

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Sample cuvette; 1/4

Print date : 22.02.2006

Product code : LCK301-1

Page 1 of 5

1. Identification of the substance/preparation and of the company/undertaking

1.1 Identification of the substance or preparation

LCK 301 Aluminium, Sample cuvette; 1/4

Use of the substance/preparation

Water analysis

1.2 Company/undertaking identification

Company name HACH LANGE GmbH
Street Willstätterstr. 11
Place D-40549 Düsseldorf

e-mail info@hach-lange.de
Inquiry office

Telephone +49(0)2115288 0
Telefax +49(0)2115288143

HACH LANGE Ltd.
Pacific Way
Salford Manchester M50 1DL - England
Tel. +44 (0) 161 872 1487
e-Mail: info@hach-lange.co.uk

2. Composition/information on ingredients

Chemical characterization (preparation)

Hazardous components

EC-No.	CAS-No.	Chemical name	Quantity	Classification
200-711-8	69-65-8	D(-)-Mannitol	>97 %	
216-787-0	1667-99-8	Chromazurol S	<1 %	

Full text of each relevant R phrase can be found in heading 16.

3. Hazards identification

Classification

The product does not need to be labelled in accordance with EC directives or respective national laws.

4. First aid measures

General information

Take off all contaminated clothing immediately.

After inhalation

Move to fresh air.

After contact with skin

Wash off immediately with plenty of water.

After contact with eyes

Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician.

After ingestion

Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person.

Advice to doctor

Treat symptomatically.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Sample cuvette; 1/4

Print date : 22.02.2006

Product code : LCK301-1

Page 2 of 5

5. Fire-fighting measures

Suitable extinguishing media

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

Special exposure hazards arriving from substance or preparation itself, combustion products, resulting gases

Fire may liberate hazardous vapours.

Special protective equipment for fire-fighters

In the event of fire, wear self-contained breathing apparatus. Use personal protective equipment.

Additional information

Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

6. Accidental release measures

Personal precautions

Use personal protective equipment.

Environmental precautions

Do not flush into surface water or sanitary sewer system.

Methods for cleaning up/taking up

Sweep up or vacuum up spillage and collect in suitable container for disposal.

7. Handling and storage

7.1 Handling

Advice on safe handling

Use only in well-ventilated areas.

7.2 Storage

Requirements for storage rooms and vessels

Keep in a dry, cool place.

8. Exposure controls/personal protection

8.1 Exposure limit values

8.2 Exposure controls

Protective and hygiene measures

The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Hand protection

Use barrier skin cream.

Wash hands before breaks and after work.

Chemical resistant protective gloves

The protective gloves to be used must comply with the specifications of EC directive 89/686/EEC and the resultant standard EN374.

Eye protection

safety glasses with side-shields

Skin protection

Remove and wash contaminated clothing before re-use.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Sample cuvette; 1/4

Print date : 22.02.2006

Product code : LCK301-1

Page 3 of 5

9. Physical and chemical properties

9.1 General information

Physical state	solid
Colour	violet
Odour	aromatic

9.2 Important health, safety and environmental information

Test method

Changes in the physical state

Melting point	165 °C
Flash point	not applicable
Lower explosion limits	not applicable
Upper explosion limits	not applicable
Water solubility : at (20 °C)	completely soluble

10. Stability and reactivity

Conditions to avoid

No dangerous reaction known under conditions of normal use.

Materials to avoid

No dangerous reaction known under conditions of normal use.

Hazardous decomposition products

No decomposition if stored and applied as directed.

11. Toxicological information

Acute toxicity

No data is available on the product itself.

Specific effects in experiment on an animal

No data is available on the product itself.

12. Ecological information

Ecotoxicity

No data is available on the product itself.
Do not flush into surface water or sanitary sewer system.

13. Disposal considerations

Advice on disposal

In accordance with local and national regulations. Our local agencies will accept used cuvettes to ensure their proper disposal.

