M-chem
Formulas for your success

Bleach 12

Sanitizing Solution

DESCRIPTION

Bleach 12 contains 12% available chlorine (by volume) and is light yellow in color. ***Bleach 12*** is used for sanitizing of processing equipment, general disinfecting, disinfecting drinking water, treating newly drilled wells, mold removal and swimming pool chlorination. It can safely be added to alkaline cleaning solutions help remove soils in processing equipment. ***Bleach 12*** meets all Health Standard requirements for low temperature sanitizing. Automatically dispensed, this concentrated product provides economical results at the correct levels.

SPECIAL INFORMATION

Bleach 12 is a Canadian Food Inspection Agency (CFIA) approved product for use in registered food processing plants. Surfaces in direct food contact must be rinsed with potable water.

Bleach 12 is also Kosher approved.

Do not use metal pumps with bleach. It is very important not to contaminate bleach with iron. A very small amount of iron will turn the bleach to a dirty looking brown color.

DIRECTIONS

For 100 ppm chlorine solution:

Add 0.13 oz per US gallon of water (1 ml/litre) (1:1000).

For mold removal:

Add 1.5 oz per US gallon of water (10 ml/litre) (1:100).

For process water:

Up to 5 ppm calculated as available chlorine. For chiller water, in water for processing poultry carcasses internally contaminated with feces, and in red meat carcass final wash water at concentrations between 20-50 ppm, calculated as available chlorine.

PHYSICAL DATA

Appearance	Clear liquid
Color	Yellow
Foam	None
Odor	Mild chlorine odor
pH	11.5 - 13.0
Chlorine w/v%	12.0 minimum

MATERIAL SAFETY DATA SHEET

SECTION 1 – PRODUCT/MANUFACTURER'S IDENTITY

Product Name: **BLEACH 12**

Product Use: *Sanitizing solution.*

WHMIS CODE: D2B, E
Proper Shipping Name: HYPOCHLORITE SOLUTION (more than 7 percent available chlorine)
Hazard Class: Class 8, P.G. III
UN Number: UN 1791 (Ltd.Qty.)

HMIS

3	Health
0	Flammability
1	Reactivity
C	Personal

A=Goggles, B=Goggles & Gloves
C=Goggles, Gloves and Apron

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ABBREVIATION KEY: N/A=Not Applicable, N/E=Not Established, N/D=Not Determined, > =Greater Than

SECTION 2 – HAZARDOUS INGREDIENTS INFORMATION

INGREDIENT	CAS NO.	RANGE %	PEL	TLV
SODIUM HYPOCHLORITE	7681-52-9	10.0-15.0	N/A	N/E

LD50 (oral rat) 8910 mg/kg
LD50 (dermal) N/A
LC50 (Inhal., rat, 4h) 5250 mg/m3

SECTION 3 – PHYSICAL DATA

Color and Odor: Green to yellow, chlorine odor.
Physical State: Liquid.
Coeff. Water/Oil Dist: Greater than 1.0
Boiling Point: N/D
Melting Point: N/A
Evaporation Rate: N/D
Vapor Pressure (mm HG): N/D
Vapor Density: N/D
Solubility in Water: Soluble
pH: 11.5-13.5
Specific Gravity: 1.165 @ 20°C
Odor Threshold: No Data

SECTION 4 – FIRE AND EXPLOSION HAZARD DATA

Flash Point and Method: None combustible.
Flammable Limits: None known.
Sensitivity to Mechanical Impact: None.
Sensitivity to Static Discharge: None.
Conditions of Flammability: None.
Auto ignition Temperature: None known.
Extinguishing Media: Product is not flammable. Use extinguishing media suitable for surrounding fires.
Unusual Fire and Explosion Hazards: Protective clothing for skin and eye protection to prevent highly alkaline material. Closed containers expose to heat may explode. Spilled material may cause floor slippery.
Hazardous Combustion Products: Thermal decomposition products are toxic and may include oxide of chlorine and sodium.
Special Fire Fighting: Wear full protective equipment, including a NIOSH/MSHA approved, self-contained breathing apparatus for fire fighting situations. Use water spray to cool all nearby fire exposed surfaces.

SECTION 5 – REACTIVITY DATA

Chemical Stability: Unstable under normal storage conditions, Sodium Hypochlorite solution decompose slowly. Decomposition accelerated by heat (above 40 °C) and light.
Hazardous Polymerization: Will not Occur.
Incompatibility (material to avoid): Strong reducing agent, organic compounds. Lewis or mineral acid. Methanol. Ammonia. Urea.
Hazardous Decomposition Products: Thermal decomposition products are toxic and may include oxide of chlorine and sodium.
Conditions to Avoid: High temperature, spark, open flame.

SECTION 6 – TOXICOLOGICAL DATA

Exposure Limits: See Section 2 under Hazardous Ingredient.
Irritancy of Product: Corrosive to skin, eyes and respiratory system.
Sensitization: None known.
Name of Toxicological Synergistic Product: None known.
Teratogenicity: None known.
Routes of Entry: Skin, eyes, ingestion, inhalation.
Carcinogenicity: Non hazardous by WHMIS criteria.
Mutagencity: Result of tests in animal has been negative.
Reproductive Toxicity: None known.
Effects of Chronic Exposure: Prolonged or repeated exposure may cause productive cough, running nose, redness, pain and drying and cracking of skin.
Effects of Acute Exposure to Product: Product exposure may cause irritation of the nose, throat, and respiratory trace.

SECTION 7 – PREVENTATIVE AND CONTROL MEASURES

Respiratory Protection: If product is misted or sprayed, or used in a confined area, use a NIOSH/MSHA approved dust/mist respirator.
Ventilation: Good general ventilation or local exhaust ventilation for spraying and misting in confined areas.
Protective Gloves: Natural rubber, nitrile or PVC gloves.
Eye Protection: Full face-shield and chemical safety goggles when there is potential for contact.
Protective Clothing and Equipment: Long sleeve coveralls. Eye wash recommended in the immediate work area.
Storage and Handling Procedures: Use good industrial hygiene. Do not get in eyes. Avoid contact with skin, and clothing. Avoid breathing sprays or mists. Store in a cool, dry place away from incompatibles. Vent caps may be required to prevent a build-up of pressure that could cause containers to burst. Do not mix with any other chemicals. Store below 29 °C (84°F). Keep from freezing.
Disposal Procedures for Spills or Leaks: Wear protective equipment. Carefully neutralize by adding 35% hydrogen peroxide at one pint per pound of hypochlorite. Spilled material may cause floor and contact surface slippery. Collect product for recovery or disposal. Contain discharge by constructing dykes or absorbent if release to land or storm water runoff.
Waste Disposal Method: Reuse if possible, or otherwise dispose recovered material in accordance with all local, Provincial or Federal Regulations.
Special Shipping Information: Store at temperatures below 29°C (84°F) and keep from freezing.

SECTION 8 – EMERGENCY FIRST AID PROCEDURES

First Aid:
If swallowed, give plenty of clean water to drink to dilute product. Do not induce vomiting. Call a Physician. In case of contact with eyes, flush with clean water for 15 minutes. Get medical attention. For contact with skin, wash with clean water and rinse well. If irritation occurs or persists, get medical attention.

PREPARATION DATA

PREPARED BY: Technical Service / Regulatory Division PHONE: 604-526-5655 LAST UPDATE: 07/04/11