SECTION 1) CHEMICAL PRODUCT AND SUPPLIER’S IDENTIFICATION

Product ID : Blast HD Foam Degreaser  
Product Name : Blast HD Foam Degreaser  
Revision Date : Oct 05, 2015
Version: 1.0
Distributor’s Name : COMMODORE SALES  
Address : 11002 TRADE ROAD - RICHMOND, VA 23235 USA
Emergency Phone : 1-800-535-5053
Information Phone : 804-794-1992
Fax :  

SECTION 2) HAZARDS IDENTIFICATION

Classification:
- Skin Irritation - Category 3  
- Eye Irritation - Category 2B  
- Aerosol - Category 1

Pictograms:  

Signal Word: Danger

Hazardous Statements - Physical:
- H222, H229 - Extremely flammable aerosol, Pressurized container may burst if heated

Hazardous Statements - Health:  
- H316 - Causes mild skin irritation  
- H320 - Causes eye irritation

Precautionary Statements - General:
- P101 - If medical advice is needed, have product container or label at hand.  
- P102 - Keep out of reach of children.  
- P103 - Read label before use.

Precautionary Statements - Prevention:
- P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.  
- P280 - Wear protective gloves/protective clothing/eye protection/face protection.  
- P264 - Wash thoroughly after handling.  
- P211 - Do not spray on an open flame or other ignition source.  
- P251 - Do not pierce or burn, even after use.
Precautionary Statements - Response:

P370 + P378 - In case of fire: Use water fog, dry chemical or carbon dioxide to extinguish.

P332 + P313 - If skin irritation occurs: Get medical advice/attention.

P305 + P351 + P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

P337 + P313 - If eye irritation persists: Get medical advice/attention.

Precautionary Statements - Storage:

P403 - Store in a well-ventilated place.

P410 - Protect from sunlight.

P412 - Do not expose to temperatures exceeding 50°C/122°F.

Precautionary Statements - Disposal:

P501 - Dispose of contents and container in accordance with all local, regional, national and international regulations.

SECTION 3) COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>CAS</th>
<th>Chemical Name</th>
<th>% by Weight</th>
</tr>
</thead>
<tbody>
<tr>
<td>0094266-47-4</td>
<td>Technical grade d-Limonene</td>
<td>19% - 33%</td>
</tr>
<tr>
<td>0000111-90-0</td>
<td>DIETHYLENE GLYCOL MONOETHYL ETHER</td>
<td>3% - 6%</td>
</tr>
<tr>
<td>0000106-97-8</td>
<td>BUTANE</td>
<td>1% - 3%</td>
</tr>
<tr>
<td>0000074-98-6</td>
<td>PROPANE</td>
<td>0.1% - 2.3%</td>
</tr>
<tr>
<td>0000075-28-5</td>
<td>ISOBUTANE</td>
<td>0.1% - 2.2%</td>
</tr>
</tbody>
</table>

SECTION 4) FIRST-AID MEASURES

Inhalation:
Remove source of exposure or move person to fresh air and keep comfortable for breathing.
If exposed/feel unwell/concerned: Call a POISON CENTER/doctor.
Eliminate all ignition sources if safe to do so.

Eye Contact:
Remove source of exposure or move person to fresh air. Rinse eyes cautiously with lukewarm, gently flowing water for several minutes, while holding the eyelids open. Remove contact lenses, if present and easy to do. Continue rinsing for a duration of 15-20 minutes. Take care not to rinse contaminated water into the unaffected eye or onto the face. If eye irritation persists: Get medical advice/attention.

Skin Contact:
Take off immediately all contaminated clothing, shoes and leather goods (e.g. watchbands, belts). Gently blot or brush away excess product. Wash with plenty of lukewarm, gently flowing water for a duration of 15-20 minutes. Call a POISON CENTER/doctor if you feel unwell. Store contaminated clothing under water and wash before reuse or discard.

Ingestion:
Rinse mouth. Do NOT induce vomiting. Immediately call a POISON CENTER/doctor. If vomiting occurs naturally, lie on your side, in the recovery position.
Never give anything by mouth to an unconscious or convulsing victim. Keep person warm and quiet.

SECTION 5) FIRE-FIGHTING MEASURES

Suitable Extinguishing Media:
Use water, fog, dry chemical, or carbon dioxide.
Carbon dioxide can displace oxygen. Use caution when applying carbon dioxide in confined spaces. Simultaneous use of foam and water on the same surface is to be avoided as water destroys the foam.

