SAFETY DATA SHEET
EMERGENCY CALL: 1-800-424-9300 (CHEMTREC)

1. IDENTIFICATION

PRODUCT NAME: Arrest Max
DESCRIPTION: A liquid herbicide.
EPA Reg. No.: 228-729-81883

COMPANY IDENTIFICATION:
Whitetail Institute of North America
239 Whitetail Trail
Hope Hull, AL 36043

2. HAZARD IDENTIFICATION

WARNING
Harmful if inhaled
Causes mild skin irritation
Causes eye irritation
May cause an allergic skin reaction

3. COMPOSITION / INFORMATION ON INGREDIENTS

<table>
<thead>
<tr>
<th>Common Name</th>
<th>Chemical Name</th>
<th>CAS #</th>
<th>Composition</th>
</tr>
</thead>
<tbody>
<tr>
<td>Clethodim</td>
<td>((E)-2-[1-[[3-chloro-2-propenyl]oxy]iminopropyl]-5-[2-(ethylthio)propyl]-3-hydroxy-2-cyclohexen-1-one)</td>
<td>99129-21-2</td>
<td>12.6%</td>
</tr>
<tr>
<td>Naphthalene</td>
<td></td>
<td>91-20-3</td>
<td>&lt;5%</td>
</tr>
<tr>
<td>Total hydrocarbons</td>
<td></td>
<td>64742-94-5</td>
<td>45-48%</td>
</tr>
</tbody>
</table>

4. FIRST AID MEASURES

Have the product container or label with you when calling a poison control center or doctor or going for treatment. You may also call (877) 325-1840 for emergency medical treatment information.

IF IN EYES: Hold eye open and rinse slowly and gently with water for 15-20 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. If eye irritation persists: Get medical advice/attention.

IF ON SKIN OR CLOTHING: Take off contaminated clothing. Rinse skin immediately with plenty of water for 15-20 minutes. If skin irritation or rash occurs call a doctor or poison control center.

IF INHALED: Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably by mouth-to-mouth, if possible. Call a doctor or poison control center if you feel unwell.

NOTE TO PHYSICIAN: Contains petroleum distillates - vomiting may cause aspiration pneumonia. Ingestion of this product or subsequent vomiting can result in aspiration of light hydrocarbon liquid, which can cause pneumonitis. If ingested, probable mucosal damage may contraindicate the use of gastric lavage.

5. FIREFIGHTING MEASURES

Flash Point (closed cup): 162°F (72°C)

Fire and Explosion Hazards: Liquid evaporates and forms vapor (fumes) which can catch fire and burn with explosive violence. Invisible vapor spreads easily and can be set on fire by many sources such as pilot lights, welding equipment, and electrical motors and switches. Fire hazard is greater as liquid temperature rises above 85°F. See Section 10 for hazardous decomposition products.

Extinguishing Medium: Foam, dry chemical, CO₂ or water spray (water stream may spread flames).

Fire Fighting Equipment: Firefighters should be equipped with self-contained positive pressure breathing apparatus and full bunker gear. Decontaminate personal protective equipment and firefighting equipment before reuse.
5. FIREFIGHTING MEASURES (con’t)

Fire Fighting Instructions: Evacuate area of all unnecessary personnel and fight fire from a safe distance upwind. Contain contaminated water / firefighting water; do not allow to enter drains or waterways. Foam or dry chemical fire extinguishing systems are preferred to prevent environmental damage from excessive water runoff.

NFPA Ratings: Health – 1 / Flammability – 2 / Reactivity - 0

6. ACCIDENTAL RELEASE MEASURES

Clean up spills immediately observing the precautions in Section 8 of this SDS. Isolate the hazard area and keep unnecessary and unprotected personnel from entering. Absorb spill with inert material (such as dry sand or earth), then place in a chemical waste container. Wash area with soap and water. Pick up wash liquid with additional absorbent and place in a chemical waste container. Prevent material from contaminating soil or from entering sewage and drainage systems and bodies of water.

