



Safety Data Sheet

Preparation Date 13-Jan-2020

Revision date 21-Jan-2020

Revision Number: 2

1. Identification of the Substance/Preparation and of the Company/Undertaking

Identification of the product

Product Description Akito

Other means of identification

Product code 12A- 0001
Registration number(s) PMRA # 33657

Recommended use of the chemical and restrictions on use

Recommended use Herbicide.
Uses advised against Non labeled activities Activities contrary to label recommendation

Details of the Supplier of the Safety Data Sheet

Supplier Address

UPLNA Inc.
Arysta Life Science Canada, Inc.
400 Michener Road, Unti 2
Guelph, Ontario N1K 1E4

Emergency telephone number

Company Phone Number 1-800-438-6071
Emergency telephone number Chemtrec: (800) 424-9300 (24hrs) or (703) 527-3887
Medical: Rocky Mountain Poison and Drug Safety (866) 673-6671 (24hrs)

2. Hazards Identification

Classification

OSHA Regulatory Status

This chemical is considered hazardous by the 2012 OSHA Hazard Communication Standard (29 CFR 1910.1200)

Acute toxicity - Inhalation (Vapors)	Category 3
Serious eye damage/eye irritation	Category 1
Carcinogenicity	Category 2

Label elements

EMERGENCY OVERVIEW

DANGER

Hazard Statements

Toxic if inhaled
Causes serious eye damage
Suspected of causing cancer



Appearance clear**Physical state** Liquid**Odor** aromatic**Precautionary Statements - Prevention**

Obtain special instructions before use
 Do not handle until all safety precautions have been read and understood
 Wear cold insulating gloves/face shield/eye protection
 Do not get in eyes, on skin, or on clothing
 Use only outdoors or in a well-ventilated area

Precautionary Statements - Response

IF exposed or concerned: Get medical advice/attention
 IF IN EYES: Rinse continuously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing
 Immediately call a POISON CENTER or doctor/physician
 IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing
 Call a POISON CENTER or doctor/physician

Precautionary Statements - Storage

Store locked up
 Store in a well-ventilated place. Keep container tightly closed

Precautionary Statements - Disposal

Dispose of contents/container to an approved waste disposal plant

Hazards Not Otherwise Classified (HNOC)**OTHER INFORMATION**

- MAY BE HARMFUL IF SWALLOWED
- May be harmful in contact with skin
- Very toxic to aquatic life
- Very toxic to aquatic life with long lasting effects

3. Composition/information on Ingredients

Chemical name	CAS No	Weight-%
Naphthalene	91-20-3	0.5
Hydrocarbons, C10, aromatics, <1% naphthalene	64742-94-5	50
Clopyralid (ISO)	1702-17-6	7.7
Fluroxypyr 1-methylheptyl ester	81406-37-3	14.3

If CAS number is "proprietary", the specific chemical identity and percentage of composition has been withheld as a trade secret.

4. First aid measures

FIRST AID MEASURES

Eye contact	Hold eye open and rinse slowly and gently with water for 15 - 20 minutes. Remove contact lenses, if present, after 5 minutes, then continue rinsing eye. Call a poison control center or doctor for treatment advice.
Skin contact	Remove and wash contaminated clothing before re-use. Rinse skin immediately with plenty of water for 15-20 minutes. Call a poison control center or doctor for treatment advice.
Inhalation	Move person to fresh air. If person is not breathing, call 911 or an ambulance, then give artificial respiration, preferably mouth-to-mouth if possible. Call a poison control center or doctor for further treatment advice.
Ingestion	Immediately call a POISON CENTER or a doctor/physician. Do not induce vomiting without medical advice. Do not give any liquids. Never give anything by mouth to an unconscious person.

