

**Safety data sheet  
according to UK REACH**

revised on: 25.07.2024

Version number 5 (replaces version 4)

Creation Date: 22.09.2016

**SECTION 1: Identification of the substance/mixture and of the company/undertaking****1.1 Product identifier****Trade name: Potassium hydrogen phthalate****Article number:** 1627**CAS Number:**  
877-24-7**EC number:**  
212-889-4**Registration number**

A registration number for this substance is not available because the substance or its use is exempted from registration under Article 2 UK REACH Regulation (EC) No 1907/2006, the annual tonnage does not require registration or registration is foreseen for a later date.

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

The product is not intended for use by consumers

For professional users only

**Application of the substance / the mixture**

Industrial use

Chemical analytics

Laboratory chemical

**1.3 Details of the supplier of the safety data sheet****Manufacturer/Supplier:**

Th. Geyer GmbH & Co. KG

Dornierstr. 4 – 6

D-71272 Renningen

Tel.: +49(0)7159-1637-0, Fax:+49 (0)7159/18417

www.thgeyer.de

sicherheitsdatenblaetter@thgeyer.de

**Further information obtainable from:** Product management department**1.4 Emergency telephone number:**

National Poisons Information Service

City Hospital

Dudley Road

Birmingham B18 7QH

Tel.:Emergency: (00 44) 87 06 00 62 66

Members of the public seeking specific information on poisons should contact:

In England and Wales: NHS 111 - dial 111

In Scotland: NHS 24 - dial 111

**SECTION 2: Hazards identification****2.1 Classification of the substance or mixture****Classification according to Regulation (EC) No 1272/2008**

The substance is not classified, according to the GB CLP regulation.

**2.2 Label elements****Labelling according to Regulation (EC) No 1272/2008** Void**Hazard pictograms** Void

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- **Signal word** Void
- **Hazard statements** Void
- **2.3 Other hazards**
- **Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.

## SECTION 3: Composition/information on ingredients

- **3.1 Substances**
- **CAS No. Description**  
CAS: 877-24-7 Potassium hydrogen phthalate
- **Identification number(s)**
- **EC number:** 212-889-4

## SECTION 4: First aid measures

- **4.1 Description of first aid measures**
- **General information:** First aider needs to protect himself.
- **After inhalation:**  
Supply fresh air.  
Seek medical treatment in case of complaints.
- **After skin contact:** Wash with plenty of soap and water, take off soiled clothes and shoes.
- **After eye contact:**  
Rinse out opened eye for several minutes under running water.  
Remove any contact lenses if possible.  
Continue rinsing.
- **After swallowing:**  
Rinse out mouth and then drink plenty of water.  
Consult a doctor if you feel unwell.
- **Information for doctor:** Please observe safety data sheet/label.
- **4.2 Most important symptoms and effects, both acute and delayed**  
Cramp  
Gastric or intestinal disorders
- **4.3 Indication of any immediate medical attention and special treatment needed** Symptomatic treatment.

## SECTION 5: Firefighting measures

- **5.1 Extinguishing media**
- **Suitable extinguishing agents:** Use fire extinguishing methods suitable to surrounding conditions.
- **For safety reasons unsuitable extinguishing agents:** Water with full jet.
- **5.2 Special hazards arising from the substance or mixture**  
Formation of toxic gases is possible during heating or in case of fire.  
In case of fire, the following can be released:  
Carbon oxides (CO, CO<sub>2</sub>)  
Formation of hazardous vapours possible due to ambient fire.
- **5.3 Advice for firefighters**
- **Protective equipment:**  
Wear self-contained respiratory protective device.  
Do not inhale explosion gases or combustion gases.
- **Additional information**  
Dispose of fire debris and contaminated fire fighting water in accordance with official regulations.

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Safely prevent extinguishing water from entering groundwater or surface water.

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## SECTION 6: Accidental release measures

### 6.1 Personal precautions, protective equipment and emergency procedures

Avoid contact with eyes and skin.

Do not breathe dust.

Wear protective clothing.

Ensure adequate ventilation.

### 6.2 Environmental precautions: Do not allow to enter sewers/surface or ground water.

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

Cover the sewerage system.

Prevent spreading over an area (e.g. by damming or oil booms).

Dispose of the material collected according to regulations.

### 6.4 Reference to other sections

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

## SECTION 7: Handling and storage

### 7.1 Precautions for safe handling

Store in cool, dry place in tightly closed receptacles.

Keep away from heat and direct sunlight.

Apply the general protective and hygienic measures when handling chemicals.

### Information about fire - and explosion protection:

Substance itself does not burn, adapt extinguishing measures to surroundings

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

#### Storage:

#### Requirements to be met by storerooms and receptacles:

Prevent any seepage into the ground.

Store only in the original receptacle.

#### Information about storage in one common storage facility:

Store away from flammable substances.

Store away from oxidising agents.

Store away from water.

#### Further information about storage conditions:

Store in cool, dry conditions in well sealed receptacles.

Protect from heat and direct sunlight.

Protect from humidity and water.

