



Material Safety Data Sheet
Buffer Solution pH 5.00

MSDS# 41124

Section 1 - Chemical Product and Company Identification

MSDS Name: Buffer Solution pH 5.00
Catalog Numbers: SB102-1, SB102-500
Synonyms: None
Company Identification: Fisher Scientific
One Reagent Lane
Fair Lawn, NJ 07410
For information in the US, call: 201-796-7100
Emergency Number US: 201-796-7100
CHEMTREC Phone Number, US: 800-424-9300

Section 2 - Composition, Information on Ingredients

Risk Phrases:

CAS#: 877-24-7
Chemical Name: Potassium hydrogen phthalate
%: 1.0
EINECS#: 212-889-4
Hazard Symbols:

Risk Phrases: 35

CAS#: 1310-73-2
Chemical Name: Sodium hydroxide
%: 0.1
EINECS#: 215-185-5
Hazard Symbols: C

Risk Phrases:

CAS#: 7732-18-5
Chemical Name: Water
%: 98.9
EINECS#: 231-791-2
Hazard Symbols:

Text for R-phrases: see Section 16

Hazard Symbols: None listed
Risk Phrases: None listed

Section 3 - Hazards Identification

EMERGENCY OVERVIEW

Caution! May cause eye, skin, and respiratory tract irritation. Target Organs: None.

Potential Health Effects

Eye: Causes eye irritation.

Skin: May cause skin irritation.
 Ingestion: May cause irritation of the digestive tract.
 Inhalation: May cause respiratory tract irritation.
 Chronic: No information found.

Section 4 - First Aid Measures

Eyes: Get medical aid. Gently lift eyelids and flush continuously with water.
 Skin: Get medical aid if irritation develops or persists. Flush skin with plenty of soap and water.
 Ingestion: Get medical aid. Do NOT induce vomiting. If conscious and alert, rinse mouth and drink 2-4 cupfuls of milk or water.
 Inhalation: Remove from exposure and move to fresh air immediately. If not breathing, give artificial respiration. If breathing is difficult, give oxygen. Get medical aid.
 Notes to Physician:

Section 5 - Fire Fighting Measures

General Information: As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear.
 Extinguishing Media: Substance is noncombustible; use agent most appropriate to extinguish surrounding fire.
 Autoignition Temperature: Not applicable.
 Flash Point: Not applicable.
 Explosion Limits: Not available
 Lower:
 Explosion Limits: Not available
 Upper:
 NFPA Rating: health: 1; flammability: 0; instability: 0;

Section 6 - Accidental Release Measures

General Information: Use proper personal protective equipment as indicated in Section 8.
 Spills/Leaks: Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container.

Section 7 - Handling and Storage

Handling: Use with adequate ventilation. Avoid contact with eyes. Keep container tightly closed.
 Storage: Store in a cool, dry place.

Section 8 - Exposure Controls, Personal Protection

Chemical Name	ACGIH	NIOSH	OSHA - Final PELs
Potassium hydrogen phthalate	none listed	none listed	none listed
Sodium hydroxide	2 mg/m3 Ceiling	10 mg/m3 IDLH	2 mg/m3 TWA
Water	none listed	none listed	none listed

OSHA Vacated PELs: Potassium hydrogen phthalate: None listed Sodium hydroxide: None listed Water: None listed

Engineering Controls:

Good general ventilation should be sufficient to control airborne levels.

Exposure Limits

Personal Protective Equipment

Eyes: Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166.
 Skin: Wear appropriate gloves to prevent skin exposure.
 Clothing: Wear appropriate protective clothing to minimize contact with skin.
 Follow the OSHA respirator regulations found in 29 CFR 1910.134 or European Standard EN 149. Use a

Respirators: NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced.

