



SOCRATES

Safety Data Sheet

according to the REACH Regulation (EC) 1907/2006 amended by Regulation (EU) 2020/878
Issue date: 10/09/2024

Version: 1.0/EL (eng)

SECTION 1: Identification of the substance/mixture and of the company/undertaking

1.1. Product identifier

Trade name : SOCRATES
Name : Sulcotrione 30% SC
Product code : SHA 9300 A
Registration number : 70551

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

Relevant identified uses

Main use category : Herbicide

1.3. Details of the supplier of the safety data sheet

Sharda Cropchem Ltd.
2nd Floor, Prime Business Park, Dashrathlaj Joshi Road, Vile Parle (West)
400056 Mumbai
India
T + 91 22 6261 5615 , F + 91 22 6678 2828
reg@shardaintl.com

1.4. Emergency telephone number

Emergency number : 112

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification according to Regulation (EC) No. 1272/2008 [CLP]

Serious eye damage/eye irritation, Category 2	H319
Reproductive toxicity, Category 2	H361d
Specific target organ toxicity – Repeated exposure, Category 2	H373
Hazardous to the aquatic environment – Acute Hazard, Category 1	H400
Hazardous to the aquatic environment – Chronic Hazard, Category 1	H410

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

Adverse physicochemical, human health and environmental effects

No additional information available

2.2. Label elements

Labelling according to Regulation (EC) No. 1272/2008 [CLP]

Hazard pictograms (CLP) :



GHS07

GHS08

GHS09

Signal word (CLP) :

Warning

Contains :

sulcotrione (ISO); 2-[2-chloro-4-(methylsulfonyl)benzoyl]cyclohexane-1,3-dione

Hazard statements (CLP) :

H319 - Causes serious eye irritation.
H361d - Suspected of damaging the unborn child.
H373 - May cause damage to organs (kidneys) through prolonged or repeated exposure.
H410 - Very toxic to aquatic life with long lasting effects.
Precautionary statements (CLP) :

P405+P102 - Store locked up. Keep out of reach of children.
P201 - Obtain special instructions before use.
P260 - Do not breathe dust/fume/gas/mist/vapours/ spray.
P270 - Do not eat, drink or smoke when using this product.

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EUH-statements	<p>P280 - Wear protective gloves/protective clothing/eye protection/face protection/hearing protection.</p> <p>P305+P351+P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.</p> <p>P308+P313 - IF exposed or concerned: Get medical advice/ attention.</p> <p>P314 - Get medical advice/attention if you feel unwell.</p> <p>P337+P313 - If eye irritation persists: Get medical advice/attention.</p> <p>P501 - Dispose of contents/container to hazardous or special waste collection point, in accordance with local, regional, national and/or international regulation.</p> <p>: EUH401 - To avoid risks to human health and the environment, comply with the instructions for use.</p>
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2.3. Other hazards

Contains no PBT and/or vPvB substances $\geq 0.1\%$ assessed in accordance with REACH Annex XIII

The substance is not included in the list established in accordance with Article 59(1) of REACH for having endocrine disrupting properties, or is not identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Name	Product identifier	%	Classification according to Regulation (EC) No. 1272/2008 [CLP]
sulcotrione (ISO); 2-[2-chloro-4-(methylsulfonyl)benzoyl]cyclohexane-1,3-dione	CAS-No.: 99105-77-8 EC Index-No.: 606-145-00-1	26.24	Repr. 2, H361d STOT RE 2, H373 Skin Sens. 1A, H317 Aquatic Acute 1, H400 Aquatic Chronic 1, H410 (M=10)

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

SECTION 4: First aid measures

4.1. Description of first aid measures

First-aid measures general	: Never give anything by mouth to an unconscious person. If you feel unwell, seek medical advice (show the label where possible).
First-aid measures after inhalation	: Move the affected person away from the contaminated area and into the fresh air. If not breathing, give artificial respiration. Call a doctor.
First-aid measures after skin contact	: Remove contaminated clothes. After contact with skin, wash immediately and thoroughly with water and soap.
First-aid measures after eye contact	: Wash with plenty of water (during 20 minutes minimum) with eyes wide open after taking off soft contact lenses and immediately take medical advice.
First-aid measures after ingestion	: Rinse mouth. Immediately call a POISON CENTER/doctor.

