



Material Safety Data Sheet

SECTION 1: Product and Company Identification

Product identifier

Substance name: Amine-terminated Polyether
Alternate name: Polyether amine
Product name: Amine-terminated Polyether ZM-1100
CAS NO.: 83713-01-3

Details of the supplier of the safety data sheet

Manufacturer: ZIBO ZHENGDA POLYURETHANE CO.,LTD.
Add: RM 1904, ChuangYeHuoJuGuangChang E, Zhangdian, Zibo City, Shandong Province, P.R.China
P.C: 255000
Tel: +86-533-3146343
Fax: +86-533-3142021
E-mail: arnie@dexin-chem.com
Web: www.china-polyol.com

Distributed by: Palmer Holland, Inc.
25000 Country Club Blvd., Suite 444
North Olmsted, OH 44070-5331
Emergency Telephone No.:
Palmer Holland: 800-635-4822
Chemtec: 800-424-9300

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification (REGULATION (EC) No 1272/2008)
Not a hazardous substance or mixture.

2.2 Label elements

Labelling (REGULATION (EC) No 1272/2008)
Not a hazardous substance or mixture.

2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Ecological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Toxicological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.



SECTION 3: Composition/information on ingredients

Substances

name	CAS number	EC-NO.	Concentration (% w/w)
AMINE-TERMINATED POLYETHER	83713-01-3	Polymer	≤100

SECTION 4: First aid measures

4.1 Description of first aid measures

General advice

Treat symptomatically

Get medical attention if symptoms occur.

Protection of first-aiders

No special precautions are necessary for first aid responders.

No action shall be taken involving any personal risk or without suitable training.

If inhaled

If inhaled, remove to fresh air.

Get medical attention if symptoms occur.

In case of skin contact

Wash with water and soap as a precaution.

In case of eye contact

Rinse thoroughly with plenty of water, also under the eyelids.

Remove contact lenses.

If eye irritation persists, consult a specialist.

If swallowed

Keep respiratory tract clear.

Never give anything by mouth to an unconscious person.

If symptoms persist, call a physician

4.2 Most important symptoms and effects, both acute and delayed

None known.

4.3 Indication of any immediate medical attention and special treatment needed

Treatment: Treat symptomatically.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media:

Water spray

Alcohol-resistant foam

Carbon dioxide (CO₂)

Dry chemical

Unsuitable extinguishing media:

Exercise caution when using a high volume water jet as it may



scatter and spread fire.

5.2 Special hazards arising from the substance or mixture

Specific hazards during firefighting: No information available.

Hazardous combustion products: No hazardous combustion products are known

5.3 Advice for firefighters

Special protective equipment for firefighters: Wear self-contained breathing apparatus for firefighting if necessary.

Specific extinguishing methods: No data is available on the product itself.

Further information: No action shall be taken involving any personal risk or without suitable training.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions: Avoid dust formation.
Refer to protective measures listed in sections 7 and 8.

6.2 Environmental precautions

Environmental precautions: If the product contaminates rivers and lakes or drains inform respective authorities.

6.3 Methods and material for containment and cleaning up

Methods for cleaning up: Pick up and arrange disposal without creating dust.
Sweep up and shovel.
Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For disposal considerations see section 13., See Section 1 for emergency contact information., For personal protection see section 8.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advice on safe handling: For personal protection see section 8. Smoking, eating and drinking should be prohibited in the application area.

Advice on protection against fire and explosion: Provide appropriate exhaust ventilation at places where dust is formed.



AMINE-TERMINATED POLYETHER ZM-1100 Version: 1.0 Date: 11.20.2020 Page 4/11

Hygiene measures: General industrial hygiene practice.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storage areas and containers: No special storage conditions required. Keep in properly labelled containers.

Advice on common storage: For incompatible materials please refer to Section 10 of this SDS.

Further information on storage stability: Stable under normal conditions.

7.3 Specific end use(s)

Specific use(s): No data available

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Contains no substances with occupational exposure limit values.

8.2 Exposure controls

Personal protective equipment

Eye protection: Safety glasses with side-shields

Hand protection Remarks: Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. The suitability for a specific workplace should be discussed with the producers of the protective gloves.

Skin and body protection: Choose body protection according to the amount and concentration of the dangerous substance at the work place.

Respiratory protection: No personal respiratory protective equipment normally required

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state: solid

Colour: white

Odour : amine-like

Odour Threshold: No data available



pH:	No data available
Melting point:	29 °C
Boiling point:	No data available
Flash point :	250 °C Method: closed cup
Evaporation rate:	No data available
Flammability (solid, gas):	No data is available on the product itself.
Burning rate :	No data is available on the product itself.
Upper explosion limit / Upper flammability limit :	No data available
Lower explosion limit / Lower flammability limit:	No data available
Vapour pressure:	No data available
Relative vapour density:	No data available
Relative density:	1.07
Density:	No data available
Solubility(ies)	No data available
Water solubility:	
Solubility in other solvents:	Not determined
Partition coefficient: n-octanol/water:	No data is available on the product itself
Auto-ignition temperature :	No data is available on the product itself.
Decomposition temperature :	No data is available on the product itself.
Viscosity	No data available
Viscosity, dynamic:	



Viscosity, kinematic: No data available

Explosive properties: No data is available on the product itself

Oxidizing properties: No data is available on the product itself.

9.2 Other information

Molecular weight: 1 000 g/mol

SECTION 10: Stability and reactivity

10.1 Reactivity

No dangerous reaction known under conditions of normal use.

10.2 Chemical stability

Stable under normal conditions.

10.3 Possibility of hazardous reactions

Hazardous reactions: Dust may form explosive mixture in air.

