

**Safety Data Sheet**

according to UK REACH Regulation

**Thidiazuron**

Revision date: 27.02.2024

Product code: PS149

Page 1 of 7

**SECTION 1: Identification of the substance/mixture and of the company/undertaking****1.1. Product identifier**

Thidiazuron

**Further trade names**

1-Phenyl-3-[1,2,3]thiadiazol-5-yl-urea

CAS No: 51707-55-2

**1.2. Relevant identified uses of the substance or mixture and uses advised against****Use of the substance/mixture**

Reference standard for analysis.

**1.3. Details of the supplier of the safety data sheet**

Company name: WITEGA Laboratorien Berlin-Adlershof GmbH

Street: James-Franck-Strasse 4

Place: D-12489 Berlin

Telephone: +493063922001 Telefax: +493063922007

e-mail: witega@witega.de

Internet: www.witega.de

**1.4. Emergency telephone number:** +493063922001**SECTION 2: Hazards identification****2.1. Classification of the substance or mixture****GB CLP Regulation**

Skin Irrit. 2; H315

Eye Irrit. 2A; H319

STOT SE 3; H335

Aquatic Acute 1; H400

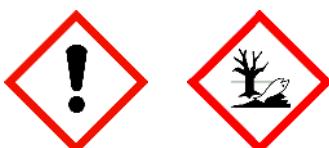
Aquatic Chronic 1; H410

Full text of hazard statements: see SECTION 16.

**2.2. Label elements****GB CLP Regulation**

Signal word: Warning

Pictograms:

**Hazard statements**

H315 Causes skin irritation.

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.

**Precautionary statements**

P281 Use personal protective equipment as required.

P262 Do not get in eyes, on skin, or on clothing.

P261 Avoid breathing dust/fume/gas/mist/vapours/spray.

P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

## Safety Data Sheet

according to UK REACH Regulation

### Thidiazuron

Revision date: 27.02.2024

Product code: PS149

Page 2 of 7

#### **2.3. Other hazards**

No data available

### SECTION 3: Composition/information on ingredients

#### **3.1. Substances**

Sum formula:	C9H8N4OS
Molecular weight:	220.25 g/mol

#### **Hazardous components**

CAS No	Chemical name			Quantity
	EC No	Index No	REACH No	
	Classification (GB CLP Regulation)			
51707-55-2	Thidiazuron			100 %
	Skin Irrit. 2, Eye Irrit. 2A, STOT SE 3, Aquatic Acute 1, Aquatic Chronic 1; H315 H319 H335 H400 H410			

Full text of H and EUH statements: see section 16.

#### **Specific Conc. Limits, M-factors and ATE**

CAS No	EC No	Chemical name	Quantity
	Specific Conc. Limits, M-factors and ATE		
51707-55-2	Thidiazuron		100 %
	inhalation: LC50 = >2.3 mg/l (dusts or mists); dermal: LD50 = >1000 mg/kg; oral: LD50 = 5350 mg/kg		

### SECTION 4: First aid measures

#### **4.1. Description of first aid measures**

##### **General information**

In case of accident or unwellness, seek medical advice immediately (show directions for use or safety data sheet if possible).

##### **After inhalation**

Remove casualty to fresh air and keep warm and at rest. If breathing is irregular or stopped, administer artificial respiration.

##### **After contact with skin**

Remove contaminated, saturated clothing immediately. Subsequently wash off with: Water and soap

##### **After contact with eyes**

In case of contact with eyes flush immediately with plenty of flowing water for 10 to 15 minutes holding eyelids apart and consult an ophthalmologist.

##### **After ingestion**

Rinse mouth immediately and drink plenty of water. Get immediate medical advice/attention.

Do NOT induce vomiting. Never give anything by mouth to an unconscious person or a person with cramps.

#### **4.2. Most important symptoms and effects, both acute and delayed**

No data available

#### **4.3. Indication of any immediate medical attention and special treatment needed**

No data available

### SECTION 5: Firefighting measures

#### **5.1. Extinguishing media**

##### **Suitable extinguishing media**

Water spray jet. Foam. Dry extinguishing powder. Carbon dioxide (CO<sub>2</sub>).