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

No additional information available

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

No additional information available

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media : Water spray. Dry powder. Foam. Carbon dioxide.

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5.2. Special hazards arising from the substance or mixture

- Fire hazard : In case of fire and/or explosion do not breathe fumes.
Reactivity in case of fire : Product is not explosive.
Hazardous decomposition products in case of fire : Carbon monoxide. Nitrogen oxides. Carbon dioxide. Toxic fumes may be released.

5.3. Advice for firefighters

- Precautionary measures fire : Keep container tightly closed and away from heat, sparks and flame. Keep away from combustible materials.
Firefighting instructions : Appropriate self-contained breathing apparatus may be required. Get the package away from the fire if this can be done without risk. Prevent fire fighting water from entering the environment.
Protection during firefighting : Wear fire/flame resistant/retardant clothing. Do not enter fire area without proper protective equipment, including respiratory protection.
Other information : Do not allow material to contaminate surface water system.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

For non-emergency personnel

- Protective equipment : Wear suitable protective clothing, gloves and eye or face protection. Chemical resistant gloves (according to European standard NF ISO 374-1 or equivalent). ISO 16321-1. Wear eye protection. Personal protective equipment. EN ISO 20345.
Emergency procedures : Evacuate personnel to a safe area.

For emergency responders

- Protective equipment : Wear suitable hand, body and head protection.

6.2. Environmental precautions

Danger of pollution of drinking water when product enters the soil. Do not allow run-off from fire fighting to enter drains or water courses. Notify authorities if liquid enters sewers or public waters.

6.3. Methods and material for containment and cleaning up

- For containment : Label the container and provide warning statements to prevent any contact.
Methods for cleaning up : Soak up with inert absorbent material (for example sand, sawdust, a universal binder, silica gel). Clean spills promptly. Wash contaminated area with large amounts of water.

6.4. Reference to other sections

No additional information available

SECTION 7: Handling and storage

7.1. Precautions for safe handling

- Additional hazards when processed : Do not allow run-off from fire fighting to enter drains or water courses. Do not contaminate water with the product or its container (Do not clean application equipment near surface water/Avoid contamination via drains from farmyards and roads).
Precautions for safe handling : Avoid contact with skin and eyes. Do not eat, drink or smoke in areas where product is used. Wash hands and other exposed areas with mild soap and water before eating, drinking or smoking and when leaving work. Remove contaminated clothing and shoes. Wash clothing and equipment after handling.

7.2. Conditions for safe storage, including any incompatibilities

- Technical measures : Ensure adequate ventilation, especially in confined areas. Store locked up.
Storage conditions : Keep only in original container. Store in a dry place. Store in a closed container. Store in a well-ventilated place. Protect from sunlight.
Storage temperature : 0 – 30 °C

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Packaging materials : Keep only in the original container in a cool, well-ventilated place away from combustible materials.

7.3. Specific end use(s)

No additional information available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

National occupational exposure and biological limit values

Quartz (14808-60-7)

EU - Indicative Occupational Exposure Limit (IOEL)

Local name	Silica crystalline (Quartz)
Remark	SCOEL Recommendations (2003)

magnesium oxide (1309-48-4)

Greece - Occupational Exposure Limits

Local name	Μαγνησίου, οξειδίο του
OEL TWA	10 mg/m ³ εισπν. 5 mg/m ³ αναπν.
Regulatory reference	Π.Δ. 90/1999 - Προστασία της υγείας των εργαζομένων που εκτίθενται σε ορισμένους χημικούς παράγοντες κατά τη διάρκεια της εργασίας τους

sodium hydroxide; caustic soda (1310-73-2)

