

1/12

DECIS EC25 4X5L BOT IL

Version 6 / EU Revision Date: 22.02.2017 102000021192 Print Date: 23.03.2020

SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING

1.1 Product identifier

Trade name DECIS EC25 4X5L BOT IL

Product code (UVP) 79510829

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

Use Insecticide

1.3 Details of the supplier of the safety data sheet

Supplier Bayer AG

Kaiser-Wilhelm-Allee 1 51373 Leverkusen

Germany

Telefax +49(0)2173-38-7394

Responsible Department Substance Classification & Registration

+49(0)2173-38-3409 (during business hours only)

Email: BCS-SDS@bayer.com

1.4 Emergency telephone no.

Emergency telephone no. Global Incident Response Hotline (24h)

+1 (760) 476-3964 (Company 3E for Bayer AG, Crop Science Division)

SECTION 2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture

Classification in accordance with Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures, as amended.

Flammable liquids: Category 3

H226 Flammable liquid and vapour.

Acute toxicity: Category 4

H302 Harmful if swallowed.

Aspiration hazard: Category 1

H304 May be fatal if swallowed and enters airways.

Skin irritation: Category 2

H315 Causes skin irritation.

Skin sensitisation: Category 1B

H317 May cause an allergic skin reaction.

Serious eye damage: Category 1

H318 Causes serious eye damage.

Acute toxicity: Category 4

H332 Harmful if inhaled.

Specific target organ toxicity - single exposure: Category 3

H335 May cause respiratory irritation.



2/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017
Print Date: 23.03.2020

Specific target organ toxicity - single exposure: Category 3
H336 May cause drowsiness or dizziness.

Acute aquatic toxicity: Category 1

H400 Very toxic to aquatic life.

Chronic aquatic toxicity: Category 1

H410 Very toxic to aquatic life with long lasting effects.

2.2 Label elements

Labelling in accordance with Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures, as amended.

Hazard label for supply/use required.

Hazardous components which must be listed on the label:

- Deltamethrin
- Solvent Naphtha (petroleum), light aromatic











Signal word: Danger
Hazard statements

H226	Flammable liquid and vapour.
	r iarririable liquid aria tapeari

H302 Harmful if swallowed.

H304 May be fatal if swallowed and enters airways.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.

H318 Causes serious eye damage.

H332 Harmful if inhaled.

H335 May cause respiratory irritation.
H336 May cause drowsiness or dizziness.

H410 Very toxic to aquatic life with long lasting effects.

EUH401 To avoid risks to human health and the environment, comply with the instructions for

use.

Precautionary statements

P240 Ground/bond container and receiving equipment.

P280 Wear protective gloves/ protective clothing/ eye protection.

P305 + P351 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if

+ P338 present and easy to do. Continue rinsing.

P308 + P311 IF exposed or concerned: Call a POISON CENTER/ doctor/ physician.
P501 Dispose of contents/container in accordance with local regulation.

2.3 Other hazards

Cutaneous sensations may occur, such as burning or stinging on the face and mucosae. However, these sensations cause no lesions and are of a transitory nature (max. 24 hours).

SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS

3.2 Mixtures



3/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017

Print Date: 23.03.2020

Chemical nature

Emulsifiable concentrate (EC) Deltamethrin 25 g/l

Hazardous components

Hazard statements according to Regulation (EC) No. 1272/2008

Name	CAS-No./	Classification	Conc. [%]
	EC-No. / REACH Reg. No.	REGULATION (EC) No 1272/2008	
Deltamethrin	52918-63-5 258-256-6	Acute Tox. 3, H331 Aquatic Acute 1, H400 Acute Tox. 3, H301 Aquatic Chronic 1, H410	2,85
Tetrapropylene benzene sulfonate, calcium salt	11117-11-6 234-360-7	Acute Tox. 4, H312 Skin Irrit. 2, H315 Eye Dam. 1, H318 Aquatic Chronic 3, H412	> 1,00 - < 25,00
2-Methylpropan-1-ol	78-83-1 201-148-0	STOT SE 3, H336 Flam. Liq. 3, H226 STOT SE 3, H335 Skin Irrit. 2, H315 Eye Dam. 1, H318	> 1,00 - < 5,00
2,6-Di-tert-butyl-4- methylphenol	128-37-0 204-881-4 01-2119555270-46-xxxx	Aquatic Acute 1, H400 Aquatic Chronic 1, H410	> 0,10 - < 0,25
Solvent Naphtha (petroleum), light aromatic	64742-95-6 265-199-0 01-2119486773-24-xxxx	Flam. Liq. 3, H226 STOT SE 3, H336 STOT SE 3, H335 Asp. Tox. 1, H304 Aquatic Chronic 2, H411	> 25,00

Further information

Deltamethrin	52918-63-5	M-Factor: 1.000.000 (acute), 1.000.000 (chronic)
--------------	------------	--

For the full text of the H-Statements mentioned in this Section, see Section 16.