Most Important Symptoms and Effects, Both Acute and Delayed

Most Important Symptoms and Effects May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Indication of Any Immediate Medical Attention and Special Treatment Needed

Notes to physician Excessive exposure may aggravate preexisting asthma and other respiratory disorders (e.g. bronchitis, emphysema, reactive airways dysfunction syndrome). Maintain adequate ventilation and oxygenation of the patient. May cause asthma-like symptoms. Bronchodilators, expectorants, antitussives and corticosteroids may be of help. Respiratory symptoms, including pulmonary edema, may be delayed. Observe for 24-48 hours persons who have significant exposure for signs of respiratory distress. If lavage is performed, suggest endotracheal and/or esophageal control. Danger from lung aspiration must be weighed against toxicity when considering emptying the stomach. The decision of whether to induce vomiting or not should be made by a physician. Treatment of exposure should be directed at the control of symptoms and the clinical condition of the patient.

5. Fire-fighting measures**Suitable extinguishing media**

Water spray or fog. Dry chemical. Carbon dioxide (CO₂). Foam. alcohol-resistant foam.

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

Specific hazards arising from the chemical

No information available.

Explosion data**Protective equipment and precautions for firefighters**

As in any fire, wear self-contained breathing apparatus pressure-demand, MSHA/NIOSH (approved or equivalent) and full protective gear. Wear fire/flame resistant/retardant clothing.

6. Accidental release measures**Personal precautions, protective equipment and emergency procedures**

Personal Precautions Keep people away from and upwind of spill/leak. Provide adequate ventilation. Use personal protective equipment.

Environmental Precautions

Environmental precautions Consult a regulatory specialist to determine appropriate state or local reporting requirements, for assistance in waste characterization and/or hazardous waste disposal and other requirements listed in pertinent environmental permits. Do not flush into surface water or sanitary sewer system. Beware of vapors accumulating to form explosive concentrations. Vapors can accumulate in low areas.

Methods and material for containment and cleaning up

Methods for Clean-Up Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust). Sweep up and shovel into suitable containers for disposal.

7. Handling and Storage**Precautions for safe handling**

Handling Keep out of reach of children. Avoid contact with skin and eyes. Avoid breathing vapors or mists. Wear personal protective equipment.

Conditions for safe storage, including any incompatibilities

Storage Keep container tightly closed in a dry and well-ventilated place. Keep in properly labelled containers. Store in original container.

incompatible materials Strong acids. Strong bases. Strong oxidizing agents.

8. Exposure Controls/Personal Protection

Exposure guidelines

Chemical name	ACGIH TLV	OSHA PEL
Naphthalene	TWA: 10 ppm S*	TWA: 10 ppm TWA: 50 mg/m ³ (vacated) TWA: 10 ppm (vacated) TWA: 50 mg/m ³ (vacated) STEL: 15 ppm (vacated) STEL: 75 mg/m ³

Engineering controls Investigate engineering techniques to reduce exposures. Local mechanical exhaust ventilation is preferred. Consult ACGIH ventilation manual or NFPA Standard 91 for design of exhaust systems.

Personal protective equipment

Eye/Face Protection

Tightly fitting safety goggles. Where there is potential for eye contact have eye flushing equipment available.

Skin protection

Wear protective gloves/clothing. Chemical resistant gloves. Impervious butyl rubber gloves. Chemical resistant footwear plus socks.

Respiratory protection

Where airborne exposure is likely, use NIOSH approved respiratory protection equipment appropriate to the material and/or its components. Full facepiece equipment is recommended and, if used, replaces need for face shield and/or chemical goggles. If exposures cannot be kept at a minimum with engineering controls, consult respirator manufacturer to determine appropriate type equipment for given application. Observe respirator use limitations specified by NIOSH or the manufacturer. For emergency and other conditions where there may be a potential for significant exposure, use an approved full face positive-pressure, self-contained breathing apparatus. Respiratory protection programs must comply with 29 CFR 1910.134.

General hygiene considerations

Do not eat, drink or smoke when using this product. Remove and wash contaminated clothing before re-use. Wear suitable gloves and eye/face protection. Wash hands before breaks and immediately after handling the product. Wear respiratory protection.