Unsuitable Extinguishing Media:
Water may be ineffective but can be used to cool containers exposed to heat or flame.

Specific Hazards in Case of Fire:
Contents under pressure. Keep away from ignition sources and open flames. Exposure of containers to extreme heat and flames can cause them to rupture often with violent force.
Aerosol cans may rupture when heated.
Heated cans may burst.
In fire, will decompose to carbon dioxide, carbon monoxide

**Fire-Fighting Procedures:**
Isolate immediate hazard area and keep unauthorized personnel out. Stop spill/release if it can be done safely. Move undamaged containers from immediate hazard area if it can be done safely. Water spray may be useful in minimizing or dispersing vapors and to protect personnel.
Dispose of fire debris and contaminated extinguishing water in accordance with official regulations.

**Special Protective Actions:**
Wear protective pressure self-contained breathing apparatus (SCBA) and full turnout gear.
Care should always be exercised in dust/mist areas.

---

**SECTION 6) ACCIDENTAL RELEASE MEASURES**

**Emergency Procedure:**
Flammable/combustible material.
ELIMINATE all ignition sources (no smoking, flares, sparks, or flames in immediate area). Stay upwind; keep out of low areas.
Immediately turn off or isolate any source of ignition. Keep unnecessary people away; isolate hazard area and deny entry. Do not touch or walk through spilled material. Clean up immediately. Use absorbent sweeping compound to soak up material and put into suitable container for proper disposal.

**Recommended Equipment:**
Positive pressure, full-face piece self-contained breathing apparatus (SCBA), or positive pressure supplied air respirator with escape SCBA (NIOSH approved).

**Personal Precautions:**
ELIMINATE all ignition sources (no smoking, flares, sparks, or flames in immediate area). Use explosion proof equipment. Avoid breathing vapor. Avoid contact with skin, eye or clothing. Do not touch damaged containers or spilled materials unless wearing appropriate protective clothing.

**Environmental Precautions:**
Stop spill/release if it can be done safely. Prevent spilled material from entering sewers, storm drains, other unauthorized drainage systems and natural waterways by using sand, earth, or other appropriate barriers.

---

**SECTION 7) HANDLING AND STORAGE**

**General:**
For industrial and institutional use only.
For use by trained personnel only.
Keep away from children.
Wash hands after use.
Do not get in eyes, on skin or on clothing.
Do not breathe vapors or mists.
Use good personal hygiene practices.
Eating, drinking and smoking in work areas is prohibited.
Remove contaminated clothing and protective equipment before entering eating areas.
Eyewash stations and showers should be available in areas where this material is used and stored.

**Ventilation Requirements:**
Use only with adequate ventilation to control air contaminants to their exposure limits. The use of local ventilation is recommended to control emissions near the source.

**Storage Room Requirements:**
Keep container(s) tightly closed and properly labeled. Store in cool, dry, well-ventilated areas away from heat, direct sunlight and incompatibilities. Store in approved containers and protect against physical damage. Keep containers securely sealed when not in use. Indoor storage should meet OSHA standards and appropriate fire codes. Containers that have been opened must be carefully resealed to prevent leakage. Empty container retain residue and may be dangerous.
Do not cut, drill, grind, weld, or perform similar operations on or near containers. Do not pressurize containers to empty them. Ground all structures, transfer containers and equipment to conform to the national electrical code. Use procedures that prevent static electrical sparks. Static electricity may accumulate and create a fire hazard.
Store at temperatures below 120°F.

---

**SECTION 8) EXPOSURE CONTROLS, PERSONAL PROTECTION**

**Eye Protection:**
Chemical goggles, safety glasses with side shields or vented/splash proof goggles. Contact lenses may absorb irritants. Particles may adhere to lenses and cause corneal damage.
**Skin Protection:**

Wear gloves, long sleeved shirt, long pants and other protective clothing as required to minimize skin contact.

Use of gloves approved to relevant standards made from the following materials may provide suitable chemical protection: PVC, neoprene or nitrile rubber gloves. Suitability and durability of a glove is dependent on usage, e.g. frequency and duration of contact, chemical resistance of glove material, glove thickness, dexterity. Always seek advice from glove suppliers. Contaminated gloves should be replaced. Chemical-resistant clothing is recommended to avoid prolonged contact. Avoid unnecessary skin contact.

