

## 1. IDENTIFICATION

**Product identifier** **Product Name** Free Cyanide QC and PT

**Other means of identification**

**Product Code** PEI-015, QCI-015  
**UN/ID no.** 1824  
**Synonyms** None

**Recommended use of the chemical and restrictions on use**

**Recommended Use** For Laboratory Use Only.  
**Uses advised against** No information available

**Details of the supplier of the safety data sheet**

**Manufacturer Address**

NSI Lab Solutions, Inc.  
 7212 ACC Blvd.  
 Raleigh, NC 27617

**Emergency telephone number**

**Company Phone Number** 800-234-7837

**FAX** 919-789-3019

**Website** www.nsilabsolutions.com

**E-mail address** nsi@nsilabsolutions.com

**Emergency Telephone** 919-349-7322

## 2. HAZARDS IDENTIFICATION

**Classification**

**OSHA Regulatory Status**

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)


Skin corrosion/irritation	Category 1 Sub-category A
Serious eye damage/eye irritation	Category 1

**Label elements**

**Emergency Overview**

**Danger**

**Hazard statements**  
 H314: Causes severe skin burns and eye damage



**Appearance** No information available      **Physical state** Liquid      **Odor** No information available

**Precautionary Statements - Prevention**

Do not breathe dusts or mists  
 Wash face, hands and any exposed skin thoroughly after handling  
 Wear protective gloves/protective clothing/eye protection/face protection

**Precautionary Statements - Response**

Immediately call a POISON CENTER or doctor  
 Specific treatment (see supplemental first aid on this label).  
 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  
 IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/ shower  
 Wash contaminated clothing before reuse  
 IF INHALED: Remove person to fresh air and keep comfortable for breathing  
 Immediately call a POISON CENTER or doctor  
 IF SWALLOWED: Rinse mouth. DO NOT induce vomiting

**Precautionary Statements - Storage**

Store locked up

**Precautionary Statements - Disposal**

Dispose of contents/container to an approved waste disposal plant

**Hazards not otherwise classified (HNOC)** Not applicable

**Other Information**

H412: Harmful to aquatic life with long lasting effects H401: Toxic to aquatic life

**3. COMPOSITION/INFORMATION ON INGREDIENTS**

**Substance**

This material is considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

Chemical Name	CAS No.	Weight-%
Water	7732-18-5	98-99%
Sodium hydroxide	1310-73-2	<1.0%
Potassium cyanide	151-50-8	<0.1%

---

Refer to Certificate of Analysis for exact percentage concentration.

#### 4. FIRST AID MEASURES

##### Description of first aid measures

<b>Eye contact</b>	Rinse thoroughly with plenty of water for at least 15 minutes, lifting lower and upper eyelids. Consult a physician.
<b>Skin contact</b>	Wash skin with soap and water.
<b>Inhalation</b>	Remove to fresh air.
<b>Ingestion</b>	Clean mouth with water and drink afterwards plenty of water.

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

**Symptoms** No information available.

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

**Note to physicians** Treat symptomatically.

#### 5. FIRE-FIGHTING MEASURES

##### Suitable extinguishing media

Use extinguishing measures that are appropriate to local circumstances and the surrounding environment.

**Unsuitable extinguishing media** CAUTION: Use of water spray when fighting fire may be inefficient.

##### Specific hazards arising from the chemical

No information available.

##### Explosion data

**Sensitivity to Mechanical Impact** None.

**Sensitivity to Static Discharge** None.

##### Protective equipment and precautions for firefighters

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

#### 6. ACCIDENTAL RELEASE MEASURES

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

**Personal precautions** Ensure adequate ventilation, especially in confined areas.

##### Environmental precautions

**Environmental precautions** See Section 12 for additional Ecological Information.

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

**Methods for containment** Prevent further leakage or spillage if safe to do so.

**Methods for cleaning up** Pick up and transfer to properly labeled containers.

#### 7. HANDLING AND STORAGE

##### Precautions for safe handling

**Advice on safe handling** Handle in accordance with good industrial hygiene and safety practice.

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

**Storage Conditions** Keep containers tightly closed in a dry, cool and well-ventilated place.

**Incompatible materials** None known based on information supplied.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