SECTION 4: FIRST AID MEASURES

4.1 Description of first aid measures

General advice Move out of dangerous area. Place and transport victim in stable

position (lying sideways). Remove contaminated clothing immediately

and dispose of safely.

Inhalation Move to fresh air. Keep patient warm and at rest. Call a physician or

poison control center immediately.

Skin contact Immediately wash with plenty of soap and water for at least 15

minutes. Warm water may increase the subjective severity of the irritation/paresthesia. This is not a sign of systemic poisoning. In case of skin irritation, application of oils or lotions containing vitamin E may

be considered. If symptoms persist, call a physician.



4/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017
Print Date: 23.03.2020

Eye contact Rinse immediately with plenty of water, also under the eyelids, for at

least 15 minutes. Remove contact lenses, if present, after the first 5 minutes, then continue rinsing eye. Warm water may increase the subjective severity of the irritation/paresthesia. This is not a sign of systemic poisoning. Apply soothing eye drops, if needed anaesthetic eye drops. Get medical attention if irritation develops and persists.

Ingestion Rinse out mouth and give water in small sips to drink. Do NOT induce

vomiting. Do not leave victim unattended. Call a physician or poison

control center immediately.

4.2 Most important symptoms and effects, both acute and delayed

Symptoms Local:, Skin and eye paraesthesia which may be severe, Usually

transient with resolution within 24 hours, Skin, eye and mucous

membrane irritation, Cough, Sneezing

Systemic:, discomfort in the chest, Tachycardia, Hypotension, Nausea, Abdominal pain, Diarrhoea, Vomiting, Blurred vision, Headache, anorexia, Somnolence, Coma, Convulsions, Tremors, Prostration, Airway hyperreaction, Pulmonary oedema, Palpitation, Muscular

fasciculation, Apathy, Dizziness

4.3 Indication of any immediate medical attention and special treatment needed

Risks This product contains a pyrethroid. Pyrethroid poisoning should not be

confused with carbamate or organophosphate poisoning.

Treatment Systemic treatment: Initial treatment: symptomatic. Monitor: respiratory

and cardiac functions. In case of ingestion gastric lavage should be considered in cases of significant ingestions only within the first 2 hours. However, the application of activated charcoal and sodium sulphate is always advisable. Keep respiratory tract clear. Oxygen or

artificial respiration if needed. In case of convulsions, a

benzodiazepine (e.g. diazepam) should be given according to standard

regimens. If not effective, phenobarbital may be used.

Contraindication: atropine. Contraindication: derivatives of adrenaline. There is no specific antidote. Recovery is spontaneous and without

sequelae.

In case of skin irritation, application of oils or lotions containing vitamin

E may be considered.

SECTION 5: FIREFIGHTING MEASURES

5.1 Extinguishing media

Suitable Use water spray, alcohol-resistant foam, dry chemical or carbon

dioxide.

Unsuitable High volume water jet



5/12

DECIS EC25 4X5L BOT IL

Version 6 / EU Revision Date: 22.02.2017 102000021192 Print Date: 23.03.2020

5.2 Special hazards arising

from the substance or mixture

5.3 Advice for firefighters

Special protective equipment for firefighters

Further information

Dangerous gases are evolved in the event of a fire.

In the event of fire and/or explosion do not breathe fumes. In the event

of fire, wear self-contained breathing apparatus.

Remove product from areas of fire, or otherwise cool containers with water in order to avoid pressure being built up due to heat. Whenever possible, contain fire-fighting water by diking area with sand or earth.

SECTION 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures

Precautions Keep people away from and upwind of spill/leak. Avoid contact with

spilled product or contaminated surfaces. When dealing with a

spillage do not eat, drink or smoke.

6.2 Environmental

precautions

Do not allow to get into surface water, drains and ground water.

6.3 Methods and materials for containment and cleaning up

Methods for cleaning upSoak up with inert absorbent material (e.g. sand, silica gel, acid

binder, universal binder, sawdust). Keep in suitable, closed containers for disposal. Clean floors and contaminated objects with plenty of

water.

Additional advice Check also for any local site procedures.

6.4 Reference to other

sections

Information regarding safe handling, see section 7.

Information regarding personal protective equipment, see section 8.

Information regarding waste disposal, see section 13.

