## Filament (M)

### **SAFETY DATA SHEET**

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Version: 1.0

Replaces:

Version: 1.0

Page:
- 1/13 -

| SEC   | SECTION 1: IDENTIFICATION OF THE SUBSTANCE/MIXTURE AND OF THE COMPANY/UNDERTAKING  |  |  |  |  |
|---|--|--|--|--|--|
| 1.1   | Product identifier   |  |  |  |  |
|   | Product name:  | PA + glass filament  |  |  |  |
|   | Other means of identification:   | not available  |  |  |  |
|   | Registration number:   | not required, the product is a mixture, not a compound   |  |  |  |
| 1.2 Relevant identified uses of the substance or mixture and uses advised against |  |  |  |  |  |
|   | Identified uses:   | material for 3D-printing   |  |  |  |
|   | Uses advised against:  | not set  |  |  |  |
| 1.3   | Details of the supplier of the safety data sheet   |  |  |  |  |
|   | Distributor: (responsible for marketing)   | Zemědělské družstvo Haňovice Haňovice 18 783 21 Chudobín Czech Republic tel.: +420 585 100 308 e-mail: info@plastymladec.cz web: www.filament-pm.com |  |  |  |
|   | Competent person responsible   | e for the safety data sheet: PharmDr. Vladimír Végh, PHARMIS, <u>info@pharmis.cz</u>   |  |  |  |
| 1.4   | Emergency telephone numb   | oer  |  |  |  |
|   | Toxicology Information Centre, Na Bojišti 1, Praha; 24-h non-stop: +420-224919293 / +420-224915402. Information only on health risks: acute intoxications of people / animals. |  |  |  |  |

#### **SECTION 2: HAZARDS IDENTIFICATION**

General classification of the mixture: the mixture is **not** classified as hazardous in compliance with Regulation (EC) 1272/2008.

The product is put on the market on a form that encapsulates component(s) in a polymer., To our knowledge, product on this form shouldn't have any significant risk for health by inhalation, ingestion or contact with skin or for the environment., According to European classification and labelling regulation for hazardous substances and preparations, the product is not subjected to labelling although one/several component(s) is/are classified as hazardous.

| 2.1 | 2.1 Classification of the substance or mixture    |                         |      |  |  |  |
|-----|---|-------------------------|------|--|--|--|
|     | Classification in accordance with 1272/2008/EC:   | not classified as hazar | dous |  |  |  |
| 2.2 | Label elements                                    |                         |      |  |  |  |
|     | Contains:   | not required            |      |  |  |  |
|     | Hazard pictograms:                                | not required            |      |  |  |  |
|     | Signal word:                                      | not required            |      |  |  |  |
|     | Hazard statements:                                | not required            |      |  |  |  |
|     | Supplemental hazard information:                  | not required            |      |  |  |  |
|     | Supplemental label elements for certain mixtures: |                         |      |  |  |  |
|     |   | not required            |      |  |  |  |
|     | Precautionary statements:                         | not required            |      |  |  |  |
|     | Other required labeling:                          | not required            |      |  |  |  |

## Filament (M

### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:
Version: 1.0

Replaces:
Version: 1.0

- 2/13 -

#### 2.3 Other hazards

Results of PBT and vPvB assessment: The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, Annex XIII. No substances presented in the mixture at a concentration  $\geq 0.1$  % by weight are included in the Candidate List of SVHC.

No substances presented in the mixture at a concentration  $\geq 0.1$  % by weight are included in the list established in accordance with Article 59(1) for having endocrine disrupting properties; nor are they 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.

| Important                           |   |
|-------------------------------------|---|
| health effects:                     | No adverse effects for human health are expected for the mixture under normal conditions of usage, the mixture is biologically inert. When melted, it can cause serious burns if contacted with skin and eyes. Ingestion of a small amount should not cause any troubles. Inhaling of loosen dust or potential decomposition products of melted/overheated mixture in high concentration can irritate moderately respiratory system and mucous membranes. |
| Important environmental effects:    | No adverse effects in the environment are expected for the mixture; the mixture is almost biologically inert.   |
| Important physico-chemical effects: | Not known.  |

#### **SECTION 3: COMPOSITION/INFORMATION ON INGREDIENTS**

Product based on polyamide polymer with additives and glass fiber filling.