9. Physical and Chemical Properties

9.1 Information on basic physical and chemical properties

Appearance clear
Physical state Liquid
Odor aromatic
color Yellow to brown

Property	VALUES	Remarks/ Method
pH	2.49	(1% aq)
Melting point/freezing point		None known
Boiling Point/Range		None known
Flash Point	> 100 °C	None known
Flammability (solid, gas)		None known
None known		Specific gravity 1.0399 @ 20 C
None known		Solubility in Other Solvents No information available
None known		Partition coefficient: n-octanol/water
None known		Autoignition temperature

None known

Decomposition
temperature
Viscosity

None known

None known

9.2 OTHER INFORMATION**10. Stability and Reactivity****Reactivity**

no data available

Chemical stability

Stable under recommended storage conditions.

Possibility of hazardous reactions

None under normal processing.

Conditions to avoid

Exposure to elevated temperatures can cause product to decompose. Generation of gas during decomposition can cause pressure in closed systems. .

incompatible materials

Strong acids. Strong bases. Strong oxidizing agents.

Hazardous decomposition products

Carbon oxides. Nitrogen oxides (NOx). Hydrogen fluoride. Oxides of sulfur. Thermal decomposition can lead to release of irritating and toxic gases and vapors.

11. Toxicological Information**Information on Likely Routes of Exposure****Product information**

Akito:

Acute oral LD50 (rat) = 3,378 mg/kg

Acute dermal LD50 (rat) = 5,000 mg/kg

Acute Inhalation LC50 (rat) = 3.35 mg/L - 4 hour (estimated)

Inhalation

Inhalation may cause severe respiratory irritation and pulmonary edema.

Eye contact

Moderately irritating to the eyes.

Skin contact

Prolonged contact may cause redness and irritation.

Ingestion

MAY BE HARMFUL IF SWALLOWED.

Information on Toxicological Effects**Symptoms**

No information available.

Delayed and immediate effects as well as chronic effects from short and long-term exposure**Sensitization**

No information available.

Mutagenic effects

no data available.

Carcinogenicity

The information below indicates whether any agency has listed any ingredient as a carcinogen.

Chemical name	ACGIH	IARC	NTP	OSHA
Naphthalene 91-20-3	A3	Group 2B	Reasonably Anticipated	X

Reproductive effects

Not Available.

STOT - Single Exposure no data available.
STOT - Repeated Exposure no data available.
Aspiration hazard No information available.

Numerical Measures of Toxicity - Product information

LD50 Oral 3,378 mg/kg
LD50 Dermal > 5,000 mg/kg
LC50 Inhalation 3.35 mg/l (4-hr) Estimated

12. Ecological Information

ecotoxicity

Akito:

FISH (rainbow trout) LC50 96 hr = 7.1 mg/L
 AQUATIC INVERTEBRATES (Daphnia magna) EC50 48 hr = 6/.9 mg/L
 ALGAE (Green algae) 72 hr = 3.1 mg/L
 BIRDS (bobwhite quail) LD50 = >2250 mg/kg
 EARTHWORMS LC50 14 day = 248.21 mg/kg

Persistence/Degradability

no data available.

Bioaccumulation/ Accumulation

Not likely to bioaccumulate.

Chemical name	Log Pow
Naphthalene 91-20-3	3.6
Hydrocarbons, C10, aromatics, <1% naphthalene 64742-94-5	2.9 - 6.1
Fluroxypyr 1-methylheptyl ester 81406-37-3	4.53

Other Adverse Effects

no data available

13. Disposal Considerations

Waste Treatment Methods

Waste Disposal Method

Pesticide wastes are acutely hazardous. Improper disposal of excess pesticide or rinsate is a violation of Federal law. If the wastes cannot be disposed of by use or according to label instructions, contact your State Pesticide or Environmental Control Agency, or the Hazardous Waste representative at the nearest EPA Regional Office for guidance.

Contaminated packaging

Refer to product label.

