# 1 Identification

- · Product identifier
- · Trade name: 40773 Zincweld
- · Article number: 40773
- · Application of the substance / the mixture Coating
- · Details of the supplier of the safety data sheet
- · Manufacturer/Supplier: SEM Products Inc. 1685 Overview Drive Rock Hill, SC 29730 803 207 8225
- · Information department:

cust\_care@semproducts.com: SEM Products,Inc. 1685 Overview Dr. Rock Hill, SC 29730: phone 1-800-831-1122, M - TH 7am - 4pm EDT

· Emergency telephone number: CHEMTREC 1-800-424-9300

# 2 Hazard identification

· Classification of the substance or mixture





GHS02 GHS04 Flame, Gas cylinder

Flammable Aerosols - Category 1

H222 Extremely flammable aerosol.



GHS04 Gas cylinder

Gases Under Pressure - Compressed Gas

H280 Contains gas under pressure; may explode if heated.



GHS08 Health hazard

Germ Cell Mutagenicity - Category 1A

H340 May cause genetic defects.

Carcinogenicity - Category 1A

H350 May cause cancer.

Specific Target Organ Toxicity - Single Exposure -

H371 May cause damage to organs.

Category 2

Specific Target Organ Toxicity - Repeated Exposure -

H373 May cause damage to organs through

Category 2

prolonged or repeated exposure.



Skin Irritation - Category 2

H315 Causes skin irritation.

Eye Irritation - Category 2A

H319 Causes serious eye irritation.

Skin Sensitizer - Category 1

H317 May cause an allergic skin reaction.

Specific Target Organ Toxicity - Single Exposure -

H336 May cause drowsiness or dizziness.

Category 3

(Contd. on page 2)

according to HPR, Schedule 1

Printing date 03/21/2018 Reviewed on 02/06/2018

Trade name: 40773 Zincweld

(Contd. of page 1)

- · Label elements
- · GHS label elements The product is classified and labeled according to the Globally Harmonized System (GHS).
- · Hazard pictograms









GHS02

GHS04

GHS07

GHS08

#### · Signal word Danger

## · Hazard-determining components of labeling:

Petroleum gases, liquefied, sweetened

acetone

Quartz (SiO2)

toluene

2-butanone oxime

#### · Hazard statements

H222 Extremely flammable aerosol.

H280 Contains gas under pressure; may explode if heated.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H317 May cause an allergic skin reaction.

H340 May cause genetic defects.

H350 May cause cancer.

H371 May cause damage to organs.

H336 May cause drowsiness or dizziness.

H373 May cause damage to organs through prolonged or repeated exposure.

tatements
Obtain special instructions before use.
Do not handle until all safety precautions have been read and understood.
Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
Do not spray on an open flame or other ignition source.
Do not pierce or burn, even after use.
Do not breathe dust/fume/gas/mist/vapours/spray.
Wash thoroughly after handling.
Do not eat, drink or smoke when using this product.
Contaminated work clothing should not be allowed out of the workplace.
Wear protective gloves/protective clothing/eye protection/face protection.
If on skin: Wash with plenty of water.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

IF exposed or concerned: Get medical advice/attention. P308+P313

P314 Get medical advice/attention if you feel unwell.

P362+P364 Take off contaminated clothing and wash it before reuse. If skin irritation or rash occurs: Get medical advice/attention. P333+P313

P321 Specific treatment (see on this label).

P337+P313 *If eye irritation persists: Get medical advice/attention.* 

P405 Store locked up.

P410+P403 Protect from sunlight. Store in a well-ventilated place.

(Contd. on page 3)



Trade name: 40773 Zincweld

(Contd. of page 2)

Protect from sunlight. Do not expose to temperatures exceeding 50 °C/122 °F. P410+P412

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

regulations.

· Classification system:

· NFPA ratings (scale 0 - 4)



Health = 2Fire = 4Reactivity = 3

· HMIS-ratings (scale 0 - 4)



Health = \*2Fire = 4

3 Composition/Information on ingredients

· Chemical characterization: Mixtures

· Description:

Mixture: consisting of the following components.

