SAFETY DATA SHEET

SECTION 1. PRODUCT AND COMPANY IDENTIFICATION

Bedoukian Research, Inc.              Emergency Phone Numbers:
21 Finance Drive                      1-800-424-9300 Chemtrec (North
Danbury, CT 06810-4133                America)
(INTERNATIONAL)                      1-703-527-3887 Chemtrec
UNITED STATES                        
Phone: 1-203-830-4000 Email: customerservice@bedoukian.com
Fax: 1-203-830-4010 Website: http://www.bedoukian.com

Product Code: 410
Product Name: APRITONE
Uses: flavors and fragrances

SECTION 2. HAZARDS IDENTIFICATION

HMIS HAZARD CLASSIFICATIONS
HEALTH = 1    FLAMMABILITY = 1    REACTIVITY = 0    PROTECTION = B

LABEL PRECAUTIONARY STATEMENTS

GHS CLASSIFICATION AND LABELLING
The following determinations per the Globally Harmonized System of
Classification and Labelling of Chemicals (GHS) have been made:

GHS SIGNAL WORD
Warning

GHS SYMBOLS
GHS07 Exclamation mark

GHS LABELING/HAZARD STATEMENTS
H315 Causes skin irritation

GHS LABELING/PRECAUTIONARY STATEMENTS
P264 Wash hands thoroughly after handling.
P280 Wear protective gloves/protective clothing/eye protection/face protection.
P302+P352 IF ON SKIN: Wash with plenty of soap and water.
P332+P313 If skin irritation occurs: Get medical advice/attention.
P362 Take off contaminated clothing and wash before reuse.

SECTION 3. COMPOSITION/INFORMATION ON INGREDIENTS
CAS #: 68133-79-9
FEMA #: Approved
MF: C15H24O
EC No: 268-706-3
Minimum Purity: 96.5% (sum of isomers)
Additives: synthetic alpha tocopherol @ 0.10%
SYNONYM(S)
- Cyclopentanone, 2-(3,7-dimethyl-2,6-octadienyl) -
- 2-(3,7-dimethyl-2,6-octadienyl)cyclopentanone
- 2-(3,7-dimethyl-2,6-octadien-1-yl)-Cyclopentanone
- 2-(3,7-dimethylocta-2,6-dienyl)cyclopentan-1-one
- Decenyl Cyclopentanone
- Geranyl Cyclopentanone

SECTION 4. FIRST-AID MEASURES

INHALATION EXPOSURE: Remove to fresh air. Give oxygen and call a physician.
EYE CONTACT: Flush with water for 15 min. Seek medical help if necessary.
SKIN CONTACT: Wash area well with water. Seek medical help if necessary.
INGESTION: Administer water and call a physician or poison control center immediately. Do not induce vomiting.

SECTION 5. FIRE FIGHTING MEASURES

EXTINGUISHING MEDIA
- CO2, FOAM, DRY CHEMICAL

SPECIAL FIRE FIGHTING PROCEDURES
- Use standard fire fighting procedures.

UNUSUAL FIRE AND EXPLOSION HAZARDS:
- None.

SECTION 6. ACCIDENTAL RELEASE MEASURES

STEPS TO BE TAKEN IF MATERIAL IS RELEASED OR SPILLED
- Standard absorbents can be used.

WASTE DISPOSAL METHOD: Incineration or sanitary landfill in accordance with local, state, and federal regulations.

SECTION 7. HANDLING AND STORAGE

HANDLING
- Observe all warnings and precautions listed for the product.
- Use in accordance with good manufacturing and industrial hygiene practices. Use product in a properly ventilated work area. Do not eat, drink or smoke while handling product.

STORAGE
- Packaging: Glass, Plastic, Aluminum or Phenolic Lined Steel
- Store tightly sealed under inert gas in a cool, well-ventilated area.

