



# Safety Data Sheet

Preparation Date 01-Nov-2023

Revision date 14-Dec-2023

Revision Number: 2

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

### Identification of the product

**Product Description** Batalium Suspension Concentrate Herbicide

### Other means of identification

**Internal SDS code** CAN-2023111  
**Registration number(s)** PMRA # 35024

### Recommended use of the chemical and restrictions on use

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

### Details of the Supplier of the Safety Data Sheet

#### Supplier Address

UPL AgroSolutions Canada Inc.  
c/o UPL NA Inc  
630 Freedom Business Center, Suite 402,  
King of Prussia, PA 19406

### 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 - Oral	Category 4
Acute toxicity - Inhalation (Vapors)	Category 4
Skin Corrosion/Irritation	Category 2
Skin sensitization	Category 1
Reproductive Toxicity	Category 2

### Label elements

#### EMERGENCY OVERVIEW

#### WARNING

#### Hazard Statements

HARMFUL IF SWALLOWED  
May cause an allergic skin reaction  
May be harmful if inhaled  
May cause damage to organs through prolonged or repeated exposure  
Suspected of damaging fertility or the unborn child



**Appearance** Opaque

**Physical state** Liquid

**Odor** Mild characteristic

**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  
Wash face, hands and any exposed skin thoroughly after handling  
Do not eat, drink or smoke when using this product  
Do not get in eyes, on skin, or on clothing  
Contaminated work clothing should not be allowed out of the workplace  
Wear protective gloves  
Do not spray on an open flame or other ignition source

**Precautionary Statements - Response**

IF exposed or concerned: Get medical advice/attention  
IF ON SKIN: Wash with plenty of soap and water  
If skin irritation or rash occurs: Get medical advice/attention  
Wash contaminated clothing before reuse  
IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing  
IF SWALLOWED: Call a POISON CENTER or doctor/physician if you feel unwell  
Rinse mouth  
In case of fire: Use CO<sub>2</sub>, dry chemical, or foam for extinction

**Precautionary Statements - Storage**

Store locked up  
Store in a well-ventilated place. Keep cool  
Do not store at temperatures exceeding 0° C / 32° F

**Precautionary Statements - Disposal**

Dispose of contents/container to an approved waste disposal plant

**Hazards Not Otherwise Classified (HNOC)**

**OTHER INFORMATION**

• Very toxic to aquatic life with long lasting effects

**3. Composition/information on Ingredients**

Chemical name	CAS No	Weight-%
Bromoxynil octanoate (octanoic acid,2,6-dibromo-4-cyanophenyl ester)	1689-99-2	26
Fluroxypyr 1-methylheptyl ester	81406-37-3	9.42
Flucarbazone sodium	181274-17-9	1.62
Safener	Proprietary	0 - 10%
Silicon dioxide (Cristobalite)	14808-60-7	1.08
MCPA-2-ethylhexyl ester	29450-45-1	27.69

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

**4. First aid measures**

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## **FIRST AID MEASURES**

<b>Eye contact</b>	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.
<b>Skin contact</b>	Wash off immediately with soap and plenty of water for at least 15 minutes. Call a poison control center or doctor for treatment advice.
<b>Inhalation</b>	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.
<b>Ingestion</b>	Call a physician or poison control center immediately. Never give anything by mouth to an unconscious person. Do not induce vomiting without medical advice.

## **Most Important Symptoms and Effects, Both Acute and Delayed**

<b>Most Important Symptoms and Effects</b>	MAY CAUSE ALLERGIC SKIN REACTION. Suspected of damaging fertility or unborn child. May cause damage to organs through prolonged or repeated exposure.
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## **Indication of Any Immediate Medical Attention and Special Treatment Needed**

<b>Notes to physician</b>	Treat symptomatically.
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## **5. Fire-fighting measures**

### **Suitable extinguishing media**

Foam. Dry chemical. Carbon dioxide (CO<sub>2</sub>). Water spray. Dry sand.

**Unsuitable extinguishing media** Do not scatter spilled material with high pressure water streams.

### **Specific hazards arising from the chemical**

Thermal decomposition can lead to release of irritating gases and vapours.

