

## SAFETY DATA SHEET

### HYDROCHLORIC ACID 2M

According to UK REACH.

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

##### 1.1. Product identifier

Product name HYDROCHLORIC ACID 2M

Product number 1041

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

Identified uses Laboratory reagent.

Uses advised against No specific uses advised against are identified.

##### 1.3. Details of the supplier of the safety data sheet

Supplier Reagent Chemical Services  
11b - 13 Aston Fields Road  
Whitehouse Industrial Estate  
Runcorn  
Cheshire WA7 3DL  
T: 01928 716903 (08.30 - 17.00)  
F: 01928 716425  
E: [info@reagent.co.uk](mailto:info@reagent.co.uk)

##### 1.4. Emergency telephone number

Emergency telephone OHES Environmental Ltd 24-7  
Tel. 0333 333 9939 (24 hour)

#### SECTION 2: Hazards identification

##### 2.1. Classification of the substance or mixture

###### Classification (EC 1272/2008)

Physical hazards Met. Corr. 1 - H290

Health hazards Not Classified

Environmental hazards Not Classified

##### 2.2. Label elements

###### Hazard pictograms



Signal word Warning

Hazard statements H290 May be corrosive to metals.

Precautionary statements P234 Keep only in original packaging.  
P390 Absorb spillage to prevent material damage.

##### 2.3. Other hazards

## HYDROCHLORIC ACID 2M

This product does not contain any substances classified as PBT or vPvB.

### SECTION 3: Composition/information on ingredients

#### 3.2. Mixtures

<b>HYDROCHLORIC ACID ...%</b>	<b>5-10%</b>
CAS number: 7647-01-0	EC number: 231-595-7
	REACH registration number: 01-2119484862-27-XXXX

#### Classification

Met. Corr. 1 - H290  
 Skin Corr. 1B - H314  
 Eye Dam. 1 - H318  
 STOT SE 3 - H335

The Full Text for all R-Phrases and Hazard Statements are Displayed in Section 16.

### SECTION 4: First aid measures

#### 4.1. Description of first aid measures

<b>General information</b>	Get medical attention immediately. Show this Safety Data Sheet to the medical personnel.
<b>Inhalation</b>	Remove affected person from source of contamination. Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Maintain an open airway. Loosen tight clothing such as collar, tie or belt. When breathing is difficult, properly trained personnel may assist affected person by administering oxygen. Place unconscious person on their side in the recovery position and ensure breathing can take place.
<b>Ingestion</b>	Rinse mouth thoroughly with water. Remove any dentures. Stop if the affected person feels sick as vomiting may be dangerous. Do not induce vomiting unless under the direction of medical personnel. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Never give anything by mouth to an unconscious person. Move affected person to fresh air and keep warm and at rest in a position comfortable for breathing. Place unconscious person on their side in the recovery position and ensure breathing can take place. Maintain an open airway. Loosen tight clothing such as collar, tie or belt.
<b>Skin contact</b>	Rinse with water.
<b>Eye contact</b>	Rinse immediately with plenty of water. Remove contact lenses, if present and easy to do. Continue rinsing. Continue to rinse for at least 10 minutes.
<b>Protection of first aiders</b>	First aid personnel should wear appropriate protective equipment during any rescue.

#### 4.2. Most important symptoms and effects, both acute and delayed

<b>General information</b>	See Section 11 for additional information on health hazards. The severity of the symptoms described will vary dependent on the concentration and the length of exposure.
<b>Inhalation</b>	May cause respiratory irritation. Prolonged inhalation of high concentrations may damage respiratory system.
<b>Ingestion</b>	Gastrointestinal symptoms, including upset stomach. Ingestion may cause severe irritation of the mouth, the oesophagus and the gastrointestinal tract. Nausea, vomiting.
<b>Skin contact</b>	May cause irritation. Prolonged contact may cause dryness of the skin.
<b>Eye contact</b>	May cause temporary eye irritation.

