Safety Data Sheet
CaviCide

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1. Product identifier

Product name : CaviCide

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

Relevant identified uses

Main use category : Professional use

Function or use category : Dental materials.

Uses advised against

No additional information available

1.3. Details of the supplier of the safety data sheet

Supplier
Kerr Italia S.r.l.
Via Passanti, 332
84018 Scafati (SA) - Italy
T +39-081-850-8311
E-mail: safety@kerrhawe.com

Manufacturer
METREX RESEARCH CORPORATION
28210 Wick Road
Romulus, Michigan 48174 – U.S.A.
T +1-714-516-7788
E-mail: safety@kerrhawe.com

Contact person : safety@kerrhawe.com - tel. 00-800-41-050-505 (08.00-17.00)

1.4. Emergency telephone number

Emergency number : CHEMTREC® Emergency Call Center. Emergency Telephone Number (for USA only) 001-800-424-9300 International and Maritime Telephone Number +1 (703) 527-3887

Country	Organisation/Company	Address	Emergency number
United Kingdom	National Poisons Information Service (Newcastle Unit)	Claremont Place Newcastle-upon-Tyne, Newcastle	+44 191 2606182/+44 191 2606180 24H

SECTION 2: HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

Flam. Liq. 3	H226
Eye Irrit. 2	H319
STOT SE 3	H336

Full text of classification categories and H statements : see section 16

2.2. Label elements

Labelling according to Regulation (EC) No. 1272/2008 [CLP]

Hazard pictograms (CLP) :

GHS02 GHS07

Signal word (CLP) : Warning

Hazard statements (CLP) : H226 - Flammable liquid and vapour
H319 - Causes serious eye irritation
H336 - May cause drowsiness or dizziness

Precautionary statements (CLP) : P210 - Keep away from heat/sparks/open flames/hot surfaces. - No smoking
P243 - Take precautionary measures against static discharge
P261 - Avoid breathing dust/fume/gas/mist/vapours/spray
P264 - Wash hands, forearms and face thoroughly after handling

P271 - Use only outdoors or in a well-ventilated area
P280 - Wear eye protection, protective gloves
P303+P361+P353 - IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower
P304+P340 - IF INHALED: remove victim to fresh air and keep at rest in a position 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
P312 - Call a POISON CENTER or doctor/physician if you feel unwell
P337+P313 - If eye irritation persists: Get medical advice/attention
P403+P233 - Store in a well-ventilated place. Keep container tightly closed
P405 - Store locked up
P501 - Dispose of contents/container to ...

Extra phrases : The mixture need not be classified as corrosive in spite of the extreme pH

2.3. Other hazards

Other hazards not contributing to the classification : None under normal conditions.

This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII

This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.1. Substance

Not applicable

3.2. Mixture

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
propan-2-ol, isopropyl alcohol, isopropanol	(CAS No) 67-63-0 (EC no) 200-661-7 (EC index no) 603-117-00-0 (REACH-no) 01-2119457558-25	17.2	Flam. Liq. 2, H225 Eye Irrit. 2, H319 STOT SE 3, H336
2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve	(CAS No) 111-76-2 (EC no) 203-905-0 (EC index no) 603-014-00-0 (REACH-no) 01-2119475108-36	=>1-<5	Acute Tox. 4 (Inhalation), H332 Acute Tox. 4 (Dermal), H312 Acute Tox. 4 (Oral), H302 Eye Irrit. 2, H319 Skin Irrit. 2, H315
benzethonium chloride	(CAS No) 121-54-0 (EC no) 204-479-9 (REACH-no) N/A	< 0.28	Acute Tox. 3 (Oral), H301 Skin Corr. 1A, H314 STOT SE 3, H335 Aquatic Chronic 2, H411

Full text of H-statements: see section 16

SECTION 4: FIRST AID MEASURES

4.1. Description of first aid measures

First-aid measures general : No particular/specific measures required.

First-aid measures after inhalation : Remove victim to fresh air and keep at rest in a position comfortable for breathing.