### **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.

## **6. Accidental release measures**

### **Personal precautions, protective equipment and emergency procedures**

<b>Personal Precautions</b>	Do not eat, drink or smoke when using this product. Avoid contact with skin and eyes. Use personal protective equipment. Provide adequate ventilation. Wash thoroughly after handling.
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### **Environmental Precautions**

<b>Environmental precautions</b>	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. Beware of vapors accumulating to form explosive concentrations. Vapors can accumulate in low areas.
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### **Methods and material for containment and cleaning up**

<b>Methods for Clean-Up</b>	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.
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## 7. Handling and Storage

### Precautions for safe handling

**Handling** Avoid contact with skin and eyes. Wear personal protective equipment. Remove and wash contaminated clothing before re-use. Do not breathe vapours or spray mist. Provide adequate ventilation. Do not eat, drink or smoke when using this product. Keep out of reach of children. Wash thoroughly after handling. Keep away from open flames, hot surfaces and sources of ignition.

### Conditions for safe storage, including any incompatibilities

**Storage** Keep container tightly closed in a dry and well-ventilated place. Keep out of the reach of children. Do not freeze. Store in an area where cross-contamination with pesticides, fertilizers, food or feed could not occur.

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

## 8. Exposure Controls/Personal Protection

### Exposure guidelines

Chemical name	ACGIH TLV	OSHA PEL
Silicon dioxide (Cristobalite)	TWA: 0.025 mg/m <sup>3</sup> respirable particulate matter	TWA: 50 µg/m <sup>3</sup> Action Level: 25 µg/m <sup>3</sup> (vacated) TWA: 0.1 mg/m <sup>3</sup> respirable dust : (250)/(%SiO <sub>2</sub> + 5) mppcf TWA respirable fraction : (10)/(%SiO <sub>2</sub> + 2) mg/m <sup>3</sup> TWA respirable fraction

**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**

Where there is potential for eye contact have eye flushing equipment available. Safety glasses with side-shields. If splashes are likely to occur, wear: Goggles. Face-shield.

**Skin protection**

Chemical resistant footwear plus socks. Long sleeved clothing.

**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. Avoid contact with skin, eyes and clothing. Wear suitable gloves and eye/face protection. Wash hands before breaks and immediately after handling the product.

## 9. Physical and Chemical Properties

### 9.1 Information on basic physical and chemical properties

<b>Appearance</b>	Opaque
<b>Physical state</b>	Liquid
<b>Odor</b>	Mild characteristic
<b>color</b>	No information available

<u>Property</u>	<u>VALUES</u>	<u>Remarks/ Method</u>
<b>pH</b>	4.27	Approximately (1% aq)
<b>Melting point/freezing point</b>		None known
<b>Boiling Point/Range</b>		None known
<b>Flash Point</b>	> 104.9 C / 219 F	None known
<b>Evaporation Rate</b>		None known
<b>Flammability (solid, gas)</b>		None known
<b>Specific gravity</b>	1.157@ 20 C	None known
<b>Bulk density</b>		None known
<b>Water solubility</b>		None known
<b>Solubility in Other Solvents</b>	No information available	None known
<b>Partition coefficient: n-octanol/water</b>		None known
<b>Autoignition temperature</b>		None known
<b>Decomposition temperature</b>		None known
<b>Viscosity</b>	118.7 mPas @20C	None known

## 9.2 OTHER INFORMATION- NONE

### 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

Extremes of temperature and direct sunlight.

#### incompatible materials

Strong oxidizing agents. Strong acids. Strong bases.

#### Hazardous decomposition products

Carbon oxides.

### 11. Toxicological Information

#### Information on Likely Routes of Exposure

##### **Product information**

Batalium Suspension Concentrate:  
Acute oral LD50 (rat) 550 mg/kg  
Acute dermal LD50 (rat) >5,000 mg/kg  
Acute inhalation LC50 (rat) >2.12 mg/kg/4 hr.

##### **Inhalation**

Harmful by inhalation.

##### **Eye contact**

Causes substantial but temporary eye injury.

##### **Skin contact**

Repeated or prolonged skin contact may cause allergic reactions with susceptible persons.

##### **Ingestion**

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** Prolonged or repeated contact with skin can cause allergic reactions in susceptible persons.  
**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
Silicon dioxide (Cristobalite) 14808-60-7	A2	Group 1	Known	X

**Reproductive effects** May damage fertility or the unborn child.  
**STOT - Single Exposure** no data available.  
**STOT - Repeated Exposure** no data available.  
**Aspiration hazard** No information available.

