according to Regulation (EC) No. 1907/2006 (REACH)

Trade name: WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

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

1.1 Product identifier

WR 2000 Spray cleaner

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

WR 2000 Spray cleaner for roller sets in dental X-ray processors.

Product categories [PC]

PC35 - Washing and cleaning products (including solvent based products)

Uses advised against

None, if handled according to order.

Remark

The product is intended for professional use.

1.3 Details of the supplier of the safety data sheet

Supplier (manufacturer/importer/only representative/downstream user/distributor)

orochemie GmbH + Co. KG

Street: Max-Planck-Straße 27

Postal code/city: 70806 Kornwestheim

Telephone: +49 7154 1308-0 **Telefax:** +49 7154 1308-40

Information contact: DÜRR DENTAL AG, Höpfigheimer Straße 17, 74321 Bietigheim-Bissingen, Germany

Tel: +49 7142 705-0, Fax: +49 7142 705-500, info@duerr.de

in Great Britain/Ireland:

DÜRR DENTAL [Products] UK Ltd., 14 Linnell Way - Telford Way Industrial Estate, Kettering Northants NN16 8PS,

United Kingdom

Tel: +44 1536 526740, Fax.: +44 1536 526749, info@duerruk.com

1.4 Emergency telephone number

INT: +49 6132 84463 (24 h/7 d)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

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

Eye Irrit. 2; H319 - Serious eye damage/eye irritation: Category 2A; Causes serious eye irritation.

Classification procedure

The classification was carried out according to the calculation method of Regulation No. (EC) 1272/2008 [CLP].

Classification according to Directive 1999/45/EC

None

2.2 Label elements

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

Hazard pictograms



Exclamation mark (GHS07)

Signal word

Page: 1 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name : WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

Warning

Hazard statements

H319 Causes serious eye irritation.

Precautionary statements

P280 Wear protective gloves and eye/face protection.
P301+P330+P331 IF SWALLOWED: rinse mouth. Do NOT induce vomiting.

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

and easy to do. Continue rinsing.

P353 Rinse skin with water/shower.

P501 Dispose of contents/container to hazardous or special waste collection point.

Labelling (1999/45/EC)

S-phrases

37/39 Wear suitable gloves and eye/face protection.

26 In case of contact with eyes, rinse immediately with plenty of water and seek medical advice .

24/25 Avoid contact with skin and eyes.

Special provisions concerning the labelling of certain mixtures

Safety data sheet available for professional user on request.

2.3 Other hazards

None

SECTION 3: Composition/information on ingredients

3.2 Mixtures

Description

WR 2000 contains anionic surfactants, alkaline cleaning components and complexing agents in aqueous solution.

Hazardous ingredients

SODIUM ETHYLENEDIAMINETETRAACETATE; REACH registration No.: 01-2119486762-27; EC No: 200-573-9; CAS No.:

64-02-8

Weight fraction: 1 - 5 %

Classification 67/548/EEC: Xi; R41 Xn; R20/22

 $\hbox{Classification 1272/2008 [CLP]:} \qquad \hbox{Eye Dam. 1; H318 Acute Tox. 4; H302 Acute Tox. 4; H332 }$

Weight fraction: 1-5%

Classification 67/548/EEC: Xi; R41 Xi; R38

Classification 1272/2008 [CLP]: Eye Dam. 1; H318 Skin Irrit. 2; H315

Additional information

Full text of R-, H- and EUH-phrases: see section 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

General information

Remove contaminated, saturated clothing immediately. In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

After inhalation

Provide fresh air. In case of respiratory tract irritation, consult a physician.

In case of skin contact

Wash with plenty of water. When in doubt or if symptoms are observed, get medical advice.

After eye contact

In case of contact with eyes flush immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart and consult an ophthalmologist.

Page: 2 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name: WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

After ingestion

If swallowed, mmediately drink: Water Never give anything by mouth to an unconscious person or a person with cramps. Do not induce vomiting. Call a physician immediately.

4.2 Most important symptoms and effects, both acute and delayed

Causes serious eye irritation.