## Safety Data Sheet

according to UK REACH Regulation

### Thidiazuron

Revision date: 27.02.2024

Product code: PS149

Page 3 of 7

#### **5.2. Special hazards arising from the substance or mixture**

In case of fire may be liberated: Pyrolysis products, toxic. In case of fire and/or explosion do not breathe fumes.

#### **5.3. Advice for firefighters**

In case of fire: Wear self-contained breathing apparatus.

## SECTION 6: Accidental release measures

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

##### **General advice**

Use personal protection equipment. Do not breathe gas/fumes/vapour/spray.

#### **6.2. Environmental precautions**

Do not allow to enter into surface water or drains.

#### **6.3. Methods and material for containment and cleaning up**

##### **Other information**

Take up dust-free and set down dust-free.

#### **6.4. Reference to other sections**

Disposal: see section 13

## SECTION 7: Handling and storage

#### **7.1. Precautions for safe handling**

##### **Advice on safe handling**

If handled uncovered, arrangements with local exhaust ventilation should be used if possible.

##### **Advice on protection against fire and explosion**

Keep away from sources of ignition - No smoking. Take precautionary measures against static discharges.

##### **Advice on general occupational hygiene**

Use personal protection equipment.

#### **7.2. Conditions for safe storage, including any incompatibilities**

##### **Requirements for storage rooms and vessels**

Keep container tightly closed in a cool, well-ventilated place. Avoid: UV-radiation/sunlight

##### **Further information on storage conditions**

storage temperature: 2-8°C

#### **7.3. Specific end use(s)**

none

## SECTION 8: Exposure controls/personal protection

#### **8.1. Control parameters**

#### **8.2. Exposure controls**

##### **Appropriate engineering controls**

If handled uncovered, arrangements with local exhaust ventilation should be used if possible. If local exhaust ventilation is not possible or not sufficient, the entire working area should be ventilated by technical means.

##### **Individual protection measures, such as personal protective equipment**

##### **Eye/face protection**

Eye glasses with side protection

##### **Hand protection**

Wear suitable gloves. The quality of the protective gloves resistant to chemicals must be chosen as a function of the specific working place concentration and quantity of hazardous substances.

##### **Skin protection**

lab coat

**Safety Data Sheet**

according to UK REACH Regulation

**Thidiazuron**

Revision date: 27.02.2024

Product code: PS149

Page 4 of 7

**Respiratory protection**

In case of inadequate ventilation wear respiratory protection.

**SECTION 9: Physical and chemical properties****9.1. Information on basic physical and chemical properties**

Physical state:	solid
Colour:	brown
Odour:	odourless
Melting point/freezing point:	215 (decomp.) °C
Boiling point or initial boiling point and boiling range:	No data available
Flammability:	No data available
Lower explosion limits:	No data available
Upper explosion limits:	No data available
Flash point:	No data available
Auto-ignition temperature:	No data available
Decomposition temperature:	No data available
pH-Value:	No data available
Water solubility:	No data available
Solubility in other solvents	
No data available	
Partition coefficient n-octanol/water:	No data available
Vapour pressure:	No data available
Density:	No data available
Relative vapour density:	No data available

**9.2. Other information****Information with regard to physical hazard classes**

Explosive properties	
No data available	
Self-ignition temperature	
Solid:	No data available
Gas:	No data available

**Oxidizing properties**

No data available

**Other safety characteristics**

Evaporation rate:	No data available
-------------------	-------------------

**Further Information**

none

**SECTION 10: Stability and reactivity****10.1. Reactivity**

Reacts with : Oxidising agent, Alkali (lye), Etchant and acids

**10.2. Chemical stability**

The product is chemically stable under recommended conditions of storage, use and temperature.

**10.3. Possibility of hazardous reactions**

No known hazardous reactions.

**10.4. Conditions to avoid**

Do not expose to temperatures exceeding 50 °C/122 °F.

