

Safety Data Sheet

Section 1. Identification of the substance/mixture and of the company/undertaking

Product identifier:

Product name : Ion Exchange Resins WC-3
Product code (SDS NO) : BQN-G-41415_US-1
Relevant identified uses of the product : Ion exchange
Uses advised against : Do not use for any purpose other than that recommended.

Details of the supplier of the safety data sheet

Manufacturer/Supplier : Mitsubishi Electric Corporation
Address : 5-1-14, Yada-minami, Higashi-ku, Nagoya-shi, Aichi 461-8670, Japan
Division : Laser Systems Dept.
Telephone number : +81-52-721-2111
FAX : +81-52-721-1941

Section 2. Hazards identification

GHS classification and label elements of the product

Classification of the substance or mixture

Classification according to Hazard Communication Standard - 2012 (29 CFR 1910.1200)

HEALTH HAZARDS

Serious eye damage/eye irritation: Category 1

(Note) GHS classification without description: Not classified/Classification not possible

Label elements

Labelling according to Hazard Communication Standard - 2012 (29 CFR 1910.1200)



Signal word: Danger

HAZARD STATEMENT

H318 Causes serious eye damage

PRECAUTIONARY STATEMENT

Prevention

P280 Wear eye protection/face protection.

Response

P310 Immediately call a POISON CENTER/doctor/physician.

P305 + P351 + P338 IF IN EYES: Rinse cautiously with water for several minutes.

Remove contact lenses, if present and easy to do. Continue rinsing.

Section 3. Composition/information on ingredients

Mixture/Substance selection:

Mixture

Ingredient name	CAS No.	Content (%)
Water	7732-18-5	40 - 60
Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, sulfonated	69011-20-7	20 - 30
Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, chloromethylated, trimethylamine-quaternized, hydroxide	69011-18-3	20 - 30

Note : The figures shown above are not the specifications of the product.

The specific chemical identity and/or exact percentage (concentration) of this composition has been withheld as a trade secret.

Section 4. First-aid measures

Descriptions of first-aid measures

IF INHALED

Remove person to fresh air and keep comfortable for breathing.

Call a POISON CENTER/doctor/physician if you feel unwell.

IF ON SKIN (or hair)

Wash with plenty of soap and water.

If skin irritation occurs: Get medical advice/attention.

IF IN EYES

Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do.

Continue rinsing.

Rinse in order to better reach all parts of eyes.

Get medical advice/attention immediately.

IF SWALLOWED

Rinse mouth.

If victim is conscious, give 1 - 2 glasses of water.

Call a POISON CENTER/doctor/physician if you feel unwell.

Most important symptoms and effects, both acute and delayed

(Symptoms when inhalation or ingestion)

Inhalation : Respiratory irritation

(Symptoms when skin and/or eye contact)

Skin : Irritation

Eyes : Severe damage, Conjunctival redness, Tearing

Protective measures for first aid

Protect yourself by wearing rubber gloves and air-tight safety goggles.

Indication of any immediate medical attention and special treatment needed

Treat symptomatically.

Section 5. Fire-fighting measures

Extinguishing media

Suitable extinguishing media

In case of fire, use water mist, foam, dry powder, CO2 to extinguish.

Unsuitable extinguishing media

Unsuitable extinguishing media data is not available.

Specific hazards arising from the substance or mixture

Will form toxic carbon oxides, nitrogen oxides, sulfur oxides, hydrogen chloride, hydrocarbons, chlorine compounds upon combustion.

Advice for firefighters

Specific fire-fighting measures

Evacuate non-essential personnel to safe area.

Cool container with water spray.

Move containers from fire area if this can be done without risk.

Extinguish from the windward to the extent possible.

Special protective equipment and precautions for fire-fighters

Wear protective gloves/protective clothing/eye protection/face protection.

Firefighters should wear self-contained breathing apparatus with a full facepiece operated in the positive pressure mode.

Section 6. Accidental release measures

Personnel precautions, protective equipment and emergency procedures

Keep unauthorized personnel away.

