concrete cure accelerator, Construction material
Manfacturer : Shandong Charing Industry Co.,Ltd
Address : ROOM 1402,ZONE 17 AND 18, NO.19BUILDING, LUNENG LINGXIUCHENG, JINAN CITY, SHANDONG PROVINCE,CHINA
Post Code : 250000
TEL : +86-131-7667-0070
E-mail : sdcharing@sdcharing.com

2. Hazard identification

2.1 Classification of the substance or mixture

Serious eye damage, Category 1

2.2 GHS label elements, including precautionary statements

Pictogram(s)

Signal word : Danger
Hazard statement(s) : H318 Causes serious eye damage
Precautionary statement(s)
Prevention : P280 Wear protective gloves/protective clothing/eye protection/face protection.
Response : P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P310 Immediately call a POISON CENTER/doctor/…
Storage : none
Disposal : none

2.3 Other hazards which do not result in classification

none

3. Composition, Information on Ingredients

Ingredient

Main ingredient	Composition	CAS NO.
Calcium Formate	≥98%	544-17-2

4. First Aid Measures

4.1 Description of first aid measures

General information:

Under ordinary workplace conditions : No special measures required.

After inhalation:

Provide fresh air.

After contact with the skin:

Wash with plenty of water or water and soap.

After contact with the eyes:

Rinse immediately with plenty of water. Seek medical advice in case of continuous irritation.

5. Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media:

Water spray, water mist , extinguishing powder , foam , carbon dioxide .

Extinguishing media which must not be used for safety reasons : water jet.

5.2 Advice for firefighters

Special protective equipment for fire fighting:

Use respiratory protection independent of recirculated air.

6. Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Avoid dust formation. Do not breathe dust.

6.2 Environmental precautions

Cover any spilled material in accordance with regulations to prevent dispersal by wind.

6.3 Methods and material for containment and cleaning up

Take up mechanically and dispose of according to local/state/federal regulations.

Further information:

Eliminate all sources of ignition. Observe notes under 7.

6.4 Reference to other sections

Relevant information in other sections have to be considered. This applies in particular for information given on personal protective equipment (8.) and on disposal (13.).

7. Handling and storage

Precautions for safe handling

Direct sunshine and raining, moisture must be avoided.

Storage:

Store in a cool, well-ventilated area. Keep away from ignition sources, heat and flame. Store in a tightly closed container. Incompatibilities: strong oxidizing agents and foods.

8. Exposure controls/personal protection

8.1 Control parameters

Occupational Exposure limit values

no data available

Biological limit values

no data available

8.2 Appropriate engineering controls

Handle in accordance with good industrial hygiene and safety practice.

Wash hands before breaks and at the end of workday.

8.3 Individual protection measures, such as personal protective equipment (PPE)

Eye/face protection

Safety glasses with side-shields conforming to EN166. Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

Skin protection

Wear impervious clothing. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace. 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 protective

gloves accordance with applicable laws and good laboratory practices. Wash and dry hands. The selected have to satisfy the specifications of EU Directive 89/686/EEC and the standard EN 374 derived from it.

Respiratory protection

Wear dust mask when handling large quantities.

Thermal hazards

no data available

9. Physical and chemical properties

Physical state	: white to almost white fine crystalline powder
Colour	: Orthorhombic crystals or crystalline powder
Odour	: Slight acetic acid-like odor
Melting point/ freezing point	: >300℃
Boiling point or initial boiling point and boiling range	: 100.6oC at 760mmHg
Flammability	: Not combustible
Lower and upper explosion limit / flammability limit	: No data available
Flash point	: 29.9℃
Auto-ignition temperature	: 475°C
Decomposition temperature	: >800°C
pH	: No data available
Kinematic viscosity	: No data available
Solubility	: In water: SOLUBLE
Partition coefficient n-octanol/water(log value)	: -2.47
Vapour pressure	: No data available
Density and/or relative density	: 2.02 g/cm3
Relative vapour density	: No data available
Particle characteristics	: No data available

10. Stability and reactivity

10.1 Chemical stability

Stableundernormaltemperaturesandpressures

10.2 Conditions to avoid

Incompatiblematerials,dustgeneration,excessheat,strongoxidants.

10.3 Hazardous decomposition products

CarbonMonoxide,irritatingandtoxicfumesandgases, carbondioxide

11. Toxicological information

11.1	**Epidemiology**	: No information available
11.2	**Teratogenicity**	: No information available
11.3	**ReproductiveEffects**	: No information available
11.4	**Neurotoxicity**	: No information available
11.5	**Mutagenicity**	: No information available
11.6	**Otherstudies**	: No data available

12. Ecological Information

No information available.

13. Disposal considerations

Discarded chemical isclassified asa hazardous waste.Additionally,waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.

14. Transport information

14.1-4 UN number; UN proper shipping name; Transport hazard class(es); Packing group

Road ADR:

Valuation : Not regulated for transport by IMDG/IMO

Railway RID:

Valuation : Not regulated for transport by IMDG/IMO

Transport by sea IMDG-Code:

Valuation : Not regulated for transport by IMDG/IMO

Air transport ICAO-TI/IATA-DGR:

Valuation According to IMDG/IMO,it's not dangerous cargo : Not regulated for transport by IMDG/IMO

15. Regulatory information

Reference to the local, national, US, EU and international regulation

TSCA : US

16. Other information

The details in this document are based on the state of our knowledge at the time of revision. They do not constitute an assurance of the described product properties in terms of statutory warranty requirements. The providing of this document to a recipient does not relieve the recipient of his or her responsibility toward compliance with all laws and stipulations applicable to the product. This applies in particular to the further sale or distribution of the product or substances or items containing the product, in other jurisdictions and with regard to the protection of third-party intellectual property rights. If the described product is processed or mixed with other substances or materials, the details stated in this document cannot be conferred to the resultant new product unless this has been expressly mentioned. If the product is repackaged, the recipient is obligated to additionally provide the required safety-related information.