**Respiratory Protection:**

If engineering controls do not maintain airborne concentrations to a level which is adequate to protect worker, a respiratory protection program that meets or is equivalent to OSHA 29 CFR 1910.134 and ANSI Z88.2 should be followed. Check with respiratory protective equipment suppliers. Where air-filtering respirators are suitable, select an appropriate combination of mask and filter. Select a filter suitable for combined particulate/organic gases and vapors.

When spraying more than one half can continuously or more than one can consecutively, use NIOSH approved respirator.

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>OSHA TWA (ppm)</th>
<th>OSHA TWA (mg/m³)</th>
<th>OSHA STEL (ppm)</th>
<th>OSHA STEL (mg/m³)</th>
<th>OSHA Carcinogen</th>
<th>OSHA Skin designation</th>
<th>NIOSH TWA (ppm)</th>
<th>NIOSH TWA (mg/m³)</th>
<th>NIOSH STEL (ppm)</th>
<th>NIOSH STEL (mg/m³)</th>
<th>NIOSH Carcinogen</th>
</tr>
</thead>
<tbody>
<tr>
<td>BUTANE</td>
<td>800</td>
<td>1900</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ISOBUTANE</td>
<td>800</td>
<td>1900</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PROPANE</td>
<td>1000</td>
<td>1800</td>
<td>1</td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Chemical Name</th>
<th>ACGIH TWA (ppm)</th>
<th>ACGIH TWA (mg/m³)</th>
<th>ACGIH STEL (ppm)</th>
<th>ACGIH STEL (mg/m³)</th>
</tr>
</thead>
<tbody>
<tr>
<td>BUTANE</td>
<td>1000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>ISOBUTANE</td>
<td>1000</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>PROPANE</td>
<td>See Appendix F: Minimal Oxygen Content</td>
<td></td>
<td></td>
<td></td>
</tr>
</tbody>
</table>

**SECTION 9) PHYSICAL AND CHEMICAL PROPERTIES**

**Physical and Chemical Properties**

<table>
<thead>
<tr>
<th>Property</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Density</td>
<td>7.56391 lb/gal</td>
</tr>
<tr>
<td>Density VOC</td>
<td>2.57551 lb/gal</td>
</tr>
<tr>
<td>% VOC</td>
<td>34.05000%</td>
</tr>
<tr>
<td>VOC Actual</td>
<td>2.57551 lb/gal</td>
</tr>
<tr>
<td>VOC Actual Regulatory</td>
<td>308.62336 g/l</td>
</tr>
<tr>
<td>VOC Regulatory</td>
<td>2.57551 lb/gal</td>
</tr>
<tr>
<td>VOC Regulatory Regulatory</td>
<td>308.62336 g/l</td>
</tr>
<tr>
<td>Appearance</td>
<td>Foam</td>
</tr>
<tr>
<td>Odor Threshold</td>
<td>N.A.</td>
</tr>
<tr>
<td>Odor Description</td>
<td>N.A.</td>
</tr>
<tr>
<td>pH</td>
<td>10.11</td>
</tr>
<tr>
<td>Water Solubility</td>
<td>Soluble</td>
</tr>
<tr>
<td>Flammability</td>
<td>N/A</td>
</tr>
<tr>
<td>Flash Point Symbol</td>
<td>N.A.</td>
</tr>
<tr>
<td>Flash Point</td>
<td>N.A.</td>
</tr>
<tr>
<td>Viscosity</td>
<td>N.A.</td>
</tr>
<tr>
<td>Lower Explosion Level</td>
<td>N.A.</td>
</tr>
<tr>
<td>Upper Explosion Level</td>
<td>N.A.</td>
</tr>
<tr>
<td>Melting Point</td>
<td>N.A.</td>
</tr>
</tbody>
</table>
**Vapor Density**: Slower than ether  
**Freezing Point**: N.A.  
**Low Boiling Point**: N.A.  
**High Boiling Point**: N.A.  
**Decomposition Pt**: N.A.  
**Auto Ignition Temp**: N.A.  
**Evaporation Rate**: Slower than ether

