

SAFETY DATA SHEET

(REACH regulation (EC) n° 1907/2006 - n° 2020/878)

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

> 1.1. Product identifier

Product name : 3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL

Product code : 3Y374101.

This MSDS is valid for all packaging of this product.

UFI : A4X8-Y0FF-400N-EWYW

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

INK

1.3. Details of the supplier of the safety data sheet

Registered company name : TIFLEX.

Address : CS 30200.01450.PONCIN.FRANCE.

Telephone : +33 (0) 4.74.37.33.33. Fax : +33 (0) 4.74.37.33.45.

qse@tiflex.fr

www.tiflex.com

1.4. Emergency telephone number : +33 (0) 1.45.42.59.59.

Association/Organisation : I.N.R.S..

> Other emergency numbers

see section 16

>SECTION 2 : HAZARDS IDENTIFICATION

2.1. Classification of the substance or mixture

In compliance with EC regulation No. 1272/2008 and its amendments.

Skin irritation, Category 2 (Skin Irrit. 2, H315).

Eye irritation, Category 2 (Eye Irrit. 2, H319).

Skin sensitisation, Category 1 (Skin Sens. 1, H317).

Specific target organ toxicity (repeated exposure), Category 2 (STOT RE 2, H373).

Hazardous to the aquatic environment - Chronic hazard, Category 2 (Aquatic Chronic 2, H411).

This mixture does not present a physical hazard. Refer to the recommendations regarding the other products present on the site.

2.2. Label elements

> In compliance with EC regulation No. 1272/2008 and its amendments.

Hazard pictograms :



GHS09



GHS08



GHS07

Signal Word :

WARNING

Product identifiers :

EC 235-921-9

EC 239-263-3

015-189-00-5

EC 239-701-3

HEXAMETHYLENE DIACRYLATE

METHYL BENZOYLFORMATE

PHENYL BIS(2,4,6-TRIMETHYLBENZOYL)-PHOSPHINE OXIDE

TRIMETHYLOLPROPANE TRIACRYLATE

Hazard statements :

H315

Causes skin irritation.

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H317	May cause an allergic skin reaction.
H319	Causes serious eye irritation.
H373	May cause damage to organs through prolonged or repeated exposure.
H411	Toxic to aquatic life with long lasting effects.
Precautionary statements - Prevention :	
P260	Do not breathe vapours.
P273	Avoid release to the environment.
P280	Wear protective gloves/eye protection.
Precautionary statements - Response :	
P302 + P352	IF ON SKIN: Wash with plenty of water.
P305 + P351 + P338	IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
P308 + P311	IF exposed or concerned: Call a POISON CENTER or doctor.

2.3. Other hazards

The mixture does not contain substances classified as 'Substances of Very High Concern' (SVHC) $\geq 0.1\%$ published by the European Chemicals Agency (ECHA) under article 59 of REACH: <http://echa.europa.eu/fr/candidate-list-table>

The mixture fulfils neither the PBT nor the vPvB criteria for mixtures in accordance with annexe XIII of the REACH regulations EC 1907/2006.

The mixture does not contain substances $\geq 0.1\%$ with endocrine disrupting properties in accordance with the criteria of the Delegated Regulation (EU) 2017/2100 of the Commission or Regulation (EU) 2018/605 of the Commission.

>SECTION 3 : COMPOSITION/INFORMATION ON INGREDIENTS**3.2. Mixtures****> Composition :**

Identification	Classification (EC) 1272/2008	Note	%
CAS: 94108-97-1 EC: 302-434-9 REACH: 01-2119977121-41-XXXX DI(TRIMETHYLOLPROPANE)TETRAACRYLATE	GHS07, GHS09 Wng Eye Irrit. 2, H319 Aquatic Chronic 2, H411		25 \leq x % < 50
CAS: 13048-33-4 EC: 235-921-9 REACH: 01-2119484737-22-XXXX HEXAMETHYLENE DIACRYLATE	GHS07, GHS09 Wng Skin Irrit. 2, H315 Skin Sens. 1, H317 Eye Irrit. 2, H319 Aquatic Chronic 2, H411 Aquatic Acute 1, H400 M Acute = 1		10 \leq x % < 25
CAS: 163206-31-3 REACH: 01-2119980719-19-XXXX HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT, BLOCKED WITH 3,5-DIMETHYL-1H-PYRRAZOLE	GHS08 Dgr STOT RE 1, H372		2.5 \leq x % < 10
CAS: 64742-95-6 EC: 265-199-0 REACH: 01-2119455851-35-XXXX SOLVENT NAPHTHA (PETROLEUM), LIGHT AROM.	GHS09, GHS08, GHS07 Dgr Asp. Tox. 1, H304 STOT SE 3, H335 STOT SE 3, H336 Aquatic Chronic 2, H411 Asp. Tox. 1, H304 STOT SE 3, H335 STOT SE 3, H336 Aquatic Chronic 2, H411 066	P	2.5 \leq x % < 10
CAS: 36888-99-0 EC: 253-256-2 CI PIGMENT YELLOW 139		[xiii]	2.5 \leq x % < 10