4.3 Indication of any immediate medical attention and special treatment needed

None

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Carbon dioxide (CO2). Extinguishing powder. Water spray. Water mist. The product itself does not burn. Co-ordinate fire-fighting measures to the fire surroundings.

Unsuitable extinguishing media

High power water jet.

5.2 Special hazards arising from the substance or mixture

None known

Hazardous combustion products

None known.

5.3 Advice for firefighters

Adapt protective equipment to surrounding fire.

Special protective equipment for firefighters

Adapt protective equipment to surrounding fire.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Use personal protection equipment. See protective measures under point 7 and 8.

For non-emergency personnel

Use personal protection equipment. See protective measures under point 7 and 8.

For emergency responders

Personal protection equipment

See protective measures under point 7 and 8.

6.2 Environmental precautions

Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

6.3 Methods and material for containment and cleaning up

For cleaning up

Absorb with liquid-binding material (e.g. sand, diatomaceous earth, acid- or universal binding agents). Collect in closed and suitable containers for disposal.

Other information

Treat the recovered material as prescribed in the section on waste disposal.

6.4 Reference to other sections

None

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Keep/Store only in original container. Please note safety instructions and directions for use on the drum. Open and

Page: 3 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name : WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

handle container with care. Provide adequate ventilation. Do not breathe vapour/aerosol.

Protective measures

Fire prevent measures

Usual measures for fire prevention. When using do not smoke.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storage rooms and vessels

Keep/Store only in original container. Keep container tightly closed. Keep in a cool, well-ventilated place. Do not store in temperatures below 5 $^{\circ}$ C.

Hints on joint storage

Store the foodstuffs separately.

7.3 Specific end use(s)

None

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

DNEL/DMEL and PNEC values

There are no data available on the preparation itself.

DNEL/DMEL

Limit value type : DNEL/DMEL (DNEL Consumer, Local) (SODIUM ETHYLENEDIAMINETETRAACETATE ;

CAS No.: 64-02-8)

Exposure route: Inhalation

Exposure frequency: Long-term (repeated)

Limit value : 1,5 mg/m³

Limit value type: DNEL/DMEL (DNEL Consumer, Local) (SODIUM ETHYLENEDIAMINETETRAACETATE ;

CAS No.: 64-02-8)

Exposure route: Inhalation

Exposure frequency : Short-term (acute)

Limit value : 1,5 mg/m³

Limit value type: DNEL/DMEL (DNEL Consumer, Systemic) (SODIUM ETHYLENEDIAMINETETRAACETATE;

CAS No.: 64-02-8)

Exposure route : Inhalation

Exposure frequency: Long-term (repeated)

Limit value: 1,5 mg/m³

Limit value type : DNEL/DMEL (DNEL Consumer, Systemic) (SODIUM ETHYLENEDIAMINETETRAACETATE ;

CAS No. : 64-02-8)

Exposure route : Inhalation

Exposure frequency: Short-term (acute)
Limit value: 1,5 mg/m³

Limit value type: DNEL/DMEL (DNEL Consumer, Systemic) (SODIUM ETHYLENEDIAMINETETRAACETATE;

CAS No.: 64-02-8)

Exposure route: Oral

Exposure frequency : Long-term (repeated)

Limit value : 25 mg/kg Safety factor : 24 h

Limit value type : DNEL/DMEL (Worker, Local) (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. :

64-02-8) Inhalation

Exposure route: Inhalation
Exposure frequency: Long-term (repeated)

Limit value : 2,5 mg/m³

Limit value type: DNEL/DMEL (Worker, Local) (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. :

64-02-8) Exposure route : Inhalation

Exposure frequency : Short-term (acute)

Page: 4 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name : WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

Limit value : 2,5 mg/m³

Limit value type: DNEL/DMEL (Worker, Systemic) (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS

No.: 64-02-8)

Exposure route: Inhalation

Exposure frequency: Long-term (repeated)

Limit value : 2,5 mg/m³

Limit value type: DNEL/DMEL (Worker, Systemic) (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS

No.: 64-02-8)

Exposure route: Inhalation
Exposure frequency: Short-term (acute)
Limit value: 2,5 mg/m³

PNEC

Limit value type: PNEC aquatic, freshwater (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-