Large spills may be reportable to the National Response Center (800-424-8802) and to state and/or local agencies.

7. HANDLING AND STORAGE

Avoid contact with eyes, skin or clothing. Wash hands before eating, drinking, chewing gum, using tobacco, or using the toilet.

Do not contaminate water, food or feed by storage. Store product in original container only, in a cool dry place, out of reach of children, preferably in a locked storage cabinet.

8. EXPOSURE CONTROLS / PERSONAL PROTECTION

Engineering Controls: Facilities storing or utilizing this material should be equipped with an eyewash station and a safety shower.

Protective Clothing: Handlers should wear coveralls worn over short-sleeved shirt and short pants, socks, chemical-resistant footwear and chemical-resistant gloves and protective eyewear.

General: Remove clothing / PPE immediately, if pesticide gets inside. Then wash thoroughly and put on clean clothing. Remove PPE immediately after handling this product. Wash the outside of gloves before removing. If no such instructions for washables, use detergent and hot water. Keep and wash PPE separately from other laundry.

9. PHYSICAL AND CHEMICAL PROPERTIES

Physical State: clear amber liquid
Odor: mild aromatic
pH: 4-5
Density: 0.921 g/mL (7.69 lbs/gal)
Viscosity: 4.76 cP @ 20°C; 3.15 cP @ 40°C
Solubility: emulsifiable

10. STABILITY AND REACTIVITY

CONDITIONS TO AVOID: Excessive heat.
CHEMICAL STABILITY: Unstable at extreme pH’s, temperature and upon exposure to UV light.
HAZARDOUS DECOMPOSITION PRODUCTS: None when stored and handled as prescribed. Thermal decomposition may release toxic and irritating fumes including oxides of nitrogen and sulfur and chlorine compounds.
INCOMPATIBILITY WITH OTHER MATERIALS: May react with strong oxidizing agents.
POLYMERIZATION: Will not occur.
11. TOXICOLOGICAL INFORMATION

ORAL TOXICITY (rat LD₅₀): > 5,000 mg/L
DERMAL TOXICITY (rabbit LD₅₀): > 5,000 mg/L
INHALATION TOXICITY (LC₅₀): > 2.11 mg/L (4-hour)
EYE IRRITATION: Moderately irritating
SKIN IRRITATION: Moderately irritating
SKIN SENSITIZATION: Sensitizer
CARCINOGENICITY:
EPA: Not listed.
ACGIH: Not Listed
NTP: Suspect carcinogen
IARC: Listed
OSHA: Not Listed
MUTAGENIC TOXICITY: No evidence of mutagenic effects during \textit{in vivo} and \textit{in vitro} assays.
REPRODUCTIVE TOXICITY: No evidence in animal studies.

12. ECOLOGICAL INFORMATION

The use of this product may pose a hazard to the federally designated endangered species of Solano Grass and Wild Rice. Do not apply directly to water, or to areas where surface water is present, or to intertidal areas below the mean high water mark. Do not contaminate water when disposing of equipment wash waters or rinsate. Apply this product only as specified on this label.

AQUATIC TOXICITY
Bluegill (96-hour LC₅₀): 120 mg/L
Rainbow Trout (96-hour LC₅₀): 67 mg/L
Daphnia (48-hour EC₅₀): > 120 mg/L

AVIAN TOXICITY
Bobwhite Quail (LD₅₀): > 2,000 mg/kg
Bobwhite Quail (LC₅₀): > 6,000 ppm
Mallard Duck (LC₅₀): > 6,000 ppm

OTHER TOXICITY
Honey Bee (LD₅₀): > 100 µg/bee

13. DISPOSAL CONSIDERATIONS

PESTICIDE DISPOSAL: Do not contaminate water, food or feed by disposal. Call your local solid waste agency for disposal instructions. Never place unused product down any indoor or outdoor drain.

CONTAINER DISPOSAL: Nonrefillable container. Do not reuse or refill this container. Refer to the product label for specific container handling instructions.

