

SAFETY DATA SHEET according to Regulation (EC) No. 1907/2006

AMMONIA 24,5%

Version 3.0

Print Date 08.02.2025

Revision date / valid from 10.03.2023

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

1.1. Product identifier

Trade name : AMMONIA 24,5%
Substance name : ammonia
Index-No. : 007-001-01-2
CAS-No. : 1336-21-6
EC-No. : 215-647-6
EU REACH-Reg. No. : 01-2119488876-14-xxxx

UFI : KPGD-71EM-900Y-DJVT
UFI code notified in : Austria, Belgium, Germany, Denmark, Estonia, Spain, France, Croatia, Ireland, Iceland, Lithuania, Luxembourg, Latvia, Malta, Netherlands, Norway, Portugal, Sweden

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

Use of the Substance/Mixture : Identified use: See table in front of appendix for a complete overview of identified uses.

Uses advised against : At this moment we have not identified any uses advised against

Remarks : Before referring to any Exposure Scenario attached to this Safety Data Sheet please check the grade of the product: the Exposure Scenarios presented are not related to all product grade

1.3. Details of the supplier of the safety data sheet

Company : Brenntag N.V.
Nijverheidslaan 38
BE 8540 Deerlijk

Telephone : +32 (0)56 77 6944
Telefax : +32 (0)56 77 5711
E-mail address : info@brenntag.be
Responsible/issuing person : Master Data Administration

Company : Brenntag Nederland B.V.
Donker Duyvisweg 44
NL 3316 BM Dordrecht

Telephone : +31 (0)78 65 44 944
Telefax : +31 (0)78 65 44 919
E-mail address : info@brenntag.nl
Responsible/issuing person : Master Data Administration

AMMONIA 24,5%

person

1.4. Emergency telephone number

Emergency telephone number : Belgium: Antipoison Center - Brussels TEL: +32(0)70 245 245
 Netherland: National Poisoning Information Center - Bilthoven TEL: +31(0) 88 755 8000 (Only for the purpose of informing medical personnel in cases of acute intoxications)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No 1272/2008

REGULATION (EC) No 1272/2008			
Hazard class	Hazard category	Target Organs	Hazard statements
Skin corrosion	Category 1B	---	H314
Serious eye damage	Category 1	---	H318
Specific target organ toxicity - single exposure	Category 3	Respiratory system	H335
Long-term (chronic) aquatic hazard	Category 3	---	H412

For the full text of the H-Statements mentioned in this Section, see Section 16.

Most important adverse effects

Human Health : See section 11 for toxicological information.
 Physical and chemical hazards : See section 9/10 for physicochemical information.
 Potential environmental effects : See section 12 for environmental information.

2.2. Label elements

Labelling according to Regulation (EC) No 1272/2008

Hazard symbols :



Signal word : Danger

Hazard statements : H314 Causes severe skin burns and eye damage.

AMMONIA 24,5%

	H335 H412	May cause respiratory irritation. Harmful to aquatic life with long lasting effects.
Precautionary statements		
Prevention	: P261 P273 P280	Avoid breathing dust/ fume/ gas/ mist/ vapours/ spray. Avoid release to the environment. Wear protective gloves/ protective clothing/ eye protection/ face protection.
Response	: P303 + P361 + P353 P304 + P340 + P310 P305 + P351 + P338 P310	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/ shower. IF INHALED: Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER/doctor. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER/ doctor.

Hazardous components which must be listed on the label:

- ammonia

2.3. Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Ecological information: No information available about endocrine disruption properties for environment. The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Toxicological information: No information available about endocrine disruption properties for human health.: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

SECTION 3: Composition/information on ingredients

3.1. Substances

AMMONIA 24,5%

Chemical nature : Aqueous solution

Hazardous components	Amount [%]	Classification (REGULATION (EC) No 1272/2008)	
		Hazard class / Hazard category	Hazard statements
ammonia			
Index-No. : 007-001-01-2	>= 22 - < 25	Skin Corr.1B	H314
CAS-No. : 1336-21-6		Eye Dam.1	H318
EC-No. : 215-647-6		STOT SE3	H335
EU REACH- : 01-2119488876-14-xxxx		Aquatic Acute1	H400
Reg. No.		Aquatic Chronic2	H411
		<u>M-Factor (Acute aquatic toxicity): 1</u> specific concentration limit STOT SE 3; H335 >= 5 %	
		<u>Note B</u>	

Remarks : The REACH registration number for the anhydrous ammonia (CAS 7664-41-7) covers ammonia in aqueous solutions (CAS 1336-21-6).