#### 4.3. Indication of any immediate medical attention and special treatment needed

<b>Notes for the doctor</b>	Treat symptomatically.
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## HYDROCHLORIC ACID 2M

**Specific treatments** Treat symptomatically.

### SECTION 5: Firefighting measures

#### 5.1. Extinguishing media

**Suitable extinguishing media** The product is not flammable. Extinguish with alcohol-resistant foam, carbon dioxide, dry powder or water fog. Use fire-extinguishing media suitable for the surrounding fire.

**Unsuitable extinguishing media** Do not use water jet as an extinguisher, as this will spread the fire.

#### 5.2. Special hazards arising from the substance or mixture

**Hazardous combustion products** Thermal decomposition or combustion products may include the following substances: Harmful gases or vapours. Chlorine.

#### 5.3. Advice for firefighters

**Protective actions during firefighting** Avoid breathing fire gases or vapours. Evacuate area. Cool containers exposed to heat with water spray and remove them from the fire area if it can be done without risk. Cool containers exposed to flames with water until well after the fire is out. If a leak or spill has not ignited, use water spray to disperse vapours and protect men stopping the leak. Control run-off water by containing and keeping it out of sewers and watercourses. If risk of water pollution occurs, notify appropriate authorities.

**Special protective equipment for firefighters** Wear positive-pressure self-contained breathing apparatus (SCBA) and appropriate protective clothing. Firefighter's clothing conforming to European standard EN469 (including helmets, protective boots and gloves) will provide a basic level of protection for chemical incidents.

### SECTION 6: Accidental release measures

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

**Personal precautions** No action shall be taken without appropriate training or involving any personal risk. Keep unnecessary and unprotected personnel away from the spillage. Wear protective clothing as described in Section 8 of this safety data sheet. Follow precautions for safe handling described in this safety data sheet. Wash thoroughly after dealing with a spillage. Ensure procedures and training for emergency decontamination and disposal are in place. Do not touch or walk into spilled material.

**For emergency responders** Wear protective clothing as described in Section 8 of this safety data sheet. Wash thoroughly after dealing with a spillage.

#### 6.2. Environmental precautions

**Environmental precautions** Large Spillages: Inform the relevant authorities if environmental pollution occurs (sewers, waterways, soil or air).

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

## HYDROCHLORIC ACID 2M

### Methods for cleaning up

Wear protective clothing as described in Section 8 of this safety data sheet. Clear up spills immediately and dispose of waste safely. Approach the spillage from upwind. Small Spillages: If the product is soluble in water, dilute the spillage with water and mop it up. Alternatively, or if it is not water-soluble, absorb the spillage with an inert, dry material and place it in a suitable waste disposal container. Large Spillages: If leakage cannot be stopped, evacuate area. Flush spilled material into an effluent treatment plant, or proceed as follows. Contain and absorb spillage with sand, earth or other non-combustible material. Place waste in labelled, sealed containers. Clean contaminated objects and areas thoroughly, observing environmental regulations. The contaminated absorbent may pose the same hazard as the spilled material. Flush contaminated area with plenty of water. Wash thoroughly after dealing with a spillage. The requirements of the local water authority must be complied with if contaminated water is flushed directly to the sewer. Dispose of waste to licensed waste disposal site in accordance with the requirements of the local Waste Disposal Authority.

### 6.4. Reference to other sections

**Reference to other sections** For personal protection, see Section 8. See Section 11 for additional information on health hazards. See Section 12 for additional information on ecological hazards. For waste disposal, see Section 13.

## SECTION 7: Handling and storage

### 7.1. Precautions for safe handling

#### Usage precautions

Read and follow manufacturer's recommendations. Wear protective clothing as described in Section 8 of this safety data sheet. Keep away from food, drink and animal feeding stuffs. Handle all packages and containers carefully to minimise spills. Keep container tightly sealed when not in use. Avoid the formation of mists. Do not handle until all safety precautions have been read and understood. Do not handle broken packages without protective equipment. Do not reuse empty containers.

#### Advice on general occupational hygiene

Wash promptly if skin becomes contaminated. Take off contaminated clothing. Wash contaminated clothing before reuse. Do not eat, drink or smoke when using this product. Wash at the end of each work shift and before eating, smoking and using the toilet. Change work clothing daily before leaving workplace.

