Safety Data Sheet

1. PRODUCT AND COMPANY IDENTIFICATION

Dyna-Plex 21C HD 1320
Heavy duty cutting oil
Product Code: 14782

Miller Industrial Fluids, A PetroChoice Company
1751 W. Raymond Street
Indianapolis, Indiana 46221
Website: www.petrochoice.com

1-317-634-7300  Telephone
1-800-424-9300  US, Canada, Puerto Rico, Virgin Island - Emergency telephone (CHEMTREC)
+1-703-527-3887 International / Maritime Emergency telephone (CHEMTREC)

2. HAZARDS IDENTIFICATION

OSHA/HCS Status:
This material is not considered hazardous by the OSHA Hazard Communication Standard (29 CFR 1910.1200).

Physical Hazards:  Not classified
Health Hazards:    Not classified
Environmental Hazards:  Not classified
Signal Word:       No signal word
Hazard Statement:  No known significant effects or critical hazards.
GHS Symbol:        No symbol
Precautionary Statements
Prevention: Not applicable
Response: Not applicable
Storage: None
Disposal: Dispose of contents and container in accordance with all local, regional, national and international regulations.
Other Hazards: None known

3. COMPOSITION/INFORMATION ON INGREDIENTS

Chemical Name: None
Formula: Mixture
Other means of identification: None
CAS Number/other identifiers: None

<table>
<thead>
<tr>
<th>Component</th>
<th>CAS Number</th>
<th>Concentration %</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alkanes, C21-C28, chloro</td>
<td>63449-39-8</td>
<td>5-10</td>
</tr>
</tbody>
</table>

4. FIRST AID MEASURES

Eye Contact
Rinse immediately with water. Remove contact lenses, if safe and possible to do. Continue rinsing with water for at least 15 minutes. Keep impacted eye(s) wide open while rinsing. If eye irritation persists, consult a specialist.

Inhalation
Move person to an area with fresh air if breathing is difficult. Keep person at rest in a position comfortable for breathing. If symptoms persist, call a physician.

Skin Contact
Take off contaminated clothing and shoes immediately. Wash off affected area with plenty of soap and water. If symptoms persist, call a physician.

Ingestion
Rinse mouth with plenty of water and drink plenty of water afterwards. Never give anything by mouth to an unconscious person. If symptoms persist, call a physician.

Most Important Symptoms/Effects, Acute and Delayed:
Skin irritation, eye redness and tear formation.

Indication of any immediate medical attention and special treatment needed:
If necessary, treat symptomatically
5. FIREFIGHTING MEASURES

**Suitable extinguishing media**
Use dry chemical, foam, carbon dioxide (CO$_2$) or water spray or water fog.

**Unsuitable extinguishing media**
Do not use a solid water stream as it may scatter and spread fire.

**Specific hazards from combustion**
Hazardous combustion products may include oxides of carbon and sulfur. May produce irritating fumes and smoke.

**Special protective equipment for fire-fighters**
Wear full protective clothing, including helmet, self-contained positive pressure or pressure demand breathing apparatus, protective clothing and face mask.

6. ACCIDENTAL RELEASE MEASURES

**Personal precautions, protective equipment, emergency procedures**
Wear appropriate protective equipment and clothing during clean-up. Do not touch damaged containers or spilled material unless wearing appropriate protective clothing. Ensure adequate ventilation. If significant spillages cannot be contained, local authorities should be advised.

**Environmental precautions**
Prevent entry into waterways, sewer, basements or confined areas. Avoid discharge to the aquatic environment. Avoid discharge into drains, watercourses or onto the ground. If the product contaminates rivers and lakes or drains, then inform the respective authorities.

**Methods and materials for containment and cleaning up**
Eliminate all ignition sources (no smoking, flares, sparks or flames in immediate area). Stop the flow of material, if this is without risk. Dike the spilled material, where possible. Absorb in vermiculite, dry sand or other non-combustible absorbent material then place into containers. In the event of a spill or accidental release, notify relevant authorities in accordance with all applicable regulations.
7. HANDLING AND STORAGE

Precautions for safe handling

Do not breathe dust, fume, gas, mist, vapors or spray. Wash hands after handling and before eating. Do not get this material in contact with eyes. Avoid contact with skin. Avoid prolonged exposure. All handling should take place in well-ventilated area. Shower after work. Remove and wash contaminated clothing promptly.