#### 3.1 Substances

does not apply

#### 3.2 Mixtures

Substances presenting a health or environmental hazard within the meaning of the Regulation (EC) No. 1272/2008, assigned a Community/national workplace exposure limit, classified as PBT/vPvB or included in the Candidate List of SVHC, identified as having endocrine disruptive properties:

| Substance REACH Registration number   | Content<br>(% w/w) | EC Number<br>CAS Number<br>Index Number | Classification<br>1272/2008/EC*   |  | Exposure limits |
|---|--------------------|---|---|--|-----------------|
| Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate REACH No. 01-2119537297-32-XXXX | < 0,5              | 258-207-<br>52829-07-9<br>-             | Eye Dam. 1 H318<br>Aquatic Acute 1 H400<br>M-faktor = 1<br>Aquatic Chronic 2 H411 |  | -               |
| Copper Iodide REACH No. 01-2119972019-33-XXXX                                 | < 0,1              | 231-674-6<br>7681-65-4                  | STOT RE 1   | H302<br>H315<br>H318<br>H317<br>H372<br>H400 | -               |

<sup>\*</sup> For full wording of used classification abbreviations and Hazard Statements (H-phrases) see Section 16.



### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:
Version: 1.0

Replaces:

Version: 1.0

Page:
- 3/13 -

| Hazardous impurities: Substance REACH Registration number | Content<br>(% w/w) | EC Number<br>CAS Number               | Classification<br>1272/2008/EC*  |  | Exposure<br>limits   |
|---|--------------------|---------------------------------------|--|--|----------------------|
| Ethyl acrylate<br>REACH No. dosud neuvedeno               | < 0,1              | 205-438-8<br>140-88-5<br>607-032-00-X | Flam. Liq. 2 Acute Tox. 4 Acute Tox. 3 Acute Tox. 4 H302 Acute Tox. 4 H312 Skin Irrit. 2 H315 Eye Irrit. 2 H319 Skin Sens. 1B H317 STOT SE3 Aquatic Chronic 3 H412 |  | EU,<br>see 8.1       |
| Butyl acrylate<br>REACH No. dosud neuvedeno               | < 0,1              | 205-480-7<br>141-32-2<br>607-062-00-3 | Flam. Liq. 3<br>Acute Tox. 4<br>Skin Irrit. 2<br>Eye Irrit. 2<br>Skin Sens. 1<br>STOT SE3  | H226<br>H332<br>H315<br>H319<br>H317<br>H335<br>H412 | EU,<br>see 8.1       |
| Maleic anhydride<br>REACH No. 01-2119463268-32-XXXX       | < 10 ppm           | 203-571-6<br>108-31-6<br>607-096-00-9 | Acute Tox. 4<br>Skin Corr. 1B<br>Skin Sens. 1A<br>Eye dam. 1<br>Resp. Sens. 1<br>STOT RE 1   | H302<br>H314<br>H317<br>H318<br>H334<br>H372         | national,<br>see 8.1 |

#### Other compounds

Other substances not presenting a health or environmental hazard within the meaning of Regulation (EC) No. 1272/2008, without a Community workplace exposure limit, not classified as PBT/vPvB nor included in the Candidate List:

| Substance<br>REACH Registration number             | Content<br>(% w/w) | EC Number<br>CAS Number<br>Index Number | Classification<br>1272/2008/EC* |   | Exposure limits      |
|--|--------------------|---|---------------------------------|---|----------------------|
| polyamide<br>REACH not available yet               | < 100              | polymer<br>63428-84-2<br>-              | not classified as<br>hazardous  | - | national,<br>see 8.1 |
| skelné vlákno<br>REACH registration not required** | 30                 | 266-047-6<br>65997-17-3<br>-            | not classified as<br>hazardous  | - | national,<br>see 8.1 |

<sup>\*\*</sup>Exempted from registration under Article 2(7)(b): Glass (No. 10)

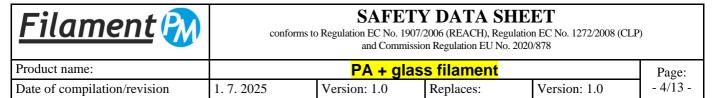
#### **SECTION 4: FIRST AID MEASURES**

#### 4.1 Description of first aid measures

Health hazard is no minimal, being neither irritating, corrosive, volatile, nor toxic. Effects of over exposure: There are no hazards under normal use conditions. Observe all user considerations and safety measures stated on the packaging. In case of any health problem or uncertainty seek medical attention and provide information from this Material Safety Data Sheet. Unconscious persons place in the stabilized position and observe the breathing. Never give any fluids to unconscious persons. Be careful when manipulating hot products - danger of skin burns.

| v 1 1 |         |
|-------|---------|
| Inhal | lation: |
| mma   | auon.   |

No adverse effects are expected under normal conditions of use. Direct inhalation exposure is not expected. Dust or potential decomposition products of melted/overheated mixture in high concentration can cause airway irritation. In this case remove the affected persons to a fresh air. For those providing assistance, avoid exposure to yourself or others. Use adequate respiratory protection. If respiratory irritation, dizziness, nausea, or unconsciousness occurs, seek immediate medical assistance. If breathing has stopped, assist ventilation with a mechanical device or use mouth-to-mouth resuscitation. Call immediately medical emergency.



