1. PRODUCT AND COMPANY IDENTIFICATION

Product Name: Klean Strip Green Denatured Alcohol  
Company Name: W. M. Barr  
Address: 2105 Channel Avenue, Memphis, TN 38113  
Phone Number: (901)775-0100  

Emergency Contact:  
Emergency Contact: 3E 24 Hour Emergency Contact (800)451-8346  
Information: W.M. Barr Customer Service (800)398-3892  

Web site address: www.wmbarr.com  
Intended Use: Cleans glass and is used as a fuel for marine stoves  
Product Code: QKGA75003

2. HAZARDS IDENTIFICATION

Flammable Liquids, Category 2  
Acute Toxicity: Inhalation, Category 4  
Acute Toxicity: Skin, Category 3  
Serious Eye Damage/Eye Irritation, Category 2A  
Carcinogenicity, Category 2  
Toxic To Reproduction, Category 2

Specific Target Organ Toxicity (single exposure), Category 2  
Specific Target Organ Toxicity (repeated exposure), Category 1

GHS Signal Word: Danger  
GHS Hazard Phrases:  
H225: Highly flammable liquid and vapor.  
H311: Toxic in contact with skin.  
H319: Causes serious eye irritation.  
H332: Harmful if inhaled.  
H351: Suspected of causing cancer.  
H361: Suspected of damaging fertility or the unborn child.  
H371: May cause damage to organs.  
H372: Causes damage to organs through prolonged or repeated exposure.

GHS Precaution Phrases:  
P201: Obtain special instructions before use.  
P202: Do not handle until all safety precautions have been read and understood.  
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 electrical/ventilating/lighting equipment.  
P242: Use only non-sparking tools.  
P243: Take precautionary measures against static discharge.  
P260: Do not breathe gas/mist/vapors/spray.  
P264: Wash hands thoroughly after handling.  
P270: Do not eat, drink or smoke when using this product.  
P271: Use only outdoors or in a well-ventilated area.  
P280: Wear protective gloves/protective clothing/eye protection/face protection.  
P281: Use personal protective equipment as required.

GHS Response Phrases:  
P302+352: IF ON SKIN: Wash with plenty of soap and water.  
P303+361+353: IF ON SKIN (or hair): P361: Remove/Take off immediately all contaminated clothing. Rinse skin with water/shower.  
P304+340: IF INHALED: Remove victim to fresh air and keep at rest in a position...
comfortable for breathing.
P305+351+338: IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308+313: IF exposed or concerned: Get medical attention/advice.
P309+311: Call a POISON CENTER or doctor/physician if exposed or you feel unwell.
P312: Call a POISON CENTER or doctor/physician if you feel unwell.
P314: Get medical attention/advice if you feel unwell.
P322: Specific measures see label.
P337+313: If eye irritation persists, get medical advice/attention.
P363: Wash contaminated clothing before reuse.
P370+378: In case of fire, use dry powder chemical to extinguish.

GHS Storage and Disposal Phrases:
P403+235: Store in cool/well-ventilated place.
P405: Store locked up.
P501: Dispose of contents/container according to local, state and federal regulations.

OSHA Regulatory Status: This material is classified as hazardous under OSHA regulations.

Potential Health Effects (Acute and Chronic):
No data available.

Medical Conditions Generally
Diseases of the liver.
Aggravated By Exposure:

3. COMPOSITION/INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>CAS #</th>
<th>Hazardous Components (Chemical Name)</th>
<th>Concentration</th>
</tr>
</thead>
<tbody>
<tr>
<td>64-17-5</td>
<td>Ethyl alcohol  {Ethanol}</td>
<td>80.0 -100.0 %</td>
</tr>
<tr>
<td>67-56-1</td>
<td>Methanol  {Methyl alcohol; Carbinol; Wood alcohol}</td>
<td>3.0 -7.0 %</td>
</tr>
<tr>
<td>141-78-6</td>
<td>Acetic acid, ethyl ester  {Ethyl acetate}</td>
<td>1.0 -5.0 %</td>
</tr>
<tr>
<td>108-10-1</td>
<td>Methyl isobutyl ketone  {Hexone; Isopropylacetone; MIBK; 4-Methyl-2-pentanone}</td>
<td>0.1 -1.0 %</td>
</tr>
<tr>
<td>142-82-5</td>
<td>Heptane</td>
<td>0.1 -1.0 %</td>
</tr>
</tbody>
</table>

Additional Chemical Information
Specific percentage of composition is being withheld as a trade secret.

4. FIRST AID MEASURES

Emergency and First Aid Procedures:
Inhalation:
If user experiences breathing difficulty, move to air free of vapors. Administer oxygen or artificial respiration until medical assistance can be rendered.

