According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 1 of 9

Total Alkalinity Indicator

SECTION 1: Identification

Product identifier

Product name: Total Alkalinity Indicator

Product code: Al6920SS

Recommended use of the product and restriction on use

Relevant identified uses: Laboratory Chemicals

Uses advised against: Not determined or not applicable.

Reasons why uses advised against: Not determined or not applicable.

Manufacturer or supplier details

Manufacturer: United States

AquaPhoenix Scientific, Inc. 860 Gitts Run Road Hanover, PA 17331 1-717-632-1291

Emergency telephone number:

Canada

ChemTel: (24-hour) +1(800)255-3924

+1(813)248-0585 (International)

SECTION 2: Hazard identification

GHS classification:

Flammable liquids, category 2

Eye irritation, category 2A

Chapter to see the second accordance to the second accordance

Specific target organ toxicity - single exposure, category 3, central nervous system

Label elements

Hazard pictograms:





Signal word: Danger

Hazard statements:

H225 Highly flammable liquid and vapor.

H319 Causes serious eye irritation.

H336 May cause drowsiness or dizziness.

Precautionary statements:

P210 Keep away from heat/sparks/open flames/hot surfaces. No smoking.

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

P264 Wash skin thoroughly after handling.

P261 Avoid breathing dust/fume/gas/mist/vapors/spray.

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 2 of 9

Total Alkalinity Indicator

P271 Use only outdoors or in a well-ventilated area.

P233 Keep container tightly closed.

P240 Ground/bond container and receiving equipment.

P241 Use explosion-proof electrical/ventilating/light/equipment.

P242 Use only non-sparking tools.

P243 Take precautionary measures against static discharge.

P303+P361+P353 If on skin (or hair): Immediately remove/take off all contaminated clothing. Rinse skin with water/shower.

P370+P378 In case of fire: Use agents recommended in section 5 for extinction.

P305+P351+P338 If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Continue rinsing.

P304+P340+P312 If inhaled: Remove victim to fresh air and keep at rest in a position comfortable for breathing. Call a poison center or doctor/physician if you feel unwell.

P405 Store locked up.

P403+P233 Store in a well ventilated place. Keep container tightly closed.

P501 Dispose of contents and container as instructed in Section 13.

Hazards not otherwise classified: None

SECTION 3: Composition/information on ingredients

| Identification | Name | Weight % |
|------------------------|---------------------------|----------|
| CAS number: 845-10-3 | Methyl Red, Na Salt | 0.04 |
| CAS number: 62625-32-5 | Bromcresol Green, Na Salt | 0.06 |
| CAS number: 67-63-0 | Isopropanol | 50 |
| CAS number: 7732-18-5 | Water | >98 |

Additional Information: None

SECTION 4: First-aid measures

Description of first-aid measures

General notes:

Not determined or not available.

After inhalation:

Loosen clothing as necessary and position individual in a comfortable position Maintain an unobstructed airway

After skin contact:

Rinse affected area with soap and water

If symptoms develop or persist, seek medical attention

After eye contact:

Rinse/flush exposed eye(s) gently using water for 15-20 minutes

Remove contact lens(es) if able to do so during rinsing

Seek medical attention if irritation persists or if concerned

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 3 of 9

Total Alkalinity Indicator

After ingestion:

Rinse mouth thoroughly

Seek medical attention if irritation, discomfort, or vomiting persists

Most important symptoms and effects, both acute and delayed

Acute symptoms and effects:

Not determined or not available.

Delayed symptoms and effects:

Not determined or not available.

Immediate medical attention and special treatment

Specific treatment:

Not determined or not available.

Notes for the doctor:

Not determined or not available.

SECTION 5: Fire-fighting measures

Extinguishing media

Suitable extinguishing media:

Use dry chemical, chemical foam, carbon dioxide, or alcohol-resistant foam

Unsuitable extinguishing media:

Not determined or not applicable.

Specific hazards during fire-fighting:

Thermal decomposition can lead to release of irritating gases and vapors

Vapors can flow to distant ignition sources and flashback

Liquid is volatile and may generate an explosive atmosphere

Special protective equipment for firefighters:

Wear protective eye wear, gloves and clothing

Refer to Section 8

Special precautions:

Avoid inhaling gases, fumes, dust, mist, vapor and aerosols

Avoid contact with skin, eyes and clothing

SECTION 6: Accidental release measures

Personal precautions, protective equipment and emergency procedures:

Ensure air handling systems are operational

Beware of vapors accumulating to form explosive concentrations

Vapors can accumulate in low areas

Ensure adequate ventilation

Environmental precautions:

Should not be released into the environment

Prevent from reaching drains, sewer or waterway

Methods and material for containment and cleaning up:

Wear protective eye wear, gloves and clothing

Use spark-proof tools and explosion-proof equipment

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 4 of 9

Total Alkalinity Indicator

Reference to other sections:

Not determined or not applicable.