For the full text of the H-Statements mentioned in this Section, see Section 16.

For the full text of the Notes mentioned in this Section, see Section 16.

SECTION 4: First aid measures

4.1. Description of first aid measures

- General advice : Take off all contaminated clothing immediately.
- If inhaled : In case of accident by inhalation: remove casualty to fresh air and keep at rest. If breathing is irregular or stopped, administer artificial respiration. Call a physician immediately.
- In case of skin contact : Wash off immediately with plenty of water. Call a physician immediately.
- In case of eye contact : Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes. Consult an eye specialist immediately. Go to an ophthalmic hospital if possible.
- If swallowed : Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Do NOT induce vomiting. Call a physician immediately.

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

- Symptoms : See Section 11 for more detailed information on health effects and symptoms.

AMMONIA 24,5%

Effects : Extremely corrosive and destructive to tissue. If ingested, severe burns of the mouth and throat, as well as a danger of perforation of the oesophagus and the stomach. See Section 11 for more detailed information on health effects and symptoms.

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

Treatment : Treat symptomatically.

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

Suitable extinguishing media : Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. The product itself does not burn.

Unsuitable extinguishing media : High volume water jet

5.2. Special hazards arising from the substance or mixture

Specific hazards during firefighting : Incomplete combustion may form toxic pyrolysis products.

Hazardous combustion products : The formation of caustic fumes is possible. Nitrogen oxides (NO_x)

5.3. Advice for firefighters

Special protective equipment for firefighters : In the event of fire, wear self-contained breathing apparatus. Wear appropriate body protection (full protective suit)

Specific extinguishing methods : Control smoke with water spray.

Further advice : Cool closed containers exposed to fire with water spray. Heating will cause a pressure rise - with risk of bursting. Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

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

Personal precautions : Keep people away from and upwind of spill/leak. Use personal protective equipment. Ensure adequate ventilation. Avoid contact with the skin and the eyes. Do not breathe vapours or spray mist.

6.2. Environmental precautions

Environmental : Do not flush into surface water or sanitary sewer system.

AMMONIA 24,5%

7.3. Specific end use(s)

Specific use(s) : Identified use: See table in front of appendix for a complete overview of identified uses.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Component:	ammonia	CAS-No. 1336-21-6
Derived No Effect Level (DNEL)/Derived Minimal Effect Level (DMEL)		

DNEL	Workers, Acute - local effects, Inhalation	: 36 mg/m ³
DNEL	Workers, Long-term - local effects, Inhalation	: 14 mg/m ³
DNEL	Workers, Acute - systemic effects, Inhalation	: 47,6 mg/m ³
DNEL	Workers, Long-term - systemic effects, Inhalation	: 47,6 mg/m ³
DNEL	Workers, Acute - systemic effects, Skin contact	: 6,8 mg/kg bw/day
DNEL	Workers, Long-term - systemic effects, Skin contact	: 6,8 mg/kg bw/day
DNEL	Consumers, Acute - local effects, Inhalation	: 7,2 mg/m ³
DNEL	Consumers, Long-term - local effects, Inhalation	: 2,8 mg/m ³
DNEL	Consumers, Acute - systemic effects, Inhalation	: 23,8 mg/m ³
DNEL	Consumers, Long-term - systemic effects, Inhalation	: 23,8 mg/m ³
DNEL	Consumers, Acute - systemic effects, Skin contact	: 68 mg/kg bw/day
DNEL	Consumers, Long-term - systemic effects, Skin contact	: 68 mg/kg bw/day

AMMONIA 24,5%

DNEL
Consumers, Acute - systemic effects, Ingestion : 6,8 mg/kg bw/day

DNEL
Consumers, Long-term - systemic effects, Ingestion : 6,8 mg/kg bw/day

Predicted No Effect Concentration (PNEC)

Fresh water : 0,0011 mg/l

Marine water : 0,0011 mg/l

Intermittent releases : 0,0068 mg/l

Other Occupational Exposure Limit Values

EU. Indicative Occupational Exposure Limit Values in Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, 2017/164/EU, as amended, Short Term Exposure Limit (STEL):
50 ppm, 36 mg/m³
Indicative

EU. Indicative Occupational Exposure Limit Values in Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, 2017/164/EU, as amended, Time Weighted Average (TWA):
20 ppm, 14 mg/m³
Indicative

