

NOTICE: Judgment may be based on indirect test and technical literature. The OSHA Hazard Communication Standard only requires SDS's and special labeling for materials defined as "HAZARDOUS"; see 29 CFR 1910.1200 (c). This document may be about a product which is NOT hazardous but is provided as information for our customers. See references for information.

SECTION 1. IDENTIFICATION

Product Identifier: Lemon Disinfectant
 Product Use: EPA Reg. Neutral pH Disinfectant & Cleaner
 Manufactured by: Kor-Chem, Inc.
 5800 Bucknell Drive
 Atlanta, GA 30336

Product Identification # (PIF): 00501
 EPA Registration #: 10324-154-11712
 Emergency Telephone #: 1-800-255-3924
 General Information #: 404-344-9580
 Date Revised: November 13, 2015

SECTION 2. HAZARD(S) IDENTIFICATION

GHS Hazard Codification



Signal Word: WARNING

Hazard Class	Category	Code	Hazard Statement
Flammable Liquid	4	H227	Combustible liquid
Acute Oral Toxicity	4	H302	Harmful if swallowed
Skin Irritation	2	H315	Causes skin irritation
Serious Eye Irritation	2A	H319	Causes serious eye irritation
Hazardous to the Aquatic Environment, Long-term hazard	2	H411	Toxic to aquatic life with long-lasting effects

Precautionary Measures:

Category	Code	Statement
Prevention	P210 P264 P270 P273 P280	Keep away from heat/sparks/open flames/hot surfaces – No smoking. Wash thoroughly after handling. Do not eat, drink or smoke or smoke when using this product. Avoid release to the environment. Wear protective gloves/protective clothing/eye protection/face protection.
Response	P301+P312 P330 P302+P352 P321 P332+P313 P362 P305+P351+P338 P337+P313 P370+P378 P391	IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell. Rinse mouth. IF ON SKIN: Wash with soap and water. Specific treatments: See Section 4 First Aid Measures. If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash before reuse. IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses if easy to do so. Continue rinsing. If eye irritation persists: Get medical advice/attention. In case of fire: Use Foam, dry chemical, carbon dioxide fire extinguishers, water spray for extinction. Collect spillage.
Storage	P403+P235	Store in a well ventilated place. Keep Cool.
Disposal	P501	Dispose of contents/container in compliance with all Federal, State/Provincial and local laws and regulations.

Hazards not otherwise classified: Prolonged/repeated skin contact may cause skin defatting (dermatitis). Inhalation of mists/sprays may cause irritation to the respiratory tract.

SECTION 3. COMPOSITION / INFORMATION ON INGREDIENTS

Ingredient	Common Name	CAS #	Concentration Range %
Didecyldimethylammonium Chloride	None known	7173-51-5	1 – 4
Benzyl-C12-C16-alkyldimethyl, Chlorides	None known	68424-85-1	1 – 4
Ethyl alcohol	Ethanol	64-17-5	1 – 4

SECTION 4. FIRST AID MEASURES

Eyes: Flush well with water for at least 15 minutes, holding eyelids open. Remove any contact lenses and continue rinsing. Seek medical attention if irritation persists.

Skin: Wash with soap and water. Remove contaminated clothing and launder before reuse. If irritation develops and persists, seek medical attention.

Inhalation: If symptoms develop, move victim to fresh air. If breathing is difficult, have a trained person administer oxygen. If respiration stops, have a trained person administer artificial respiration and call a physician.

Ingestion: DO NOT INDUCE VOMITING. Call a physician immediately. Rinse mouth. Never give anything by mouth to an unconscious person. If vomiting occurs spontaneously, keep head below hips to prevent aspiration.

SECTION 5. FIRE-FIGHTING MEASURES

Flammability: Class IIIA Combustible Liquid

Flash Point: >140°F (>60°C)

Extinguishing Media: Foam, dry chemical, carbon dioxide fire extinguishers, water spray. Do not spray water directly on fire. Use water spray to cool containers.

Specific hazards arising from chemical: Vapors may form explosive mixtures with air. Vapors may travel considerable distance to a source of ignition and flash back. During fire, gases hazardous to health may be formed.

Hazardous combustion products: Carbon monoxide and carbon dioxide.

Firefighting protective equipment: Wear a self-contained breathing apparatus with a full face piece operated in the positive pressure demand mode with appropriate turn-out gear and chemical resistant personal protective equipment.

Sensitivity to static discharge: This product is a Class IIIA combustible

SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Use personal protective equipment (Section 8). Eliminate all ignition sources. Ventilate area. Wash thoroughly after handling.

