



Safety Data Sheet
According to the (US) Hazard Communication Standard (29 CFR 1910.1200)

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

Product Name	Ammonia ISA Buffer
NCL Catalog Number	A-15Y
Product Description	Laboratory chemical, for use with Thermo Orion Classic Ammonia ISE.
Supplier	
NCL of Wisconsin, Inc.	Telephone: 1-800-648-7836 Fax: 715-449-2454
P.O. Box 8	Emergency Contact: 1-800-424-9300 (Chemtrec)
Biramwood, WI 54414	Email: nclabs@nclabs.com

SECTION 2: HAZARDS IDENTIFICATION

Classification of the Substance or Mixture

GHS Classification

Flammable Liquids	Category 4
Skin Corrosion	Category 1B
Serious Eye Damage	Category 1
Specific target organ toxicity	Single Exposure Category 1



Signal Word Danger

Hazard Statements

H227	Combustible liquid.
H314	Causes severe skin burns and eye damage.
H370	Causes damage to organs.

Precautionary Statements

P210	Keep away from heat, hot surfaces, sparks, open flames, and other ignition sources. No smoking.
P260	Do not breathe mist/vapors/spray.
P264	Wash exposed skin thoroughly after handling.
P270	Do not eat, drink or smoke when using this product.
P280	Wear protective gloves/protective clothing/eye protection/face protection.
P301+P330+P331	IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
P303+P361+P353	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water or shower.
P363	Wash contaminated clothing before reuse.
P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P310	Immediately call a POISON CENTER or doctor.
P305+P351+P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P310	Immediately call a POISON CENTER or doctor.
P308+P311	If exposed or concerned: Call a POISON CENTER or doctor.
P370+P378	In case of fire: Use carbon dioxide, powder, or alcohol-resistant foam to extinguish.

P403	Store in a well-ventilated place.
P405	Store locked up.
P501	Dispose of contents/containers to comply with local, state and federal regulations.

Other Hazards Not Contributing to the Classification

None under normal conditions.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Identity Not applicable

Common Name Not applicable

Mixture

Name	CAS #	Approximate %
Water	7732-18-5	>74
Sodium Hydroxide	1310-73-2	20
Methanol	67-56-1	4
EDTA, Disodium Salt	6381-92-6	2
Thymolphthalein	125-20-2	<0.1

SECTION 4: FIRST AID MEASURES

Description of First Aid Measures

General First Aid Measures	Never give anything by mouth to an unconscious person. Seek medical advice if you feel unwell.
If Inhaled	Remove person to fresh air and keep comfortable for breathing. Immediately call a POISON CENTER or doctor/physician.
In Case of Skin Contact	Remove all contaminated clothing. Rinse skin with water/shower. Immediately call a POISON CENTER or doctor/physician.
In Case of Eye Contact	Rinse carefully with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a POISON CENTER or doctor/physician.
If Swallowed	Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER or doctor.

Most Important Symptoms/Effects Acute and Delayed

After Inhalation	Coughing. Irritation of the respiratory tract. Irritation of the nasal mucous membranes.
After Skin Contact	Caustic burns and skin corrosion.
After Eye Contact	Causes serious eye damage.
After Ingestion	Abdominal pain. Bleeding of the gastrointestinal tract. Burns to the gastric and intestinal mucosa. Possible esophageal perforation and nausea.

Indication of Immediate Medical Attention and Special Treatment Needed

Seek medical attention if exposed.

SECTION 5: FIRE-FIGHTING MEASURES

Extinguishing Media

Suitable Extinguishing Media Foam. Dry powder. Carbon dioxide. Water spray. Sand.

Unsuitable Extinguishing Media Do not use a heavy water stream.

Special Hazards Arising from the Chemical Reacts with some metals: release of highly flammable gases/vapours (hydrogen). Thermal decomposition generates corrosive vapors.

Special Protective Actions for Fire-Fighters Wear self-contained breathing apparatus and protective clothing. Keep containers cool with water spray.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Personal Precautions, Protective Equipment and Emergency Procedures

Personal Precautions	Use personal protective equipment (see section 8). Evacuate area of non-essential personnel. Eliminate ignition sources.
Environmental Precautions	Prevent entry to sewers and public waters.
Methods and Materials for Containment and Cleaning Up	Collect spillage with inert absorbent material. Store away from other materials. Wash clothing/equipment after handling. Ensure compliance with federal, state, and local regulations.

SECTION 7: HANDLING AND STORAGE

Handling and Storage

Precautions for Safe Handling	Avoid contact with eyes and skin. Avoid breathing vapors. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Provide good ventilation in process area to prevent formation of vapor.
Conditions for Safe Storage Including any Incompatibilities	Keep in a tightly closed container, stored in a cool, dry, ventilated area. Store away from sunlight, which can contribute to instability. Store away from strong acids, metals, and metal powders.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

Control Parameters

Sodium Hydroxide (1310-73-2)		
USA ACGIH	ACGIH Ceiling (mg/m ³)	2 mg/m ³
USA OSHA	OSHA PEL TWA (mg/m ³)	2 mg/m ³
Methanol (67-56-1)		
USA ACGIH	ACGIH TLV (ppm)	200 ppm
USA ACGIH	ACGIH TWA (ppm)	200 ppm
USA OSHA	OSHA PEL (ppm)	200 ppm
USA OSHA	OSHA TWA (ppm)	200 ppm