|     | Skin contact:  | No adverse effects are expected under normal conditions of use - no special requirements needed. In case of a skin contact with melted polymer do not remove it from the skin. Cool down the burnt area with a stream of cold water and call the professional medical help.   |
|-----|--|---|
|     | Eye contact:   | No adverse effects are expected under normal conditions of use - no special requirements needed. Dust or potential decomposition products of melted polymer can cause eye irritation. Seek medical advice if the eye irritation persists. Direct contact of eye with melted product can cause serious eye damage. Seek professional medical help immediately. |
|     | Ingestion:   | No adverse effects are expected under normal conditions of use - no special requirements needed. This type of exposure is not expected.   |
| 4.2 | Most important   | symptoms and effects, both acute and delayed  |
|     | No adverse effects for human health are expected for the mixture under normal conditions of usage, the mixture is biologically inert. When melted, it can cause serious burns if contacted with skin and eyes. Ingestion of a small amount |   |

should not cause any troubles. Inhaling of loosen dust or potential decomposition products of melted/overheated mixture in high concentration can irritate moderately respiratory system and mucous membranes.

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

No specific therapy known. Use supportive and symptomatic treatment.

#### **SECTION 5: FIREFIGHTING MEASURES**

#### 5.1 **Extinguishing media**

| Suitable extinguishing media:   | water spray, alcohol resistant foam, dry-powder, carbon dioxide |
|---------------------------------|---|
| Unsuitable extinguishing media: | direct water stream - could spread fire                         |

#### Special hazards arising from the substance or mixture

Flammable. Incomplete combustion and thermolysis may produce toxic, irritating and flammable decomposition products (such as carbon monoxide, carbon dioxide, sooth, aldehydes and other products of organic compounds decomposition). Do not inhale smokes.

#### 5.3 **Advice for fire-fighters**

Fire Fighting Procedures: Keep people away. Isolate fire and deny unnecessary entry. Use water spray to cool fire exposed containers and fire affected zone until fire is out and danger of re-ignition has passed. Fight fire from protected location or safe distance. Move container from fire area if this is possible without hazard. If possible, avoid leaked water to enter sewage system or environment.

Special Protective Equipment for Firefighters: Wear positive-pressure self-contained breathing apparatus (SCBA) and protective firefighting clothing (includes firefighting helmet, coat, trousers, boots, and gloves). Avoid contact with this material during firefighting operations. If contact is likely, change to full chemical resistant firefighting clothing with self-contained breathing apparatus. For protective equipment in post-fire or non-fire clean-up situations, refer to the relevant sections 6 and 8.

#### **SECTION 6: ACCIDENTAL RELEASE MEASURES**

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

No special requirements are needed. Observe all user considerations and safety measures. All unprotected persons should be restraint. Additional protective measures may be necessary, depending on the specific circumstances and/or the expert judgment of the emergency responders.

#### 6.2 **Environmental precautions**

No special requirements are needed.

#### 6.3 Methods and materials for containment and cleaning up

Collect mechanically. All storage vessels have to be labeled. Dispose according to valid legislation (see Section 13); recycle.

#### 6.4 Reference to other sections

Adhere to instructions in the section 8 and 13.

## Filament 🚮

#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Page:

Date of compilation/revision

1. 7. 2025

Version: 1.0

Replaces:

Version: 1.0

Page:

- 5/13 -

#### **SECTION 7: HANDLING AND STORAGE**

#### 7.1 Precautions for safe handling

Observe all user considerations, safety measures and exposure limits. See Section 8 for advice on the minimum requirements for personal protective equipment. Avoid breathing decomposition products or loosened dust. Use only with adequate ventilation. Observe all fire protection measures (work with open flame is prohibited, remove all possible sources of ignition, smoking is prohibited). During the product's thermal treatment small amounts of volatile organic compounds may be released. Thus suction and discharge of these emissions must be locally secured. Dust from the product represents a potential explosion hazard and as such it must be continuously removed. All devices must be properly grounded.

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

Observe all fire protection measures (work with open flame is prohibited, remove all possible sources of ignition, smoking is prohibited). Keep away from direct sunlight and heat sources.