For Small Spills: Avoid release to the environment – collect spillage. Spilled material may be slippery. Avoid dispersal of material and runoff into soil, waterways, drains and sewers. Absorb spill with vermiculite or other inert material, then place in a container for chemical waste. Wash walking surfaces with water. Dispose of contaminated absorbent material in accordance with local, state and federal regulations.

For Large Spills: Large spills cannot occur due to packaging.

SECTION 7. HANDLING AND STORAGE

Handling: Use personal protective equipment (Section 8). Use with adequate ventilation. Do not handle around sources of ignition. Never use welding or cutting torch on or near drum (even empty) because product can ignite explosively. Do not pre-mix with other chemicals. Empty containers may contain residue and can be dangerous. Do not eat, drink or smoke in work areas. Wash thoroughly after handling. Avoid release to the environment – collect spillage.

Storage: Keep away from heat, flame, or sunlight – Keep cool. Keep from freezing. Keep container closed when not in use. Store in a well-ventilated place. Protect from physical damage. Store away from strong oxidizing agents.

SECTION 8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Ingredient	CAS #	OSHA/PEL	ACGIH/TLV	STEL
Didecyldimethylammonium Chloride	7173-51-5	Not determined	Not determined	Not determined
Benzyl-C12-C16-alkyldimethyl, Chlorides	68424-85-1	Not determined	Not determined	Not determined
Ethanol	200-578-6	1000ppm	1000ppm	Not determined

Engineering Controls: Provide adequate ventilation. Observe occupational exposure limits and keep the risk of exposure to a minimum.

Personal protective equipment:

Eye: Safety glasses with side shields or splash proof goggles.

Skin: Chemical resistant (impervious) gloves. Normal materials handling clothing.

Respirator: Use NIOSH approved protection if PEL is exceeded or if vapors are causing irritation.

Other: Use only in a well ventilated area. Do not eat, drink or smoke while handling. Wash thoroughly after handling.

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance	Yellow, clear liquid	Upper/Lower flammability limits	Not determined
Odor	Lemon	Vapor pressure	Not determined
Odor threshold	Not determined	Vapor density (Air = 1)	<1
pH	8 – 10	Relative Density (water = 1.0)	1.000 g/ml
Melting point	Not determined	Solubility	Complete in water
Freezing point	Not determined	Partition coefficient	Not determined
Boiling point	Not determined	Auto-ignition temperature	Not determined
Flash point	>140°F (>60°C)	Decomposition temperature	Not determined
Evaporation rate (n-butyl acetate=1)	<1	Viscosity	Water thin
Flammability	Class IIIA Combustible	%Volatile/Volume	93

SECTION 10. STABILITY AND REACTIVITY

Reactivity: Not reactive under normal conditions.

Chemical stability: Stable under normal, ambient temperature and conditions.

Possibility of hazardous reactions: Hazardous polymerization will not occur.

Conditions to avoid: Heat, flame and sparks. Keep from freezing. Do not mix with other chemicals

Incompatible materials: Avoid strong oxidizing agents.

Hazardous combustion products: Carbon monoxide and carbon dioxide.

SECTION 11. TOXICOLOGICAL INFORMATION

Acute Toxicity:

Oral (LD50 Rat): 4400mg/kg

Dermal (LD50 Rabbit): >5000mg/kg

Inhalation (LC50 Rat): 2100mg/kg

Skin corrosion/irritation: Severe eye irritant. Symptoms may include a burning sensation, redness and tearing.

Serious eye damage/irritation: Skin irritant. Symptoms may include redness and itching.

Respiratory or skin sensitization: Inhalation of mists/vapors may cause irritation of respiratory tract. Symptoms may include coughing and difficulty breathing.

Germ cell mutagenicity: No data available.

Carcinogenicity: NTP/IARC/OSHA Carcinogen: No
Reproductive toxicity: No effects expected.
STOT-single exposure: Not classified.
STOT-repeated exposure: Not classified.
Aspiration hazard: Not an aspiration hazard.
Ingestion: Harmful if swallowed. May cause severe irritation of the digestive tract. Symptoms may include vomiting, pain and diarrhea.
Likely routes of exposure: Eyes, skin and inhalation (if mists or sprays are generated)
Interactive effects: Not available

SECTION 12. ECOLOGICAL INFORMATION

Toxicity:
72h LC-50 (fish): 1.2mg/l – acute
96h EC-50 (invertebrates): 0.3mg/l - chronic
72h LC-50 (algae): 2.3mg/l
Persistence and degradability: Expected to be readily biodegradable.
Bioaccumulative potential: No data available.
Mobility in soil: Soil mobility not determined. This product is soluble in water and may spread in water systems. This product is partially volatile and may spread in the atmosphere.
Other adverse effects: Toxic to aquatic life with long-lasting effects – Avoid release to the environment. Collect spillage.

