

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

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

**1.1 Product identifier**

Trade name **PET-G various colours**

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

Relevant identified uses

FDM 3D Printing

Consumer use (private households)

Professional use

Uses advised against

irrelevant

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

Supplier - business name Roffelsen Plastics B.V.

Street Lichttoren 32

Post code 5611 BJ

The city Eindhoven

State Netherlands

Telephone/fax number +31 (0) 492 59 2800 / -

Person responsible for the card post@roffelsen.com

E-mail post@roffelsen.com

Website: <http://www.roffelsen3D.com>

**1.4 Emergency telephone number**

Emergency information service +31 (0) 492 59 2800

This number is only available during the following office hours:  
Mon-Fri 09:00 - 17:00

**SECTION 2: Hazards identification**

**2.1 Classification of the substance or mixture**

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

This mixture does not meet the criteria for classification in accordance with Regulation No 1272/2008/EC.

**2.2 Label elements**

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

Not required.

**2.3 Other hazards**

The hazards of this product are associated mainly with its processing. Molten polymer will produce thermal burns. Polymer dust may represent a fire hazard at sufficient concentrations in presence of ignition sources.

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

The substance does not meet the criteria for PBT and vPvB in accordance with Annex XIII. The substance was not included in the list established in accordance with Article 59(1) for having endocrine disrupting properties, and the substance is not a substance identified as having endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605.

**SECTION 3: Composition/information on ingredients**
**3.1 Substances:**

not relevant

**3.2 Mixture**

Chemical identity	CAS EC Registration number	Hazard class(es) and category code(s)	Hazard statements	Labelling Codes of pictograms and warning words	Concentration
PET-G	25038-59-9 Polymer	Not Classified	-	-	98 %
PET – colour concentrate; masterbatch (black, green, red, blue, orange)	Polymer	Not Classified	-	-	2 %

Full text of all classifications and hazard statements is given in the section 16.

Substance with an exposure limit in the working atmosphere	None
Substance with specific concentration limits / M-factors	None

**SECTION 4: First aid measures**
**4.1 Description of first aid measures**

In case of accident: Contact a doctor or emergency department - bring the label or this safety data sheet.

Following inhalation

Move exposed person to fresh air in case of accidental inhalation of dust or fumes from overheating or combustion. Consult a physician after significant exposure.

Following skin contact

Cool skin rapidly with cold water after contact with molten polymer.

Do not peel polymer from the skin. Obtain medical attention.

Following eye contact

Immediately flush eyes with plenty of water for at least 20 minutes. Get medical attention if symptoms occur.

Following ingestion

Do not induce vomiting unless directed by medical personnel. Never give anything by mouth to an unconscious person. Get medical attention if symptoms occur and show the MSDS.

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

No information available

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

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

**Notes to physician:**

Treat symptomatically. Contact poison treatment specialist immediately if large quantities have been ingested or inhaled.

**Specific treatments:**

No specific treatment.

**SECTION 5: Firefighting measures****5.1 Extinguishing media****Suitable**

Use an extinguishing agent suitable to local circumstances and the surrounding environment. Example: Water Spray, Dry Chemical Powder and Carbon Dioxide.

**Unsuitable**

Do not use water, if fire is caused by an electrical short circuit.

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

Carbon monoxide, carbon dioxide, acetaldehyde.

**5.3 Advice for firefighters****Unusual fire and explosion hazards:**

Powdered material may form explosive dust-air mixtures. High voltage static electricity build-up and discharge must be avoided when significant quantities of powdered material are present.

**Special protective equipment for fire-fighters:**

Wear self-contained breathing apparatus, protective clothing and headgear to prevent contact with skin and eyes.

**SECTION 6: Accidental release measures****6.1 Personal precautions, protective equipment and emergency procedures****For non-emergency personnel:**

Put on appropriate personal protective equipment.

Spillages may be slippery. Clear up spillages.

The molten polymer may remain hot for some time due to low thermal conductivity. Use care when disposing of molten mass.

Do not breathe vapours or fumes that may be evolved during processing.

**For emergency responders:**

If specialised clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

**6.2 Environmental precautions**

Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

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

Vacuum or sweep up material and place in a container for recuperate or disposal. Avoid dust generation.

**6.4 Reference to other sections**

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

See Section 1 for emergency contact information.  
See Section 8 for information on appropriate personal protective equipment.  
See Section 13 for additional waste treatment information.

**SECTION 7: Handling and storage****7.1 Precautions for safe handling**

Protective measures:

Put on appropriate personal protective equipment (see Section 8).

Advice on general occupational hygiene: Adequate ventilation and cleanliness must be employed in the processing area. Area should be controlled using good occupational hygiene practices. Accumulation of the dust may represent a fire and explosion hazard at sufficient concentrations. Remove ignition sources. Beware of electrostatic charges.

