

according to Regulation (EC) No 1907/2006

# Acetate buffer solution pH 3.5 250 g ammonium acetate + 380 ml hydrochloric acid 25 % in water

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

### 1.1. Product identifier

Acetate buffer solution pH 3.5 250 g ammonium acetate + 380 ml hydrochloric acid 25 % in water

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

## Use of the substance/mixture

Laboratory chemicals

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

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

### Uses advised against

Do not use for private purposes (household).

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

Company name: AnalytiChem GmbH Street: Stempelstraße 6 Place: D-47167 Duisburg

Telephone: 0203/5194-0 Telefax: 0203/5194-290

e-mail: info@analytichem.de

Contact person: Abteilung Produktsicherheit Telephone: 0203/5194-107/117

e-mail: produktsicherheit@analytichem.de

Internet: www.analytichem.de
Responsible Department: Abteilung Produktsicherheit

<u>1.4. Emergency telephone</u> For Hazardous Materials [or Dangerous Goods] Incidents Spill, Leak, Fire,

<u>number:</u> Exposure, or Accident Call CHEMTREC Day or Night Within USA and Canada:

1-800-424-9300 Outside USA and Canada: +1 703-741-5970 (collect calls

accepted)

### **Further Information**

This product is a mixture. REACH Registration Number see section 3.

### **SECTION 2: Hazards identification**

## 2.1. Classification of the substance or mixture

### Regulation (EC) No 1272/2008

This mixture is not classified as hazardous in accordance with Regulation (EC) No 1272/2008.

### 2.2. Label elements

### Regulation (EC) No 1272/2008

## Special labelling of certain mixtures

EUH210 Safety data sheet available on request.

### 2.3. Other hazards

No data available

## **SECTION 3: Composition/information on ingredients**

### 3.2. Mixtures

### **Chemical characterization**

Mixtures in aqueous solution

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## **Hazardous components**

	<u>'</u>			
CAS No	Chemical name			
	EC No	Index No	REACH No	
	Classification (Regulation (EC) No	1272/2008)	•	
631-61-8	ammonium acetate			20 - < 25 %
	211-162-9			
7647-01-0	Hydrochloric acid			
	231-595-7	017-002-01-X	01-2119484862-27	
	Skin Corr. 1B, STOT SE 3; H314	H335	-	

Full text of H and EUH statements: see section 16.

## Specific Conc. Limits, M-factors and ATE

CAS No	EC No	Chemical name	Quantity
	Specific Conc.	Limits, M-factors and ATE	
631-61-8	211-162-9	ammonium acetate	20 - < 25 %
	dermal: LD50 = > 26556,42 mg/kg; oral: LD50 = >= 2333,28 mg/kg		
7647-01-0	231-595-7	Hydrochloric acid	5 - < 10 %
	Skin Corr. 1B; I	H314: >= 25 - 100 Skin Irrit. 2; H315: >= 10 - < 25 Eye Irrit. 2; H319: >= 10 - <	
	25 STOT SE	3; H335: >= 10 - 100	

### **Further Information**

This product does not contain substances of very high concern according to Regulation (EC) No 1907/2006 (REACH), Article 57 above the respective regulatory concentration limit of = 0.1 % (w/w).

## **SECTION 4: First aid measures**

# 4.1. Description of first aid measures

## **General information**

No data available

### After inhalation

Provide fresh air.

## After contact with skin

Wash immediately with: Water

Take off immediately all contaminated clothing and wash it before reuse.

### After contact with eyes

Rinse immediately carefully and thoroughly with eye-bath or water.

In case of eye irritation consult an ophthalmologist.

## After ingestion

Rinse mouth immediately and drink plenty of water.

Call a doctor if you feel unwell.

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

No data available

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

No data available

## **SECTION 5: Firefighting measures**

## 5.1. Extinguishing media



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### Suitable extinguishing media

Co-ordinate fire-fighting measures to the fire surroundings.

### Unsuitable extinguishing media

no restriction

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

Non-combustible liquids

### 5.3. Advice for firefighters

In case of fire: Wear self-contained breathing apparatus.

### **Additional information**

Use water spray jet to protect personnel and to cool endangered containers.

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

### For non-emergency personnel

Provide adequate ventilation.

