Product: SMART CUT™ KOOL  
Generic/Chemical Name: Optic Processing Fluid

CAS registry Number: Not applicable for mixtures  
Synonyms:

Item Number: UKAMSMARTK  
Product Type: Water Soluble Grinding Fluid

Preparation/Revision Date: 08/26/98, 02/13/01

### SECTION 2  
COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>INGREDIENTS</th>
<th>CAS #</th>
<th>%</th>
<th>ACGIH TWA</th>
<th>OSHA PEL</th>
<th>OSHA STEL</th>
<th>SKIN</th>
</tr>
</thead>
<tbody>
<tr>
<td>2-Aminoisobutanol</td>
<td>124-68-5</td>
<td>5 - 30</td>
<td>no</td>
<td>no</td>
<td>no</td>
<td>No</td>
</tr>
<tr>
<td>Proprietary Lubricity Agents</td>
<td>Mixture</td>
<td></td>
<td>no</td>
<td>established</td>
<td>none</td>
<td>No</td>
</tr>
<tr>
<td>Proprietary Non-phenoxylic Biocide</td>
<td>Mixture</td>
<td>&lt;0.5</td>
<td>no</td>
<td>established</td>
<td>none</td>
<td>No</td>
</tr>
</tbody>
</table>

### SECTION 3  
HAZARDS IDENTIFICATION

**WARNING:**

**Eye Contact:**  
None required

**Skin Contact:**  
This product is not expected to cause skin irritation. Prolonged or repeated exposure may lead to skin sensitization in some individuals and produce an allergic reaction.

**Inhalation:**

This product is not expected to present an inhalation hazard unless mists are generated. Inhalation of product mist may be irritating to the respiratory tract. Caution should be taken to prevent forming aerosol or misting of this product without proper respiratory protection.

**Ingestion:**

This product would be regarded as practically non-toxic if swallowed.

### SECTION 4  
FIRST AID MEASURES

**Eye Contact:**

Not expected to require first aid measures.

**Skin Contact:**

In case of contact, wash skin with soap and plenty of water. Remove contaminated clothing. If redness and irritation symptoms occur, seek medical aid. Wash contaminated clothing before reuse.

**Inhalation:**

If inhaled and irritation or difficulty in breathing occurs, remove to fresh air. Seek medical attention if irritation or discomfort persists.

**Oral Contact:**

Not an expected route of exposure.

### SECTION 5  
FIRE FIGHTING MEASURES

**Flash Point:**

None

**Upper Flammable Limit:**

Not applicable.

**Lower Flammable Limit:**

Not applicable.

**Extinguishing Media:**

Use dry chemical, foam, water fog or carbon dioxide if appropriate for the surrounding fire.
Unusual Fire & Explosion Hazards:
Byproducts of Combustion:
Autoignition Temperature:
Explosion Data:

contained breathing apparatus and protective clothing are essential.

No unusual hazards.
Thermal decomposition or combustion may produce carbon
dioxide, carbon monoxide, ammonia, and/or nitrogen oxides.
Not determined.
Not determined. Care should always be taken in mist areas.

SECTION 6
ACCIDENTAL RELEASE MEASURES

Spill Control Procedures (Land): Wearing appropriate personal protective equipment, contain spill,
collect onto inert absorbent and place into suitable containers.

Spill Control Procedures (Water): Water-soluble. Not expected to create an environmental hazard.

Waste Disposal Method: All disposals must comply with federal, state, and local regulations.
The material, if spilled or discarded may be a regulated waste. Refer
to state and local regulations.

SECTION 7
HANDLING AND STORAGE

Handling Procedures: Avoid prolonged or repeated contact with skin and clothing. Avoid breathing mist. Use with adequate ventilation. Wash thoroughly after handling. Keep container closed when not in use.

Storage Procedures: No specific requirements.

Additional Information: No additional information.

SECTION 8
EXPOSURE CONTROLS / PERSONAL PROTECTION

Personal Protection: Applicable mainly to persons in repeated contact situations such as packaging of product, service/maintenance, and cleanup/spill control personnel.

Respiratory Protection: When misting may occur in the work area, use a NIOSH approved respirator in accordance with respiratory requirements of OSHA 29 CFR 1910.134.

Eye and Face Protection: Eye protection is always recommended. Use splash goggles or face shield.

Hand Protection: Chemical resistant gloves to avoid skin sensitization and absorption.

Other Protection: Use of an apron or other protective clothing is recommended to avoid skin sensitization. Launder soiled clothes.

Local Control Measures: Use adequate ventilation when working with material in an enclosed area. Use exhaust ventilation where mist or spray may be generated. Eyewash stations and showers should be available where this material is used and stored.

Other: Good practice dictates that consumption of food and drink should be avoided in work areas where product is present. Always wash hands and face with soap and water before eating, drinking, or smoking.

