# SAFETY DATA SHEET Sodium Hydroxide

#### SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

#### 1.1. Product identifier

Product Name Sodium Hydroxide

CAS-No. 1310-73-2 EU Index No. 011-002-00-6 FC No. 215-185-5

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

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

Supplier: Aztec Chemicals

Gateway Crewe Cheshire CW1 6YY

+ 44 (0) 1270 655500 (T)

+ 44 (0) 1270 655501 (F) info@aztecchemicals.com

**1.4. Emergency telephone number** +44 (0)7831300868

## SECTION 2: HAZARDS IDENTIFICATION

# 2.1. Classification of the substance or mixture

Classification (EC 1272/2008)

Physical and Chemical Hazards

Human health Skin Corr. 1A - H314
Environment Not classified.

Not classified.

Classification (1999/45/EEC) C;R35.

2.2. Label elements

EC No. 215-185-5

Contains: SODIUM HYDROXIDE

Label In Accordance With (EC) No. 1272/2008



P310

Signal Word Danger

Hazard Statements

H314 Causes severe skin burns and eye damage.

**Precautionary Statements** 

P280 Wear protective gloves/protective clothing/eye protection/face protection.

P305+351+338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.

P405 Store locked up.

P501 Dispose of contents/container to ...

Supplementary Precautionary Statements

P260 Do not breathe dust/fume/gas/mist/vapours/spray.

P264 Wash ... thoroughly after handling.

P301+330+331 IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.

P303+361+353 IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin

with water/shower.

P304+340 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for

breathing.

P321 Specific treatment (see ... on this label).
P363 Wash contaminated clothing before reuse.

#### 2.3. Other hazards

## SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

# 3.2. Mixtures

SODIUM HYDROXIDE 60-100%

CAS-No.: 1310-73-2 EC No.: 215-185-5

Classification (EC 1272/2008) Classification (67/548/EEC)

Skin Corr. 1A - H314 C;R35

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

CAS-No. 1310-73-2 EU Index No. 011-002-00-6 EC No. 215-185-5

## SECTION 4: FIRST AID MEASURES

#### 4.1. Description of first aid measures

Inhalation.

Remove victim immediately from source of exposure. Keep the affected person warm and at rest. Get prompt medical attention.

Indestion

NEVER MAKE AN UNCONSCIOUS PERSON VOMIT OR DRINK FLUIDS! Rinse mouth thoroughly. Get medical attention immediately! Drink plenty of water.

Skin Contact

Remove affected person from source of contamination. Remove contaminated clothing. Wash the skin immediately with soap and water. Get medical attention if any discomfort continues. Continue to rinse for at least 15 minutes.

Eye Contact

Remove victim immediately from source of exposure. Immediately flush with plenty of water for up to 15 minutes. Remove any contact lenses and open eyes wide apart. Continue to rinse for at least 15 minutes and get medical attention.

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

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

# **SECTION 5: FIREFIGHTING MEASURES**

## 5.1. Extinguishing media

Extinguishing Media

This product is not flammable. Extinguish with foam, carbon dioxide or dry powder.

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

Specific Hazards

Carbon monoxide (CO). Carbon dioxide (CO2).

#### **5.3. Advice for firefighters**

Protective Measures In Fire

Self contained breathing apparatus and full protective clothing must be worn in case of fire.

#### SECTION 6: ACCIDENTAL RELEASE MEASURES

# 6.1. Personal precautions, protective equipment and emergency procedures

Wear protective clothing as described in Section 8 of this safety data sheet.

# **6.2. Environmental precautions**

Spillages or uncontrolled discharges into watercourses must be IMMEDIATELY alerted to the Environmental Agency or other appropriate regulatory body.

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

DO NOT TOUCH SPILLED MATERIAL! Stop leak if possible without risk. Collect spillage in containers, seal securely and deliver for disposal according to local regulations. Flush contaminated area with plenty of water. Do not contaminate water sources or sewer. Inform Authorities if large amounts are involved.

#### 6.4. Reference to other sections

#### SECTION 7: HANDLING AND STORAGE

#### 7.1. Precautions for safe handling

Avoid inhalation of dust and contact with skin and eyes.

# 7.2. Conditions for safe storage, including any incompatibilities

Keep in original container. Store away from: Acids. Unsuitable containers: copper, zinc, aluminium, copper alloy, zinc alloy, aluminium alloy. Store in tightly closed original container in a dry, cool and well-ventilated place.

Storage Class

Corrosive storage.

#### 7.3. Specific end use(s)

#### SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

#### 8.1. Control parameters

Name	STD	TWA - 8 Hrs		STEL - 15 Min		Notes
SODIUM HYDROXIDE	WEL				2 mg/m3	

WEL = Workplace Exposure Limit.

Ingredient Comments

WEL = Workplace Exposure Limits

#### 8.2. Exposure controls

Protective Equipment





#### **Process Conditions**

Provide eyewash, quick drench.

# Engineering Measures

Provide adequate ventilation. Observe occupational exposure limits and minimize the risk of inhalation of dust.

## Respiratory Equipment

If ventilation is insufficient, suitable respiratory protection must be provided.

#### Hand Protection

Use suitable protective gloves if risk of skin contact. PVC or rubber gloves are recommended.

## Eye Protection

Wear approved safety goggles. Wear tight-fitting goggles or face shield.