Chemical name	Naphthalene
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14. Transport Information

DOT

Not regulated when shipped domestically by highway in non-buk containers as per 49 CFR 171.4

When shipped in bulk, by vessel, or internationally use the IMDG shipping description:

TDG

When shipped in Canada domestic highway non-bulk this product can be shipped as Not

regulated as per TDG 1.45.1
In bulk - use IMDG description

IMDG

UN/ID no UN3082
Proper shipping name Environmentally hazardous substances, liquid, n.o.s (Fluroxypyr 1-Methylheptyl ester) (clopyralid)
Hazard class 9
Packing group PG III
Environmental hazards Marine pollutant

15. Regulatory Information

This chemical/product is a pesticide product registered by the PMRA and is subject to specific label requirements under these regulations. The requirements may differ classification and hazard information required for safety data sheets and for labels of non-pesticide products. The following is information as required on the registered product label.

International Inventories

USINV Not present
DSL/NDSL Not present
EINECS/ELINCS Not Present
ENCS Not Present
China Not Present
KECL Not Present
PICCS Not Present
AICS Not Present
TSCA Not Present

TSCA - United States Toxic Substances Control Act Section 8(b) Inventory
DSL/NDSL - Canadian Domestic Substances List/Non-Domestic Substances List
EINECS/ELINCS - European Inventory of Existing Commercial Chemical Substances/EU List of Notified Chemical Substances
ENCS - Japan Existing and New Chemical Substances
IECSC - China Inventory of Existing Chemical Substances
KECL - Korean Existing and Evaluated Chemical Substances
PICCS - Philippines Inventory of Chemicals and Chemical Substances
AICS - Australian Inventory of Chemical Substances

Federal Regulations**SARA 313**

Section 313 of Title III of the Superfund Amendments and Reauthorization Act of 1986 (SARA). This product does not contain any chemicals which are subject to the reporting requirements of the Act and Title 40 of the Code of Federal Regulations, Part 372.

Chemical name	CWA - Reportable Quantities	CWA - Toxic Pollutants	CWA - Priority Pollutants	CWA - Hazardous Substances
Naphthalene 91-20-3	100 lb	X	X	X

CERCLA

Not applicable

Chemical name	RQ	CERCLA EHS RQs	RQ
Naphthalene 91-20-3	100 lb		RQ 100 lb final RQ RQ 45.4 kg final RQ

CERCLA

Component	RQ
Naphthalene 91-20-3 (0.5)	100 lb

RCRA

Component	RCRA - D Series Wastes	RCRA - P Series Wastes	RCRA - U Series Wastes
Naphthalene 91-20-3 (0.5)			U165

Pesticide Information

Component	FIFRA - Restricted Use	FIFRA - Pesticide Product Other Ingredients	FIFRA - Listing of Pesticide Chemicals	California Pesticides - Restricted Materials
Hydrocarbons, C10, aromatics, <1% naphthalene 64742-94-5 (50)			X	
Clopyralid (ISO) 1702-17-6 (7.7)			X	
Fluroxypyr 1-methylheptyl ester 81406-37-3 (14.3)			X	

State Regulations

Component	California Prop. 65	
Naphthalene 91-20-3 (0.5)	Carcinogen	
Chemical name	CAS No	CATEGORY
Naphthalene	91-20-3	Carcinogen

Prop 65 Pictogram



**Prop 65 Warning Statement
California Proposition 65**

WARNING
This product can expose you to chemicals which is [are] known to the State of California to cause cancer, birth defects or other reproductive harm. For more information go to www.P65Warnings.ca.gov

State Right-to-Know

Chemical name	Massachusetts	New Jersey	Pennsylvania	Illinois	Rhode Island
Naphthalene - 91-20-3	X	X	X	X	

International regulations

U.S. EPA Label information

EPA Pesticide registration number PMRA # 33657

16. Other Information

NFPA HEALTH 1 flammability 0 Instability 0 Physical hazard -

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Revision Summary

Update section 1 Update Section 16

Disclaimer

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End of SDS

