KOR-CHEM

# SAFETY DATA SHEET

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: IR-407
Product Use: Ink Degradent
Manufactured by: Kor-Chem, Inc.
5800 Bucknell Drive
Atlanta, GA 30336

Product Identification # (PIF): 01676
Emergency Telephone #: 1-800-255-3924
General Information #: 404-344-9580
Date Prepared: April 15, 2014
Date Revised: June 27, 2016 – version #2

## SECTION 2. HAZARD(S) IDENTIFICATION

GHS Hazard Codification:



Signal Word: WARNING

| Hazard Statement | Category | Code | Hazard Class |
|---|---|---|---|
| Flammable liquid and vapor | 3 | H226 | Flammable Liquid |
| May be fatal is swallowed and enters airways | 1 | H304 | Aspiration Hazard |
| Causes skin irritation | 2 | H315 | Skin Irritation |
| May cause drowsiness or dizziness | 3 | H336 | STOT, Single Exposure; Narcotic effects |
| Toxic to aquatic life with long-lasting effects | 2 | H411 | Hazardous to the Aquatic Environment, Long-term |

Precautionary Measures:

| Category | Code | Statement |
|---|---|---|
| Prevention | P210 | Keep away from heat/sparks/open flames/hot surfaces – No smoking. |
| | P233 | Keep container tightly closed. |
| | P240 | Ground/bond container and receiving equipment. |
| | P241 | Use explosion-proof equipment. |
| | P242 | Use only non-sparking tools. |
| | P243 | Take precautionary measures against static discharge. |
| | P261 | Avoid breathing fumes/mists/ vapors/sprays. |
| | P264 | Wash thoroughly after handling. |
| | P271 | Use only outdoors or in a well-ventilated area. |
| | P273 | Avoid release to the environment. |
| | P280 | Wear protective gloves/protective clothing/eye protection/face protection. |
| Response | P301+P310 | IF SWALLOWED: Immediately call a POISON CENTER or doctor/physician. |
| | P331 | Do NOT induce vomiting. |
| | P303+P361+P353 | IF ON SKIN (or hair): Remove immediately all contaminated clothing. Rinse skin with water/shower. |
| | P302 + P352 | IF ON SKIN: Wash with soap and water. |
| | P321 | Specific treatments: See Section 4 First Aid Measures. |
| | P332+P313 | If skin irritation occurs: Get medical advice/attention. |
| | P362 | Take off contaminated clothing and wash before reuse. |
| | P370+P378 | In case of fire: Use foam, dry chemical, carbon dioxide fire extinguishers or water spray for extinction. |
| | P304+P340 | IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing. |
| | P312 | Call a POISON CENTER or doctor/physician if you feel unwell. |
| | P391 | Collect spillage. |
| Storage | P403+P233+P235 | Store in a well ventilated place. Keep container tightly closed. Keep cool. |
| | P405 | Store locked up. |
| Disposal | P501 | Dispose of contents/container in compliance with all Federal, State/Provincial and local laws and regulations. |

Hazards not otherwise classified: May cause eye irritation. Repeated or prolonged skin contact may cause dermatitis (skin drying). Ingestion may cause central nervous system depression: headache, dizziness and gastrointestinal distress.

## SECTION 3. COMPOSITION / INFORMATION ON INGREDIENTS

| Ingredient | Common Name | CAS # | Concentration Range % |
|---|---|---|---|
| Naphtha (petroleum), heavy alkylate | OMS | 64741-65-7 | 89 – 93 |
| 2-butyoxyethanol | Ethylene glycol monobutyl ether | 111-76-2 | 3 – 7 |

## 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: Remove immediately all contaminated clothing and launder before reuse. Rinse skin with water/shower. Wash with soap and water. If irritation persists, seek medical attention.