Skin Contact:
Wash with soap and water while removing contaminated clothing. If symptoms persist seek medical advice.

Eye Contact:
Flush with large quantities of water for at least 15 minutes. Get medical attention.

Ingestion:
Call your poison control center, hospital emergency room or physician immediately for instructions to induce vomiting.
Do not induce vomiting without medical advice. Never give anything by mouth to an unconscious person.

Signs and Symptoms Of
Unconsciousness. Narcosis. Cyanosis (blue tissue condition, nails, lips, and/or skin).
Exposure:
Decrease in
Birth
defects. Sterility.

Note to Physician:
Poison. This product contains methanol. Methanol is metabolized to formaldehyde and
formic acid. These metabolites may cause metabolic acidosis, visual disturbances and
blindness. Since metabolism is required for these toxic symptoms, their onset may be
delayed from 6 to 30 hours following ingestion. Ethanol competes for the same metabolic
pathway and has been used as an antidote. Methanol is effectively removed by
hemodialysis. Call your local poison control center for further instructions.

5. FIRE FIGHTING MEASURES

Flash Pt: 55.00 F
Method Used: Unknown

Explosive Limits:
LEL: 3.3 %
UEL: 19%

Autoignition Pt: 685.00 F

Suitable Extinguishing Media:
Use carbon dioxide, dry powder, alcohol-resistant foam, or water spray.

Unsuitable Extinguishing Media:
Do not use water jet as an extinguisher

Fire Fighting Instructions:
Self-contained respiratory protection should be provided for fire fighters fighting fires in
buildings or confined area. Storage containers exposed to fire should be kept cool with
water spray to prevent pressure build-up. Stay away from heads of containers that have
been exposed to intense heat or flame.

Flammable Properties and Hazards:
Flashback of vapors possible over considerable distance.

6. ACCIDENTAL RELEASE MEASURES

Steps To Be Taken In Case Material Is Released Or Spilled:
Clean-up:
Keep unnecessary people away; isolate hazard area and deny entry. Stay upwind, out
of low areas, and ventilate closed spaces before entering. Shut off ignition sources,
keep flares, smoking or flames out of hazard area.

Small spills:
Take up liquid with sand, earth or other noncombustible absorbent material and place in
a plastic container where applicable.

Large spills:
Dike far ahead of spill for later disposal.

Do not flush into surface water or sanitary sewer system.

7. HANDLING AND STORAGE

Precautions To Be Taken in Handling:
Read carefully all cautions and directions on product label before use. Since empty
container retains residue, follow all label warnings even after container is empty.
Dispose of empty container according to all regulations. Do not reuse this container.

Precautions To Be Taken in Storing:
Keep container tightly closed when not in use. Store in a cool, dry place. Do not store
near flames or at elevated temperatures.
8. EXPOSURE CONTROLS/PERSONAL PROTECTION

<table>
<thead>
<tr>
<th>CAS #</th>
<th>Partial Chemical Name</th>
<th>OSHA TWA</th>
<th>ACGIH TWA</th>
<th>Other Limits</th>
</tr>
</thead>
<tbody>
<tr>
<td>64-17-5</td>
<td>Ethyl alcohol {Ethanol}</td>
<td>PEL: 1000 ppm</td>
<td>TLV: 1000 ppm</td>
<td>No data.</td>
</tr>
<tr>
<td>67-56-1</td>
<td>Methanol {Methyl alcohol; Carbinol; Wood alcohol}</td>
<td>PEL: 200 ppm</td>
<td>TLV: 200 ppm</td>
<td>No data.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>STEL: 250 ppm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>141-78-6</td>
<td>Acetic acid, ethyl ester {Ethyl acetate}</td>
<td>PEL: 400 ppm</td>
<td>TLV: 400 ppm</td>
<td>No data.</td>
</tr>
<tr>
<td>108-10-1</td>
<td>Methyl isobutyl ketone {Hexone; Isopropylacetone; MIBK; 4-Methyl-2-pentanone}</td>
<td>PEL: 100 ppm</td>
<td>TLV: 20 ppm</td>
<td>No data.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>STEL: 75 ppm</td>
<td></td>
<td></td>
</tr>
<tr>
<td>142-82-5</td>
<td>Heptane</td>
<td>PEL: 500 ppm</td>
<td>TLV: 400 ppm</td>
<td>No data.</td>
</tr>
<tr>
<td></td>
<td></td>
<td>STEL: 500 ppm</td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

Respiratory Equipment (Specify Type): For OSHA controlled work place and other regular users. Use only with adequate ventilation under engineered air control systems designed to prevent exceeding appropriate TLV. For occasional use, where engineered air control is not feasible, use properly maintained and properly fitted NIOSH approved respirator for organic solvent vapors. A dust mask does not provide protection against vapors.