Weight percentages

· Dangerous co	omponents:	
67-64-1	acetone	15-40% w/w
68476-86-8	Petroleum gases, liquefied, sweetened	10-30% w/w
79-20-9	methyl acetate	≥5-<10% w/w
108-88-3	toluene	≥5-<10% w/w
7440-66-6	zinc powder -zinc dust	≥5-<10% w/w
1330-20-7	xylene	3-7% w/w
14808-60-7	Quartz (SiO2)	1-5% w/w
	EPOXY RESIN	1-5% w/w
12001-26-2	Mica	0.5-1.5% w/w
100-41-4	ethylbenzene	≥0.1-≤1% w/w
143860-04-2	3-ethyl-2-methyl-2-(3-methylbutyl)-1,3-oxazolidine	≥0.1-<1% w/w
8052-41-3	Stoddard solvent	≥0.1-≤1% w/w

# 4 First aid measures

- · Description of first aid measures
- · After inhalation:

Supply fresh air and to be sure call for a doctor.

*In case of unconsciousness place patient stably in side position for transportation.* 

- · After skin contact: Immediately wash with water and soap and rinse thoroughly.
- · After eye contact:

Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.

· After swallowing: If symptoms persist consult doctor.

(Contd. on page 4)

Trade name: 40773 Zincweld

(Contd. of page 3)

- · Information for doctor:
- · Most important symptoms and effects, both acute and delayed No further relevant information available.
- · Indication of any immediate medical attention and special treatment needed

No further relevant information available.

# 5 Firefighting measures

- · Extinguishing media
- · Suitable extinguishing agents:

CO2, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

- · Special hazards arising from the substance or mixture No further relevant information available.
- · Advice for firefighters
- · Protective equipment: No special measures required.

## 6 Accidental release measures

· Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.

- · Environmental precautions: Do not allow to enter sewers/ surface or ground water.
- · Methods and material for containment and cleaning up:

Dispose contaminated material as waste according to item 13.

Ensure adequate ventilation.

· Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

# 7 Handling and storage

- · Handling:
- · Precautions for safe handling

No special measures required.

Ensure good ventilation/exhaustion at the workplace.

· Information about protection against explosions and fires:

Do not spray on a naked flame or any incandescent material.

Keep ignition sources away - Do not smoke.

Pressurized container: protect from sunlight and do not expose to temperatures exceeding 50°C, i.e. electric lights. Do not pierce or burn, even after use.

- · Conditions for safe storage, including any incompatibilities
- · Storage:
- · Requirements to be met by storerooms and receptacles:

Observe official regulations on storing packagings with pressurized containers.

- · Information about storage in one common storage facility: Not required.
- · Further information about storage conditions: Keep receptacle tightly sealed.
- · Specific end use(s) No further relevant information available.

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Trade name: 40773 Zincweld

(Contd. of page 4)

# 8 Exposure controls/ Personal protection

- · Additional information about design of technical systems: No further data; see item 7.
- · Control parameters

## · Components with limit values that require monitoring at the workplace:

#### 67-64-1 acetone

- EL Short-term value: 500 ppm Long-term value: 250 ppm
- EV Short-term value: 750 ppm Long-term value: 500 ppm

#### 79-20-9 methyl acetate

- EL Short-term value: 250 ppm Long-term value: 200 ppm
- EV Short-term value: 755 mg/m³, 250 ppm Long-term value: 605 mg/m³, 200 ppm

#### 108-88-3 toluene

- EL Long-term value: 20 ppm
  - R
- EV Long-term value: 20 ppm

#### 1330-20-7 xylene

- EL Short-term value: 150 ppm Long-term value: 100 ppm
- EV Short-term value: 650 mg/m³, 150 ppm Long-term value: 435 mg/m³, 100 ppm

#### 14808-60-7 Quartz (SiO2)

- EL Long-term value: 0.025 mg/m<sup>3</sup>
  - ACGIH A2; IARC 1
- EV Long-term value: 0.10\* mg/m³ \*respirable fraction

#### 12001-26-2 Mica

- EL Long-term value: 3 mg/m³
- EV Long-term value: 3(D) mg/m<sup>3</sup>
  - respirable

#### 100-41-4 ethylbenzene

- EL Long-term value: 20 ppm
  - IARC 2B
- EV Short-term value: 540 mg/m³, 125 ppm Long-term value: 435 mg/m³, 100 ppm

#### 8052-41-3 Stoddard solvent

- EL Short-term value: 580 mg/m³ Long-term value: 290 mg/m³
- EV Long-term value: 525 mg/m<sup>3</sup>
- · Additional information: The lists that were valid during the creation were used as basis.

(Contd. on page 6)



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(Contd. of page 5)

- · Exposure controls
- · Personal protective equipment:
- · General protective and hygienic measures:

Keep away from foodstuffs, beverages and feed.

Immediately remove all soiled and contaminated clothing.