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CAS: 15206-55-0 EC: 239-263-3 REACH: 01-2120101338-67-XXXX METHYL BENZOYLFORMATE	GHS07 Wng Skin Sens. 1, H317		2.5 <= x % < 10
CAS: 5495-84-1 EC: 226-827-9 REACH: 01-2120769513-49-XXXX 2-ISOPROPYL-9H-THIOXANTHEN-9-ONE	GHS09, GHS08 Wng Repr. 2, H361f Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1	A B C E [ii]	1 <= x % < 2.5
INDEX: 015-189-00-5 CAS: 162881-26-7 EC: 423-340-5 REACH: 01-2119489401-38-XXXX PHENYL BIS(2,4,6-TRIMETHYLBENZOYL)-PHOSPHINE OXIDE	GHS07 Wng Skin Sens. 1A, H317 Aquatic Chronic 4, H413		1 <= x % < 2.5
CAS: 2530-83-8 EC: 219-784-2 REACH: 01-2119513212-58-XXXX [3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYSILANE	GHS05 Dgr Eye Dam. 1, H318 Aquatic Chronic 3, H412		1 <= x % < 2.5
CAS: 15625-89-5 EC: 239-701-3 REACH: 01-2119489896-11-XXXX TRIMETHYLOLPROPANE TRIACRYLATE	GHS07, GHS09 Wng Skin Irrit. 2, H315 Skin Sens. 1, H317 Eye Irrit. 2, H319 Aquatic Acute 1, H400 M Acute = 1 Aquatic Chronic 1, H410 M Chronic = 1		0.1 <= x % < 1

Specific concentration limits:

Identification	Specific concentration limits	ATE
CAS: 2530-83-8 EC: 219-784-2 REACH: 01-2119513212-58-XXXX [3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYSILANE		inhalation: ATE = 5.3 mg/l 4h (dust/mist) dermal: ATE = 4250 mg/kg BW oral: ATE = 8025 mg/kg BW
CAS: 15625-89-5 EC: 239-701-3 REACH: 01-2119489896-11-XXXX TRIMETHYLOLPROPANE TRIACRYLATE		dermal: ATE = 5170 mg/kg BW oral: ATE = 3680 mg/kg BW

> Nanoform

Identification	Nanoform
CAS: 36888-99-0 EC: 253-256-2 CI PIGMENT YELLOW 139	Name of nanoform(s): CI PIGMENT YELLOW 139 Number based particle size distribution: d10 : 15 à 50nm d50 : 10 à 100nm d90 : 90 à 250nm Shape and aspect ratio of particles: Spheres Ratio Aspect (x) = 1 to 3 [TEM] Crystallinity: Crystalline Surface functionalisation / treatment: Agent(s) : No specific treatment Specific surface area: 15 à 40 m²/m³ [BET]

> Information on ingredients :

(Full text of H-phrases: see section 16)

[ii] Carcinogenic, mutagenic or reprotoxic (CMR) substance.

[xiii] Nanoform.

Note P: The carcinogen or mutagen classification does not apply because the substance contains less than 0.1 % w/w of benzene (EINECS 200-753-7).

SECTION 4 : FIRST AID MEASURES

As a general rule, in case of doubt or if symptoms persist, always call a doctor.

NEVER induce swallowing by an unconscious person.

4.1. description of first aid measures

In the event of splashes or contact with eyes :

Wash thoroughly with fresh, clean water for 15 minutes holding the eyelids open.

If there is any redness, pain or visual impairment, consult an ophthalmologist.

In the event of splashes or contact with skin :

Remove contaminated clothing and wash the skin thoroughly with soap and water or a recognised cleaner.

Watch out for any remaining product between skin and clothing, watches, shoes, etc.

In the event of an allergic reaction, seek medical attention.

If the contaminated area is widespread and/or there is damage to the skin, a doctor must be consulted or the patient transferred to hospital.

In the event of swallowing :

Do not give the patient anything orally.

In the event of swallowing, if the quantity is small (no more than one mouthful), rinse the mouth with water and consult a doctor.

Keep the person exposed at rest. Do not force vomiting.

Seek medical attention immediately, showing the label.

If swallowed accidentally, call a doctor to ascertain whether observation and hospital care will be necessary. Show the label.

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

Non-flammable.

5.1. Extinguishing media

Suitable methods of extinction

In the event of a fire, use :

- sprayed water or water mist
- foam
- multipurpose ABC powder
- BC powder
- carbon dioxide (CO₂)

Unsuitable methods of extinction

In the event of a fire, do not use :

- water jet

5.2. Special hazards arising from the substance or mixture

A fire will often produce a thick black smoke. Exposure to decomposition products may be hazardous to health.

Do not breathe in smoke.

In the event of a fire, the following may be formed :

- carbon monoxide (CO)
- carbon dioxide (CO₂)

5.3. Advice for firefighters

No data available.

SECTION 6 : ACCIDENTAL RELEASE MEASURES

6.1. Personal precautions, protective equipment and emergency procedures

Consult the safety measures listed under headings 7 and 8.

