



**HARKE**  
PureChem

**High Purity Chemicals**  
for Capacitors, Batteries,  
Semiconductors and  
Reagents

C 002981  
M CE33  
375V 2200 $\mu$ F  
- NEGATIVE  
+85°C JAPAN  
4N 08



PureChem

#### YOUR BENEFITS

- ▶ First-class quality products
- ▶ Long-standing experience
- ▶ Customized solutions
- ▶ Technical support

**YOUR PARTNER FOR INNOVATIVE PURE CHEMICALS**



## Thank you for your interest!

Electronic, analytic and research – within these segments high purity chemicals are most important.

Our products meet the highest quality and purity demand.

For more than 55 years HARKE Chemicals GmbH is known as a competent and reliable supplier of high purity materials. Thus the business unit HARKE PureChem supplies manufacturers of PC-boards, microchips, primary and secondary battery systems, tantal- and aluminium electrolyte capacitors, micro motors, hard disks and wave conductor cables with high purity chemicals for various applications.

Moreover, we have many high pure chemicals for different applications in our product range.

Contact us to discuss your application.

Your HARKE PureChem team



### ELECTROLYTES FOR PRIMARY LITHIUM BATTERIES

Lipaste/various types of electrolytes

### ELECTROLYTES FOR SECONDARY LITHIUM BATTERIES

Lipaste/various types of electrolytes

### ELECTROLYTES FOR LITHIUM ION CAPACITORS

Lipaste/various types of electrolytes

### ADDITIVES FOR ALUMINIUM ELECTROLYTIC CAPACITORS

Various types of additives

### ELECTROLYTES FOR ALUMINIUM ELECTROLYTIC CAPACITORS

Capaste/various types of electrolytes



## PRODUCT GROUPS &amp; PRODUCTS

## ACETATE SALTS

Product	CAS No.
Ammonium acetate, $\text{CH}_3\text{COONH}_4$	631-61-8
Sodium acetate trihydrate, $\text{CH}_3\text{COONa} \cdot 3\text{H}_2\text{O}$	6131-90-4

## AMMONIUM SALTS

Product	CAS No.
Ammonium adipate, $\text{NH}_4\text{OOC}(\text{CH}_2)_4\text{COONH}_4$	3385-41-9
Ammonium benzoate, $\text{C}_6\text{H}_5\text{COONH}_4$	1863-63-4
Ammonium formate, $\text{HCOONH}_4$	540-69-2
Diammonium hydrogen citrate, $\text{NH}_4\text{OOCCH}_2\text{C}(\text{OH})(\text{COOH})\text{CH}_2\text{COONH}_4$	3012-65-5
Ammonium acetate, $\text{CH}_3\text{COONH}_4$	631-61-8
Ammonium oxalate monohydrate, $(\text{NH}_4)_2\text{C}_2\text{O}_4 \cdot \text{H}_2\text{O}$	6009-70-7
Ammonium sebacate, $\text{NH}_4\text{OOC}(\text{CH}_2)_8\text{COONH}_4$	19402-63-2
Ammonium p-nitrobenzoate dihydrate, $\text{C}_6\text{H}_4\text{NO}_2\text{COONH}_4 \cdot 2\text{H}_2\text{O}$	19416-70-7
Ammonium pentaborate octahydrate, $(\text{NH}_4)_2\text{O} \cdot 5\text{B}_2\text{O}_3 \cdot 8\text{H}_2\text{O}$	12046-03-6
Ammonium tetraborate tetrahydrate, $(\text{NH}_4)_2\text{B}_4\text{O}_7 \cdot 4\text{H}_2\text{O}$	12228-87-4
Diammonium phthalate, $\text{C}_6\text{H}_4(\text{COONH}_4)_2$	523-24-0
Ammonium dihydrogen phosphinate, $\text{NH}_4\text{H}_2\text{PO}_2$	7803-65-8
Ammonium sulfate, $(\text{NH}_4)_2\text{SO}_4$	7783-20-2

