Report No. : ZYT210317002R01

MATERIAL SAFETY DATA SHEET (MSDS)

Prepared for	:	JINHUA WANHAO SPARE PARTS CO., LTD
Address	:	No. 77 West Renmin Road, Jinhua City, Zhejiang Province
Prepared by	:	Shenzhen ZYT Testing Co., Ltd.
Address	:	No. 1007, Heer Road, Shajing street, Bao'an District, Shenzhen City, Guangdong Province, China
Tel.	:	0755-33124556
Report Number	:	ZYT210317002R01
Date of Conduct	:	Aug 03, 2021
Date of Report	:	Aug 03, 2021

Tested by: Thea su Reviewed by: Larson liang Approved by:

Thea su

Larson liang

SHENZHEN ZHONG YA TESTING CO., LTD Special report JACK (Official Seal)

1 - Identification of the substance /preparation and of the company/undertaking

Product identifier

Product name	:	Photosensitive Resin
Model number	:	/
Country of origin	:	/
Export country	:	/
CAS number	:	Refer to section 3
EINECS number	:	Refer to section 3
Molecular formula	:	Refer to section 3

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

Relevant identified uses	:	No information available.
Uses advised against	:	No information available.

Details of the supplier of the safety data sheet

Manufacture name	:	Zhejiang Weibin 3D Technology Co., Ltd
Address	:	No. 18 Zhen Shan Road, Chang Kou Town, Fuyang District, Hangzhou City, Zhejiang Province
Telephone	:	/
E-mail	:	/

Emergency telephone number

Emergency phone	:	/

2 - Hazards Identification

Hazards Classification

In accordance with Regulation (EC) No.1272/2008(CLP), the sample is divided into the following hazard category.

Classification according to Regulation (EC) No 1272/2008

4-acryloylmorpholine CAS Number: 5117-12-4

Acute toxicity, oral (Category 4), H302

Specific target organ toxicity, repeated exposure (Category 2), H373

Serious eye damage/eye irritation (Category 1), H318

Sensitization, Skin (Category 1), H317

Hazard statement(s)	:	H302 Harmful if swallowed H373 Causes damage to organs through prolonged or repeated exposure H318 Causes serious eye damage H317 May cause an allergic skin reaction
Preventive measure	:	P280 Wear protective gloves/protective clothing/eye protection/face protection. P264 Wash hand thoroughly after handling. P270 Do not eat, drink or smoke when using this product. P260 Do not breathe dust/fume/gas/mist/vapors/spray. P261 Avoid breathing dust/fume/gas/mist/vapors/spray. P272 Contaminated work clothing should not be allowed out of the workplace.
Precautionary Statement Response	:	P302+P352 IF ON SKIN: wash with plenty of water. P314 Get medical advice/attention if you feel unwell. P333+P313 IF SKIN irritation or rash occurs: Get medical advice/attention. P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do - continue rinsing. P363 Wash contaminated clothing before reuse. P301+P312 IF SWALLOWED: call a POISON CENTER/doctor. IF you feel unwell. P330 Rinse mouth. P310 Immediately call a POISON CENTER or doctor/physician. P321 Specific treatment (see the label).
Precautionary statements-Disposal	:	P501 Dispose of contents/ container to an approved waste disposal plant.

Other hazards

Not data available.

Burn & burst danger : The sample is not flammable.

3 - Composition / Information on Ingredients

Substance/preparation: Preparation				
Component/ Substance	**Molecular Formula**	**Percent of Content**	**CAS Number**	**EINECS Number**
Bisphenol A epoxy diacrylate	$(C_{15}H_{16}O_2 \cdot C_3H_5ClO)x \cdot xC_3H_4$	45%	55818-57-0	500-130-2
4-acryloylmorpholine	$C_{10}H_{12}N_2O_2$	10%	5117-12-4	418-140-1
Polyethylene glycol 200 diacrylate	$C_5H_{10}O_4$	10%	26570-48-9	--
TMP3EOTA	$C_{21}H_{32}O_9$	12%	28961-43-5	--
TMP15EOTA	$C_{21}H_{32}O_9$	6%	28961-43-5	--
CTFA	$C_{17}H_{14}Br_4O_4$	16%	126-00-1	204-763-2
TPO	$C_{22}H_{21}O_2P$	5%	75980-60-8	278-355-8
Poly propylene glycol	$C_6H_{14}O_3$	0.30%	25322-69-4	200-338-0

4 - First Aid Measures

After skin contact	:	In case of irritation or sensitisation, Wash off with soap and plenty of water. Take victim immediately to hospital. Consult a physician.
After eye contact	:	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses. If present and easy to do, continue rinsing call a poison center or doctor if you fell unwell. If eye irritation persists: Get medical advice/attention.
After inhalation	:	If inhaled remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a POISON CENTER/doctor, if you feel unwell.
After ingestion	:	If swallowed, rinse mouth. Never give anything by mouth to an unconscious person. If large quantities of this material are swallowed, immediately call a POISON CENTER or doctor/physician.
Most important symptoms and effects, both acute and delayed	:	No known symptoms or effects.
Indication of any immediate medical attention and special treatment needed	:	No data available.

