Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

DENTALRAPID AF (inkl. Varianten)

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

Use of the substance/mixture

Disinfection by spraying and wiping

1.3. Details of the supplier of the safety data sheet

Company name: Müller-Omicron GmbH & Co. KG

 Street:
 Schlosserstr. 1

 Place:
 D-51789 Lindlar

 Telephone
 +49 (0) 2266/4742-0

 Telefax
 +49 (0) 2266/3417

e-mail: einkauf@mueller-omicron.de

Responsible for the safety data sheet: sds@gbk-ingelheim.de

1.4. Emergency telephone number: INTERNATIONAL: +49 - (0) 6132 - 84463, GBK GmbH (24h - 7d/w - 365d/a)

England and Wales: NHS Direct - 0845 4647; Scotland: NHS 24 - 08454 24 24

24

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

R phrases: Flammable.

GHS classification

Hazard categories:

Flammable liquid: Flam. Liq. 3

Hazard Statements:

Flammable liquid and vapour.

2.2. Label elements

Signal word: Warning Pictograms: GHS02



Hazard statements

H226 Flammable liquid and vapour.

Precautionary statements

P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.

P233 Keep container tightly closed. P260 Do not breathe vapour.

P271 Use only outdoors or in a well-ventilated area.

2.3. Other hazards

Vapours may form explosive mixture with air.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Chemical characterization

Alcoholic solution

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



Hazardous components

EC No	Chemical name	Quantity
CAS No	Classification	
Index No	GHS classification	
REACH No		
200-578-6	Ethanol	< 45 %
64-17-5	F - Highly flammable R11	
603-002-00-5	Flam. Liq. 2, Eye Irrit. 2; H225 H319	
01-2119457610-43		
230-525-2	Didecyldimethylammonium chloride	< 0,1 %
7173-51-5	C - Corrosive, Xn - Harmful R22-34	
612-131-00-6	Acute Tox. 4, Skin Corr. 1B, Aquatic Acute 1; H302 H314 H400	
01-2119945987-15		

Full text of R and H phrases: see Section 16.

Further Information

Specific concentration limits

Ethanol

C > 50% => H319

SECTION 4: First aid measures

4.1. Description of first aid measures

General information

Remove contaminated soaked clothing immediately.

If you feel unwell, seek medical advice.

After inhalation

Move to fresh air in case of accidental inhalation of vapours.

In the event of symptoms refer for medical treatment.

After contact with skin

Wash with water and soap as a precaution.

After contact with eyes

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.

If eye irritation persists, consult a specialist.

After ingestion

Do not induce vomiting.

Summon a doctor immediately.

Induce vomiting only upon the advice of a physician.

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

Inhalation of vapours in high concentration can cause narcotic effects.

May cause irritation of the mucous membranes.

Watch out. Beware, hazard of foam aspiration.

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

Treat symptoms.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Alcohol-resistant foam, dry chemical, carbon dioxide (CO2), water-spray.

Unsuitable extinguishing media

Full water jet.

5.2. Special hazards arising from the substance or mixture

Fire may produce:

Carbon monoxide and carbon dioxide

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014

Revision No: 2.0 **DENTALRAPID AF (inkl. Varianten)**

00320-0065-GHS



5.3. Advice for firefighters

Use breathing apparatus with independent air supply.

Protective suit.

Additional information

Vapours are heavier than air and spread along ground.

The vapour/air mixture is explosive, even in empty, uncleaned receptacles.

Cool containers at risk with water spray jet.

Fire residues and contaminated firefighting 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

In case of vapour formation use respirator.

Ensure adequate ventilation.

Use personal protective clothing.

Keep away sources of ignition.

6.2. Environmental precautions

Do not discharge into the drains/surface waters/ground water.

6.3. Methods and material for containment and cleaning up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder).

Shovel into suitable container for disposal.

6.4. Reference to other sections

Observe protective instructions (see Sections 7 and 8).

Information for disposal see section 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Advice on safe handling

Keep container tightly closed.

Ensure adequate ventilation.

Avoid contact with skin, eyes and clothing.

Advice on protection against fire and explosion

Do not smoke - volatile.

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

7.2. Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Keep container tightly closed in a dry, cool and well-ventilated place.

Advice on storage compatibility

Incompatible with oxidizing agents.

Further information on storage conditions

Keep away from food, drink and animal feeding stuffs.

7.3. Specific end use(s)

Disinfection by spraying and wiping

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limits (EH40)

CAS No	Substance	ppm	mg/m³	fibres/ml	Category	Origin
64-17-5	Ethanol	1000	1920		TWA (8 h)	WEL
		-	-		STEL (15 min)	WEL

8.2. Exposure controls

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



Appropriate engineering controls

Ensure adequate ventilation, especially in confined areas.

Protective and hygiene measures

Do not inhale vapours.

Wash hands before breaks and at the end of workday.

When using, do not eat, drink or smoke.

Avoid contact with skin, eyes and clothing.

Remove and wash contaminated clothes before re-use.

