SAFETY DATA SHEET
TONY'S HEAVY DUTY DEGREASER

Printed: 11/14/2013
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1. PRODUCT AND COMPANY IDENTIFICATION

Product Code: 5300
Product Name: TONY'S HEAVY DUTY DEGREASER
Company Name: KIRBY CHEMICAL & RESTAURANT SUPPLY
809 S. EASTMAN RD. LONGVIEW, TX 75602
Phone Number: (903)757-2723

(800)255-3924

Emergency Contact: CHEM-TEL, INC.
Intended Use: DEGREASER

2. HAZARDS IDENTIFICATION

Acute Toxicity: Oral, Category 4
Skin Corrosion/Irritation, Category 1A
Acute Toxicity: Skin, Category 4
Serious Eye Damage/Eye Irritation, Category 2A
Acute Toxicity: Inhalation, Category 4

GHS Signal Word: **Danger**

GHS Hazard Phrases:
H302 - Harmful if swallowed.
H314 - Causes severe skin burns and eye damage.
H312 - Harmful in contact with skin.
H319 - Causes serious eye irritation.
H332 - Harmful if inhaled.

GHS Precaution Phrases:
P264 - Wash hands thoroughly after handling.
P270 - Do not eat, drink or smoke when using this product.
P260 - Do not breathe dust/fume/gas/mist/vapours/spray.
P280 - Wear protective gloves/protective clothing/eye protection/face protection.
P271 - Use only outdoors or in a well-ventilated area.
P261 - Avoid breathing dust/fume/gas/mist/vapours/spray.

GHS Response Phrases:
P301+312 - IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell.
P330 - Rinse mouth.
P303+361+353 - IF ON SKIN (or hair): Remove/take off immediately all contaminated clothing. Rinse skin with water/shower.
P363 - Wash contaminated clothing before reuse.
P305+351+338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P301+330+331 - IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
P304+340 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.
P310 - Immediately call a POISON CENTER/doctor/....
P321 - Specific treatment see ... on this label.
P302+352 - IF ON SKIN: Wash with plenty of soap and water.
P312 - Call a POISON CENTER/doctor/... if you feel unwell.
P322 - Specific measures see ... on this label.
P337+313 - If eye irritation persists, get medical advice/attention.

GHS Storage and Disposal Phrases:
P501 - Dispose of contents/container to ....
P405 - Store locked up.

Hazard Rating System:

HEALTH	2
FLAMMABILITY	0
PHYSICAL	1
PPE	B

Potential Health Effects (Acute and Chronic):

Prolonged or repeated skin contact may cause dermatitis.

Effects may be delayed.

Inhalation:

Material is extremely destructive to the tissue of the mucous membranes and upper respiratory tract. Harmful if inhaled. May cause respiratory tract irritation. May cause narcotic effects in high concentration. May cause lung damage. May cause anemia. May cause central nervous system effects such as nausea and headache. Irritation may lead to chemical pneumonitis and pulmonary edema. Causes severe irritation of upper respiratory tract with coughing, burns, breathing difficulty, and possible coma. Causes chemical burns to the respiratory tract.

Skin Contact:

Causes skin burns. Causes skin irritation. Substance is rapidly absorbed through the skin. Causes symptoms similar to those of inhalation. Skin sensitization testing with human volunteers produced negative results. A skin notation is not recommended by ACGIH, based on estimates from physiologically based pharmacokinetic models which indicate that, even in worst-case dermal-exposure scenarios, 2-butoxyethanol is not absorbed in amounts sufficient to cause red blood cell hemolysis in humans. May cause skin rash (in milder cases), and cold and clammy skin with cyanosis or pale color.

Eye Contact:

Causes eye burns. Causes eye irritation. Causes redness and pain. May cause chemical conjunctivitis and corneal damage.

Ingestion:

Harmful if swallowed. Causes burns. May cause irritation of the digestive tract. May cause gastrointestinal irritation with nausea, vomiting and diarrhea. Causes gastrointestinal tract burns. Causes severe pain, nausea, vomiting, diarrhea, and shock. May cause corrosion and permanent tissue destruction of the esophagus and digestive tract. May cause systemic effects.

