

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

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Print date: 06.06.2017

P273	Avoid release to the environment.
P280	Wear protective gloves/protective clothing/eye protection/face protection.
P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
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 or doctor.

Hazardous component(s) to be indicated on label (Regulation (EC) No. 1272/2008)

contains Acrylic acid;2-Hydroxyethyl methacrylate;Maleic acid;Isobornyl acrylate

2.3. Other hazards

No special hazards have to be mentioned.

SECTION 3: Composition/information on ingredients**Hazardous ingredients (Regulation (EC) No. 1272/2008)****Isobornyl acrylate**

CAS No.	5888-33-5
EINECS no.	227-561-6
Concentration	>= 25 < 50 %
Classification (Regulation (EC) No. 1272/2008)	
	Aquatic Chronic 2 H411
	Skin Irrit. 2 H315
	Eye Irrit. 2 H319
	STOT SE 3 H335

2-Hydroxyethyl methacrylate

CAS No.	868-77-9
EINECS no.	212-782-2
Registration no.	01-2119490169-29
Concentration	>= 10 < 25 %
Classification (Regulation (EC) No. 1272/2008)	
	Eye Irrit. 2 H319
	Skin Sens. 1 H317
	Skin Irrit. 2 H315

Acrylic acid

CAS No.	79-10-7
EINECS no.	201-177-9
Registration no.	01-2119452449-31
Concentration	>= 3 < 5 %
Classification (Regulation (EC) No. 1272/2008)	
	Aquatic Acute 1 H400
	Flam. Liq. 3 H226
	Acute Tox. 4 H332
	Acute Tox. 4 H312
	Acute Tox. 4 H302
	Skin Corr. 1A H314
	Eye Dam. 1 H318
	Aquatic Chronic 2 H411

Concentration limits (Regulation (EC) No. 1272/2008)

STOT SE 3 H335 >= 1

Additional remarks:

CLP Regulation (EC) No 1272/2008, Annex VI, Note D

DSD Directive 67/548/EEC, Annex I, Note D

2,2-Dimethoxy-1,2-diphenylethan-1-one

CAS No. 24650-42-8

Trade name: Vitralit® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

EINECS no. 246-386-6
 Registration no. 01-2120000336-73
 Concentration $\geq 2,5 < 10$ %
 Classification (Regulation (EC) No. 1272/2008)
 Acute Tox. 4 H302
 STOT RE 2 H373
 Aquatic Chronic 1 H410

Maleic acid

CAS No. 110-16-7
 EINECS no. 203-742-5
 Registration no. 01-2119488705-25
 Concentration $\geq 0,1 < 1$ %
 Classification (Regulation (EC) No. 1272/2008)
 Skin Sens. 1 H317
 Eye Irrit. 2 H319
 STOT SE 3 H335
 Skin Irrit. 2 H315
 Acute Tox. 4 H302

Concentration limits (Regulation (EC) No. 1272/2008)

Skin Sens. 1 H317 $\geq 0,1$ **Cumene Hydroperoxide**

CAS No. 80-15-9
 EINECS no. 201-254-7
 Concentration $\geq 0,1 < 1$ %
 Classification (Regulation (EC) No. 1272/2008)
 STOT RE 2 H373
 Skin Corr. 1B H314
 Acute Tox. 4 H302
 Acute Tox. 4 H312
 Acute Tox. 3 H331
 Org. Perox. E H242
 Aquatic Chronic 2 H411

Concentration limits (Regulation (EC) No. 1272/2008)

Eye Dam. 1 H318 $\geq 3 < 10$ STOT SE 3 H335 $\geq 1 < 10$ Skin Corr. 1B H314 ≥ 10 Eye Irrit. 2 H319 $\geq 1 < 3$ Skin Irrit. 2 H315 $\geq 3 < 10$ **SECTION 4: First aid measures****4.1. Description of first aid measures****General information**

Remove contaminated, soaked clothing immediately and dispose of safely. Adhere to personal protective measures when giving first aid. In any case show the physician the Safety Data Sheet.

After inhalation

Ensure supply of fresh air. When vapours are intensively inhaled, seek medical help immediately.

