Date of issue : 9 September, 2003 Date of revision : 28 March, 2017

Safety Data Sheet

1. Product and company identification

Product name : Rutin trihydrate

Name of manufacturer : KANTO CHEMICAL CO. . INC.

Address : 2-1, Nihonbashi, Muromachi 2-Chome, Chuo-Ku, Tokyo, 103-0022, Japan

Name of section : Reagent division, catalog and products information section

Telephone number : +81-3-6214-1090Facsimile number : +81-3-3241-1047Mail address : BC32@gms, kanto, co. ip

SDS No. : 36508

2. Summary of danger and Hazard

GHS classification

Physical and chemical hazard

Flammable solids : Out of category Pyrophoric solids : Out of category

Human health hazard

Skin corrosion • Irritation

: Out of category

3. Composition/Information on ingredients

Substance/Mixture : Substance

Chemical name or commercial name

: Rutin trihydrate

Ingredients and composition

: Rutin trihydrate min. 97.0%

Chemical formula : C27H30016 • 3H20

CAS No. : 153-18-4
TSCA Inventory : Registered
EINECS No. : 2058141

4. First aid measures

Inhalation : Remove the victim to fresh air, and make him blow his nose and gargle.

Skin contact : Wash the affected areas under running water. Eye contact : Wash the affected areas under running water.

Ingestion : Give the victim water or salt water and induce vomiting. If necessary,

get medical attention.

5. Fire fighting measures

Extinguishing media : Water, dry chemical powder, carbon dioxide, dry sand, foam

Prohibited extinguishing media

: None



<< No.36508 Rutin trihydrate >> P.2 / 4

Date of issue : 9 September, 2003 Date of revision : 28 March, 2017

Particular fire fighting : Move containers from fire area if it can be done without risk, if not

possible, apply water from a safe distance to cool and protect

surrounding area.

Protection for firefighters

: Firefighters should wear protective equipment.

6. Accidental release measures

Cautions for personnel : Wear proper equipment and avoid contact with skin and inhalation of

dust. Keep away personnel except for authorized ones from spillage

area by stretching ropes.

Cautions for environment : Attention should be given not to cause damage to the environment by

flowing of spillage to rivers. In case of the dilution of copious water, do not cause damage to the environment by untreated wastewater.

Removal measure : Sweep up the chemical and place in a chemical waste container.

7. Cautions of handling and storage

Handling

Engineering measures : If necessary, wear proper protective equipment not to contact with

skin or inhale the dust.

Cautions for safety handling

: Handle the chemical not to generate aerosol or dust.

Storage

Adequate storage condition

: Store in a dark, cool place and tightly closed.

Safety adequate container materials

: Glass, polyethylene, polypropylene

8. Exposure control/Personal protection

Engineering measures : Use only with adequate ventilation and in closed systems.

Control parameters

ACGIH(2009) : Not established

Protective equipment

Respiration protective equipment

: If necessary, wear dust mask

Hands protective equipment

: Impervious protective gloves

Eyes protective equipment

: Safety goggles

9. Physical and chemical properties

Appearance : Powder

Color : Pale yellow - yellowish green

Odor : Odorless or slight characteristic odor

pH : Not available Boiling point : Not available

Melting point : Decomposition(211-215°C)

Date of issue : 9 September, 2003 Date of revision : 28 March, 2017

Specific gravity : Not available

Solubility

Solubility in solvents : Water ; Insoluble

Organic solvents ; Easily soluble in pyridine, soluble in methanol,

slightly soluble in glycerol.

10. Stability and reactivity

Stability : Stable under normal usage.

Reactivity : May react with strong oxidizing substances.

Incompatible conditions : Light, heat

Incompatible materials : Oxidizing substances

Hazardous decomposition products

: Carbon monoxide

11. Toxicological information

Acute toxicity : Oral : Not possible to classify because of insufficient data.

Dermal: Not possible to classify because of insufficient data.

Inhalation(vapor) : Not possible to classify because of insufficient

data.

Inhalation(dust, mist): Not possible to classify because of

insufficient data.

Skin corrosiveness : Out of category

Based on evidence of mild skin irritation, the substance was set into

out of category,

Irritation to skin, eyes : Not possible to classify because of insufficient data.

Respiratory sensitization or Skin sensitization

Respiratory sensitization: Not possible to classify because of

insufficient data.

Skin sensitization: Not possible to classify because of insufficient

data.

Mutagenicity : Not possible to classify because of insufficient data.

Carcinogenic effects : Not possible to classify because of insufficient data

Effects on the reproductive system

: Not possible to classify because of insufficient data.

Specific target organ systemic toxicity single exposure

: Not possible to classify because of insufficient data.

Specific target organ systemic toxicity repeated exposure

: Not possible to classify because of insufficient data.

Aspiration hazard : Not possible to classify because of insufficient data.

12. Ecological information

Ecotoxicity

Fish toxicity : Acute aquatic toxicity : Not possible to classify because of

insufficient data.

Chronic aquatic toxicity: Not possible to classify because of

insufficient data.

Rediualbility and degradability

: Not available



<< No.36508 Rutin trihvdrate >> P.4 / 4

Date of issue : 9 September, 2003 Date of revision : 28 March, 2017

Ecorediualbility : Not available

13. Disposal consideration

Residual disposal : Mixed with flammable organic solvents and burn in a chemical

incinerator equipped with an afterburner and a scrubber. Or entrust

approved waste disposal companies with the disposal.

Containers : In case of disposal of empty bottles, dispose bottles after removing

the content thoroughly.

14. Transport information

UN class : It is not regulated under UN regulations.

15. Regulatory information

Ensure this material in compliance with federal requirements and

ensure conformity to local regulations.

16. Other information

References Dictionary of Organic Compounds, The society of Synthetic Organic

Chemistry, Kodansha Ltd. (1985)

The information contained herein is based on several references and the present state of our knowledge. However the SDS does not always cover all information about the product, handle the product carefully. The information is intended to ordinary usage, in case of particular handlings, conduct appropriate safety measurements. The information herein is only provision of information, and it does not represent a guarantee the properties of the product. The Safety Data Sheet (SDS) is prepared based on JIS Z7253, and it has the same required elements on the Material Safety Data Sheet (MSDS) which is prepared based on JIS Z7250:2010.