Ventilate area until material pick up is complete.

Wear proper protective equipment.

Be careful not to slip on spilled area.

Stop leak if safe to do so.

Environmental precautions

Prevent spills from entering sewers, watercourses or low areas.

Do not wash away into sewers or waterway.

Avoid raising dust.

Methods and materials for containment and cleaning up

Sweep up, place in a bag and hold for waste disposal.

Fill the disposal into labelled, closable containers.

Section 7. Handling and storage

Precautions for safe handling

Preventive measures

(Exposure Control for handling personnel)

Avoid breathing dust.

(Safety treatments)

Avoid contact with skin.

Avoid contact with eyes.

Prevent generation and deposition of dust.

Safety Measures

Use only outdoors or in a well-ventilated area.

Wear eye protection/face protection.

Use personal protective equipment as required.

Any incompatibilities

Strong oxidizing agents, Nitric acid should not be mixed with the chemicals.

Advice on general occupational hygiene

Do not get in eyes, on skin, or on clothing.

Do not eat, drink or smoke when using this product.

Wash hands thoroughly after handling.

Storage

Conditions for safe storage

Store in a well-ventilated place. Keep container tightly closed.

Keep cool. Protect from sunlight.

Store in a dry place.

Protect from freezing.

(Incompatible storage condition)

Avoid direct sunlight, heat and sources of ignition (flames, sparks, etc.).

Container and packaging materials for safe handling data is not available.

Section 8. Exposure controls/personal protection

Control parameters

Adopted value

Adopted value in ACGIH is not available.

OSHA-PEL value is not available.

NIOSH-REL value is not available.

Exposure controls

Appropriate engineering controls

Do not use in areas without adequate ventilation.

Eye wash station should be available.

Washing facilities should be available.

Individual protection measures

Respiratory protection

In case of inadequate ventilation wear respiratory protection.

Hand protection

Wear protective gloves. Recommended material(s): neoprene, nitrile, PVC

Eye protection

Wear safety glasses with side-shields or chemical safety goggle.

Skin and body protection

Wear protective clothing.

Section 9. Physical and Chemical Properties

Information on basic physical and chemical properties

Physical state : Solid (Beads)

Color : Reddish brown

Odor : None

Odor threshold data is not available.

Melting point/Freezing point data is not available.

Boiling point or initial boiling point data is not available.

Boiling range data is not available.

Flammability (gases, liquids and solids) data is not available.

Lower and upper explosion limit/flammability limit data is not available.

Flash point data is not available.

Auto-ignition temperature : 500°C(Estimation value)

Decomposition temperature data is not available.

pH data is not available.

Kinematic viscosity : Not applicable

Solubility :

Solubility in water : Insoluble

Solubility in solvent data is not available.

n-Octanol/water partition coefficient data is not available.

Vapor pressure data is not available.

Density and/or relative density data is not available.

Relative vapor density (Air=1) data is not available.

Particle characteristics data is not available.

Evaporation rate data is not available.

Section 10. Stability and Reactivity

Reactivity

Reactivity data is not available.

Chemical stability

Stable under normal storage/handling conditions.

Possibility of hazardous reactions

Possibility of hazardous reactions data is not available.

Conditions to avoid

Conditions to avoid data is not available.

Incompatible materials

Strong oxidizing agents, Nitric acid

Hazardous decomposition products

The following substances are produced by pyrolysis.

Carbon oxides, Nitrogen oxides, Sulfur oxides, Hydrogen chloride, Hydrocarbons, Chlorine compounds

Section 11. Toxicological Information

Information on toxicological effects

Acute toxicity

Acute toxicity (Oral)

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Acute toxicity (Dermal)

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Acute toxicity (Inhalation)

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Irritant properties

Skin corrosion/irritation

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Serious eye damage/irritation

[Product]

Category 1, Causes serious eye damage

[Data for components of the product]

[Company proprietary data]

(Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, sulfonated)

Mild irritation (Supplier's SDS)

(Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, chloromethylated, trimethylamine-quaternized, hydroxide)

Severe eye irritation (Supplier's SDS)

Sensitization

Respiratory sensitization

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Skin sensitization

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Germ cell mutagenicity

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Carcinogenicity

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Reproductive toxicity

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Specific target organ toxicity (STOT)

STOT-single exposure

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

STOT-repeated exposure

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Aspiration hazard

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Section 12. Ecological Information

Toxicity

Aquatic toxicity

[Product]

Classification not possible (Insufficient data available or no data available).