3. COMPOSITION/INFORMATION ON INGREDIENTS

CAS #	Hazardous Components (Chemical Name)	Concentration
1310-58-3	Potassium hydroxide	< 5.0 %
111-76-2	Ethanol, 2-Butoxy-	< 5.0 %

4. FIRST AID MEASURES

Emergency and First Aid Procedures:	Get medical aid immediately. Remove from exposure and move to fresh air immediately.
In Case of Inhalation:	If breathing is difficult, give oxygen. Do not use mouth-to-mouth resuscitation if victim ingested or inhaled the substance; induce artificial respiration with the aid of a pocket mask equipped with a one-way valve or other proper respiratory medical device. If inhaled, remove to fresh air. Get medical aid.
In Case of Skin Contact:	Take off contaminated clothing and shoes immediately. Wash off with soap and plenty of water. Consult a physician. Get medical aid immediately. Flush skin with plenty of water for at least 15 minutes while removing contaminated clothing and shoes. Wash clothing before reuse.
In Case of Eye Contact:	Continue rinsing eyes during transport to hospital. Rinse thoroughly with plenty of water for at least 15 minutes and consult a physician. Get medical aid immediately. In case of contact, immediately flush eyes with plenty of water for a t least 15 minutes.
In Case of Ingestion:	Do NOT induce vomiting. Never give anything by mouth to an unconscious person. Rinse mouth with water. Consult a physician. Get medical aid immediately. Call a poison control center. If victim is fully conscious, give a cupful of water.
Signs and Symptoms Of Exposure:	Burning sensation, Cough, Wheezing, Laryngitis, Shortness of breath.
Note to Physician:	Consult a physician. Show this safety data sheet to the doctor in attendance. Move out of dangerous area. Treat symptomatically and supportively.

5. FIRE FIGHTING MEASURES

Flash Pt:	No data.
Explosive Limits:	LEL: No data. UEL: No data.
Autoignition Pt:	No data.
Suitable Extinguishing Media:	Use extinguishing measures that are appropriate to local circumstances and the surrounding environment. Use water spray, dry chemical, carbon dioxide, or chemical foam. Substance is noncombustible; use agent most appropriate to extinguish surrounding fire. Do NOT get water inside containers.
Fire Fighting Instructions:	Wear self contained breathing apparatus for fire fighting if necessary. Further information. The product itself does not burn. As in any fire, wear a self-contained breathing apparatus in pressure-demand, MSHA/NIOSH (approved or equivalent), and full protective gear. Will burn if involved in a fire. Combustible liquid and vapor. Use water spray to keep fire-exposed containers cool. Use water with caution and in flooding amounts. Contact with moisture or water may generate sufficient heat to ignite nearby combustible materials. Contact with metals may evolve flammable hydrogen gas.
Flammable Properties and Hazards:	No data available.

6. ACCIDENTAL RELEASE MEASURES

Steps To Be Taken In Case Material Is Released Or Spilled:

Personal precautions.
Use personal protective equipment. Avoid dust formation. Avoid breathing dust.
Evacuate personnel to safe areas.
Environmental precautions.
Do not let product enter drains.

Pick up and arrange disposal without creating dust. Keep in suitable, closed containers for disposal. Use proper personal protective equipment as indicated in Section 8. Spills/Leaks: Absorb spill with inert material (e.g. vermiculite, sand or earth), then place in suitable container. Wear a self contained breathing apparatus and appropriate personal protection. (See Exposure Controls, Personal Protection section). Remove all sources of ignition. Use a spark-proof tool. Do not let this chemical enter the environment. Vacuum or sweep up material and place into a suitable disposal container. Avoid runoff into storm sewers and ditches which lead to waterways. Clean up spills immediately, observing precautions in the Protective Equipment section. Avoid generating dusty conditions. Provide ventilation.

7. HANDLING AND STORAGE

Precautions To Be Taken in Handling:

Avoid formation of dust and aerosols.
Provide appropriate exhaust ventilation at places where dust is formed. Use spark-proof tools and explosion proof equipment. Do not get in eyes, on skin, or on clothing. Keep away from heat, sparks and flame. Do not ingest or inhale. Use only in a chemical fume hood. Wash thoroughly after handling. Do not allow water to get into the container because of violent reaction. Minimize dust generation and accumulation. Keep container tightly closed. Avoid ingestion and inhalation. Discard contaminated shoes. Use only with adequate ventilation.