#### Storage class: 13

### 7.3 Specific end use(s) No further relevant information available.

## SECTION 8: Exposure controls/personal protection

### 8.1 Control parameters

#### Ingredients with limit values that require monitoring at the workplace: Not required.

#### Additional information: The lists valid during the making were used as basis.

### 8.2 Exposure controls

#### Appropriate engineering controls No further data; see section 7.

#### Individual protection measures, such as personal protective equipment

#### General protective and hygienic measures:

The usual precautionary measures are to be adhered to when handling chemicals.

#### Respiratory protection: Not necessary if room is well-ventilated.

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**· Hand protection**


Protective gloves

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation. Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

**· Material of gloves**

Information on suitable glove materials is not available at present.

However, experience has shown that the glove materials polychloroprene, nitrile rubber, butyl rubber, fluororubber and polyvinyl chloride are suitable for protection against undissolved solids.

NBR: Acrylonitrile butadiene rubber

Material thickness > 0.11 mm

The selection of the suitable gloves does not only depend on the material, but also on further marks of quality and varies from manufacturer to manufacturer.

**· Penetration time of glove material**

The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

Level 6 for applications > 480 min

**· Eye/face protection**


Safety glasses

**· Body protection:**


Protective work clothing (e. g. safety shoes EN ISO 20345, long-sleeved protective working garments).

## SECTION 9: Physical and chemical properties

**· 9.1 Information on basic physical and chemical properties**
**· General Information**
**· Physical state**

Solid

**· Colour:**

White

**· Odour:**

Characteristic

**· Melting point/freezing point:**

295 °C

**· Boiling point or initial boiling point and boiling range**

Undetermined.

**· Flammability**

Product is not flammable.

**· Lower and upper explosion limit**
**· Lower:**

Not determined.

**· Upper:**

Not determined.

**· Flash point:**

Not applicable.

**· Decomposition temperature:**

Not determined.

**· pH**

~4 (Molar solution)

**· Viscosity:**
**· Kinematic viscosity**

Not applicable.

**· Dynamic:**

Not applicable.

**· Solubility**
**· water at 20 °C:**

80 g/l

**· Partition coefficient n-octanol/water (log value)**

Not determined.

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- |                                   |                        |
|-----------------------------------|------------------------|
| · Vapour pressure:                | Not applicable.        |
| · Density and/or relative density |                        |
| · Density at 20 °C:               | 1.64 g/cm <sup>3</sup> |
|                                   | Not determined.        |
| · Relative density                | Not determined.        |
| · Vapour density                  | Not applicable.        |
| · Particle characteristics        |                        |
| See section 3.                    |                        |

- |   |   |
|---|---|
| · <b>9.2 Other information</b>  |   |
| · Appearance:   |   |
| · Form:   | Solid material                                |
| · Important information on protection of health and environment, and on safety. |   |
| · Ignition temperature:   | Not determined.                               |
| · Explosive properties:   | Product does not present an explosion hazard. |
| · Molecular weight  | 204.23 g/mol                                  |
| · Change in condition   |   |
| · Evaporation rate  | Not applicable.                               |

- |   |      |
|---|------|
| · Information with regard to physical hazard classes                        |      |
| · Explosives  | Void |
| · Flammable gases   | Void |
| · Aerosols  | Void |
| · Oxidising gases   | Void |
| · Gases under pressure  | Void |
| · Flammable liquids   | Void |
| · Flammable solids  | Void |
| · Self-reactive substances and mixtures                                     | Void |
| · Pyrophoric liquids  | Void |
| · Pyrophoric solids   | Void |
| · Self-heating substances and mixtures                                      | Void |
| · Substances and mixtures, which emit flammable gases in contact with water | Void |
| · Oxidising liquids   | Void |
| · Oxidising solids  | Void |
| · Organic peroxides   | Void |
| · Corrosive to metals   | Void |
| · Desensitised explosives   | Void |

### SECTION 10: Stability and reactivity

- **10.1 Reactivity** No further relevant information available.
- **10.2 Chemical stability** Stable when stored and handled properly.
- **Thermal decomposition / conditions to be avoided:** No decomposition if used according to specifications.
- **10.3 Possibility of hazardous reactions**  
Reacts with strong oxidising agents.  
Nitric acid
- **10.4 Conditions to avoid** Protect from moisture.
- **10.5 Incompatible materials:** Avoid contact with other chemicals.
- **10.6 Hazardous decomposition products:** In case of fire: see section 5.

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## SECTION 11: Toxicological information

- **11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008**
- **Acute toxicity** Based on available data, the classification criteria are not met.
- **Skin corrosion/irritation** Based on available data, the classification criteria are not met.
- **Serious eye damage/irritation** Based on available data, the classification criteria are not met.
- **Respiratory or skin sensitisation** Based on available data, the classification criteria are not met.
- **Germ cell mutagenicity** Based on available data, the classification criteria are not met.
- **Carcinogenicity** Based on available data, the classification criteria are not met.
- **Reproductive toxicity** 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.
- **Subacute to chronic toxicity:** -
- **11.2 Information on other hazards**
- **Endocrine disrupting properties** Substance is not listed.