#### Other Protection

Wear appropriate clothing to prevent any possibility of skin contact.

#### Hygiene Measures

DO NOT SMOKE IN WORK AREA! Wash at the end of each work shift and before eating, smoking and using the toilet. Wash promptly if skin becomes wet or contaminated. Promptly remove any clothing that becomes contaminated. When using do not eat, drink or smoke.

#### SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

# 9.1. Information on basic physical and chemical properties

Appearance Pellets Flakes
Colour White / off-white

Soluble in water. Alcohol

Initial Boiling Point and Boiling Range:1390Melting Point (°C)318Relative Density2.13Bulk Density1.175 kg/l

## 9.2. Other information

Mol. Weight 40

# SECTION 10: STABILITY AND REACTIVITY

## 10.1. Reactivity

## 10.2. Chemical stability

Stable under normal temperature conditions and recommended use.

## 10.3. Possibility of hazardous reactions

## 10.4. Conditions to avoid

Reacts strongly with concentrated acids and chloro-hydrocarbons. Reacts strongly with water.

## 10.5. Incompatible materials

Materials To Avoid

Strong acids. Strong oxidising substances. Strong oxides. Chemically active metals.

## 10.6. Hazardous decomposition products

Fire or high temperatures may form toxic and corrosive vapours.

## SECTION 11: TOXICOLOGICAL INFORMATION

## 11.1. Information on toxicological effects

Toxic Dose 1 - LD 50 325 mg/kg (oral rat)

Inhalation

Dust is severely irritating to the upper respiratory system. Dust irritates the respiratory system, and may cause coughing and difficulties in breathing.

Ingestion.

May cause chemical burns in mouth, oesophagus and stomach. Causes burns.

Skin Contact

May cause serious chemical burns to the skin. Corrosive. Prolonged contact causes serious tissue damage.

Eye Contact

Causes burns. Risk of corneal damage. Visual disturbances including blurred vision

# SECTION 12: ECOLOGICAL INFORMATION

Ecotoxicity:

The product may affect the acidity (pH-factor) in water with risk of harmful effects to aquatic organisms.

# **12.1.** Toxicity

LC 50, 96 Hrs, Fish mg/l 33-189
EC 50, 48 Hrs, Daphnia, mg/l 40- 240

#### 12.2. Persistence and degradability

Degradability:

The product is easily biodegradable.

## 12.3. Bioaccumulative potential

Bioaccumulative Potential:

The product is not bioaccumulating.

# 12.4. Mobility in soil

Mobility:

The product is soluble in water.

# 12.5. Results of PBT and vPvB assessment

## 12.6. Other adverse effects

# SECTION 13: DISPOSAL CONSIDERATIONS

#### General Information

Waste to be treated as controlled waste. Disposal to licensed waste disposal site in accordance with local Waste Disposal Authority.

## 13.1. Waste treatment methods

Dispose of waste and residues in accordance with local authority requirements.

## SECTION 14: TRANSPORT INFORMATION

## 14.1. UN number

UN No. (ADR/RID/ADN) 1823 UN No. (IMDG) 1823 UN No. (ICAO) 1823

# 14.2 UN Proper shipping name

Proper Shipping Name SODIUM HYDROXIDE, SOLID

## 14.3 Transport hazard class(es)

ADR/RID/ADN Class 8

ADR/RID/ADN Class Class 8: Corrosive substances.

ADR Label No. 8
IMDG Class 8
ICAO Class/Division 8

Transport Labels



#### 14.4. Packing group

ADR/RID/ADN Packing group II
IMDG Packing group II
ICAO Packing group II

# 14.5. Environmental hazards

Environmentally Hazardous Substance/Marine Pollutant

No.

# 14.6. Special precautions for user

EMS F-A, S-B

Hazard No. (ADR) 80 Corrosive or slightly corrosive substance.

Tunnel Restriction Code (E)

# 14.7. Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code

## SECTION 15: REGULATORY INFORMATION

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

# Uk Regulatory References

The Control of Substances Hazardous to Health Regulations 2002 (S.I 2002 No. 2677) with amendments. Chemicals (Hazard Information & Packaging) Regulations.

#### Statutory Instruments

The Chemicals (Hazard Information and Packaging for Supply) Regulations 2009 (S.I 2009 No. 716). Control of Substances Hazardous to Health. The Aerosol Dispensers Regulations 1977 & 1999

#### Approved Code Of Practice

Safety Data Sheets for Substances and Preparations. Classification and Labelling of Substances and Preparations Dangerous for Supply. British Aerosol Manufacturers Code of Practice 7th. Edition 1999

#### **Guidance Notes**

Workplace Exposure Limits EH40. CHIP for everyone HSG(108).

#### EU Legislation

Dangerous Substance Directive 67/548/EEC. Dangerous Preparations Directive 1999/45/EC. System of specific information relating to Dangerous Preparations. 2001/58/EC.

National Regulations

The Chemicals (Hazard Information and Packaging for Supply) Regulations 2002. No. 1689.

## 15.2. Chemical Safety Assessment

# SECTION 16: OTHER INFORMATION

SDS No. 12275
Safety Data Sheet Status Approved.
Date 12.04.2011

Risk Phrases In Full

R35 Causes severe burns.

Hazard Statements In Full

H314 Causes severe skin burns and eye damage.