

Primepure™ Series

High Purity Inorganic Compounds

Highest Purity

Novel and ultimate high purity 99.99~99.9995% *Based On Trace Metals Analysis

More than 30 metal impurities (ppb level *except some)

High-quality containers appropriate for each product

Product

Name	Grade	Package	Catalog No.
Sodium nitrate, 99.995%	Primepure (M)	50 g	37400-96
Sodium chloride, 99.995%	Primepure (M)	50 g	37505-96
Sodium sulfate, 99.995%	Primepure (M)	50 g	37939-96
Sodium acetate, 99.995%	Primepure (M)	50 g	37100-96
Sodium formate, 99.995%	Primepure (M)	50 g	37168-96
Sodium iodide, 99.995%	Primepure (M)	50 g	37169-96
NEW Sodium carbonate, 99.995%	Primepure (M)	50 g	37170-96
Ammonium nitrate, 99.9995%	Primepure (M)	50 g	01300-96
Ammonium sulfate, 99.9995%	Primepure (M)	50 g	01321-96
Ammonium chloride, 99.9995%	Primepure (M)	50 g	01299-96
Ammonium acetate, 99.999%	Primepure (M)	50 g	01267-96
Ammonium formate, 99.9995%	Primepure (M)	50 g	01167-96
Potassium chloride, 99.99%	Primepure (M)	50 g	32678-96
Potassium nitrate, 99.99%	Primepure (M)	50 g	32387-96
Potassium sulfate, 99.99%	Primepure (M)	50 g	32679-96
Potassium acetate, 99.99%	Primepure (M)	50 g	32877-96
Potassium formate, 99.95%	Primepure (M)	50 g	32878-96
Potassium iodide, 99.99%	Primepure (M)	50 g	32879-96
NEW Potassium carbonate, 99.95%	Primepure (M)	50 g	32454-96
NEW Lithium carbonate, 99.995%	Primepure (M)	50 g	24125-96
NEW Lithium sulfate monohydrate, 99.999%	Primepure (M)	50 g	24143-96

(M): Metal impurities



Kanto Chemical Co., Inc.

Kanto Chemical offer Primepure™ series “High Purity Inorganic Compounds”, with ppb level certification for more than 30 species of trace level impurities. Historically, we have been developing novel procedure of manufacturing / purifying for many kinds of inorganic compounds, and also trace level analysis technique. Primepure™ Series “High Purity Inorganic Compounds” surely allows you reliable result of the work in the field of high performance electric materials, functional materials, or so on.

Feature

○ High pure raw material

We have been manufacturing high purity acid and base for various fields. As typified by Ultrapur™ grade of acid and base from us are the high purity reagent chemical which are guaranteed ppb level of impurities. As same as Ultrapur™ grade reagents, high purity inorganic compounds series Primepure™ are used high purity raw material as well.

○ Original manufacturing method (Original purification method)

It's difficult to produce high purity inorganic compounds from just using high purity raw material. Kanto Chemical can manufacture high purity inorganic compounds because we use those technology and experience which have been accumulating.

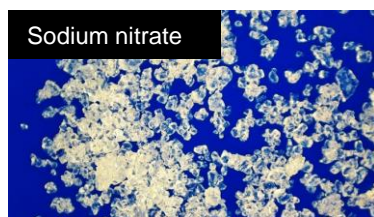
○ Extreme trace analysis

In order to guarantee high purity reagent chemical, we are using extreme trace analysis technology. We have been accumulating technologies which can guarantee so many kinds of reagent chemicals through getting certified ISO/IEC 17025 accreditation. We are performing extreme trace analysis of high purity inorganic compounds by catching up with development of analytical equipment.

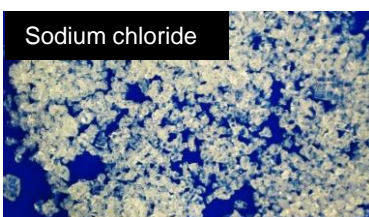
○ Homologous elemental impurity

Inorganic compounds may contain homologous elements as impurities. For example, sodium salts may contain potassium as impurity. Although it's difficult to remove those impurity, We achieve to reduce those impurity by our original technology.

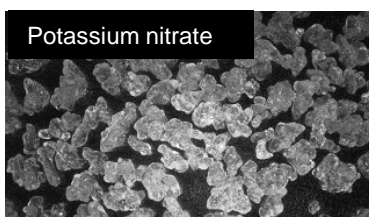
Appearance



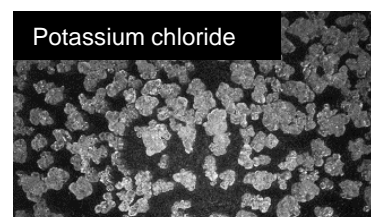
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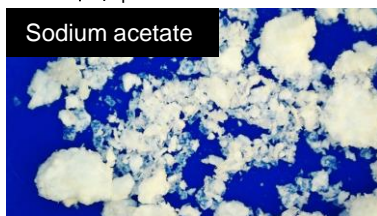
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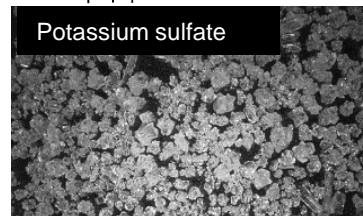
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└─ apx.1 mm

