SECTION 1: COMPANY AND CHEMICAL INFORMATION

PRODUCT NAME: DEBACTEROL® Canker Sore Pain Relief
FOR PROFESSIONAL USE ONLY

EPIEN Medical, Inc.
4225 White Bear Parkway
Suite 600
St. Paul, MN. 55110

EPIEN MEDICAL CUSTOMER SERVICE PHONE NUMBER:
(888) 884-4675 (8:00 a.m. – 4:30 p.m. Central Time)
651-653-3380
WEBSITE: www.epien.com
www.debacterol.com

24 HOUR EMERGENCY PHONE NUMBER:
SafetyCall International (866) 516-0243/(952) 852-4659

SECTION 2: HAZARDS IDENTIFICATION

POTENTIAL ADVERSE HEALTH EFFECTS: Debacterol® is indicated in the topical treatment of ulcerating lesions of the oral cavity such as Recurrent Aphthous Stomatitis (Canker Sores). Debacterol provides relief from the pain and discomfort of mucosal ulcers. Debacterol is not intended for treatment of vesicular lesions, such as Cold Sores or Fever Blisters. Do not use if allergic to a material that contains sulfur in any form.

DERMAL: When the product is used according to the “instructions for use” on the oral mucosa for the treatment of recurrent aphthous stomatitis (oral ulcers) the product will cause an “eschar” to form over the affected area. Irritation in the form of a “stinging” sensation will be experienced during the 5-10 second application. A water rinse following the application will immediately cause this stinging sensation to disappear. Product applied to healthy tissue, adjacent to an ulcerated lesion, causes that tissue to temporarily appear white. Tissues will return to a normal pink color in a matter of hours. Again, when used as directed, no adverse effects are expected. The small amount of acid equivalents contained in a single product dose is self neutralized after reaction with the ulcer lesion and rinsing.

INGESTION: Harmful if swallowed.

OCULAR: Irritant to eyes.

CHRONIC HEALTH EFFECTS: None known.

CARCINOGENICITY: None of the ingredients are considered to be carcinogenic by IARC, NTP, or OSHA.

TARGET ORGANS: Topical.

ODOR: Smoky creosote odor.

NOTE: This is a medical product, packaged in small quantities, and intended for direct application to the inside of the mouth (for oral ulcers).

SECTION 3: COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Hazardous ingredients*</th>
<th>Weight %</th>
<th>CAS #</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sulfonated phenolics</td>
<td>30-60 %</td>
<td>1333-39-7 &amp; 50855-43-1</td>
</tr>
<tr>
<td>Sulfuric Acid</td>
<td>25-35 %</td>
<td>7664-93-9</td>
</tr>
<tr>
<td>Water</td>
<td>Balance</td>
<td>7732-18-5</td>
</tr>
</tbody>
</table>

*all ingredients in quantities >1.0 % that are potentially hazardous per OSHA definitions NE=not established NA=not applicable NDA=no data available

SECTION 4: FIRST AID MEASURES

INTENDED SKIN CONTACT: If excess irritation occurs during use, a rinse with sodium bicarbonate (baking soda) solution will neutralize the reaction (use 0.5 teaspoon in 120ml of water). If condition persists contact healthcare professional. Do not use if the patient is allergic to a material that contains sulfur in any form.

UNINTENDED SKIN CONTACT: Flush affected area with water. Seek medical attention if irritation develops and persists.

INGESTION: Rinse out mouth and dilute with fluids (no more than 8 ounces in adults and 4 ounces in children). Do not induce vomiting. Call a healthcare professional or SafetyCall International.

EYE CONTACT: Flush thoroughly with water. If contact lenses present, remove and flush for additional 15 minutes with water, contact a healthcare professional.

INHALATION: Move to fresh air; seek medical attention if breathing difficulty develops.
SECTION 5: FIRE FIGHTING MEASURES

**SUITABLE EXTINGUISHING MEDIA:** Alcohol foam, dry chemical or CO2.

**UNSUITEABLE EXTINGUISHING MEDIA:** Water stream.

**UNUSUAL FIRE AND EXPLOSION HAZARDS:** Material may spatter when water is first applied.

**PROTECTION OF FIREFIGHTERS**

**HAZARDOUS COMBUSTION PRODUCTS:** Carbon monoxide and carbon dioxide, sulfur oxides

**SPECIAL PROTECTIVE EQUIPMENT AND PRECAUTIONS FOR FIREFIGHTERS:** Use NIOSH/MSHA approved SCBA and bunker or turnout gear.

