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Version: 2.0 (30215380/SDS\_CPA\_CA/EN)

## 1. Product and Company Identification

Company
BASF Canada Inc.
100 Milverton Drive
Mississauga, ON L5R 4H1, CANADA

24 Hour Emergency Response Information CANUTEC (reverse charges): (613) 996-6666 BASF HOTLINE: (800) 454-COPE (2673)

Molecular formula: C19 H18 Cl N3 O4

Synonyms: pyraclostrobin

#### 2. Hazards Identification

#### **Emergency overview**

CAUTION:

Harmful if swallowed.

Avoid contact with the skin, eyes and clothing.

State of matter: solid Colour: grey-brown Odour: smoky

## Potential health effects

#### Acute toxicity:

Slightly toxic after single ingestion. Slightly toxic after short-term skin contact. Relatively nontoxic after short-term inhalation.

## Irritation / corrosion:

May cause slight but temporary irritation to the eyes. May cause slight irritation to the skin.

#### Sensitization:

Skin sensitizing effects were not observed in animal studies.

## Potential environmental effects

#### Aquatic toxicity:

Very toxic (acute effect) to aquatic organisms.

#### Terrestrial toxicity:

With high probability not acutely harmful to terrestrial organisms.

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## 3. Composition / Information on Ingredients

Not WHMIS controlled.

## 4. First-Aid Measures

#### General advice:

First aid providers should wear personal protective equipment to prevent exposure. Remove contaminated clothing. Move person to fresh air. If person is not breathing, call 911 or ambulance, then give artificial respiration, preferably mouth-to-mouth if possible. Call a poison control center or physician for treatment advice. Have the product container or label with you when calling a poison control center or doctor or going for treatment.

#### If inhaled:

Keep patient calm, remove to fresh air. Assist in breathing if necessary. Consult a physician.

#### If on skin:

Wash affected areas thoroughly with soap and water. Remove contaminated clothing. If irritation develops, seek medical attention.

#### If in eyes:

Hold eyelids open to facilitate rinsing. Flush with copious amounts of water for at least 15 minutes. If symptoms persist, seek medical advice.

#### If swallowed:

Rinse mouth and then drink plenty of water. Do not induce vomiting. Immediate medical attention required.

## Note to physician

Antidote: No known specific antidote. Treatment: Treat symptomatically.

## 5. Fire-Fighting Measures

Flash point: not applicable
Autoignition: not applicable

Flammability: not highly (Directive 92/69/EEC, A.10)

flammable

Self-ignition temperature: 296 °C (Directive 92/69/EEC, A.16)

#### Suitable extinguishing media:

foam, dry powder, carbon dioxide, water spray

### Hazards during fire-fighting:

carbon monoxide, carbon dioxide, ammonia, nitrogen dioxide, nitrogen oxide, Hydrogen chloride, halogenated hydrocarbons, Ammonium sulphate, Hydrocarbons, acid halides

The substances/groups of substances mentioned can be released if the product is involved in a fire. If product is heated above decomposition temperature, toxic vapours will be released.

#### Protective equipment for fire-fighting:

Firefighters should be equipped with self-contained breathing apparatus and turn-out gear.

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#### 6. Accidental release measures

#### Personal precautions:

Take appropriate protective measures. Clear area. Shut off source of leak only under safe conditions. Extinguish sources of ignition nearby and downwind. Ensure adequate ventilation. Wear suitable personal protective clothing and equipment.

#### **Environmental precautions:**

Do not discharge into the subsoil/soil. Do not discharge into drains/surface waters/groundwater.

#### Cleanup

Dike spillage. Pick up with suitable absorbent material. Place into suitable containers for reuse or disposal in a licensed facility. After decontamination, spill area can be washed with water. Collect wash water for approved disposal.

## 7. Handling and Storage

#### **Handling**

#### General advice:

Ensure adequate ventilation. Provide good ventilation of working area (local exhaust ventilation if necessary). Keep away from sources of ignition - No smoking. Keep container tightly sealed. Protect contents from the effects of light. Protect against heat. Protect from air. Handle and open container with care. Avoid aerosol formation. Avoid dust formation. Provide means for controlling leaks and spills. Do not return residues to the storage containers. The substance/ product may be handled only by appropriately trained personnel. Avoid all direct contact with the substance/product. Avoid contact with the skin, eyes and clothing. Avoid inhalation of dusts/mists/vapours. Wear suitable personal protective clothing and equipment.

#### Protection against fire and explosion:

Dust can form an explosive mixture with air.

## Storage

#### General advice:

Keep only in the original container in a cool, dry, well-ventilated place away from ignition sources, heat or flame. Protect containers from physical damage. Protect against contamination. The authority permits and storage regulations must be observed.

Keep away from heat. Protect against moisture. Protect from direct sunlight.

## Storage incompatibility:

General advice: Segregate from incompatible substances. Segregate from foods and animal feeds. Segregate from textiles and similar materials.

#### Temperature tolerance

Protect from temperatures above: 40 °C

Changes in the properties of the product may occur if substance/product is stored above indicated temperature for extended periods of time.

## 8. Exposure Controls and Personal Protection

Users of a pesticidal product should refer to the product label for personal protective equipment requirements.

## Advice on system design:

Whenever possible, engineering controls should be used to minimize the need for personal protective equipment.

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#### Personal protective equipment

#### Respiratory protection:

Wear respiratory protection if ventilation is inadequate. Wear a NIOSH-certified (or equivalent) TC23C Chemical/Mechanical type filter system to remove a combination of particles, gas and vapours.

