



DESIGN REPORT OF SAFETY DATA SHEET

No.: 220100320415957E

Date: Jun.21,2022

Name of the sample	2-Hydroxypropyl methacrylate (HPMA)		
Applicant	Chizhou Fangda Science and Technology Co., Ltd.		
Supplier	Chizhou Fangda Science and Technology Co., Ltd.		
Composition of the sample	2-Hydroxypropyl methacrylate (HPMA): $\geq 98\%$		
Warranty of Design	GLOBALLY HARMONIZED SYSTEM OF CLASSIFICATION AND LABELLING OF CHEMICALS (GHS) Ninth revised edition		
Design Result of SDS please see next page.			
Designer	孙越越	Approver	<i>For and on behalf of</i> CCIC JIANGSU CO., LTD. 中国检验认证集团江苏有限公司 王珍

4 授权签字人 Authorized Signature(s)

Notes: This SDS is valid before the implementation of the Tenth revised edition GHS.



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Section 1 Product and Company Identification

> Product Identifier

Product Name	2-Hydroxypropyl methacrylate (HPMA)
Synonyms	-
CAS No.	27813-02-1
EC No.	248-666-3
Molecular Formula	C ₇ H ₁₂ O ₃

> Relevant Identified Uses of the Substance or Mixture and Uses Advised Against

Relevant Identified Uses	Please consult manufacturer.
Uses Advised Against	Please consult manufacturer.

> Details of the Supplier of the Safety Data Sheet

Applicant Name	Chizhou Fangda Science and Technology Co., Ltd.
Application Address	Xiangyu Chemical Park, Dongzhi County, Anhui, China
Applicant Post Code	247260
Supplier Name	Chizhou Fangda Science and Technology Co., Ltd
Supplier Address	Xiangyu Chemical Park, Dongzhi County, Anhui, China
Supplier Post Code	247260

Section 2 Hazards Identification

Hazard class and label elements of the product according to GHS (the ninth revised edition):

> GHS Hazard Class

Sensitization-Skin	Category 1
--------------------	------------



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Serious Eye
Damage/Eye Irritation

Category 2A

> GHS Label Elements

Pictogram



Signal Word

Warning

> Hazard Statements

H317 May cause an allergic skin reaction
H319 Causes serious eye irritation

> Precautionary Statements

Prevention

P261 Avoid breathing dust/fume/gas/mist/vapours/spray.
P272 Contaminated work clothing should not be allowed out of the workplace.
P280 Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.
P264+P265 Wash hands and other contact area thoroughly after handling. Do not touch eyes.

Response

P321 Specific treatment (see measures on this label).
P302+P352 IF ON SKIN: Wash with plenty of water.
P333+P317 If skin irritation or rash occurs: Get medical help.
P337+P317 If eye irritation persists: Get medical help.
P362+P364 Take off contaminated clothing and wash it before reuse.
P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Storage

Not applicable

Disposal

P501 Dispose of contents/container in accordance with local/regional/national/ international regulations.

Section 3 Composition/Information on Ingredients

Component	CAS No.	EC No.	Concentration (weight percent, %)
2-Hydroxypropyl methacrylate (HPMA)	27813-02-1	248-666-3	≥ 98



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Section 4 First Aid Measures

> Description of First Aid Measures

General Advice	Immediate medical attention is required. Show this safety data sheet (SDS) to the doctor in attendance.
Eye Contact	Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician if feel uncomfortable.
Skin Contact	Take off contaminated clothing and shoes immediately. Wash off with plenty of water for at least 15 minutes and consult a physician if feel uncomfortable.
Ingestion	Do not induce vomiting. Never give anything by mouth to an unconscious person. Call a physician or Poison Control Center immediately.
Inhalation	Move victim into fresh air. If breathing is difficult, give oxygen. Do not use mouth to mouth resuscitation if victim ingested or inhaled the substance. If not breathing, give artificial respiration and consult a physician immediately.
Protecting of First-aiders	Ensure that medical personnel are aware of the substance involved. Take precautions to protect themselves and prevent spread of contamination.

> Most Important Symptoms and Effects, both Acute and Delayed

- 1 Substance accumulation, in the human body, may occur and may cause some concern following repeated or long-term occupational exposure.

> Indication of Any Immediate Medical Attention and Special Treatment Needed

- 1 Treat symptomatically.
- 2 Symptoms may be delayed.

Section 5 Fire Fighting Measures

> Extinguishing Media

Suitable Extinguishing Media	Dry chemical, carbon dioxide, water spray, alcohol-resistant foam.
Unsuitable Extinguishing Media	Do not use a solid water stream as it may scatter or spread fire.

