# Safety Data Sheet

**Issue Date:** 08-Sep-2010 **Revision Date:** 20-Apr-2015 **Version** 1

## 1. IDENTIFICATION

**Product Identifier**

**Product Name** **RTU Glass Cleaner**

**Other means of identification**

**SDS #** MTC-011

**Recommended use of the chemical and restrictions on use**

**Recommended Use** Glass Cleaner.

**Details of the supplier of the safety data sheet**

**Supplier Address**

MetroTech Chemicals, Inc.
2101 Wilkinson Blvd.
Charlotte, NC 28208

**Emergency Telephone Number**

**Company Phone Number** Phone: 1-704-525-3600
Fax: 1-704-525-5156

**Emergency Telephone (24 hr)** INFOTRAC 1-352-323-3500 (International)
1-800-535-5053 (North America)

## 2. HAZARDS IDENTIFICATION

**Appearance** Liquid (blue) **Physical State** Liquid **Odor** Lemon

**Classification**

| | |
|---|---|
| Flammable Liquids | Category 4 |

**Signal Word**

**Warning**

**Hazard Statements**

Combustible liquid

**Precautionary Statements - Prevention**

Keep away from heat/sparks/open flames/hot surfaces. ð No smoking
Wear protective gloves/protective clothing/eye protection/face protection

**Precautionary Statements - Response**

IN CASE OF FIRE: Use CO2, dry chemical, or foam for extinction

**Precautionary Statements - Storage**

Store in a well-ventilated place. Keep cool

**Precautionary Statements - Disposal**

Dispose of contents/container to an approved waste disposal plant

## 3. COMPOSITION/INFORMATION ON INGREDIENTS

| Chemical Name | CAS No | Weight-% |
|---|---|---|
| Ethylene Glycol Monobutyl Ether | 111-76-2 | <3 |

**If Chemical Name/CAS No is "proprietary" and/or Weight-% is listed as a range, the specific chemical identity and/or percentage of composition has been withheld as a trade secret.**

## 4. FIRST-AID MEASURES

**First Aid Measures**

**Eye Contact** If splashed into eyes, flush with water for at least 15 minutes. If irritation continues, seek medical attention.

**Skin Contact** Remove contaminated clothing and shoes. Wash exposed areas with soap and water. If irritation persists, seek medical attention.

**Inhalation** If breathing problems develop, move to fresh air. If breathing is difficult, give oxygen. Keep victim warm and quiet. If problems persists, seek medical attention.

**Ingestion** Seek medical attention. Do not induce vomiting. Place victim on left side with head down. Do not leave the individual unattended.

**Most important symptoms and effects**

**Symptoms** Will cause eye irritation. May cause skin irritation. Swallowing small amounts of material is not likely to cause harmful effects. Inhalation of this material during normal handling is not likely to cause harmful effects.

**Indication of any immediate medical attention and special treatment needed**

**Notes to Physician** Treat symptomatically.

## 5. FIRE-FIGHTING MEASURES

**Suitable Extinguishing Media**
Foam. Carbon dioxide (CO2). Dry chemical. Halon.

**Unsuitable Extinguishing Media** Water.

**Specific Hazards Arising from the Chemical**
Vapors are heavier than air and may travel along the ground and ignite at a distant source.

**Hazardous Combustion Products** Carbon oxides.

**Protective equipment and precautions for firefighters**
As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear.

## 6. ACCIDENTAL RELEASE MEASURES

**Personal precautions, protective equipment and emergency procedures**

**Personal Precautions** Use personal protective equipment as required.

**Methods and material for containment and cleaning up**

**Methods for Containment** Prevent further leakage or spillage if safe to do so.

**Methods for Clean-Up** Absorb liquid on vermiculite or other absorbent materials. Dike to prevent material from reaching streams or other water sources. If runoff occurs notify authorities as required. Dispose of waste in accordance with local, state or federal laws.

## 7. HANDLING AND STORAGE

**Precautions for safe handling**

**Advice on Safe Handling** Handle in accordance with good industrial hygiene and safety practice. Keep away from heat/sparks/open flames/hot surfaces. ð No smoking. Wear protective gloves/protective clothing and eye/face protection.