Netherlands. OELs (binding), as amended, Time Weighted Average (TWA):
14 mg/m³

Netherlands. OELs (binding), as amended, Short Term Exposure Limit (STEL):
36 mg/m³, (15 minutes)

EU. Indicative Occupational Exposure Limit Values in Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, 2017/164/EU, as amended, Short Term Exposure Limit (STEL):
50 ppm, 36 mg/m³
Indicative

EU. Indicative Occupational Exposure Limit Values in Directives 91/322/EEC, 2000/39/EC, 2006/15/EC, 2009/161/EU, 2017/164/EU, as amended, Time Weighted Average (TWA):
20 ppm, 14 mg/m³
Indicative

8.2. Exposure controls

Appropriate engineering controls

Refer to protective measures listed in sections 7 and 8.

Personal protective equipment

Respiratory protection

AMMONIA 24,5%

Advice : In case of brief exposure or low pollution use breathing filter apparatus.
Recommended Filter type:K
In case of intensive or longer exposure use self-contained breathing apparatus.
Respiratory protection complying with EN 141.

Hand protection

Advice : Protective gloves complying with EN 374.
Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves.
Also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion, and the contact time.
Protective gloves should be replaced at first signs of wear.

Material : butyl-rubber
Break through time : ≥ 8 h
Glove thickness : 0,5 mm

Material : Fluorinated rubber
Break through time : ≥ 8 h
Glove thickness : 0,4 mm

Eye protection

Advice : Safety glasses with side-shields conforming to EN166

Skin and body protection

Advice : alkali resistant protective clothing
Chemical resistant apron
Protective clothing against the effects of liquid chemicals (EN 13034).
Protective footwear according to ISO 20345.

Environmental exposure controls

General advice : Do not flush into surface water or sanitary sewer system.
Avoid subsoil penetration.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Form : liquid
Physical state : liquid
Colour : colourless, light yellow

AMMONIA 24,5%

Odour	:	ammoniacal
Odour Threshold	:	5 - 25 ppm
Freezing point/range	:	-44 °C 22% solution
Boiling point/boiling range	:	44 °C 22% solution
Flammability (solid, gas)	:	Not applicable
Upper explosion limit / Upper flammability limit	:	27 %(V) Ammonia
Lower explosion limit / Lower flammability limit	:	16 %(V) Ammonia 16 %(V) ammonia gas
Flash point	:	No data available
Auto-ignition temperature	:	651 °C ammonia gas
Decomposition temperature	:	No data available
Self-Accelerating decomposition temperature (SADT)	:	No data available
pH	:	12 - 13 Concentration: 100 %
Viscosity		
Viscosity, dynamic	:	No data available
Viscosity, kinematic	:	No data available
Flow time	:	No data available
Solubility(ies)		
Water solubility	:	completely soluble
Solubility in other solvents	:	No data available
Dissolution Rate	:	No data available
Partition coefficient: n-octanol/water	:	No data available
Dispersion Stability	:	No data available

AMMONIA 24,5%

Vapour pressure	:	358 hPa (20 °C) 22% solution
Relative density	:	No data available
Density	:	0,90 g/cm ³ 25% solution
Bulk density	:	No data available
Relative vapour density	:	No data available
Particle characteristics	:	No data available

9.2 Other information

Explosives	:	Product is not explosive.
Oxidizing properties	:	not oxidising

SECTION 10: Stability and reactivity**10.1. Reactivity**

Advice : No decomposition if used as directed.

10.2. Chemical stability

Advice : Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

Hazardous reactions : Corrodes copper and its alloys. Exothermic reaction with strong acids.

10.4. Conditions to avoid

Conditions to avoid : Heat

10.5. Incompatible materials

Materials to avoid : Bases, Acids, Aluminium, Zinc, Copper, Strong oxidizing agents, hypochlorites

10.6. Hazardous decomposition products

Hazardous decomposition products : ammonia

SECTION 11: Toxicological information**11.1. Information on the hazard classes within the meaning of Regulation (EC) No. 1272/2008**

AMMONIA 24,5%

Data for the product

Acute toxicity

Oral

No data available

Inhalation

No data available

Dermal

Study scientifically not justified.

Irritation

Skin

Result : Classified based on the calculation method according to CLP regulation.

Eyes

Result : Classified based on the calculation method according to CLP regulation.

Sensitisation

Result : Not classified based on the calculation method according to CLP regulation.

CMR effects

CMR Properties

Carcinogenicity : Not classified based on the calculation method according to CLP regulation.

Mutagenicity : Not classified based on the calculation method according to CLP regulation.