First-aid measures after skin contact : Gently wash with plenty of soap and water. If skin irritation occurs: Get medical advice/attention.

First-aid measures after eye contact : Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Get immediate medical advice/attention.

First-aid measures after ingestion : If swallowed, rinse mouth with water (only if the person is conscious). Call a POISON CENTER or doctor/physician if you feel unwell.

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

Symptoms/injuries : In all cases of doubt, or when symptoms persist, seek medical attention.

Symptoms/injuries after inhalation : May cause drowsiness or dizziness.

Symptoms/injuries after eye contact : Causes serious eye irritation.

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

No specific measures identified.

SECTION 5: FIREFIGHTING MEASURES

5.1. Extinguishing media

Suitable extinguishing media : Use extinguishing media appropriate for surrounding fire. Foam, carbon dioxide (CO2) and powder.

Unsuitable extinguishing media : Do not use a heavy water stream.

5.2. Special hazards arising from the substance or mixture

Fire hazard : Flammable liquid and vapour.

Explosion hazard : Product is not explosive.

Hazardous decomposition products in case of fire : Carbon monoxide. Carbon dioxide.

5.3. Advice for firefighters

Firefighting instructions : Use water spray or fog for cooling exposed containers.

Protection during firefighting : Do not enter fire area without proper protective equipment, including respiratory protection.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

General measures : Wear appropriate personal protective equipment - see Section 8. Avoid contact with skin and eyes. No open flames. No smoking. Use special care to avoid static electric charges. No flames, no sparks. Eliminate all sources of ignition.

For non-emergency personnel

No additional information available

For emergency responders

No additional information available

6.2. Environmental precautions

Discharging into rivers and drains is forbidden.

6.3. Methods and material for containment and cleaning up

For containment : Collect all waste in suitable and labelled containers and dispose according to local legislation.

Methods for cleaning up : Soak up spills with inert solids, such as clay or diatomaceous earth as soon as possible.

6.4. Reference to other sections

For further information refer to section 13.

SECTION 7: HANDLING AND STORAGE

7.1. Precautions for safe handling

Precautions for safe handling : Keep container tightly closed. Avoid contact with skin and eyes. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

Hygiene measures : Do not eat, drink or smoke when using this product. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.

7.2. Conditions for safe storage, including any incompatibilities

Storage conditions : Keep container tightly closed. Keep only in original container. Do not expose to temperatures exceeding 50 °C/ 122 °F. Keep cool. Store in a well-ventilated place. Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

Incompatible materials : Oxidizing substances.

7.3. Specific end use(s)

Consult the supplier for further information.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1. Control parameters

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)		
United Kingdom	Local name	Propan-2-ol
United Kingdom	WEL TWA (mg/m³)	999 mg/m³
United Kingdom	WEL TWA (ppm)	400 ppm
United Kingdom	WEL STEL (mg/m³)	1250 mg/m³
United Kingdom	WEL STEL (ppm)	500 ppm
2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)		
EU	Local name	2-Butoxyethanol
EU	IOELV TWA (mg/m³)	98 mg/m³
EU	IOELV TWA (ppm)	20 ppm
EU	IOELV STEL (mg/m³)	246 mg/m³
EU	IOELV STEL (ppm)	50 ppm
EU	Notes	Skin
United Kingdom	Local name	2-Butoxyethanol
United Kingdom	WEL TWA (mg/m³)	123 mg/m³
United Kingdom	WEL TWA (ppm)	25 ppm
United Kingdom	WEL STEL (mg/m³)	246 mg/m³

2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)		
United Kingdom	WEL STEL (ppm)	50 ppm
United Kingdom	Remark (WEL)	Sk, BMGV

8.2. Exposure controls

Appropriate engineering controls : Ensure good ventilation of the work station.

Personal protective equipment : Gloves. Safety glasses.

Hand protection : Butylrubber protective gloves. Nitrile rubber gloves. Breakthrough time : > 60 minutes. Layer thickness : 0,1mm. STANDARD EN 374.