14. TRANSPORT INFORMATION

US DOT (Shipped by Ground):
Containers less than or equal to 119 gallons
Not Regulated by DOT
DOT Shipping Name: Compounds, weed killing, liquid, non-regulated
Reportable Quantity (RQ): 277 gallons (Naphthalene RQ=100 lb)

Containers larger than 119 gallons
DOT Shipping Name: UN1993, Combustible Liquid, N.O.S. (contains Naphthalene), 3, III, RQ
Reportable Quantity (RQ): 277 gallons (Naphthalene RQ=100 lb)
**15. REGULATORY INFORMATION**

**FIFRA** –
This chemical is a pesticide product registered by the Environmental Protection Agency and is subject to certain labeling requirements under federal pesticide law. These requirements differ from the classification criteria and hazard information required for safety data sheets, and for workplace labels of non-pesticide chemicals. The following is the hazard information as required on the pesticide label:

**CAUTION:** Causes moderate eye irritation. Harmful if swallowed. Avoid contact with eyes, skin or clothing. Wash thoroughly with soap and water after handling and before eating, drinking, chewing gum or using tobacco. Prolonged or frequently repeated skin contact may cause allergic reactions in some individuals.

**ENVIRONMENTAL HAZARDS:** Do not apply directly to water, or to areas where surface water is present or to intertidal areas below the mean high water mark. Do not apply where runoff is likely to occur. Do not apply where weather conditions favor drift from areas treated. Do not contaminate water when disposing of equipment washwater or rinsate.

The use of this product may pose a hazard to the federally designated endangered species of Solano Grass and Wild Rice.

Use of this product is prohibited in the following areas where the species are known to exist:

Solano Grass: Solano County, California: the vernal lakes area bounded by the Union Pacific Railroad and Hastings Road to the north, Highway 113 to the east, Highway 12 to the south and Travis Air Force Base to the west.

Wild Rice: Hays County, Texas.

**PHYSICAL OR CHEMICAL HAZARDS:** Do not store near heat or open flame.

All pesticides are governed under the Federal Insecticide, Fungicide, and Rodenticide Act (FIFRA). The regulatory information presented below is pertinent only when this product is handled outside of the normal use and application as a pesticide. This product is excluded from listing requirements under EPA/TSCA.

**SARA Title III – Section 302 Extremely Hazardous Substances**
Not listed

**SARA Title III – Section 311/312 Hazard Categories**
Immediate, Delayed, Fire

**SARA Title III – Section 312 Threshold Planning Quantity**
The threshold planning quantity (TPQ) for this product treated as a mixture is 10,000 lbs. This product contains no ingredients with a TPQ of less than 10,000 lbs.

**SARA Title III – Section 313 Reportable Ingredients**
Naphthalene (CAS No. 91-20-3) < 5%

**CERCLA** –
RQ 277 gal (based on percentage of Naphthalene contained in this product)

**CALIFORNIA PROP 65 STATUS** –
This product contains a chemical (Naphthalene) known to the State of California to cause cancer.

**CANADA** –
This product has been classified in accordance with the hazard criteria of the Controlled Products Regulations (CPR) and the SDS contains all of the information required by CPR.
16. OTHER INFORMATION

DISCLAIMER: Whitetail Institute of North America believes the information and recommendations provided above to be accurate. NO WARRANTY OF FITNESS FOR ANY PARTICULAR PURPOSE, WARRANTY OF MERCHANTABILITY, OR ANY OTHER WARRANTY, EXPRESS OR IMPLIED, IS MADE CONCERNING THE INFORMATION PROVIDED HEREIN. The information provided above relates only to the specific product designated and may not be applicable where such product is used in combination with any other materials or in any process. Use of this product is regulated by the U.S. Environmental Protection Agency (EPA). It is a violation of Federal law to use this product in a manner inconsistent with its labeling. Additionally, as the conditions and methods of use are beyond the control of Whitetail Institute of North America. Whitetail Institute of North America expressly disclaims any and all liability as to any results obtained or arising from any use of the product or reliance on such information.

SDS Version: 1.1 Effective Date: 02/09/2015