SECTION 7: HANDLING AND STORAGE

7.1 Precautions for safe handling

Advice on safe handling No specific precautions required when handling unopened

packs/containers; follow relevant manual handling advice. Ensure

adequate ventilation.

Advice on protection against fire and explosion

Keep away from heat and sources of ignition. Vapours may form explosive mixture with air. Take measures to prevent the build up of

electrostatic charge. Use only explosion-proof equipment.

Hygiene measures When using, do not eat, drink or smoke. Remove soiled clothing

immediately and clean thoroughly before using again. Contaminated work clothing should not be allowed out of the workplace. Wash hands thoroughly with soap and water after handling and before eating, drinking, chewing gum, using tobacco, using the toilet or applying cosmetics. Wash hands immediately after work, if necessary take a

shower.



6/12

DECIS EC25 4X5L BOT IL

Version 6/EU Revision Date: 22.02.2017 102000021192 Print Date: 23.03.2020

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storage

Store in a place accessible by authorized persons only. Keep containers

areas and containers

tightly closed in a dry, cool and well-ventilated place. Protect from

freezing. Keep away from direct sunlight.

Advice on common storage

Keep away from food, drink and animal feedingstuffs.

Suitable materials

Black mild steel sheet with interior coating

Coextruded containers with an internal barrier layer made of ethylene

vinyl alcohol copolymer (EVOH)

7.3 Specific end use(s)

Refer to the label and/or leaflet.

SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION

8.1 Control parameters

Components	CAS-No.	Control parameters	Update	Basis
Deltamethrin	52918-63-5	0,02 mg/m3		OES BCS*
		(TWA)		

^{*}OES BCS: Internal Bayer AG, Crop Science Division "Occupational Exposure Standard"

8.2 Exposure controls

Personal protective equipment

In normal use and handling conditions please refer to the label and/or leaflet. In all other cases the following recommendations would apply.

Respiratory protection

Wear respirator with an organic vapours and gas filter mask (protection factor 10) conforming to EN140 type A or equivalent. Respiratory protection should only be used to control residual risk of short duration activities, when all reasonably practicable steps have been taken to reduce exposure at source e.g. containment and/or local extract ventilation. Always follow respirator manufacturer's instructions regarding wearing and maintenance.

Hand protection

Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. Also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion, and the

contact time.

Wash gloves when contaminated. Dispose of when contaminated inside, when perforated or when contamination on the outside cannot be removed. Wash hands frequently and always before eating,

drinking, smoking or using the toilet.

Material Nitrile rubber Rate of permeability > 480 min Glove thickness > 0.4 mmProtective index Class 6

Directive Protective gloves complying with EN

374.

Eye protection

Wear goggles (conforming to EN166, Field of Use = 5 or equivalent).

Skin and body protection

Wear standard coveralls and Category 3 Type 6 suit.

If there is a risk of significant exposure, consider a higher protective

type suit.



7/12

DECIS EC25 4X5L BOT IL

Version 6 / EU Revision Date: 22.02.2017 102000021192 Print Date: 23.03.2020

Wear two layers of clothing wherever possible. Polyester/cotton or cotton overalls should be worn under chemical protection suit and

should be professionally laundered frequently.

If chemical protection suit is splashed, sprayed or significantly contaminated, decontaminate as far as possible, then carefully

remove and dispose of as advised by manufacturer.

SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

Form Liquid, clear
Colour vellow

Colour yellow
Odour aromatic

pH 4,5 - 7,0 at 1 % (23 °C) (deionized water)

Flash point 48 °C

Ignition temperature > 450 °C

The data refer to solvent naphtha petroleum.

Upper explosion limit 7,00 %(V)

The data refer to solvent naphtha petroleum.

Lower explosion limit 0,8 %(V)

The data refer to solvent naphtha petroleum.

Relative vapour density 1,00

The data refer to solvent naphtha petroleum.

Density ca. 0,89 g/cm³ at 20 °C

Water solubility miscible

Partition coefficient: n-

octanol/water

Deltamethrin: log Pow: 6,4 at 25 °C

Solvent Naphtha (petroleum), light aromatic:

Not applicable

Viscosity, kinematic 1,09 mm²/s at 40 °C Surface tension 27,3 mN/m at 40 °C

9.2 Other information Further safety related physical-chemical data are not known.

SECTION 10: STABILITY AND REACTIVITY

10.1 Reactivity

Thermal decomposition Stable under normal conditions.

10.2 Chemical stability Stable under recommended storage conditions.

10.3 Possibility of No hazardous reactions when stored and handled according to

hazardous reactions prescribed instructions.