FIRE PROTECTION
- Keep away from heat, sparks, and open flame.
SECTION 8. EXPOSURE CONTROLS/PERSONAL PROTECTION

VENTILATION: Local exhaust preferred. General ventilation required.
RESPIRATORY: Usually not required. Avoid inhaling concentrated vapors.
SKIN: Avoid skin contact. Use chemical resistant gloves.
EYES: Splash-proof safety glasses or goggles.
OTHER PROTECTIVE EQUIPMENT: Safety shower, eye wash

SECTION 9. PHYSICAL AND CHEMICAL PROPERTIES

PHYSICAL STATE: Liquid
APPEARANCE: colorless liquid
ODOR DESCRIPTION: peach-apricot, with jasmine undertones.
BOILING POINT: 310.79 C (EPI 4.0)
VAPOR PRESSURE : 0.000887 mmHg (20C, EPI 4.0)
VAPOR DENSITY (Air = 1): > 1
SPECIFIC GRAVITY @ 25C (water = 1): 0.9110:0.9160
SOLUBILITY IN WATER: Insoluble in water; soluble in alcohol.
FLASH POINT (CC): 230 F    110 C
LOGP : 5.150

SECTION 10. STABILITY AND REACTIVITY

INCOMPATIBILITIES
CONDITIONS TO AVOID: Presents no special reactivity hazard.
MATERIALS TO AVOID: Strong oxidizing agents
HAZARDOUS COMBUSTION PRODUCTS
CO, CO2, water

SECTION 11. TOXICOLOGICAL INFORMATION

ACUTE EFFECTS
Most likely route of entry is through the skin.
Full strength may be irritating to skin and eyes.
IFRA RECOMMENDATIONS
This product contains material that has an IFRA standard.
Please visit www.ifraorg.org for the full text of the guideline for the
material indicated.
This product contains material with an IFRA standard. This material and
its amount in the formulation are as follows:
beta-Damascone (a Rose ketone) up to 0.05%.
IRRITATION DATA
Dermal sensitization (Guinea Pigs): Apritone is not a sensitizer. Buehler
method; material tested at 100% concentration.
Eye Rabbit: no irritant effects. Result for similar mat'l 2-(3,7-
dimethyl-2,6-nonadien-1-yl)-Cyclopentanone
Skin Rabbit: irritant effects, primary irritation index = 4.12.
TOXICITY DATA
LD50 Dermal (rabbit) > 5000 mg/kg. Result for similar mat'l 2-(3,7-
dimethyl-2,6-nonadien-1-yl)-Cyclopentanone.
LD50 Oral (rat) > 5 g/kg.

OTHER DATA
All components of this product are FEMA/GRAS or FDA approved for flavors. All components of this product are listed on the EU union list of flavourings as allowed for all categories of food.
contains: up to 0.005% FEMA 3264; 0.03% FEMA 3410; 0.05% FEMA 3243; 0.06% FEMA 3937; 0.11% FEMA 3758; 99.9% FEMA 3829.
contains: up to 0.005% z-4-Decenal; 0.03% Methyl jasmonate; 0.05% beta-Damascone; 0.06% Lactone of cis jasmone; 0.11% Jasmolactone extra C; 99.9% 2-(3,7-Dimethyl-2,6-octadienyl)cyclopentanone

THRESHOLD LIMIT VALUE (TLV): Not established
OSHA PERMISSIBLE EXPOSURE LIMIT (PEL): Not established
LISTED AS CARCINOGEN BY NTP, IARC, OR OSHA?: NO

SECTION 12. ECOLOGICAL INFORMATION

GENERAL
Prevent contamination of soil, ground- and surface water.

SECTION 13. DISPOSAL CONSIDERATION

WASTE DISPOSAL METHOD: Incineration or sanitary landfill in accordance with local, state, and federal regulations.

SECTION 14. TRANSPORT INFORMATION

<table>
<thead>
<tr>
<th>Class</th>
<th>Pack Group</th>
<th>Sub. Risk</th>
<th>UN No.</th>
</tr>
</thead>
<tbody>
<tr>
<td>Road (U.S.-DOT):</td>
<td>not regulated.</td>
<td></td>
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<tr>
<td>Air (IATA):</td>
<td>not regulated.</td>
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<tr>
<td>Sea (IMDG):</td>
<td>not regulated.</td>
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</table>

SECTION 15. REGULATORY INFORMATION

REVIEWS, STANDARDS, AND REGULATIONS
This chemical is listed on the following inventories:
TSCA AICS CHINA DSL EINECS(268-706-3) PICCS
LISTED AS CARCINOGEN BY NTP, IARC, OR OSHA?: NO

SECTION 16. OTHER INFORMATION

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