## SECTION 12: Ecological information

- **12.1 Toxicity**
- **Aquatic toxicity:** No further relevant information available.
- **12.2 Persistence and degradability** No further relevant information available.
- **12.3 Bioaccumulative potential** No further relevant information available.
- **12.4 Mobility in soil** No further relevant information available.
- **12.5 Results of PBT and vPvB assessment**
- **PBT:** Not applicable.
- **vPvB:** Not applicable.
- **12.6 Endocrine disrupting properties**  
The product does not contain substances with endocrine disrupting properties.
- **12.7 Other adverse effects**
- **Additional ecological information:**
- **General notes:**  
Water hazard class 1 (German Regulation) (Self-assessment): slightly hazardous for water  
Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

## SECTION 13: Disposal considerations

- **13.1 Waste treatment methods** Observe local (country-specific) regulations and laws.
- **Recommendation**  
Smaller quantities can be disposed of with household waste.  
Chemicals must be disposed of in accordance with the respective national regulations.

- **European waste catalogue**

07 00 00	WASTES FROM ORGANIC CHEMICAL PROCESSES
07 01 00	wastes from the manufacture, formulation, supply and use (MFSU) of basic organic chemicals
07 01 99	wastes not otherwise specified

- **Uncleaned packaging:**
- **Recommendation:** Disposal must be made according to official regulations.

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## SECTION 14: Transport information

<ul style="list-style-type: none"> <li>· <b>14.1 UN number or ID number</b></li> <li>· <b>ADR, ADN, IMDG, IATA</b></li> </ul>	not regulated
<ul style="list-style-type: none"> <li>· <b>14.2 UN proper shipping name</b></li> <li>· <b>ADR, ADN, IMDG, IATA</b></li> </ul>	not regulated
<ul style="list-style-type: none"> <li>· <b>14.3 Transport hazard class(es)</b></li> <li>· <b>ADR, ADN, IMDG, IATA</b></li> <li>· <b>Class</b></li> </ul>	not regulated
<ul style="list-style-type: none"> <li>· <b>14.4 Packing group</b></li> <li>· <b>ADR, IMDG, IATA</b></li> </ul>	not regulated
<ul style="list-style-type: none"> <li>· <b>14.5 Environmental hazards:</b></li> </ul>	Not applicable.
<ul style="list-style-type: none"> <li>· <b>14.6 Special precautions for user</b></li> </ul>	Not applicable.
<ul style="list-style-type: none"> <li>· <b>14.7 Maritime transport in bulk according to IMO instruments</b></li> </ul>	Not applicable.
<ul style="list-style-type: none"> <li>· <b>UN "Model Regulation":</b></li> </ul>	not regulated

## SECTION 15: Regulatory information

- **15.1 Safety, health and environmental regulations/legislation specific for the substance or mixture**
- **Inventory of Hazardous Chemicals** Substance is not listed.
- **Poisons Act**
- **Regulated explosives precursors** Substance is not listed.
- **Regulated poisons** Substance is not listed.
- **Reportable explosives precursors** Substance is not listed.
- **Reportable poisons** Substance is not listed.
- **Labelling according to Regulation (EC) No 1272/2008** Void
- **Hazard pictograms** Void
- **Signal word** Void
- **Hazard statements** Void
  
- **Directive 2012/18/EU**
- **Named dangerous substances - ANNEX I** Substance is not listed.
- **DIRECTIVE 2011/65/EU on the restriction of the use of certain hazardous substances in electrical and electronic equipment – Annex II**  
Substance is not listed.
- **REGULATION (EU) 2019/1148**
- **Annex I - RESTRICTED EXPLOSIVES PRECURSORS (Upper limit value for the purpose of licensing under Article 5(3))**  
Substance is not listed.
- **Annex II - REPORTABLE EXPLOSIVES PRECURSORS** Substance is not listed.
- **Regulation (EC) No 273/2004 on drug precursors** Substance is not listed.
- **Regulation (EC) No 111/2005 laying down rules for the monitoring of trade between the Community and third countries in drug precursors**  
Substance is not listed.
  
- **National regulations:**
  
- **Information about limitation of use:**  
Employment restrictions concerning juveniles must be observed.  
Employment restrictions concerning pregnant and lactating women must be observed.

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- **15.2 Chemical safety assessment:** A Chemical Safety Assessment has not been carried out.

## SECTION 16: Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship. The application, use and processing of our products are beyond our control and are therefore exclusively your responsibility.

- **Department issuing SDS:** Product management

- **Contact:** Product management

- **Version number of previous version:** 4

- **Abbreviations and acronyms:**

ADR: Accord relatif au transport international des marchandises dangereuses par route (European Agreement Concerning the International Carriage of Dangerous Goods by Road)

IMDG: International Maritime Code for Dangerous Goods

IATA: International Air Transport Association

GHS: Globally Harmonised System of Classification and Labelling of Chemicals

EINECS: European Inventory of Existing Commercial Chemical Substances

CAS: Chemical Abstracts Service (division of the American Chemical Society)

PBT: Persistent, Bioaccumulative and Toxic

vPvB: very Persistent and very Bioaccumulative

- **\* Data compared to the previous version altered.**

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