

This Safety Data Sheet has been prepared to comply with the EU Regulation No. 1907/2006 and 2015/830, and the US OSHA Hazcom 2012 Standard.

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/PREPARATION AND THE COMPANY/UNDERTAKING

1.1 Product Identifier:

Trade Name: Adult Fly Concentrate
SDS Date of Preparation: June 1, 2021; revised August 23, 2021

1.2 Relevant Identified Uses of the Substance or Mixture and Uses Advised Against:

Recommended use: None known
Recommended use: None known

1.3 Details of the Supplier of the Safety Data Sheet:

Manufacturer: Pertinent Animal Health, Inc.
 1062 Bluffhaven Way NE
 Brookhaven, GA 30319
Information Phone Number: (919) 676-8644

1.4 Emergency Telephone Number:

Emergency Telephone Number: INFOTRAC: 1-800-535-5053 (North America)
Emergency Spill Information: 1-352-323-3500 (International)

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the Substance or Mixture:

GHS Classification:

Physical	Health	Environment
Not Classified	Eye Damage Category 1 (H318) Skin Irritant Category 2 (H315) Skin Sensitization Category 1 (H317) Specific Target Organ Toxicity- Single Exposure Category 3 (H335)	Aquatic Chronic Toxicity Category 2 (H411)

2.2 Label Elements:

Danger!



Environment

Contains: Geraniol, Sodium lauryl sulfate, Citronella Oil, Cedarwood oil

Hazard Phrases

H315 Causes skin irritation.
 H317 May cause an allergic skin reaction.
 H318 Causes serious eye damage.
 H335 May cause respiratory irritation.
 H411 Toxic to aquatic life with long lasting effects.

Precautionary Phrases

P261 Avoid breathing mists or vapors.
 P264 Wash thoroughly after handling.
 P271 Use only outdoors or in a well-ventilated area.

- P272 Contaminated work clothing must not be allowed out of the workplace.
- P273 Avoid release to the environment.
- P280 Wear protective gloves, protective clothing, and eye protection.
- P305 + IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
- P351 +
P338
- P310 Immediately call a POISON CENTER or doctor.
- P302 + IF ON SKIN: Wash with plenty of water.
- P352
- P333 + If skin irritation or rash occurs: Get medical attention.
- P313
- P362 + Take off contaminated clothing and wash it before reuse.
- P364
- P304 + IF INHALED: Remove person to fresh air and keep comfortable for breathing.
- P340
- P312 Call a POISON CENTER or doctor if you feel unwell.
- P391 Collect spillage.
- P403 + Store in a well-ventilated place. Keep container tightly closed.
- P233
- P405 Store locked up.
- P501 Dispose of contents and container in accordance with local and national regulations.

2.3 Other Hazards: None known.

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.2 Mixture:

P272	CAS#	EINECS#/ REACH Registration#	%
Geraniol	106-24-1	203-377-1	25-35
Ethyl Lactate	687-47-8	211-694-1	10-20
Sodium lauryl sulfate	151-21-3	205-788-1	<5
Cedarwood oil	68990-83-0	294-461-7	<5
Citronella Oil	8000-29-1	294-954-7	<5

The specific identity and/or exact percentage of composition have been withheld as a trade secret.

See Section 16 for further information on GHS Classification.

SECTION 4: FIRST AID MEASURES

4.1 Description of First Aid Measures:

Eye: Immediately flush eyes thoroughly with large quantities of water for 20 minutes, while holding the eye lids open to be sure the material is washed out. Remove contact lenses if present and easy to do. Get immediate medical attention.

Skin: Remove contaminated clothing. Wash contact area thoroughly with soap and water for several minutes. Get medical attention if irritation or rash occurs. Launder clothing before re-use.

Inhalation: Remove victim to fresh air. If breathing is difficult or irritation persists, get medical attention.

Ingestion: Do not induce vomiting unless directed to do so by medical personnel. Keep the victim calm and warm. Get medical attention if symptoms develop.