Waste disposal number of waste from residues/unused products

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Waste disposal number of used product

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Sample cuvette; 1/4

Print date : 22.02.2006

Product code : LCK301-1

Page 4 of 5

Waste disposal number of contaminated packaging

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

14. Transport information

Land transport (ADR/RID)

ADR/RID class	3
Warning plate	
UN number	1987
ADR/RID packing group	III

Description of the goods

Alcohols, n.o.s. (Methanol-Lösung)

Inland waterways transport

Remarks (inland waterways transport)

not tested

Marine transport

IMDG code	3
UN number	1987
EmS	F-E,S-D
IMDG packing group	III

Description of the goods

Alcohols, n.o.s. (Methanol solution)

Air transport

ICAO/IATA-DGR	3
UN/ID number	1987
ICAO packing group	III

Description of the goods

Alcohols, n.o.s. (Methanol solution)

Further Information

This product forms part of a kit. Information in this section relates to the kit as a whole.

15. Regulatory information

15.1 Labelling

Labelling according to EC-guidelines	Classification according to European directive on classification of hazardous preparations 1999/45/EC.
--------------------------------------	--

Additional information on EC regulations

The product does not need to be labelled in accordance with EC directives or respective national laws.

15.2 National regulations

Water contaminating class	2 - water contaminating
---------------------------	-------------------------

16. Other information

Other data

The information is based on present level of our knowledge. It does not, however, give assurances of product properties and establishes no contract legal rights.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Sample cuvette; 1/4

Print date : 22.02.2006

Product code : LCK301-1

Page 5 of 5

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

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 1 of 6

1. Identification of the substance/preparation and of the company/undertaking

1.1 Identification of the substance or preparation

LCK 301 Aluminium, LCK 301 A; 2/4

Use of the substance/preparation

Water analysis

1.2 Company/undertaking identification

Company name HACH LANGE GmbH
Street Willstätterstr. 11
Place D-40549 Düsseldorf

e-mail info@hach-lange.de
Inquiry office

Telephone +49(0)2115288 0
Telefax +49(0)2115288143

HACH LANGE Ltd.
Pacific Way
Salford Manchester M50 1DL - England
Tel. +44 (0) 161 872 1487
e-Mail: info@hach-lange.co.uk

2. Composition/information on ingredients

Chemical characterization (preparation)

Hazardous components

EC-No.	CAS-No.	Chemical name	Quantity	Classification
213-791-2	7732-18-5	Water	>50 %	
211-162-9	631-61-8	Ammonium acetate	20-25 %	
200-659-6	67-56-1	methanol	18 %	F, T R11-23/24/25-39/23/24/25
204-823-8	6131-90-4	Sodium acetate	7-10 %	

Full text of each relevant R phrase can be found in heading 16.

3. Hazards identification

Classification

Symbols : Toxic

R-phrases :

Flammable.

Harmful by inhalation, in contact with skin and if swallowed.

Toxic: danger of very serious irreversible effects through inhalation, in contact with skin and if swallowed.

4. First aid measures

General information

Take off contaminated clothing and shoes immediately.

Show this safety data sheet to the doctor in attendance.

After inhalation

Move to fresh air.

If symptoms persist, call a physician.

After contact with skin

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 2 of 6

Wash off immediately with plenty of water for at least 15 minutes.
If skin irritation persists, call a physician.

After contact with eyes

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

After ingestion

Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Obtain medical attention.

Advice to doctor

Treat symptomatically.

5. Fire-fighting measures

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Special exposure hazards arising from substance or preparation itself, combustion products, resulting gases

Fire may liberate hazardous vapours.

Special protective equipment for fire-fighters

In order to avoid contact with skin, keep a safety distance and wear suitable protective clothing.
In the event of fire, wear self-contained breathing apparatus.

Additional information

Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

6. Accidental release measures

Personal precautions

Use personal protective equipment.

Environmental precautions

Do not flush into surface water or sanitary sewer system.

Methods for cleaning up/taking up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust).
Keep in suitable, closed containers for disposal.

7. Handling and storage

7.1 Handling

Advice on safe handling

Use only in well-ventilated areas.
Avoid contact with skin and eyes.
Keep container tightly closed.