Use personal protection equipment.

Avoid contact with skin, eyes and clothes.

Remove persons to safety.

**Emergency procedures** 

Do not breathe dust/fume/gas/mist/vapours/spray.

### For emergency responders

Precautionary statements For emergency responders: Personal protection equipment: see section 8

### 6.2. Environmental precautions

Do not allow to enter into surface water or drains.

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

### For containment

Cover drains.

Prevent spread over a wide area (e.g. by containment or oil barriers).

Collect in closed and suitable containers for disposal.

Absorb with liquid-binding material (sand, diatomaceous earth, acid- or universal binding agents).

# For cleaning up

Clean contaminated articles and floor according to the environmental legislation.

## Other information

Provide adequate ventilation.

Do not breathe dust/fume/gas/mist/vapours/spray.

Wear breathing apparatus if exposed to vapours/dusts/aerosols.

### 6.4. Reference to other sections

Safe handling: see section 7

Personal protection equipment: see section 8

Disposal: see section 13

## **SECTION 7: Handling and storage**

## 7.1. Precautions for safe handling

## Advice on safe handling

Handle and open container with care.

Keep container tightly closed.

Do not breathe vapour/aerosol.

Avoid contact with skin, eyes and clothes.



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## Advice on protection against fire and explosion

Usual measures for fire prevention.

## Advice on general occupational hygiene

Wash contaminated clothing prior to re-use.

Do not breathe vapour/aerosol.

Avoid contact with skin, eyes and clothes.

### Further information on handling

Wash contaminated clothing before reuse.

Wash hands before breaks and after work.

### 7.2. Conditions for safe storage, including any incompatibilities

## Requirements for storage rooms and vessels

Store in a well-ventilated place. Keep container tightly closed.

## Hints on joint storage

No data available

## Further information on storage conditions

Store in a dry place.

## 7.3. Specific end use(s)

Laboratory chemicals

## **SECTION 8: Exposure controls/personal protection**

## 8.1. Control parameters

## Occupational exposure limits

CAS No	Substance	ppm	mg/m³	fib/cm³	Category	Origin
7647-01-0	Hydrogen chloride	5	8		TWA (8 h)	
		10	15		STEL (15 min)	



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### **DNEL/DMEL values**

CAS No	Substance			
DNEL type		Exposure route	Effect	Value
631-61-8	ammonium acetate			
Worker DNEL	long-term	inhalation	systemic	911,56 mg/m³
Worker DNEL	, acute	inhalation	systemic	5469,35 mg/m³
Worker DNEL	, long-term	dermal	systemic	10,34 mg/kg bw/day
Worker DNEL	, acute	dermal	systemic	62,04 mg/kg bw/day
Consumer DN	EL, long-term	inhalation	systemic	449,56 mg/m³
Consumer DN	EL, acute	inhalation	systemic	2674,16 mg/m³
Consumer DNEL, long-term		dermal	systemic	5,17 mg/kg bw/day
Consumer DN	EL, acute	dermal	systemic	31,02 mg/kg bw/day
Consumer DN	EL, long-term	oral	systemic	5,17 mg/kg bw/day
Consumer DN	EL, acute	oral	systemic	31,02 mg/kg bw/day
7647-01-0	Hydrochloric acid			
Worker DNEL	, long-term	inhalation	local	8 mg/m³
Worker DNEL	, acute	inhalation	local	15 mg/m³
Consumer DN	EL, long-term	inhalation	local	8 mg/m³
Consumer DN	EL, acute	inhalation	local	15 mg/m³

## PNEC values

CAS No	Substance	
Environmen	tal compartment	Value
631-61-8	ammonium acetate	
Freshwater		3,08 mg/l
Marine wate	г	0,308 mg/l
Freshwater	sediment	2,51 mg/kg
Marine sedi	ment	0,251 mg/kg
Micro-organ	isms in sewage treatment plants (STP)	677 mg/l
Soil		0,72 mg/kg

## 8.2. Exposure controls

# Appropriate engineering controls

Technical measures and the application of suitable work processes have priority over personal protection equipment.

