

SAFETY DATA SHEET

1. PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: FLEX Chlorine Bleach

OTHER MEANS OF IDENTIFICATION: Not applicable.

GENERAL USE: For professional laundry use only.

PRODUCT DESCRIPTION: Sodium Hypochlorite Solution

MANUFACTURER

R. R. Street & Co. Inc.

184 Shuman Boulevard/Suite 150

Naperville, IL 60563

Product Information: 800-323-7206 (USA & Canada only) or 630-416-4244

24 HR. EMERGENCY TELEPHONE NUMBERS

Medical Emergency: 866-303-6947 (USA & Canada only) or 651-632-9272

Transportation Emergency: 800-424-9300 (USA & Canada only) or 703-527-3887

2. HAZARDS IDENTIFICATION

GHS CLASSIFICATION OF THE SUBSTANCE OR MIXTURE

Skin Corrosion/Irritation: Category 1B

Eye Damage/Irritation: Category 1

GHS LABEL ELEMENTS

Symbol(s):



Signal Word: Danger

Hazard Statements:

H314 – Causes severe skin burns and eye damage.

Precautionary Statements:

P260 – Do not breathe dust/fume/gas/mist/vapors/spray.

P264 – Wash skin thoroughly after handling.

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

P301+ P330+P331+P310 – IF SWALLOWED: Rinse mouth. Do not induce vomiting. Immediately call a POISON CENTER or doctor/physician.

P303+P361+P353 – IF ON SKIN (or hair): Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.

P304+P340+P310 – IF INHALED: Remove person to fresh air and keep comfortable for breathing. Remove affected person to fresh air and keep in a position comfortable for breathing. Immediately call a POISON CENTER or doctor/physician.

P305+P351+P338+P310 – 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/physician.

P363 – Wash contaminated clothing before reuse.

P501 – Dispose of contents/container in accordance with local/ regional/ national/ international regulations.

Other Hazards: Contact with acids or ammonia liberates toxic gas. Sodium hypochlorite is a strong oxidizer which enhances the combustion of other substances.

Unknown Acute Toxicity: Not applicable.

3. COMPOSITION / INFORMATION ON INGREDIENTS

<u>Chemical Name</u>	<u>Wt.%</u>	<u>CAS#</u>
Sodium hypochlorite	10 - 20	7681-52-9
Sodium hydroxide	0.3 - 1	1310-73-2
Sodium chloride	9 -13	7647-14-5
Sodium carbonate	< 0.5	497-19-8

COMMENTS: None.

4. FIRST AID MEASURES

EYES: Immediately flush eyes with plenty of water for at least 15 minutes. Get immediate medical attention. Continue rinsing eyes during transport to hospital.

SKIN: Remove contaminated clothing and shoes immediately. Wash off with soap and plenty of water. Consult a physician.

INGESTION: Rinse mouth. Do not induce vomiting unless instructed to do so by poison center or physician. Consult a physician.

INHALATION: Remove affected person to fresh air. If not breathing, give artificial respiration. Get immediate medical attention.

SIGNS AND SYMPTOMS OF OVEREXPOSURE

EYES: Severe irritation, burning sensation.

SKIN: Severe irritation, burning sensation.

SKIN ABSORPTION: No data available.

INGESTION: Nausea, vomiting, diarrhea.

INHALATION: Cough, wheezing, laryngitis, shortness of breath, spasm, inflammation of larynx and bronchi. Severe irritation of the nose, throat and respiratory tract. Cough, runny nose.

ADDITIONAL INFORMATION: After emergency actions, call the emergency medical information number on page 1 or a physician immediately.

5. FIRE FIGHTING MEASURES

FLAMMABLE CLASS: Not applicable

EXTINGUISHING MEDIA Not applicable.

HAZARDOUS COMBUSTION PRODUCTS: Bleach decomposes when heated. May result in formation of hydrogen chloride gas and sodium oxides.