Eye protection : Safety glasses. STANDARD EN 166.

Skin and body protection : Wear suitable protective clothing

Respiratory protection : No special respiratory protection equipment is recommended under normal conditions of use with adequate ventilation

Other information : Do not eat, drink or smoke during use. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1. Information on basic physical and chemical properties

Physical state	:	Liquid
Colour	:	clear.
Odour	:	Alcohol.
Odour threshold	:	0.001 ppm
pH	:	11 - 12.49
Relative evaporation rate (butylacetate=1)	:	No data available
Melting point	:	No data available
Freezing point	:	No data available
Boiling point	:	No data available
Flash point	:	28.3 °C
Auto-ignition temperature	:	No data available
Decomposition temperature	:	No data available
Flammability (solid, gas)	:	No data available
Vapour pressure	:	43.3 mm Hg
Relative vapour density at 20 °C	:	2.1
Relative density	:	No data available
Density	:	0.972 g/cm³
Solubility	:	In water, material soluble.
Log Pow	:	No data available
Viscosity, kinematic	:	No data available
Viscosity, dynamic	:	No data available
Explosive properties	:	Product is not explosive.
Oxidising properties	:	No data available
Explosive limits	:	2 vol % 12.7 vol %

9.2. Other information

Additional information : None to our knowledge

SECTION 10: STABILITY AND REACTIVITY

10.1. Reactivity

The product is non-reactive under normal conditions of use, storage and transport.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

No polymerization.

10.4. Conditions to avoid

No flames, no sparks. Eliminate all sources of ignition.

10.5. Incompatible materials

Oxidizing agent. Acids. reducing materials.

10.6. Hazardous decomposition products

No decomposition if stored normally. Thermal decomposition generates : Carbon dioxide. Carbon monoxide. Nitrogen oxides. Amines. Chlorine. Hydrogen chloride.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1. Information on toxicological effects

Acute toxicity : Not classified

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)	
LD50 oral rat	4710 mg/kg
LD50 dermal rabbit	12800 mg/kg
LC50 inhalation rat (Dust/Mist - mg/l/4h)	72.6 mg/l/4h

2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)	
LD50 oral rat	470 mg/kg
LD50 dermal rat	2270 mg/kg
LD50 dermal rabbit	220 mg/kg
LC50 inhalation rat (mg/l)	2.2 mg/l/4h

benzethonium chloride (121-54-0)	
LD50 oral rat	368 mg/kg

Skin corrosion/irritation : Not classified
Contact during a long period may cause slight irritation
pH: 11 - 12.49

Serious eye damage/irritation : Causes serious eye irritation.
pH: 11 - 12.49

Respiratory or skin sensitisation : Not classified

Germ cell mutagenicity : Not classified

Carcinogenicity : Not classified

Reproductive toxicity : Not classified

Specific target organ toxicity (single exposure) : May cause drowsiness or dizziness.

Specific target organ toxicity (repeated exposure) : Not classified

Aspiration hazard : Not classified

SECTION 12: ECOLOGICAL INFORMATION

12.1. Toxicity

Ecology - general : Not regarded as dangerous to the environment. This does not, however, rule out the possibility that large or frequent smaller emissions of the product may be harmful to the environment.

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)	
LC50 fish 1	4200 mg/l (96 hours Rasbora heteromorpha)
EC50 Daphnia 1	13300 mg/l (48 hours - Daphnia magna)

2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)	
LC50 fish 1	1125 mg/l Menidia berylina
EC50 Daphnia 1	835 mg/l (48 hours - Daphnia magna)
IC50 algae	> 286 mg/l 72 hours - Pseudokirchnerella subcapitata

benzethonium chloride (121-54-0)	
LC50 fish 1	1.4 mg/l (96 hours - Lepomis macrochirus)
EC50 Daphnia 1	70 mg/l

12.2. Persistence and degradability

CaviCide	
Persistence and degradability	No data available.

