

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

### 1.1. Product identifier

**Name of product** Sonoswiss Cleaner L5 (SW-C L5)

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

#### Identified uses

#### Sector of uses [SU]

SU22 - Professional uses: Public domain (administration, education, entertainment, services, craftsmen)

SU3 - Industrial uses: Uses of substances as such or in preparations at industrial sites

#### Product categories [PC]

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

#### Process categories [PROC]

PROC7 - Industrial spraying

PROC8a - Transfer of substance or preparation (charging/discharging) from/to vessels/large containers at non-dedicated facilities

PROC9 - Transfer of substance or preparation into small containers (dedicated filling line, including weighing)

PROC13 - Treatment of articles by dipping and pouring

PROC11 - Non industrial spraying

#### Environmental release categories [ERC]

ERC8a - Wide dispersive indoor use of processing aids in open systems

ERC8b - Wide dispersive indoor use of reactive substances in open systems

ERC6b - Industrial use of reactive processing aids

#### Recommended intended purpose(s)

Aqueous cleaning concentrate without surfactants.

### 1.3. Details of the supplier of the safety data sheet

#### Manufacturer/distributor

Sonoswiss AG  
 Sonnenstr. 417, CH-8262 Ramsen/SH  
 Phone +41 52 742 80 10, Fax +41 52 742 80 18  
 E-Mail info@sonoswiss.ch  
 Internet www.sonoswiss.ch

#### Advice

Email: info@sonoswiss.ch  
 Phone +41 52 742 80 10

### 1.4. Emergency telephone number

#### Emergency advice

Schweizerisches Toxikologisches Informationszentrum, Zürich  
 Phone +41 44 251 51 51

## SECTION 2: Hazards identification

### 2.1. Classification of the substance or mixture

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

Hazard classes and Hazard categories	Hazard Statements	Classification procedure
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Skin Irrit. 2	H315	Calculation method.
Eye Irrit. 2	H319	Calculation method.

#### Hazard Statements

H315	Causes skin irritation.
H319	Causes serious eye irritation.

**2.2. Label elements**

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



GHS07

**Signal word**

Warning

**Hazard Statements**H315 Causes skin irritation.  
H319 Causes serious eye irritation.**Precautionary Statements**P233 Keep container tightly closed.  
P261 Avoid breathing gas/mist/vapours/spray.  
P280 Wear protective gloves/eye protection.  
P301 + P312 BEI VERSCHLUCKEN: Bei Unwohlsein GIFTINFORMATIONSZENTRUM/Arzt anrufen.  
P302 + P352 IF ON SKIN: Wash with plenty of water.  
P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.  
P337 + P313 If eye irritation persists: Get medical advice/attention.**2.3. Other hazards****Information pertaining to special dangers for human and environment**

Inhalation of spray may cause respiratory irritation.

**Results of PBT and vPvB assessment**

The product does not contain any PBT-/vPvB-substances according to the recipe.

**SECTION 3: Composition/ information on ingredients****3.1. Substances**

not applicable

**3.2. Mixtures****Description**

Aqueous alkaline mixture of phosphates, complexing agents, carbonates and ammonia.

**Hazardous ingredients**

CAS No	EC No	Name	[% weight]	Classification according to Regulation (EC) No 1272/2008 [CLP/GHS]
497-19-8	207-838-8	sodium carbonate	< 5	Eye Irrit. 2, H319
1336-21-6	215-647-6	ammonia ....%	< 5	Met. Corr. 1, H290 / Acute Tox. 4, H302 / Acute Tox. 4, H332 / Skin Corr. 1B, H314 / Eye Dam. 1, H318 / STOT SE 3, H335 / Aquatic Acute 1, H400 M=1 / Aquatic Chronic 2, H411
7320-34-5	230-785-7	tetrapotassium pyrophosphate	< 5	Eye Irrit. 2, H319

**REACH**

CAS No	Name	REACH registration number
497-19-8	sodium carbonate	01-2119485498-19

**REACH (continued)**

CAS No	Name	REACH registration number
1336-21-6	ammonia ....%	01-2119488876-14
7320-34-5	tetrapotassium pyrophosphate	01-2119489369-18

**Additional advice**

Ingredients according to Annex VII, A, EC-Regulation 648/2004 (detergents): 5-15% phosphates, 5-15% polycarboxylates.

