



Printing date 22.09.2010 Revision: 22.09.2010

### 1 Identification of the substance/preparation and of the company/undertaking

- · Product details
- · Name of chemical substance: Steel standard sample JSS SS-2
- · Article number: 3012078108
- · MSDS No: 139
- · Application of the substance / the preparation Standard sample
- · Manufacturer/Supplier:

HORIBA, Ltd.

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- · Further information obtainable from: Automated Analytical Instruments R&D Dept.
- · Information in case of emergency: During normal opening times: +81 75 313-8121

## 2 Hazards identification

- · Hazard description: Not applicable.
- · Information concerning particular hazards for human and environment: Not applicable.
- · GHS label elements Void

### 3 Composition/information on ingredients

- · Chemical characterization:
- · CAS No. Description 7439-89-6 Iron
- · Chemical characterization
- · Components:

CAS: 7439-89-6 iron EINECS: 231-096-4 >99,9%

## 4 First aid measures

- · General information: No special measures required.
- · After inhalation: Supply fresh air; consult doctor in case of complaints.
- After skin contact: Generally the product does not irritate the skin.
- · After eye contact: Rinse opened eye for several minutes under running water.
- · After swallowing: If symptoms persist consult doctor.

## 5 Fire-fighting measures

· Suitable extinguishing agents:

CO2, powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

· Protective equipment: No special measures required.

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#### 6 Accidental release measures

- · Person-related safety precautions: Not required.
- · Measures for environmental protection: Do not allow to enter sewers/ surface or ground water.
- · Measures for cleaning/collecting: Pick up mechanically.
- · Additional information: No dangerous substances are released.

## 7 Handling and storage

- · Handling:
- · Information for safe handling: No special measures required.
- · Information about fire and explosion protection: No special measures required.
- · Storage:
- Requirements to be met by storerooms and receptacles: No special requirements.
- · Information about storage in one common storage facility: Not required.
- · Further information about storage conditions: None.

## 8 Exposure controls/personal protection

- · Additional information about design of technical facilities: No further data; see item 7.
- · Ingredients with limit values that require monitoring at the workplace: Not required.
- · Additional information: The lists valid during the making were used as basis.
- · Personal protective equipment:
- · General protective and hygienic measures:

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

- · Respiratory protection: Not required.
- · Protection of hands:

The glove material has to be impermeable and resistant to the product/ the substance/ the preparation.

Due to missing tests no recommendation to the glove material can be given for the product/ the preparation/ the chemical mixture.

Selection of the glove material on consideration of the penetration times, rates of diffusion and the degradation

· Material of gloves

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.

· Eye protection: Not required.

# 9 Physical and chemical properties

# · General Information

Form: Solid material Colour: Silver grey

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Odourless

· Change in condition

Melting point/Melting range: > 1000°C Boiling point/Boiling range: 2001°C

• Flash point: Not applicable.

· Flammability (solid, gaseous): Product is not flammable.

• Danger of explosion: Product does not present an explosion hazard.

· Density: Not determined.

· Solubility in / Miscibility with

water: Insoluble.

## 10 Stability and reactivity

- · Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
- · Materials to be avoided:
- · Dangerous reactions No dangerous reactions known.
- · Dangerous decomposition products: No dangerous decomposition products known.

## 11 Toxicological information

- · Acute toxicity:
- · Primary irritant effect:
- · on the skin: No irritant effect.
- · on the eye: No irritating effect.
- · Sensitization: No sensitizing effects known.
- · Additional toxicological information:

When used and handled according to specifications, the product does not have any harmful effects to our experience and the information provided to us.

The substance is not subject to classification according to the latest version of the EU lists.

### 12 Ecological information

- · Additional ecological information:
- · General notes:

Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.

# 13 Disposal considerations

- · Product:
- · Recommendation Smaller quantities can be disposed of with household waste.

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

## 14 Transport information

- · Land transport ADR/RID (cross-border)
- · ADR/RID class: -
- · Maritime transport IMDG:
- · Marine pollutant: No
- · UN "Model Regulation": -

## 15 Regulatory information

· Labelling according to EU guidelines:

Observe the general safety regulations when handling chemicals.

The substance is not subject to classification according to EU lists and other sources of literature known to us.

- · National regulations:
- · Waterhazard class: Water hazard class 1 (Assessment by list): slightly hazardous for water.

### 16 Other information

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- · Department issuing MSDS: Scientific /Semiconductor Instruments & Systems Division
- · Abbreviations and acronyms:

ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)

RID: Règlement international concernant le transport des marchandises dangereuses par chemin de fer (Regulations Concerning the International Transport of Dangerous Goods by Rail)

IMDG: International Maritime Code for Dangerous Goods

GHS: Globally Harmonized 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)

- · Sources Chem DAT(Merck)
- \* \* Data compared to the previous version altered.

Data Apr. 14, 2010

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