Wash hands before breaks and at the end of work.

Store protective clothing separately.

Avoid contact with the eyes and skin.

#### · Breathing equipment:

In case of brief exposure or low pollution use respiratory filter device. In case of intensive or longer exposure use respiratory protective device that is independent of circulating air.

#### · Protection of hands:

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation



Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

#### · Material of gloves

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer. As the product is a preparation of several substances, the resistance of the glove material can not be calculated in advance and has therefore to be checked prior to the application.

#### · Penetration time of glove material

The exact break trough time has to be found out by the manufacturer of the protective gloves and has to be observed.

#### · Eye protection:

Safety glasses



Tightly sealed goggles

# 9 Physical and chemical properties

- · Information on basic physical and chemical properties
- · General Information
- · Appearance:

Form: Liquid
Color: Silver grey
Odor: Characteristic
Odor threshold: Not determined.

· pH-value: Not determined.

· Change in condition

Melting point/Melting range: Undetermined. Boiling point/Boiling range: 55.8-56.6 °C

(Contd. on page 7)

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	(Contd. of page
Flash point:	<-18 °C
Flammability (solid, gaseous):	Not applicable.
Ignition temperature:	455 °C
Decomposition temperature:	Not determined.
Auto igniting:	Product is not selfigniting.
Danger of explosion:	In use, may form flammable/explosive vapour-air mixture.
Explosion limits:	
Lower:	1.9 Vol %
Upper:	13 Vol %
Vapor pressure at 20 °C:	233 hPa
Density at 20 °C:	0.82609 g/cm³
Relative density	Not determined.
Vapor density	Not determined.
Evaporation rate	Not applicable.
Solubility in / Miscibility with	
Water:	Not miscible or difficult to mix.
Partition coefficient (n-octanol/wa	t <b>ter):</b> Not determined.
Viscosity:	
Dynamic:	Not determined.
Kinematic:	Not determined.
Solvent content:	
Organic solvents:	79.2 %
VOC content:	39.13 %
	541.8 g/l / 4.52 lb/gl
Solids content:	20.3 %
Other information	No further relevant information available.

# 10 Stability and reactivity

- · Reactivity No further relevant information available.
- · Chemical stability
- Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- · Possibility of hazardous reactions No dangerous reactions known.
- · Conditions to avoid No further relevant information available.
- $\cdot \textbf{Incompatible materials:} \ No \ further \ relevant \ information \ available.$
- · Hazardous decomposition products: No dangerous decomposition products known.

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(Contd. on page 8)

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(Contd. of page 7)

# 11 Toxicological information

- · Information on toxicological effects
- · Acute toxicity:

· LD/LC50 values that are relevant for classification:		
108-88-3 toluene		
Oral	LD50	5,000 mg/kg (rat)
Dermal	LD50	12,124 mg/kg (rabbit)
Inhalative	LC50/4 h	5,320 mg/l (mouse)

- · Primary irritant effect:
- · on the skin: Irritant to skin and mucous membranes.
- · on the eye: Irritating effect.
- · Sensitization: Sensitization possible through skin contact.
- · Additional toxicological information:

The product shows the following dangers according to internally approved calculation methods for preparations: Irritant

· Carcinogenic categories

108-88-3	national Agency for Research on Cancer toluene	3
1330-20-7	xylene	3
14808-60-7	Quartz (SiO2)	1
13463-67-7	titanium dioxide	2B
14807-96-6	Talc	3
100-41-4	ethylbenzene	2B
	BENTONITE	suspected carcinogen <2% 14808-60-7
1333-86-4	Carbon black	2 <i>B</i>
111-76-2	2-butoxyethanol	3
· NTP (Nation	nal Toxicology Program)	
14808-60-7	Quartz (SiO2)	I.

# 12 Ecological information

- · Toxicity
- · Aquatic toxicity: No further relevant information available.
- · Persistence and degradability No further relevant information available.
- · Behavior in environmental systems:
- · Bioaccumulative potential No further relevant information available.
- · Mobility in soil No further relevant information available.
- · Additional ecological information:
- · General notes:

Do not allow product to reach ground water, water course or sewage system, even in small quantities. Danger to drinking water if even extremely small quantities leak into the ground.

- · Results of PBT and vPvB assessment
- · **PBT**: Not applicable.
- · vPvB: Not applicable.

(Contd. on page 9)

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· Other adverse effects No further relevant information available.