Example of specification

◆ Ammonium chloride, 99.9995%

Items	Unit	Specification
Purity(Titration)	%	min. 99.5
Purity(subtracting method)	%	min. 99.9995
Solubility	-	to pass test
pH(50g/L, 25°C)	-	4.5 - 5.5
Nitrate	-	to pass test
Phosphate(PO ₄)	ppm	max. 2
Sulfate(SO ₄)	%	max. 0.001
Lithium(Li)	ppm	max. 0.05
Sodium(Na)	ppm	max. 0.1
Potassium(K)	ppm	max. 0.1
Rubidium(Rb)	ppm	max. 0.01
Cesium(Cs)	ppm	max. 0.01
Copper(Cu)	ppm	max. 0.01
Silver(Ag)	ppm	max. 0.01
Magnesium(Mg)	ppm	max. 0.01
Calcium(Ca)	ppm	max. 0.01
Strontium(Sr)	ppm	max. 0.01
Barium(Ba)	ppm	max. 0.01
Zinc(Zn)	ppm	max. 0.05
Cadmium(Cd)	ppm	max. 0.01
Mercury(Hg)	ppm	max. 0.01
Boron(B)	ppm	max. 0.05
Aluminum(Al)	ppm	max. 0.05
Gallium(Ga)	ppm	max. 0.01
Indium(In)	ppm	max. 0.01
Titanium(Ti)	ppm	max. 0.05
Zirconium(Zr)	ppm	max. 0.01
Germanium(Ge)	ppm	max. 0.05
Tin(Sn)	ppm	max. 0.01
lead(Pb)	ppm	max. 0.01
Arsenic(As)	ppm	max. 0.05
Antimony(Sb)	ppm	max. 0.01
Bismuth(Bi)	ppm	max. 0.01
Chromium(Cr)	ppm	max. 0.01
Molybdenum(Mo)	ppm	max. 0.01
Manganese(Mn)	ppm	max. 0.01
Iron(Fe)	ppm	max. 0.05
Cobalt(Co)	ppm	max. 0.01
Rhodium(Rh)	ppm	max. 0.01
Nickel(Ni)	ppm	max. 0.01

◆ Potassium iodide, 99.99%

Items	Unit	Specification
Purity(Titration)	%	min. 99.5
Purity(subtracting method)	%	min. 99.99
Solubility	-	to pass test
Drying loss(105°C)	%	max. 0.2
pH(50g/L, 25°C)	-	6.0 - 8.0
Chlorine or Bromine compounds(as Cl)	%	max. 0.01
Salt of Iodic acid or Iodine reducing material	-	to pass test
Phosphate(PO ₄)	%	Max, 0.001
Sulfate(SO ₄)	%	max. 0.001
Nitrate(as N)	%	max. 0.001
Lithium(Li)	ppm	max. 0.02
Sodium(Na)	ppm	max. 20
Rubidium(Rb)	ppm	max. 50
Cesium(Cs)	ppm	max. 0.05
Copper(Cu)	ppm	max. 0.05
Silver(Ag)	ppm	max. 0.05
Magnesium(Mg)	ppm	max. 0.05
Calcium(Ca)	ppm	max. 0.5
Strontium(Sr)	ppm	max. 0.05
Barium(Ba)	ppm	max. 0.05
Zinc(Zn)	ppm	max. 0.05
Cadmium(Cd)	ppm	max. 0.05
Mercury(Hg)	ppm	max. 0.05
Boron(B)	ppm	max. 0.2
Aluminum(Al)	ppm	max. 0.05
Gallium(Ga)	ppm	max. 0.05
Indium(In)	ppm	max. 0.05
Titanium(Ti)	ppm	max. 0.05
Zirconium(Zr)	ppm	max. 0.05
Germanium(Ge)	ppm	max. 0.05
Tin(Sn)	ppm	max. 0.5
lead(Pb)	ppm	max. 0.05
Vanadium(V)	ppm	max. 0.05
Arsenic(As)	ppm	max. 0.05
Antimony(Sb)	ppm	max. 0.05
Bismuth(Bi)	ppm	max. 0.05
Chromium(Cr)	ppm	max. 0.05
Manganese(Mn)	ppm	max. 0.05
Iron(Fe)	ppm	max. 0.05
Cobalt(Co)	ppm	max. 0.05
Rhodium(Rh)	ppm	max. 0.05
Nickel(Ni)	ppm	max. 0.05

Package



Inner bottle: HDPE
Outer package: Aluminum coating bag to avoid moisture, light or air exposure.

=> It can maintain the high quality until just you open the package.

Related product ~High purity acid and alkali~

Name	Grade	Package	Catalog No.
Ultrapur™ series			
Acetic acid	Ultrapur™	250 mL	01021-2B
Hydrochloric acid	Ultrapur™	250 mL	18078-1B
Nitric acid 1.38	Ultrapur™	250 mL	28163-1B
Perchloric acid, 60%	Ultrapur™	250 mL	32059-1B
Sulfuric acid	Ultrapur™	250 mL	37390-1B
Hydrogen peroxide	Ultrapur™	250 mL	18084-2B
Ultrapure water	Ultrapur™	1 L	43001-1B
Ammonia solution	Ultrapur™	250 mL	01266-3B
Potassium hydroxide solution	Ultrapur™	250 mL	32947-1B
Sodium hydroxide solution	Ultrapur™	250 mL	37960-1B
Ultrapur™-100 series			
Hydrochloric acid	Ultrapur™-100	500 mL	18078-4B
Nitric acid 1.42	Ultrapur™-100	500 mL	28163-5B
Sulfuric acid	Ultrapur™-100	500 mL	37390-4B
For metal analysis			
Acetic acid	for metal analysis	500 mL	01021-09
Ammonia solution	for metal analysis	500 mL	01266-09
Hydrochloric acid	for metal analysis	500 mL	18079-09
Nitric acid 1.38	for metal analysis	500 mL	28163-09
Sulfuric acid	for metal analysis	500 mL	37390-09

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