8/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017
Print Date: 23.03.2020

10.4 Conditions to avoid Extremes of temperature and direct sunlight.

10.5 Incompatible materials Store only in the original container.

10.6 Hazardous decomposition products

No decomposition products expected under normal conditions of use.

SECTION 11: TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects

Acute oral toxicity LD50 (Rat) 416 mg/kg
Acute inhalation toxicity LC50 (Rat) 2,69 mg/l

Exposure time: 4 h

Acute dermal toxicityLD50 (Rat) > 2.000 mg/kgSkin irritationIrritating to skin. (Rabbit)Eye irritationSevere eye irritation. (Rabbit)SensitisationNon-sensitizing. (Guinea pig)

OECD Test Guideline 406, Buehler test

Sensitising (Mouse)

OECD Test Guideline 429, local lymph node assay (LLNA)

Assessment STOT Specific target organ toxicity - single exposure

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

Solvent Naphtha (petroleum), light aromatic: May cause respiratory irritation., Solvent Naphtha (petroleum), light aromatic: May cause drowsiness or dizziness.

Assessment STOT Specific target organ toxicity – repeated exposure

Deltamethrin caused neurobehavioral effects and/or neuropathological changes in animal studies. The toxic effects of Deltamethrin are related to transient hyperactivity typical for pyrethroid neurotoxicity. Solvent Naphtha (petroleum), light aromatic: Based on available data, the classification criteria are not met.

Assessment mutagenicity

Deltamethrin was not mutagenic or genotoxic in a battery of in vitro and in vivo tests. Solvent Naphtha (petroleum), light aromatic is not considered mutagenic.

Assessment carcinogenicity

Deltamethrin was not carcinogenic in lifetime feeding studies in rats and mice.

Solvent Naphtha (petroleum), light aromatic: Based on available data, the classification criteria are not met.

Assessment toxicity to reproduction

Deltamethrin did not cause reproductive toxicity in a two-generation study in rats.

Solvent Naphtha (petroleum), light aromatic: Based on available data, the classification criteria are not met.

Assessment developmental toxicity

Deltamethrin caused developmental toxicity only at dose levels toxic to the dams. The developmental



9/12

DECIS EC25 4X5L BOT IL

 Version 6 / EU
 Revision Date: 22.02.2017

 102000021192
 Print Date: 23.03.2020

effects seen with Deltamethrin are related to maternal toxicity.

Solvent Naphtha (petroleum), light aromatic: This information is not available.

Aspiration hazard

May be fatal if swallowed and enters airways.

Further information

Cutaneous sensations may occur, such as burning or stinging on the face and mucosae. However, these sensations cause no lesions and are of a transitory nature (max. 24 hours).

The toxicological data refer to a similar formulation.

SECTION 12: ECOLOGICAL INFORMATION

12.1 Toxicity

Toxicity to fish LC50 (Oncorhynchus mykiss (rainbow trout)) 0,00912 mg/l

Exposure time: 96 h

Test conducted with a similar formulation.

Toxicity to aquatic

EC50 (Daphnia magna (Water flea)) 0,0039 mg/l Exposure time: 48 h

invertebrates

Test conducted with a similar formulation.

Exposure time: 96 h

Test conducted with a similar formulation.

12.2 Persistence and degradability

Biodegradability Deltamethrin:

Not rapidly biodegradable

Solvent Naphtha (petroleum), light aromatic:

rapidly biodegradable

Koc Deltamethrin: Koc: 10240000

12.3 Bioaccumulative potential

Bioaccumulation Deltamethrin: Bioconcentration factor (BCF) 1.400

Does not bioaccumulate.

Solvent Naphtha (petroleum), light aromatic:

No data available

12.4 Mobility in soil

Mobility in soil Deltamethrin: Immobile in soil

Solvent Naphtha (petroleum), light aromatic: Slightly mobile in soils

12.5 Results of PBT and vPvB assessment

PBT and vPvB assessment Deltamethrin: This substance is not considered to be persistent,

bioaccumulative and toxic (PBT). This substance is not considered to be

very persistent and very bioaccumulative (vPvB).

Solvent Naphtha (petroleum), light aromatic: This substance is not considered to be persistent, bioaccumulative and toxic (PBT). This

substance is not considered to be very persistent and very

bioaccumulative (vPvB).

12.6 Other adverse effects



10/12

DECIS EC25 4X5L BOT IL

 Version 6 / EU
 Revision Date: 22.02.2017

 102000021192
 Print Date: 23.03.2020

Additional ecological

information

No other effects to be mentioned.

SECTION 13: DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods

Product In accordance with current regulations and, if necessary, after

consultation with the site operator and/or with the responsible authority, the product may be taken to a waste disposal site or incineration plant.