Precautions To Be Taken in Storing:

Keep container tightly closed in a dry and well-ventilated place. Hygroscopic. Store in a cool, dry place. Store in a tightly closed container. Store in a cool, dry, well-ventilated area away from incompatible substances. Keep away from metals. Corrosives area. Keep away from acids. Store protected from moisture. Containers must be tightly closed to prevent the conversion of KOH to Potassium carbonate by the CO2 in air.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

CAS #	Partial Chemical Name	OSHA TWA	ACGIH TWA	Other Limits
1310-58-3	Potassium hydroxide	No data.	CEIL: 2 mg/m3	No data.
111-76-2	Ethanol, 2-Butoxy-	PEL: 50 ppm	TLV: 20 ppm	No data.

Respiratory Equipment (Specify Type):

Use respirators and components tested and approved under appropriate government standards such as NIOSH (US) or CEN (EU). Use a NIOSH/MSHA or European Standard EN 149 approved respirator if exposure limits are exceeded or if irritation or other symptoms are experienced. A respiratory protection program that meets OSHA's 29 CFR 1910.134 and ANSI Z88.2 requirements or European Standard EN 149 must be followed whenever workplace conditions warrant respirator use.

Eye Protection:

Face shield and safety glasses. Wear appropriate protective eyeglasses or chemical safety goggles as described by OSHA's eye and face protection regulations in 29 CFR 1910.133 or European Standard EN166. Wear chemical splash goggles.

Protective Gloves:

Handle with gloves. Wear appropriate protective gloves to prevent skin exposure.

Other Protective Clothing:

Choose body protection according to the amount and concentration of the dangerous

	substance at the work place. Wear appropriate protective clothing to prevent skin exposure.
Engineering Controls (Ventilation etc.):	Use explosion-proof ventilation equipment. Facilities storing or utilizing this material should be equipped with an eyewash facility and a safety shower. Use only under a chemical fume hood. Use adequate general or local exhaust ventilation to keep airborne concentrations below the permissible exposure limits.
Work/Hygienic/Maintenance Practices:	Handle in accordance with good industrial hygiene and safety practice. Wash hands before breaks and at the end of workday.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical States:	[ ] Gas [X] Liquid [ ] Solid
Appearance and Odor:	Appearance: purple. Liquid. Odor: Fragrant odor.
Melting Point:	No data.
Boiling Point:	No data.
Autoignition Pt:	No data.
Flash Pt:	No data.
Explosive Limits:	LEL: No data. UEL: No data.
Specific Gravity (Water = 1):	1.06
Vapor Pressure (vs. Air or mm Hg):	No data.
Vapor Density (vs. Air = 1):	No data.
Evaporation Rate:	No data.
Solubility in Water:	YES
pH:	12.5
Percent Volatile:	No data.

10. STABILITY AND REACTIVITY

Stability:	Unstable [ ] Stable [X]
Conditions To Avoid - Instability:	No data available. Incompatible materials, ignition sources, Moisture, contact with water. Exposure to moist air or water.
Incompatibility - Materials To Avoid:	Strong acids, Lead. Tin/tin oxides, Zinc, Strong oxidizing agents, Aluminum, Water, Metals. acids, gelatin, nitromethane, leather, flammable liquids, organic halogens.
Hazardous Decomposition Or Byproducts:	formed under fire conditions. Potassium oxides, silicon oxides. Carbon monoxide, Toxic fumes of Potassium oxide.
Possibility of Hazardous Reactions:	Will occur [ ] Will not occur [X]
Conditions To Avoid - Hazardous Reactions:	No data available.

11. TOXICOLOGICAL INFORMATION

Toxicological Information:

Epidemiology: No information found.
Teratogenicity: No information available. Reproductive Effects: Mutagenicity: Neurotoxicity: See actual entry in RTECS for complete information.

Irritation or Corrosion:

CAS# 1310-58-3: Potassium hydroxide:
Acute toxicity, LDLO, Oral, Species: Rabbit, 500.0 MG/KG.
Results:
Effects on Newborn: Stillbirth.
Effects on Newborn: Live birth index (# fetuses per litter; measured after birth).
Effects on Newborn: Weaning or lactation index (e.g., # alive at weaning per # alive at day {4)}.
- Naunyn-Schmiedeberg's Archiv fuer Experimentelle Pathologie und Pharmakologie., Vol/p/yr: 184,587, 1937

Standard Draize Test, Skin, Species: Rabbit, 500.0 MG, 24 H.
Results:
Behavioral: Somnolence (general depressed activity).
Vascular: BP lowering not charactertized in autonomic section.
Skin and Appendages: Skin: After topical exposure: Corrosive.
- "Sbornik Vysledku Toxixologickeho Vysetreni Latek A Pripravku," , Institut Pro Vychovu Vedoucicn P, Marhold, J.V., Institut Pro Vychovu Vedoucicn, Pracovniku Chemickeho, Prumyclu Praha Czechoslovakia, Vol/p/yr: -,7, 1972

Skin - rabbit - Severe skin irritation - -24 h.