For non first aid worker

Avoid any contact with the skin and eyes.

For first aid worker

First aid workers will be equipped with suitable personal protective equipment (See section 8).

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6.2. Environmental precautions

Contain and control the leaks or spills with non-combustible absorbent materials such as sand, earth, vermiculite, diatomaceous earth in drums for waste disposal.

Prevent any material from entering drains or waterways.

6.3. Methods and material for containment and cleaning up

Clean preferably with a detergent, do not use solvents.

6.4. Reference to other sections

No data available.

SECTION 7 : HANDLING AND STORAGE

Requirements relating to storage premises apply to all facilities where the mixture is handled.

Individuals with a history of skin sensitisation should not, under any circumstance, handle this mixture.

7.1. Precautions for safe handling

Always wash hands after handling.

Remove and wash contaminated clothing before re-using.

Ensure that there is adequate ventilation, especially in confined areas.

Fire prevention :

Handle in well-ventilated areas.

Prevent access by unauthorised personnel.

Recommended equipment and procedures :

For personal protection, see section 8.

Observe precautions stated on label and also industrial safety regulations.

Avoid skin and eye contact with this mixture.

Avoid exposure - obtain special instructions before use.

Packages which have been opened must be reclosed carefully and stored in an upright position.

Prohibited equipment and procedures :

No smoking, eating or drinking in areas where the mixture is used.

7.2. Conditions for safe storage, including any incompatibilities

No data available.

Storage

Keep the container tightly closed in a dry, well-ventilated place.

The floor must be impermeable and form a collecting basin so that, in the event of an accidental spillage, the liquid cannot spread beyond this area.

Packaging

Always keep in packaging made of an identical material to the original.

7.3. Specific end use(s)

No data available.

>SECTION 8 : EXPOSURE CONTROLS/PERSONAL PROTECTION**8.1. Control parameters**

No data available.

> Derived no effect level (DNEL) or derived minimum effect level (DMEL):

TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)

Final use:

Exposure method:

Potential health effects:

DNEL :

Exposure method:

Potential health effects:

DNEL :

Final use:

Exposure method:

Potential health effects:

Workers.

Dermal contact.

Long term systemic effects.

83 mg/kg body weight/day

Inhalation.

Long term systemic effects.

3.5 mg of substance/m3

Consumers.

Ingestion.

Long term systemic effects.

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DNEL : 0.5 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 42 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 0.87 mg of substance/m3

[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYASILANE (CAS: 2530-83-8)

|>

Final use: **Workers.**
Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 10 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 70.5 mg of substance/m3

Final use: **Consumers.**
Exposure method: Ingestion.
Potential health effects: Long term systemic effects.
DNEL : 5 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 5 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Short term systemic effects.
DNEL : 26400 mg of substance/m3

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 17 mg of substance/m3

PHENYL BIS(2,4,6-TRIMETHYLBENZOYL)-PHOSPHINE OXIDE (CAS: 162881-26-7)

Final use: **Workers.**
Exposure method: Dermal contact.
Potential health effects: Short term systemic effects.
DNEL : 3.3 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 3.3 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Short term systemic effects.
DNEL : 21 mg of substance/m3

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 21 mg of substance/m3

Final use: **Consumers.**
Exposure method: Ingestion.
Potential health effects: Long term systemic effects.

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

DNEL : 1.5 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 1.5 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 5.2 mg of substance/m3

2-ISOPROPYL-9H-THIOXANTHEN-9-ONE (CAS: 5495-84-1)

Final use: **Workers.**
Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 2.92 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 2.06 mg of substance/m3

METHYL BENZOYLFORMATE (CAS: 15206-55-0)

Final use: **Workers.**
Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 3.33 mg/kg body weight/day

|> **Final use:** **Consumers.**
Exposure method: Ingestion.
Potential health effects: Long term systemic effects.
DNEL : 1.67 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 1.67 mg/kg body weight/day

CI PIGMENT YELLOW 139 (CAS: 36888-99-0)

|> **Final use:** **Workers.**
Exposure method: Inhalation.
Potential health effects: Long term local effects.
DNEL : 3 mg of substance/m3

SOLVENT NAPHTHA (PETROLEUM), LIGHT AROM. (CAS: 64742-95-6)

Final use: **Workers.**
Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 25 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 150 mg of substance/m3

Final use: **Consumers.**
Exposure method: Ingestion.
Potential health effects: Long term systemic effects.
DNEL : 11 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.