Contaminated packaging Triple rinse containers.

Do not re-use empty containers.

Not completely emptied packagings should be disposed of as

hazardous waste.

Waste key for the unused

product

02 01 08* agrochemical waste containing dangerous substances

SECTION 14: TRANSPORT INFORMATION

ADR/RID/ADN

14.1 UN number 1993

14.2 Proper shipping name FLAMMABLE LIQUID, N.O.S.

(DELTAMETHRIN, SOLVENT NAPHTHA (PETROLEUM)

LIGHT AROMATIC SOLUTION)

14.3 Transport hazard class(es)314.4 Packing groupIII14.5 Environm. Hazardous MarkYESHazard no.30Tunnel CodeD/ESpecial Provision640E

This classification is in principle not valid for carriage by tank vessel on inland waterways. Please refer to the manufacturer for further information.

IMDG

14.1 UN number 1993

14.2 Proper shipping name FLAMMABLE LIQUID, N.O.S.

(DELTAMETHRIN, SOLVENT NAPHTHA (PETROLEUM)

LIGHT AROMATIC SOLUTION)

14.3 Transport hazard class(es) 3
14.4 Packing group III
14.5 Marine pollutant YES

IATA

14.1 UN number 1993

14.2 Proper shipping name FLAMMABLE LIQUID, N.O.S.

(DELTAMETHRIN, SOLVENT NAPHTHA (PETROLEUM)

LIGHT AROMATIC SOLUTION)

14.3 Transport hazard class(es)

3



11/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017

Print Date: 23.03.2020

14.4 Packing group14.5 Environm. Hazardous MarkNO

14.6 Special precautions for user

See sections 6 to 8 of this Safety Data Sheet.

14.7 Transport in bulk according to Annex II of MARPOL and the IBC Code

No transport in bulk according to the IBC Code.

SECTION 15: REGULATORY INFORMATION

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

Further information

WHO-classification: II (Moderately hazardous)

15.2 Chemical Safety Assessment

A chemical safety assessment is not required.

SECTION 16: OTHER INFORMATION

Text of the hazard statements mentioned in Section 3

H226	Flammable liquid and vapour.
H301	Toxic if swallowed.
H304	May be fatal if swallowed and enters airways.
H312	Harmful in contact with skin.
H315	Causes skin irritation.
H318	Causes serious eye damage.
H331	Toxic if inhaled.
H335	May cause respiratory irritation.
H336	May cause drowsiness or dizziness.
H400	Very toxic to aquatic life.
H410	Very toxic to aquatic life with long lasting effects.
H411	Toxic to aquatic life with long lasting effects.
H412	Harmful to aquatic life with long lasting effects.

Abbreviations and acronyms

ADN European Agreement concerning the International Carriage of Dangerous Goods by

Inland Waterways

ADR European Agreement concerning the International Carriage of Dangerous Goods by

Road

ATE Acute toxicity estimate

CAS-Nr. Chemical Abstracts Service number

Conc. Concentration

EC-No. European community number ECx Effective concentration to x %

EINECS European inventory of existing commercial substances

ELINCS European list of notified chemical substances

EN European Standard



12/12

DECIS EC25 4X5L BOT IL

Version 6 / EU

102000021192

Revision Date: 22.02.2017
Print Date: 23.03.2020

EU European Union

IATA International Air Transport Association

IBC International Code for the Construction and Equipment of Ships Carrying Dangerous

Chemicals in Bulk (IBC Code)

ICx Inhibition concentration to x %

IMDG International Maritime Dangerous Goods

LCx Lethal concentration to x %

LDx Lethal dose to x %

LOEC/LOEL Lowest observed effect concentration/level

MARPOL: International Convention for the prevention of marine pollution from ships

N.O.S. Not otherwise specified

NOEC/NOEL No observed effect concentration/level

OECD Organization for Economic Co-operation and Development

RID Regulations concerning the International Carriage of Dangerous Goods by Rail

TWA Time weighted average

UN United Nations

WHO World health organisation

The information contained within this Safety Data Sheet is in accordance with the guidelines established by Regulation (EU) 1907/2006 and Regulation (EU) 2015/830 amending Regulation (EU) No 1907/2006 and any subsequent amendments. This data sheet complements the user's instructions, but does not replace them. The information it contains is based on the knowledge available about the product concerned at the time it was compiled. Users are further reminded of the possible risks of using a product for purposes other than those for which it was intended. The required information complies with current EEC legislation. Addressees are requested to observe any additional national requirements.

Changes since the last version are highlighted in the margin. This version replaces all previous versions.