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)	
Persistence and degradability	Easily biodegradable.
BOD (% of ThOD)	0.3 - 0.6 % ThOD BOD5/COD

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)	
Biodegradation	84 % (14 days, method: OECD 301C)

2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)	
Biodegradation	95 % (28 days, method: OECD 301E)

12.3. Bioaccumulative potential

CaviCide	
Bioaccumulative potential	Not potentially bioaccumulable.

propan-2-ol, isopropyl alcohol, isopropanol (67-63-0)	
Bioconcentration factor (BCF REACH)	< 100
Log Pow	2.97

2-butoxyethanol, ethylene glycol monobutyl ether, butyl cellosolve (111-76-2)	
Bioconcentration factor (BCF REACH)	3
Log Pow	0.84

12.4. Mobility in soil

CaviCide	
Ecology - soil	soluble in water.

12.5. Results of PBT and vPvB assessment

CaviCide
This substance/mixture does not meet the PBT criteria of REACH regulation, annex XIII
This substance/mixture does not meet the vPvB criteria of REACH regulation, annex XIII

12.6. Other adverse effects

Other adverse effects : None to our knowledge.

Additional information : No other effects known

SECTION 13: DISPOSAL CONSIDERATIONS

13.1. Waste treatment methods

Regional legislation (waste) : Dispose as hazardous waste.

Waste treatment methods : Recover the product with absorbent material. Dispose of contents/container in accordance with licensed collector's sorting instructions.

Waste disposal recommendations : Dispose in a safe manner in accordance with local/national regulations.

Ecology - waste materials : Avoid release to the environment.

European List of Waste (LoW) code : 19 02 08* - liquid combustible wastes containing dangerous substances

SECTION 14: TRANSPORT INFORMATION

In accordance with ADR / RID / IMDG / IATA / ADN

14.1. UN number

UN-No. (ADR) : 1987

UN-No. (IMDG) : 1987

UN-No. (IATA) : 1987

UN-No. (RID) : 1987

14.2. UN proper shipping name

Proper Shipping Name (ADR) : ALCOHOLS, N.O.S.

Proper Shipping Name (IMDG) : ALCOHOLS, N.O.S.

Proper Shipping Name (IATA) : Alcohols, n.o.s.

Proper Shipping Name (RID) : ALCOHOLS, N.O.S.

Transport document description (ADR) : UN 1987 ALCOHOLS, N.O.S., 3, III, (D/E)

Transport document description (IMDG) : UN 1987 ALCOHOLS, N.O.S., 3, III

14.3. Transport hazard class(es)

ADR

Transport hazard class(es) (ADR) : 3

Danger labels (ADR) : 3

:

IMDG

Transport hazard class(es) (IMDG) : 3

Danger labels (IMDG) : 3

:

IATA

Transport hazard class(es) (IATA) : 3

Hazard labels (IATA) : 3

:

RID

Transport hazard class(es) (RID) : 3

Danger labels (RID) : 3

:

14.4. Packing group

Packing group (ADR) : III

Packing group (IMDG) : III

Packing group (IATA) : III

Packing group (RID) : III

14.5. Environmental hazards

Dangerous for the environment : No

Marine pollutant : No

Other information : No supplementary information available

14.6. Special precautions for user

- Overland transport

Classification code (ADR) : F1

Special provisions (ADR) : 274, 601

Limited quantities (ADR) : 5l

Excepted quantities (ADR) : E1

Packing instructions (ADR) : P001, IBC03, LP01, R001

Mixed packing provisions (ADR) : MP19

Portable tank and bulk container instructions (ADR) : T4

Portable tank and bulk container special provisions (ADR) : TP1, TP29

Tank code (ADR) : LGBF

Vehicle for tank carriage : FL

Transport category (ADR) : 3

Special provisions for carriage - Packages (ADR) : V12

Special provisions for carriage - Operation (ADR) : S2

Hazard identification number (Kemler No.) : 30

Orange plates :