**Conditions for safe storage, including any incompatibilities**

**Storage Conditions** Store in a well-ventilated place. Keep cool.

**Incompatible Materials** Strong oxidizing agents.

## 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

**Exposure Guidelines**

| Chemical Name | ACGIH TLV | OSHA PEL | NIOSH IDLH |
|---|---|---|---|
| Ethylene Glycol Monobutyl Ether<br>111-76-2 | TWA: 20 ppm | TWA: 50 ppm<br>TWA: 240 mg/m$^3$<br>(vacated) TWA: 25 ppm<br>(vacated) TWA: 120 mg/m$^3$<br>(vacated) S*<br>S* | IDLH: 700 ppm<br>TWA: 5 ppm<br>TWA: 24 mg/m$^3$ |

**Appropriate engineering controls**

**Engineering Controls** Apply technical measures to comply with the occupational exposure limits.

**Individual protection measures, such as personal protective equipment**

**Eye/Face Protection** Avoid contact with eyes.

**Skin and Body Protection** Wear suitable protective clothing.

**Respiratory Protection** Ensure adequate ventilation, especially in confined areas.

**General Hygiene Considerations** Handle in accordance with good industrial hygiene and safety practice.

## 9. PHYSICAL AND CHEMICAL PROPERTIES

**Information on basic physical and chemical properties**

| | | | |
|---|---|---|---|
| **Physical State** | Liquid | | |
| **Appearance** | Liquid | **Odor** | Lemon |
| **Color** | Blue | **Odor Threshold** | Not determined |

| Property | Values | Remarks • Method |
|---|---|---|
| **pH** | Not determined | |
| **Melting Point/Freezing Point** | Not determined | |
| **Boiling Point/Boiling Range** | 154.4-196.1 °C / 310-385 °F | |
| **Flash Point** | >60 °C / >140 °F | |
| **Evaporation Rate** | Not determined | |
| **Flammability (Solid, Gas)** | Not determined | |
| **Upper Flammability Limits** | Not determined | |
| **Lower Flammability Limit** | Not determined | |
| **Vapor Pressure** | Not determined | |
| **Vapor Density** | Not determined | |
| **Specific Gravity** | Not determined | |
| **Water Solubility** | Not determined | |
| **Solubility in other solvents** | Not determined | |
| **Partition Coefficient** | Not determined | |
| **Auto-ignition Temperature** | Not determined | |
| **Decomposition Temperature** | Not determined | |
| **Kinematic Viscosity** | Not determined | |
| **Dynamic Viscosity** | Not determined | |
| **Explosive Properties** | Not determined | |
| **Oxidizing Properties** | Not determined | |
| **VOC Content** | <3% | |
| **Density** | ~1.0 | |

## 10. STABILITY AND REACTIVITY

**Reactivity**
Not reactive under normal conditions.

**Chemical Stability**
Stable under recommended storage conditions.

**Possibility of Hazardous Reactions**
None under normal processing.

**Hazardous Polymerization** Under normal conditions of storage and use, hazardous polymerization will not occur.

**Conditions to Avoid**
Keep out of reach of children.

**Incompatible Materials**
Strong oxidizing agents.

**Hazardous Decomposition Products**
Carbon oxides.

## 11. TOXICOLOGICAL INFORMATION

**Information on likely routes of exposure**

**Product Information**

**Eye Contact** Avoid contact with eyes.

**Skin Contact** Avoid contact with skin.

**Inhalation** Do not inhale.

**Ingestion** Do not ingest.

**Component Information**

| Chemical Name | Oral LD50 | Dermal LD50 | Inhalation LC50 |
|---|---|---|---|
| Ethylene Glycol Monobutyl Ether 111-76-2 | = 470 mg/kg ( Rat ) | = 99 mg/kg ( Rabbit ) | = 450 ppm ( Rat ) 4 h |
| 1-Butoxy-2-propanol 5131-66-8 | = 5600 µL/kg ( Rat ) | = 3100 mg/kg ( Rabbit ) | - |

**Information on physical, chemical and toxicological effects**

**Symptoms** Please see section 4 of this SDS for symptoms.

**Delayed and immediate effects as well as chronic effects from short and long-term exposure**

**Carcinogenicity** Group 3 IARC components are "not classifiable as human carcinogens".

| Chemical Name | ACGIH | IARC | NTP | OSHA |
|---|---|---|---|---|
| Ethylene Glycol Monobutyl Ether 111-76-2 | A3 | Group 3 | | |

**Legend**

***ACGIH (American Conference of Governmental Industrial Hygienists)***
*A3 - Animal Carcinogen*
***IARC (International Agency for Research on Cancer)***
*Group 3 IARC components are "not classifiable as human carcinogens"*

**Numerical measures of toxicity**
Not determined

## 12. ECOLOGICAL INFORMATION

**Ecotoxicity**
The product is not classified as environmentally hazardous. However, this does not exclude the possibility that large or frequent spills can have a harmful or damaging effect on the environment.