## BORIC ACID AND BORATES

Product	CAS No.
Boric acid, $\text{H}_3\text{BO}_3$	10043-35-3
Ammonium pentaborate octahydrate, $(\text{NH}_4)_2\text{O} \cdot 5\text{B}_2\text{O}_3 \cdot 8\text{H}_2\text{O}$	12046-03-6
Ammonium tetraborate tetrahydrate, $(\text{NH}_4)_2\text{B}_4\text{O}_7 \cdot 4\text{H}_2\text{O}$	12228-87-4
Potassium tetraborate tetrahydrate, $\text{K}_2\text{B}_4\text{O}_7 \cdot 4\text{H}_2\text{O}$	12045-78-2
Sodium tetraborate decahydrate, $\text{Na}_2\text{B}_4\text{O}_7 \cdot 10\text{H}_2\text{O}$	1303-96-4
Sodium pentaborate decahydrate, $\text{Na}_2\text{B}_{10}\text{O}_{16} \cdot 10\text{H}_2\text{O}$	12007-92-0
Lithium tetraborate, $\text{Li}_2\text{B}_4\text{O}_7$	12007-60-2
Boron trioxide, $\text{B}_2\text{O}_3$	1303-86-2

## LITHIUM SALTS

Product	CAS No.
Lithium tetraborate, $\text{Li}_2\text{B}_4\text{O}_7$	12007-60-2

## MANGANESE SALTS/NITRATES

Product	CAS No.
Manganese (II) nitrate hexahydrate, $\text{Mn}(\text{NO}_3)_2 \cdot 6\text{H}_2\text{O}$	17141-63-8
Manganese (II) nitrate solution, $\text{Mn}(\text{NO}_3)_2$	10377-66-9





## PRODUCT GROUPS &amp; PRODUCTS

## OXALIC ACIDS &amp; OXALATES

Product	CAS No.
Oxalic acid dihydrate, $\text{H}_2\text{C}_2\text{O}_4 \cdot 2\text{H}_2\text{O}$	6153-56-6
Oxalic acid, anhydrous, $\text{H}_2\text{C}_2\text{O}_4$	144-62-7
Ammonium oxalate monohydrate, $(\text{NH}_4)_2\text{C}_2\text{O}_4 \cdot \text{H}_2\text{O}$	6009-70-7
Potassium trihydrogen dioxalate dihydrate, $\text{KH}_3(\text{C}_2\text{O}_4)_2 \cdot 2\text{H}_2\text{O}$	6100-20-5
Potassium oxalate monohydrate, $\text{K}_2\text{C}_2\text{O}_4 \cdot \text{H}_2\text{O}$	6487-48-5
Sodium oxalate, $\text{Na}_2\text{C}_2\text{O}_4$	62-76-0

## POTASSIUM SALTS

Product	CAS No.
Potassium formate, $\text{HCOOK}$	590-29-4
Potassium oxalate monohydrate, $\text{K}_2\text{C}_2\text{O}_4 \cdot \text{H}_2\text{O}$	6487-48-5
Potassium trihydrogen dioxalate dihydrate, $\text{KH}_3(\text{C}_2\text{O}_4)_2 \cdot 2\text{H}_2\text{O}$	6100-20-5
Potassium hydrogen phthalate, $\text{C}_6\text{H}_4(\text{COOH})(\text{COOK})$	877-24-7
Potassium tetraborate tetrahydrate, $\text{K}_2\text{B}_4\text{O}_7 \cdot 4\text{H}_2\text{O}$	12045-78-2
Acesulfame potassium, $\text{C}_4\text{H}_4\text{KNO}_4\text{S}$	55589-62-3

## SODIUM SALTS

Product	CAS No.
Sodium acetate trihydrate, $\text{CH}_3\text{COONa} \cdot 3\text{H}_2\text{O}$	6131-90-4
Sodium oxalate, $\text{Na}_2\text{C}_2\text{O}_4$	62-76-0
Sodium tetraborate decahydrate, $\text{Na}_2\text{B}_4\text{O}_7 \cdot 10\text{H}_2\text{O}$	1303-96-4
Sodium pentaborate decahydrate, $\text{Na}_2\text{B}_{10}\text{O}_{16} \cdot 10\text{H}_2\text{O}$	12007-92-0
Sodium Formate, $\text{HCOONa}$	141-53-7