Eye Protection: Safety glasses, chemical goggles or face shields are recommended to safeguard against potential eye contact, irritation, or injury. Contact lenses should not be worn while working with chemicals.

Protective Gloves: Wear impermeable gloves. Gloves contaminated with product should be discarded. Promptly remove clothing that becomes soiled with product.

Other Protective Clothing: Various application methods can dictate the use of additional protective safety equipment, such as impermeable aprons, etc., to minimize exposure.

Engineering Controls (Ventilation etc.): Use only with adequate ventilation to prevent build-up of vapors. Open all windows and doors. Use only with a cross ventilation of moving fresh air across the work area. If strong odor is noticed or you experience slight dizziness, headache, nausea, or eye-watering -- Stop -- ventilation is inadequate. Leave area immediately.

Work/Hygienic/Maintenance Practices: A source of clean water should be available in the work area for flushing eyes and skin. Do not eat, drink, or smoke in the work area. Wash hands thoroughly after use. Before reuse, thoroughly clean any clothing or protective equipment that has been contaminated by prior use. Discard any clothing or other protective equipment that cannot be decontaminated, such as gloves or shoes.

9. PHYSICAL AND CHEMICAL PROPERTIES

- Physical States: [ ] Gas [X] Liquid [ ] Solid
- Appearance and Odor: Clear, water white, thin liquid
- Melting Point: No data.
- Boiling Point: 174.20 F
- Autoignition Pt: 685.00 F
- Flash Pt: 55.00 F Method Used: Unknown
- Explosive Limits: LEL: 3.3 % UEL: 19%
- Specific Gravity (Water = 1): 0.789 - 0.83 at 60.0 F
Bulk density: 6.75 LB/GA
Vapor Pressure (vs. Air or mm Hg): ~ 44 MM HG at 20.0 C
Vapor Density (vs. Air = 1): ~ 1.6
Evaporation Rate: ~ 2 (BuAC=1)
Solubility in Water: miscible
Solubility Notes: Completely soluble in water.
Percent Volatile: 100.0 % by weight.
VOC / Volume: 789.0000 G/L

10. STABILITY AND REACTIVITY

Stability: Unstable [ ] Stable [ X ]
Conditions To Avoid - Instability: Heat, flames and sparks. Avoid temperatures exceeding the flash point.

Incompatibility - Materials To Avoid: Incompatible with strong oxidizing agents.
Hazardous Decomposition or Byproducts: Decomposition may produce carbon monoxide, carbon dioxide, and possibly other unidentified organic compounds.
Possibility of Hazardous Reactions: Will occur [ ] Will not occur [ X ]
Conditions To Avoid - Hazardous Reactions: No data available.

11. TOXICOLOGICAL INFORMATION

Toxicological Information: This product has not been tested as a whole. Refer to section 2 for acute and chronic health effects.
CAS# 64-17-5:
Acute toxicity, LD50, Oral, Rat, 7060. MG/KG.
Result:
Lungs, Thorax, or Respiration:Other changes.

CAS# 141-78-6:
Standard Draize Test, Eyes, Human, 400.0 PPM.
Result:
Liver: Hepatitis (hepatocellular necrosis), zonal.
- Journal of Industrial Hygiene and Toxicology, Vol/p/yr: 25,282, 1943

CAS# 108-10-1:
Standard Draize Test, Eyes, Species: Rabbit, 40.00 MG, Severe.
Result:
Effects on Newborn: Growth statistics (e.g., reduced weight gain).
Effects on Newborn: Behavioral.
IARC 1 - Carcinogenic to humans
IARC 2B - Possibly Carcinogenic to Humans ACGIH A4 - Not Classifiable as a Human Carcinogen.
# SAFETY DATA SHEET
## Klean Strip Green Denatured Alcohol

**Revision:** 08/01/2018  
**Supersedes Revision:** 06/27/2018

### CAS # | Hazardous Components (Chemical Name) | NTP | IARC | ACGIH | OSHA
--- | --- | --- | --- | --- | ---
64-17-5 | Ethyl alcohol {Ethanol} | n.a. | 1 | A4 | n.a.
67-56-1 | Methanol {Methyl alcohol; Carbinol; Wood alcohol} | n.a. | n.a. | n.a. | n.a.
141-78-6 | Acetic acid, ethyl ester {Ethyl acetate} | n.a. | n.a. | n.a. | n.a.
108-10-1 | Methyl isobutyl ketone {Hexone; Isopropylacetone; MIBK; 4-Methyl-2-pentanone} | n.a. | 2B | n.a. | n.a.
142-82-5 | Heptane | n.a. | n.a. | n.a. | n.a.

