

Safety data sheet

according to 1907/2006/EC, Article 31

Printing date 13.06.2023

Version number 12 (replaces version 11)

Revision: 13.06.2023

- **1.1 Product identifier**
- **Trade name:** PuraDES PentaCID KONZ
- **1.2 Relevant identified uses of the substance or mixture and uses advised against**
- **Life cycle stages PW** Widespread use by professional workers
- **Sector of Use**
 - SU20 Health services
 - SU22 Professional uses: Public domain (administration, education, entertainment, services, craftsmen)
- **Product category PC8** Biocidal products
- **Technical function** Biocide
- **Application of the substance / the mixture** Surface disinfectant
- **1.3 Details of the supplier of the safety data sheet**
- **Manufacturer/Supplier:**
 - PRISMAN GmbH
 - Otto-Hahn-Ring 6-18
 - D-64653 Lorsch
 - Germany
- **Further information obtainable from:** Tel. 71 33 45 200, kruse@kruse.pl
- **1.4 Emergency telephone number:**
 - 71 33 45 200 (podczas godzin urzędowania firmy Henry Kruse w dni robocze)
 - 998 Państwowa Straż Pożarna

SECTION 2: Hazards identification

- **2.1 Classification of the substance or mixture**
- **Classification according to Regulation (EC) No 1272/2008**
 - Acute Tox. 4 H302 Harmful if swallowed.
 - Skin Corr. 1A H314 Causes severe skin burns and eye damage.
 - Eye Dam. 1 H318 Causes serious eye damage.
 - Aquatic Chronic 1 H410 Very toxic to aquatic life with long lasting effects.

- **2.2 Label elements**
- **Labelling according to Regulation (EC) No 1272/2008**
 - The product is classified and labelled according to the GB CLP regulation.
- **Hazard pictograms**



GHS05 GHS07 GHS09

- **Signal word** Danger
- **Hazard-determining components of labelling:**
 - didecyldimethylammonium chloride
 - N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine
 - Alcohols, C12-18, ethoxylated
- **Hazard statements**
 - H302 Harmful if swallowed.
 - H314 Causes severe skin burns and eye damage.
 - H410 Very toxic to aquatic life with long lasting effects.
- **Precautionary statements**
 - P273 Avoid release to the environment.
 - P280 Wear protective gloves / eye protection.
 - P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower].
 - 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/doctor.
 - P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

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- **2.3 Other hazards**
- **Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.

SECTION 3: Composition/information on ingredients

- **3.2 Mixtures**
- **Description:** Mixture of substances listed below with nonhazardous additions.

- **Dangerous components:**

CAS: 7173-51-5 EINECS: 230-525-2 Index number: 612-131-00-6 Reg.nr.: 01-2119457558-25-XXXX	didecyldimethylammonium chloride  Skin Corr. 1B, H314  Aquatic Chronic 2, H411  Acute Tox. 4, H302	10-25%
CAS: 2372-82-9 EINECS: 219-145-8 Reg.nr.: 01-2119980592-29-xxxx	N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine  Acute Tox. 3, H301; Acute Tox. 3, H311  STOT RE 2, H373  Skin Corr. 1A, H314  Aquatic Acute 1, H400; Aquatic Chronic 1, H410	2.5-10%
CAS: 68213-23-0	Alcohols, C12-18, ethoxylated  Eye Dam. 1, H318	2.5-10%

- **Additional information:** For the wording of the listed hazard phrases refer to section 16.

SECTION 4: First aid measures

- **4.1 Description of first aid measures**
- **General information:**
 Immediately remove any clothing soiled by the product.
 Take affected persons out into the fresh air.
 Do not leave affected persons unattended.
 Keep quiet and cover.
 Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident.
- **After inhalation:**
 Supply fresh air.
 Seek medical treatment in case of complaints.
- **After skin contact:**
 Immediately rinse with water.
 If skin irritation continues, consult a doctor.
- **After eye contact:**
 Rinse opened eye for several minutes under running water. Then consult a doctor.
 Protect unharmed eye.
- **After swallowing:**
 Call for a doctor immediately.
 Drink plenty of water and provide fresh air. Call for a doctor immediately.
 Do not induce vomiting; call for medical help immediately.
- **4.2 Most important symptoms and effects, both acute and delayed** No further relevant information available.
- **4.3 Indication of any immediate medical attention and special treatment needed**
 No further relevant information available.

SECTION 5: Firefighting measures

- **5.1 Extinguishing media**
- **Suitable extinguishing agents:**
 Use fire extinguishing methods suitable to surrounding conditions.