## OTHER ACIDS

Product	CAS No.
Oxalic acid dihydrate, $\text{H}_2\text{C}_2\text{O}_4 \cdot 2\text{H}_2\text{O}$	6153-56-6
Phthalic acid, $\text{C}_6\text{H}_4(\text{COOH})_2$	88-99-3
Iminodiacetic acid, $\text{HN}(\text{CH}_2\text{COOH})_2$	142-73-4
p-Nitrobenzoic acid (4-Nitrobenzoic acid), $\text{NO}_2\text{C}_6\text{H}_4\text{COOH}$	62-23-7

## OTHER CHEMICALS

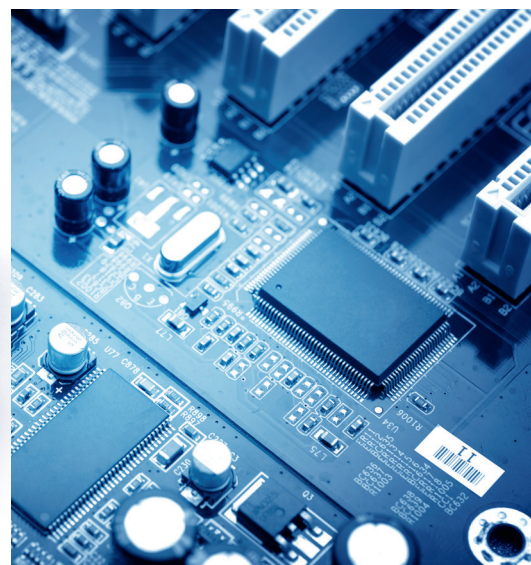
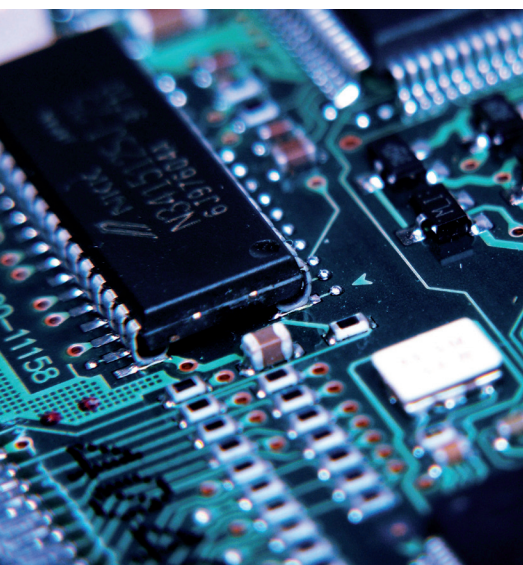
Product	CAS No.
Tetraethylammonium hydrogen phthalate, $\text{C}_6\text{H}_4(\text{COOH}) \cdot \text{N}(\text{C}_2\text{H}_5)_3$	79723-03-8
Urea, $\text{NH}_2\text{CONH}_2$	57-13-6
N-Acetylglucosamine, $\text{C}_8\text{H}_{15}\text{NO}_6$	7512-17-6
Polyvinylpyrrolidone	25249-54-1
Tin(IV)chloride, $\text{SnCl}_4 \cdot 5\text{H}_2\text{O}$	10026-06-09
Soda pure, $\text{Na}_2\text{CO}_3$	497-19-8



## AREAS OF APPLICATION

### Is Your Application Included?

Additives for plating	Intermediate for medicine
Additives for yeast culture	Lithium ion capacitors
Aluminium electrolytic capacitors	Metal surface – treatment
Chelating (reagents)	Paint industry
Dyening industry	Ph standard reagents
Flame retardant industry	Photographic industry
Food additives	Primary lithium batteries
Fusing agent	Reagents
Heat treating agent	Secondary lithium batteries
High purity glass industry	And many more ...



**Contact us  
to discuss  
your application.**







**HARKE Chemicals GmbH**  
Business Unit PureChem  
Xantener Straße 1  
45479 Mülheim an der Ruhr  
Germany

+49 (0)208 3069-0  
+49 (0)208 3069-1111  
purechem@harke.com  
www.harke.com/purechem



**HARKE GROUP**

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