7.2 Storage

Requirements for storage rooms and vessels

Keep container tightly closed in a dry and well-ventilated place.
Keep away from heat and sources of ignition.

Advice on storage compatibility

Do not store near combustible materials.

Further information on storage conditions

Keep locked up or in an area accessible only to qualified or authorised persons.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 3 of 6

8. Exposure controls/personal protection

8.1 Exposure limit values

Exposure limits (EH40)

CAS No.	Substance	ml/m ³	mg/m ³	F/ml	Category	Origin
67-56-1	Methanol	200	266		TWA (8 h)	WEL
		250	333		STEL (15 min)	WEL

BAT values (TRGS 903)

CAS No.	Substance	Value	Parameter	Test material	Sampling time
67-56-1	Methanol	30 mg/l	Methanol	U	c,b

8.2 Exposure controls

Occupational exposure controls

The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Protective and hygiene measures

Wash hands before breaks and at the end of workday.

Respiratory protection

Provide adequate ventilation. Where reasonably practicable this should be achieved by the use of local exhaust ventilation and good general extraction.

Hand protection

Use barrier skin cream.

The selected protective gloves have to satisfy the specifications of EU Directive 89/689/EEC and the standard EN 374 derived from it.

Eye protection

safety glasses with side-shields

Skin protection

Avoid contact with skin, eyes and clothing.

9. Physical and chemical properties

9.1 General information

Physical state	liquid
Colour	colourless
Odour	sweet

9.2 Important health, safety and environmental information

Test method

Changes in the physical state

Boiling point	65 °C
Flash point	30 °C
Vapour pressure :	128 hPa
at (20 °C)	
Density (at 20 °C) :	1,28 g/cm ³
Water solubility :	soluble
at (20 °C)	

10. Stability and reactivity

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 4 of 6

Conditions to avoid

Heat, flames and sparks.

Additional information

Stable under recommended storage conditions.

11. Toxicological information

Acute toxicity

Methanol: LD50/oral/rat = 5628 mg/Kg

Corrosive and irritant effects

Irritating to eyes, respiratory system and skin.

Ingestion may provoke the following symptoms: nausea, vomiting, impairment of vision.

May cause headache and dizziness.

12. Ecological information

Ecotoxicity

No data is available on the product itself.

13. Disposal considerations

Waste disposal number of waste from residues/unused products

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Waste disposal number of used product

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Waste disposal number of contaminated packaging

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Contaminated packaging

In accordance with local and national regulations. Our local agencies will accept used cuvettes to ensure their proper disposal.

14. Transport information

Land transport (ADR/RID)

ADR/RID class	9
Warning plate	
UN number	3316
ADR/RID packing group	II

Description of the goods

Chemical kit

Inland waterways transport

Remarks (inland waterways transport)

not tested

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 5 of 6

Marine transport

IMDG code	9
UN number	3316
Marine pollutant	--
EmS	F-A,S-P
IMDG packing group	II

Description of the goods

Chemical kit

Air transport

ICAO/IATA-DGR	9
UN/ID number	3316
ICAO packing group	II

Description of the goods

Chemical kit

Futher Information

This product forms part of a kit. Information in this section relates to the kit as a whole.

15. Regulatory information

15.1 Labelling

Indication of danger T - Toxic



T - Toxic

Labelling according to EC-guidelines

Classification according to European directive on classification of hazardous preparations 1999/45/EC.

R phrases

10	Flammable.
20/21/22	Harmful by inhalation, in contact with skin and if swallowed.
39/23/24/25	Toxic: danger of very serious irreversible effects through inhalation, in contact with skin and if swallowed.

S phrases

07	Keep container tightly closed.
16	Keep away from sources of ignition - No smoking.
45	In case of accident or if you feel unwell, seek medical advice immediately (show the label where possible).
36/37	Wear suitable protective clothing and gloves.

15.2 National regulations

Employment restrictions

Observe employment restrictions for young people.; Observe employment restrictions for child bearing mothers and nursing.