**SECTION 4: First aid measures****4.1. Description of first aid measures****General information**

Remove contaminated soaked clothing immediately and dispose it safely.

**In case of inhalation**

Ensure of fresh air.

In the event of symptoms refer for medical treatment.

**In case of skin contact**

In case of contact with skin wash off immediately with plenty of water.

Consult a doctor if skin irritation persists.

**In case of eye contact**

In case of contact with eyes rinse thoroughly with plenty of water and seek medical advice.

**In case of ingestion**

If swallowed seek medical advice immediately and show the doctor packing or label.

Rinse out mouth and give plenty of water to drink.

**4.2. Most important symptoms and effects, both acute and delayed****Physician's information / possible symptoms**

No further informations available.

**4.3. Indication of any immediate medical attention and special treatment needed****Treatment (Advice to doctor)**

No further informations available.

**SECTION 5: Firefighting measures****5.1. Extinguishing media****Suitable extinguishing media**

water

Product does not burn, fire-extinguishing activities according to surrounding.

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

In case of fire formation of dangerous gases possible.

In the event of fire the following can be released:

Ammonia

Nitrogen oxides (NO<sub>x</sub>)

Carbon monoxide (CO)

Phosphorus oxides (e.g. phosphoruspentoxide)

**5.3. Advice for firefighters****Special protective equipment for fire-fighters**

Do not inhale explosion and/or combustion gases.

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**SECTION 6: Accidental release measures****6.1. Personal precautions, protective equipment and emergency procedures****For non-emergency personnel**

Ensure adequate ventilation.

Use personal protection.

**For emergency responders**

Ensure adequate ventilation.

Use personal protective clothing.

Use personal protection.

**6.2. Environmental precautions**

Do not discharge into the drains/surface waters/groundwater.

**6.3. Methods and material for containment and cleaning up**

Take up with absorbent material (e.g. sand, sawdust, general-purpose binder, kieselguhr).

Flush away residues with water.

Take up mechanically and send for disposal.

**6.4. Reference to other sections**

Informations for safe handling see chapter 7.

Informations for personal protective equipment see chapter 8.

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**SECTION 7: Handling and storage****7.1. Precautions for safe handling****Advice on safe handling**

Use only in well-ventilated areas.

Take the usual precautions when handling with chemicals.

**General protective measures**

Avoid contact with eyes and skin

Do not inhale gases/vapours/aerosols.

**Hygiene measures**

Provide washing facilities at place of work.

Keep away from food and drink.

**Advice on protection against fire and explosion**

The product is not combustible.

No special measures necessary.

**7.2. Conditions for safe storage, including any incompatibilities****Requirements for storage rooms and vessels**

Keep only in unopened original container.

**Advice on storage compatibility**

Store cool and at distance to alkalies.

**Further information on storage conditions**

Keep container tightly closed.

Keep locked up, out of reach of children

Protect from heat and direct solar radiation.

Do not keep at temperatures below 5 °C.

**Information on storage stability**

Storage time: 5 years.

**7.3. Specific end use(s)**  
**Recommendation(s) for intended use**  
 no further

## SECTION 8: Exposure controls/personal protection

### 8.1. Control parameters

#### Ingredients with occupational exposure limits to be monitored

CAS No	Name	Code	[mg/m3]	[ppm]	Remark
7664-41-7	ammonia	8 hours	14	20	EU
		Short-term	36	50	
7664-41-7	Ammonia, anhydrous	WEL, 8 hours	18	25	R10-23-34-50
		Short-term	25	35	

#### DNEL-/PNEC-values

##### DNEL worker

CAS No	Substance name	Value	Code	Remark
1336-21-6	ammonia ....%	14 mg/m3	DNEL long-term inhalative (local)	
		47,6 mg/m3	DNEL long-term inhalative (systemic)	
		6,8 mg/kg	DNEL long-term dermal (systemic)	
497-19-8	sodium carbonate	10 mg/m3	DNEL long-term inhalative (local)	

##### PNEC

CAS No	Substance name	Value	Code	Remark
1336-21-6	ammonia ....%	0,001 mg/l	PNEC aquatic, freshwater	
7320-34-5	tetrapotassium pyrophosphate	50 mg/l	PNEC sewage treatment plant (STP)	
		0,05 mg/l	PNEC aquatic, freshwater	

### 8.2. Exposure controls

#### Respiratory protection

Short term: filter apparatus, combination filter K-P2  
 Breathing apparatus in the event of high concentrations.