4.2 Most Important symptoms and effects, both acute and delayed: May cause severe eye irritation with possible eye damage. May cause moderate skin and respiratory tract irritation. May cause skin sensitization.

4.3 Indication of any immediate medical attention and special treatment needed: Immediate medical attention is required for eye contact.

SECTION 5: FIRE-FIGHTING MEASURES

5.1 Extinguishing Media: Use any media that is appropriate for the surrounding fire.

5.2 Special Hazards Arising from the Substance or Mixture:

Unusual Fire and Explosion Hazards: Not classified as flammable or combustible.

Combustion Products: Oxides of carbon and other toxic or irritating compounds.

5.3 Advice for Fire-Fighters:

Wear an approved, positive pressure, self-contained breathing apparatus and full protective clothing. Cool fire exposed containers with water. Contain water used in firefighting from entering sewers or natural waterways.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal Precautions, Protective Equipment and Emergency Procedures:

Avoid contact with eyes, skin or clothing. Wear appropriate protective clothing to prevent eye and skin contact including impervious gloves, safety goggles and respirator if needed. Avoid breathing mists or vapors. Ventilate area.

6.2 Environmental Precautions:

Avoid releases to the environment. Report spills and releases as required to appropriate authorities.

6.3 Methods and Material for Containment and Cleaning Up:

Cover with an inert absorbent material and collect into an appropriate container for disposal.

6.4 Reference to Other Sections:

Refer to Section 8 for Personal Protective Equipment and Section 13 for Disposal information.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for Safe Handling: Avoid breathing vapors, aerosols and mists. Use with adequate ventilation. Avoid contact with the eyes, skin and clothing. Always wear impervious gloves, chemical safety goggles and protective clothing when handling this material. Wash thoroughly after handling. Do not eat, drink or smoke in the work area. Keep product away from heat and flames. Keep containers closed when not in use.

7.2 Conditions for Safe Storage, Including any Incompatibilities: Store in a container in a cool, dry, well-ventilated location away from oxidizers and incompatible materials. Keep container tightly closed when not in use.

7.3 Specific end use(s): None known.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control Parameters:

Chemical Name	Exposure Limits
Geraniol	None Established
Ethyl Lactate	None Established
Sodium lauryl sulfate	None Established
Cedarwood oil	None Established
Citronella Oil	None Established

8.2 Exposure Controls:

Ventilation: Use with adequate general or local exhaust ventilation to minimize exposures levels.

Personal Protective Equipment:

Respiratory Protection: In operations where exposure levels are excessive, an approved respirator with dust/mist cartridges or supplied air respirator should be used. Respirator selection and use should be based on contaminant type, form and concentration. Follow applicable regulations and good Industrial Hygiene practice. In Europe follow EN 149.

Skin Protection: Impervious gloves are recommended to prevent skin contact. Contact your glove supplier for selection assistance. In Europe follow EN 374.

Eye Protection: Chemical safety goggles should be worn to prevent eye contact. In Europe follow EN 166.

Other Protective Equipment: Impervious clothing is required to prevent skin contact and contamination of personal clothing. In Europe follow EN 13034. An eye wash facility and safety shower should be available in the work area.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic Physical and Chemical Properties:

Physical State: Liquid	pH: No data available
Color: Colorless	Kinematic Viscosity: No data available
Odor: Characteristic odor	Solubility: Soluble in water.
Melting point/freezing point: 0°C (32°F) (approximate)	Partition coefficient: n-octanol/water: No data available
Boiling Point/Range: 100.3°C (212.5°F)	Vapor pressure: No data available
Flammability (gas, liquid, solid): Not applicable	Relative Density: No data available
Flammable Limits: LEL: No data available	Relative vapor pressure: No data available
UEL: No data available	
Flash point: >100.3°C (>212.5°F) (PMCC)	Particle Characteristics: No data available
Auto-ignition temperature: No data available	Decomposition temperature: No data available

9.2.1 Information with regard to physical hazard classes: Not applicable

9.2.2 Other Safety Characteristics: Not applicable

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity: Not reactive

10.2 Chemical Stability: Stable under normal storage and handling conditions.

10.3 Possibility of Hazardous Reactions: Hazardous polymerization will not occur.

10.4 Conditions to Avoid: Keep away from heat and open flames.

10.5 Incompatible Materials: Strong oxidizing agents, strong acids, and strong bases.

10.6 Hazardous Decomposition Products: Thermal decomposition will produce oxides of carbon and other toxic or irritating compounds.