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DNEL : 11 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 32 mg of substance/m3

HEXAMETHYLENE DIACRYLATE (CAS: 13048-33-4)**Final use:****Workers.**

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 2.77 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 24.5 mg of substance/m3

Final use:**Consumers.**

Exposure method: Ingestion.
Potential health effects: Long term systemic effects.
DNEL : 2.08 mg/kg body weight/day

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 1.66 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 7.24 mg of substance/m3

DI(TRIMETHYLOLPROPANE)TETRAACRYLATE (CAS: 94108-97-1)**Final use:****Workers.**

Exposure method: Dermal contact.
Potential health effects: Long term systemic effects.
DNEL : 4.67 mg/kg body weight/day

Exposure method: Inhalation.
Potential health effects: Long term systemic effects.
DNEL : 16.46 mg of substance/m3

> Predicted no effect concentration (PNEC):**TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)**

Environmental compartment: Soil.
PNEC : 0.003 mg/kg

Environmental compartment: Fresh water.
PNEC : 0.87 µg/l

Environmental compartment: Sea water.
PNEC : 0.087 µg/l

Environmental compartment: Intermittent waste water.
PNEC : 0.0147 mg/l

Environmental compartment: Fresh water sediment.
PNEC : 0.017 mg/kg

Environmental compartment: Marine sediment.
PNEC : 0.0029 mg/kg

Environmental compartment: Waste water treatment plant.

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PNEC : 6.25 mg/l

[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYASILANE (CAS: 2530-83-8)

Environmental compartment: Soil.
PNEC : 0.063 mg/kg

Environmental compartment: Fresh water.
PNEC : 0.45 mg/l

Environmental compartment: Sea water.
PNEC : 0.045 mg/l

Environmental compartment: Intermittent waste water.
PNEC : 0.45 mg/l

Environmental compartment: Fresh water sediment.
PNEC : 1.6 mg/kg

Environmental compartment: Marine sediment.
PNEC : 0.16 mg/kg

Environmental compartment: Waste water treatment plant.
PNEC : 8.2 mg/kg

2-ISOPROPYL-9H-THIOXANTHEN-9-ONE (CAS: 5495-84-1)

Environmental compartment: Soil.
PNEC : 0.024 mg/kg

Environmental compartment: Fresh water.
PNEC : 0 mg/l

Environmental compartment: Sea water.
PNEC : 0 mg/l

Environmental compartment: Fresh water sediment.
PNEC : 0.121 mg/kg

Environmental compartment: Marine sediment.
PNEC : 0.012 mg/kg

Environmental compartment: Waste water treatment plant.
PNEC : 100 mg/l

METHYL BENZOYLFORMATE (CAS: 15206-55-0)

Environmental compartment: Soil.
PNEC : 0.027 mg/kg

Environmental compartment: Fresh water.
PNEC : 0.069 mg/l

Environmental compartment: Sea water.
PNEC : 0.007 mg/l

Environmental compartment: Fresh water sediment.
PNEC : 0.47 mg/kg

Environmental compartment: Marine sediment.
PNEC : 0.047 mg/kg

Environmental compartment: Waste water treatment plant.

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PNEC : 39 mg/l

HEXAMETHYLENE DIISOCYANATE, OLIGOMERISATION PRODUCT, BLOCKED WITH 3,5-DIMETHYL-1H-PYRRAZOLE
(CAS: 163206-31-3)Environmental compartment: Waste water treatment plant.
PNEC : 100 mg/l

HEXAMETHYLENE DIACRYLATE (CAS: 13048-33-4)

Environmental compartment: Soil.
PNEC : 0.094 mg/kgEnvironmental compartment: Fresh water.
PNEC : 0.007 mg/lEnvironmental compartment: Sea water.
PNEC : 0.001 mg/lEnvironmental compartment: Fresh water sediment.
PNEC : 0.493 mg/kgEnvironmental compartment: Marine sediment.
PNEC : 0.049 mg/kgEnvironmental compartment: Waste water treatment plant.
PNEC : 2.7 mg/l

DI(TRIMETHYLOLPROPANE)TETRAACRYLATE (CAS: 94108-97-1)

Environmental compartment: Soil.
PNEC : 0.0096 mg/kgEnvironmental compartment: Fresh water.
PNEC : 0.0012 mg/lEnvironmental compartment: Sea water.
PNEC : 0.00012 mg/lEnvironmental compartment: Intermittent waste water.
PNEC : 0.012 mg/lEnvironmental compartment: Fresh water sediment.
PNEC : 0.0484 mg/kgEnvironmental compartment: Marine sediment.
PNEC : 0.0048 mg/kgEnvironmental compartment: Waste water treatment plant.
PNEC : 100 mg/l**8.2. Exposure controls****Personal protection measures, such as personal protective equipment**

Pictogram(s) indicating the obligation of wearing personal protective equipment (PPE) :



Use personal protective equipment that is clean and has been properly maintained.

Store personal protective equipment in a clean place, away from the work area.

Never eat, drink or smoke during use. Remove and wash contaminated clothing before re-using. Ensure that there is adequate ventilation, especially in confined areas.

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- Eye / face protection

Avoid contact with eyes.

Use eye protectors designed to protect against liquid splashes

Before handling, wear safety goggles with protective sides accordance with standard EN166.

In the event of high danger, protect the face with a face shield.

Prescription glasses are not considered as protection.

Individuals wearing contact lenses should wear prescription glasses during work where they may be exposed to irritant vapours.

Provide eyewash stations in facilities where the product is handled constantly.

- Hand protection

Use suitable protective gloves that are resistant to chemical agents in accordance with standard EN ISO 374-1.