#### Hand protection

Protective gloves

Glove material specification [make/type, thickness, permeation time/life]: Butyl, 0,5mm, >=8h.  
 Glove material specification [make/type, thickness, permeation time/life]: NBR, 0,35mm, >=8h.  
 Glove material specification [make/type, thickness, permeation time/life]: FKM, 0,4mm, >=8h.

#### Eye protection

tightly fitting goggles

#### Limitation and surveillance of the environment

Avoid penetration into the subsoil/soil.  
 Do not discharge into surface waters.  
 Neutralization is necessary before a waste water is discharged into sewage treatment plants.

#### Appropriate engineering controls

Technical exhaustion in case of longtermed exposition in sprayed aerosols.

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

<b>Appearance</b> liquid	<b>Colour</b> brownish	<b>Odour</b> of ammonia
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**Odour threshold**  
ammonia: 5ppm (3.5mg/m3).

**Important health, safety and environmental information**

	Value	Temperature	at	Method	Remark
<b>pH value</b>	10,5 - 11	20 °C			
<b>starts to boil</b>	>= 100 °C				
<b>solidifying point</b>	ca. 0 °C				
<b>Flash point</b>					no
<b>Flammable (solid)</b>	not applicable				
<b>Flammability (gas)</b>	not applicable				
<b>Ignition temperature</b>	not determined				
<b>Self ignition temperature</b>					not spontaneously flammable
<b>Lower explosion limit</b>	15,4 Vol-%				Value of ammonia.
<b>Upper explosion limit</b>	33,6 Vol-%				Value of ammonia.
<b>Vapour pressure</b>	ca. 45 hPa	20 °C			
<b>Relative density</b>	ca. 1,12 g/cm3	20 °C			
<b>Vapour density</b>	0,586				Value of ammonia.
<b>Solubility in water</b>					miscible
<b>Solubility/other</b>	not determined				
<b>Partition coefficient n-octanol/water (log P O/W)</b>	-1,14				Value of ammonia.
<b>Decomposition temperature</b>	not determined				
<b>Viscosity</b>	not determined				
<b>Solvent content</b>	0 %				
<b>Vapourisation rate</b> Water: 0.36 (ASTM D3539).					

**Oxidising properties**  
no

**Explosive properties**  
no

**9.2. Other information**  
No further relevant informations available.

## SECTION 10: Stability and reactivity

**10.1. Reactivity**  
Evolution of heat under influence of acids.  
No further hazardous reactions known if used as directed.

**10.2. Chemical stability**  
No decomposition if used as directed.

**10.3. Possibility of hazardous reactions**  
Reactions with strong acids and alkalies.  
Evolution of ammonia under influence of alkalies.

**10.4. Conditions to avoid**  
Heat and direct solar radiation.

**10.5. Incompatible materials**  
**Substances to avoid**  
Reactions with strong acids.  
Reactions with alkalies.

**10.6. Hazardous decomposition products**  
Ammonia

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

#### Acute toxicity/Irritation/Sensitization

	Value/Validation	Species	Method	Remark
<b>LD50 acute oral</b>	> 5000 mg/kg		ATE (acute toxicity estimate)	
<b>LD50 acute dermal</b>	> 5000 mg/kg		ATE (acute toxicity estimate)	
<b>LC50 acute inhalation</b>	> 50 mg/l ()		ATE (acute toxicity estimate)	vapours
<b>Skin irritation</b>	irritant			
<b>Eye irritation</b>	irritant			
<b>Skin sensitization</b>	non-sensitizing			

**Specific target organ toxicity (single exposure)**

The mixture is not classified as specific target organ toxicant (single exposure).  
 Inhalation of spray may cause respiratory irritation.

**Specific target organ toxicity (repeated exposure)**

The mixture is not classified as specific target organ toxicant (repeated exposure).

**Aspiration hazard**

The mixture is not classified as aspiration hazardous.