SECTION 6: ACCIDENTAL RELEASE MEASURES

**Steps to be taken in case the material is spilled:** Do not attempt to clean up chemical spills without appropriate personal protective equipment (see section 8). Do not touch or walk through spilled material. Soak material up with inert sorbent (DO NOT use organic materials such as sawdust), and transfer to plastic containers for disposal. Keep waste out of sewers, watersheds, and waterways.

SECTION 7: HANDLING AND STORAGE

**Handling:** Avoid eye contact. Avoid skin contact. Avoid breathing mists, sprays or vapors. See comments regarding personal protective equipment (see Section 8).

**Storage:** Store upright in a cool, dry, well ventilated area out of direct sunlight. Protect container from damage to avoid spills. Keep containers tightly closed at all times. Do not reuse container. Store away from incompatible materials (see Section 10). Keep out of reach of children.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

<table>
<thead>
<tr>
<th>Hazardous ingredients*</th>
<th>OSHA PEL**</th>
<th>OSHA PEL STEL/C</th>
<th>ACGIH TLV TWA</th>
<th>ACGIH TLV STEL/C</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sulfonated phenolics</td>
<td>NE</td>
<td>NE</td>
<td>NE</td>
<td>NE</td>
</tr>
<tr>
<td>Sulfuric acid</td>
<td>1.0 mg/m3</td>
<td>NE</td>
<td>0.2 mg/m3</td>
<td>NE</td>
</tr>
</tbody>
</table>

*all ingredients in quantities > 1.0 % (0.1 % for carcinogens) that are potentially hazardous per OSHA definitions (skin) - indicates harmful amounts may be absorbed through the skin

** Some States enforce the PEL’s that OSHA promulgated in 1989, which were subsequently vacated by the U.S. Supreme Court. Check with your State OSHA agency to determine which PEL is enforced in your jurisdiction.

NE = not established  NA = not applicable  NDA = no data available

**ENGINEERING CONTROLS:** Transient use of small quantities, as directed, is unlikely to require the use of any engineering (ventilation) controls.

**SKIN:** Wear chemically resistant gloves (polyethylene) when handling large quantities (i.e., >1 gallon) if splash potential exists.

**BODY PROTECTION:** Prevent skin contact. Consumer: If spilled on clothing, remove immediately, flush skin area and rinse garment thoroughly.

**EYE PROTECTION:** Wear goggles and faceshield if potential exists for direct splash to eye tissue.

**RESPIRATORY:** NIOSH approved respiratory protection is necessary if any of the occupational exposure limits in Section 2 are exceeded. Seek professional advice prior to respirator selection or use. Follow OSHA respirator regulations (29 CFR 1910.134).
SECTION 9: PHYSICAL CHEMICAL PARAMETERS

<table>
<thead>
<tr>
<th>PHYSICAL STATE: Liquid</th>
<th>APPEARANCE: Brown</th>
</tr>
</thead>
<tbody>
<tr>
<td>ODOR: Smoky creosote odor.</td>
<td>VAPOR PRESSURE: NA</td>
</tr>
<tr>
<td>FLASHPOINT: None</td>
<td>FLAMMABLE LIMITS: UEL NA LEL: NA</td>
</tr>
<tr>
<td>AUTOIGNITION TEMPERATURE: NE</td>
<td>VAPOR DENSITY (air=1): &gt;1</td>
</tr>
<tr>
<td>% VOLATILE BY VOLUME: NA</td>
<td>EVAPORATION RATE (n-butyl acetate=1): &lt;1</td>
</tr>
<tr>
<td>BOILING POINT: NE</td>
<td>FREEZING POINT: NE</td>
</tr>
<tr>
<td>SPECIFIC GRAVITY: NE</td>
<td>VISCOSITY: NE</td>
</tr>
<tr>
<td>SOLUBILITY IN WATER: Miscible</td>
<td>BULK DENSITY: NE</td>
</tr>
<tr>
<td>MELTING POINT: NE</td>
<td>PH: &lt;2</td>
</tr>
</tbody>
</table>