Inhalation: Remove victim to fresh air and keep at rest in a position comfortable for breathing – Call a POISON CENTER or doctor/physician if you feel unwell. If breathing is difficult, have a trained person administer oxygen. If respiration stops, have a trained person administer artificial respiration by way of pocket mask equipped with one-way valve or other proper respiratory device – Do NOT use mouth-to-mouth method if victim inhaled material. Call a physician.
Ingestion: Immediately call a POISON CENTER or doctor/physician. DO NOT INDUCE VOMITING. 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

Flash Point: 124°F (51°C)
Flammability: Class II Combustible Liquid
Extinguishing Media: Foam, dry chemical, carbon dioxide fire extinguishers. Do not spray water directly on fire. Use water spray to cool containers.
Specific hazards arising from chemical: Vapors are heavier than air and may travel along the ground to an ignition source. Readily ignited by static discharge. Do not allow run-off from fire fighting to enter drains or water courses.
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 combustible and readily ignited even by static discharge. Grounding equipment is recommended.

## SECTION 6. ACCIDENTAL RELEASE MEASURES

Personal Precautions: Use personal protective equipment (Section 8). Eliminate all sources of ignition – No smoking. Ventilate area. Avoid breathing fumes/mists/ vapors/sprays. Avoid release to the environment – Collect spillage. Wash thoroughly after handling.
For Small Spills: Spilled material may be slippery. Avoid dispersal of material and runoff into soil, waterways, drains and sewers. Vapor-suppressing foam may be used to reduce vapors. Absorb spill with vermiculite or other inert material, then place in a container for chemical waste with non-sparking tools. Wash walking surfaces with water to reduce slipping hazard. 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: Wear personal protection equipment (Section 8). Use only outdoors or in a well-ventilated area. Avoid breathing fumes/mists/vapors/sprays. Do not handle around sources of ignition. Use proper bonding and grounding during product transfer as described in document NFPA 77. Use explosion-proof equipment and non-sparking tools. Take precautionary measures against static discharge. Vapors are heavier than air and may travel along the ground to an ignition source. Never use welding or cutting torch on or near drum (even empty) because product can ignite explosively. Do not premix with other chemicals. Avoid release to the environment – Collect spillage. Do not eat, drink or smoke in work areas. Wash thoroughly after handling.
Storage: Keep away from heat, flame, or sunlight – keep cool. Keep from freezing. Keep container tightly closed when not in use. Store locked up. 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 |
|---|---|---|---|---|
| Naphtha (petroleum), heavy alkylate | 64741-65-7 | 500 ppm | Not established | Not established |
| 2-butyoxyethanol | 111-76-2 | 50ppm | 20ppm | Not established |

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. Boots.
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 | Colorless, clear liquid | Upper/Lower flammability limits | Not determined |
| Odor | Slight butyl | Vapor pressure | >0.1mmHg @ 20°C |
| Odor threshold | Not determined | Vapor density (Air = 1) | >1 |
| pH | Not applicable | Specific gravity (water = 1.0) | 0.775 g/ml |
| Melting point | Not determined | Solubility | Insoluble in water |
| Freezing point | Not determined | Partition coefficient (n-octanol/water) | Not determined |
| Boiling point | Not determined | Auto-ignition temperature | Not determined |
| Flash point | 124°F (51°C) | Decomposition temperature | Not determined |
| Evaporation rate (n-butyl acetate=1) | <1 | Viscosity | Not determined |
| Flammability | Class II Combustible | VOC by weight | 95.5% |

## SECTION 10. STABILITY AND REACTIVITY

Reactivity: Not reactive under normal conditions.
Chemical stability: Stable under normal, ambient temperature and conditions.
Possibility of hazardous reactions: Vapors may form explosive mixture with air. 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

Toxicity:

Oral (LD50 Rat): >2000 mg/kg
Dermal (LD50 Rabbit): Not determined
Inhalation (LC50 Rat): >2000 mg/kg