Section 9 - Physical and Chemical Properties

Physical State: Liquid

Color: not available

Odor: none reported

pH: 5.0

Vapor Pressure: Not available

Vapor Density: Not available

Evaporation Rate: Not available

Viscosity: Not available

Boiling Point: 100 deg C (212.00°F)

Freezing/Melting Point: 0 deg C (32.00°F)

Decomposition Temperature: Not available

Solubility in water: Soluble in water.

Specific Gravity/Density: Not available.

Molecular Formula: Mixture

Molecular Weight: 0

Section 10 - Stability and Reactivity

Chemical Stability:	Stable.
Conditions to Avoid:	None reported.
Incompatibilities with Other Materials	Not available
Hazardous Decomposition Products	None reported.
Hazardous Polymerization	Has not been reported.

Section 11 - Toxicological Information

RTECS#:	CAS# 877-24-7: CZ4326000 CAS# 1310-73-2: WB4900000 CAS# 7732-18-5: ZC0110000 RTECS: CAS# 877-24-7: Dermal, guinea pig: LD50 = >1 gm/kg; Oral, rat: LD50 = >3200 mg/kg; . RTECS: CAS# 1310-73-2: Draize test, rabbit, eye: 400 ug Mild; Draize test, rabbit, eye: 1% Severe; Draize test, rabbit, eye: 50 ug/24H Severe; Draize test, rabbit, eye: 1 mg/24H Severe; Draize test, rabbit, skin: 500 mg/24H Severe; . RTECS: CAS# 7732-18-5: Oral, rat: LD50 = >90 mL/kg; . Potassium hydrogen phthalate - Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65.
LD50/LC50:	Sodium hydroxide - Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65. Water - Not listed as a carcinogen by ACGIH, IARC, NTP, or CA Prop 65.
Carcinogenicity:	
Other:	See actual entry in RTECS for complete information.

Section 12 - Ecological Information

Other: No information available.

Section 13 - Disposal Considerations

Dispose of in a manner consistent with federal, state, and local regulations.

Section 14 - Transport Information

US DOT
Shipping Name: Not Regulated
Hazard Class:
UN Number:
Packing Group:
Canada TDG
Shipping Name: Not available
Hazard Class:
UN Number:
Packing Group:

USA RQ: CAS# 1310-73-2: 1000 lb final RQ; 454 kg final RQ

Section 15 - Regulatory Information

European/International Regulations

European Labeling in Accordance with EC Directives

Hazard Symbols: Not available

Risk Phrases:

Safety Phrases:

S 24/25 Avoid contact with skin and eyes.

WGK (Water Danger/Protection)

CAS# 877-24-7: Not available

CAS# 1310-73-2: 1

CAS# 7732-18-5: Not available

Canada

CAS# 877-24-7 is listed on Canada's DSL List

CAS# 1310-73-2 is listed on Canada's DSL List

CAS# 7732-18-5 is listed on Canada's DSL List

Canadian WHMIS Classifications: Not controlled.

This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations and the MSDS contains all of the information required by those regulations.

CAS# 877-24-7 is not listed on Canada's Ingredient Disclosure List.

CAS# 1310-73-2 is listed on Canada's Ingredient Disclosure List

CAS# 7732-18-5 is not listed on Canada's Ingredient Disclosure List.

US Federal

TSCA

CAS# 877-24-7 is listed on the TSCA Inventory.

CAS# 1310-73-2 is listed on the TSCA Inventory.

CAS# 7732-18-5 is listed on the TSCA Inventory.

Section 16 - Other Information

MSDS Creation Date: 9/02/1997

Revision #7 Date 7/20/2009

The information above is believed to be accurate and represents the best information currently available to us. However, we make no warranty of merchantability or any other warranty, express or implied, with respect to such information, and we assume no liability resulting from its use. Users should make their own investigations to determine the suitability of the information for their particular purposes. In no

event shall the company be liable for any claims, losses, or damages of any third party or for lost profits or any special, indirect, incidental, consequential, or exemplary damages howsoever arising, even if the company has been advised of the possibility of such damages.