Gloves must be selected according to the application and duration of use at the workstation.

Protective gloves need to be selected according to their suitability for the workstation in question : other chemical products that may be handled, necessary physical protections (cutting, pricking, heat protection), level of dexterity required.

Type of gloves recommended :

- Butyl Rubber (Isobutylene-isoprene copolymer)

- Body protection

Avoid skin contact.

Wear suitable protective clothing.

Suitable type of protective clothing :

In the event of substantial spatter, wear liquid-tight protective clothing against chemical risks (type 3) in accordance with EN14605/A1 to prevent skin contact.

In the event of a risk of splashing, wear protective clothing against chemical risks (type 6) in accordance with EN13034/A1 to prevent skin contact.

Work clothing worn by personnel shall be laundered regularly.

After contact with the product, all parts of the body that have been soiled must be washed.

>SECTION 9 : PHYSICAL AND CHEMICAL PROPERTIES**9.1. Information on basic physical and chemical properties****Physical state**

Physical state : Viscous liquid.

Colour

Unspecified

Odour

Odour threshold : Not stated.

Melting point

Melting point/melting range : Not specified.

Freezing point

Freezing point / Freezing range : Not stated.

Boiling point or initial boiling point and boiling range

Boiling point/boiling range : Not specified.

Flammability

Flammability (solid, gas) : Not stated.

Lower and upper explosion limit

Explosive properties, lower explosivity limit (%) Not stated.

:

Explosive properties, upper explosivity limit (%) Not stated.

:

Flash point

Flash Point Interval : FP > 100°C.

Auto-ignition temperature

Self-ignition temperature : Not specified.

Decomposition temperature

Decomposition point/decomposition range : Not specified.

pH

pH : Not relevant.

pH (aqueous solution) : Not stated.

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Kinematic viscosity

Viscosity : Not stated.

Solubility

Water solubility : Insoluble.

Fat solubility : Not stated.

Partition coefficient n-octanol/water (log value)

Partition coefficient: n-octanol/water : Not stated.

Vapour pressure

Vapour pressure (50°C) : Below 110 kPa (1.10 bar).

Density and/or relative density

Density : > 1

Relative vapour density

Vapour density : Not stated.

> Particle characteristics

The mixture contains one nanoform. See the characteristics of the particles that define the nanoform in Section 3.

> 9.2. Other information

VOC (g/l) : 108.75

9.2.1. Information with regard to physical hazard classes

No data available.

9.2.2. Other safety characteristics

No data available.

SECTION 10 : STABILITY AND REACTIVITY**10.1. Reactivity**

No data available.

10.2. Chemical stability

This mixture is stable under the recommended handling and storage conditions in section 7.

10.3. Possibility of hazardous reactions

When exposed to high temperatures, the mixture can release hazardous decomposition products, such as carbon monoxide and dioxide, fumes and nitrogen oxide.

10.4. Conditions to avoid

No data available.

10.5. Incompatible materials

No data available.

10.6. Hazardous decomposition products

The thermal decomposition may release/form :

- carbon monoxide (CO)
- carbon dioxide (CO₂)

>SECTION 11 : TOXICOLOGICAL INFORMATION**11.1. Information on hazard classes as defined in Regulation (EC) No 1272/2008**

Exposure to vapours from solvents in the mixture in excess of the stated occupational exposure limit may result in adverse health effects such as mucous membrane and respiratory system irritation and adverse effects on kidney, liver and central nervous system.

Symptoms produced will include headaches, numbness, dizziness, fatigue, muscular asthenia and, in extreme cases, loss of consciousness.

May cause irreversible damage to the skin; namely inflammation of the skin or the formation of erythema and eschar or oedema following exposure up to four hours.

Repeated or prolonged contact with the mixture may cause removal of natural oil from the skin resulting in non-allergic contact dermatitis and absorption through the skin.

May have reversible effects on the eyes, such as eye irritation which is totally reversible by the end of observation at 21 days.

Splashes in the eyes may cause irritation and reversible damage

May cause an allergic reaction by skin contact.

May cause severe damage to organs in the event of repeated or prolonged exposure.

11.1.1. Substances**> Acute toxicity :**

TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

Oral route : LD50 = 3680 mg/kg bodyweight/day
Species : Rat
OECD Guideline 401 (Acute Oral Toxicity)

Dermal route : LD50 = 5170 mg/kg bodyweight/day
Species : Rabbit
OECD Guideline 402 (Acute Dermal Toxicity)

Inhalation route (Vapours) : LC50 > 0.55 mg/l
Species : Rat

[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYASILANE (CAS: 2530-83-8)

Oral route : LD50 = 8025 mg/kg bodyweight/day
Species : Rat
OECD Guideline 401 (Acute Oral Toxicity)

Dermal route : LD50 = 4250 mg/kg bodyweight/day
Species : Rabbit
OECD Guideline 402 (Acute Dermal Toxicity)

Inhalation route (Dusts/mist) : LC50 = 5.3 mg/l
Duration of exposure : 4 h

CI PIGMENT YELLOW 139 (CAS: 36888-99-0)

