

SAFETY DATA SHEET

SECTION 1: PRODUCT AND COMPANY IDENTIFICATION

PRODUCT NAME: LIQUID CHLORINE BLEACH
 PRODUCT NO: TM299
 RECOMMENDED USE: Bleach concentrate

COMPANY: TRANS-MATE, INC.
 13 Sterling Road
 N. Billerica, MA 01862
 USA
 978-667-0100

EMERGENCY TELEPHONE NUMBER: Trans-Mate – 978-667-0100
 CHEMTREC – 800-424-9300

SECTION 2: HAZARDS IDENTIFICATION

Danger
 Causes severe skin burns and eye damage. Harmful if swallowed or inhaled.

Wear protective gloves and eye protection. Wash thoroughly after handling. Do not eat drink or smoke when using this product. Do not breathe mists. Use only outdoors or in a well-ventilated area.

If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a doctor.

If on skin: Take off immediately contaminated clothing and wash it before reuse. Rinse skin with water. Immediately call a doctor.

If swallowed: Rinse mouth. Do NOT induce vomiting. Immediately call a doctor.

If inhaled: Remove person to fresh air and keep comfortable for breathing. Immediately call a doctor.

Store locked up.

Dispose of contents/container in accordance with local/state/federal regulations.



SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

| INGREDIENT | CAS # | WEIGHT % |
|---------------------|-----------|-----------|
| Sodium hypochlorite | 7681-52-9 | 13.2-14.1 |
| Sodium hydroxide | 1310-73-2 | 0.2-0.6 |

*Identity of this ingredient is a trade secret
 **Exact percentage of this ingredient is a trade secret

SECTION 4: FIRST AID MEASURES

If in eyes: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing. Immediately call a doctor.

If on skin: Take off immediately contaminated clothing and wash it before reuse. Rinse skin with water. Immediately call a doctor.

If swallowed: Rinse mouth. Do NOT induce vomiting. Immediately call a doctor.

If inhaled: Remove person to fresh air and keep comfortable for breathing. Immediately call a doctor.

SECTION 5: FIRE FIGHTING MEASURES

EXTINGUISHING MEDIA: Use water spray, dry chemical, carbon dioxide or "alcohol" foam.

UNUSUAL FIRE AND EXPLOSION HAZARDS: Combustion may produce noxious and irritating gases which will require fresh air source in fire fighting.

SPECIAL FIRE FIGHTING PROCEDURES: Firefighters should be equipped with self-contained breathing apparatus and turnout gear as a general precaution.

SECTION 6: ACCIDENTAL RELEASE MEASURES

Use personal protective equipment; see Section 8.

Keep product from entering storm sewers and ditches that may lead to waterways.

Stop spill at source; dike and contain large spills and transfer to recovery container. Use absorbent for small spills and containerize.

See Section 13 for disposal.

SECTION 7: HANDLING AND STORAGE

Handle according to good manufacturing and warehousing practices. Avoid contact with eyes, skin and clothing.

Store indoors between 40F/4C and 100F/38C

Use product only for intended use. Follow label directions.

Wash hands after handling.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

| INGREDIENT | CAS # | OSHA PEL (ppm or *mg.M ³) +=skin, c=ceiling | ACGIH TLV (ppm or *mg.M ³) +=skin, c=ceiling |
|------------------|-----------|---|--|
| Sodium hydroxide | 1310-73-2 | 2*c | 2*c |

EYES: Wear eye protection (i.e. chemical safety glasses with side shields or goggles). Contact lenses should not be worn.

SKIN: Chemical resistant clothing (i.e. gloves) is recommended.

RESPIRATORY PROTECTION: Not expected to be needed. Where over-exposure through inhalation may occur from use, approved respiratory protection equipment is recommended.

VENTILATION: Local exhaust or general room ventilation is normally adequate.

OTHER PROTECTIVE EQUIPMENT: Emergency eye wash station is recommended.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

APPEARANCE: Green/yellow liquid
 ODOR: Strong chlorine odor
 ODOR THRESHOLD: NA
 pH: 12
 MELTING/FREEZING POINT: Approx. 32F/0C
 BOILING POINT: APPROX 212F/100C
 BOILING RANGE: NA
 FLASH POINT (CC): none
 EVAPORATION RATE: Approx. that of water
 FLAMMABILITY: Not flammable nor combustible
 UPPER/LOWER FLAMMABILITY LIMITS: NA
 UPPER/LOWER EXPLOSIVE LIMITS: NA
 VAPOR PRESSURE: NA
 VAPOR DENSITY: NA
 RELATIVE DENSITY_{10 LB/GAL}
 SOLUBILITY: Soluble in Water
 PARTITION COEFFICIENT: N-OCTANOL/WATER: NA
 AUTO-IGNITION TEMPERATURE: NA
 DECOMPOSITION TEMPERATURE: NA
 VISCOSITY: Water thin

SECTION 10: STABILITY AND REACTIVITY

REACTIVITY: Oxidizing agent
 CHEMICAL STABILITY: Stable
 POSSIBILITY OF HAZARDOUS REACTIONS: Moderate
 INCOMPATIBLE MATERIALS: Avoid reducing agents, acids and ammonia.
 HAZARDOUS DECOMPOSITION PRODUCTS: Chlorine gas

SECTION 11: TOXICOLOGICAL INFORMATION

This product contains no ingredients at or about 0.1% that are listed by NTP, IARC, or OSHA as carcinogens.

SECTION 12: ECOLOGICAL INFORMATION

Ecological data for this chemical mixture is not available.

SECTION 13: DISPOSAL CONSIDERATIONS

Dispose of in accordance with federal, state and local environmental regulations.

SECTION 14: TRANSPORT INFORMATION

| Regulatory information | UN number | Proper shipping name | Class | Packing group | Label | Additional information |
|------------------------|-----------|------------------------|-------|---------------|-------|------------------------|
| DOT | 1791 | Hypochlorite Solutions | 8 | PGIII | - | - |

SECTION 15: REGULATORY INFORMATION

RTK Ingredients: Water (7732-18-5), Sodium hypochlorite (7681-52-9), Sodium hydroxide (1310-73-2), Sodium chloride (7647-14-5)

SECTION 16: OTHER INFORMATION

NFPA 704

HAZARD RATING

4=Severe H=Health H=3

3=Serious F=Fire F=0

2=Moderate R=Reactivity R=2

1=Slight

0=Minimal

Prepared: January 2, 2015

The information provided in this Material 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 guidance for the safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information related 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. Neither this data sheet nor any statement contained herein grants or extends any license, expressed or implied, in connection with patents issued or pending which maybe the property of the manufacturer or others. The information in this data sheet has been assembled by the manufacturer or his agent based on its own studies and on the work of others. Neither the manufacturer nor his agent makes any warranty, expressed or implied, as to the accuracy, completeness, or adequacy of the information contained herein. Neither the manufacturer nor his agent shall be held liable (regardless of fault) to the vendee, the vendee's employees or anyone for any direct, special or consequential damages arising out of or in connection with the accuracy, completeness, adequacy or furnishing of such information. Data is supplied for use only in connection with occupational safety and health.