(Contd. of page 8)

# 13 Disposal considerations

- · Waste treatment methods
- · Recommendation:

Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

- · Uncleaned packagings:
- · Recommendation: Disposal must be made according to official regulations.

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· UN-Number

· DOT, TDG, IMDG, IATA UN1950

· UN proper shipping name

 $\cdot$  **DOT** Aerosols, flammable

· TDG 1950 Aerosols, ENVIRONMENTALLY HAZARDOUS

• IMDG AEROSOLS (3-ethyl-2-methyl-2-(3-methylbutyl)-1,3-oxazolidine)

· IATA AEROSOLS, flammable

- · Transport hazard class(es)
- $\cdot DOT$



· Class 2.1

• *Label* 2.1

· TDG (Transport dangerous goods):





· Class
 · Label
 2 5F Gases
 2.1

· IMDG





· Class 2.1 · Label 2.1

(Contd. on page 10)

Trade name: 40773 Zincweld

(Contd. of page 9) · IATA 2.1 · Class · Label 2.1 · Packing group · DOT, TDG, IMDG, IATA Void · Environmental hazards: Product contains environmentally hazardous substances: zinc powder -zinc dust · Marine pollutant: No Symbol (fish and tree) · Special marking (TDG): Symbol (fish and tree) Warning: Gases · Special precautions for user F-D,S-U· EMS Number: · Stowage Code SW1 Protected from sources of heat. SW22 For AEROSOLS with a maximum capacity of 1 litre: Category A. For AEROSOLS with a capacity above 1 litre: Category B. For WASTE AEROSOLS: Category C, Clear of living quarters. · Segregation Code SG69 For AEROSOLS with a maximum capacity of 1 litre: Segregation as for class 9. Stow "separated from" class 1 except for division 1.4. For AEROSOLS with a capacity above 1 litre: Segregation as for the appropriate subdivision of class 2. For WASTE AEROSOLS: Segregation as for the appropriate subdivision of class 2. · Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code Not applicable. · Transport/Additional information: On passenger aircraft/rail: 75 kg · Quantity limitations On cargo aircraft only: 150 kg · Remarks ORM-D 49CFR 173.150,156,306  $\cdot TDG$ · Excepted quantities (EQ) Code: E0 Not permitted as Excepted Quantity · IMDG · Limited quantities (LQ) 1LCode: E0 · Excepted quantities (EQ) Not permitted as Excepted Quantity · UN "Model Regulation": UN 1950 AEROSOLS, 2.1, ENVIRONMENTALLY HAZARDOUS

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(Contd. of page 10)

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111-76-2 2-butoxyethanol 149-57-5 2-ethylhexanoic acid 110-73-6 2-ethylaminoethanol

Section 355	(extremely hazardous substances):
None of the	ingredient is listed.
Section 313	(Specific toxic chemical listings):
108-88-3	toluene
7440-66-6	zinc powder -zinc dust
1330-20-7	xylene
14807-96-6	Talc
100-41-4	ethylbenzene
	Acrylic Resin
122-99-6	2-Phenoxyethanol
	COBALT CARBOXYLATE
	2-butoxyethanol
104-68-7	Diethylene glycol monophenyl ether
TSCA (Toxi	c Substances Control Act):
67-64-	acetone
68476-86-8	Petroleum gases, liquefied, sweetened
79-20-9	methyl acetate
108-88-3	toluene stoluene
7440-66-6	zinc powder -zinc dust
1330-20-7	xylene
68038-41-5	Modified Rosin Ester
14808-60-7	Quartz (SiO2)
13463-67-7	titanium dioxide
123-86-4	n-butyl acetate
14807-96-0	5 Talc
100-41-4	t ethylbenzene
143860-04-2	? 3-ethyl-2-methyl-2-(3-methylbutyl)-1,3-oxazolidine
67762-90-7	FUMED SILICA
8052-41-3	Stoddard solvent
6915-15-7	malic acid
96-29-7	7 2-butanone oxime
64742-89-8	Solvent naphtha (petroleum), light aliph.
1333-86-4	Carbon black
15956-58-8	Manganese 2-Ethylhexanoate
122-99-0	2-Phenoxyethanol
111 56	

(Contd. on page 12)