Teratogenicity : Not classified based on the calculation method according to CLP regulation.

Reproductive toxicity : Not classified based on the calculation method according to CLP regulation.

Specific Target Organ Toxicity

Single exposure

Inhalation : May cause respiratory irritation.

Repeated exposure

Remarks : Not classified based on the calculation method according to CLP regulation.

Other toxic properties

AMMONIA 24,5%**Repeated dose toxicity**

No data available

Aspiration hazard

Not applicable,

Component:**ammonia****CAS-No. 1336-21-6****Acute toxicity****Oral**

Study scientifically not justified.

Inhalation

No data available

Dermal

Study scientifically not justified.

Irritation**Skin**

Result : corrosive effects (Rabbit) (OECD Test Guideline 404)

Eyes

Result : Causes serious eye damage. (Rabbit)

Sensitisation

Result : not sensitizing

CMR effects**Carcinogenicity**

(negative, Rat, Test substance: Ammonium sulphate)(Oral; 67 mg/kg bw/day; 104 weeks)(OECD Test Guideline 453)Information given is based on data obtained from similar substances.

CMR Properties

AMMONIA 24,5%

Carcinogenicity	:	Animal testing did not show any carcinogenic effects.
Mutagenicity	:	Animal testing did not show any mutagenic effects. In vitro tests did not show mutagenic effects In vivo tests did not show mutagenic effects
Teratogenicity	:	Did not show teratogenic effects in animal experiments.
Reproductive toxicity	:	Animal testing did not show any effects on fertility.

Genotoxicity in vitro

Result	:	negative (Ames test; Test substance: ammonia) (OECD Test Guideline 471)
--------	---	---

Genotoxicity in vivo

Result	:	negative (In vivo micronucleus test; Mouse) (Test substance: ammonium chloride) (OECD Test Guideline 474)
--------	---	---

Teratogenicity

(Rabbit)(Oral)Did not show teratogenic effects in animal experiments.Information given is based on data obtained from similar substances.

Reproductive toxicity

NOAEL Fertility	:	408 mg/kg bw/day (Rat)(Oral)(OECD Test Guideline 422)Animal testing did not show any effects on fertility.Information given is based on data obtained from similar substances.
--------------------	---	---

Specific Target Organ Toxicity

Single exposure

Inhalation	:	Target Organs: Respiratory systemMay cause respiratory irritation.
------------	---	--

Repeated exposure

Remarks	:	The substance or mixture is not classified as specific target organ toxicant, repeated exposure.
---------	---	--

Other toxic properties

Repeated dose toxicity

NOAEL	:	0,035 mg/l
-------	---	------------

AMMONIA 24,5%

(Rat, male; Test substance: ammonia)(Inhalation; 50 d)

Aspiration hazard

Not applicable,

11.2. Information on other hazards

Data for the product

Endocrine disrupting properties

Assessment	:	No information available about endocrine disruption properties for human health.
Assessment	:	The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

SECTION 12: Ecological information

12.1. Toxicity

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Acute toxicity

Fish

LC50 : 0,89 mg/l (Oncorhynchus mykiss (rainbow trout); 96 h)

Toxicity to daphnia and other aquatic invertebrates

LC50 : 101 mg/l (Daphnia magna (Water flea); 48 h) (ASTM E 729-80)

algae

EC50 : 2700 mg/l (Chlorella vulgaris (Fresh water algae); 18 d; Test substance: Ammonium sulphate) (static test)

Bacteria

: Study scientifically unjustified.

AMMONIA 24,5%

Chronic toxicity

Fish

LOEC : 0,022 mg/l (Oncorhynchus mykiss (rainbow trout); 73 d; Test substance: ammonium chloride) (flow-through test)

Aquatic invertebrates

NOEC : 0,79 mg/l (Daphnia magna (Water flea); 96 h; Test substance: ammonium chloride) (OPPTS 850.1300)

M-Factor

M-Factor (Acute Aquat. Tox.) : 1

12.2. Persistence and degradability

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Persistence and degradability

Persistence

Result : No data available

Biodegradability

Result : Readily biodegradable. Can be oxidized by microorganisms to nitrate but can be also reduced to nitrogen.

12.3. Bioaccumulative potential

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Bioaccumulation

Result : Bioaccumulation is not expected.

12.4. Mobility in soil

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Mobility

AMMONIA 24,5%

- Water : The product is mobile in water environment.
 Soil : Adsorbs on soil.