SECTION 11: TOXICOLOGICAL INFORMATION**11.1 Information on Toxicological Effects:**

Ventilation: Use with adequate general or local exhaust ventilation to minimize exposures levels.

Potential Health Effects:

Eye: May cause severe eye irritation with pain, tearing, and redness. May cause permanent eye damage.

Skin: May cause moderate skin irritation. May cause an allergic skin reaction (sensitization).

Inhalation: Inhalation of mists or vapors may cause nose and upper respiratory tract irritation.

Ingestion: Swallowing may cause gastrointestinal irritation, nausea, vomiting, and diarrhea.

Chronic Hazards: None known.

Acute Toxicity Values:

Product ATE: >2000 mg/kg (oral), >5000 mg/kg (dermal)

Geraniol: Oral rat LD50- 3600 mg/kg, Skin rabbit LD50- >5000 mg/kg

Ethyl Lactate: Oral rat LD50- >2000 mg/kg, Inhalation rat LC50- >5.4 mg/L/4hr

Sodium lauryl sulfate: Oral rat LD50-1200 mg/kg, Skin rabbit LD50->2000 mg/kg

Cedar wood oil: Oral rat LD50->5000 mg/kg, Skin rabbit LD50- >5000 mg/kg

Citronella Oil: Oral rat LD50- 300-<2000 mg/kg, Skin rat LD50->2000 mg/kg

Skin corrosion/irritation: This product is expected to be irritating to skin based on the ingredients.

Eye damage/irritation: This product is expected to be corrosive to eyes based on the ingredients.

Respiratory Irritation: Based on the ingredients, this product is expected to be a respiratory irritant.

Respiratory Sensitization: Based on available data, the classification criteria are not met.

Skin Sensitization: Based on the ingredients in this product, this product is expected to cause skin sensitization.

Germ Cell Mutagenicity: Based on available data, the classification criteria are not met.

Carcinogenicity: None of the components of this product are listed as carcinogens by OSHA, IARC, NTP, and the EU CLP.

Reproductive Toxicity: Based on available data, the classification criteria are not met.

Specific Target Organ Toxicity:

Single Exposure: Based on available data, the classification criteria are not met.

Repeat Exposure: Based on available data, the classification criteria are not met.

Aspiration Hazard: Based on available data, the classification criteria are not met.

11.2 Information on other hazards: Not applicable

11.2.1 Endocrine disrupting properties: Not applicable

11.2.2: Other information: Not applicable

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity:

Geraniol: 96 hr LC50 Danio rerio- 22 mg/L, 48 hr EC50 Daphnia magna- 10.8 mg/L, 72 hr EC50 Desmodesmus subspicatus- 13.1 mg/L
 Ethyl Lactate: 96 hr LC50 Danio rerio- 320 mg/L, 48 hr EC50 Daphnia magna- 683 mg/L
 Sodium lauryl sulfate: 96 hr LC50 Pimephales promelas- 29 mg/L, 48 hr EC50 Ceriodaphnia dubia- 5.55 mg/L, 42 days NOEC Pimephales promelas- ≥1.357 mg/L
 Cedar wood oil: 96 hr LL50 Cyprinus carpio- 6.8 mg/L, 48 hr EL50 Daphnia magna -0.76 mg/L
 Citronella Oil: 96 hr LL50 Oncorhynchus mykiss-7.5 mg/L, 48 hr EL50 Daphnia magna- 6 mg/L

This product is classified as toxic to the aquatic environment with long-term adverse effects. Releases to the environment should be avoided.