Eye/face protection

If used properly, no need to wear eye protection. Otherwise wear protective goggles with integrated side shields.

Hand protection

Also suitable are gloves made of:

Polychloropren - CR (0,5 mm): Breakthrough time > 4 h

Nitrile rubber/nitrile latex - NBR (0,35 mm): Breakthrough time > 4h

Butyl rubber - Butyl (0,5 mm): Breakthrough time > 8 h Fluoro-rubber - FKM (0.4 mm): Breakthrough time > 8 h Polyvinyl chloride - PVC (0.5 mm): Breakthrough time > 4 h

This recommendation refers exclusively to the chemical compatibility and the lab test conforming to EN 374 carried out under lab conditions.

Requirements can vary as a function of the use. Therefore it is necessary to adhere additionally to the recommendations given by the manufacturer of protective gloves.

Skin protection

Long sleeved clothing (EN 368).

Respiratory protection

No personal respiratory protective equipment normally required.

In case of insufficient ventilation wear suitable respiratory equipment (gas filter type A) (EN 141).

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state: Liquid
Colour: Colourless

Odour: alcoholic / Perfumed (scented)

pH-Value (at 20 °C): 6 - 8

Melting point: < - 10 °C

Initial boiling point and boiling range: approx. 85 °C

Flash point: 25 °C DIN 51755

Lower explosion limits: 3,4 vol. %

Upper explosion limits:

Density (at 20 °C): approx. 0,932 g/cm³

Water solubility: Miscible

(at 20 °C)

Ignition temperature: > 425 °C

9.2. Other information

No data available.

SECTION 10: Stability and reactivity

10.1. Reactivity

No decomposition if stored and applied as directed.

10.2. Chemical stability

Stable under normal conditions.

10.3. Possibility of hazardous reactions

Reactions with oxidizing agents.

Print date: 21.05.2014 GB - EN Page 4 of 9

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



10.4. Conditions to avoid

Vapour/air mixtures are explosive at intensive warming. Heating can release vapours which can be ignited.

10.5. Incompatible materials

oxidizing agents

10.6. Hazardous decomposition products

Carbon monoxide and carbon dioxide.

SECTION 11: Toxicological information

11.1. Information on toxicological effects

Acute toxicity

Based on available data, the classification criteria are not met.

No toxicological data available.

CAS No	Chemical name						
	Exposure routes	Method	Dose	Species	Source		
64-17-5	Ethanol						
	oral	LD50	6200 mg/kg	Rat			
	inhalative (4 h) vapour	LC50	95,6 mg/l	Rat			
7173-51-5	Didecyldimethylammonium chlorid	е					
	oral	ATE	500 mg/kg				

Irritation and corrosivity

Based on available data, the classification criteria are not met.

Sensitising effects

Based on available data, the classification criteria are not met.

STOT-single exposure

Based on available data, the classification criteria are not met.

Severe effects after repeated or prolonged exposure

Based on available data, the classification criteria are not met.

Carcinogenic/mutagenic/toxic effects for reproduction

Based on available data, the classification criteria are not met.

Carcinogenicity: Not classified.

Mutagenicity: Not classified.

Reproductive toxicity: Not classified.

Aspiration hazard

Based on available data, the classification criteria are not met.

Additional information on tests

Classification in compliance with the assessment procedure specified in the Regulation (EC) no 1272/2008.

Practical experience

Other observations

Inhalation of vapours in high concentration can cause narcotic effects.

Components of the product may be absorbed into the body through the skin.

May cause irritation of the mucous membranes.

Further information

Skin compatibility of this product proved with dermatological certificate.

SECTION 12: Ecological information

12.1. Toxicity

Ecological data are not available.

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014

Revision No: 2,0



00320-0065-GHS



CAS No	Chemical name							
	Aquatic toxicity	Method	Dose	[h] [d]	Species	Source		
64-17-5	Ethanol							
	Acute fish toxicity	LC50	8140 mg/l	96 h	Golden orfe			
	Acute crustacea toxicity	EC50 mg/l	9268 - 14221	48 h	Daphnia magna			

12.2. Persistence and degradability

No data available.

Ethanol: Readily biodegradable (to OECD criteria)

12.3. Bioaccumulative potential

No data available.

Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
64-17-5	Ethanol	- 0,31

12.4. Mobility in soil

No data available.

12.5. Results of PBT and vPvB assessment

According to Regulation (EC) No 1907/2006 (REACH) none of the substances, contained in this product are a PBT / vPvB substance.

12.6. Other adverse effects

Low hazard to waters.

Further information

Product is not allowed to discharge into the ground water or aquatic environment.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Advice on disposal

Where possible recycling is preferred to disposal.

Can be incinerated, when in compliance with local regulations.

Waste disposal number of waste from residues/unused products

070601

WASTES FROM ORGANIC CHEMICAL PROCESSES; wastes from the MFSU of fats, grease, soaps,

detergents, disinfectants and cosmetics; aqueous washing liquids and mother liquors

Classified as hazardous waste.

