1 Identification

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| · Product identifier   |
|--|
| · Trade name: <u>Sodium Hydroxide, 0.1N (N/10)</u><br>· Product code: DUSH6200-Q   |
| <ul> <li>Recommended use and restriction on use</li> <li>Recommended use: Laboratory chemicals</li> <li>Restrictions on use: No relevant information available.</li> </ul>   |
| <ul> <li>Details of the supplier of the Safety Data Sheet</li> <li>Manufacturer/Supplier:<br/>AquaPhoenix Scientific, Inc.<br/>860 Gitts Run Road<br/>Hanover, PA 17331<br/>Phone: (717)632-1291<br/>Toll-Free: (866)632-1291<br/>info@aquaphoenixsci.com</li> <li>Distributor:<br/>Dubois Chemicals Inc.<br/>3630 East Kemper Rd<br/>Cincinnati, OH 45241<br/>(800) 438-2647</li> </ul>   |
| <ul> <li>Emergency telephone number:<br/>ChemTel Inc.<br/>(800)255-3924 (North America)</li> </ul>   |
| +1 (813)248-0585 (International)   |
| 2 Hazard(s) identification   |
| · Classification of the substance or mixture   |
| Skin Irrit. 2 H315 Causes skin irritation.   |
| Eye Irrit. 2A H319 Causes serious eye irritation.  |
| <ul> <li>Label elements</li> <li>GHS label elements</li> <li>The product is classified and labeled according to the Globally Harmonized System (GHS).</li> <li>Hazard pictograms:</li> <li>GHS07</li> </ul>  |
| <ul> <li>Signal word: Warning</li> <li>Hazard statements:<br/>H315 Causes skin irritation.<br/>H319 Causes serious eye irritation.</li> <li>Precautionary statements:<br/>P264 Wash thoroughly after handling.<br/>P280 Wear protective gloves / eye protection / face protection.<br/>P302+P352 If on skin: Wash with plenty of water.<br/>P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if<br/>present and easy to do. Continue rinsing.</li> </ul> |
| (Cont'd. on page 2)  |

99.6%

0.4%

## Safety Data Sheet

according to OSHA HCS (29CFR 1910.1200) and WHMIS 2015 Regulations

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| P332+P313If skin irritation occurs: Get medical advice/attention.P362+P364Take off contaminated clothing and wash it before reuse.P337+P313If eye irritation persists: Get medical advice/attention. | P362+P364 | e off contaminated clothing and wash it before reuse. |
|--|-----------|---|
|--|-----------|---|

· Other hazards There are no other hazards not otherwise classified that have been identified.

## 3 Composition/information on ingredients

#### · Chemical characterization: Mixtures

#### · Components:

7732-18-5 Water

1310-73-2 Sodium hydroxide

Met. Corr.1, H290; Skin Corr. 1A, H314; Eye Dam. 1, H318

#### Additional information:

For the listed ingredient(s), the identity and/or exact percentage(s) are being withheld as a trade secret. For the wording of the listed Hazard Statements, refer to section 16.

### 4 First-aid measures

#### <sup>•</sup> Description of first aid measures

· General information: No special measures required.

- After inhalation: Supply fresh air; consult doctor in case of complaints.
- After skin contact: If skin irritation continues, consult a doctor.

#### · After eye contact:

Protect unharmed eye.

Remove contact lenses if worn.

Rinse opened eye for several minutes under running water. If symptoms persist, consult a doctor.

• After swallowing:

Rinse out mouth and then drink plenty of water.

Do not induce vomiting; immediately call for medical help.

#### Most important symptoms and effects, both acute and delayed:

Gastric or intestinal disorders when ingested.

Nausea in case of ingestion.

• **Danger:** Causes skin and eye irritation.

Indication of any immediate medical attention and special treatment needed:

Medical supervision for at least 48 hours.

If medical advice is needed, have product container or label at hand.

#### **5** Fire-fighting measures

Extinguishing media

· Suitable extinguishing agents: Use fire fighting measures that suit the environment.

- · For safety reasons unsuitable extinguishing agents: No relevant information available.
- Special hazards arising from the substance or mixture

Formation of toxic gases is possible during heating or in case of fire.

<sup>•</sup> Advice for firefighters

#### · Protective equipment:

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Wear self-contained respiratory protective device. Wear fully protective suit.