> Specific Hazards Arising from the Substance or Mixture

- 1 Containers may explode when heated.
- 2 Fire exposed containers may vent contents through pressure relief valves.
- 3 May expansion or decompose explosively when heated or involved in fire.

> Advice for Firefighters

- 1 As in any fire, wear self-contained breathing apparatus (MSHA/NIOSH approved or equivalent) and full protective gear.
- 2 Fight fire from a safe distance, with adequate cover.
- 3 Prevent fire extinguishing water from contaminating surface water or the ground water system.



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Section 6 Accidental Release Measure

> Personal Precautions, Protective Equipment and Emergency Procedures

- 1 Ensure adequate ventilation. Remove all sources of ignition.
- 2 Evacuate personnel to safe areas. Keep people away from and upwind of spill/leak.
- 3 Use personal protective equipment. Avoid breathing vapours, mist, gas or dust.

> Environmental Precautions

- 1 Prevent further leakage or spillage if safe to do so.
- 2 Discharge into the environment must be avoided.

> Methods and Materials for Containment and Cleaning Up

- 1 Absorb spilled material in dry sand or inert absorbent. In case of large amount of spillage, contain a spill by bunding.
- 2 Adhered or collected material should be promptly disposed of, in accordance with appropriate laws and regulations.
- 3 Remove all sources of ignition. Use spark-proof tools and explosion-proof equipment.

Section 7 Handling and Storage

> Precautions for Handling

- 1 Handling is performed in a well ventilated place.
- 2 Wear suitable protective equipment.
- 3 Avoid contact with skin and eyes.
- 4 Keep away from heat/sparks/open flames/ hot surfaces.
- 5 Take precautionary measures against static discharges.

> Precautions for Storage

- 1 Keep containers tightly closed.
- 2 Keep containers in a dry, cool and well-ventilated place.
- 3 Keep away from heat/sparks/open flames/ hot surfaces.
- 4 Store away from incompatible materials and foodstuff containers.

Section 8 Exposure Controls/Personal Protection

> Control Parameters

Occupational Exposure Limit Values

No information available



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised Edition)

SDS

Date: Jun.21,2022

Biological Limit Values

No information available

Monitoring Methods

- 1 EN 14042 Workplace atmospheres. Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents.
- 2 GBZ/T 160 Determination of toxic substances in workplace air(Series effective standard)and GBZ/T 300 Determination of toxic substances in workplace air(Series standard).

> Engineering Controls

- 1 Ensure adequate ventilation, especially in confined areas.
- 2 Ensure that eyewash stations and safety showers are close to the workstation location.
- 3 Use explosion-proof electrical/ventilating/lighting/equipment.
- 4 Set up emergency exit and necessary risk-elimination area.

> Personal Protection Equipment

Eye Protection	Tightly fitting safety goggles (approved by EN 166(EU) or NIOSH (US).
Hand Protection	Wear protective gloves (such as butyl rubber) , passing the tests according to EN 374(EU),US F739 or AS/NZS 2161.1 standard.
Respiratory protection	If exposure limits are exceeded or if irritation or other symptoms are experienced, use a full-face respirator with multi-purpose combination (US) or type AXBEK (EN 14387) respirator cartridges.
Skin and Body Protection	Wear fire/flare resistant/retardant clothing and antistatic boots.

Section 9 Physical and Chemical Properties

Appearance: Colorless transparant liquid	Odor: No information available
Odor Threshold: No information available	pH: 6
Melting Point/Freezing Point (°C): -58	Initial Boiling Point and Boiling Range (°C): 240
Flash Point (°C)(Closed Cup): 101	Evaporation Rate: No information available
Flammability: Not applicable	Upper/lower explosive limits[% (v/v)]: Upper limit: No information available; Lower limit: No information available
Vapor Pressure (KPa): 0.1 hPa (20 °C)	Relative Vapour Density(Air=1): No information available
Relative Density(Water=1): 1.029	Solubility: No information available
n-Octanol/Water Partition Coefficient: No information available	Auto-Ignition Temperature(°C): No information available
Decomposition Temperature (°C): No information available	Kinematic Viscosity (mm²/s): No information available
Particle characteristics: Not applicable	

Section 10 Stability and Reactivity



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Reactivity	Contact with incompatible substances can cause decomposition or other chemical reactions.
Chemical Stability	Stable under proper operation and storage conditions.
Possibility of Hazardous Reactions	No information available
Conditions to Avoid	Incompatible materials, heat, flame and spark.
Incompatible Materials	No information available
Hazardous	Under normal conditions of storage and use, hazardous decomposition products
Decomposition products	should not be produced.