Water contaminating class

1 - slightly water contaminating

16. Other information

List of relevant R phrases

10	Flammable.
11	Highly flammable.
20/21/22	Harmful by inhalation, in contact with skin and if swallowed.
23/24/25	Toxic by inhalation, in contact with skin and if swallowed.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 A; 2/4

Print date : 22.02.2006

Product code : LCK301-2

Page 6 of 6

39/23/24/25 Toxic: danger of very serious irreversible effects through inhalation, in contact with skin and if swallowed.

Other data

The information is based on present level of our knowledge. It does not, however, give assurances of product properties and establishes no contract legal rights.

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

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 B; 3/4

Print date : 22.02.2006

Product code : LCK301-3

Page 1 of 5

1. Identification of the substance/preparation and of the company/undertaking

1.1 Identification of the substance or preparation

LCK 301 Aluminium, LCK 301 B; 3/4

Use of the substance/preparation

Water analysis

1.2 Company/undertaking identification

Company name HACH LANGE GmbH
Street Willstätterstr. 11
Place D-40549 Düsseldorf

e-mail info@hach-lange.de
Inquiry office

Telephone +49(0)2115288 0
Telefax +49(0)2115288143

HACH LANGE Ltd.
Pacific Way
Salford Manchester M50 1DL - England
Tel. +44 (0) 161 872 1487
e-Mail: info@hach-lange.co.uk

2. Composition/information on ingredients

Chemical characterization (preparation)

Hazardous components

EC-No.	CAS-No.	Chemical name	Quantity	Classification
200-066-2	50-81-7	Ascorbic acid	<60 %	

Full text of each relevant R phrase can be found in heading 16.

3. Hazards identification

Classification

Classification according to European directive on classification of hazardous preparations 1999/45/EC.

The product does not need to be labelled in accordance with EC directives or respective national laws.

4. First aid measures

General information

Take off contaminated clothing and shoes immediately.
Show this safety data sheet to the doctor in attendance.

After inhalation

Move to fresh air.
If symptoms persist, call a physician.

After contact with skin

Wash off immediately with plenty of water for at least 15 minutes.
If skin irritation persists, call a physician.

After contact with eyes

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

After ingestion

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 B; 3/4

Print date : 22.02.2006

Product code : LCK301-3

Page 2 of 5

Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Obtain medical attention.

Advice to doctor

Treat symptomatically.

5. Fire-fighting measures

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Special exposure hazards arising from substance or preparation itself, combustion products, resulting gases

Fire may liberate hazardous vapours.

Special protective equipment for fire-fighters

In order to avoid contact with skin, keep a safety distance and wear suitable protective clothing. In the event of fire, wear self-contained breathing apparatus.

Additional information

Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

6. Accidental release measures

Personal precautions

Use personal protective equipment.

Environmental precautions

Do not flush into surface water or sanitary sewer system.

Methods for cleaning up/taking up

Use mechanical handling equipment. Keep in suitable, closed containers for disposal.

7. Handling and storage

7.1 Handling

Advice on safe handling

Avoid contact with skin and eyes.

7.2 Storage

Requirements for storage rooms and vessels

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

Further information on storage conditions

Keep locked up or in an area accessible only to qualified or authorised persons.

8. Exposure controls/personal protection

8.1 Exposure limit values

8.2 Exposure controls

Occupational exposure controls

The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Protective and hygiene measures

Wash hands before breaks and at the end of workday.

Respiratory protection

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 B; 3/4

Print date : 22.02.2006

Product code : LCK301-3

Page 3 of 5

Provide adequate ventilation. Where reasonably practicable this should be achieved by the use of local exhaust ventilation and good general extraction.

Hand protection

Use barrier skin cream.

The selected protective gloves have to satisfy the specifications of EU Directive 89/689/EEC and the standard EN 374 derived from it.

Eye protection

safety glasses with side-shields

Skin protection

Avoid contact with skin, eyes and clothing.

9. Physical and chemical properties

9.1 General information

Physical state	solid
Colour	colourless
Odour	odourless

9.2 Important health, safety and environmental information

pH-Value (at 20 °C) :	2	Test method
Changes in the physical state		
Water solubility : at (20 °C)	350 g/L	

10. Stability and reactivity

Additional information

Stable under recommended storage conditions.