Contaminated packaging

Empty containers should be taken for local recycling, recovery or waste disposal.

Contaminated packaging should be emptied as far as possible and after appropriate cleansing may be taken for reuse.

Packaging that cannot be cleaned should be disposed of like the product.

SECTION 14: Transport information

Land transport (ADR/RID)

14.1. UN number: UN1987

14.2. UN proper shipping name: ALCOHOLS, N.O.S. (Ethanol)

14.3. Transport hazard class(es):314.4. Packing group:IIIHazard label:3



Classification code:

Limited quantity: 5 L / 30 kg

Transport category: 3

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



Hazard No: 30
Tunnel restriction code: D/E

Other applicable information (land transport)

For aqueous homogeneous mixtures category 3 the indicated quantity refers to the absolute alcohol content, that is to say 10 litres can in paperboard packaging are "Limited quantities in accordance with LQ 7". [ADR 2009 sub-section 3.4.6 note c), mark may continue to be carried until the end of the transition period on 30 June 2015]

Inland waterways transport (ADN)

14.1. UN number: UN1987

14.2. UN proper shipping name: ALCOHOLS, N.O.S. (Ethanol)

14.3. Transport hazard class(es):314.4. Packing group:IIIHazard label:3



Classification code: F1

Limited quantity: 5 L / 30 kg

Marine transport (IMDG)

14.1. UN number: UN 1987

14.2. UN proper shipping name: ALCOHOLS, N.O.S. (ethanol)

14.3. Transport hazard class(es):314.4. Packing group:IIIHazard label:3



Marine pollutant: No

Limited quantity: 5 L / 30 kg EmS: F-E; S-D

Air transport (ICAO)

14.1. UN number: UN1987

14.2. UN proper shipping name: ALCOHOLS, N.O.S. (ethanol)

14.3. Transport hazard class(es):314.4. Packing group:IIIHazard label:3



Limited quantity Passenger:

IATA-packing instructions - Passenger:
IATA-max. quantity - Passenger:

IATA-packing instructions - Cargo:
IATA-max. quantity - Cargo:

14.5. Environmental hazards

ENVIRONMENTALLY HAZARDOUS: no

14.6. Special precautions for user

Take the usual precautions when handling with chemicals.

14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

The transport takes place only in approved and appropriate packaging.

355 60 L

366

220 L

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014

Revision No: 2,0



00320-0065-GHS



SECTION 15: Regulatory information

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

EU regulatory information

1999/13/EC (VOC):

42 %

National regulatory information

Employment restrictions:

Observe employment restrictions for young people. Observe employment

restrictions for child bearing mothers and nursing.

15.2. Chemical safety assessment

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

SECTION 16: Other information

Abbreviations and acronyms

ADR = Accord européen relatif au transport international des marchandises Dangereuses par Route

RID = Règlement concernant le transport international ferroviaire de marchandises dangereuses

ADN = Accord européen relatif au transport international des marchandises dangereuses par voie de navigation intérieure

IMDG = International Maritime Code for Dangerous Goods

IATA/ICAO = International Air Transport Association / International Civil Aviation Organization

MARPOL = International Convention for the Prevention of Pollution from Ships

IBC = Code International Code for the Construction and Equipment of Ships Carrying Dangerous Chemicals in Bulk

GHS = Globally Harmonized System of Classification and Labelling of Chemicals

REACH = Registration, Evaluation, Authorization and Restriction of Chemicals

CAS = Chemical Abstract Service

EN = European norm

ISO = International Organization for Standardization

DIN = Deutsche Industrie Norm

PBT = Persistent Bioaccumulative and Toxic

ID = Lethal dose

LC = Lethal concentration

EC = Effect concentration

IC = Median immobilisation concentration or median inhibitory concentration

Full text of R phrases referred to under Sections 2 and 3

Flammable.
Highly flammable.
Harmful if swallowed.
Causes burns.

Full text of H statements referred to under Sections 2 and 3

H225 Highly flammable liquid and vapour. H226 Flammable liquid and vapour.

H302 Harmful if swallowed.

H314 Causes severe skin burns and eye damage.

H319 Causes serious eye irritation. H400 Very toxic to aquatic life.

Further Information

Data of items 4 to 8, as well as 10 to 12, do partly not refer to the use and the regular employing of the product (in this sense consult information on use and on product), but to liberation of major amounts in case of accidents and irregularities.

The information describes exclusively the safety requirements for the product(s) and is based on the present level of our knowledge.

The delivery specifications are contained in the corresponding product sheet.

This data does not constitute a guarantee for the characteristics of the product(s) as defined by the legal warranty regulations.

(n.a. = not applicable; n.d. = not determined)

Müller-Omicron GmbH & Co. KG

Revision date: 14.01.2014 Revision No: 2,0

DENTALRAPID AF (inkl. Varianten)

00320-0065-GHS



(The data for the hazardous ingredients were taken respectively from the last version of the sub-contractor's safety data sheet.)