### Control parameters

#### Exposure Guidelines

Chemical Name	ACGIH TLV	OSHA PEL	NIOSH IDLH
Water 7732-18-5	-	-	-
Sodium hydroxide 1310-73-2	-	-	-
Potassium cyanide 151-50-8	-	-	-

### Appropriate engineering controls

**Engineering Controls** Showers  
Eyewash stations  
Ventilation systems.

### Individual protection measures, such as personal protective equipment

**Eye/face protection** No special technical protective measures are necessary.

**Skin and body protection** No special technical protective measures are necessary.

**Respiratory protection** If exposure limits are exceeded or irritation is experienced, NIOSH/MSHA approved respiratory protection should be worn. Positive-pressure supplied air respirators may be required for high airborne contaminant concentrations. Respiratory protection must be provided in accordance with current local regulations.

**General Hygiene Considerations** Handle in accordance with good industrial hygiene and safety practice.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

### Information on basic physical and chemical properties

**Physical state** Liquid

<b>Appearance</b>	No information available	<b>Odor</b>	No information available
<b>Color</b>	No information available	<b>Odor threshold</b>	No information available
<b>Property</b>	<b>Values</b>	<b>Remarks • Method</b>	No information available
<b>pH</b>	No information available		
<b>Melting point / freezing point</b>	No information available		
<b>Boiling point / boiling range</b>	No information available		
<b>Flash point</b>	No information available		
<b>Evaporation rate</b>	No information available		
<b>Flammability (solid, gas)</b>	No information available		
<b>Flammability Limit in Air</b>			
<b>Upper flammability limit:</b>	No information available		
<b>Lower flammability limit:</b>	No information available		
<b>Vapor pressure</b>	No information available		
<b>Vapor density</b>	No information available		
<b>Relative density</b>	No information available		
<b>Water solubility</b>	No information available		
<b>Solubility in other solvents</b>	No information available		
<b>Partition coefficient</b>	No information available		
<b>Autoignition temperature</b>	No information available		
<b>Decomposition temperature</b>	No information available		
<b>Kinematic viscosity</b>	No information available		
<b>Dynamic viscosity</b>	No information available		
<b>Explosive properties</b>	No information available		
<b>Oxidizing properties</b>	No information available		
<b>Other Information</b>			
<b>Softening point</b>	No information available		
<b>Molecular weight</b>	No information available		
<b>VOC Content (%)</b>	No information available		
<b>Density</b>	No information available		
<b>Bulk density</b>	No information available		

**10. STABILITY AND REACTIVITY**

**Reactivity**

No data available

**Chemical stability**

Stable under recommended storage conditions.

**Possibility of Hazardous Reactions** None

under normal processing.

**Conditions to avoid**

Extremes of temperature and direct sunlight.

**Incompatible materials**

None known based on information supplied.

**Hazardous Decomposition Products**

None known based on information supplied.

**11. TOXICOLOGICAL INFORMATION**

**Information on likely routes of exposure**

**Product Information** No data available

**Inhalation** No data available.

**Eye contact** No data available.  
**Skin contact** No data available.  
**Ingestion** No data available.

Chemical Name	Oral LD50	Dermal LD50	Inhalation LC50
Water 7732-18-5	> 90 mL/kg (Rat)	-	-
Sodium hydroxide 1310-73-2	= 930 mg/kg (Rat)	-	-
Potassium cyanide 151-50-8			-

#### **Information on toxicological effects**

**Symptoms** No information available.

#### **Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Sensitization** No information available.  
**Germ cell mutagenicity** No information available.  
**Carcinogenicity** No information available.  
**Reproductive toxicity** No information available.  
**STOT - single exposure** No information available.  
**STOT - repeated exposure** No information available.  
**Aspiration hazard** No information available.

#### **Numerical measures of toxicity - Product Information**

The following values are calculated based on chapter 3.1 of the GHS document .