11. Toxicological information

Acute toxicity

No data is available on the product itself.

12. Ecological information

Ecotoxicity

No data is available on the product itself.

13. Disposal considerations

Waste disposal number of waste from residues/unused products

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Waste disposal number of used product

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 B; 3/4

Print date : 22.02.2006

Product code : LCK301-3

Page 4 of 5

Waste disposal number of contaminated packaging

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Contaminated packaging

In accordance with local and national regulations. Our local agencies will accept used cuvettes to ensure their proper disposal.

14. Transport information

Land transport (ADR/RID)

ADR/RID class	9
Warning plate	
UN number	3316
ADR/RID packing group	II

Description of the goods

Chemical kit

Inland waterways transport

Remarks (inland waterways transport)

not tested

Marine transport

IMDG code	9
UN number	3316
Marine pollutant	--
EmS	F-A,S-P
IMDG packing group	II

Description of the goods

Chemical kit

Air transport

ICAO/IATA-DGR	9
UN/ID number	3316
ICAO packing group	II

Description of the goods

Chemical kit

Futher Information

This product forms part of a kit. Information in this section relates to the kit as a whole.

15. Regulatory information

15.1 Labelling

Labelling according to EC-guidelines

Classification according to European directive on classification of hazardous preparations 1999/45/EC.

The product does not need to be labelled in accordance with EC directives or respective national laws.

15.2 National regulations

Water contaminating class

1 - slightly water contaminating

16. Other information

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, LCK 301 B; 3/4

Print date : 22.02.2006

Product code : LCK301-3

Page 5 of 5

Other data

The information is based on present level of our knowledge. It does not, however, give assurances of product properties and establishes no contract legal rights.

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

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Zero solution; 4/4

Print date : 22.02.2006

Product code : LCK301-4

Page 1 of 5

1. Identification of the substance/preparation and of the company/undertaking

1.1 Identification of the substance or preparation

LCK 301 Aluminium, Zero solution; 4/4

Use of the substance/preparation

Water analysis

1.2 Company/undertaking identification

Company name HACH LANGE GmbH
Street Willstätterstr. 11
Place D-40549 Düsseldorf

e-mail info@hach-lange.de
Inquiry office

Telephone +49(0)2115288 0
Telefax +49(0)2115288143

HACH LANGE Ltd.
Pacific Way
Salford Manchester M50 1DL - England
Tel. +44 (0) 161 872 1487
e-Mail: info@hach-lange.co.uk

2. Composition/information on ingredients

Chemical characterization (preparation)

Hazardous components

EC-No.	CAS-No.	Chemical name	Quantity	Classification
213-791-2	7732-18-5	Water	>99 %	
231-847-6	7758-99-8	Copper(II) sulfate pentahydrate	<0,5 %	Xn, N R22-36/38-50-53
231-639-5	7664-93-9	sulphuric acid ... %	<0,3 %	C R35

Full text of each relevant R phrase can be found in heading 16.

3. Hazards identification

Classification

The product does not need to be labelled in accordance with EC directives or respective national laws.

4. First aid measures

General information

Take off contaminated clothing and shoes immediately.
Show this safety data sheet to the doctor in attendance.

After inhalation

Move to fresh air.
If symptoms persist, call a physician.

After contact with skin

Wash off immediately with plenty of water for at least 15 minutes.
If skin irritation persists, call a physician.

After contact with eyes

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

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Zero solution; 4/4

Print date : 22.02.2006

Product code : LCK301-4

Page 2 of 5

After ingestion

Clean mouth with water and drink afterwards plenty of water. Never give anything by mouth to an unconscious person. Obtain medical attention.

Advice to doctor

Treat symptomatically.

5. Fire-fighting measures

Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

Special exposure hazards arising from substance or preparation itself, combustion products, resulting gases

Fire may liberate hazardous vapours.