5 - Fire Fighting Measures

Suitable Fire Extinguishing Media	:	Foam, carbon dioxide, dry chemical extinguishers.
Special Remarks On Fire Hazards	:	The sample is not flammable. The smoke of combustion may cause apnea, irritation.
Special Fire Fighting Procedures	:	As soon as possible, remove the goods from fire to open place. For small fires, use dry chemical, carbon dioxide, water spray or alcohol-resistant foam. For large fires, Standing on the windward, Use water spray to cool fire-exposed containers.

6 - Accidental Release Measures

Combustion Products	:	Carbon monoxide, carbon dioxide, nitrogen oxides and other unidentified product.
Protective Equipment	:	The staff must equipped with filter mask(full mask) or isolated breathing apparatus. The staff must wear the clothes which can defend the fire.

Personal precautions, protective equipment and emergency procedures	:	Use personal protective equipment. Avoid breathing dust, smoke, vapours, mist or gas. Ensure adequate ventilation. Remove all sources of ignition. Evacuate personnel to safe areas.
Measures for environment protection	:	Collect leaking, avoid environmental pollution, and prevent from spreading or entering into sewers, surface water and groundwater.
Methods and materials for containment and cleaning up	:	Pick up and arrange disposal without creating dust. Sweep up and shovel. Keep in suitable, closed containers for disposal.
Additional information	:	Prevent birds or fish feeding by the drainage system, must be completely recycled.

7 - Handling and Storage

Precautions for safe handing	:	Avoid formation of dust and aerosols. Avoid contact with skin and eyes. Operating personnel must train specially and follow close to the line of operating instruction. Avoid accumulate dust. Wear suitable protective clothing, gloves and eye/face protection.
Conditions for safe storage, including any incompatibilities	:	Protect from freezing and sunlight. Packing require seal. Keep container tightly closed in a cool, well-ventilated place. Keep away from sources of ignition - No smoking. Keep separate with the oxidizing agent. Equip with relevant type and quantities of the extinguishment instruments. Keep the sample as a easy identification.

8 - Exposure Controls / Personal Protection

Maximum admissible concentration	:	No standard yet
Monitoring Method	:	No data available.
Engineering Control	:	Equipped with an eyewash facility and a safety shower. Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits
Respiratory Protection	:	Wear suitable mask. If the dust density exceed in the air, must wear air-purifying respirators.
Eye Protection	:	Wear suitable chemical safety goggles.
Body Protection	:	Wear suitable safety cloth.
Hands Protection	:	Wear suitable protective gloves.
Other Protection	:	No smoking, dining and drinking water in the workplace. Keep good habit of hygiene. Shower and change clothes after work.

9 - Physical and Chemical Properties

Appearance	:	Liquid	**Odor**	:	Odorless
Color	:	Red	**pH**	:	No data available.
Melting Point	:	No data available.	**Density**	:	No data available.
Boiling point	:	No data available.	**Flashing Point**	:	350℃.
Explosion Upper Limits	:	No data available.	**Explosion Lower Limits**	:	No data available.
Ignition temperature	:	No data available.	**Decomposition temperature**	:	No data available.
Solubility	:	No data available.			

10 - Stability and Reactivity

Stability	:	Stable under normal temperature and pressure
Conditions To Avoid	:	Avoid fire, elevated temperatures, direct sunlight.
Possibility of hazard reactions	:	No data available.
Incompatible materials	:	Incompatible with acids, oxidizing agents, basis etc.
Hazardous Decomposition Products	:	No data available.

11 - Toxicological Information

Acute Toxicity	:	No data available.
Skin corrosion/ irritation	:	No data available.
Serious eye damage/ eye irritation	:	No data available.
Respiratory or skin Sensitization	:	No data available.
Germ cell mutagenicity	:	No data available.
Carcinogenicity	:	IARC: No ingredients at levels greater than or equal to 0.1% is identified as probable, possible or confirmed human carcinogen by IARC.
Reproductive toxicity	:	No data available.
Specific target organ toxicity-single exposure	:	No data available.
Specific target organ toxicity-repeated exposure	:	No data available.
Aspiration hazard	:	No data available.
Potential invasion route	:	Skin contact : Dust may cause irritation.
	:	Eye contact : Dust may cause irritation.
	:	Inhalation : May cause respiratory tract irritation, coughing, etc.
	:	Ingestion : If swallows, may cause discomfort, and effect people's digestive system.