After skin contact

Wash off immediately with soap and water. Consult a doctor if skin irritation persists.

After eye contact

Separate eyelids, wash the eyes thoroughly with water (15 min.). Summon a doctor immediately.

After ingestion

If swallowed, seek medical advice immediately and show this container or label. Rinse mouth thoroughly with water. Let plenty of water be drunk in small gulps. Do not induce vomiting.

Adhere to personal protective measures when giving first aid

First aider: Pay attention to self-protection!

4.2. Most important symptoms and effects, both acute and delayed

Until now no symptoms known so far.

4.3. Indication of any immediate medical attention and special treatment needed

Hints for the physician / hazards

In the case of swallowing with subsequent vomiting, aspiration of the lungs can occur which can lead to chemical pneumonia or asphyxiation.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Dry powder, Carbon dioxide, Foam

Non suitable extinguishing media

Full water jet

5.2. Special hazards arising from the substance or mixture

In case of combustion evolution of dangerous gases possible.

5.3. Advice for firefighters

Special protective equipment for fire-fighting

Do not inhale explosion and/or combustion gases. In case of combustion use a suitable breathing apparatus.

Other information

Collect contaminated fire-fighting water separately, must not be discharged into the drains. Fire residues and contaminated fire-fighting water must be disposed of in accordance with the local regulations.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Avoid contact with skin, eyes and clothing. Refer to protective measures listed in Sections 7 and 8.

6.2. Environmental precautions

Prevent spread over a wide area (e.g. by containment or oil barriers). Do not discharge into the drains/surface waters/groundwater. In case the product spills into sewage waters, immediately inform the authorities.

6.3. Methods and material for containment and cleaning up

Pick up with absorbent material. Dispose of absorbed material in accordance with the regulations.

6.4. Reference to other sections

Refer to protective measures listed in Sections 7 and 8.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

Avoid formation of aerosols. Provide good ventilation of working area (local exhaust ventilation if necessary). Keep container tightly closed. Observe the usual precautions for handling chemicals.

7.2. Conditions for safe storage, including any incompatibilities

Trade name: Vitralit® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

Requirements for storage rooms and vessels

Keep in original packaging, tightly closed. Storage rooms must be properly ventilated. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Provide solvent-resistant and impermeable floor.

Storage class according to TRGS 510

Storage class according to TRGS 510 10 Flammable liquids

Further information on storage conditions

Keep container tightly closed and dry in a cool, well-ventilated place. Protect from heat and direct sunlight.

SECTION 8: Exposure controls/personal protection**8.1. Control parameters****Exposure limit values****Isopropylbenzene**

Value	100	mg/m ³	20	ppm(V)
Short term exposure limit	250	mg/m ³	50	ppm(V)

Isopropylbenzene

Value	125	mg/m ³	25	ppm(V)
Short term exposure limit	375	mg/m ³	75	ppm(V)

Other information

There are not known any further control parameters.

8.2. Exposure controls**General protective and hygiene measures**

Hold eye wash fountain available. Do not inhale gases/vapours/aerosols. Avoid contact with skin and eyes. Do not eat, drink or smoke during work time. Wash hands before breaks and after work. Clean skin thoroughly after work; apply skin cream.

Respiratory protection

If workplace limits are exceeded, a respiratory protection approved for this particular job must be worn. Short term: filter apparatus, Filter A

Hand protection

Chemical resistant gloves			
Use	Short-term hand contact		
Appropriate Material	nitrile		
Material thickness	>= 0,4	mm	
Breakthrough time	> 480	min	

Eye protection

Safety glasses with side protection shield

Body protection

Clothing as usual in the chemical industry.