SECTION 9
PHYSICAL AND CHEMICAL PROPERTIES

Vapor Pressure: Negligible at STP (Standard Temperature and Pressure, 25°C at 1 ATM).
API Gravity: 5.9° at 15.6°C (60°F) by ASTM D 1298
Density: 8.58 lb./gal at 15.6°C (60°F) by ASTM D 1298
Specific Gravity: 1.03 at 15.6°C (60°F) by ASTM D 1298
Solubility: Completely soluble in water, not soluble in hydrocarbon solvents.
Percent Volatile: Negligible at STP.
Vapor Density, Air = 1: >1 at STP
Evaporation Rate, n-Butyl Acetate = 1: Negligible at STP.
Odor: Mild odor.
Appearance: Dark Blue Liquid

25345 Avenue Stanford, Unit 21, Valencia, CA 91355
Tel: (661) 257-2288 Fax: (661) 257-3833
SECTION 10
STABILITY AND REACTIVITY

Stability: Material is stable at room temperature and pressure.
Conditions To Avoid: No specific information.
Incompatibility With Other Materials: Avoid contact with acids and oxidizing materials.
Hazardous Decomposition Products: Thermal decomposition or combustion may produce carbon dioxide, carbon monoxide, ammonia, and/or nitrogen oxides.
Hazardous Polymerization: Will not occur.

SECTION 11
TOXICOLOGICAL INFORMATION

Oral Toxicity: Product oral LD50 (rat) > 5 g/kg.
Dermal Toxicity: Repeated or prolonged contact may cause skin irritation or sensitization.
Inhalation Toxicity: On rare occasions, prolonged and repeated exposure to oil mist poses a risk of pulmonary disease such as chronic lung inflammation. This condition is usually asymptotic as a result of repeated small aspirations. Shortness of breath and cough are the most common symptoms. Based on data from similar materials.
Dermal Sensitization: Prolonged or repeated contact may make skin more sensitive to other skin sensitizers. Based on data from similar materials.
Chronic Toxicity: No ingredients considered chronic toxins.
Carcinogenicity: No ingredients listed by IARC, NTP or OSHA.
Mutagenicity: Not determined.
Reproductive Toxicity: Not determined.
Teratogenicity: Not determined.
Other: Not determined.

SECTION 12
ECOLOGICAL INFORMATION

Environmental Toxicity: No information available on formulated product or ingredients.
Environmental Fate: No data available.

SECTION 13
DISPOSAL CONSIDERATIONS

Waste Disposal: Discarded product as sold would not be considered a RCRA hazardous waste. Waste management should be in full compliance with federal, state, and local laws.
Disposal Considerations: Place used, contaminated, or excess material into disposable containers. Used or spent product is not considered to be a hazardous waste. Spent fluid should be filtered, centrifuged or allowed to settle to remove solids. Solid waste from normal machining operations should be non-hazardous and suitable for landfill or recycling. The supernatant or filtered product, after solids removal, can be discharged according to potable water (POTW) permits to commercial water treatment plants. Always dispose of in a manner consistent with local and state regulations.

SECTION 14
TRANSPORT INFORMATION

U.S. DOT Bulk Shipping Description: Does not apply to bulk shipping.
U.S. DOT Non-Bulk Shipping Description: Does not apply to non-bulk shipping.
U.S. DOT Identification Number: Not applicable.
packaging. For more information concerning spills during transport, consult latest DOT Emergency Response Guidebook for Hazardous Materials Incidents, DOT P 9800.3.

SECTION 15 REGULATORY INFORMATION

| Clean Water Act/Oil Pollution Act: | Not applicable. |
| OSHA Hazard Communication Status: | Hazardous |
| TSCA: | All components of this material are listed in the U.S. TSCA Inventory. |
| Other TSCA: | Not applicable. |
| SARA Title III: | Section 302/304 Extremely Hazardous Substances: None. |
| | Section 311, 312 Hazard Categorization: |
| | Acute (immediate health effects): No |
| | Chronic (delayed health effects): No |
| | Fire (hazard): No |
| | Reactivity (hazard): No |
| | Pressure (sudden release hazard): No |
| CERCLA: | Not determined. |
| | For stationary sources - reportable quantity: Not applicable. |
| | Due to: Not applicable. |
| | For moving sources - reportable quantity: Not determined. |
| | Due to: Not applicable. |
| California Prop. 65: | Not applicable. |

SECTION 16 OTHER INFORMATION

<table>
<thead>
<tr>
<th>HEALTH:</th>
<th>NFPA 704</th>
<th>NPRA-HMIS</th>
<th>KEY</th>
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</thead>
<tbody>
<tr>
<td></td>
<td>2</td>
<td>2</td>
<td>0 = Minimal</td>
</tr>
<tr>
<td>FIRE:</td>
<td>0</td>
<td>0</td>
<td>1 = Slight</td>
</tr>
<tr>
<td>REACTIVITY:</td>
<td>0</td>
<td>0</td>
<td>2 = Moderate</td>
</tr>
<tr>
<td>SPECIFIC HAZARD:</td>
<td>NONE</td>
<td>N/A</td>
<td>3 = Serious</td>
</tr>
<tr>
<td>PROTECTION INDEX:</td>
<td>N/A</td>
<td>B</td>
<td>4 = Severe</td>
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