02-8)

Exposure route: Water (Including sewage plant)

Limit value: 2,2 mg/l

Limit value type: PNEC aquatic, marine water (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. :

64-02-8)

Exposure route: Water (Including sewage plant)

Limit value: 0,22 mg/l

Limit value type: PNEC (Industrial) (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Exposure route : Soil
Limit value : 0,72 mg/kg

Limit value type: PNEC sewage treatment plant (STP) (SODIUM ETHYLENEDIAMINETETRAACETATE;

CAS No.: 64-02-8)

Exposure route: Water (Including sewage plant)

Limit value : 43 mg/l

8.2 Exposure controls

Personal protection equipment

Eye / face protection

Eye glasses with side protection DIN EN 166

Skin protection

Hand protection

Short-term exposure (Level 2: < 30 min): disposable gloves to EN374 category III, e.g. nitrile rubber, material thickness 0.1 mm.

Long-term exposure (Level 6: < 480 min): protective gloves to EN374 category III, e.g. nitrile rubber, material thickness 0.7 mm.

When handling with chemical substances, protective gloves must be worn with the CE-label including the four control digits.

Body protection

Body protection: not applicable.

Respiratory protection

Usually no personal respirative protection necessary.

General health and safety measures

Keep away from food, drink and animal feeding stuffs. Avoid contact with skin, eyes and clothes. Remove contaminated, saturated clothing. Wash hands before breaks and after work. Separate storage of work clothes. When using do not eat, drink, smoke, sniff.

Occupational exposure controls

Technical measures to prevent exposure

Provide adequate ventilation.

SECTION 9: Physical and chemical properties

Page: 5 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name: WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

9.1 Information on basic physical and chemical properties

Appearance: liquid
Colour: colourless
Odour: odourless
Safety relevant basis data

Melting point / melting range : (1013 hPa) No data available Boiling temperature / boiling range (1013 hPa) ca. 100 °C

Decomposition temperature: (1013 hPa) Ca. No data available

Flash point: not applicable

Ignition temperature: not applicable

Lower explosion limit: not applicable

Upper explosion limit: not applicable

Vapour pressure: (50 °C) No data available

Density: (20 °C) 1,01 - 1,03 g/cm³

Solvent separation test: (20 °C) < 3 %

Water solubility: (20 °C) 100 Wt %

pH value: 12 - 13

log P O/W: No data available

Flow time: (20 °C) < 12 s DIN-cup 4 mm

Odour threshold : not applicable

Oxidising liquids:

Explosive properties:

Corrosive to metals:

Not applicable.

Not corrosive to metals.

9.2 Other information

None

SECTION 10: Stability and reactivity

10.1 Reactivity

None, if handled according to order.

10.2 Chemical stability

Stable under recommended storage and handling conditions (see section 7). Reactions with acids: development of heat.

10.3 Possibility of hazardous reactions

None, if handled according to order.

10.4 Conditions to avoid

No information available.

10.5 Incompatible materials

No information available.

10.6 Hazardous decomposition products

None known.

SECTION 11: Toxicological information

11.1 Information on toxicological effects

There are no data available on the mixture itself.

Acute effects

Acute oral toxicity

Parameter: LD50 (DODECYLBENZENESULPHONATE, AMINE SALT ; CAS No. : 68411-31-4)

Exposure route: Oral Species: Rat

Page: 6 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name : WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

Effective dose : > 2000 mg/kg

Parameter: LD50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Exposure route : Oral Species : Rat

Effective dose: 1780 - 2000 mg/kg

Practical experience/human evidence

Avoid contact with skin and eyes.

Acute inhalation toxicity

Parameter: LC50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Exposure route: Inhalation Species: Rat

Effective dose: 1000 - 5000 mg/l

Exposure time : 6 h

Irritant and corrosive effects

Causes serious eye irritation.

Sensitisation

No data available.

CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)

No information available.

11.4 Additional information

The classification was carried out according to the calculation method of the Preparations Directive (1999/45/EC).

SECTION 12: Ecological information

12.1 Toxicity

Aquatic toxicity

There are no data available on the preparation itself.