SECTION 9: Physical and chemical properties**9.1. Information on basic physical and chemical properties**

Form	liquid
Colour	light green
Odour	characteristic
Odour threshold	
Remarks	not determined

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

pH value

Remarks not determined

Melting point

Remarks not determined

Freezing point

Remarks not determined

Initial boiling point and boiling range

Remarks not determined

Flash point

Value > 100 °C

Evaporation rate (ether = 1) :

Remarks not determined

Flammability (solid, gas)

not determined

Upper/lower flammability or explosive limits

Remarks not determined

Vapour pressure

Remarks not determined

Vapour density

Remarks not determined

DensityValue 1,1 g/cm³

Temperature 25 °C

Solubility in water

Remarks not determined

Solubility(ies)

Remarks not determined

Partition coefficient: n-octanol/water

Remarks not determined

Ignition temperature

Remarks not determined

Decomposition temperature

Remarks not determined

Viscosity**dynamic**

Value 600 mPa.s

Temperature 25 °C

Explosive properties

evaluation not determined

Oxidising properties

Remarks not determined

9.2. Other information**Other information**

None known

SECTION 10: Stability and reactivity

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

10.1. Reactivity

No hazardous reactions when stored and handled according to prescribed instructions.

10.2. Chemical stability

No hazardous reactions known.

10.3. Possibility of hazardous reactions

No hazardous reactions known.

10.4. Conditions to avoid

No hazardous reactions known.

Decomposition temperature

Remarks not determined

10.5. Incompatible materials

None known

10.6. Hazardous decomposition products

Irritant gases/vapours

SECTION 11: Toxicological information**11.1. Information on toxicological effects****Acute oral toxicity**

ATE	>	10.000	mg/kg
Method	calculated value according to GHS (e.g see UN GHS)		

Acute oral toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species	rat		
LD50	>	1694	mg/kg

Acrylic acid

Species	rat		
LD50	=	1500	mg/kg

Acute dermal toxicity

ATE	>	10.000	mg/kg
Method	calculated value according to GHS (e.g see UN GHS)		

Acute dermal toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species	rat		
LD50	>	5000	mg/kg

Acrylic acid

Species	rabbit		
LD50	>=	2000	mg/kg

Acute inhalational toxicity

ATE		82,8923	mg/l
Administration/Form	Vapors		
Method	calculated value according to GHS (e.g see UN GHS)		
ATE	>	20	mg/l
Administration/Form	Dust/Mist		
Method	calculated value according to GHS (e.g see UN GHS)		

Acute inhalative toxicity (Components)**Acrylic acid**

Species	rat		
LC50	>=	5,1	mg/l

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

Duration of exposure 4 h
Administration/Form Vapors

Skin corrosion/irritation

Remarks not determined

Serious eye damage/irritation

Remarks not determined

Sensitization

Remarks not determined

Sensitization (Components)**Acrylic acid**

evaluation non-sensitizing

Subacute, subchronic, chronic toxicity

Remarks not determined

Mutagenicity

Remarks not determined

Reproductive toxicity

Remarks not determined

Carcinogenicity

Remarks not determined

Specific Target Organ Toxicity (STOT)

Remarks not determined

Experience in practice

Inhalation may lead to irritation of the respiratory tract.

Other information

No toxicological data are available.

SECTION 12: Ecological information**12.1. Toxicity****General information**

not determined

Fish toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species Bluegill (*Lepomis macrochirus*)
LC50 6 mg/l
Duration of exposure 96 h

Acrylic acid

Species rainbow trout (*Oncorhynchus mykiss*)
LC50 = 27 mg/l
Duration of exposure 96 h

Daphnia toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species Daphnia magna
EC50 26 mg/l
Duration of exposure 24 h

Acrylic acid

Species Daphnia magna
EC50 = 47 to 95 mg/l
Duration of exposure 48 h

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

Algae toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species	Scenedesmus subspicatus	
EC50	0,17	mg/l
Duration of exposure	72	h

Acrylic acid

Species	Scenedesmus subspicatus	
ErC50	= 0,13	mg/l
Duration of exposure	72	h

Bacteria toxicity (Components)**2,2-Dimethoxy-1,2-diphenylethan-1-one**

Species	activated sludge	
EC50	> 100	mg/l
Duration of exposure	3	h

12.2. Persistence and degradability**General information**

not determined

Chemical oxygen demand (COD) (Components)**Acrylic acid**

Value	= 1,48	kg/kg
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Biochemical oxygen demand (BOD5) (Components)**Acrylic acid**

Value	= 0,31	kg/kg
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12.3. Bioaccumulative potential**General information**

not determined

Partition coefficient: n-octanol/water

Remarks not determined

12.4. Mobility in soil**General information**

not determined

12.5. Results of PBT and vPvB assessment**General information**

not determined

12.6. Other adverse effects**General information**

not determined

General information / ecology

Do not allow to enter soil, waterways or waste water canal. Avoid release into the atmosphere.