Skin corrosion/irritation: Skin irritant. Symptoms may include reddening and itching. Prolonged contact may cause skin defatting (dermatitis).
Serious eye damage/irritation: Eye irritant. Symtpoms may include a burning sensation, tearing, swelling and redness. Symptoms may persist for several days.
Respiratory or skin sensitization: Inhalation of mists/vapors may cause irritation of respiratory tract. Symptoms may include coughing and difficulty breathing. Symptoms of overexposure may be headache, dizziness, tiredness, nausea and vomiting.
Germ cell mutagenicity: No data available
Carcinocenicity: NTP/IARC/OSHA Carcinogen: Naphtha (petroleum), heavy alkylate – IARC Group 2B: Possibly carcinogenic to human.
Reproductive toxicity: Not available
STOT-single exposure: May cause drowsiness or dizziness
STOT-repeated exposure: Not classified
Aspiration hazard: May be fatal is swallowed and enters airways.
Ingestion: May cause central nervous system depression: headache, dizziness and gastrointestinal distress. May be fatal is swallowed and enters airways
Likely routes of exposure: Eyes, skin and inhalation
Interactive effects: Not available

## SECTION 12. ECOLOGICAL INFORMATION

Toxicity:

96h LC-50 (fish): Not determined
96h EC-50 (invertebrates): Not determined
48h LC-50 (algae): Not determined

Persistence and degradability: Not determined
Bioaccumulative potential: log Pow 3.3 – 5.3
Mobility in soil: Soil mobility not determined. This product floats on water. This product is volatile and may spread in the atmosphere.
Other adverse effects: Hazardous to the Aquatic Environment, Long-term hazard Category 2: 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: A waste containing this product may have the RCRA hazardous waste no. D001 (Ignitable) (40 CFR 261.22).

## SECTION 14. TRANSPORT INFORMATION

United States DOT

Container of 119 gallons or less:

Combustible Liquid (49 CFR 173:120(b)(2): This material is not regulated under 49 CFR if in a container of 119 gallon capacity or less for ground transportation. Exception CFR 173.150(f)(2): Combustible liquids. This exception does not apply to transportation by vessel or aircraft.

Container of 120 gallons or more:

UN/ID No.: UN1993
Proper Shipping Name: Flammable Liquids, n.o.s., (Naphtha (petroleum), heavy alkylate)
Hazard Class: 3
Packing Group: III

IATA and IMDG

UN/ID No.: UN1993
Proper Shipping Name: Flammable Liquids, n.o.s., (Naphtha (petroleum), heavy alkylate)
Hazard Class: 3
Packing Group: III
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 contains the following chemical components with known CAS numbers subject to reporting requirements (40 CFR 372): Ethylene Glycol Monobutyl Ether CAS# 111-76-2, % by wt. = 5%.
CERCLA: This product does not have a reportable quantity.
United States Right-To-Know: (Naphtha (petroleum), heavy alkylate) CAS #64741-65-7 – Massachusetts, Pennsylvania and New Jersey. Ethylene Glycol Monobutyl Ether CAS# 111-76-2 - California, Massachusetts, Minnesota, New Jersey & Pennsylvania.
Proposition 65: This material does not contain any chemicals known to the State of California to cause cancer, birth defects or other reproductive harm.
RCRA: A waste containing this product may have the RCRA hazardous waste no. D001 (Ignitable) (40 CFR 261.22).

## SECTION 16. OTHER INFORMATION

Date Prepared: June 27, 2016 – SDS updated to meet revision #5 GHS requirements.
Hazard Ratings (HMIS): Health 2, Flammability 2, Reactivity 0 (Scale 0 – 4). Personal Protection Rating to be supplied by user based on use conditions.
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 |
| IARC | International Agency for Research on Cancer |
| LC | Lethal Concentration |
| LD | Lethal Dose |
| NA | Not Applicable |
| ND | Not Determined |
| NE | Not Established |
| NIOSH | National Institute for Occupational Safety and Health |
| NTP | National Toxicology Program |
| 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.