## Individual protection measures, such as personal protective equipment

## Eye/face protection

goggles

## **Hand protection**

Protective gloves are recommended Company KCL GmbH, D-36124 Eichenzell, email: vertrieb@kcl.de With specification (test according to EN374):



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By long-term hand contact

Recommended glove articles: KCL 730 Camatril® Velours Recommended material: NBR (Nitrile rubber) 0,4 mm Wearing time with permanent contact: > 480 min

By short-term hand contact

Recommended glove articles: KCL 720 Camapren®

Recommended material: CR (polychloroprene, chloroprene rubber) 0,65 mm

Wearing time with occasional contact (splashes): > 480 min

The breakthrough times stated above were determined by KCL in laboratory tests acc. to EN374 with samples of the recommended glove types. This recommendation applies only to the product stated in the safety data sheet<(>,<)> supplied by us and for the designated use. When dissolving in or mixing with other substances and under conditions deviating from those stated in EN374 please contact the supplier of CE-approved gloves (e.g. KCL GmbH, D-36124 Eichenzell, Internet: www.kcl.de).

### Skin protection

Wear suitable protective clothing.

Wash hands before breaks and after work.

### Respiratory protection

Respiratory protection necessary at: aerosol or mist formation

### **Environmental exposure controls**

Do not allow to enter into surface water or drains.

# SECTION 9: Physical and chemical properties

## 9.1. Information on basic physical and chemical properties

Physical state: Liquid Colour: clear

Odour: characteristic

Melting point/freezing point:

Boiling point or initial boiling point and

No data available

No data available

boiling range:

Flammability: No data available Lower explosion limits: No data available Upper explosion limits: No data available Flash point: No data available Auto-ignition temperature: No data available Decomposition temperature: No data available pH-Value: 3,5 No data available Viscosity / kinematic: Water solubility: No data available

Solubility in other solvents

No data available

Partition coefficient n-octanol/water:

Vapour pressure:

Vapour pressure:

No data available

Vapour pressure:

No data available

Density:

1,06933 g/cm³

Bulk density:

No data available

Relative vapour density:

No data available

## 9.2. Other information

Information with regard to physical hazard classes



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Explosive properties

No data available

Sustaining combustion:

No data available

Self-ignition temperature

Solid: No data available
Gas: No data available

Oxidizing properties

No data available

Other safety characteristics

Evaporation rate:

Solvent separation test:

No data available
Solvent content:

No data available
Solid content:

No data available
Sublimation point:

No data available
Softening point:

No data available
Pour point:

No data available

No data available:

Viscosity / dynamic: No data available Flow time: No data available

Further Information
No data available

# **SECTION 10: Stability and reactivity**

## 10.1. Reactivity

No data available

## 10.2. Chemical stability

No data available

### 10.3. Possibility of hazardous reactions

No data available

### 10.4. Conditions to avoid

No data available

## 10.5. Incompatible materials

No data available

## 10.6. Hazardous decomposition products

No data available

## **Further information**

No data available

# **SECTION 11: Toxicological information**

### 11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

# Toxicocinetics, metabolism and distribution

There are no data available on the mixture itself.

## **Acute toxicity**

Based on available data, the classification criteria are not met.



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CAS No	Chemical name					
	Exposure route	Dose	Species	Source	Method	
631-61-8	ammonium acetate					
	oral	LD50 >= 2333,28 mg/kg		(	Read-across approach from published expe	
	dermal	LD50 > 26556,42 mg/kg		\ ,	Read-across approach from published expe	

### Irritation and corrosivity

Based on available data, the classification criteria are not met.

### Sensitising effects

Based on available data, the classification criteria are not met.

## Carcinogenic/mutagenic/toxic effects for reproduction

Based on available data, the classification criteria are not met.

## STOT-single exposure

Based on available data, the classification criteria are not met.

### STOT-repeated exposure

Based on available data, the classification criteria are not met.

### **Aspiration hazard**

Based on available data, the classification criteria are not met.

### Specific effects in experiment on an animal

There are no data available on the mixture itself.

## Additional information on tests

There are no data available on the mixture itself.

### **Practical experience**

There are no data available on the mixture itself.

## 11.2. Information on other hazards

### Other information

There are no data available on the mixture itself.

### Further information

There are no data available on the mixture itself.

# **SECTION 12: Ecological information**

## 12.1. Toxicity

There are no data available on the mixture itself.