Acute (short-term) fish toxicity

Parameter: LC50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Species : Lepomis macrochirus (Bluegill)
Evaluation parameter : Acute (short-term) fish toxicity

Effective dose : 951 mg/l Exposure time : 96 h

Parameter: LC50 (DODECYLBENZENESULPHONATE, AMINE SALT; CAS No.: 68411-31-4)

Species: Leuciscus idus (golden orfe)
Evaluation parameter: Acute (short-term) fish toxicity

Effective dose : 1 - 10 mg/l Exposure time : 96 h

Parameter: LC50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Species : Leuciscus idus (golden orfe)
Evaluation parameter : Acute (short-term) fish toxicity

Effective dose : 2040 mg/l Exposure time : 96 h

Parameter: LC0 (DODECYLBENZENESULPHONATE, AMINE SALT; CAS No.: 68411-31-4)

Species: Leuciscus idus (golden orfe)
Evaluation parameter: Acute (short-term) fish toxicity

Effective dose: 4 mg/l Exposure time: 96 h

Chronic (long-term) fish toxicity

Parameter: NOEC (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Species: Brachydanio rerio (zebra-fish)
Evaluation parameter: Chronic (long-term) fish toxicity

Effective dose : >= 36,9 mg/l

Page: 7 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name : WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print: 15.09.2014

Exposure time: 840 h
Methode: OECD 210

Acute (short-term) daphnia toxicity

Parameter: EC50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Species: Daphnia magna (Big water flea)
Evaluation parameter: Acute (short-term) daphnia toxicity

Effective dose : 140 mg/l Exposure time : 48 h

Parameter: EC50 (DODECYLBENZENESULPHONATE, AMINE SALT ; CAS No. : 68411-31-4)

Species: Daphnia

Evaluation parameter: Acute (short-term) daphnia toxicity

Effective dose : 10 - 100 mg/l Exposure time : 48 h Chronic (long-term) daphnia toxicity

Parameter: NOEC (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Species: Daphnia magna (Big water flea)
Evaluation parameter: Chronic (long-term) daphnia toxicity

Effective dose : 25 mg/l Exposure time : 504 h

Acute (short-term) algae toxicity

Parameter: EC50 (SODIUM ETHYLENEDIAMINETETRAACETATE ; CAS No. : 64-02-8)

Evaluation parameter : Acute (short-term) algae toxicity

Effective dose : > 100 mg/l Exposure time : 72 h

Parameter: EC50 (DODECYLBENZENESULPHONATE, AMINE SALT; CAS No.: 68411-31-4)

Species: Algae

Evaluation parameter : Acute (short-term) algae toxicity

Effective dose : 10 - 100 mg/l Exposure time : 72 h

Effects in sewage plants

In case of appropriate conduction into adapted biological purification plants no disturbances have to be expected.

12.2 Persistence and degradability

Biodegradation

The surfactants comply with OECD guidelines and are therefore biodegradable.

12.3 Bioaccumulative potential

No information available.

12.4 Mobility in soil

Known or predicted distribution to environmental compartments

There are no data available on the preparation itself.

12.5 Results of PBT and vPvB assessment

No information available.

12.6 Other adverse effects

No information available.

12.7 Further ecological information

Prevent from flowing into surface water/ground water.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product/Packaging disposal

Waste codes / waste designations according to EWC

Page: 8 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

Trade name: WR 2000 Spray cleaner

Revision: 15.09.2014 **Version (Revision):** 2.0.0 (1.0.0)

Date of print : 15.09.2014

Waste code product

Concentrate/larger quantities: 18 01 06*.

Waste treatment options

Appropriate disposal / Product

Dispose according to legislation. Consult the appropriate local waste disposal expert about waste disposal.

Appropriate disposal / Package

Non-contaminated packages may be recycled. Handle contaminated packages in the same way as the substance itself

SECTION 14: Transport information

14.1 UN number

No dangerous goods in sense of this transport regulation.

14.2 UN proper shipping name

No dangerous goods in sense of this transport regulation.

14.3 Transport hazard class(es)

No dangerous goods in sense of this transport regulation.

14.4 Packing group

No dangerous goods in sense of this transport regulation.