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

6. ACCIDENTAL RELEASE MEASURES

SMALL SPILL: Keep away from incompatible materials. Prevent further leakage or spillage if safe to do so. Soak up with inert absorbent material and place in suitable, closed containers for disposal. (see section 13).

LARGE SPILL: Use personal protective equipment. For personal protection see section 8. Avoid breathing vapors, mist or gas. Ensure adequate ventilation. Isolate the area. Evacuate personnel to safe areas. Prevent further leakage or spillage if safe to do so. Keep unnecessary personnel away. Do not let product enter drains. Discharge into the environment must be avoided. Soak up with inert absorbent material and dispose of as hazardous waste. Do not flush with water. Keep in suitable, closed containers for disposal (see section 13).

7. HANDLING AND STORAGE

GENERAL PROCEDURES: Avoid inhalation of vapor or mist.

HANDLING: Avoid contact with skin and eyes. Avoid inhalation of vapor or mist. Use only in well-ventilated areas. Not suitable for use in contact with most metals and metal alloys. For precautions see section 2.

STORAGE: Keep container tightly closed in a cool, dry, well-ventilated place away from sunlight. Containers which are opened must be carefully resealed and kept upright to prevent leakage. Never allow product to get in contact with water during storage. Do not store near acids. Do not store near incompatible materials (see section 10). Recommended storage temperature 35 - 46 °F/ 2 - 8 °C Storage class (TRGS 510): Non-combustible, corrosive hazardous materials.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

EXPOSURE GUIDELINES:

OSHA HAZARDOUS COMPONENTS (29 CFR 1910.1200)

	<u>EXPOSURE LIMITS</u>					
	<u>OSHA PEL</u>		<u>ACGIH TLV</u>		<u>Supplier OEL</u>	
	<u>ppm</u>	<u>mg/m³</u>	<u>ppm</u>	<u>mg/m³</u>	<u>ppm</u>	<u>mg/m³</u>
Sodium hypochlorite	TWA	NE ^[1]	NE	NE	0.5	NE
	STEL	NE	NE	NE	NE	2
Sodium hydroxide	TWA	NE	NE	NE	NE	NE
	STEL	NE	NE	NE	NE	NE
Sodium chloride	TWA	NE	NE	NE	NE	NE
	STEL	NE	NE	NE	NE	NE
Sodium carbonate	TWA	NE	NE	NE	NE	NE
	STEL	NE	NE	NE	NE	NE

TABLE FOOTNOTES:

1. NE=Not established.

ENGINEERING CONTROLS: Good general ventilation should be sufficient to control airborne levels.

PERSONAL PROTECTIVE EQUIPMENT

EYES AND FACE: Tightly fitting safety goggles. Face shield (8-inch minimum). Use equipment for eye protection tested and approved under appropriate government standards such as NIOSH (US) or EN 166(EU).

SKIN: Handle with Nitrile gloves (≥ 11 mm thickness). Gloves must be inspected prior to use. Use proper glove removal technique (without touching glove's outer surface) to avoid skin contact with this product. Dispose of contaminated gloves after use in accordance with applicable. Wash and dry hands

RESPIRATORY: Where risk assessment shows air-purifying respirators are appropriate use a full-face respirator with multi-purpose combination (US) or type ABEK (EN 14387) respirator cartridges as a backup to engineering controls. If the respirator is the sole means of protection, use a full-face supplied air respirator. Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU)

PROTECTIVE CLOTHING: Where contact is likely, wear the appropriate chemical resistant equipment, which depending on circumstances may include gloves, a chemical suit, rubber boots, and chemical safety goggles plus a face shield. The type of protective equipment must be selected according to the concentration and amount of the dangerous substance at the specific workplace.

WORK HYGIENIC PRACTICES: Wash thoroughly after handling. Do not smoke, eat or drink in work area. Routinely wash work clothing and protective equipment to remove contaminants.

OTHER USE PRECAUTIONS: Have eye wash station available. Do not wear contact lenses without eye protection.

9. PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Clear.

PHYSICAL STATE: Liquid.

COLOR: Colorless to light yellow-green.

ODOR: Pungent, chlorine bleach odor.

ODOR THRESHOLD: No data available.

pH: No data available.

FREEZING POINT: -30 to -20 °C (-22 to -4 °F).

INITIAL BOILING POINT: 111°C (232°F)

FLASHPOINT: No data available.

EVAPORATION RATE: No data available.

FLAMMABILITY (Solid, Gas): No data available.

FLAMMABLE LIMITS: No data available.

VAPOR PRESSURE: 23.3 hPa (17.5 mmHg) at 20°C (68°F)

VAPOR DENSITY: No data available.

RELATIVE DENSITY: 1.21 g/mL at 25 °C (77 °F)

SOLUBILITY IN WATER: Complete

PARTITION COEFFICIENT (Log K_{ow}): No data available.

AUTOIGNITION TEMPERATURE: Not available.

DECOMPOSITION TEMPERATURE: No data available.

VISCOSITY: No data available.

PERCENT VOLATILE: No data available.

10. STABILITY AND REACTIVITY

REACTIVITY: No data available.

CHEMICAL STABILITY: Stable under recommended storage conditions

POSSIBILITY OF HAZARDOUS REACTIONS: No data available.

CONDITIONS TO AVOID: Never allow product to get in contact with water during storage. Do not store near acids. Do not allow mixture with incompatible materials (see below).

INCOMPATIBLE MATERIALS: Strong acids, organic materials, powdered metals, amines, heavy metals, stainless steel, reducing agents, ether, ammonia, acids, ammonium acetate, ammonium nitrate, urea. Forms shock-sensitive mixtures with certain other materials. Reacts violently with ammonium salts, aziridine, methanol, and phenylacetonitrile, sometimes resulting in explosions. Reacts with primary aliphatic or aromatic amines to form explosively unstable N-chloramines. Reaction with formic acid becomes explosive at 55°C.

HAZARDOUS DECOMPOSITION PRODUCTS: Hypochlorous acid, chlorine, hydrochloric acid, sodium chlorate.

11. TOXICOLOGICAL INFORMATION

ROUTES OF ENTRY: Inhalation and skin.

ACUTE TOXICITY (ATE)

DERMAL LD₅₀: No data available.

ORAL LD₅₀: > 2,000 mg/kg (mouse)

INHALATION LC₅₀: No data available.

CHRONIC TOXICITY

TARGET ORGANS: No data available.

SENSITIZATION: May occur with repeated or prolonged exposure.

CARCINOGENICITY

IARC: Sodium hypochlorite is classified as Group 3 (Not classifiable as to its carcinogenicity to humans).

NTP: Not listed as a carcinogen.

OSHA: Not listed as a carcinogen.

OTHER: No data available.

OTHER: No data available.

REPRODUCTIVE EFFECTS: Insufficient data available.

MUTAGENICITY: No data available.

SYNERGISTIC MATERIALS: No data available

POTENTIAL HEALTH EFFECTS

EYES: Causes eye damage. Chronic exposure can cause corneal scarring and clouding, glaucoma, cataracts, permanent blindness.

SKIN: Material is destructive to skin.

SKIN ABSORPTION: Insufficient data available.

INGESTION: Will immediately cause severe corrosion of the gastrointestinal tract, bleeding and tissue ulceration.

ASPIRATION HAZARD: Insufficient data available.

INHALATION: May cause pneumonitis, and edema of the larynx, bronchi and lungs. May cause reduction in pulmonary function and permanent lung damage.

MEDICAL CONDITIONS AGGRAVATED: No data available.

GENERAL COMMENTS: Refer to Section 2 for additional information on potential health effects.

12. ECOLOGICAL INFORMATION

ECOTOXICITY: Sodium hypochlorite is toxic to aquatic organisms.