12.2 Persistence and Degradability: Geraniol is readily biodegradable.

12.3 Bioaccumulative Potential: No data available

12.4 Mobility in Soil: No data available

12.5 Results of PBT and vPvB Assessment: No data available

12.6 Other Adverse Effects: Not applicable

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Waste Treatment Methods: Dispose in accordance with all local, state and federal regulations.

SECTION 14: TRANSPORTATION INFORMATION

	14.1 UN Number	14.2 UN Proper Shipping Name	14.3 Hazard Class(s)	14.4 Packing Group	14.5 Environmental Hazards
US DOT	None	Not regulated	None	None	Not applicable
EU ADR/RID	UN3082	Environmentally hazardous substance, liquid, n.o.s. (Cedarwood oil)	9	III	Yes
IMDG	UN3082	Environmentally hazardous substance, liquid, n.o.s. (Cedarwood oil)	9	III	Marine Pollutant
IATA/ICAO	UN3082	Environmentally hazardous substance, liquid, n.o.s. (Cedarwood oil)	9	III	No

14.6 Special Precautions for User: Not applicable

14.7 Transport in Bulk According to Annex III MARPOL 73/78 and the IBC Code: Not applicable

SECTION 15: REGULATORY INFORMATION

15.1 Safety, Health and Environment Regulations/Legislation Specific for the Substance or Mixture:

U.S. FEDERAL REGULATIONS:

CERCLA 103 Reportable Quantity: This product is not subject to reporting under CERCLA. Some states have more stringent reporting requirements. Report all spills in accordance with local, state, and federal regulations.

SARA TITLE III:

Hazard Category for Section 311/312: See OSHA Hazard Classification in Section 2.

Section 313 Toxic Chemicals: This product contains the following chemicals subject to SARA Title III Section 313 Reporting requirements: None

Section 302 Extremely Hazardous Substances (TPQ): None

EPA Toxic Substances Control Act (TSCA) Status: All of the ingredients of this product are listed on the TSCA inventory or exempt.

EUROPEAN REGULATIONS

REACH: These products comply with REACH regulation as applicable. For more information, contact Pertinent Animal Health, Inc.

SVHC: This product contains the following Substances of Very High Concern (SVHCs): None.

15.2 Chemical Safety Assessment: No data available

SECTION 16: OTHER INFORMATION

GHS Classification for Reference (See Sections 3):

Acute Tox. 4 Acute Toxicity Category 4
Asp. Tox. 1 Aspiration Toxicity Category 1
Aquatic Acute 1 Aquatic Acute Toxicity Category 1
Aquatic Chronic 1 Aquatic Chronic Toxicity Category 1
Aquatic Chronic 2 Aquatic Chronic Toxicity Category 2
Aquatic Chronic 3 Aquatic Chronic Toxicity Category 3
Eye Dam. 1 Eye Damage Category 1
Eye Irrit. 2 Eye Irritant Category 2
Flam. Liq. 3 Flammable Liquid Category 3
Flam. Liq. 4 Flammable Liquid Category 4
Skin Irrit. 2 Skin Irritant Category 2
Skin Sens. 1 Skin Sensitizer Category 1
STOT SE 3 Specific Target Organ Toxicity Single Exposure Category 3

H226 Flammable liquid and vapor.
H227 Combustible liquid.
H302 Harmful if swallowed.
H304 May be fatal if swallowed and enters airways.
H315 Causes skin irritation.
H317 May cause an allergic skin reaction.
H318 Causes serious eye damage.
H319 Causes serious eye irritation.
H335 May cause respiratory irritation.
H400 Very toxic to aquatic life.
H410 Very toxic to aquatic life with long lasting effects.
H411 Toxic to aquatic life with long lasting effects.
H412 Harmful to aquatic life with long lasting effects.

This above information is believed to be correct but does not propose to be all inclusive and shall be used only as a guide. Pertinent Animal Health, Inc. shall not be held liable for any damage resulting from handling or from contact with the above product.