Conditions for safe storage

Keep away from heat, sparks and open flame. Store in a well-ventilated place.

8. EXPOSURE CONTROLS/PERSONAL PROTECTION

Occupational Exposure Limits:

OSHA

<table>
<thead>
<tr>
<th>Component</th>
<th>Type</th>
<th>Value</th>
</tr>
</thead>
<tbody>
<tr>
<td>Oil mist</td>
<td>PEL</td>
<td>5 mg/m³</td>
</tr>
</tbody>
</table>

ACGIH

<table>
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<tr>
<th>Component</th>
<th>Type</th>
<th>Value</th>
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</thead>
<tbody>
<tr>
<td>Oil mist</td>
<td>PEL</td>
<td>5 mg/m³</td>
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NIOSH

<table>
<thead>
<tr>
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<th>Type</th>
<th>Value</th>
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</thead>
<tbody>
<tr>
<td>Oil mist</td>
<td>TWA</td>
<td>5 mg/m³</td>
</tr>
<tr>
<td></td>
<td>STEL</td>
<td>10 mg/m³</td>
</tr>
</tbody>
</table>

Appropriate Engineering Controls:

Adequate ventilation should be provided whenever the material is heated or mists are generated. Provide adequate ventilation, including appropriate local extraction, to ensure that the defined occupational exposure limit is not exceeded.

Individual Protection Measures, such as Personal Protective Equipment:

**Eye/Face protection**

Goggles/face shield are recommended.

**Hand protection**

Polyvinyl alcohol or nitrile rubber gloves are recommended.

**Skin and body protection**

Chemical/oil resistant long-sleeve clothing is recommended. Launder contaminated clothing before reuse.

**Respiratory protection**

If vapors/mist concentration exceed the exposure limit(s), and appropriate certified respirator must be used.
General Hygiene Considerations
Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing to remove contaminants. Discard contaminated footwear that cannot be cleaned.

9. PHYSICAL AND CHEMICAL PROPERTIES

Appearance: Dark Amber
Physical state: Liquid
Odor: Mild
Odor Threshold: Not available
pH: Not applicable
Melting point/freezing point: Not available
Initial boiling point and boiling range: >600°F (>315.6°C)
Flash point (Cleveland Open Cup): >395°F (>201.7°C) COC, ASTM D92
Evaporation rate: Not available
Flammability (solid, gas): Not available
Upper/lower flammability or explosive limits:
   Flammability limit
      Lower %: Not available
      Upper %: Not available
   Explosive Limit
      Lower %: Not available
      Upper %: Not available
Vapor pressure: Not available
Vapor density: Not available
Relative density: 0.91 @ 60°F (15.56°C)
Solubility (water): Insoluble
Partition Coefficient (n-octanol/water): Not established
Auto-ignition Temperature: >600 (315.6°C) ASTM E659
Decomposition Temperature: Not available
Viscosity: 40 cSt @ 104°F (40°C) ASTM D445
10. STABILITY AND REACTIVITY

Reactivity: The product is stable and non-reactive under normal conditions of use, storage and transport.

Chemical stability: Stable

Possibility of hazardous reactions: Product will not undergo hazardous polymerization

Conditions to avoid: Heat, flames and sparks. Avoid elevated temperatures and excessive heat.

Incompatible materials: Strong oxidizing agents

Hazardous decomposition products: Decomposition products include carbon monoxide, carbon dioxide and/or low molecular weight hydrocarbons. Combustion gases may contain oxides of carbon and sulfur.

11. TOXICOLOGICAL INFORMATION

Information on Likely Routes of Exposure

Ingestion: May cause gastrointestinal irritation and discomfort if swallowed. Do not induce vomiting. Vomiting may increase risk of product aspiration.

Inhalation: May be harmful if inhaled. However, this product does not meet the criteria for classification.