Greece - Occupational Exposure Limits

Local name	Υδροξείδιο του νατρίου
OEL TWA	2 mg/m ³
OEL STEL	2 mg/m ³
Regulatory reference	Π.Δ. 90/1999 - Προστασία της υγείας των εργαζομένων που εκτίθενται σε ορισμένους χημικούς παράγοντες κατά τη διάρκεια της εργασίας τους

8.2. Exposure controls

Personal protection equipment

Personal protective equipment symbol(s):



Eye and face protection

Eye protection:

ISO 16321-1. Eye protection, including both chemical splash goggles and face shield, must be worn when possibility exists for eye contact due to spraying liquid or airborne particles

Skin protection

Skin and body protection:

Long sleeved protective clothing

Hand protection:

Chemical resistant gloves (according to European standard NF ISO 374-1 or equivalent)

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Respiratory protection

Respiratory protection:

Extra personal protection: P2 filter respirator for harmful particles. Extra personal protection: P3 filter respirator for toxic particles

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	: Liquid
Colour	: brown.
Odour	: characteristic.
Odour threshold	: Not available
Melting point	: Not available
Freezing point	: Not available
Boiling point	: Not available
Flammability	: Not available
Explosive properties	: Not explosive.
Oxidising properties	: Not oxidising.
Lower explosion limit	: Not available
Upper explosion limit	: Not available
Flash point	: 115 °C
Auto-ignition temperature	: 410 °C
Decomposition temperature	: Not available
pH	: 1.5-3.5
Viscosity, kinematic	: Not available
Viscosity, dynamic	: 163 – 1150 cP (20 °C, 100 - 2.5 rpm)
Solubility	: Not available
Partition coefficient n-octanol/water (Log Kow)	: Not available
Vapour pressure	: Not available
Vapour pressure at 50°C	: Not available
Density	: Not available
Relative density	: 1.1434 (20 °C)
Relative vapour density at 20°C	: Not available
Particle characteristics	: Not applicable

9.2. Other information

No additional information available

SECTION 10: Stability and reactivity

10.1. Reactivity

Stable under normal conditions of use.

10.2. Chemical stability

The product is stable at normal handling and storage conditions.

10.3. Possibility of hazardous reactions

Stable under normal conditions of use.

10.4. Conditions to avoid

Heat. High temperature. Open flame. Direct sunlight.

10.5. Incompatible materials

No additional information available

10.6. Hazardous decomposition products

Under normal conditions of storage and use, hazardous decomposition products should not be produced.

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SECTION 11: Toxicological information

11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008

Acute toxicity (oral)	: Not classified
Acute toxicity (dermal)	: Not classified
Acute toxicity (inhalation)	: Not classified

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LD50 oral rat	5000 mg/kg bodyweight
LD50 dermal rat	> 2000 mg/kg bodyweight
LC50 Inhalation - Rat	> 3.25 Maximum attainable concentration

Skin corrosion/irritation	: Not irritating
Serious eye damage/irritation	: Causes serious eye irritation.
Respiratory or skin sensitisation	: This product does not cause skin sensitization
Germ cell mutagenicity	: Not classified
Carcinogenicity	: Not classified
Reproductive toxicity	: Suspected of damaging the unborn child.
STOT-single exposure	: Not classified
STOT-repeated exposure	: May cause damage to organs (kidneys) through prolonged or repeated exposure.
Aspiration hazard	: Not classified

11.2. Information on other hazards

The substance is not included in the list established in accordance with Article 59(1) of REACH for having endocrine disrupting properties, or is not identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605

SECTION 12: Ecological information

12.1. Toxicity

Hazardous to the aquatic environment, short-term (acute)	: Very toxic to aquatic life.
Hazardous to the aquatic environment, long-term (chronic)	: Very toxic to aquatic life with long lasting effects.