PERSISTENCE AND DEGRADABILITY: Insufficient data available.

BIOACCUMULATIVE POTENTIAL: Insufficient data available.

MOBILITY IN SOIL: Insufficient data available.

OTHER ADVERSE EFFECTS: An environmental hazard cannot be excluded in the event of unprofessional handling or disposal. Very toxic to aquatic life with long lasting effects.

13. DISPOSAL CONSIDERATIONS

DISPOSAL METHOD: Dispose of in accordance with federal, state and local regulations.

EMPTY CONTAINER: Dispose of in accordance with local regulations. If partly filled: Call your local solid waste agency for disposal instructions. Since emptied containers may retain product residue, follow label warnings even after container is emptied. Do not reuse empty containers.

RCRA/EPA WASTE INFORMATION: Contains no material listed by RCRA as a hazardous waste.

14. TRANSPORT INFORMATION

DOT (DEPARTMENT OF TRANSPORTATION)

PROPER SHIPPING NAME: Hypochlorite Solutions.

TECHNICAL NAME: Not applicable.

PRIMARY HAZARD CLASS/DIVISION: 8

UN/NA NUMBER: UN1791

PACKING GROUP: III

LABEL: Not applicable.

REPORTABLE QUANTITY (RQ) UNDER CERCLA: 667 lbs

OTHER SHIPPING INFORMATION: Read safety instructions, SDS and emergency procedures before handling. Read safety instructions, SDS and emergency procedures before handling.

CANADA TRANSPORT OF DANGEROUS GOODS

PROPER SHIPPING NAME: Hypochlorite Solutions.

PRIMARY HAZARD CLASS/DIVISION: 8

UN/NA NUMBER: UN1791

PACKING GROUP: III

OTHER SHIPPING INFORMATION: Read safety instructions, SDS and emergency procedures before handling. Read safety instructions, SDS and emergency procedures before handling.

AIR (ICAO/IATA)

PROPER SHIPPING NAME: Hypochlorite Solutions.

PRIMARY HAZARD CLASS/DIVISION: 8

UN/NA NUMBER: UN1791

PACKING GROUP: III

LABEL: Consult applicable regulations governing air shipments.

PLACARDS: Consult applicable regulations governing air shipments.

IATA NOTE: Consult applicable regulations on packaging requirements.

15. REGULATORY INFORMATION**UNITED STATES****SARA TITLE III (SUPERFUND AMENDMENTS AND REAUTHORIZATION ACT)****311/312 HAZARD CATEGORIES:**

FIRE: No. **PRESSURE GENERATING:** No. **REACTIVITY:** No. **ACUTE:** Yes.
CHRONIC: No.

313 REPORTABLE INGREDIENTS: Not applicable.

CERCLA (COMPREHENSIVE RESPONSE, COMPENSATION, AND LIABILITY ACT)

CERCLA RQ: Not applicable.

REPORTABLE SPILL QUANTITY: Not applicable.

RCRA STATUS: See section 13.

MEXICO

Regulated for ground transportation.

STATE REGULATIONS**MASSACHUSETTS**

Sodium hypochlorite is regulated by the Massachusetts Substance List.

NEW JERSEY

Sodium hypochlorite is classified as a workplace hazard.

PENNSYLVANIA

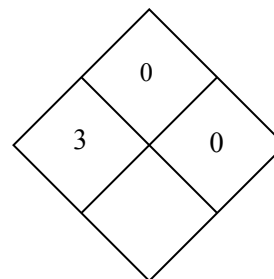
Sodium hypochlorite is on the Pennsylvania Hazardous Substance List.

CALIFORNIA

This product does not contain any chemicals known to State of California to cause cancer, birth defects, or any other reproductive harm.

16. OTHER INFORMATION

HMIS RATINGS	
HEALTH:	3
FLAMMABILITY:	0
REACTIVITY:	0
PERSONAL PROTECTION:	H

NFPA RATINGS

SDS Revision Date: January 29, 2020