Tunnel restriction code (ADR) : D/E

EAC code : •3YE

- Transport by sea

Special provisions (IMDG) : 223, 274

Limited quantities (IMDG) : 5 L

Excepted quantities (IMDG) : E1

Packing instructions (IMDG) : P001, LP01

IBC packing instructions (IMDG) : IBC03

Tank instructions (IMDG) : T4

Tank special provisions (IMDG) : TP1, TP29

EmS-No. (Fire) : F-E

EmS-No. (Spillage) : S-D

Stowage category (IMDG) : A

- Air transport

PCA Excepted quantities (IATA) : E1

PCA Limited quantities (IATA) : Y344

PCA limited quantity max net quantity (IATA) : 10L

PCA packing instructions (IATA) : 355

PCA max net quantity (IATA) : 60L

CAO packing instructions (IATA) : 366

CAO max net quantity (IATA) : 220L

Special provisions (IATA) : A3, A180

ERG code (IATA) : 3L

Rail transport

No data available

14.7. Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

IBC code : Isopropyl alcohol.

SECTION 15: REGULATORY INFORMATION

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

EU-Regulations

Contains no REACH substances with Annex XVII restrictions

Contains no substance on the REACH candidate list

Contains no REACH Annex XIV substances

National regulations

EC-regulation 453/2010/EC, 1907/2006/EC (REACH), 1272/2008/EC (CLP), 790/2009/EC. Transport of dangerous goods (ADR/RID, IMDG, IATA/ICAO). Workplace exposure limits.

15.2. Chemical safety assessment

No chemical safety assessment has been carried out for the substance or the mixture by the supplier

SECTION 16: OTHER INFORMATION

Indication of changes:

Composition/information on ingredients. Regulatory information. Hazards identification.

2.1	Classification according to Directive 67/548/EEC [DSD] or 1999/45/EC [DPD]	Removed	
2.1	Hazard statements (CLP)	Added	STOT SE 3 H336
2.2	Hazard statements (CLP)	Added	STOT SE 3 H336
3.2	Classification according to Directive	Removed	

	67/548/EEC [DSD] or 1999/45/EC [DPD]		
3.2	Composition/information on ingredients	Added	Cas 121-54-0

Date of issue : 28/05/2009
Revision date : 23/09/2015
Supersedes : 20/05/2014
Version :
Signature : A. Åsebø Murel

Full text of H- and EUH-statements:

Acute Tox. 3 (Oral)	Acute toxicity (oral), Category 3
Acute Tox. 4 (Dermal)	Acute toxicity (dermal), Category 4
Acute Tox. 4 (Inhalation)	Acute toxicity (inhal.), Category 4
Acute Tox. 4 (Oral)	Acute toxicity (oral), Category 4
Aquatic Chronic 2	Hazardous to the aquatic environment — Chronic Hazard, Category 2
Eye Irrit. 2	Serious eye damage/eye irritation, Category 2
Flam. Liq. 2	Flammable liquids, Category 2
Flam. Liq. 3	Flammable liquids, Category 3
Skin Corr. 1A	Skin corrosion/irritation, Category 1A
Skin Irrit. 2	Skin corrosion/irritation, Category 2
STOT SE 3	Specific target organ toxicity — Single exposure, Category 3, Narcosis
STOT SE 3	Specific target organ toxicity — Single exposure, Category 3, Respiratory tract irritation
H225	Highly flammable liquid and vapour
H226	Flammable liquid and vapour
H301	Toxic if swallowed
H302	Harmful if swallowed
H312	Harmful in contact with skin
H314	Causes severe skin burns and eye damage
H315	Causes skin irritation
H319	Causes serious eye irritation
H332	Harmful if inhaled
H335	May cause respiratory irritation
H336	May cause drowsiness or dizziness
H411	Toxic to aquatic life with long lasting effects

The information in this safety data sheet is based on information from the manufacturer/supplier, present European and national legislation, and presupposes that the product is used within the specified area of application.