12 - Ecological Information

Toxicity	:	No data available.
Persistence and degradability	:	No data available.
Bioaccumulative potential	:	No data available.
Mobility in soil	:	No data available.
Other adverse effects	:	It might cause pollution when released large-scale to the air, water.

13 - Disposal Considerations

Nature of waste	:	This product is not regarded as hazardous waste.
Waste disposal methods	:	Offer surplus and non-recyclable solutions to a licensed disposal company. Refer to National or Local regulations before handling.
Attention abandoned	:	Avoid abandon to the water.

14 - Transport Information

Transport Attentions:

The products restrict the use of own steel tanker shipment when railway transport, submit to relevant departments for approval. The transport vehicles should be equipped with the appropriate variety and quantity of fire control equipment and emergency equipment for leakage. In summer, best transport in morning or evening. Transport tank should have grounding chain, the inner of tank should have baffle hole plate to reduce static electricity. Ban mixed operation with antioxidants, acid, alkali metal and amine. Prevent insolate, rain and heat in transit. Keep away from fire, heat and high temperature when stopover. Exhaust pipes of transport vehicle must be equipped with fire retardant equipment. Ban load and unload with mechanical equipments and tools that easy to produce the spark. According to prescribed routes when road transport. Do not stay in residential area and densely populated area. Ban humping when railway transport. Ban bulk transport use wooden boats, concrete boats.

Please refer to section 7-HANDING AND STORAGE also, and requirements of the IATA/ICAO/PG.

Maritime transport IMDG

IMDG Code	:	Not hazardous goods
UN-Number	:	No data available.
Packing group	:	No data available.
Proper shipping name	:	No data available.

Land transport ADR/RID(cross-border)

Hazard class	:	Not hazardous goods
UN-Number	:	No data available.
Packing group	:	No data available.
Proper shipping name	:	No data available.

Air transport ICAO-TI and IATA-DGR

ICAO-TI-II class	:	Not hazardous goods
UN/ID Number	:	No data available.
Packing group	:	No data available.
Proper shipping name	:	No data available.

15 - Regulatory Information

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

German regulations concerning the classification of hazard for water(WGK)	:	Not listed
Substance of Very High Concern (SVHC) according to Regulation (EC) No. 1907/2006 (REACH)	:	Not listed
The conditions of restrictions according to Regulation (EC) No. 1907/2006 (REACH) Article 67 and Annex XVII for the manufacturing, placing on the market and use must be observed	:	Not listed
Regulation (EC) No. 1907/2006 (REACH) Annex XVII (requiring Authoursation for use)	:	Not listed
Regulation (EC) No. 1907/2006 (REACH)-Pre-registered substance.	:	Not listed
Regulation (EC) No. 1005/2009 on substances that deplete the ozone layer	:	Not listed
Regulation (EC) No 649/2012 concerning the export and import of dangerous chemicals, Annex I	:	Not listed
ELINECS(European List of Notified Chemical Substances)	:	Not listed
German regulations concerning the classification of hazard for water(WGK)	:	Not listed
Chemical Safety Assessment	:	No data available.

16 - Other Information

Abbreviations and acronyms:

ADR : European Agreement concerning the International Carriage of Dangerous Goods by Road

CAS : Chemical Abstracts Service

CLP : Classification Packaging and

Labelling EC : European Commission

EINECS : The European Inventory of Existing Commercial Chemical

Substances IARC : International Agency for Research on Cancer

IATA : International Air Transport Association

ICAO : International Civil Aviation Organization

IMDG : International Maritime Dangerous

Goods

RID : Regulations Relating to International Carriage of Dangerous Goods by Rail

Disclaimer:

The information in this Material Safety Data Sheet (MSDS) was obtained from sources which we believe are reliable; however, the information is provided without any representation of warranty, expressed or implied, regarding the accuracy or correctness. The conditions or methods of handling, storage, use and disposal of the product are beyond our control and may be beyond our knowledge. For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage, or expense arising out of or in any way connected with the handling, storage, use, or disposal of this product. All information, recommendations, and suggestions appearing herein concerning this product are taken from sources or based upon data believed to be reliable.

STATEMENT

1. The equipment lists are traceable to the national reference standards.

2. The test report can not be partially copied unless prior written approval is issued from our lab.

3. The test report is invalid without stamp of laboratory.

4. The test report is invalid without signature of person(s) testing and authorizing.

5. The test process and test result is only related to the Unit Under Test.

6. The quality system of our laboratory is in accordance with ISO/IEC17025.

7. If there is any objection to report, the client should inform issuing laboratory within 15 days from the date of receiving test report.

※※※※※ END ※※※※※