METTLER TOLEDO SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006 (amended by Regulation (EU) 2020/878)

Buffer solution pH 4.01

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

1.1. Product identifier

Product name Buffer solution pH 4.01

Product code 52118020, 52118101, 52118125, 51302069, 51302083, 51350004,

51350018, 51350032, 51350042

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

Use of the Substance/Mixture Laboratory chemicals

1.3. Details of the supplier of the safety data sheet

Company/Undertaking

Identification

Mettler-Toledo GmbH Im Langacher 44 CH-8606 Greifensee Switzerland

Tel: +41 22 567 53 22 Fax: +41 22 567 53 23 Email: ph.lab.support@mt.com

1.4. Emergency telephone

number

(24-Hour-Number): GBK GmbH +49 6132 84463

Revision date 28.04.2021

Version GHS 3 (Previous versions: GHS 2)

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008

The substance or mixture is not classified.

In accordance with Regulation (EC) No. 1272/2008, the product does not need to be classified nor labelled.

Additional information For the full text of the phrases mentioned in this Section, see

Section 16.



2.2. Label elements

Signal Word -

Hazard Statements None.

Precautionary statements None.

Supplemental information None.

Product identifier None.

2.3. Other hazards No hazards to be specially mentioned.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Buffer solution.

Components		CLP Classification	Product identifier
Deionised water	95% - 99%	-	CAS-No.: 7732-18-5 EC-No.: 231-791-2
Potassium hydrogen phthalate	1% - 2,5%	-	CAS-No.: 877-24-7 EC-No.: 212-889-4

For the full text of the phrases mentioned in this Section, see Section 16.

Hazardous impurities None known.

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation Move to fresh air in case of accidental inhalation of vapours or

decomposition products. Consult a physician for severe cases.

Skin contact Wash off immediately with soap and plenty of water while removing

all contaminated clothes and shoes. If skin irritation persists, call a

physician.

Eye contact Rinse thoroughly with plenty of water, also under the eyelids. If eye

irritation persists, consult a specialist.

Ingestion Rinse mouth. Consult a physician for severe cases.

4.2. Most important symptoms and effects, both acute and

delayed

If you feel unwell, seek medical advice (show the label where

possible).



Buffer solution pH 4.01 V. GHS 3 / 28.04.2021 Print Date 27.04.2021 Page 2/8 4.3. Indication of any immediate medical attention and special treatment needed

None known.

SECTION 5: Firefighting measures

5.1. Extinguishing media

carbon dioxide.

Extinguishing media which must not be used for safety reasons

None.

5.2. Special hazards arising from the substance or mixture

The product is not flammable. Use extinguishing measures that are appropriate to local circumstances and the surrounding

environment. Collect contaminated fire extinguishing water separately. This must not be discharged into drains.

5.3. Advice for firefighters

Special protective equipment for

firefighters

Standard procedure for chemical fires. In the event of fire, wear

self-contained breathing apparatus. Wear protective suit.

Specific methods Water mist may be used to cool closed containers.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Advice for non-emergency

personnel

Ensure adequate ventilation. Use personal protective equipment. Sweep up to prevent slipping hazard. Avoid contact with skin and

eyes. Do not breathe vapours/dust.

Advice for emergency

responders

Handle in accordance with good industrial hygiene and safety

practice. Use personal protective equipment. Sweep up to prevent

slipping hazard.

6.2. Environmental precautions Do not flush into surface water or sanitary sewer system.

6.3. Methods and material for containment and cleaning up

Soak up with inert absorbent material. Keep in suitable and closed

containers for disposal.

6.4. Reference to other sections See chapter 8 and 13.



SECTION 7: Handling and storage

7.1. Precautions for safe

handling

Wear personal protective equipment. Avoid contact with skin and

eyes.

7.2. Conditions for safe storage,

including any incompatibilities

Store at room temperature in the original container.

7.3. Specific end use(s) No information available.

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Exposure limit(s) No data is available on the product itself.

8.2. Exposure controls

Appropriate engineering controls Avoid contact with skin, eyes and clothing.

Personal protection equipment

Respiratory protection In case of good ventilation no personal respiratory protective

equipment required.

Hand protection Gloves made of latex. The selected protective gloves have to

> satisfy the specifications of Regulation (EU) No. 2016/425 and the standard EN 374 derived from it. Take note of the information given by the producer concerning permeability and break through times, and of special workplace conditions (mechanical strain, duration of

contact).