Special protective equipment for fire-fighters

In order to avoid contact with skin, keep a safety distance and wear suitable protective clothing. In the event of fire, wear self-contained breathing apparatus.

Additional information

Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

6. Accidental release measures

Personal precautions

Use personal protective equipment.

Environmental precautions

Do not flush into surface water or sanitary sewer system.

Methods for cleaning up/taking up

Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Keep in suitable, closed containers for disposal.

7. Handling and storage

7.1 Handling

Advice on safe handling

Use only in well-ventilated areas. Avoid contact with skin and eyes.

7.2 Storage

Requirements for storage rooms and vessels

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

Advice on storage compatibility

Do not store near combustible materials.

Further information on storage conditions

Keep locked up or in an area accessible only to qualified or authorised persons.

8. Exposure controls/personal protection

8.1 Exposure limit values

8.2 Exposure controls

Occupational exposure controls

The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Zero solution; 4/4

Print date : 22.02.2006

Product code : LCK301-4

Page 3 of 5

Protective and hygiene measures

Wash hands before breaks and at the end of workday.

Respiratory protection

Provide adequate ventilation. Where reasonably practicable this should be achieved by the use of local exhaust ventilation and good general extraction.

Hand protection

Use barrier skin cream.

The selected protective gloves have to satisfy the specifications of EU Directive 89/689/EEC and the standard EN 374 derived from it.

Eye protection

safety glasses with side-shields

Skin protection

Avoid contact with skin, eyes and clothing.

9. Physical and chemical properties

9.1 General information

Physical state	liquid
Colour	colourless
Odour	odourless

9.2 Important health, safety and environmental information

pH-Value (at 20 °C) :	2,5	Test method
Changes in the physical state		
Flash point	not applicable	
Water solubility : at (20 °C)	soluble	

10. Stability and reactivity

Additional information

Stable under recommended storage conditions.

11. Toxicological information

Acute toxicity

No toxicology information is available.

12. Ecological information

Ecotoxicity

No information on ecology is available.

13. Disposal considerations

Waste disposal number of waste from residues/unused products

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Zero solution; 4/4

Print date : 22.02.2006

Product code : LCK301-4

Page 4 of 5

Waste disposal number of used product

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Waste disposal number of contaminated packaging

160506 WASTES NOT OTHERWISE SPECIFIED IN THE LIST; gases in pressure containers and discarded chemicals; laboratory chemicals, consisting of or containing dangerous substances, including mixtures of laboratory chemicals
Classified as hazardous waste.

Contaminated packaging

In accordance with local and national regulations. Our local agencies will accept used cuvettes to ensure their proper disposal.

14. Transport information

Land transport (ADR/RID)

ADR/RID class	9
Warning plate	
UN number	3316
ADR/RID packing group	II

Description of the goods

Chemical kit

Inland waterways transport

Remarks (inland waterways transport)

not tested

Marine transport

IMDG code	9
UN number	3316
Marine pollutant	--
EmS	F-A,S-P
IMDG packing group	II

Description of the goods

Chemical kit

Air transport

ICAO/IATA-DGR	9
UN/ID number	3316
ICAO packing group	II

Description of the goods

Chemical kit

Futher Information

This product forms part of a kit. Information in this section relates to the kit as a whole.

15. Regulatory information

15.1 Labelling

Labelling according to EC-guidelines

Classification according to European directive on classification of hazardous preparations 1999/45/EC.

15.2 National regulations

Water contaminating class

1 - slightly water contaminating

Safety Data Sheet

according to 2001/58/EC

LCK 301 Aluminium, Zero solution; 4/4

Print date : 22.02.2006

Product code : LCK301-4

Page 5 of 5

16. Other information

List of relevant R phrases

- | | |
|-------|---|
| 22 | Harmful if swallowed. |
| 35 | Causes severe burns. |
| 50 | Very toxic to aquatic organisms. |
| 53 | May cause long-term adverse effects in the aquatic environment. |
| 36/38 | Irritating to eyes and skin. |

Other data

The information is based on present level of our knowledge. It does not, however, give assurances of product properties and establishes no contract legal rights.

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