### 12. ECOLOGICAL INFORMATION

**General Ecological Information:**
This product has not been tested as a whole.

### 13. DISPOSAL CONSIDERATIONS

**Waste Disposal Method:** Dispose in accordance with applicable local, state, and federal regulations.

**Waste Disposal Method:** D001

### 14. TRANSPORT INFORMATION

**LAND TRANSPORT (US DOT):**

- **DOT Proper Shipping Name:** Ethyl alcohol
- **DOT Hazard Class:** 3 FLAMMABLE LIQUID
- **UN/NA Number:** UN1170
- **Packing Group:** II

**Additional Transport Information:**
The supplier may apply one of the following exceptions: Combustible Liquid, Consumer Commodity, Limited Quantity, Viscous Liquid, Does Not Sustain Combustion, or others, as allowed under 49CFR Hazmat Regulations. Please consult 49CFR Subchapter C to ensure that subsequent shipments comply with these exceptions.

### 15. REGULATORY INFORMATION

**EPA SARA (Superfund Amendments and Reauthorization Act of 1986) Lists**

<table>
<thead>
<tr>
<th>CAS #</th>
<th>Hazardous Components (Chemical Name)</th>
<th>S. 302 (EHS)</th>
<th>S. 304 RQ</th>
<th>S. 313 (TRI)</th>
</tr>
</thead>
<tbody>
<tr>
<td>64-17-5</td>
<td>Ethyl alcohol {Ethanol}</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
<tr>
<td>67-56-1</td>
<td>Methanol {Methyl alcohol; Carbinol; Wood alcohol}</td>
<td>No</td>
<td>Yes 5000 LB</td>
<td>Yes</td>
</tr>
<tr>
<td>141-78-6</td>
<td>Acetic acid, ethyl ester {Ethyl acetate}</td>
<td>No</td>
<td>Yes 5000 LB</td>
<td>No</td>
</tr>
<tr>
<td>108-10-1</td>
<td>Methyl isobutyl ketone {Hexone; Isopropylacetone; MIBK; 4-Methyl-2-pentanone}</td>
<td>No</td>
<td>Yes 5000 LB</td>
<td>Yes</td>
</tr>
<tr>
<td>142-82-5</td>
<td>Heptane</td>
<td>No</td>
<td>No</td>
<td>No</td>
</tr>
</tbody>
</table>

**Other US EPA or State Lists**

- **CAS # | Hazardous Components (Chemical Name):**
  - 64-17-5 Ethyl alcohol {Ethanol}
  - 67-56-1 Methanol {Methyl alcohol; Carbinol; Wood alcohol}

**Other US EPA or State Lists:**

- CAA HAP,ODC: No; CWA NPDES: No; TSCA: Yes - Inventory; CA PROP.65: No
- CAA HAP,ODC: HAP: VHAP; CWA NPDES: No; TSCA: Yes - Inventory; CA PROP.65: Yes: RDTox.
Klean Strip Green Denatured Alcohol

SAFETY DATA SHEET

Revision: 08/01/2018
Supersedes Revision: 06/27/2018

141-78-6 Acetic acid, ethyl ester (Ethyl acetate) CAA HAP,ODC: No; CWA NPDES: No; TSCA: Yes - Inventory; CA PROP.65: No

108-10-1 Methyl isobutyl ketone (Hexone; Isopropylacetone; MIBK; 4-Methyl-2-pentanone) CAA HAP,ODC: HAP; CWA NPDES: No; TSCA: Yes - Inventory; CA PROP.65: Yes: Canc+RDTox.

142-82-5 Heptane CAA HAP,ODC: No; CWA NPDES: No; TSCA: Yes - Inventory, 4 Test, 8A PAIR; CA PROP.65: No

Additional Regulatory Information

Additional Information About This Product:
The information contained herein is presented in good faith and believed to be accurate as of the effective date shown above. This information is furnished without warranty of any kind. Employers should use this information only as a supplement to other information gathered by them and must make independent determination of suitability and completeness of information from all sources to assure proper use of these materials and the safety and health of employees. Any use of this data and information must be determined by the user to be in accordance with applicable federal, state and local laws and regulations.

Company Policy or Disclaimer:
This product is regulated by the United States Consumer Product Safety Commission and is subject to certain labeling requirements under the Federal Hazardous Substances Act. These requirements differ from the classification criteria and hazard information required for safety data sheets (SDS). The product label also includes other important information, including directions for use, and should always be read in its entirety prior to using the product.

All components of this material are listed on the TSCA Inventory or are exempt.

16. OTHER INFORMATION

Revision Date: 08/01/2018
Preparer Name: W.M. Barr EHS Department (901)775-0100
Additional Information About This Product: No data available.