Appropriate Engineering Controls	Material should be handled or transferred in a fume hood or with equivalent ventilation.
Individual Protection Measures	Avoid all unnecessary exposure.
Skin Protection	Rubber or neoprene gloves and additional protection including impervious boots, apron, or coveralls, as needed in areas of unusual exposure to prevent skin contact.
Eye Protection	Use chemical safety goggles and /or a full face shield where splashing is possible. Contact lenses should not be worn when working with this material. Maintain eye-wash fountain and quick-drench facilities in work area.
Respiratory Protection	Wear appropriate mask.
Other Information	Do not eat, drink, or smoke during use.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

Physical State	Liquid
Color	Dark blue
Odor	Slight alcohol odor
Odor Threshold	Not determined
pH	Strongly alkaline (14)
Melting Point/Freezing Point	Not determined
Initial Boiling Point and Boiling Range	Not determined
Flash Point	Not determined
Evaporation Rate	Not determined
Flammability (Solid, Gas)	Not determined
Upper/Lower Flammability/Explosive Limits	Not determined
Vapor Pressure	Not determined

Vapor Density	Not determined
Relative Density	Not determined
Solubility	Not determined
Partition Coefficient: n-octanol/water	Not determined
Auto-Ignition Temperature	Not determined
Decomposition Temperature	Not determined
Viscosity	Not determined

SECTION 10: STABILITY AND REACTIVITY

Reactivity	No data available.
Chemical Stability	Stable under ordinary conditions of use and storage.
Possibility of Hazardous Reactions	No data available.
Conditions to Avoid	Extremely high or low temperatures. Heat and sunlight can contribute to instability.
Incompatible Materials	Strong oxidizers, chromic acid, sodium peroxide, nitric acid, strong alkali, heat, and flame.
Hazardous Decomposition Products	When heated to decomposition, can emit toxic gases, carbon dioxide, and carbon monoxide.

SECTION 11: TOXICOLOGICAL INFORMATION

Acute Toxicity	Not classified
Water (7732-18-5)	
LD50 oral rat	≥90000 mg/kg
Sodium Hydroxide (1310-73-2)	
LD50 dermal rabbit	1350 mg/kg
Methanol (67-56-1)	
Orl-hmn LDLo	143 mg/kg
Inh-rat LC50	64000 ppm/4H
Orl-rat LD50	5628 mg/kg
Skin-rbt LD50	15800 mg/kg

Skin Corrosion/Irritation	Causes skin burns.
Serious Eye Damage/Irritation	Causes serious eye damage.
Respiratory or Skin Sensitization	Not classified
Germ Cell Mutagenicity	Not classified
Carcinogenicity	Not classified
Reproductive Toxicity	Not classified
Specific Target Organ Toxicity (Single Exposure)	Not classified
Specific Target Organ Toxicity (Repeated Exposure)	Not classified
Aspiration Hazard	Not classified
Potential Adverse Human Health Effects and Symptoms	No data available.
Symptoms/Injuries After Inhalation	Coughing, irritation of the respiratory tract. Irritation of the nasal mucous membranes.
Symptoms/Injuries After Skin Contact	Caustic burns and corrosion of the skin.
Symptoms/Injuries After Eye Contact	Causes serious eye damage.
Symptoms/Injuries After Ingestion	Abdominal pain. Bleeding of the gastrointestinal tract. Burns to the gastric/intestinal mucosa. Possibility of esophageal perforation and nausea.

SECTION 12: ECOLOGICAL INFORMATION

Toxicity	Not applicable
Persistence and Degradability	Not applicable
Bioaccumulative Potential	Not applicable
Mobility in Soil	Not applicable
Other Adverse Effects	Not applicable

SECTION 13: DISPOSAL CONSIDERATIONS

Methods of Disposal

Disposal Recommendations	Dispose of contents/containers in accordance with federal, state, and local regulations.
Ecology-Waste Materials	Avoid release to the surrounding environment.

SECTION 14: TRANSPORT INFORMATION

UN Number	UN1760
UN Shipping Name	Corrosive liquids, n.o.s.
Transport Hazard Class(es)	Not applicable
Packing Group	Not applicable
Environmental Hazards	Not applicable
Transport in Bulk	Not applicable
Special Precautions	Not applicable

SECTION 15: REGULATORY INFORMATION

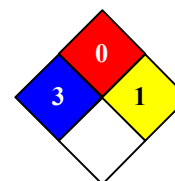
Sodium Hydroxide (1310-73-2)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Methanol (67-56-1)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Water (7732-18-5)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
EDTA, Disodium Salt (6381-92-6)
Listed on the United States TSCA (Toxic Substances Control Act) inventory
Thymolphthalein (125-20-2)
Listed on the United States TSCA (Toxic Substances Control Act) inventory

SECTION 16: OTHER INFORMATION

Revision Date: 01/21/2015

NFPA Hazards

Health Hazard	3: Short exposure could cause serious temporary or moderate residual injury.
Fire Hazard	0: Materials that will not burn.
Reactivity/Instability	1: Materials that require considerable preheating, under all ambient temperature conditions, before ignition and combustion can occur.



HMIS III Rating

Health 3: Major injury likely unless prompt action is taken and medical treatment is given.

Flammability 0: Materials that will not burn.

Physical Hazard 1: Materials that are normally stable, but can become unstable at high temperatures and pressures.

Personal Protection D

A-15Y	
Health	3
Flammability	0
Physical Hazard	1
Personal Protection	D

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END OF SAFETY DATA SHEET