7.3 Specific end uses material for 3D-printing

#### **SECTION 8: EXPOSURE CONTROLS/PERSONAL PROTECTION**

#### 8.1 | Control parameters

Indicative occupational exposure limit EU:

| CAS      | Substance name | Indicative occupational exposure limit  |
|----------|----------------|---|
| 140-88-5 | Ethyl acrylate | IOEL long term - mean (8 h): 21 mg.m <sup>-3</sup> / 5 ppm<br>IOEL short term - peak (15 min): 42 mg.m <sup>-3</sup> / 10 ppm |
| 141-32-2 | Butyl acrylate | IOEL long term - mean (8 h): 2 mg.m <sup>-3</sup> / 11 ppm<br>IOEL short term - peak (15 min): 10 mg.m <sup>-3</sup> / 53 ppm |

National work-place / occupational exposure limits (only selected lands are displayed):

| CAS        | Substance name                             | Occupational exposure limits  |
|------------|--|---|
| 63428-84-2 | polyamide as: polymeric materials dust     | Czech republic PELc 5.0 mg.m <sup>-3</sup> (Government Regulation no. 361/2007 Coll.)                                   |
| 65997-17-3 | glass fibers as: artificial mineral fibers | Czech republic PELc 10.0 mg.m <sup>-3</sup> (Government Regulation no. 361/2007 Coll.)                                  |
| 108-31-6   | maleic anhydride                           | Czech republic PEL (15 min) 1 mg.m <sup>-3</sup> NPEL-P 2 mg.m <sup>-3</sup> (Government Regulation no. 361/2007 Coll.) |

<sup>\*</sup> because of physical status, this type of exposure is not expected, however mechanical grinding/cutting can release the dust

Indicative biological limits: not set

Other recommended values: not set

| CAS | Substance name | OEL - equivalents |
|-----|----------------|-------------------|
| _   |                | _                 |

Derived No Effect Level (DNEL): not available for the mixture.

Predicted No Effect Concentration (PNEC): not available for the mixture.



#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

| Product name:                | PA + glass filament |              |           | Page:        |          |
|------------------------------|---------------------|--------------|-----------|--------------|----------|
| Date of compilation/revision | 1. 7. 2025          | Version: 1.0 | Replaces: | Version: 1.0 | - 6/13 - |

#### 8.2 Exposure controls

#### Appropriate engineering controls:

Avoid contact with skin, eyes and mucous membranes. Avoid prolonged or repeated contact with skin. Always observe good personal hygiene measures, such as washing after handling the material and before eating, drinking, and/or smoking. Routinely wash work clothing and protective equipment to remove contaminants. Discard contaminated clothing and footwear that cannot be cleaned. Personal protective equipment selections vary based on potential exposure conditions such as applications, handling practices, concentration and ventilation. Information on the selection of protective equipment for use with this material, as provided below, is based upon intended, normal usage.

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

#### a) Eye / face protection

No special requirements are needed under normal conditions of usage. Avoid contact with eyes. If risk of eye contact exists, use safety glasses with side shields (EN 166).

#### b) Skin protection:

No special requirements are needed under normal conditions of usage. When manipulating with heated/hot material use heat isolating gloves made of para-aramid/carbon with thermal isolation up to 270°C and forearm protection. Example of recommended gloves: KCL, Karbo TECT with leather forearm cuffs, with thermal isolation up to 350°C.

NOTICE: The selection of a specific glove for a particular application and duration of use in a workplace should also take into account all relevant workplace factors such as, but not limited to: Other chemicals which may be handled, physical requirements (cut/puncture protection, dexterity, thermal protection), potential body reactions to glove materials, as well as the instructions/specifications provided by the glove supplier. Immediately change damaged gloves

#### c) Respiratory protection:

No special requirements are needed under normal use conditions. Ensure appropriate ventilation or exhaustion at the workplace. Do not inhale decomposition products from overheated product or dust produced by mechanical operations. If engineering controls do not maintain airborne contaminant concentrations at a level which is adequate to protect worker health, an approved respirator may be appropriate. Respirator selection, use, and maintenance must be in accordance with regulatory requirements, if applicable. Types of respirators to be considered for this material include: half-face particle filter respirator, type P1 or FFP1filter (European Committee for Standardization (CEN) standards EN 136, 140 and 405 provide respirator masks and EN 149 and 143 (EN 14387+A1) provide filter recommendations).

#### d) Thermal hazards:

No such risk when normally used.

#### Environmental exposure controls:

Comply with applicable environmental regulations limiting discharge to air, water and soil. Protect the environment by applying appropriate control measures to prevent or limit emissions. All storage and manipulation are have to be equipped for the sanation of possible leakage. See information in sections 6 and 12.