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

#### Storage precautions

Store away from incompatible materials (see Section 10). Store in accordance with local regulations. Store away from the following materials: Alkalis. Keep only in the original container. Keep container tightly closed, in a cool, well ventilated place. Keep containers upright. Protect containers from damage. Bund storage facilities to prevent soil and water pollution in the event of spillage. The storage area floor should be leak-tight, jointless and not absorbent.

#### Storage class

Chemical storage.

### 7.3. Specific end use(s)

#### Specific end use(s)

The identified uses for this product are detailed in Section 1.2.

## SECTION 8: Exposure controls/Personal protection

### 8.1. Control parameters

#### Occupational exposure limits

#### HYDROCHLORIC ACID ...%

Long-term exposure limit (8-hour TWA): WEL 1 ppm 2 mg/m<sup>3</sup> gas and aerosol mists

Short-term exposure limit (15-minute): WEL 5 ppm 8 mg/m<sup>3</sup> gas and aerosol mists

WEL = Workplace Exposure Limit.

## HYDROCHLORIC ACID 2M

### HYDROCHLORIC ACID ...% (CAS: 7647-01-0)

#### DNEL

Workers - Inhalation; Long term local effects: 8 mg/m<sup>3</sup>

Workers - Inhalation; Short term local effects: 15 mg/m<sup>3</sup>

General population - Inhalation; Long term local effects: 8 mg/m<sup>3</sup>

General population - Inhalation; Short term local effects: 15 mg/m<sup>3</sup>

### 8.2. Exposure controls

#### Protective equipment



#### Appropriate engineering controls

Provide adequate ventilation. Personal, workplace environment or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Use process enclosures, local exhaust ventilation or other engineering controls as the primary means to minimise worker exposure. Personal protective equipment should only be used if worker exposure cannot be controlled adequately by the engineering control measures. Ensure control measures are regularly inspected and maintained. Ensure operatives are trained to minimise exposure.

#### Eye/face protection

Eyewear complying with an approved standard should be worn if a risk assessment indicates eye contact is possible. Personal protective equipment for eye and face protection should comply with European Standard EN166. Unless the assessment indicates a higher degree of protection is required, the following protection should be worn: Tight-fitting safety glasses.

#### Hand protection

Chemical-resistant, impervious gloves complying with an approved standard should be worn if a risk assessment indicates skin contact is possible. To protect hands from chemicals, gloves should comply with European Standard EN374. Considering the data specified by the glove manufacturer, check during use that the gloves are retaining their protective properties and change them as soon as any deterioration is detected. Frequent changes are recommended. It is recommended that gloves are made of the following material: Nitrile rubber. Butyl rubber. The breakthrough time for any glove material may be different for different glove manufacturers. The most suitable glove should be chosen in consultation with the glove supplier/manufacturer, who can provide information about the breakthrough time of the glove material.

#### Other skin and body protection

Appropriate footwear and additional protective clothing complying with an approved standard should be worn if a risk assessment indicates skin contamination is possible.

#### Hygiene measures

Provide eyewash station and safety shower. Contaminated work clothing should not be allowed out of the workplace. Wash contaminated clothing before reuse. Clean equipment and the work area every day. Good personal hygiene procedures should be implemented. Wash at the end of each work shift and before eating, smoking and using the toilet. When using do not eat, drink or smoke. Preventive industrial medical examinations should be carried out. Warn cleaning personnel of any hazardous properties of the product.

#### Respiratory protection

Respiratory protection complying with an approved standard should be worn if a risk assessment indicates inhalation of contaminants is possible. Ensure all respiratory protective equipment is suitable for its intended use and is 'CE'-marked. Check that the respirator fits tightly and the filter is changed regularly. Gas and combination filter cartridges should comply with European Standard EN14387. Full face mask respirators with replaceable filter cartridges should comply with European Standard EN136. Half mask and quarter mask respirators with replaceable filter cartridges should comply with European Standard EN140. Gas filter, type E.