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CO₂, powder or water spray. Fight larger fires with water spray.

· **5.2 Special hazards arising from the substance or mixture**

During heating or in case of fire poisonous gases are produced.

In case of fire, the following can be released:

Carbon monoxide (CO)

Under certain fire conditions, traces of other toxic gases cannot be excluded.

· **5.3 Advice for firefighters**

· **Protective equipment:**

Do not inhale explosion gases or combustion gases.

Mouth respiratory protective device.

SECTION 6: Accidental release measures

· **6.1 Personal precautions, protective equipment and emergency procedures**

Wear protective equipment. Keep unprotected persons away.

Particular danger of slipping on leaked/spilled product.

Ensure adequate ventilation

Use respiratory protective device against the effects of fumes/dust/aerosol.

· **6.2 Environmental precautions:**

Do not allow product to reach sewage system or any water course.

Inform respective authorities in case of seepage into water course or sewage system.

Do not allow to enter sewers/ surface or ground water.

Dilute with plenty of water.

· **6.3 Methods and material for containment and cleaning up:**

Dispose of the material collected according to regulations.

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust).

· **6.4 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.

SECTION 7: Handling and storage

· **7.1 Precautions for safe handling**

Keep receptacles tightly sealed.

Store in cool, dry place in tightly closed receptacles.

Restrict the quantity stored at the work place.

· **Information about fire - and explosion protection:**

No special measures required.

The product is not flammable.

· **7.2 Conditions for safe storage, including any incompatibilities**

· **Storage:**

· **Requirements to be met by storerooms and receptacles:** Store only in the original receptacle.

· **Information about storage in one common storage facility:** Store away from foodstuffs.

· **Further information about storage conditions:**

Keep container tightly sealed.

Store in upright position.

· **7.3 Specific end use(s)** No further relevant information available.

SECTION 8: Exposure controls/personal protection

· **8.1 Control parameters**

· **Ingredients with limit values that require monitoring at the workplace:**

The product does not contain any relevant quantities of materials with critical values that have to be monitored at the workplace.

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- **Ingredients with biological limit values:**
- **Additional Occupational Exposure Limit Values for possible hazards during processing:** None
- **Additional information:** The lists valid during the making were used as basis.

· 8.2 Exposure controls

- **Appropriate engineering controls** No further data; see item 7.
- **Individual protection measures, such as 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.
Avoid contact with the eyes.
Avoid contact with the eyes and skin.
The usual precautionary measures are to be adhered to when handling chemicals.

· **Respiratory protection:**

- Not required.
- Use suitable respiratory protective device only when aerosol or mist is formed.

· **Hand protection**



Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.
Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

· **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 through time has to be found out by the manufacturer of the protective gloves and has to be observed.

· **For the permanent contact in work areas without heightened risk of injury (e.g. Laboratory) gloves made of the following material are suitable:**

Rubber gloves

· **For the permanent contact gloves made of the following materials are suitable:** Neoprene gloves

· **As protection from splashes gloves made of the following materials are suitable:**

Nitrile rubber, NBR

Fluorocarbon rubber (Viton)

· **Body protection:** Long-sleeved work clothing (EN 368).

· **Thermal hazards** Not applicable

SECTION 9: Physical and chemical properties

· 9.1 Information on basic physical and chemical properties

· **General Information**

- | | |
|-------------------------------------------------------------------|----------------------------------|
| · Physical state | Fluid |
| · Colour: | Different according to colouring |
| · Odour: | Amine-like |
| · Odour threshold: | Not determined. |
| · Melting point/freezing point: | Undetermined. |
| · Boiling point or initial boiling point and boiling range | 100 °C |
| · Flammability | Not applicable. |
| · Lower and upper explosion limit | |
| · Lower: | Not applicable |

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· Upper:	<i>Not applicable</i>
· Flash point:	<i>>100 °C</i>
	<i>Not applicable.</i>
· Decomposition temperature:	<i>Not determined.</i>
· pH at 20 °C	<i>>11</i>
· Viscosity:	
· Kinematic viscosity	<i>Not determined.</i>
· Dynamic:	<i>Not determined.</i>
· Solubility	
· water:	<i>Fully miscible.</i>
· Partition coefficient n-octanol/water (log value)	<i>Not determined.</i>
· Vapour pressure at 20 °C:	<i>23 hPa</i>
· Density and/or relative density	
· Density at 20 °C:	<i>1.01 g/cm³</i>
· Relative density	<i>Not determined.</i>
· Vapour density	<i>Not determined.</i>