Oral route : LD50 > 5000 mg/kg bodyweight/day
Species : Rat
Other guideline

Dermal route : LD50 > 2500 mg/kg bodyweight/day
Species : Rat
Other guideline

Inhalation route (Dusts/mist) : LC50 > 5.2 mg/l
Species : Rat
Other guideline

HEXAMETHYLENE DIACRYLATE (CAS: 13048-33-4)

Oral route : LD50 > 2000 mg/kg bodyweight/day
Species : Rat

Dermal route : LD50 > 2000 mg/kg bodyweight/day
Species : Rabbit

Inhalation route (Vapours) : LC50 > 5 mg/l
Species : Rat
Duration of exposure : 4 h

|> Respiratory or skin sensitisation :**CI PIGMENT YELLOW 139 (CAS: 36888-99-0)**

Local lymph node stimulation test : Non-Sensitiser.
Species : Mouse
OECD Guideline 429 (Skin Sensitisation: Local Lymph Node Assay)

Reproductive toxicant :**TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)**

OECD Guideline 422 (Combined Repeated Dose Toxicity Study with the Reproduction / Developmental Toxicity Screening Test)

Specific target organ systemic toxicity - repeated exposure :**[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXYASILANE (CAS: 2530-83-8)**

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

Oral route :

C = 500 mg/kg bodyweight/day

Species : Rat

Duration of exposure : 28 days

OECD Guideline 407 (Repeated Dose 28-Day Oral Toxicity in Rodents)

11.1.2. Mixture

No toxicological data available for the mixture.

11.2. Information on other hazards**> Endocrine disrupting properties**

The mixture does not contain any substance evaluated as an endocrine disruptor with effects on human health.

>SECTION 12 : ECOLOGICAL INFORMATION

Toxic to aquatic life with long lasting effects.

The product must not be allowed to run into drains or waterways.

12.1. Toxicity**> 12.1.1. Substances**

TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)

Fish toxicity :

LC50 = 0.87 mg/l

Factor M = 1

Species : Brachydanio rerio

Duration of exposure : 96 h

OECD Guideline 203 (Fish, Acute Toxicity Test)

Crustacean toxicity :

EC50 = 19.9 mg/l

Species : Daphnia magna

Duration of exposure : 48 h

Algae toxicity :

ECr50 = 18.8 mg/l

Species : Desmodesmus subspicatus

Duration of exposure : 72 h

Aquatic plant toxicity :

Duration of exposure : 72 h

[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXSILANE (CAS: 2530-83-8)

Fish toxicity :

LC50 = 55 mg/l

Species : Cyprinus carpio

Duration of exposure : 96 h

Crustacean toxicity :

EC50 = 324 mg/l

Species : Daphnia magna

Duration of exposure : 48 h

NOEC = 100 mg/l

Species : Daphnia magna

Duration of exposure : 21 days

Algae toxicity :

ECr50 = 350 mg/l

Species : Pseudokirchnerella subcapitata

Duration of exposure : 96 h

NOEC = 130 mg/l

Species : Pseudokirchnerella subcapitata

Duration of exposure : 72 h

CI PIGMENT YELLOW 139 (CAS: 36888-99-0)

Fish toxicity :

LC50 > 10000 mg/l

Species : Oryzias latipes

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

Duration of exposure : 96 h

Crustacean toxicity :

EC50 > 100 mg/l
Species : *Daphnia magna*
Duration of exposure : 48 h
OECD Guideline 202 (*Daphnia* sp. Acute Immobilisation Test)

Algae toxicity :

ECr50 > 100 mg/l
Species : *Desmodesmus subspicatus*
Duration of exposure : 72 h
OECD Guideline 201 (Alga, Growth Inhibition Test)EC50 mg/l
Species : *Desmodesmus subspicatus*
Duration of exposure : 72 h
OECD Guideline 201 (Alga, Growth Inhibition Test)NOEC > 100 mg/l
Species : *Desmodesmus subspicatus*
Duration of exposure : 72 h
OECD Guideline 201 (Alga, Growth Inhibition Test)

Aquatic plant toxicity :

DI(TRIMETHYLOLPROPANE)TETRAACRYLATE (CAS: 94108-97-1)

Fish toxicity : LC50 >= 1.2 mg/l
Species : *Cyprinus carpio*
Duration of exposure : 96 h

Crustacean toxicity :

EC50 >= 10 mg/l
Species : *Daphnia magna*
Duration of exposure : 48 h

HEXAMETHYLENE DIACRYLATE (CAS: 13048-33-4)

Fish toxicity : LC50 = 0.38 mg/l
Factor M = 1
Species : *Oryzias latipes*
Duration of exposure : 96 h
OECD Guideline 203 (Fish, Acute Toxicity Test)

NOEC = 0.072 mg/l
Species : *Oryzias latipes*
Duration of exposure : 35 days
OECD Guideline 210 (Fish, Early-Life Stage Toxicity Test)

Crustacean toxicity :