14.5 Environmental hazards

No dangerous goods in sense of this transport regulation.

14.6 Special precautions for user

None

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

not applicable

SECTION 15: Regulatory information

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

National regulations

Restrictions of occupation

According to directive 94/33/EC, juveniles are only allowed to handle this product as long as all effects of dangerous substances are prevented.

15.2 Chemical Safety Assessment

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

SECTION 16: Other information

16.1 Indication of changes

02. Labelling according to Regulation (EC) No. 1272/2008 [CLP] \cdot 02. Labelling according to Regulation (EC) No. 1272/2008 [CLP] - Hazard components for labelling \cdot 02. Labelling (67/548/EEC or 1999/45/EC) \cdot 03. Hazardous ingredients

16.2 Abbreviations and acronyms

ADR = The European Agreement concerning the International Carriage of Dangerous Goods by Road

ATE = Acute Toxicity Estimates

CAS = Chemical Abstracts Service

CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No. 1272/2008]

CMR = Carcinogen, Mutagen or Reproductive toxicant

 CO_2 = Carbon dioxide

DMEL = Derived Minimal Effect Level

Page: 9 / 10

according to Regulation (EC) No. 1907/2006 (REACH)

WR 2000 Spray cleaner Trade name:

Revision: 15.09.2014 Version (Revision): 2.0.0 (1.0.0)

Date of print: 15.09.2014

> DNEL = Derived No Effect Level EC = European Commission

EC50 = Half maximal effective concentration

EN = European Standard (Norm)

EU = European Union

EUH statement = CLP-specific Hazard statement

EWC = European Waste Catalogue

GHS = Globally Harmonized System of Classification and Labelling of Chemicals

H statement = GHS Hazard statement

IATA = International Air Transport Association ICAO-TI = International Civil Aviation Organization-Technical Instructions

IMDG = International Maritime Dangerous Goods

LC50 = Median lethal concentration

LD50 = Median lethal dose

LogPow = Logarithm of the octanol/water partition coefficient

MARPOL 73/78 = International Convention for the Prevention of Pollution From Ships, 1973 as modified by the Protocol

of 1978. ("Marpol" = marine pollution)

NOEC/NOEL = No observed effect concentration/level

OECD = Organisation for Economic Co-operation and Development

PBT = Persistent, Bioaccumulative and Toxic

PNEC = Predicted No Effect Concentration

REACH = Registration, Evaluation, Authorisation and Restriction of Chemicals Regulation [Regulation (EC) No.

1907/2006]

RID = The Regulations concerning the International Carriage of Dangerous Goods by Rail

RMM = Risk Management Measure

RRN = REACH Registration Number

STOT-RE = Specific Target Organ Toxicity - Repeated Exposure

STOT-SE = Specific Target Organ Toxicity - Single Exposure

SVHC = Substances of Very High Concern

TLV/STEL = Threshold limit value/short-term exposure limit

TLV/TWA = Threshold limit value/time weighted average

UN = United Nations

VOC = Volatile Organic Compound

vPvB = Very Persistent and Very Bioaccumulative

16.3 Key literature references and sources for data

16.4 Relevant R-, H- and EUH-phrases (Number and full text)

H302+H332 Harmful if swallowed or if inhaled.

H315 Causes skin irritation. H318 Causes serious eye damage. H319 Causes serious eye irritation.

20/22 Harmful by inhalation and if swallowed.

38 Irritating to skin.

41 Risk of serious damage to eyes.

16.5 Training advice

16.6 Additional information

Notice the directions for use on the label.

Dr. Klaus-Michael Wolf Tel. No.: +49 7154 1308-27 · Fax. No.: +49 7154 1308-40 · info@orochemie.de

Dipl. Ing. Elisabeth Gehring Tel. No.: +49 7154 1308-37

The above information describes exclusively the safety requirements of the product and is based on our present-day knowledge. The information is intended to give you advice about the safe handling of the product named in this safety data sheet, for storage, processing, transport and disposal. The information cannot be transferred to other products. In the case of mixing the product with other products or in the case of processing, the information on this safety data sheet is not necessarily valid for the new made-up material.

Page: 10 / 10