· 9.2 Other information	
· Appearance:	
· Form:	<i>Fluid</i>
· Important information on protection of health and environment, and on safety.	
· Auto-ignition temperature:	<i>Product is not selfigniting.</i>
· Explosive properties:	<i>Product does not present an explosion hazard.</i>
· Solvent content:	
· Water:	<i>> 70 %</i>
· VOC (EC)	<i>0 %</i>
· Change in condition	
· Softening point/range	<i>Not applicable</i>
· Evaporation rate	<i>Not determined.</i>

· Information with regard to physical hazard classes	
· Explosives	<i>Void</i>
	<i>Void</i>
· Flammable gases	<i>Void</i>
	<i>Void</i>
· Aerosols	<i>Void</i>
	<i>Void</i>
· Oxidising gases	<i>Void</i>
	<i>Void</i>
· Gases under pressure	<i>Void</i>
	<i>Void</i>
· Flammable liquids	<i>Void</i>
	<i>Void</i>
· Flammable solids	<i>Void</i>
	<i>Void</i>
· Self-reactive substances and mixtures	<i>Void</i>
	<i>Void</i>
· Pyrophoric liquids	<i>Void</i>
	<i>Void</i>
· Pyrophoric solids	<i>Void</i>
	<i>Void</i>
· Self-heating substances and mixtures	<i>Void</i>
	<i>Void</i>
· Substances and mixtures, which emit flammable gases in contact with water	<i>Void</i>
	<i>Void</i>

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· Oxidising liquids	Void
	Void
· Oxidising solids	Void
	Void
· Organic peroxides	Void
	Void
· Corrosive to metals	Void
	Void
· Desensitised explosives	Void
	Void

SECTION 10: Stability and reactivity

- **10.1 Reactivity** No further relevant information available.
- **10.2 Chemical stability**
- **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **10.3 Possibility of hazardous reactions** Exothermic reaction with acids.
- **10.4 Conditions to avoid** No further relevant information available.
- **10.5 Incompatible materials:** No further relevant information available.
- **10.6 Hazardous decomposition products:** No dangerous decomposition products known.

SECTION 11: Toxicological information

- **11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008**
- **Acute toxicity** Harmful if swallowed.

· **LD/LC50 values relevant for classification:**

ATE (Acute Toxicity Estimates)

Oral	LD50	560 mg/kg
------	------	-----------

7173-51-5 didecyldimethylammonium chloride

Oral	LD50	411 mg/kg (rat)
------	------	-----------------

Dermal	LD50	>2,000 mg/kg (rat)
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2372-82-9 N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

Oral	LD50	100 mg/kg (ATE)
------	------	-----------------

- **Skin corrosion/irritation** Causes severe skin burns and eye damage.
- **Serious eye damage/irritation** Causes serious eye damage.
- **Additional toxicological information:**
- **Sensitisation** Not applicable
- **CMR effects (carcinogenicity, mutagenicity and toxicity for reproduction)** Not applicable
- **11.2 Information on other hazards**

· **Endocrine disrupting properties**

None of the ingredients is listed.

SECTION 12: Ecological information

· **12.1 Toxicity**

· **Aquatic toxicity:**

7173-51-5 didecyldimethylammonium chloride

EC50	mg/kg (rat)
------	-------------

2372-82-9 N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

EC50	0.01-0.1 mg/l (A)
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	18 mg/l (Bel)
	0.073 mg/l (daphnia)
LC50/96h	0.68 mg/l (fish)

- **12.2 Persistence and degradability** No further relevant information available.
- **12.3 Bioaccumulative potential** No further relevant information available.
- **12.4 Mobility in soil** No further relevant information available.
- **12.5 Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.
- **12.6 Endocrine disrupting properties**
The product does not contain substances with endocrine disrupting properties.
- **12.7 Other adverse effects**
- **Additional ecological information:**
- **General notes:**
Water hazard class 2 (German Regulation) (Self-assessment): hazardous for water
Do not allow product to reach ground water, water course or sewage system.
Must not reach sewage water or drainage ditch undiluted or unneutralised.
Danger to drinking water if even small quantities leak into the ground.
Also poisonous for fish and plankton in water bodies.
Rinse off of bigger amounts into drains or the aquatic environment may lead to increased pH-values. A high pH-value harms aquatic organisms. In the dilution of the use-level the pH-value is considerably reduced, so that after the use of the product the aqueous waste, emptied into drains, is only low water-dangerous.