#### 6 Accidental release measures

#### • Personal precautions, protective equipment and emergency procedures

Wear protective equipment. Keep unprotected persons away.

Ensure adequate ventilation.

For large spills, use respiratory protective device against the effects of fumes/dust/aerosol.

#### **Environmental precautions**

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

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

Absorb with liquid-binding material (sand, diatomite, acid binders, universal binders, sawdust). Place in properly marked container for disposal.

#### **Reference to other sections**

See Section 7 for information on safe handling.

See Section 8 for information on personal protection equipment.

See Section 13 for disposal information.

#### 7 Handling and storage

#### <sup>·</sup> Handling

#### Precautions for safe handling:

Prevent formation of aerosols.

Avoid splashes or spray in enclosed areas.

Use only in well ventilated areas.

Information about protection against explosions and fires: No special measures required.

#### <sup>•</sup> Conditions for safe storage, including any incompatibilities

#### • Requirements to be met by storerooms and receptacles:

Unsuitable material for receptacle: aluminium.

Unsuitable material for receptacle: steel.

Unsuitable material for receptacle: glass or ceramic.

Store only in the original receptacle.

Information about storage in one common storage facility:

Store away from foodstuffs.

Do not store together with acids.

Store away from oxidizing agents.

Store away from metals.

• Further information about storage conditions: Keep containers tightly sealed.

• Specific end use(s) No relevant information available.

#### 8 Exposure controls/personal protection

#### · Control parameters

· Components with limit values that require monitoring at the workplace:

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|                            |   | - |
|----------------------------|---|---|
|                            | (Cont'd. of page 3)   | - |
| 1310-73-2 Sodium hydroxide |   |   |
| PEL (USA)                  | Long-term value: 2 mg/m <sup>3</sup>  |   |
| REL (USA)                  | Ceiling limit value: 2 mg/m <sup>3</sup>  |   |
| TLV (USA)                  | Ceiling limit value: 2 mg/m <sup>3</sup>  |   |
| EL (Canada)                | Ceiling limit value: 2 mg/m <sup>3</sup>  |   |
| EV (Canada)                | Ceiling limit value: 2 mg/m³  |   |
| LMPE (Mexico)              | Ceiling limit value: 2 mg/m <sup>3</sup>  |   |
| Exposure con               | trols   |   |
|                            | tive and hygienic measures:   |   |
|                            | utionary measures for handling chemicals should be followed.                            |   |
|                            | foodstuffs, beverages and feed.<br>nove all soiled and contaminated clothing.           |   |
|                            | fore breaks and at the end of work.   |   |
|                            | th the eyes and skin.   |   |
|                            | ntrols: Provide adequate ventilation.   |   |
|                            | pment: For spills, respiratory protection may be advisable.                             |   |
| Protection of h            | ands:   |   |
| Protecti                   | ve gloves   |   |
| 9                          |   |   |
|                            | ial has to be impermeable and resistant to the product/ the substance/ the preparation. |   |
| • Eye protection:          |   |   |
| Safety g                   | glasses   |   |
|                            |   |   |
|                            | national guidelines concerning the use of protective eyewear.                           |   |
| • •                        | n: Protective work clothing<br>d supervision of exposure into the environment           |   |
|                            | mation available.   |   |
|                            |   |   |

| Information on basic physical a | and chemical properties       |                  |
|---------------------------------|-------------------------------|------------------|
| Appearance:<br>Form:            | Liquid                        |                  |
| Color:                          | Colorless                     |                  |
| Odor:                           | Odorless                      |                  |
| Odor threshold:                 | Not determined.               |                  |
| pH-value:                       | 13                            |                  |
| Melting point/Melting range:    | Not determined.               |                  |
| Boiling point/Boiling range:    | 110-120 °C (230-248 °F)       |                  |
| Flash point:                    | The product is not flammable. |                  |
| Flammability (solid, gaseous):  | Not applicable.               |                  |
|                                 |                               | (Cont'd. on page |