Skin Contact: Frequent or prolonged contact may defat and dry the skin, leading to discomfort and dermatitis.

Eye Contact: May be irritating to eyes.

Symptoms Related to the Physical, Chemical and Toxicological Characteristics: Not available

Information on Toxicological Effects

Acute Toxicity: Not classified

Skin Corrosion/Irritation: May be irritating to skin.

Serious Eye Damage/Eye Irritation: May be irritating to eyes.

Respiratory or Skin Sensitization

Respiratory Sensitization: Not a respiratory sensitizer.

Skin Sensitization: Not a skin sensitizer.

Mutagenicity: Non-mutagenic

Carcinogenicity: This product contains a very long chain chlorinated paraffin. Based upon data from short chain chlorinated paraffins, the risk of cancer cannot be excluded with prolonged exposure.

Reproductive Toxicity: Contains no ingredient listed as toxic to reproduction.

Specific Target Organ Toxicity:

Single Exposure: Not classified

Repeated Exposure: Not classified
Aspiration Hazard: Not classified

Potential Chronic Health Effects: May be irritating to skin. Prolonged or repeated contact may cause drying and cracking of the skin.

### 12. ECOLOGICAL INFORMATION

**Ecotoxicity:**

<table>
<thead>
<tr>
<th>Component</th>
<th>Test</th>
<th>Species</th>
<th>Dose</th>
</tr>
</thead>
<tbody>
<tr>
<td>Alkanes, C21-28, chloro</td>
<td>LC50, 96 hours</td>
<td>Pimephales promelas</td>
<td>&gt;100 mg/L</td>
</tr>
<tr>
<td></td>
<td>LC50, 96 hours</td>
<td>Oncorhynchus mykiss</td>
<td>&gt;300 mg/L</td>
</tr>
</tbody>
</table>

Persistence and Degradability: No data available

Bioaccumulative Potential: No data available

Mobility in Soil: No data available

Other Adverse Effects: No other adverse environmental effects (e.g. ozone depletion, photochemical ozone creation potential, endocrine disruption, global warming potential) are expected from this product.

### 13. DISPOSAL CONSIDERATIONS

**Waste Disposal methods**

Disposal of waste material should comply with all local, state, federal and provincial environmental regulations. See Section 7 for safe handling procedures and section 8 for personal protective equipment recommendations. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Empty containers or liners may retain some product residues. Follow label warnings even after container is emptied. Avoid contact of any spilled material or runoff with soil, waterways, drains and sewers.

### 14. TRANSPORT INFORMATION

**DOT:** Not dangerous/hazardous goods

**IMDG:** Not dangerous/hazardous goods

### 15. REGULATORY INFORMATION

**U.S. Federal Regulations**

This product is not known to be a “Hazardous Chemical” as defined by the OSHA Hazard Communication Standard, 29 CFR 1910.1200.

**United States Inventory (TSCA 8b)**

All components are listed or exempted.

**SARA 302/304:**

Composition/Information on Ingredients

No products were found
SARA Hazard Categories (311/312)

- **Acute Health Hazard:** No
- **Chronic Health Hazard:** No
- **Fire Hazard:** No
- **Sudden Release of Pressure Hazard:** No
- **Reactive Hazard:** No

SARA 313

No products were found

State Regulatory Status

California Safe Drinking Water and Toxic Enforcement Act (Proposition 65)

No products were found

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### 16. OTHER INFORMATION

The information and recommendations contained within this document are believed by PetroChoice to be accurate and reliable as of the date prepared. The information and recommendations are offered for the user's consideration and analysis and in no way guarantee the chemical specifications for the specified product. It is solely the responsibility of the user to determine safe conditions for use of this product and to assume liability for any loss, damage or expense arising out of the product's improper use. The user should consider the information in this document in the context of how the selected product will be handled and used in conjunction with other products. It is the user's responsibility to determine that the product is suitable for the intended use.

Appropriate warnings and safe-handling procedures should be provided to all handlers and users. PetroChoice assumes no responsibility for any damage or injury resulting from abnormal use or from any failure to adhere to recommended practices within this document.

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