Section 11 Toxicological Information

> Acute Toxicity

Component	CAS No.	LD ₅₀ (Oral)	LD ₅₀ (Dermal)	LC ₅₀ (Inhalation, 4h)
2-Hydroxypropyl methacrylate (HPMA)	27813-02-1	11200mg/kg(Rat)	No information available	No information available

> Skin Corrosion/Irritation

No information available

> Serious Eye Damage/Irritation

Causes serious eye irritation(Category 2A)(2-Hydroxypropyl methacrylate (HPMA))

> Skin Sensitization

May cause an allergic skin reaction(Category 1)(2-Hydroxypropyl methacrylate (HPMA))

> Respiratory Sensitization

No information available

> Germ Cell Mutagenicity

No information available

> Carcinogenicity

ID	CAS No.	Component	IARC	NTP
1	27813-02-1	2-Hydroxypropyl methacrylate (HPMA)	Not Listed	Not Listed



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

> Reproductive Toxicity

No information available

> Reproductive Toxicity (Additional)

No information available

> STOT-Single Exposure

No information available

> STOT-Repeated Exposure

No information available

> Aspiration Hazard

No information available

Section 12 Ecological Information

> Acute Aquatic Toxicity

No information available

> Chronic Aquatic Toxicity

No information available

> Others

Persistence and
Degradability
Bioaccumulative
Potential

No information available

Mobility in Soil

No information available

Results of PBT and
vPvB Assessment

2-Hydroxypropyl methacrylate (HPMA) does not meet the criteria for PBT and vPvB according to Regulation (EC) No 1907/2006, annex XIII.

Section 13 Disposal Considerations

Waste Chemicals
Contaminated
Packaging
Disposal
Recommendations

Before disposal should refer to the relevant national and local laws and regulation. Containers may still present chemical hazard when empty. Keep away from hot and ignition source of fire. Return to supplier for recycling if possible. Refer to Waste chemicals and Contaminated packaging.



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Section 14 Transport Information

Transporting Label	Not applicable
UN Number	-
UN Proper Shipping Name	NOT REGULATED FOR TRANSPORT OF DANGEROUS GOODS
Transport Hazard Class	None
Transport Subsidiary Hazard Class	None
Packing Group	-

Section 15 Regulatory Information

> International Chemical Inventory

Component	EINECS	TSCA	DSL	IECSC	NZIoC	PICCS	KECI	AICS	ENCS
2-Hydroxypropyl methacrylate (HPMA)	√	√	√	√	√	√	√	√	√

- 【EINECS】 European Inventory of Existing Commercial Chemical Substances.
【TSCA】 United States Toxic Substances Control Act Inventory.
【DSL】 Canadian Domestic Substances List.
【IECSC】 China Inventory of Existing Chemical Substances.
【NZIoC】 New Zealand Inventory of Chemicals.
【PICCS】 Philippines Inventory of Chemicals and Chemical Substances.
【KECI】 Existing and Evaluated Chemical Substances.
【AICS】 Australia Inventory of Chemical Substances.
【ENCS】 Existing And New Chemical Substances.

Note

“√” Indicates that the substance included in the regulations

“×” That no data or included in the regulations

Section 16 Additional Information

Creation Date	Jun.21,2022
Revision Date	Jun.21,2022
Reason for Revision	-

> Disclaimer



中国检验认证集团

CHINA CERTIFICATION & INSPECTION GROUP

正本
ORIGINAL

2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

This Safety Data Sheet (SDS) was prepared according to UN GHS (the 9th revised edition). The data included was derived from international authoritative database and provided by the enterprise. Other information was based on the present state of our knowledge. We try to ensure the correctness of all information. However, due to the diversity of information sources and the limitations of our knowledge, this document is only for user's reference. Users should make their independent judgment of suitability of this information for their particular purposes. We do not assume responsibility for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product.



2-Hydroxypropyl methacrylate (HPMA)

SAFETY DATA SHEET

No.: 220100320415957E

Warranty of Design: GHS (Ninth Revised
Edition)

SDS

Date: Jun.21,2022

Terms of the Using of the Report

1. The report is issued by CCIC according to the information of the chemicals and the information of its shipping provided by the applicant (shipper or his agent).
2. According to the demand of this SDS, CCIC requires the applicant to provide true and exact sample and data.
3. Information from applicant is the key of this SDS, so CCIC will not respond for the wrong of applicant.
4. Unless otherwise stated, the results shown in this test report refer only to the sample(s) tested.
5. This report will be effective only after it is signed by the inspector, approver and stamped by CCIC.
6. CCIC guarantees the objectivity and fairness of this report, and carries out confidentiality obligations on business secrets such as business information, technical documents and so on.
7. The partly duplicating of this report is prohibited without the written approver of CCIC.
8. The report is invalid when anything of the following happens-illegal transfer, embezzlement, imposture, modification or tampering in any media form.