### according to OSHA HCS (29CFR 1910.1200) and WHMIS 2015 Regulations

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|                                     |   | (Cont'd. of page |
|-------------------------------------|---|------------------|
| Auto-ignition temperature:          | Not determined.                               |                  |
| Decomposition temperature:          | Not determined.                               |                  |
| Danger of explosion:                | Product does not present an explosion hazard. |                  |
| Explosion limits                    |   |                  |
| Lower:                              | Not determined.                               |                  |
| Upper:                              | Not determined.                               |                  |
| Oxidizing properties:               | Not determined.                               |                  |
| Vapor pressure:                     | Not determined.                               |                  |
| Density:                            |   |                  |
| Relative density:                   | 1.0-1.2                                       |                  |
| Vapor density:                      | Not determined.                               |                  |
| Evaporation rate:                   | Not determined.                               |                  |
| Solubility in / Miscibility with    |   |                  |
| Water:                              | Fully miscible.                               |                  |
| Partition coefficient (n-octanol/wa | ter): Not determined.                         |                  |
| Viscosity                           |   |                  |
| Dynamic:                            | Not determined.                               |                  |
| Kinematic:                          | Not determined.                               |                  |
| Other information                   | No relevant information available.            |                  |

## 10 Stability and reactivity

· Reactivity: No relevant information available.

· Chemical stability: Stable under normal temperatures and pressures.

Thermal decomposition / conditions to be avoided:

No decomposition if used and stored according to specifications.

<sup>•</sup> Possibility of hazardous reactions

Strong exothermic reaction with acids.

Attacks materials containing glass and silicate.

Reacts with various metals.

Toxic fumes may be released if heated above the decomposition point.

• Conditions to avoid Excessive heat.

<sup>·</sup> Incompatible materials

Metals.

Strong acids

- Hazardous decomposition products
- Under fire conditions only:

Toxic metal oxide smoke

#### 11 Toxicological information

<sup>·</sup> Information on toxicological effects

(Cont'd. on page 6)

according to OSHA HCS (29CFR 1910.1200) and WHMIS 2015 Regulations

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|  | (Cont'd. of pa |
|--|----------------|
| Acute toxicity:  | (0011010101    |
| LD/LC50 values that are relevant for classification: None.   |                |
| Primary irritant effect:   |                |
| On the skin: Irritant to skin and mucous membranes.  |                |
| On the eye: Causes serious eye irritation.   |                |
| Sensitization: Based on available data, the classification criteria are not met.   |                |
| IARC (International Agency for Research on Cancer):  |                |
| None of the ingredients are listed.  |                |
| NTP (National Toxicology Program):   |                |
| None of the ingredients are listed.  |                |
| OSHA-Ca (Occupational Safety & Health Administration):   |                |
| None of the ingredients are listed.  |                |
| Probable route(s) of exposure:   |                |
| Ingestion.   |                |
| Inhalation.  |                |
| Eye contact.   |                |
| Skin contact.  |                |
| Acute effects (acute toxicity, irritation and corrosivity): Irritating to eyes and skin.   |                |
| Repeated dose toxicity: No relevant information available.   |                |
| Germ cell mutagenicity: Based on available data, the classification criteria are not met.  |                |
| <b>Carcinogenicity:</b> Based on available data, the classification criteria are not met.  |                |
| <b>Reproductive toxicity:</b> Based on available data, the classification criteria are not met. <b>STOT-single exposure:</b> Based on available data, the classification criteria are not met. |                |
| STOT-repeated exposure: Based on available data, the classification criteria are not met.  | ot             |
| Aspiration hazard: Based on available data, the classification criteria are not met.   | 51.            |
| Aspiration fiazaru. Based on available data, the classification chiena are not met.  |                |
|  |                |
| Ecological information   |                |

- · Aquatic toxicity No relevant information available.
- **Persistence and degradability** No relevant information available.
- · **Bioaccumulative potential:** No relevant information available.
- **Mobility in soil:** No relevant information available.
- Ecotoxical effects:
- **Remark:** After neutralization a reduction of the harming action may be recognized
- <sup>•</sup> Additional ecological information
- · General notes:

Must not reach bodies of water or drainage ditch undiluted or unneutralized.

Rinse off of bigger amounts into drains or the aquatic environment may lead to increased pH-values. A high pH-value harms aquatic organisms. In the dilution of the use-level the pH-value is considerably reduced, so that after the use of the product the aqueous waste, emptied into drains, is only low water-dangerous.

Other adverse effects No relevant information available.