#### Environmental exposure controls

Keep container tightly sealed when not in use.

## HYDROCHLORIC ACID 2M

### SECTION 9: Physical and chemical properties

#### 9.1. Information on basic physical and chemical properties

<b>Appearance</b>	Liquid.
<b>Colour</b>	Colourless.
<b>Odour</b>	Pungent.
<b>pH</b>	pH (concentrated solution): 1
<b>Melting point</b>	Not determined.
<b>Initial boiling point and range</b>	Not determined.
<b>Flash point</b>	Scientifically unjustified.
<b>Evaporation rate</b>	Not determined.
<b>Evaporation factor</b>	Not determined.
<b>Flammability (solid, gas)</b>	Technically not feasible.
<b>Upper/lower flammability or explosive limits</b>	Not relevant.
<b>Vapour pressure</b>	Not determined.
<b>Vapour density</b>	Not determined.
<b>Relative density</b>	~ 1.0 - 1.05 @ 20°C
<b>Bulk density</b>	Not relevant.
<b>Solubility(ies)</b>	Miscible with water.
<b>Partition coefficient</b>	No specific test data are available.
<b>Auto-ignition temperature</b>	Not relevant.
<b>Decomposition Temperature</b>	No specific test data are available.
<b>Viscosity</b>	Not determined.
<b>Explosive properties</b>	Not considered to be explosive.
<b>Explosive under the influence of a flame</b>	No
<b>Oxidising properties</b>	Does not meet the criteria for classification as oxidising.
<b>Comments</b>	Information given is applicable to the product as supplied.

#### 9.2. Other information

<b>Other information</b>	None.
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### SECTION 10: Stability and reactivity

#### 10.1. Reactivity

<b>Reactivity</b>	May be corrosive to metals. The following materials may react with the product: Alkalis. Oxidising agents.
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#### 10.2. Chemical stability

<b>Stability</b>	Stable at normal ambient temperatures and when used as recommended. Stable under the prescribed storage conditions.
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## HYDROCHLORIC ACID 2M

### 10.3. Possibility of hazardous reactions

**Possibility of hazardous reactions**      May generate heat. Will not polymerise.

### 10.4. Conditions to avoid

**Conditions to avoid**      Avoid excessive heat for prolonged periods of time.

### 10.5. Incompatible materials

**Materials to avoid**      Alkalis. Amines. Mild steel. Aluminium. May be corrosive to metals. Sulphides Cyanides

### 10.6. Hazardous decomposition products

**Hazardous decomposition products**      Does not decompose when used and stored as recommended.

## SECTION 11: Toxicological information

### 11.1. Information on toxicological effects

#### Acute toxicity - oral

**Notes (oral LD<sub>50</sub>)**      Based on available data the classification criteria are not met.

#### Acute toxicity - dermal

**Notes (dermal LD<sub>50</sub>)**      Based on available data the classification criteria are not met.

#### Acute toxicity - inhalation

**Notes (inhalation LC<sub>50</sub>)**      Based on available data the classification criteria are not met.

#### Skin corrosion/irritation

**Animal data**      Based on available data the classification criteria are not met.

**Extreme pH**      ≤ 2 Corrosive.

#### Serious eye damage/irritation

**Serious eye damage/irritation**      Based on available data the classification criteria are not met.

#### Respiratory sensitisation

**Respiratory sensitisation**      Based on available data the classification criteria are not met.

#### Skin sensitisation

**Skin sensitisation**      Based on available data the classification criteria are not met.

#### Germ cell mutagenicity

**Genotoxicity - in vitro**      Based on available data the classification criteria are not met.

#### Carcinogenicity

**Carcinogenicity**      Based on available data the classification criteria are not met.

#### IARC carcinogenicity

None of the ingredients are listed or exempt.