12.5. Results of PBT and vPvB assessment

Data for the product

Results of PBT and vPvB assessment

- Result : This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Results of PBT and vPvB assessment

- Result : The PBT or vPvB criteria of Annex XIII to the REACH Regulation does not apply to inorganic substances.

12.6. Endocrine disrupting properties

Data for the product

- Endocrine disrupting potential : No information available about endocrine disruption properties for environment.
- Endocrine disrupting potential : The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

12.7. Other adverse effects

Data for the product

Additional ecological information

- Result : Do not flush into surface water or sanitary sewer system.
 Avoid subsoil penetration.
 Harmful effects to aquatic organisms due to pH-shift.

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

Additional ecological information

- Result : Harmful effects to aquatic organisms due to pH-shift.
 Do not flush into surface water or sanitary sewer system.
 Avoid subsoil penetration.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

AMMONIA 24,5%

Product	:	Disposal together with normal waste is not allowed. Special disposal required according to local regulations. Do not let product enter drains. Contact waste disposal services. This product shall be disposed of or recovered in compliance with Directive 2008/98/EC on waste as lastly amended.
Contaminated packaging	:	Empty contaminated packagings thoroughly. They can be recycled after thorough and proper cleaning. If recycling is not practicable, dispose of in compliance with local regulations.
European Waste Catalogue Number	:	No waste code according to the European Waste Catalogue can be assigned for this product, as the intended use dictates the assignment. The waste code is established in consultation with the regional waste disposer.

SECTION 14: Transport information

14.1. UN number or ID number

2672

14.2. UN proper shipping name

ADR : AMMONIA SOLUTION
 RID : AMMONIA SOLUTION
 IMDG : AMMONIA SOLUTION

14.3. Transport hazard class(es)

ADR-Class : 8
 (Labels; Classification Code; Hazard Identification Number; Tunnel restriction code) 8; C5; 80; (E)
 RID-Class : 8
 (Labels; Classification Code; Hazard Identification Number) 8; C5; 80
 IMDG-Class : 8
 (Labels; EmS) 8; F-A, S-B

14.4. Packaging group

ADR : III
 RID : III
 IMDG : III

14.5. Environmental hazards

Environmentally hazardous according to ADR : no
 Environmentally hazardous according to RID : no
 Marine Pollutant according to IMDG-Code : yes

AMMONIA 24,5%

14.6. Special precautions for user

Not applicable.

14.7 Maritime transport in bulk according to IMO instruments

Not applicable for product as supplied.

SECTION 15: Regulatory information

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

Data for the product

EU. REACH, Annex XVII, : Point Nos.: , 3; Listed
Marketing and Use
Restrictions (Regulation
1907/2006/EC)

EU. Directive : ; The substance/mixture does not fall under this legislation.
2012/18/EU (SEVESO
III) on major accident
hazards involving
dangerous substances,
Annex I

Component:	ammonia	CAS-No. 1336-21-6
-------------------	----------------	--------------------------

EU. Chemicals Subject : ; The substance/mixture does not fall under this legislation.
to PIC Procedure:
Regulation 649/2012/EU
on export and import of
dangerous chemicals, as
amended

EU. REACH, Annex XVII, : Point Nos.: , 3; Listed
Marketing and Use
Restrictions (Regulation
1907/2006/EC)

Point Nos.: , 75; Listed

EU. Regulation No. : Maximum concentration in ready for use preparation: 6 %; See
1223/2009 on cosmetic the text of the regulation for applicable exceptions or
products, Annex III: List provisions.
of Restricted Substances
in Cosmetic Products

AMMONIA 24,5%

EU. Directive 2012/18/EU (SEVESO III) on major accident hazards involving dangerous substances, Annex I : Qualifying quantity for the application of Lower-tier requirements: 100 tonnes; Part 1: Categories of dangerous substances; Hazardous to the Aquatic Environment in Category Acute 1 or Chronic 1

Qualifying quantity for the application of Upper-tier requirements: 200 tonnes; Part 1: Categories of dangerous substances; Hazardous to the Aquatic Environment in Category Acute 1 or Chronic 1

Notification status ammonia:

Regulatory List	Notification	Notification number
AICS	YES	
DSL	YES	
EINECS	YES	215-647-6
ENCS (JP)	YES	(1)-314
IECSC	YES	
INSQ	YES	
ISHL (JP)	YES	(1)-314
KECI (KR)	YES	KE-01688
KECI (KR)	YES	97-1-184
NZIOC	YES	HSR001516
NZIOC	YES	HSR001517
NZIOC	YES	HSR001526
NZIOC	YES	HSR001563
ONT INV	YES	
PHARM (JP)	YES	
PICCS (PH)	YES	
TCSI	YES	
TH INV	YES	2814.20
TH INV	YES	55-1-01485
TSCA	YES	
VN INVL	YES	

15.2. Chemical safety assessment

No data available

SECTION 16: Other information



Full text of H-Statements referred to under sections 2 and 3.