### SECTION 10) STABILITY AND REACTIVITY

**Stability:**  
Stable.  

**Conditions to Avoid:**  
High temperatures.  

**Incompatible Materials:**  
None known.  

**Hazardous Reactions/Polymerization:**  
Will not occur.  

**Hazardous Decomposition Products:**  
In fire, will decompose to carbon dioxide, carbon monoxide.

### SECTION 11) TOXICOLOGICAL INFORMATION

**Skin Corrosion/Irritation:**  
Overexposure will cause defatting of skin.  
Causes mild skin irritation  

**Serious Eye Damage/Irritation:**  
Overexposure will cause redness and burning sensation.  
Causes eye irritation  

**Carcinogenicity:**  
No data available  

**Germ Cell Mutagenicity:**  
No data available  

**Reproductive Toxicity:**  
No data available  

**Respiratory/Skin Sensitization:**  
No data available  

**Specific Target Organ Toxicity - Single Exposure:**  
No data available  

**Specific Target Organ Toxicity - Repeated Exposure:**  
No data available  

**Aspiration Hazard:**  
No data available  

**Acute Toxicity:**  
Inhalation: effect of overexposure include irritation of respiratory tract, headache, dizziness, nausea, and loss of coordination. Extreme overexposure may result in unconsciousness and possibly death.

0000075-28-5  
ISOBUTANE  
LC50 (mouse, inhalation): 520,000 ppm (52%); 2-hour exposure.
SECTION 12) ECOLOGICAL INFORMATION

Toxicity:
No data available.

Persistence and Degradability:
No data available.

Bio-Accumulative Potential:
No data available.

Mobility in Soil:
No data available.

Other Adverse Effects:
No data available.

SECTION 13) DISPOSAL CONSIDERATIONS

Water Disposal:
Under RCRA, it is the responsibility of the user of the product, to determine a the time of disposal whether the product meets RCRA criteria for hazardous waste. Waste management should be in full compliance with federal, state, and local laws.
Empty containers retain product residue which may exhibit hazards of material, therefore do not pressurize, cut, glaze, weld or use for any other purposes. Return drums to reclamation centers for proper cleaning and reuse.

SECTION 14) TRANSPORT INFORMATION

U.S. DOT Information:
Consumer Commodity, ORM-D

IMDG Information:
Consumer Commodity, ORM-D

IATA Information:
Consumer Commodity, ORM-D

SECTION 15) REGULATORY INFORMATION

<table>
<thead>
<tr>
<th>CAS</th>
<th>Chemical Name</th>
<th>% By Weight</th>
<th>Regulation List</th>
</tr>
</thead>
<tbody>
<tr>
<td>0000074-98-6</td>
<td>PROPANE</td>
<td>0.1% - 2.3%</td>
<td>SARA312,VOC,TSCA,ACGIH,OSHA</td>
</tr>
<tr>
<td>0000075-28-5</td>
<td>ISOButane</td>
<td>0.1% - 2.2%</td>
<td>SARA312,VOC,TSCA,ACGIH</td>
</tr>
<tr>
<td>0000106-97-8</td>
<td>BUTANE</td>
<td>1% - 3%</td>
<td>SARA312,VOC,TSCA,ACGIH</td>
</tr>
<tr>
<td>0000111-90-0</td>
<td>DIETHYLENE GLYCOL MONOETHYL ETHER</td>
<td>3% - 6%</td>
<td>CERCLA,HAPS,SARA312,SARA313,VOC,TSCA</td>
</tr>
<tr>
<td>0094266-47-4</td>
<td>Technical grade d-Limonene</td>
<td>19% - 33%</td>
<td>SARA312,VOC</td>
</tr>
</tbody>
</table>

SECTION 16) OTHER INFORMATION

Glossary:
* There are points of differences between OSHA GHS and UN GHS. In 90% of the categories, they can be used interchangeably, but for the Skin Corrosion/Irritant Category and the Specific Target Organ Toxicity (Single and Repeated Exposure) Categories. In these cases, our system will say UN GHS.
DISCLAIMER

To the best of our knowledge, the information contained herein is accurate. However, neither the above named supplier nor any of its subsidiaries assumes any liability whatsoever for the accuracy or completeness of the information contained herein. Final determination of suitability of any material is the sole responsibility of the user. All materials may present unknown hazards and should be used with caution. Although certain hazards are described herein, we cannot guarantee that these are the only hazards that exist. The above information pertains to this product as currently formulated, and is based on the information available at this time. Addition of reducers or other additives to this product may substantially alter the composition and hazards of the product. Since conditions of use are outside our control, we make no warranties, express or implied, and assume no liability in connection with any use of this information.