SECTION 13. DISPOSAL CONSIDERATIONS

Disposal of Wastes: Do not dump into sewers, on the ground or into any waterways. All disposal practices must be in compliance with all Federal, State/Provincial and local laws and regulations.
Contaminated Packaging: Since emptied containers retain product residue, follow label warnings even after container is emptied. Do not cut, drill, grind or weld on or near the container.
RCRA: Not applicable.

SECTION 14. TRANSPORT INFORMATION

United States DOT:
Not regulated
IATA and IMDG:
Not regulated
Marine Pollutant (IMDG Code): Not listed (49 CFR 172.101).
Transportation in bulk (IMDG - Annex II of MARPOL 73/78 and IBC Code): Not offered in bulk for transport overseas.

SECTION 15. REGULATORY INFORMATION

TSCA: All components of this product are on the TSCA inventory or are exempt from TSCA inventory requirements under 40 CFR 720.30.
SARA Section 302: The components of this product are either not regulated or regulated, but present in negligible concentrations.
SARA TITLE III Section 311/312:

Immediate (Acute) Health	Yes	Fire Hazard	Yes
Delayed (Chronic) Health	No	Reactive Hazard	No

SARA Title 313: This material does not contain any chemical components with known CAS numbers that exceed the De Minimis reporting levels (40 CFR 372).
CERCLA: This product does not have a reportable quantity.
United States Right-To-Know: Ethanol CAS# 64-17-5 - California, New Jersey, Pennsylvania, Minnesota, Massachusetts and Rhode Island.
Proposition 65: This material does not contain any chemicals known to the State of California to cause cancer, birth defects or other reproductive harm. OR This material contains the following ingredients for which the state of California has found to cause cancer, birth defects or other reproductive harm: Ethanol CAS# 64-17-5.
RCRA: Not applicable.

SECTION 16. OTHER INFORMATION

Date Prepared: November 13, 2015 – SDS revised to meet GHS standards.
Hazard Ratings (HMIS): Health 1, Flammability 2, Reactivity 0 (Scale 0 – 4). Personal Protection Rating to be supplied by user based on use conditions.
Product VOC: 1%
Carefully read all instructions on label before handling this product.
Keep out of reach of children.
"FOR INDUSTRIAL USE ONLY"

Abbreviation	Full Name/Explanation
ACGIH	American Conference of Government Industrial Hygienists
CAS	Chemical Abstract Service
CERCLA	Comprehensive Environmental Response Compensation and Liability Act
CNS	Central Nervous System
CFR	Code of Federal Regulations
DOT	Department of Transportation
EC	Effective Concentration
HMIS	Hazardous Material Information System

LC	Lethal Concentration
LD	Lethal Dose
NA	Not Applicable
ND	Not Determined
NE	Not Established
NIOSH	National Institute for Occupational Safety and Health
OSHA	Occupational Safety and Health Administration
PEL	Permissible Exposure Limit
RCRA	Resource Conservation Recovery Act
SARA	Superfund Amendments and Reauthorization Act
STEL	Short-Term Exposure Limit
STOT	Specific Target Organ Toxicity
TLV	Threshold Limit Value
TSCA	Toxic Substance Control Act
VOC	Volatile Organic Compounds

The information contained herein is based on data available to us and is believed to be correct. We make no warranty, however, expressed or implied regarding the accuracy of these data or the results obtained from the use thereof.

Regulatory Standards: DOT TITLE 49, Code of Federal Regulations 172.101: Parts 100 to 177, Revised 10/1/92.

SUPER FUND AMENDMENTS REAUTHORIZATION ACT OF 1986, TITLE III TOXIC SUBSTANCE CONTROL ACT LIST (TSCA)- INGREDIENTS LISTED. REGISTRY OF TOXIC EFFECTS OF CHEMICAL SUBSTANCES NATIONAL TOXICOLOGICAL PROGRAM (NTP) REPORT OF CARCINOGENS INTERNATIONAL AGENCY FOR RESEARCH ON CANCER (IARC) MONOGRAPHS, OCCUPATIONAL SAFETY & HEALTH REGULATIONS. CODE OF FED. REGS. FOOD & DRUG, 21 PARTS 170 to 199, Revised 4/1/91, 173.310.