SECTION 10: STABILITY AND REACTIVITY

STABILITY: Stable at STP (standard temperature and pressure)

INCOMPATIBILITIES/MATERIALS AND CONDITIONS TO AVOID: Strong oxidizing and reducing agents, potassium chloride/perchlorate/permanganate, sodium, lithium, bases, organic material, halogens, metal acetylides, oxides and hydrides, metals (evolves hydrogen gas). Large quantities of product should not be allowed to contact water.

POSSIBILITY OF HAZARDOUS REACTIONS: Hazardous polymerization will not occur.

HAZARDOUS DECOMPOSITION PRODUCTS: Sulfur oxides

SECTION 11: TOXICOLOGICAL INFORMATION

PRODUCT BASED INFORMATION: When the product is applied to normal, healthy tissue, the product can cause a minor chemical burn with slight irritation. When the product is used according to product directions, it will cause the intended formation of a small amount of scar tissue with the potential for local irritation at the application site. Do not use if the patient is allergic to a material that contains sulfur in any form.

INGREDIENT BASED INFORMATION: Call SafetyCall International for additional toxicity information on ingredients.

POSSIBLE TARGET ORGANS: Eyes and skin.

MEDICAL CONDITIONS THAT MAY BE AGGRAVATED BY EXPOSURE: Persons with pre-existing skin disorders may be more susceptible to the effects of this material. Do not use if the patient is allergic to a material that contains sulfur in any form.

CARCINOGENS: IARC – No*; NTP – None; OSHA – None [* Significant exposure by inhalation to this product is unlikely – IARC has stated that “occupational exposure to strong-inorganic-acid mists is carcinogenic to humans (Group 1)”.]

SECTION 12: ECOLOGICAL INFORMATION

ECOTOXICITY: Would be expected to be toxic to aquatic organisms but not with the small quantities contained in a single product dose.

PERSISTENCE/DEGRADABILITY: NDA

BIOACCUMULATION/ACCUMULATION: NDA

MOBILITY IN SOIL: NDA

SECTION 13: DISPOSAL INFORMATION

DISPOSAL COMMENTS: This material (as packaged) is most likely considered a RCRA hazardous waste (D002, Corrosive). Be aware that the waste owner has responsibility for final disposal. Regulations may also apply to empty containers, liners or rinsate. Laws may change or be reinterpreted; state and local regulations may be different from federal regulations. This information applies to materials as manufactured; contamination or processing may change waste characteristics and requirements

SECTION 14: TRANSPORT INFORMATION

DOT SHIPPING NAME: Phenolsulfonic acid, liquid

UN NUMBER: 1803

HAZARD CLASS: 8

PACKING GROUP: II

SUBSIDIARY CLASS: None

MARINE POLLUTANT INFORMATION: NDA
SECTION 15: REGULATORY INFORMATION

CHEMICAL INVENTORIES: All components of this product listed in section 2 are listed on the TSCA inventory list, the DSL/NDSL and the EINECS.

REPORTABLE QUANTITIES: Sulfuric acid = 1000 lbs.

SARA TITLE III (Superfund Amendments and Reauthorization Act)
Section 302 Extremely Hazardous Materials: Sulfuric acid
Section 304 Notification of Accidental Release: None

Sections 311/312 Hazard Categories:
- Immediate (acute) Health Effects: Yes
- Delayed (Chronic) Health Effects: Yes
- Fire Hazard: Yes
- Sudden Release of Pressure Hazard: No
- Reactivity Hazard: Yes

California Proposition 65 Warning: None

SECTION 16: OTHER INFORMATION

This MSDS replaces all previous versions for this product. Please discard all previous versions as they may contain changed or obsolete information. The information in this MSDS was obtained from sources we believe are reliable. However, the information is provided without any representation or warranty, expressed or implied, regarding its accuracy or completeness. Prepared by SafetyCall International, PLLC, Bloomington, MN USA.