#### Hand protection:

Chemical resistant protective gloves

#### Eye protection:

Safety glasses with side-shields (frame goggles) (e.g. EN 166)

## **Body protection:**

Body protection must be chosen depending on activity and possible exposure, e.g. head protection, apron, protective boots, chemical-protection suit.

### General safety and hygiene measures:

Avoid inhalation of dust. Wash soiled clothing immediately.

## 9. Physical and Chemical Properties

Form: low dusting fine granules

Odour: smoky

Odour threshold: No data available. Colour: grey-brown

(10 g/l, 20 °C) pH value: approx. 6.1 Melting point: not applicable

Boiling point: not applicable, The product is a non-volatile

solid.

not applicable

dispersible

Vapour pressure: negligible

(OECD Guideline 109) Density: 1.676 g/cm3 (20°C) (20°C) (OECD Guideline 109) Relative density: 1.676

Bulk density: approx. 615 - 702

kg/m3

Partitioning coefficient

n-octanol/water (log Pow):

Particle size: D10 1.1 µm D50 5.2 µm

D90 16.9 µm

Solubility in water: Molar mass:

387.83 g/mol

## 10. Stability and Reactivity

## **Dust explosion class:**

Dust explosion class 1 (Kst-value >0 up to 200 bar m s-1) (St 1)

#### Substances to avoid:

strong oxidizing agents

#### Hazardous reactions:

No hazardous reactions if stored and handled as prescribed/indicated.

### **Decomposition products:**

No hazardous decomposition products if stored and handled as prescribed/indicated., Prolonged thermal loading can result in products of degradation being given off.

#### Thermal decomposition:

Possible thermal decomposition products:

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carbon monoxide, carbon dioxide, nitrogen oxide, nitrogen dioxide, ammonia, Hydrogen chloride, halogenated hydrocarbons, Hydrocarbons

Stable at ambient temperature. If product is heated above decomposition temperature toxic vapours may be released.

#### Corrosion to metals:

Corrosive effects to metal are not anticipated.

#### Oxidizing properties:

Based on its structural properties the product is not classified as oxidizing. (Directive 92/69/EEC, A.17)

## 11. Toxicological information

#### **Acute toxicity**

Oral:

Type of value: LD50

Species: rat

Value: > 2,000 mg/kg

Type of value: LD50 Species: rat (male/female)

Value: > 2,000 mg/kg (OECD Guideline 401)

Inhalation:

Type of value: LC50 Species: rat Value: 4.7 mg/l Exposure time: 4 h

Type of value: LC50 Species: rat Value: 18.8 mg/l Exposure time: 1 h

Dermal:

Type of value: LD50

Species: rat

Value: > 2,000 mg/kg

#### Irritation / corrosion

Skin:

Species: rabbit Result: non-irritant

Method: OECD Guideline 404

Species: rabbit

Result: Slightly irritating.

Method: Primary skin irritation test

Eye:

Species: rabbit Result: non-irritant

Method: OECD Guideline 405

Sensitization:

Buehler test

Species: guinea pig

Result: Skin sensitizing effects were not observed in animal studies.

Method: OECD Guideline 406

## **Genetic toxicity**

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Information on: pyraclostrobin

No mutagenic effect was found in various tests with microorganisms and mammalian cell culture.

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## 12. Ecological Information

#### **Fish**

Acute:

OECD Guideline 203 static

Cyprinus carpio/LC50 (96 h): 0.25 mg/l

#### **Aquatic invertebrates**

Acute:

OECD Guideline 202, part 1 static

Daphnia magna/EC50 (48 h): 0.0382 mg/l

## **Aquatic plants**

Toxicity to aquatic plants:

OECD Guideline 201 green algae/EC50 (72 h): 17.39 mg/l

OECD Guideline 201 green algae/EC50 (72 h): 1.4 mg/l

#### Degradability / Persistence Biological / Abiological Degradation

Evaluation: Not readily biodegradable (by OECD criteria).

## 13. Disposal considerations

## Waste disposal of substance:

See product label for disposal and recycling instructions.

## 14. Transport Information

## Land transport

TDG

Not classified as a dangerous good under transport regulations

## Sea transport

**IMDG** 

Hazard class: 9
Packing group: III
ID number: UN 3077
Hazard label: 9, EHSM
Marine pollutant: YES

Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S.

(contains PYRACLOSTROBIN 20%)

## Air transport

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IATA/ICAO

Hazard class: 9
Packing group: III
ID number: UN 3077
Hazard label: 9, EHSM

Proper shipping name: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, SOLID, N.O.S.

(contains PYRACLOSTROBIN 20%)

## 15. Regulatory Information

#### **Federal Regulations**

Registration status:

Chemical DSL, CA released; restriction on quantity / not listed

Crop Protection DSL, CA released / exempt

WHMIS does not apply to this product.

THIS PRODUCT HAS BEEN CLASSIFIED IN ACCORDANCE WITH THE HAZARD CRITERIA OF THE CPR AND THE MSDS CONTAINS ALL THE INFORMATION REQUIRED BY THE CPR.

#### 16. Other Information

Recommended use: fungicide

We support worldwide Responsible Care® initiatives. We value the health and safety of our employees, customers, suppliers and neighbors, and the protection of the environment. Our commitment to Responsible Care is integral to conducting our business and operating our facilities in a safe and environmentally responsible fashion, supporting our customers and suppliers in ensuring the safe and environmentally sound handling of our products, and minimizing the impact of our operations on society and the environment during production, storage, transport, use and disposal of our products.

#### MSDS Prepared by:

BASF NA Product Regulations msds@basf.com BASF HOTLINE (800) 454 – COPE (2673) MSDS Prepared on: 2011/11/18

**END OF DATA SHEET**