SECTION 13: Disposal considerations

- **13.1 Waste treatment methods**
- **Recommendation**
Must not be disposed together with household garbage. Do not allow product to reach sewage system.
- **Uncleaned packaging:**
- **Recommendation:** Disposal must be made according to official regulations.

SECTION 14: Transport information

- | | |
|------------------------------------------------------------------|------------------------------------------------------------------------------------------------------------------------------------------------------------|
| · 14.1 UN number or ID number
· ADR, IMDG, IATA | UN1903 |
| · 14.2 UN proper shipping name
· ADR | 1903 DISINFECTANT, LIQUID, CORROSIVE, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine, didecyldimethylammonium chloride), ENVIRONMENTALLY HAZARDOUS |
| · IMDG | DISINFECTANT, LIQUID, CORROSIVE, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine, didecyldimethylammonium chloride), MARINE POLLUTANT |
| · IATA | DISINFECTANT, LIQUID, CORROSIVE, N.O.S. (N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine, didecyldimethylammonium chloride) |

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· **14.3 Transport hazard class(es)**· **ADR, IMDG**

· **Class** 8 Corrosive substances.
· **Label** 8

· **IATA**

· **Class** 8 Corrosive substances.
· **Label** 8

· **14.4 Packing group**

· **ADR, IMDG, IATA** III

· **14.5 Environmental hazards:**

Product contains environmentally hazardous substances:
N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine

· **Marine pollutant:**

No
Symbol (fish and tree)

· **Special marking (ADR):**

Symbol (fish and tree)

· **14.6 Special precautions for user**

Warning: Corrosive substances.

· **Hazard identification number (Kemler code):**

80

· **EMS Number:**

F-A,S-B

· **14.7 Maritime transport in bulk according to IMO instruments**

Not applicable.

· **Transport/Additional information:**· **ADR**· **Excepted quantities (EQ)**

Code: E1
Maximum net quantity per inner packaging: 30 ml
Maximum net quantity per outer packaging: 1000 ml

· **IMDG**· **Limited quantities (LQ)**

5L

· **Excepted quantities (EQ)**

Code: E2
Maximum net quantity per inner packaging: 30 ml
Maximum net quantity per outer packaging: 500 ml

SECTION 15: Regulatory information

· **15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**· **Labelling according to Regulation (EC) No 1272/2008**

GHS label elements

The product is classified and labelled according to the GB CLP regulation.

· **Hazard pictograms**

GHS05

GHS07

GHS09

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· **Signal word** *Danger*· **Hazard-determining components of labelling:**

didecyldimethylammonium chloride
N-(3-aminopropyl)-N-dodecylpropane-1,3-diamine
Alcohols, C12-18, ethoxylated

· **Hazard statements**

H302 Harmful if swallowed.
H314 Causes severe skin burns and eye damage.
H410 Very toxic to aquatic life with long lasting effects.

· **Precautionary statements**

P273 Avoid release to the environment.
P280 Wear protective gloves / eye protection.
P303+P361+P353 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water [or shower].
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/doctor.
P501 Dispose of contents/container in accordance with local/regional/national/international regulations.

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

SECTION 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.

· **Relevant phrases**

H301 Toxic if swallowed.
H302 Harmful if swallowed.
H311 Toxic in contact with skin.
H314 Causes severe skin burns and eye damage.
H318 Causes serious eye damage.
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.

· **Recommended restriction of use** *Product only for professional use*· **Abbreviations and acronyms:**

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)
IATA-DGR: Dangerous Goods Regulations by the "International Air Transport Association" (IATA)
ICAO: International Civil Aviation Organisation
ICAO-TI: Technical Instructions by the "International Civil Aviation Organisation" (ICAO)
ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)
IMDG: International Maritime Code for Dangerous Goods
IATA: International Air Transport Association
GHS: Globally Harmonised System of Classification and Labelling of Chemicals
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)
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
Acute Tox. 3: Acute toxicity – Category 3
Acute Tox. 4: Acute toxicity – Category 4
Skin Corr. 1A: Skin corrosion/irritation – Category 1A
Skin Corr. 1B: Skin corrosion/irritation – Category 1B
Eye Dam. 1: Serious eye damage/eye irritation – Category 1
STOT RE 2: Specific target organ toxicity (repeated exposure) – Category 2
Aquatic Acute 1: Hazardous to the aquatic environment - acute aquatic hazard – Category 1

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Aquatic Chronic 1: Hazardous to the aquatic environment - long-term aquatic hazard – Category 1
Aquatic Chronic 2: Hazardous to the aquatic environment - long-term aquatic hazard – Category 2
· *** Data compared to the previous version altered.**

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