EC50 = 2.7 mg/l
Species : *Daphnia magna*
Duration of exposure : 48 h
OECD Guideline 202 (*Daphnia* sp. Acute Immobilisation Test)NOEC = 0.14 mg/l
Species : *Daphnia magna*
Duration of exposure : 21 days
OECD Guideline 211 (*Daphnia magna* Reproduction Test)

Algae toxicity :

ECr50 = 1.5 mg/l
Species : *Desmodesmus subspicatus*
Duration of exposure : 72 h
OECD Guideline 201 (Alga, Growth Inhibition Test)

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

NOEC = 0.5 mg/l
Species : Desmodesmus subspicatus
Duration of exposure : 72 h
OECD Guideline 201 (Alga, Growth Inhibition Test)

Aquatic plant toxicity :

Duration of exposure : 72 h

12.1.2. Mixtures

No aquatic toxicity data available for the mixture.

12.2. Persistence and degradability**> 12.2.1. Substances**

TRIMETHYLOLPROPANE TRIACRYLATE (CAS: 15625-89-5)

Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

[3-(2,3-EPOXYPROPOXY)PROPYL]TRIMÉTHOXSILANE (CAS: 2530-83-8)

Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

CI PIGMENT YELLOW 139 (CAS: 36888-99-0)

Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

HEXAMETHYLENE DIACRYLATE (CAS: 13048-33-4)

Biodegradability : Rapidly degradable.

DI(TRIMETHYLOLPROPANE)TETRAACRYLATE (CAS: 94108-97-1)

Biodegradability : no degradability data is available, the substance is considered as not degrading quickly.

12.3. Bioaccumulative potential

No data available.

12.4. Mobility in soil

No data available.

12.5. Results of PBT and vPvB assessment

No data available.

> 12.6. Endocrine disrupting properties

The mixture does not contain any substance evaluated as an endocrine disruptor with environmental effects.

12.7. Other adverse effects

No data available.

SECTION 13 : DISPOSAL CONSIDERATIONS

Proper waste management of the mixture and/or its container must be determined in accordance with Directive 2008/98/EC.

13.1. Waste treatment methods

Do not pour into drains or waterways.

Waste :

Waste management is carried out without endangering human health, without harming the environment and, in particular without risk to water, air, soil, plants or animals.

Recycle or dispose of waste in compliance with current legislation, via a certified collector or company.

Do not contaminate the ground or water with waste, do not dispose of waste into the environment.

Soiled packaging :

Empty container completely. Keep label(s) on container.

Give to a certified disposal contractor.

>SECTION 14 : TRANSPORT INFORMATION

Transport product in compliance with provisions of the ADR for road, RID for rail, IMDG for sea and ICAO/IATA for air transport (ADR 2023 - IMDG 2022 [41-22] - ICAO/IATA 2024 [65]).

14.1. UN number or ID number

3082

14.2. UN proper shipping name

UN3082=ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.
(hexamethylene diacrylate)

14.3. Transport hazard class(es)

- Classification :



9

14.4. Packing group

III

14.5. Environmental hazards

- Environmentally hazardous material :



14.6. Special precautions for user

ADR/RID	Class	Code	Pack gr.	Label	Ident.	LQ	Provis.	EQ	Cat.	Tunnel
	9	M6	III	9	90	5 L	274 335 375 601	E1	3	-

Not subject to this regulation if Q <= 5 l / 5 kg (ADR 3.3.1 - DS 375)

IMDG	Class	2°Label	Pack gr.	LQ	EMS	Provis.	EQ	Stowage Handling	Segregation
	9	-	III	5 L	F-A. S-F	274 335 969	E1	Category A	-

Not subject to this regulation if Q <= 5 l / 5 kg (IMDG 3.3.1 - 2.10.2.7)

IATA	Class	2°Label	Pack gr.	Passager	Passager	Cargo	Cargo	note	EQ
	9	-	III	964	450 L	964	450 L	A97 A158 A197 A215	E1
	9	-	III	Y964	30 kg G	-	-	A97 A158 A197 A215	E1

Not subject to this regulation if Q <= 5 l / 5 kg (IATA 4.4.4 - DS A197)

For limited quantities, see part 2.7 of the OACI/IATA and chapter 3.4 of the ADR and IMDG.

For excepted quantities, see part 2.6 of the OACI/IATA and chapter 3.5 of the ADR and IMDG.

Marine pollutant (IMDG 3.1.2.9):(hexamethylene diacrylate)

14.7. Maritime transport in bulk according to IMO instruments

No data available.

>SECTION 15 : REGULATORY INFORMATION

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

> Classification and labelling information included in section 2:

The following regulations have been used:

- EU Regulation No. 1272/2008 amended by EU Regulation No. 2023/707.
- EU Regulation No. 1272/2008 amended by EU Regulation No. 2024/197. (ATP 21)

Container information:

No data available.

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101**Restrictions applied under Title VIII of Regulation (EC) No. 1907/2006 (REACH):**

The mixture does not contain any substance restricted under Annex XVII of Regulation (EC) No. 1907/2006 (REACH):
<https://echa.europa.eu/substances-restricted-under-reach>.