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ErC50 algae	1.788 mg/l (72 h, <i>Pseudokirchneriella subcapitata</i>)
ErC50 other aquatic plants	0.328 mg/l (7 d, <i>Lemna gibba</i>)

12.2. Persistence and degradability

sulcotrione (ISO); 2-[2-chloro-4-(methylsulfonyl)benzoyl]cyclohexane-1,3-dione (99105-77-8)

Persistence and degradability	Rapidly degradable
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12.3. Bioaccumulative potential

sulcotrione (ISO); 2-[2-chloro-4-(methylsulfonyl)benzoyl]cyclohexane-1,3-dione (99105-77-8)

Partition coefficient n-octanol/water (Log Pow)	-1.7 (pH 7, 20 °C)
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12.4. Mobility in soil

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Surface tension	38.1 mN/m (20 °C)

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12.5. Results of PBT and vPvB assessment

No additional information available

12.6. Endocrine disrupting properties

Adverse effects on the environment caused by endocrine disrupting properties : No specific data.

12.7. Other adverse effects

No additional information available

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Regional waste regulation : Disposal must be done according to official regulations.
 Product/Packaging disposal recommendations : Avoid release to the environment. Disposal must be done according to official regulations. Do not dispose of the packaging without first carrying out the necessary cleaning. Refer to manufacturer/supplier for information on recovery/recycling.

SECTION 14: Transport information

In accordance with ADR / IMDG / IATA / ADN / RID

ADR	IMDG	IATA	ADN	RID
14.1. UN number or ID number				
UN 3082	UN 3082	UN 3082	UN 3082	UN 3082
14.2. UN proper shipping name				
ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Sulcotrione)	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Sulcotrione)	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Sulcotrione)	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Sulcotrione)	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Sulcotrione)
Transport document description				
UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S., 9, III, (-)	UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S., 9, III, MARINE POLLUTANT	UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S., 9, III	UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S., 9, III	UN 3082 ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S., 9, III
14.3. Transport hazard class(es)				
9	9	9	9	9
14.4. Packing group				
III	III	III	III	III

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ADR	IMDG	IATA	ADN	RID
14.5. Environmental hazards				
Dangerous for the environment: Yes	Dangerous for the environment: Yes Marine pollutant: Yes EmS-No. (Fire): F-A EmS-No. (Spillage): S-F	Dangerous for the environment: Yes	Dangerous for the environment: Yes	Dangerous for the environment: Yes
No supplementary information available				

14.6. Special precautions for user

Overland transport

Classification code (ADR)	: M6
Special provisions (ADR)	: 274, 335, 375, 601
Limited quantities (ADR)	: 5I
Excepted quantities (ADR)	: E1
Packing instructions (ADR)	: P001, IBC03, LP01, R001
Special packing provisions (ADR)	: PP1
Mixed packing provisions (ADR)	: MP19
Portable tank and bulk container instructions (ADR)	: T4
Portable tank and bulk container special provisions (ADR)	: TP1, TP29
Tank code (ADR)	: LGBV
Vehicle for tank carriage	: AT
Transport category (ADR)	: 3
Special provisions for carriage - Packages (ADR)	: V12
Special provisions for carriage - Loading, unloading and handling (ADR)	: CV13
Hazard identification number (Kemler No.)	: 90
Orange plates	: 
Tunnel restriction code (ADR)	: -

Transport by sea

Special provisions (IMDG)	: 274, 335, 969
Limited quantities (IMDG)	: 5 L
Excepted quantities (IMDG)	: E1
Packing instructions (IMDG)	: LP01, P001
Special packing provisions (IMDG)	: PP1
IBC packing instructions (IMDG)	: IBC03
Tank instructions (IMDG)	: T4
Tank special provisions (IMDG)	: TP2, TP29
Stowage category (IMDG)	: A

Air transport

PCA Excepted quantities (IATA)	: E1
PCA Limited quantities (IATA)	: Y964
PCA limited quantity max net quantity (IATA)	: 30kgG
PCA packing instructions (IATA)	: 964
PCA max net quantity (IATA)	: 450L
CAO packing instructions (IATA)	: 964
CAO max net quantity (IATA)	: 450L
Special provisions (IATA)	: A97, A158, A197
ERG code (IATA)	: 9L