#### **SECTION 9: PHYSICAL AND CHEMICAL PROPERTIES**

#### 9.1 Information on basic physical and chemical properties

| Properties                                    | value                                | method / condition |
|---|--------------------------------------|--------------------|
| Physical state:                               | solid wire                           | 20°C               |
| Colour:                                       | various / according to specification | -                  |
| Odour:  | no odour                             | -                  |
| Melting point/freezing point:                 | 174 - 178°C                          | ISO 11357-1/-3     |
| Boiling point/range or initial boiling point: | information not available            | -                  |
| Flammability:                                 | information not available            | -                  |
| Upper/lower flammability or explosive limits: | information not available            | -                  |
| Flash point:                                  | information not available            | -                  |
| Auto-ignition temperature:                    | 420 – 450°C                          | ASTM D1929-77 - B  |



### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:
-7/13 -

|     | Decomposition temperature:              | > 350°C   | -           |  |
|-----|---|---|-------------|--|
|     | pH:                                     | information not available   | -           |  |
|     | Kinematic viscosity:                    | information not available   | -           |  |
|     | Solubility:                             | insoluble in water<br>soluble in Phenols, Metacresol, Benzyl<br>alcohol, Formic acid (concentrate),<br>Sulphuric acid (concentrate) | water, 20°C |  |
|     | Partition coefficient: n-octanol/water: | information not available   | -           |  |
|     | Vapour pressure:                        | information not available   | -           |  |
|     | Density and/or relative density:        | information not available   | -           |  |
|     | Relative vapour density:                | information not available   | -           |  |
|     | Particle characteristics:               | not applicable  | -           |  |
| 9.2 | Other information                       | '   | '           |  |
|     | Vicat softening temperature:            | 142°C   | ISO 306     |  |
|     | Explosive properties:                   | no explosive properties   | -           |  |
|     | Oxidising properties:                   | no oxidative properties   | -           |  |

#### **SECTION 10: STABILITY AND REACTIVITY**

#### 10.1 Reactivity

Not reactive under normal conditions of storage and manipulation.

#### 10.2 | Chemical stability

Mixture is chemically stable under normal conditions of storage and manipulation. Overheating may cause thermal decomposition.

#### 10.3 Possibility of hazardous reactions

Not known.

#### 10.4 | Conditions to avoid

Not known.

#### 10.5 | Incompatible materials

Not known.

#### 10.6 Hazardous decomposition products

Material does not decompose at ambient temperatures. Incomplete combustion and thermolysis may produce toxic, irritating and flammable decomposition products (such as carbon monoxide, carbon dioxide, sooth, aldehydes and other products of hydrocarbons decomposition).

#### **SECTION 11: TOXICOLOGICAL INFORMATION**

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

No adverse effects for human health are expected for the mixture under normal conditions of usage, the mixture is biologically inert.

#### a) Acute toxicity

Based on available data, the classification criteria are not met. Based on composition, the mixture has low acute toxicity and no adverse effects for human health are expected under applicable conditions of exposure.

#### b) Skin corrosion/irritation

Based on available data, the classification criteria are not met. The mixture has no direct corrosive / irritating properties. Melted product may cause serious burns following the contact with the skin.

#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

PA + glass filament

Page:
- 8/13 -

c) | Serious eye damage/irritation

Based on available data, the classification criteria are not met. The mixture has no direct corrosive / irritating properties. Melted product may cause serious burns following the contact with the eyes.

d) Respiratory or skin sensitisation

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

e) Germ cell mutagenicity

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

f) Carcinogenicity

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

g) Reproductive toxicity

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

*h)* | STOT-single exposure

Based on available data, the classification criteria are not met. Inhalation of dust loosened dust during manipulation can mechanically irritate airways. However, these effects do not require classification.

*i)* | STOT-repeated exposure

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

j) Aspiration hazard

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

#### 11.2 Information on other hazards

Endocrine disrupting properties

No substances presented in the mixture at a concentration  $\geq$  0.1 % by weight are included in the list established in accordance with Article 59(1) for having endocrine disrupting properties; nor are they 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.

Other information

Not available.

#### **SECTION 12: ECOLOGICAL INFORMATION**

No adverse effects in the environment are expected for the mixture; the mixture is biologically almost inert.

#### 12.1 Toxicity

No data measured for the mixture. No adverse effects in the environment are expected for the mixture; the mixture is almost biologically inert.

Acute toxicity:

Fish: Based on the available information, it is not possible to conclude on the hasard potential of

this mixture.

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

LC50, 96 h (Lepomis macrochirus (Bluegill sunfish)): 4,4 mg/l (Method: OECD Test Guideline 203)

COPPER IODIDE:

May be considered as comparable to a similar product for which experimental results are:

LC50, 96 h (Oncorhynchus mykiss (rainbow trout)): 0,102 - 0,245 mg/l

Aquatic invertebrates: From its composition, it must be considered as: Harmful to daphnia.

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

EC50, 48 h (Daphnia magna (Water flea)): 8,58 mg/l (Method: OECD Test Guideline 202)

**COPPER IODIDE:** 

May be considered as comparable to a similar product for which experimental results are:

#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:

Page:

Page:

- 9/13 -

EC50, 48 h (Daphnia magna (Water flea)): 0,08 mg/l

Aquatic plants: From its composition, it must be considered as: Harmful to algae.