**Toxicity test (Additional information)**

The mixture is not classified as mutagen / not classified as carcinogen / not classified as reproductive toxicant.  
 ammonia : LD50(oral, rat): 350 mg/kg, LC50(inhalation, rat, 1h): 11.59 mg/l .

**! SECTION 12: Ecological information**

**12.1. Toxicity**

**Ecotoxicological effects**

	Value	Species	Method	Validation
<b>Fish</b>	LC50 8,7 mg/l		calculated	After neutralization there is a reduction in the harmfulness: LC50(Fish, calculated, after neutralization): >100mg/l.
<b>Daphnia</b>	EC50 143 mg/l		calculated	
<b>Algae</b>	EC50 308 mg/l		calculated	

**12.2. Persistence and degradability**

<b>Physico-chemical degradability</b>	100 %		Neutralization, pH-measurement	Alkaline properties can be eliminated up to 100% by neutralization.
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**12.3. Bioaccumulative potential**

ammonia: Accumulation in organisms is not expected.  
 tetrapotassium pyrophosphate: Bioaccumulation is improbable.  
 sodium carbonate: No bioaccumulation.

**12.4. Mobility in soil**

ammonia ...%: The ammonium ion will be adsorbed by the soil; very soluble in water.  
 tetrapotassium pyrophosphate: moderately mobile in soil (Koc: ~150).  
 sodium carbonate: not available.

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

The product does not contain any PBT-/vPvB-substances according to the recipe.

**12.6. Other adverse effects**

No further relevant informations available.

**Additional ecological information**

	Value	Method	Remark
<b>COD</b>	ca. 153 mgO2/g	calculated	
<b>AOX</b>	The product does not contain any organically bound halogens according to the recipe.		

**General regulation**

Acute aquatic environmental hazards: Aquatic Acute 2 H401: Toxic to aquatic life. After neutralization: not classified as acute hazardous to the aquatic environment.  
 The mixture is not classified as chronic hazardous to the aquatic environment.



Do not allow uncontrolled leakage of product into the environment.

**SECTION 13: Disposal considerations**

**13.1. Waste treatment methods**

**Waste code No.**

20 01 30

**Name of waste**

detergents other than those mentioned in 20 01 29

**Recommendations for the product**

Do not dispose with household waste.

Suitable for neutralization are acetic acid (60%, liquid) or citric acid (solid powder, crystallized) if a stainless steel bath is used.

Product is allowed to discharge into sewage treatment plants, but in accordance with official regulations.

**Recommendations for packaging**

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

**Recommended cleansing agent**

Water

**SECTION 14: Transport information**

	ADR/RID	IMDG	IATA-DGR
14.1. UN number	-	-	-
14.2. UN proper shipping name	-	-	-
14.3. Transport hazard class(es)	-	-	-
14.4. Packing group	-	-	-
14.5. Environmental hazards	-	-	-

**14.6. Special precautions for user**

no

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

not relevant

**Land and inland navigation transport ADR/RID**

No dangerous goods as defined by these transport regulations.

**Marine transport IMDG**

No hazardous material as defined by the prescriptions.

**Air transport ICAO/IATA-DGR**

No hazardous material as defined by the prescriptions.

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

not relevant

**Application restrictions**

Regulation (EC) No 1907/2006 (REACH), Annex XVII No 3 - not relevant if used as directed.

**Other regulations (EU)**

Regulation (EC) No 648/2004 (Detergents regulation).

Directive 2012/18/EU, Annex I: not mentioned.

**VOC standard****VOC content** 0 %**15.2. Chemical Safety Assessment**

For this mixture a chemical safety assessment were not carried out.

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**! SECTION 16: Other information****Recommended uses and restrictions**

National and local regulations concerning chemicals shall be observed.

**Further information**

These data are given according to our actual knowledge about this product. This data sheet does not correspond to an assurance by virtue of a contract for properties of the product.

Indication of changes: "!" = Data changed compared with the previous version. Previous version: 1.2

**! Sources of key data used**European Chemicals Agency, <http://echa.europa.eu/>.

Informations from our suppliers.

H290	May be corrosive to metals.
H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.
H319	Causes serious eye irritation.
H332	Harmful if inhaled.
H335	May cause respiratory irritation.
H400	Very toxic to aquatic life.
H411	Toxic to aquatic life with long lasting effects.