ATEmix (oral) 8,331.00  
ATEmix (dermal) 11,702.00

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity**

1.44 % of the mixture consists of component(s) of unknown hazards to the aquatic environment

Chemical Name	Algae/aquatic plants	Fish	Crustacea
Water 7732-18-5	-	-	-
Sodium hydroxide 1310-73-2	-	1270 - 1470: 96 h Pimephales promelas mg/L LC50 flow-through	-
Potassium cyanide 151-50-8	-	7.7 - 29.1: 96 h Poecilia reticulata mg/L LC50	2.1: 48 h Daphnia magna mg/L EC50

**Persistence and degradability**

No information available.

**Bioaccumulation**

No information available.

**Other adverse effects**

No information available

**13. DISPOSAL CONSIDERATIONS**

**Waste treatment methods**

**Disposal of wastes**

Disposal should be in accordance with applicable regional, national and local laws and regulations.

**Contaminated packaging**

Do not reuse container.

Chemical Name	RCRA	RCRA - Basis for Listing	RCRA - D Series Wastes	RCRA - U Series Wastes
Water 7732-18-5	-	-	-	-
Sodium hydroxide 1310-73-2	-	-	-	-
Potassium cyanide 151-50-8	-	-	-	-

Chemical Name	California Hazardous Waste Status
Water 7732-18-5	-
Sodium hydroxide 1310-73-2	-
Potassium cyanide 151-50-8	-
	-

**14. TRANSPORT INFORMATION**

**DOT**

UN/ID no. 1824

**Proper shipping name**

Sodium hydroxide solution

Hazard Class 8  
Packing Group II

**IATA**

UN/ID no. 1824  
Proper shipping name Sodium hydroxide solution

<b>Hazard Class</b>	8
<b>Packing Group</b>	II

**IMDG**

<b>UN/ID no.</b>	1824
<b>Proper shipping name</b>	Sodium hydroxide solution
<b>Hazard Class</b>	8
<b>Packing Group</b>	II

**15. REGULATORY INFORMATION****International Inventories**

<b>TSCA</b>	Complies
<b>DSL/NDSL</b>	Complies
<b>EINECS/ELINCS</b>	Complies
<b>ENCS</b>	Complies
<b>IECSC</b>	Complies
<b>KECL</b>	Complies
<b>PICCS</b>	Complies
<b>AICS</b>	Complies

**Legend:**

**TSCA** - United States Toxic Substances Control Act Section 8(b) Inventory

**DSL/NDSL** - Canadian Domestic Substances List/Non-Domestic Substances List

**EINECS/ELINCS** - European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances

**ENCS** - Japan Existing and New Chemical Substances

**IECSC** - China Inventory of Existing Chemical Substances

**KECL** - Korean Existing and Evaluated Chemical Substances

**PICCS** - Philippines Inventory of Chemicals and Chemical Substances

**AICS** - Australian Inventory of Chemical Substances

**US Federal Regulations****SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

**SARA 311/312 Hazard Categories**

<b>Acute health hazard</b>	No
<b>Chronic Health Hazard</b>	No
<b>Fire hazard</b>	No
<b>Sudden release of pressure hazard</b>	No
<b>Reactive Hazard</b>	No

**CWA (Clean Water Act)**

This product, as supplied, does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42).

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and

Reauthorization Act (SARA) (40 CFR 355). There may be specific reporting requirements at the local, regional, or state level pertaining to releases of this material.

**US State Regulations****California Proposition 65**

This product does not contain any Proposition 65 chemicals



**U.S. State Right-to-Know Regulations**

Chemical Name	New Jersey	Massachusetts	Pennsylvania
Water 7732-18-5	-	-	X
Sodium hydroxide 1310-73-2	-	-	-
Potassium cyanide 151-50-8	X	X	-

**U.S. EPA Label Information**

EPA Pesticide Registration Number Not applicable

**16. OTHER INFORMATION, INCLUDING DATE OF PREPARATION OF THE LAST REVISION**

**NFPA** \_\_\_\_\_ Health hazards 1      Flammability 0      Instability 0      Physical and Chemical Properties -  
**HMIS** \_\_\_\_\_ Health hazards 1      Flammability 0      Physical hazards 0      Personal protection X

Issue Date 14-Oct-2019

Revision Date 14-Oct-2019

**Revision Note**

No information available

**Disclaimer**

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The 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, unless specified in the text.

**End of Safety Data**

**Sheet** \_\_\_\_\_