SECTION 7: Handling and storage

Precautions for safe handling:

Do not eat, drink, smoke or use personal products when handling chemical substances.

Avoid breathing mist or vapor.

Use only non-sparking tools.

Take precautionary measures against electrostatic discharges.

Conditions for safe storage, including any incompatibilities:

Store in a cool, well-ventilated area.

Keep container tightly sealed.

Keep away from all ignition sources: open flames, hot surfaces, direct sunlight, spark sources.

Store locked up.

Use appropriate containment to avoid environmental contamination.

Protect from freezing and physical damage.

SECTION 8: Exposure controls/personal protection

Only those substances with limit values have been included below.

Occupational Exposure limit values:

| Country (Legal Basis) | Substance | Identifier | Permissible concentration |
|-----------------------|-------------|------------|---|
| ACGIH | Isopropanol | 67-63-0 | ACGIH TLV STEL 400 ppm |
| | Isopropanol | 67-63-0 | ACGIH TLV TWA 200 ppm |
| NIOSH | Isopropanol | 67-63-0 | NIOSH IDLH 2,000 ppm |
| | Isopropanol | 67-63-0 | NIOSH STEL 500 ppm, 1,225 mg/m ³ |
| | Isopropanol | 67-63-0 | NIOSH TWA 400 ppm, 980 mg/m ³ |
| United States (OSHA) | Isopropanol | 67-63-0 | OSHA PEL TWA 400 ppm, 980 mg/m ³ |

Biological limit values:

| Substance | Identifier | Determinant | Sampling time | Permissible limits |
|-------------|------------|-------------|--|--------------------|
| Isopropanol | 67-63-0 | | End of shift at end of workweek. | 40 mg/L |

Information on monitoring procedures:

Not determined or not applicable.

Appropriate engineering controls:

Emergency eye wash fountains and safety showers should be available in the immediate vicinity of use or handling.

Use explosion-proof ventilation equipment.

Personal protection equipment

Eye and face protection:

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 5 of 9

Total Alkalinity Indicator

Safety goggles or glasses, or appropriate eye protection.

Skin and body protection:

Select glove material impermeable and resistant to the substance.

Respiratory protection:

When necessary, use NIOSH-approved breathing equipment.

General hygienic measures:

Wash hands before breaks and at the end of work.

Avoid contact with skin, eyes and clothing.

SECTION 9: Physical and chemical properties

Information on basic physical and chemical properties

| Appearance (physical state, color): | Clear, dark green liquid |
|--|----------------------------------|
| Odor: | Alcohol |
| Odor threshold: | Not determined or not available. |
| pH-value: | Approximately 8.5 |
| Melting/Freezing point: | Not determined or not available. |
| Boiling point/range: | Not determined or not available. |
| Flash point: | 18 °C |
| Evaporation rate: | Not determined or not available. |
| Flammability (solid, gaseous): | Not determined or not available. |
| Explosion limit upper: | Not determined or not available. |
| Explosion limit lower: | Not determined or not available. |
| Vapor pressure: | Not determined or not available. |
| Vapor density: | Not determined or not available. |
| Density: | Not determined or not available. |
| Relative density: | Not determined or not available. |
| Solubilities: | Not determined or not available. |
| Partition coefficient (n-octanol/water): | Not determined or not available. |
| Auto/Self-ignition temperature: | Not determined or not available. |
| Decomposition temperature: | Not determined or not available. |
| Dynamic viscosity: | Not determined or not available. |
| Kinematic viscosity: | Not determined or not available. |
| Explosive properties | Not determined or not available. |
| Oxidizing properties | Not determined or not available. |

Other information

SECTION 10: Stability and reactivity

Reactivity:

Does not react under normal conditions of use and storage.

Chemical stability:

Stable under normal conditions of use and storage.

Possibility of hazardous reactions:

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 6 of 9

Total Alkalinity Indicator

None under normal conditions of use and storage.

Conditions to avoid:

Excess heat, ignition source or flames.

Incompatible materials:

None known.

Hazardous decomposition products:

None known.

SECTION 11: Toxicological information

Acute toxicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available.

Substance data: No data available.

Skin corrosion/irritation

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available. **Substance data:** No data available.

Serious eye damage/irritation

Assessment: Causes serious eye irritation

Product data: No data available.