**13 Disposal considerations** 

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| ade name: Sodium Hydroxide, 0.1N (N/10)   | 1  |
|---|--|
|   | (Cont'd. of pag  |
| Waste treatment methods   |  |
| The user of this material has the responsib   | ehold garbage. Do not allow product to reach sewage systen<br>ility to dispose of unused material, residues and containers<br>federal laws and regulations regarding treatment, storage a<br>vastes. |
| Uncleaned packagings<br>Recommendation: Disposal must be made<br>Recommended cleansing agent: Water, if |  |
|   |  |
| Transport information   |  |
| · UN-Number<br>· DOT, ADR/RID/ADN, IMDG, IATA   | Not regulated.   |
| <sup>·</sup> UN proper shipping name<br>· DOT, ADR/RID/ADN, IMDG, IATA                                  | Not regulated.   |
| Transport hazard class(es)  |  |
| · DOT, ADR/RID/ADN, IMDG, IATA<br>· Class   | Not regulated.   |
| <sup>·</sup> Packing group<br>· DOT, ADR/RID/ADN, IMDG, IATA  | Not regulated.   |
| <sup>·</sup> Environmental hazards<br><sup>·</sup> Marine pollutant:                                    | No   |
| Special precautions for user  | Not applicable.  |
| <ul> <li>Transport in bulk according to Anne»</li> <li>MARPOL73/78 and the IBC Code</li> </ul>          | k II of<br>Not applicable.   |
|   |  |
| Regulatory information  |  |
|   | egulations/legislation specific for the substance  |
|   |  |
| <ul> <li>Section 302 (extremely hazardous substa</li> </ul>   |  |

· Section 355 (extremely hazardous substances):

None of the ingredients are listed.

· Section 313 (Specific toxic chemical listings):

None of the ingredients are listed.

• TSCA (Toxic Substances Control Act)

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according to OSHA HCS (29CFR 1910.1200) and WHMIS 2015 Regulations

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1310-73-2 Sodium hydroxide

7732-18-5 Water

#### · Proposition 65 (California)

· Chemicals known to cause cancer:

None of the ingredients are listed.

• Chemicals known to cause developmental toxicity for females:

None of the ingredients are listed.

· Chemicals known to cause developmental toxicity for males:

None of the ingredients are listed.

· Chemicals known to cause developmental toxicity:

None of the ingredients are listed.

· EPA (Environmental Protection Agency):

None of the ingredients are listed.

IARC (International Agency for Research on Cancer):

None of the ingredients are listed.

Canadian Domestic Substances List (DSL): (Substances not listed.)

All ingredients are listed.

### 16 Other information

This information is based on our present knowledge. However, this shall not constitute a guarantee for any specific product features and shall not establish a legally valid contractual relationship.

#### · Abbreviations and acronyms:

ADR: European Agreement concerning the International Carriage of Dangerous Goods by Road IMDG: International Maritime Code for Dangerous Goods DOT: US Department of Transportation IATA: International Air Transport Association CAS: Chemical Abstracts Service (division of the American Chemical Society) LC50: Lethal concentration, 50 percent LD50: Lethal dose, 50 percent OSHA: Occupational Safety & Health Administration Met. Corr.1: Corrosive to metals - Category 1 Skin Corr. 1A: Skin corrosion/irritation – Category 1A Skin Irrit. 2: Skin corrosion/irritation – Category 2 Eye Dam. 1: Serious eye damage/eye irritation - Category 1 Eye Irrit. 2A: Serious eye damage/eye irritation - Category 2A Sources Website, European Chemicals Agency (echa.europa.eu) Website, US EPA Substance Registry Services (ofmpub.epa.gov/sor internet/registry/substreg/home/ overview/home.do) Website, Chemical Abstracts Registry, American Chemical Society (www.cas.org) Patty's Industrial Hygiene, 6th ed., Rose, Vernon, ed. ISBN: 978-0-470-07488-6 Casarett and Doull's Toxicology: The Basic Science of Poisons, 8th Ed., Klaasen, Curtis D., ed., ISBN: 978-0-07-176923-5. Safety Data Sheets, Individual Manufacturers SDS Prepared by: ChemTel Inc.

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1305 North Florida Avenue Tampa, Florida USA 33602-2902 Toll Free North America 1-888-255-3924 Intl. +01 813-248-0573 Website: www.chemtelinc.com