10.4 Conditions to avoid

Conditions to avoid: None known

10.5 Incompatible materials

Materials to avoid: None known

10.6 Hazardous decomposition products

No hazardous decomposition products are known.

SECTION 11: Toxicological information

11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008

Acute toxicity

Acute oral toxicity: LD50 (Rat, male and female): 15 380 mg/kg

Acute inhalation toxicity: No data available

Acute dermal toxicity – Product: Assessment: The substance or mixture has no acute dermal toxicity

Acute toxicity (other routes of administration): No data available



Skin corrosion/irritation

Species: Rabbit

Remarks: slight irritation

Serious eye damage/eye irritation

Species: Rabbit

Remarks: slight irritation

Respiratory or skin sensitisation

No data available

Assessment: No data available

Germ cell mutagenicity

Product:

Genotoxicity in vitro:

Metabolic activation: with and without metabolic activation

Method: OECD Test Guideline 471

Result: negative

Metabolic activation: with and without metabolic activation

Method: OECD Test Guideline 473

Result: negative

Genotoxicity in vivo: No data available

Germ cell mutagenicity Assessment: No data available

Carcinogenicity

No data available

Carcinogenicity – Assessment: No data available

Reproductive toxicity

Effects on fertility: No data available

Effects on foetal development: No data available

Reproductive toxicity – Assessment: No data available

STOT - single exposure

No data available

STOT - repeated exposure



No data available

Repeated dose toxicity

Product:

Species: Rat, male and female

NOAEL: 1000

Application Route: Ingestion Method:

Subacute toxicity

Repeated dose toxicity – Assessment: No data available

Aspiration toxicity

No data available

11.2 Information on other hazards

Endocrine disrupting properties

Product:

Assessment:

The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Experience with human exposure

General Information: No data available

Inhalation: No data available

Skin contact: No data available

Eye contact: No data available

Ingestion: No data available

Toxicology, Metabolism, Distribution

No data available

Neurological effects

No data available

Further information

Ingestion: No data available



SECTION 12: Ecological information

12.1 Toxicity

Toxicity to fish: LC50 : > 100 mg/l
Exposure time: 96 h

12.2 Persistence and degradability

Product:

Biodegradability: Result: Not readily biodegradable.
Biodegradation: < 60 %
Exposure time: 28 d

12.3 Bioaccumulative potential

Product:

Bioaccumulation: Species: Cyprinus carpio (Carp)
Exposure time: 56 d
Bioconcentration factor (BCF): 1,2 - 12
Method: flow-through test

12.4 Mobility in soil

No data available

12.5 Results of PBT and vPvB assessment

Product:

Assessment: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

12.6 Endocrine disrupting properties

Product:

Assessment: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

12.7 Other adverse effects

No data available

SECTION 13: Disposal considerations



13.1 Waste treatment methods

Product: Dispose of contents and container in accordance with all local, regional, national and international regulations. Dispose of contents/ container to an approved waste disposal plant

SECTION 14: Transport information

IATA

Not regulated as dangerous goods

IMDG

Not regulated as dangerous goods

ADR

Not regulated as dangerous goods

RID

Not regulated as dangerous goods

DOT Classification

Not regulated as dangerous goods

Maritime transport in bulk according to IMO instruments

Not applicable for product as supplied.

SECTION 15: Regulatory information

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

REACH-List of substances subject to authorisation (Annex XIV): Not applicable

REACH - Candidate List of Substances of Very High Concern for Authorisation (Article 59): This product does not contain substances of very high concern (Regulation (EC) No 1907/2006 (REACH), Article 57).

Seveso III: Directive 2012/18/EU of the European Parliament and of the Council on the control of major-accident hazards involving dangerous substances.

Not applicable

The components of this product are reported in the following inventories:

DSL: All components of this product are on the Canadian DSL

AIIC: On the inventory, or in compliance with the inventory



NZIoC:	On the inventory, or in compliance with the inventory
ENCS:	On the inventory, or in compliance with the inventory
KECI:	On the inventory, or in compliance with the inventory
PICCS:	Not in compliance with the inventory
IECSC:	On the inventory, or in compliance with the inventory
TCSI:	On the inventory, or in compliance with the inventory
TSCA:	All substances listed as active on the TSCA inventory

Inventories

AICS (Australia), AIIC (Australia), DSL (Canada), IECSC (China), ENCS (Japan), KECI (Korea), NZIO (New Zealand), PICCS (Philippines), TCSI (Taiwan), TSCA (United States of America (USA))

15.2 Chemical safety assessment

A Chemical Safety Assessment is not required for this substance.

Product falls under the EU-polymer definition.

SECTION 16: Other information

This MSDS is prepared for the purpose of providing health, safety and environmental data. The information given corresponds with our actual knowledge and experience. While the descriptions, data and information contained in the present datasheet are provided in good faith, these are to be considered as guidance only. Thus, this MSDS shall not constitute a guarantee for any specific properties or quality standards.

This information is meant to describe our product in view of possible safety requirements, but it remains the responsibility of the customer to determine the applicability of the information and suitability of any product for its own particular purpose, to provide a safe workplace and comply with all applicable laws and regulations.

Since handling, storage, use and disposal of the product are beyond our control and our knowledge, we do exclude any responsibility connecting to handling, storage, use or disposal of this product.

Please note that if the product used as a component of another product, this MSDS information may not be applicable.

Manufactured by:

ZIBO ZHENGDA POLYURETHANE CO.,LTD.

RM 1904, Building E, ChuangYe HuoJu Square, Zhangdian

Zibo City, 255000, Shandong Province, P.R.China