> Explosives precursors :

The mixture does not contain any substance subject to Regulation (EU) 2019/1148 on the marketing and use of explosives precursors.

Particular provisions :

No data available.

15.2. Chemical safety assessment

This product contains substances for which Chemical Safety Assessments are still to be received

>SECTION 16 : OTHER INFORMATION

Since the user's working conditions are not known by us, the information supplied on this safety data sheet is based on our current level of knowledge and on national and community regulations.

The mixture must not be used for other uses than those specified in section 1 without having first obtained written handling instructions.

It is at all times the responsibility of the user to take all necessary measures to comply with legal requirements and local regulations.

The information in this safety data sheet must be regarded as a description of the safety requirements relating to the mixture and not as a guarantee of the properties thereof.

> Indicates changes from previous version

Emergency telephone numbers :

Austria : +43 1 406 43 43

Croatia : +3851 2348 342. Information available 24/7 in Croatian and English.

Czech Republic : 224 91 92 93 or 224 91 54 02

Denmark : +45 8212 1212

Estonia : nationally 16662, calling from abroad (+372) 7943 794

Finland : Open 24 hours a day - 0800 147 111 (the call is free of charge)

Iceland : 543 2222

Ireland : 01 809 2566. Information available 24/7

Italy : ROMA - CAV "Osp. Pediatrico Bambino Gesù" : 06 68593726ROMA - CAV Policlinico "Umberto I" : 06-49978000ROMA - CAV Policlinico "A. Gemelli" : 06-3054343FOGGIA - Az. Osp. Univ. Foggia : 800183459NAPOLI - Az. Osp. "A. Cardarelli" : 081-5453333FIRENZE - Az. Osp. "Careggi" U.O. Tossicologia Medica : 055-7947819PAVIA - CAV Centro Nazionale di Informazione Tossicologica : 0382-24444MILANO - Osp. Niguarda Ca' Granda : 02-66101029BERGAMO - Azienda Ospedaliera Papa Giovanni XXII

Latvia : +371 67042473

Lithuania : +370 (5) 2362052 (free of charge, available 24 hours a day, seven days a week).

The Netherlands : +31 (0)88 755 8000

Norway : 22 59 13 00

Portugal : +351 800 250 250

Romania : +40 21 599 2300 (information provided in Romanian and English)

Slovakia : +421 2 5477 4166

Slovenia : 112

Spain : + 34 91 562 04 20. The information will be provided in Spanish (available 24/7)

Swiss : 145 (Swiss Toxicological Information Centre)

Sweden : 112

> Classification and procedure used to derive the classification for mixtures according to Regulation (EC) 1272/2008 :

Classification in accordance with Regulation (EC) No 1272/2008	Classification procedure
Skin Irrit. 2, H315	Calculation method.
Eye Irrit. 2, H319	Calculation method.
Skin Sens. 1, H317	Calculation method.
STOT RE 2, H373	Calculation method.
Aquatic Chronic 2, H411	Calculation method.

> Wording of the phrases mentioned in section 3 :

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.
H319	Causes serious eye irritation.
H335	May cause respiratory irritation.

3Y3741 JAUNE OR MAT, ENCRE UVIPRIM GL - 3Y374101

H336	May cause drowsiness or dizziness.
H361f	Suspected of damaging fertility.
H372	Causes damage to organs through prolonged or repeated exposure .
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.
H413	May cause long lasting harmful effects to aquatic life.
EUH066	Repeated exposure may cause skin dryness or cracking.

Abbreviations and acronyms :

LD50 : The dose of a test substance resulting in 50% lethality in a given time period.
LC50 : The concentration of a test substance resulting in 50% lethality in a given period.
EC50 : The effective concentration of substance that causes 50% of the maximum response.
ECr50 : The effective concentration of substance that causes 50% reduction in growth rate.
NOEC : The concentration with no observed effect.
REACH : Registration, Evaluation, Authorization and Restriction of Chemical Substances.
ATE : Acute Toxicity Estimate
BW : Body Weight
DNEL : Derived No-Effect Level
PNEC : Predicted No-Effect Concentration
CMR: Carcinogenic, mutagenic or reprotoxic.
UFI : Unique formulation identifier.
STEL : Short-term exposure limit
TWA : Time Weighted Averages
TMP : French Occupational Illness table
TLV : Threshold Limit Value (exposure)
AEV : Average Exposure Value.
ADR : European agreement concerning the international carriage of dangerous goods by Road.
IMDG : International Maritime Dangerous Goods.
IATA : International Air Transport Association.
ICAO : International Civil Aviation Organisation
RID : Regulations concerning the International carriage of Dangerous goods by rail.
WGK : Wassergefährdungsklasse (Water Hazard Class).
GHS07 : Exclamation mark
GHS08 : Health hazard
GHS09 : Environment
PBT: Persistent, bioaccumulable and toxic.
vPvB : Very persistent, very bioaccumulable.
SVHC : Substances of very high concern.
> Modification compared to the previous version