#### Reproductive toxicity

**Reproductive toxicity - fertility**      Based on available data the classification criteria are not met.

**Reproductive toxicity - development**      Based on available data the classification criteria are not met.

#### Specific target organ toxicity - single exposure

**STOT - single exposure**      Not classified as a specific target organ toxicant after a single exposure.

#### Specific target organ toxicity - repeated exposure

## HYDROCHLORIC ACID 2M

<b>STOT - repeated exposure</b>	Not classified as a specific target organ toxicant after repeated exposure.
<b><u>Aspiration hazard</u></b>	
<b>Aspiration hazard</b>	Based on available data the classification criteria are not met.
<b><u>General information</u></b>	
<b>General information</b>	The severity of the symptoms described will vary dependent on the concentration and the length of exposure.
<b>Inhalation</b>	Prolonged inhalation of high concentrations may damage respiratory system.
<b>Ingestion</b>	Gastrointestinal symptoms, including upset stomach. Nausea, vomiting. May cause irritation.
<b>Skin contact</b>	Prolonged contact may cause dryness of the skin.
<b>Eye contact</b>	May cause temporary eye irritation.
<b>Route of exposure</b>	Ingestion Inhalation Skin and/or eye contact
<b>Target organs</b>	No specific target organs known.

### Toxicological information on ingredients.

#### HYDROCHLORIC ACID ...%

<b>Toxicological effects</b>	The toxicity of this substance has been assessed during REACH registration.
<b><u>Acute toxicity - oral</u></b>	
<b>Notes (oral LD<sub>50</sub>)</b>	Scientifically unjustified. REACH dossier information.
<b><u>Acute toxicity - dermal</u></b>	
<b>Notes (dermal LD<sub>50</sub>)</b>	Scientifically unjustified. REACH dossier information.
<b><u>Acute toxicity - inhalation</u></b>	
<b>Acute toxicity inhalation (LC<sub>50</sub> dust/mist mg/l)</b>	8.3
<b>Species</b>	Rat
<b>Notes (inhalation LC<sub>50</sub>)</b>	REACH dossier information. LC50 8.3 mg/l, 30 minutes, Dust/Mist Rat
<b><u>Skin corrosion/irritation</u></b>	
<b>Animal data</b>	Corrosive to skin. REACH dossier information.
<b><u>Serious eye damage/irritation</u></b>	
<b>Serious eye damage/irritation</b>	Causes serious eye damage. REACH dossier information.
<b><u>Respiratory sensitisation</u></b>	
<b>Respiratory sensitisation</b>	Scientifically unjustified.
<b><u>Skin sensitisation</u></b>	
<b>Skin sensitisation</b>	Not sensitising. REACH dossier information.
<b><u>Germ cell mutagenicity</u></b>	
<b>Genotoxicity - in vitro</b>	Negative. REACH dossier information.
<b>Genotoxicity - in vivo</b>	No specific test data are available. REACH dossier information.
<b><u>Carcinogenicity</u></b>	



## HYDROCHLORIC ACID 2M

<b>Carcinogenicity</b>	NOAEL <10 ppm, Inhalation, Rat Based on available data the classification criteria are not met.
<b><u>Reproductive toxicity</u></b>	
<b>Reproductive toxicity - fertility</b>	Scientifically unjustified. REACH dossier information.
<b>Reproductive toxicity - development</b>	This substance has no evidence of toxicity to reproduction.
<b><u>Specific target organ toxicity - single exposure</u></b>	
<b>STOT - single exposure</b>	No specific test data are available.
<b><u>Specific target organ toxicity - repeated exposure</u></b>	
<b>STOT - repeated exposure</b>	NOAEL 20 ppm, Inhalation, Rat 13 weeks
<b><u>Aspiration hazard</u></b>	
<b>Aspiration hazard</b>	Not anticipated to present an aspiration hazard, based on chemical structure.
.	
<b>Inhalation</b>	Irritating to respiratory system. Burns can occur.
<b>Ingestion</b>	Corrosive. Small amounts may cause serious damage.
<b>Skin contact</b>	Causes burns.
<b>Eye contact</b>	This product is strongly corrosive. Causes serious eye damage.

### SECTION 12: Ecological information

**Ecotoxicity**                      The product may affect the acidity (pH) of water which may have hazardous effects on aquatic organisms.

#### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

**Ecotoxicity**                      The product may affect the acidity (pH) of water which may have hazardous effects on aquatic organisms.

#### 12.1. Toxicity

**Toxicity**                              Based on available data the classification criteria are not met.

#### Chronic aquatic toxicity

**Chronic toxicity - fish early life stage**    «125» «126»

#### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

#### Acute aquatic toxicity

**Acute toxicity - fish**                      LC<sub>50</sub>, 96 hours: pH 3.5 - 3.25 , Lepomis macrochirus (Bluegill)

**Acute toxicity - aquatic invertebrates**                      EC<sub>50</sub>, 48 hours: pH 4.92 , Daphnia magna

**Acute toxicity - aquatic plants**                      EC<sub>50</sub>, 72 hours: pH 4.7 , Freshwater algae

## HYDROCHLORIC ACID 2M

<b>Acute toxicity - microorganisms</b>	EC <sub>50</sub> , 3 hours: pH 5 - 5.5 , Activated sludge
<b>Acute toxicity - terrestrial</b>	Not available.
<b><u>Chronic aquatic toxicity</u></b>	
<b>Chronic toxicity - fish early life stage</b>	Not determined.
<b>Short term toxicity - embryo and sac fry stages</b>	Not determined.
<b>Chronic toxicity - aquatic invertebrates</b>	Scientifically unjustified.

### 12.2. Persistence and degradability

**Persistence and degradability** The product contains inorganic substances which are not biodegradable.

### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

<b>Persistence and degradability</b>	The product is expected to be biodegradable.
<b>Phototransformation</b>	Not relevant. Substance is inorganic.
<b>Stability (hydrolysis)</b>	Not relevant.
<b>Biodegradation</b>	Scientifically unjustified.
<b>Biological oxygen demand</b>	Not relevant.
<b>Chemical oxygen demand</b>	Not relevant.

### 12.3. Bioaccumulative potential

**Bioaccumulative potential** The product does not contain any substances expected to be bioaccumulating.

**Partition coefficient** No specific test data are available.

### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

<b>Bioaccumulative potential</b>	The product is not bioaccumulating.
<b>Partition coefficient</b>	Scientifically unjustified.

### 12.4. Mobility in soil

**Mobility** The product is water-soluble and may spread in water systems. The product is non-volatile.

### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

<b>Mobility</b>	The product is miscible with water and may spread in water systems.
<b>Adsorption/desorption coefficient</b>	Scientifically unjustified.

## HYDROCHLORIC ACID 2M

<b>Henry's law constant</b>	Not determined.
<b>Surface tension</b>	Scientifically unjustified.

### 12.5. Results of PBT and vPvB assessment

**Results of PBT and vPvB assessment** This product does not contain any substances classified as PBT or vPvB.

#### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

**Results of PBT and vPvB assessment** This substance is not classified as PBT or vPvB according to current EU criteria.

### 12.6. Other adverse effects

**Other adverse effects** None known.

#### Ecological information on ingredients.

#### HYDROCHLORIC ACID ...%

**Other adverse effects** Not determined.

## SECTION 13: Disposal considerations

### 13.1. Waste treatment methods

**General information** The generation of waste should be minimised or avoided wherever possible. Reuse or recycle products wherever possible. This material and its container must be disposed of in a safe way. Disposal of this product, process solutions, residues and by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any local authority requirements. When handling waste, the safety precautions applying to handling of the product should be considered. Care should be taken when handling emptied containers that have not been thoroughly cleaned or rinsed out. Empty containers or liners may retain some product residues and hence be potentially hazardous.

**Disposal methods** Do not empty into drains. Dispose of surplus products and those that cannot be recycled via a licensed waste disposal contractor. Waste, residues, empty containers, discarded work clothes and contaminated cleaning materials should be collected in designated containers, labelled with their contents. Incineration or landfill should only be considered when recycling is not feasible.

## SECTION 14: Transport information

**General** For limited quantity packaging/limited load information, consult the relevant modal documentation using the data shown in this section.