Inland waterway transport

Classification code (ADN)	: M6
Special provisions (ADN)	: 274, 335, 375, 601

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Limited quantities (ADN)	: 5 L
Excepted quantities (ADN)	: E1
Carriage permitted (ADN)	: T
Equipment required (ADN)	: PP
Number of blue cones/lights (ADN)	: 0

Rail transport

Classification code (RID)	: M6
Special provisions (RID)	: 274, 335, 375, 601
Limited quantities (RID)	: 5L
Excepted quantities (RID)	: E1
Packing instructions (RID)	: P001, IBC03, LP01, R001
Special packing provisions (RID)	: PP1
Mixed packing provisions (RID)	: MP19
Portable tank and bulk container instructions (RID)	: T4
Portable tank and bulk container special provisions (RID)	: TP1, TP29
Tank codes for RID tanks (RID)	: LGBV
Transport category (RID)	: 3
Special provisions for carriage – Packages (RID)	: W12
Special provisions for carriage - Loading, unloading and handling (RID)	: CW13, CW31
Colis express (express parcels) (RID)	: CE8
Hazard identification number (RID)	: 90

14.7. Maritime transport in bulk according to IMO instruments

Not applicable

SECTION 15: Regulatory information

15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture

EU-Regulations

Other information, restriction and prohibition regulations : according to Regulation (EU) 2020/878.

REACH Annex XVII (Restriction List)

Contains no substance(s) listed on REACH Annex XVII (Restriction Conditions)

REACH Annex XIV (Authorisation List)

Contains no substance(s) listed on REACH Annex XIV (Authorisation List)

REACH Candidate List (SVHC)

Contains no substance(s) listed on the REACH Candidate List

PIC Regulation (Prior Informed Consent)

Contains no substance(s) listed on the PIC list (Regulation EU 649/2012 concerning the export and import of hazardous chemicals)

POP Regulation (Persistent Organic Pollutants)

Contains no substance(s) listed on the POP list (Regulation EU 2019/1021 on persistent organic pollutants)

Ozone Regulation (1005/2009)

Contains no substance(s) listed on the Ozone Depletion list (Regulation EU 1005/2009 on substances that deplete the ozone layer)

Dual-Use Regulation (428/2009)

Contains no substance subject to the COUNCIL REGULATION (EC) No 428/2009 of 5 May 2009 setting up a Community regime for the control of exports, transfer, brokering and transit of dual-use items.

Explosives Precursors Regulation (2019/1148)

Contains no substance(s) listed on the Explosives Precursors list (Regulation EU 2019/1148 on the marketing and use of explosives precursors)

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Drug Precursors Regulation (273/2004)

Contains no substance(s) listed on the Drug Precursors list (Regulation EC 273/2004 on the manufacture and the placing on market of certain substances used in the illicit manufacture of narcotic drugs and psychotropic substances)

National regulations

Refer to protective measures listed in Sections 7 and 8

15.2. Chemical safety assessment

Refer to protective measures listed in Sections 7 and 8

SECTION 16: Other information

Full text of H- and EUH-statements:

Aquatic Acute 1	Hazardous to the aquatic environment – Acute Hazard, Category 1
Aquatic Chronic 1	Hazardous to the aquatic environment – Chronic Hazard, Category 1
EUH401	To avoid risks to human health and the environment, comply with the instructions for use.
H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H361d	Suspected of damaging the unborn child.
H373	May cause damage to organs through prolonged or repeated exposure.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
Repr. 2	Reproductive toxicity, Category 2
Skin Sens. 1A	Skin sensitisation, category 1A
STOT RE 2	Specific target organ toxicity – Repeated exposure, Category 2

Other data

Date of issue: 10/09/2024

Version: 1.0/EL(eng)

Replaces: -

Indication of changes: -

SDS EU (REACH Annex II)

This information is based on our current knowledge and is intended to describe the product for the purposes of health, safety and environmental requirements only. It should not therefore be construed as guaranteeing any specific property of the product.