[Data for components of the product]

No data available.

Persistence and degradability

Persistence and degradability data is not available.

Bioaccumulative potential

Bioaccumulative potential data is not available.

Mobility in soil

Mobility in soil data is not available.

Other adverse effects

Ozone depleting chemical data is not available.

Section 13. Disposal considerations

Description of waste residues and information on their safe handling and methods of disposal, including the disposal of any contaminated packaging

Waste treatment methods

Dispose of contents/container in accordance with local/national regulation.

Dispose to an authorized waste collection point.

Do not dump into sewers, on the ground or into any body of water.

Contaminated packing

Dispose of container after using the contents completely.

Section 14. Transport Information

UN No., UN CLASS

UN Number or ID Number : Not regulated
UN Proper Shipping Name : Not regulated
Class or division (Transport hazard class) : Not regulated
Packing group : Not regulated

IMDG Code (International Maritime Dangerous Goods Regulations)

UN Number or ID Number : Not regulated
UN Proper Shipping Name : Not regulated
Class or division (Transport hazard class) : Not regulated
Packing group : Not regulated

IATA (Dangerous Goods Regulations)

UN Number or ID Number : Not regulated
UN Proper Shipping Name : Not regulated
Class or division (Transport hazard class) : Not regulated
Packing group : Not regulated

Environmental hazards

Marine pollutants (yes/no) : no

Special precautions for user

Special precautions for user is not applicable.

Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not applicable to Transport in bulk according to Annex II of MARPOL and the IBC Code

MARPOL Annex V - HME (Harmful to the Marine Environment)

Not applicable to Maritime transport in bulk according to IMO instruments.

Section 15. Regulatory Information

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

U.S. Toxic Substances Control Act (TSCA) Inventory

Chemicals listed in TSCA Inventory

Water;

Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, chloromethylated,
trimethylamine-quaternized, hydroxide;

Benzene, diethenyl-, polymer with styrene and ethenylethylbenzene, sulfonated

Superfund Amendments and Reauthorizations Act (SARA), Title III

This product contains no chemicals subjected to reporting levels established by SARA Title III,
Section 313.

California proposition 65

This product does not contain any chemicals known to State of California to cause cancer,
birth defects, or any other reproductive harm.

Other regulatory information

We are not able to check up the regulatory information with regard to the substances in your country or region, therefore, we request this matter would be filled by your responsibility.

Section 16. Other information

GHS classification and labelling

Serious eye damage/eye irritation, Category 1: H318 Causes serious eye damage

References and sources for data

Globally Harmonized System of classification and labelling of chemicals, UN
Recommendations on the TRANSPORT OF DANGEROUS GOODS 22nd edit., 2021 UN
IMDG Code, 2022 Edition (Incorporating Amendment 41-22)
IATA Dangerous Goods Regulations (65th Edition) 2024
2020 EMERGENCY RESPONSE GUIDEBOOK (US DOT)
2024 TLVs and BEIs. (ACGIH)
Supplier's data/information
Hazard Communication Standard - 2012 (29 CFR 1910.1200)
GESTIS-Stoffdatenbank
Pub Chem (OPEN CHEMISTRY DATABASE)

General Disclaimer

The GHS classification data given here is based on current EU official data (Consolidated version of the CLP Regulation published in 17/12/2022 and Commission delegated regulation (EU) 2022/692 (ATP18)) & US Hazard Communication Standard - 2012.

This data sheet was created based on the information we currently have and may be revised according to new information. In addition, the precautions apply only to normal handling, and in the case of special handling, please make adequate countermeasure to maintain your safety. But the data are partially changed based on our judgement.