## Safety Data Sheet

according to UK REACH Regulation

### Thidiazuron

Revision date: 27.02.2024

Product code: PS149

Page 5 of 7

#### **10.5. Incompatible materials**

Oxidising agent, Alkali (lye), Etchant and acids

#### **10.6. Hazardous decomposition products**

In case of fire may be liberated: Pyrolysis products, toxic.

## SECTION 11: Toxicological information

#### **11.1. Information on hazard classes as defined in GB CLP Regulation**

##### **Acute toxicity**

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

CAS No	Chemical name				
	Exposure route	Dose	Species	Source	Method
51707-55-2	Thidiazuron				
	oral	LD50 mg/kg	5350 Rat		
	dermal	LD50 mg/kg	>1000 Rabbit		
	inhalation (4 h) dust/mist	LC50	>2.3 mg/l Rat		

##### **Irritation and corrosivity**

Causes skin irritation.

Causes serious eye irritation.

##### **Sensitising effects**

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

##### **Carcinogenic/mutagenic/toxic effects for reproduction**

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

##### **STOT-single exposure**

May cause respiratory irritation. (Thidiazuron)

##### **STOT-repeated exposure**

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

##### **Aspiration hazard**

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

##### **Specific effects in experiment on an animal**

No data available

## SECTION 12: Ecological information

#### **12.1. Toxicity**

No data available

#### **12.2. Persistence and degradability**

No data available

#### **12.3. Bioaccumulative potential**

No indication of bioaccumulation potential.

#### **12.4. Mobility in soil**

No data available

#### **12.5. Results of PBT and vPvB assessment**

This substance does not meet the PBT/vPvB criteria of UK REACH.

This substance does not meet the PBT/vPvB criteria of REACH, Annex XIII.

**Safety Data Sheet**

according to UK REACH Regulation

**Thidiazuron**

Revision date: 27.02.2024

Product code: PS149

Page 6 of 7

**12.6. Endocrine disrupting properties**

This substance does not have endocrine disrupting properties with respect to non-target organisms.

**12.7. Other adverse effects**

No data available

**SECTION 13: Disposal considerations****13.1. Waste treatment methods****Disposal recommendations**

Dispose of waste according to applicable legislation.  
Do not allow to enter into surface water or drains. Do not allow to enter into soil/subsoil.

**Contaminated packaging**

This material and its container must be disposed of as hazardous waste.

**SECTION 14: Transport information****Land transport (ADR/RID)**

**14.2. UN proper shipping name:** No dangerous good in sense of this transport regulation.

**Inland waterways transport (ADN)**

**14.2. UN proper shipping name:** No dangerous good in sense of this transport regulation.

**Marine transport (IMDG)**

**14.2. UN proper shipping name:** No dangerous good in sense of this transport regulation.

**Air transport (ICAO-TI/IATA-DGR)**

**14.2. UN proper shipping name:** No dangerous good in sense of this transport regulation.

**14.5. Environmental hazards**

ENVIRONMENTALLY HAZARDOUS: No

**14.6. Special precautions for user**

No data available

**14.7. Maritime transport in bulk according to IMO instruments**

No dangerous good in sense of this transport regulation.

**SECTION 15: Regulatory information****15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture****National regulatory information**

Employment restrictions: Observe restrictions to employment for juveniles according to the 'juvenile work protection guideline' (94/33/EC). Observe employment restrictions under the Maternity Protection Directive (92/85/EEC) for expectant or nursing mothers.

Water hazard class (D): 3 - highly hazardous to water

**15.2. Chemical safety assessment**

For this substance a chemical safety assessment has not been carried out.

**SECTION 16: Other information****Relevant H and EUH statements (number and full text)**

H315	Causes skin irritation.
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.

## Safety Data Sheet

according to UK REACH Regulation

### Thidiazuron

Revision date: 27.02.2024

Product code: PS149

Page 7 of 7

#### Further Information

This information is based on our present state of knowledge. However, it should not constitute a guarantee for any specific product properties and shall not establish a legally valid relationship. The substances are only for R&D. Do not use as a drug, in household or other applications.