Substance data:

| Name | Result |
|-------------|--------------------------------|
| Isopropanol | Causes serious eye irritation. |

Respiratory or skin sensitization

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available.

Substance data: No data available.

Carcinogenicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available.

Substance data: No data available.

International Agency for Research on Cancer (IARC):

| Name | Classification |
|-------------|--|
| Isopropanol | Group 3 - Not classifiable as to its carcinogenicity to humans |

National Toxicology Program (NTP): None of the ingredients are listed.

Germ cell mutagenicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available.

Substance data: No data available.

Reproductive toxicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available.

Substance data: No data available.

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 7 of 9

Total Alkalinity Indicator

Specific target organ toxicity (single exposure)

Assessment: May cause drowsiness or dizziness

Product data: No data available.

Substance data:

| Name | Result |
|------|--|
| 1 | Specific Target Organ Toxicity, Single Exposure - May cause drowsiness or dizziness. |

Specific target organ toxicity (repeated exposure)

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available. **Substance data:** No data available.

Aspiration toxicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available. **Substance data:** No data available.

Information on likely routes of exposure: No data available.

Symptoms related to the physical, chemical and toxicological characteristics: No data available.

Other information: No data available.

SECTION 12: Ecological information

Acute (short-term) toxicity

Assessment: Based on available data, the classification criteria are not met.

Product data: No data available. **Substance data:** No data available.

Chronic (long-term) toxicity
Product data: No data available.
Substance data: No data available.

Persistence and degradability

Product data: No data available. **Substance data:** No data available.

Bioaccumulative potential

Product data: No data available. **Substance data:** No data available.

Mobility in soil

Product data: No data available. **Substance data:** No data available.

Other adverse effects: No data available.

SECTION 13: Disposal considerations

Disposal methods:

It is the responsibility of the waste generator to properly characterize all waste materials according to applicable regulatory entities (US 40CFR262.11)

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 8 of 9

Total Alkalinity Indicator

SECTION 14: Transport information

Canadian Transportation of Dangerous Goods (TDG)

| UN number | 1993 |
|-------------------------------|--|
| UN proper shipping name | Flammable Liquid, N.O.S., (Isopropanol Solution) |
| UN transport hazard class(es) | 3 |
| Packing group | II |
| Environmental hazards | None |
| Special precautions for user | None |

International Maritime Dangerous Goods (IMDG)

| UN number | 1993 | |
|-------------------------------|--|-----------------|
| UN proper shipping name | Flammable Liquid, N.O.S., (Isopropanol Solution) | |
| UN transport hazard class(es) | 3 | PLANGUAGE COURT |
| Packing group | II | |
| Environmental hazards | None | |
| Special precautions for user | None | |

International Air Transport Association Dangerous Goods Regulations (IATA-DGR)

| UN number | 1993 |
|-------------------------------|--|
| UN proper shipping name | Flammable Liquid, N.O.S., (Isopropanol Solution) |
| UN transport hazard class(es) | 3 |
| Packing group | II |
| Environmental hazards | None |
| Special precautions for user | None |

| Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code | | |
|---|------|--|
| Bulk Name | None | |
| Ship type | None | |
| Pollution category | None | |

SECTION 15: Regulatory information

Canada regulations

Domestic substances list (DSL):

| 62625-32-5 | Bromcresol Green, Na Salt | Listed |
|------------|---------------------------|--------|
| 845-10-3 | Methyl Red, Na Salt | Listed |

According to Canadian Hazardous Products Regulations and WHMIS 2015

Initial preparation date: 05.12.2017 Page 9 of 9

Total Alkalinity Indicator

| 67-63-0 | Isopropanol | Listed |
|-----------|-------------|--------|
| 7732-18-5 | Water | Listed |

Non-domestic substances list (NDSL): Not determined.

SECTION 16: Other information

Abbreviations and Acronyms: None

Disclaimer:

This product has been classified in accordance with hazard criteria of the Controlled Products Regulations and the SDS contains all the information required by the Controlled Products Regulations. The responsibility to provide a safe workplace remains with the user. The user should consider the health hazards and safety information contained herein as a guide and should take those precautions required in an individual operation to instruct employees and develop work practice procedures for a safe work environment. The information contained herein is, to the best of our knowledge and belief, accurate. However, since the conditions of handling and use are beyond our control, we make no guarantee of results, and assume no liability for damages incurred by the use of this material. It is the responsibility of the user to comply with all applicable laws and regulations applicable to this material.

NFPA: 1-2-0 **HMIS:** 1-2-0

Initial preparation date: 05.12.2017

End of Safety Data Sheet