CAS #	Hazardous Components (Chemical Name)	NTP	IARC	ACGIH	OSHA
1310-58-3	Potassium hydroxide	n.a.	n.a.	n.a.	n.a.
111-76-2	Ethanol, 2-Butoxy-	n.a.	3	A3	n.a.

12. ECOLOGICAL INFORMATION

General Ecological Information:

Environmental: TERRESTRIAL FATE: Based on a recommended classification scheme, an estimated Koc value of 67,, determined from an experimental log Kow and a recommended regression-derived equation, indicates that ethylene glycol mono-n-butyl ether is expected to have high mobility in soil. An estimated BCF value of 2.5 was calculated for ethylene glycol mono-n-butyl ether, using an experimental log Kow of 0.83 and a recommended regression-derived equation. According to a recommended classification scheme, this BCF value suggests that bioconcentration in aquatic organisms is low.
Physical: No information found.
Other: An estimated BCF value of 2.5,, from an experimental log Kow, suggests that ethylene glycol mono-n-butyl ether bioconcentration in aquatic organisms will be low, according to a recommended classification scheme.

Results of PBT and vPvB assessment:

CAS# 1310-58-3: Potassium hydroxide:
LC50, Western Mosquitofish (Gambusia affinis), adult(s), 125000. UG/L, 24 H, Mortality, Water temperature: 22.00 C (71.6 F) - 24.00 C (75.2 F) C, pH: 9.00; Toxicity to Gambusia affinis of Certain Pure Chemicals in Turbid Waters, Wallen, I.E., W.C. Greer, and R. Lasater, 1957

Persistence and Degradability:

No data available.

Bioaccumulative Potential:

No data available.

Mobility in Soil: No data available.

13. DISPOSAL CONSIDERATIONS

Waste Disposal Method: Product.
Observe all federal, state, and local environmental regulations. Contact a licensed professional waste disposal service to dispose of this material.

Contaminated packaging.
Dispose of as unused product. Chemical waste generators must determine whether a discarded chemical is classified as a hazardous waste. US EPA guidelines for the classification determination are listed in 40 CFR Parts 261. Additionally, waste generators must consult state and local hazardous waste regulations to ensure complete and accurate classification.
RCRA P-Series: None listed.
RCRA U-Series: None listed.

14. TRANSPORT INFORMATION

LAND TRANSPORT (US DOT):

DOT Proper Shipping Name: CLEANING COMPOUND CONTAINING POTASSIUM HYDROXIDE.
DOT Hazard Class: CORROSIVE
UN/NA Number: **Packing Group:** III

LAND TRANSPORT (Canadian TDG):

TDG Shipping Name: POTASSIUM HYDROXIDE, SOLID. No information available.

15. REGULATORY INFORMATION

This material meets the EPA	[ ] Yes [X] No	Acute (immediate) Health Hazard
'Hazard Categories' defined	[ ] Yes [X] No	Chronic (delayed) Health Hazard
for SARA Title III Sections	[ ] Yes [X] No	Fire Hazard
311/312 as indicated:	[ ] Yes [X] No	Sudden Release of Pressure Hazard
	[ ] Yes [X] No	Reactive Hazard

CAS #	Hazardous Components (Chemical Name)	Other US EPA or State Lists
1310-58-3	Potassium hydroxide	TSCA: Inventory
111-76-2	Ethanol, 2-Butoxy-	TSCA: Inventory

16. OTHER INFORMATION

Revision Date: 10/31/2013
Additional Information About This Product: No data available.
Company Policy or Disclaimer: While the information is believed to be correct, Kirby Chemical Company shall in no event be responsible for any damages whatsoever, either directly or indirectly, resulting from any publication or use of or reliance upon data contained herein. No warranty, either expressed or implied, of merchantability, of fitness for a particular purpose, or of any other nature with respect to the product or to the data, is made herein.
The information contained in this Material Safety Data Sheet is supplied pursuant to OSHA's Hazard Communication Standard, 29 CFR 1910.1200. Standard must be consulted for specific requirements