SECTION 13: Disposal considerations**13.1. Waste treatment methods****Disposal recommendations for the product**

EWC waste code 08 04 09* waste adhesives and sealants containing organic solvents or other dangerous substances

Dispose of waste according to applicable legislation.

Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

Disposal recommendations for packaging

EWC waste code 15 01 10* packaging containing residues of or contaminated by dangerous substances

Packaging that cannot be cleaned should be disposed off in agreement with the regional waste disposal company.

SECTION 14: Transport information

Land transport ADR/RID

14.1. UN number

UN 3082

14.2. UN proper shipping name

ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Acrylic acid)

14.3. Transport hazard class(es)

Class 9

Label



14.4. Packing group

Packing group III

Remarks

The product is not subject to any other provisions of ADR provided packaging of not more than 5 l / 5 kg (SP 375)

Limited Quantity 5 l

Transport category 3

Tunnel restriction code E

Marine transport IMDG/GGVSee

14.1. UN number

UN 3082

14.2. UN proper shipping name

ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Acrylic acid)

14.3. Transport hazard class(es)

Class 9

Label



14.4. Packing group

Packing group III

Remarks

The product can be transported in accordance with IMDG Code paragraph 2.10.2.7, provided packaging not more than 5 l / 5 kg. F-A, S-F

EmS

Air transport ICAO/IATA

14.1. UN number

UN 3082

14.2. UN proper shipping name

ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Acrylic acid)

14.3. Transport hazard class(es)

Class 9

Label



Trade name: Vitralit ® 4282 mod./2

Version: 3 / GB

Date revised: 18.04.2017

Replaces Version: 2 / GB

Print date: 06.06.2017

14.4. Packing groupPacking group
Remarks

III

The product is not subject to any other provisions of IATA provided packaging of not more than 5 l / 5 kg (A197)

SECTION 15: Regulatory information**15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture****VOC**

VOC (EU) 0 % 0 g/l

15.2. Chemical safety assessment

For this preparation a chemical safety assessment has not been carried out.

SECTION 16: Other information**Hazard statements listed in Chapter 3**

H226	Flammable liquid and vapour.
H242	Heating may cause a fire.
H302	Harmful if swallowed.
H312	Harmful in contact with skin.
H314	Causes severe skin burns and eye damage.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H331	Toxic if inhaled.
H332	Harmful if inhaled.
H335	May cause respiratory irritation.
H373	May cause damage to organs through prolonged or repeated exposure:
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.

CLP categories listed in Chapter 3

Acute Tox. 3	Acute toxicity, Category 3
Acute Tox. 4	Acute toxicity, Category 4
Aquatic Acute 1	Hazardous to the aquatic environment, acute, Category 1
Aquatic Chronic 1	Hazardous to the aquatic environment, chronic, Category 1
Aquatic Chronic 2	Hazardous to the aquatic environment, chronic, Category 2
Eye Dam. 1	Serious eye damage, Category 1
Eye Irrit. 2	Eye irritation, Category 2
Flam. Liq. 3	Flammable liquid, Category 3
Org. Perox. E	Organic peroxide, Type E
Skin Corr. 1A	Skin corrosion, Category 1A
Skin Corr. 1B	Skin corrosion, Category 1B
Skin Irrit. 2	Skin irritation, Category 2
Skin Sens. 1	Skin sensitization, Category 1
STOT RE 2	Specific target organ toxicity - repeated exposure, Category 2
STOT SE 3	Specific target organ toxicity - single exposure, Category 3

Department issuing safety data sheet

Department product safety

Supplemental information

Relevant changes compared with the previous version of the safety data sheet are marked with: ***
This information is based on our present state of knowledge. However, it should not constitute a guarantee for any specific product properties and shall not establish a legally valid relationship.

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