**Numerical Measures of Toxicity - See above**

**12. Ecological Information**

**ecotoxicity**

Very toxic to aquatic life with long lasting effects  
 Flucarbazone sodium  
 LC50 FISH (oncorhynchus mykiss) 96 hr = >96.7 mg/L  
 LC50 GREEN ALGAE 96 hr = 6.4 mg/L  
 EC50 Daphnia 48 hr =38.8 mg/L  
 Fluroxypyr-meptyl  
 LC50 FISH (rainbow trout) 96 hr = 13.4- 100 mg/L  
 EC50 DAPHNIA 96 hr = > 100 mg/ L  
 LC50 FISH (bluegill sunfish) 96 hr = > 14.3 mg/L  
 Bromoxynil octanoate :  
 96 hr Bluegill LC50 = 0.06 mg/L  
 96 hr Rainbow trout LC50 = 0.041 mg/L  
 48 hr Daphnia magna EC50 = 0.046 mg/L  
 Oral LD50 Bobwhite quail = 148 mg/kg  
 Oral LD50 Mallard duck = 2050 mg/kg

**Persistence/Degradability**

no data available.

**Bioaccumulation/ Accumulation**

Bioaccumulative potential.

Chemical name	Log Pow
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 can be 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.

## 14. Transport Information

**DOT** When shipped domestically by highway in non-bulk containers this product can be shipped as not regulated.

When shipped in bulk, by vessel, or internationally refer to 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, by vessel or internationally - use IMDG description

### **IATA**

<b>UN/ID no</b>	UN3082
<b>Proper shipping name</b>	Environmentally hazardous substances, liquid, n.o.s (Fluroxypyr-meptyl) (Bromoxynil octanoate)
<b>Hazard class</b>	9
<b>Packing group</b>	PG III
<b>Description</b>	Marine pollutant

### **IMDG**

<b>UN/ID no</b>	UN3082
<b>Proper shipping name</b>	Environmentally hazardous substances, liquid, n.o.s (Bromoxynil octanoate) (Fluroxypyr-meptyl)
<b>Hazard class</b>	9
<b>Packing group</b>	PG III
<b>Environmental hazards</b>	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.

**signal word** WARNING

**POISON. EYE IRRITANT. Potential skin sensitizer. May be fatal if swallowed. Toxic to aquatic organisms and non-terrestrial plants.**

### **International Inventories**

<b>USINV</b>	Not present
<b>DSL/NDSL</b>	Not present
<b>EINECS/</b>	Not Present
<b>ELINCS</b>	
<b>ENCS</b>	Not Present
<b>China</b>	Not Present
<b>KECL</b>	Not Present
<b>PICCS</b>	Not Present
<b>AICS</b>	Not Present
<b>TSCA</b>	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.

**CERCLA**

Not applicable

**CERCLA**

**RCRA**

**Pesticide Information**

Component	FIFRA - Restricted Use	FIFRA - Pesticide Product Other Ingredients	FIFRA - Listing of Pesticide Chemicals	California Pesticides - Restricted Materials
Fluroxypyr 1-methylheptyl ester 81406-37-3 ( 9.42 )			X	
Flucarbazone sodium 181274-17-9 ( 1.62 )			X	
Safener ( 0 - 10% )			X	

**State Regulations**

Component	California Prop. 65
Bromoxynil octanoate (octanoic acid,2,6-dibromo-4-cyanophenyl ester) 1689-99-2 ( 26 )	Developmental

**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](http://www.P65Warnings.ca.gov)

**State Right-to-Know**

Chemical name	Massachusetts	New Jersey	Pennsylvania	Illinois	Rhode Island
Bromoxynil octanoate (octanoic acid,2,6-dibromo-4-cyanophenyl ester) - 1689-99-2		X			
Silicon dioxide (Cristobalite) - 14808-60-7	X	X	X	X	

**International regulations**

**U.S. EPA Label information**

**EPA Pesticide registration number** PMRA # 35024

**16. Other Information**



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**NFPA** HEALTH 2 flammability 1 Instability 0 Physical hazard -

Preparation Date 01-Nov-2023

Revision date 14-Dec-2023

**Revision Summary**

Add to system

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**End of SDS**