Eye protection Safety glasses with side-shields conforming to EN166.

Skin and body protection Long sleeved clothing.

Thermal hazards No special measures required.

Environmental exposure controls Prevent product from entering surface water or sewage.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state Liquid. Colour Red. None. Odour

Melting point/ freezing point: Not determined.

Buffer solution pH 4.01 V. GHS 3 / 28.04.2021 Print Date 27.04.2021 Page 4/8



Boiling point or initial boiling Not determined.

point / range:

Flammability: Not determined.
Lower and upper explosion limit: Not determined.
Flash point: Not determined.
Auto-ignition temperature: Not determined.
Decomposition temperature: Not determined.

pH:

Kinematic viscosity: Not determined.

Solubility: completely miscible (Water)

Partition coefficient n- Not determined.

octanol/water (log value):

Vapour pressure:

Density and/or relative density:

Relative vapour density:

Particle characteristics:

Not determined.

Not determined.

Not applicable.

9.2. Other information

SECTION 10: Stability and reactivity

10.1. Reactivity No information available.

10.2. Chemical stability Stable at normal conditions.

10.3. Possibility of hazardous

reactions

No information available.

10.4. Conditions to avoid Not required.

10.5. Incompatible materials None.

10.6. Hazardous decomposition

products

None reasonably foreseeable.

SECTION 11: Toxicological information

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

Acute toxicityNo data is available on the product itself.

Deionised water (CAS 7732-18-5)

Oral LD50 Rat > 90 mL/kg (FOOD_JOURN) **Potassium hydrogen phthalate (CAS 877-24-7)**

Oral LD50 Rat > 3200 mg/kg (NLM_CIP)

Skin corrosion/irritationNo skin irritation.

Serious eye damage/eye

irritation

No eye irritation.

Respiratory / Skin Sensitisation None.

Buffer solution pH 4.01 V. GHS 3 / 28.04.2021 Print Date 27.04.2021 Page 5/8



Carcinogenicity No data available.

Germ cell mutagenicity No data available.

Reproductive toxicity No data available.

Specific target organ toxicity

(single exposure)

No data available.

Specific target organ toxicity

(repeated exposure)

No data available.

Aspiration hazard No data available.

Human experience No data available.

11.2. Information on other hazards

Information on likely routes of

exposure

dermal

Other information The product contains no substances which at their given

concentration, are considered to be hazardous to health.

SECTION 12: Ecological information

12.1. Toxicity No data is available on the product itself.

12.2. Persistence and

degradability

Expected to be biodegradable.

12.3. Bioaccumulative potential Bioaccumulation is unlikely.

12.4. Mobility in soil No data available.

12.5. Results of PBT and vPvB

assessment

This preparation contains no substance considered to be persistent,

bioaccumulating nor toxic (PBT).

12.6. Endocrine disrupting

properties

No information available.

12.7. Other adverse effects No information available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods



Waste from residues / unused

products

Dispose of in accordance with local regulations. Used product, diluted with water, is not dangerous waste according to European

Waste Code.

Contaminated packaging Dispose of as unused product.

SECTION 14: Transport information

14.1. UN number or ID number Not applicable.

14.2. UN proper shipping name Not applicable.

14.3. Transport hazard class(es) Not applicable.

14.4. Packing group Not applicable.

14.5. Environmental hazards Not applicable.

14.6. Special precautions for

user

Not applicable.

14.7. Maritime transport in bulk

according to IMO instruments

Not applicable.

UN Model Regulations

Not regulated. ADR/RID

IMDG Not regulated.

IATA Not regulated.

Further Information Not classified as dangerous in the meaning of transport regulations.

SECTION 15: Regulatory information

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

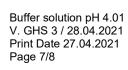
Regulatory Information In accordance with Regulation (EC) No. 1272/2008, the product

does not need to be classified nor labelled.

Potassium hydrogen phthalate (CAS 877-24-7)		
EU - REACH (1907/2006) - List of	Present	
Registered Substances		

15.2. Chemical safety assessment

Not required.





SECTION 16: Other information

Revision Note Safety datasheet sections which have been updated: 3, 11, 13, 15.

Key or legend to abbreviations and acronyms

CLP: Classification according to Regulation (EC) No. 1272/2008

(GHS)

Key literature references and

Information taken from reference works and the literature.

sources for data

Classification procedure

Calculation method.

Full text of phrases referred to under sections 2 and 3

None.

Disclaimer

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release. It is not to be considered a warranty or quality specification.