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110 12	5-methylhexan-2-one	(Contd. of page
	Methyl glycol	
	butanol	
	Diethylene glycol monophenyl ether	
	ubstance listings:	
	omestic Substances List (DSL)	
67-64-1		
	Petroleum gases, liquefied, sweetened	
	methyl acetate	
108-88-3		
	zinc powder -zinc dust	
1330-20-7		
	Modified Rosin Ester	
	Quartz (SiO2)	
	titanium dioxide	
12001-26-2		
	n-butyl acetate	
14807-96-6		
	ethylbenzene	
	FUMED SILICA	
8052-41-3	Stoddard solvent	
6915-15-7	malic acid	
96-29-7	2-butanone oxime	
64742-89-8	Solvent naphtha (petroleum), light aliph.	
1333-86-4	Carbon black	
	Manganese 2-Ethylhexanoate	
122-99-6	2-Phenoxyethanol	
111-76-2	2-butoxyethanol	
149-57-5	2-ethylhexanoic acid	
110-73-6	2-ethylaminoethanol	
110-12-3	5-methylhexan-2-one	
57-55-6	Methyl glycol	
78-83-1	butanol	
104-68-7	Diethylene glycol monophenyl ether	
Canadian In	ngredient Disclosure list (limit 0.1%)	
100-41-4 et	hylbenzene	
Canadian Ir	ngredient Disclosure list (limit 1%)	
67-64-1	acetone	
79-20-9	methyl acetate	
108-88-3	toluene	
14808-60-7	Quartz (SiO2)	
12001-26-2	Mica	

according to HPR, Schedule 1

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(Contd. of page 12)

- · GHS label elements The product is classified and labeled according to the Globally Harmonized System (GHS).
- · Hazard pictograms









GHS02

GHS04

GHS07 GHS08

#### · Signal word Danger

#### · Hazard-determining components of labeling:

Petroleum gases, liquefied, sweetened

acetone

Quartz (SiO2)

toluene

2-butanone oxime

#### · Hazard statements

H222 Extremely flammable aerosol.

H280 Contains gas under pressure; may explode if heated.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H317 May cause an allergic skin reaction.

H340 May cause genetic defects.

H350 May cause cancer.

H371 May cause damage to organs.

H336 May cause drowsiness or dizziness.

H373 May cause damage to organs through prolonged or repeated exposure.

#### Precautionary statements

P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.
P210	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. Name smoking.
P211	Do not spray on an open flame or other ignition source.
P251	Do not pierce or burn, even after use.
P260	Do not breathe dust/fume/gas/mist/vapours/spray.
P264	Wash thoroughly after handling.

Wash thoroughly after handling. P270 Do not eat, drink or smoke when using this product.

P272 Contaminated work clothing should not be allowed out of the workplace. P280 Wear protective gloves/protective clothing/eye protection/face protection.

P302+P352 If on skin: Wash with plenty of water.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Continue rinsing.

P308+P313 IF exposed or concerned: Get medical advice/attention.

P314 Get medical advice/attention if you feel unwell.

P362+P364 Take off contaminated clothing and wash it before reuse. P333+P313 If skin irritation or rash occurs: Get medical advice/attention.

P321 Specific treatment (see on this label).

If eye irritation persists: Get medical advice/attention. P337+P313

P405 Store locked up.

P410+P403 Protect from sunlight. Store in a well-ventilated place.

P410+P412 Protect from sunlight. Do not expose to temperatures exceeding 50 °C/122 °F.

(Contd. on page 14)

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Trade name: 40773 Zincweld

(Contd. of page 13)

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

regulations.

· National regulations:

· Additional classification according to Decree on Hazardous Materials:

Carcinogenic hazardous material group III (dangerous).

· Information about limitation of use:

Workers are not allowed to be exposed to the hazardous carcinogenic materials contained in this preparation. Exceptions can be made by the authorities in certain cases.

· Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

# 16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

- · Department issuing SDS: Environment protection department.
- · Contact: Rita Joiner (rjoiner@semproducts.com)
- · Date of preparation / last revision 03/21/2018 / 8
- · Abbreviations and acronyms:

ICAO: International Civil Aviation Organisation

IMDG: International Maritime Code for Dangerous Goods

DOT: US Department of Transportation

IATA: International Air Transport Association

EINECS: European Inventory of Existing Commercial Chemical Substances

ELINCS: European List of Notified Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

NFPA: National Fire Protection Association (USA)

 $HMIS: Hazardous\ Materials\ Identification\ System\ (USA)$ 

VOC: Volatile Organic Compounds (USA, EU)

LC50: Lethal concentration, 50 percent

LD50: Lethal dose, 50 percent

PBT: Persistent, Bioaccumulative and Toxic

vPvB: very Persistent and very Bioaccumulative

· \* Data compared to the previous version altered.

CA