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

ErC50, 72 h (Pseudokirchneriella subcapitata (green algae)) := 0,705 mg/l (Method: OECD Test

Guideline 201)

COPPER IODIDE:

May be considered as comparable to a similar product for which experimental results are:

ErC50, 72 h (Pseudokirchneriella subcapitata (green algae)): 0,067 - 0,123 mg/l (Method: OECD Test

Guideline 201)

Microorganisms:

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

IC50, 3 h (Activated sludge): > 100 mg/l (Method: OECD Test Guideline 209, Respiration inhibition of

activated sludge)

COPPER IODIDE:

EC50, 3 h (Activated sludge): 280 mg/l (Method: OECD Test Guideline 209)

Aquatic toxicity / Long term toxicity:

Fish:

**COPPER IODIDE:** 

May be considered as comparable to a similar product for which experimental results are:

EC10, 28 d (Oncorhynchus mykiss (rainbow trout)) : 0,039 mg/l (Growth inhibition)

Aquatic invertebrates:

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

NOEC, 21 d (Daphnia magna (Water flea)) : = 0,23 mg/l (Method: OECD Test Guideline 211)

**COPPER IODIDE:** 

May be considered as comparable to a similar product for which experimental results are:

NOEC, 21 d (Daphnia magna (Water flea)): 0,023 mg/l

Aquatic plants:

 $BIS(2,2,6,6\text{-}TETRAMETHYL\text{-}4\text{-}PIPERIDYL) \ SEBACATE:$ 

ErC10, 72 h (Pseudokirchneriella subcapitata (green algae)) := 0,188 mg/l (Method: OECD Test

Guideline 201)

COPPER IODIDE:

May be considered as comparable to a similar product for which experimental results are:

NOEC r, 72 h (Pseudokirchneriella subcapitata (green algae)): 0,11 - 0,51 mg/l (Method: OECD Test

Guideline 201)

12.2 Persistence and degradability

Within the environment the mixture does not underlies biological decomposition (not-biodegradable).

Stability in water:

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

Half-life: 206 d pH 4 Half-life: 56,6 d pH 7

#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:
- 10/13 -

Half-life: 2,03 d pH 9

Method: OECD Test Guideline 111

COPPER IODIDE:

Hydrolyses on contact with water.

Biodegradation (In water): Inert polymer Not biodegradable on the basis of its structure

BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

Not readily biodegradable.: 24 % after 28 d (Method: OECD Test Guideline 301 B)

#### 12.3 Bioaccumulative potential

Bioaccumulation: Based on the available information, it is not possible to conclude on the bioaccumulation potential of this mixture.

#### BIS(2,2,6,6-TETRAMETHYL-4-PIPERIDYL) SEBACATE:

Partition coefficient: n-octanol/water: log Kow: 0,35, at 25 °C (Method: OECD Test Guideline 107)

COPPER IODIDE: inorganic

#### 12.4 Mobility in soil

No data for the mixture. Insoluble in water, mobility in soil is not expected.

#### 12.5 Results of PBT and vPvB assessment

The substances in the mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII; the substances in the mixture are not included in the Candidate List of SVHC

#### 12.6 Endocrine disrupting properties

No substances presented in the mixture at a concentration  $\geq 0.1$  % by weight are included in the list established in accordance with Article 59(1) for having endocrine disrupting properties; nor are they 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.

#### 12.7 Other adverse effects

Not known.

#### **SECTION 13: DISPOSAL CONSIDERATIONS**

#### 13.1 Waste treatment methods

It is recommended to dispose all rests in authorized dangerous waste facility. Disposal has to comply all local legal requirements on wastes.

#### Substance or mixture disposal methods:

Dispose in accordance with the valid waste legislation. Do not dispose as a common household waste. Dispose in a certified waste facility / recycle. According to the European Waste Catalogue waste codes are not specific for product, but for its use. Therefore, appropriate waste code should assign final user according to his specific use.

Proposed waste classification, based on the most common use:

#### 07 Wastes from Organic Chemical Processes

07 02 wastes from the MFSU of plastics, synthetic rubber and man-made fibres

Waste type name: waste plastic Waste catalog code: 07 02 13

Hazardous waste: no

#### Packages disposal methods:

Recycle empty packages.