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CAS No	Chemical name						
	Aquatic toxicity	Dose		[h]   [d]	Species	Source	Method
631-61-8	ammonium acetate						
	Acute algae toxicity	ErC50 mg/l	> 1000		Skeletonema costatum	Study report (2005)	ISO 10253
	Acute crustacea toxicity	EC50 mg/l	> 360,89	48 h		Read-across (2010)	Read-across approach from Letter of Acce
	Fish toxicity	NOEC	154 mg/l	60 d	Cyprinus carpio	Publication (1999)	OECD Guideline 204
7647-01-0	Hydrochloric acid						
	Acute fish toxicity	LC50	862 mg/l	96 h	Leuciscus idus		

### 12.2. Persistence and degradability

There are no data available on the mixture itself.

### 12.3. Bioaccumulative potential

There are no data available on the mixture itself.

### Partition coefficient n-octanol/water

CAS No	Chemical name	Log Pow
631-61-8	ammonium acetate	-2,79

## **BCF**

CAS No	Chemical name	BCF	Species	Source
631-61-8	ammonium acetate	3,162		Calculation (2010)

## 12.4. Mobility in soil

There are no data available on the mixture itself.

## 12.5. Results of PBT and vPvB assessment

The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII.

There are no data available on the mixture itself.

## 12.6. Endocrine disrupting properties

This product does not contain a substance that has endocrine disrupting properties with respect to non-target organisms as no components meets the criteria.

## 12.7. Other adverse effects

There are no data available on the mixture itself.

### **Further information**

Do not allow to enter into surface water or drains.

## **SECTION 13: Disposal considerations**

## 13.1. Waste treatment methods

### **Disposal recommendations**

Waste disposal according to directive 2008/98/EC, covering waste and dangerous waste.

Do not empty into drains.

### Contaminated packaging

The allocation of waste identity numbers/waste descriptions must be carried out according to the EEC, specific to the industry and process.

# **SECTION 14: Transport information**

## Land transport (ADR/RID)



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14.1. UN number or ID number:No dangerous good in sense of this transport regulation.14.2. UN proper shipping name:No dangerous good in sense of this transport regulation.14.3. Transport hazard class(es):No dangerous good in sense of this transport regulation.14.4. Packing group:No dangerous good in sense of this transport regulation.

Inland waterways transport (ADN)

14.1. UN number or ID number:No dangerous good in sense of this transport regulation.14.2. UN proper shipping name:No dangerous good in sense of this transport regulation.14.3. Transport hazard class(es):No dangerous good in sense of this transport regulation.14.4. Packing group:No dangerous good in sense of this transport regulation.

Marine transport (IMDG)

14.1. UN number or ID number:No dangerous good in sense of this transport regulation.14.2. UN proper shipping name:No dangerous good in sense of this transport regulation.14.3. Transport hazard class(es):No dangerous good in sense of this transport regulation.14.4. Packing group:No dangerous good in sense of this transport regulation.

Air transport (ICAO-TI/IATA-DGR)

14.1. UN number or ID number:No dangerous good in sense of this transport regulation.14.2. UN proper shipping name:No dangerous good in sense of this transport regulation.14.3. Transport hazard class(es):No dangerous good in sense of this transport regulation.14.4. Packing group:No dangerous good in sense of this transport regulation.

14.5. Environmental hazards

ENVIRONMENTALLY HAZARDOUS: No

14.6. Special precautions for user

No dangerous good in sense of this transport regulation.

# 14.7. Maritime transport in bulk according to IMO instruments

No dangerous good in sense of this transport regulation.

## **SECTION 15: Regulatory information**

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

## **EU** regulatory information

Information according to 2012/18/EU Not subject to 2012/18/EU (SEVESO III)

(SEVESO III):

**National regulatory information** 

Water hazard class (D): 1 - slightly hazardous to water

Additional information

No data available

## **SECTION 16: Other information**

## Relevant H and EUH statements (number and full text)

H314 Causes severe skin burns and eye damage.

H335 May cause respiratory irritation.

EUH210 Safety data sheet available on request.

### **Further Information**

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

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

The receiver of our product is singularly responsible for adhering to existing laws and regulations.

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