H314	Causes severe skin burns and eye damage.
H318	Causes serious eye damage.
H335	May cause respiratory irritation.
H400	Very toxic to aquatic life.

AMMONIA 24,5%

H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

Full text of the Notes referred to under section 3.

Note B	Some substances (acids, bases, etc.) are placed on the market in aqueous solutions at various concentrations and, therefore, these solutions require different classification and labelling since the hazards vary at different concentrations. In Part 3 entries with Note B have a general designation of the following type: "nitric acid ...%". In this case the supplier must state the percentage concentration of the solution on the label. Unless otherwise stated, it is assumed that the percentage concentration is calculated on a weight/weight basis.
--------	--

Abbreviations and Acronyms

AU AIICL	Australia. Industrial Chemicals Act (AIIC) List
BCF	bioconcentration factor
BOD	biochemical oxygen demand
CAS	Chemical Abstracts Service
CLP	Classification, Labelling and Packaging
CMR	carcinogenic, mutagenic or toxic to reproduction
COD	chemical oxygen demand
DNEL	derived no-effect level
DSL	Canada. Environmental Protection Act, Domestic Substances List
EINECS	European Inventory of Existing Commercial Chemical Substances
ELINCS	European List of Notified Chemical Substances
ENCS (JP)	Japan. Kashin-Hou Law List
GHS	Globally Harmonized System of Classification and Labelling of Chemicals
IECSC	China. Inventory of Existing Chemical Substances
INSQ	Mexico. National Inventory of Chemical Substances
ISHL (JP)	Japan. Inventory of Industrial Safety & Health
KECI (KR)	Korea. Existing Chemicals Inventory
LC50	median lethal concentration
LOAEC	lowest observed adverse effect concentration
LOAEL	lowest observed adverse effect level
LOEL	lowest observed effect level
NDSL	Canada. Environmental Protection Act. Non-Domestic Substances List
NLP	no-longer polymer
NOAEC	no observed adverse effect concentration
NOAEL	no observed adverse effect level
NOEC	no observed effect concentration
NOEL	no observed effect level

AMMONIA 24,5%

NZIOC	New Zealand. Inventory of Chemicals
OECD	Organisation for Economic Cooperation and Development
OEL	occupational exposure limit
ONT INV	Canada. Ontario Inventory List
PBT	persistent, bioaccumulative and toxic
PHARM (JP)	Japan. Pharmacopoeia Listing
PICCS (PH)	Philippines. Inventory of Chemicals and Chemical Substances
PNEC	predicted no-effect concentration
REACH Auth. No.:	REACH Authorisation Number
REACH AuthAppC. No.	REACH Authorisation Application Consultation Number
UK REACH Auth. No.:	UK REACH Authorisation Number
UK REACH AuthAppC. No.	UK REACH Authorisation Application Consultation Number
UK REACH-Reg.No	UK REACH Registration Number
STOT	specific target organ toxicity
SVHC	substance of very high concern
TCSI	Taiwan. Existing Chemicals Inventory
TH INV	Thailand. Existing Chemicals Inventory from FDA
TSCA	US. Toxic Substances Control Act

Further information

- Key literature references and sources for data : Supplier information and data from the "Database of registered substances" of the European Chemicals Agency (ECHA) were used to create this safety data sheet.
- Methods used for product classification : The classification for human health, physical and chemical hazards and environmental hazards were derived from a combination of calculation methods and if available test data.
- Hints for trainings : The workers have to be trained regularly on the safe handling of the products based on the information provided in the Safety Data Sheet and the local conditions of the workplace. National regulations for the training of workers in the handling of hazardous materials must be adhered to.
- Other information : The information provided in this Safety Data Sheet is correct to our knowledge at the date of its revision. The information given only describes the products with regard to safety arrangements and is not to be considered as a warranty or quality specification and does not constitute a legal relationship.
- The information contained in this Safety Data Sheet relates only to the specific material designated and may not be valid for such material used in combination with any other material or in any process, unless specified in the text.

|| Indicates updated section.

AMMONIA 24,5%