Proposed waste classification, based on the most common use:

15 Waste packaging; absorbents, wiping cloths, filter materials and protective clothing not otherwise specified

15 01 packaging (including separately collected municipal packaging waste)

Waste type name: paper and card board packaging / plastic packaging

Waste catalog code for empty package: 15 01 01 / 15 01 02

Dangerous waste: no

#### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Page:

Date of compilation/revision

1. 7. 2025

Version: 1.0

Replaces:

Version: 1.0

- 11/13 -

| SECTION 14: TRANSPORT INFORMATION |  |                                  |                           |                         |  |
|-----------------------------------|--|----------------------------------|---------------------------|-------------------------|--|
| The s                             | ubstance is not classified as da   | angerous for transport according | g to ADR/RID/IMDG/ICAO/IA | ATA.                    |  |
| 14.1                              | UN Number or ID Number   | : -                              |                           |                         |  |
| 14.2                              | UN proper shipping name  |                                  |                           |                         |  |
|                                   | Road transport ADR   | Rail transport RID               | Int. maritime trans. IMDG | Air transport ICAO/IATA |  |
|                                   | -  | -                                | -                         | -                       |  |
| 14.3                              | 3 Transport hazard class(es)   |                                  |                           |                         |  |
|                                   | Road transport ADR   | Rail transport RID               | Int. maritime trans. IMDG | Air transport ICAO/IATA |  |
|                                   | -  | -                                | -                         | -                       |  |
|                                   | Classification code  |                                  |                           |                         |  |
|                                   | -  | -                                | -                         | -                       |  |
|                                   | Hazard identification number (Kemler)                                    |                                  |                           |                         |  |
|                                   | -  | -                                | -                         | -                       |  |
|                                   | Labels   |                                  |                           |                         |  |
|                                   | -  | -                                | -                         | -                       |  |
|                                   | Other remarks  |                                  |                           |                         |  |
|                                   | -  | -                                | -                         | -                       |  |
| 14.4                              | Packing group  |                                  |                           |                         |  |
|                                   | Road transport ADR   | Rail transport RID               | Int. maritime trans. IMDG | Air transport ICAO/IATA |  |
|                                   | -  | -                                | -                         | -                       |  |
| 14.5                              | Environmental hazards: no  |                                  |                           |                         |  |
| 14.6                              | Special precautions for user: not required                               |                                  |                           |                         |  |
| 14.7                              | Maritime transport in bulk according to IMO instruments: not transported |                                  |                           |                         |  |

#### **SECTION 15: REGULATORY INFORMATION**

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

Relevant legislation European Union:

- Regulation (EC) No 1907/2006 of the European Parliament and of the , concerning the Registration, Evaluation, Authorization and Restriction of Chemicals (REACH)
- Regulation EC No 1272/2008 of the European Parliament and of the Council of 16 December 2008 on classification, labelling and packaging of substances and mixtures, amending and repealing Directives 67/548/EEC and 1999/45/EC, and amending Regulation (EC) No 1907/2006
- Commission Regulation (EU) 2020/878 of 18 June 2020 amending Annex II to Regulation (EC) No 1907/2006 of the European Parliament and of the Council
  concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH)
- Commission Directive 2000/39/EC of 8 June 2000 establishing a first list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC on the protection of the health and safety of workers from the risks related to chemical agents at work
- Commission Directive 2006/15/EC of 7 February 2006 establishing a second list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC and amending Directives 91/322/EEC and 2000/39/EC
- Commission Directive 2009/161/EU of 17 December 2009 establishing a third list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC and amending Commission Directive 2000/39/EC
- Commission Directive (EU) 2017/164 of 31 January 2017 establishing a fourth list of indicative occupational exposure limit values pursuant to Council Directive 98/24/EC
- Commission Directive (EU) 2019/1831 of 24 October 2019 establishing a fifth list of indicative occupational exposure limit values pursuant to Council Directive 98/24/EC and amending Commission Directive 2000/39/EC
- Directive 2004/37/EC of the European Parliament and of the Council of 29 April 2004 on the protection of workers from the risks related to exposure to

### SAFETY DATA SHEET

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

Page:
- 12/13 -

carcinogens or mutagens at work

- European Waste Catalogue
- Council Directive 1999/13/EC of 11 March 1999 on the limitation of emissions of volatile organic compounds due to the use of organic solvents in certain activities and installations
- Regulation (EU) No 526/2013 of the European Parliament and of the Council of 21 May 2013 concerning the European Union Agency for Network and Information Security (ENISA) and repealing Regulation (EC) No 460/2004

### Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles: none

| Designation of the substance, of the group of substances or of the mixture       | Conditions of restriction                      |
|--|--|
| Bis(2,2,6,6-tetramethyl-4-piperidyl) sebacate<br>REACH No. 01-2119537297-32-XXXX | Regulation EC 1907/2006, Annex XVII, Article 3 |
| Copper Iodide<br>REACH No. 01-2119972019-33-XXXX                                 | Regulation EC 1907/2006, Annex XVII, Article 3 |