**Component Information**

| Chemical Name | Algae/aquatic plants | Fish | Toxicity to microorganisms | Crustacea |
|---|---|---|---|---|
| Ethylene Glycol Monobutyl Ether 111-76-2 | | 1490: 96 h Lepomis macrochirus mg/L LC50 static 2950: 96 h Lepomis macrochirus mg/L LC50 | | 1000: 48 h Daphnia magna mg/L EC50 1698 - 1940: 24 h Daphnia magna mg/L EC50 |

**Persistence/Degradability**
Not determined.

**Bioaccumulation**
Not determined.

**Mobility**

| Chemical Name | Partition Coefficient |
|---|---|
| Ethylene Glycol Monobutyl Ether 111-76-2 | 0.81 |

**Other Adverse Effects**
Not determined

## 13. DISPOSAL CONSIDERATIONS

**Waste Treatment Methods**

**Disposal of Wastes** Disposal should be in accordance with applicable regional, national and local laws and regulations.

**Contaminated Packaging** Disposal should be in accordance with applicable regional, national and local laws and regulations.

## 14. TRANSPORT INFORMATION

**Note** According to 49 CFR §173.150(f)(1), this material should be reclassified as "NA1993, Combustible Liquid, N.O.S." if it is shipped in bulk.

**DOT** Not regulated

**IATA** Not determined

**IMDG** Not regulated

## 15. REGULATORY INFORMATION

**International Inventories**

| Chemical Name | TSCA | DSL | NDSL | EINECS | ELINCS | ENCS | IECSC | KECL | PICCS | AICS |
|---|---|---|---|---|---|---|---|---|---|---|
| Ethylene Glycol Monobutyl Ether | Present | X | | Present | | Present | X | Present | X | X |

**Legend:**

***TSCA*** *- United States Toxic Substances Control Act Section 8(b) Inventory*

***DSL/NDSL*** *- Canadian Domestic Substances List/Non-Domestic Substances List*

***EINECS/ELINCS*** *- European Inventory of Existing Chemical Substances/European List of Notified Chemical Substances*

***ENCS*** *- Japan Existing and New Chemical Substances*

***IECSC*** *- China Inventory of Existing Chemical Substances*

***KECL*** *- Korean Existing and Evaluated Chemical Substances*

***PICCS*** *- Philippines Inventory of Chemicals and Chemical Substances*

***AICS*** *- Australian Inventory of Chemical Substances*

**US Federal Regulations**

**CERCLA**

This material, as supplied, does not contain any substances regulated as hazardous substances under the Comprehensive Environmental Response Compensation and Liability Act (CERCLA) (40 CFR 302) or the Superfund Amendments and Reauthorization Act (SARA) (40 CFR 355).

**SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372

**CWA (Clean Water Act)**
This product does not contain any substances regulated as pollutants pursuant to the Clean Water Act (40 CFR 122.21 and 40 CFR 122.42)

**US State Regulations**

**California Proposition 65**
This product does not contain any Proposition 65 chemicals.

**U.S. State Right-to-Know Regulations**

| Chemical Name | New Jersey | Massachusetts | Pennsylvania |
|---|---|---|---|
| Ethylene Glycol Monobutyl Ether 111-76-2 | X | X | X |
| Sodium Sulfate 7757-82-6 | | X | X |

## 16. OTHER INFORMATION

| | | | | |
|---|---|---|---|---|
| **NFPA** | **Health Hazards** | **Flammability** | **Instability** | **Special Hazards** |
| | Not determined | Not determined | Not determined | Not determined |
| **HMIS** | **Health Hazards** | **Flammability** | **Physical Hazards** | **Personal Protection** |
| | Not determined | Not determined | Not determined | Not determined |

**Issue Date:** 08-Sep-2010
**Revision Date:** 20-Apr-2015
**Revision Note:** New format

**Disclaimer**
**The information provided in this 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 a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates 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.**

**End of Safety Data Sheet**