### 14.1. UN number

<b>UN No. (ADR/RID)</b>	1789
<b>UN No. (IMDG)</b>	1789
<b>UN No. (ICAO)</b>	1789
<b>UN No. (ADN)</b>	1789

### 14.2. UN proper shipping name

**Proper shipping name (ADR/RID)** HYDROCHLORIC ACID

## HYDROCHLORIC ACID 2M

**Proper shipping name (IMDG)** HYDROCHLORIC ACID

**Proper shipping name (ICAO)** HYDROCHLORIC ACID

**Proper shipping name (ADN)** HYDROCHLORIC ACID

### 14.3. Transport hazard class(es)

**ADR/RID class** 8

**ADR/RID classification code** C1

**ADR/RID label** 8

**IMDG class** 8

**ICAO class/division** 8

**ADN class** 8

### **Transport labels**



### 14.4. Packing group

**ADR/RID packing group** III

**IMDG packing group** III

**ICAO packing group** III

**ADN packing group** III

### 14.5. Environmental hazards

**Environmentally hazardous substance/marine pollutant**

No.

### 14.6. Special precautions for user

Always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in the event of an accident or spillage.

**EmS** F-A, S-B

**ADR transport category** 3

**Hazard Identification Number (ADR/RID)** 80

**Tunnel restriction code** (E)

### 14.7. Transport in bulk according to Annex II of MARPOL and the IBC Code

**Transport in bulk according to** Not applicable.

**Annex II of MARPOL 73/78 and the IBC Code**

## SECTION 15: Regulatory information

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

## HYDROCHLORIC ACID 2M

**National regulations** Health and Safety at Work etc. Act 1974 (as amended).  
Control of Substances Hazardous to Health Regulations 2002 (as amended).  
EH40/2005 Workplace exposure limits.  
GB Mandatory Classification and Labelling List (GB MCL)  
UK REACH and UK CLP Regulations.

### 15.2. Chemical safety assessment

No chemical safety assessment has been carried out.

### Inventories

#### EU - EINECS/ELINCS

None of the ingredients are listed or exempt.

### SECTION 16: Other information

**Abbreviations and acronyms used in the safety data sheet** ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road.  
ADN: European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways.  
RID: European Agreement concerning the International Carriage of Dangerous Goods by Rail.  
IATA: International Air Transport Association.  
ICAO: Technical Instructions for the Safe Transport of Dangerous Goods by Air.  
IMDG: International Maritime Dangerous Goods.  
CAS: Chemical Abstracts Service.  
ATE: Acute Toxicity Estimate.  
LC<sub>50</sub>: Lethal Concentration to 50 % of a test population.  
LD<sub>50</sub>: Lethal Dose to 50% of a test population (Median Lethal Dose).  
EC<sub>50</sub>: 50% of maximal Effective Concentration.  
PBT: Persistent, Bioaccumulative and Toxic substance.  
vPvB: Very Persistent and Very Bioaccumulative.

**Classification abbreviations and acronyms** Met. Corr. = Corrosive to metals

**General information** This datasheet is not intended to be a replacement for a full risk assessment, these should always be carried out by competent persons.

**Key literature references and sources for data** GB Mandatory Classification and Labelling List (GB MCL) Source: European Chemicals Agency, <http://echa.europa.eu/>

**Classification procedures according to Regulation (EC) 1272/2008** Met. Corr. 1 - H290: : Expert judgement.

**Training advice** Only trained personnel should use this material.

**Revision comments** General review according to UK REACH.

**Revision date** 20/05/2024

**Revision** 7

**Supersedes date** 19/05/2021

**SDS number** 11777

**SDS status** Approved.

## HYDROCHLORIC ACID 2M

### **Hazard statements in full**

H290 May be corrosive to metals.  
H314 Causes severe skin burns and eye damage.  
H318 Causes serious eye damage.  
H335 May cause respiratory irritation.

This information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process. Such information is, to the best of the company's knowledge and belief, accurate and reliable as of the date indicated. However, no warranty, guarantee or representation is made to its accuracy, reliability or completeness. It is the user's responsibility to satisfy himself as to the suitability of such information for his own particular use.