#### 15.2 | Chemical safety assessment

Chemical safety assessment not carried yet

#### **SECTION 16: OTHER INFORMATION**

a) Changes made to the previous version of the safety data sheet

Not applicable, first edition - version 1.0

Key or legend to abbreviations and acronyms used in the safety data sheet

Flam. Liq. 1 Flammable liquids, Hazard Category 1 Flam. Liq. 2 Flammable liquids, Hazard Category 2 Acute Tox. 3 Acute toxicity, Hazard Category 3 Acute toxicity, Hazard Category 4

Eye Dam. 1 Serious eye damage/eye irritation, Hazard Category 1 Eye Irrit. 2 Serious eye damage/eye irritation, Hazard Category 2

Skin Irrit. 2 Skin corrosion/irritation, Hazard Category 2
Skin Sens. 1 Sensitisation — Skin, hazard category 1
Sensitisation — Respiratory, hazard category 1

STOT SE 3
Specific target organ toxicity — Single exposure, Hazard Category 3
STOT RE 2
Aquatic Acute 1
Aquatic Chronic 1
Aquatic Chronic 2
Aquatic Chronic 3

Exp. lim. Exposure limit

NPEL The highest permissible exposure limit (Slovak Republic)
PEL The highest permissible exposure limit (Czech Republic)

OEL Occupational exposure limit

PBT Substances persistent, bioacumulative and toxic vPvB Substances very persistent and very bioacumulative

VOC Volatile organic compound
DNEL Derived No Effect Level

PNEC Predicted No Effect Concentration

BW Body weight
LD50 Median lethal Dose
LC50 Median lethal concentration
EC50 Half maximal effective concentration
IC50 Half maximal inhibitory concentration

ADR European Agreement concerning the International Carriage of Dangerous Goods by Road

RID International Rule for Transport of Dangerous Substances by Railway

IMDG International Maritime Dangerous Goods Code

### **SAFETY DATA SHEET**

conforms to Regulation EC No. 1907/2006 (REACH), Regulation EC No. 1272/2008 (CLP) and Commission Regulation EU No. 2020/878

Product name:

PA + glass filament

Date of compilation/revision

1. 7. 2025

PA + glass filament

Page:
- 13/13 -

|            | ICAO<br>IATA  | International Civil Aviation Organization International Air Transport Association   |
|------------|---|---|
| c)         | Key literature<br>No information                                | e references and sources for data<br>on   |
| d)         | The substance   | valuating information used for the purpose of classification e was classified by expert judgment and conventional calculations methods in accordance with the C No. 1272/2008 (CLP).  |
| <i>e</i> ) | Full wording<br>H225  | of used Hazard Statements (H-phrases) Highly flammable liquid and vapour.   |
|            | H226  | Flammable liquid and vapour.  |
|            | H302  | Harmful if swallowed.   |
|            | H312  | Harmful in contact with skin.   |
|            | H314  | Causes severe skin burns and eye damage.  |
|            | H315  | Causes skin irritation.   |
|            | H317  | May cause an allergic skin reaction.  |
|            | H318  | Causes serious eye damage.  |
|            | H319  | Causes serious eye irritation.  |
|            | H331  | Toxic if inhaled.   |
|            | H332  | Harmful if inhaled.   |
|            | H334  | May cause allergy or asthma symptoms or breathing difficulties if inhaled.  |
|            | H335  | May cause respiratory irritation.   |
|            | H372  | Causes damage to organs through prolonged or repeated exposure.   |
|            | H400  | Very toxic to aquatic life.   |
|            | H411  | Toxic to aquatic life with long lasting effects.  |
|            | H412  | Harmful to aquatic life with long lasting effects.  |
|            | Before handl  | y training appropriate for workers ing, storing or using the present substance for the first time, employees must be informed - common training chemicals, occupational safety training.  |
| g)         | Safety Data S<br>No. 1272/200<br>occupational<br>is accurate to | Sheet (SDS) is compiled in accordance with the Regulation EC No. 1907/2006 (REACH), Regulation EC 08 (CLP) and Commission Regulation EU No. 2020/878; and contains information on safety use, health protection, and environmental protection. The information contained herein is given in good faith and the best of knowledge at the date indicated above. This particular information applies on the product as may not be valid in mixtures with other substances. If used for other purposes as identified in this SDS, the |

distributor is not liable for any damage.

The information given herein in no way dispenses the user from knowing and applying all provisions regulating his activity. The user bears sole liability for the precautions required when using the product. The regulatory texts indicated herein are intended to aid the user to fulfill his obligations. This list is not to be considered complete and exhaustive. It is the user's responsibility to ensure that he is subject to no other obligations than those mentioned.

Compiled: PharmDr. Vladimír Végh, PHARMIS, www.pharmis.cz