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

Keep containers closed when not in use. Store in original container in a dry, cool and well-ventilated area, away from flame, ignition sources, direct sunlight or incompatible materials (see section 10). Maintain good housekeeping to control dust accumulations.

**7.3 Specific end use(s)**

Not Available

**SECTION 8: Exposure controls/personal protection****8.1 Control parameters****National limit values:**

No exposure limit value known

**Relevant DNELs/DMELs/PNECs and other threshold levels:**

No data available.

**8.2 Exposure controls**

Appropriate engineering controls

Good general ventilation (typically 10 air changes per hour) should be used. Provide for appropriate exhaust ventilation and dust collection at machinery. Provide exhaust ventilation at places where dust is formed.

Exposure controls

– individual protective measures

Hygiene measures:

Wash hands before eating and at the end of the working period. Eye/face protection: Not required under normal conditions of uses. Safety eyewear should be used when there is a likelihood of exposure. Recommended: Safety glasses with side shields when working with molten material.

Skin protection

Hand protection:

Protective gloves are required when handling hot polymer.

Other skin protection:

Appropriate footwear and additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. A safety shower and washing facilities should be available.

Respiratory protection:

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

Not required under normal conditions of uses. In the case of respirable dust and/or fumes, use self-contained breathing apparatus. If respirators are used, a program should be instituted to assure compliance with OSHA standard (OSHA Respiratory Protection Program Guidelines).

Thermal hazard:

not required

Environmental exposure controls

Keep away from drains, surface and ground water.

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

Physical state	Solid Pellets
Colour	black, green, red, blue, orange
Odour	odourless
Melting point/freezing point	Not applicable
Boiling point or initial boiling point and boiling range	Not applicable
Evaporation rate	Not applicable
Flammability	Not applicable
Lower and upper explosion limit	Not applicable
Flash point	Not applicable
Auto-ignition temperature	Not applicable
Decomposition temperature	Not applicable
pH	Not applicable
Kinematic viscosity	Not applicable
Solubility(ies)	Insoluble in water
Partition coefficient n-oktanol/water (log value)	Not applicable
Vapour pressure	Not applicable
Density	≥1,27 g/cm <sup>3</sup>
Relative vapour density	Not applicable
Particle characteristics	Not applicable

**9.2 Other information**

Not applicable

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

No specific test data related to reactivity available for this product or its ingredients.

**10.2 Chemical stability**

The product is stable.

**10.3 Possibility of hazardous reactions**

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

Under normal conditions of storage and use, hazardous reactions will not occur.

**10.4 Conditions to avoid**

No specific data.

**10.5 Incompatible materials**

Acetic Anhydride, acetone, aniline, benzene, chloroform, chromic acid, cyclohexanone, dimethylformamide, dioxane, ethyl acetate, phenol, tetrahydrofuran. Reactive with strong oxidizing agents, as well as strong acids and caustic will decompose polyester

**10.6 Hazardous decomposition products**

Carbon monoxide, carbon dioxide, acetaldehyde.

**SECTION 11: Toxicological information****11.1 Information on hazard classes as defined in Regulation (EC) No 1272/2008**

Classification according to GHS (1272/2008/EC, CLP)

Information on the likely routes of exposure:

Inhalation:

Combustion products may be irritant;

High concentration of dust may be irritant to the respiratory tract.

Ingestion:

Expected to be a low ingestion hazard.

Skin contact:

May cause physical abrasion in contact with skin. Molten polymer will adhere to the skin causing deep thermal burns.

Eye contact:

May cause physical abrasion in contact with eyes.

Acute toxicity

The product has not been tested.

The statements on toxicology have been derived from the properties of the individual component:

SCHWARZ 30 PETG (3030 PETG):

LD50, oral >2000 mg/kg Rat

Skin corrosion/irritation

No known significant effects or critical hazards.

Serious eye damage/irritation

No known significant effects or critical hazards.

Respiratory or skin sensitisation

No known significant effects or critical hazards.

Germ cell mutagenicity

No known significant effects or critical hazards.

Carcinogenicity

No known significant effects or critical hazards.

Reproductive toxicity

No known significant effects or critical hazards.

Specific target organ toxicity (STOT) - single exposure

No known significant effects or critical hazards.

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

Specific target organ toxicity (STOT) – repeated exposure

No known significant effects or critical hazards.

Aspiration hazard

No known significant effects or critical hazards.

**11.2 Information on other hazards:**

There is no additional information.

**SECTION 12: Ecological information****12.1 Toxicity**

Not available.

**12.2 Persistence and degradability**

Not available.

**12.3 Bio accumulative potential**

Not available.

**12.4 Mobility in soil**

Insoluble in water

**12.5 Results of PBT and vPvB assessment**

Not available.

**12.6 Endocrine disrupting properties**

Not available.

**12.7 Other adverse effects**

Not available.

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

Product Methods of disposal:

Like most thermoplastics, the product can be recycled. Can be landfilled or incinerated, when in compliance with local regulations.

Hazardous waste:

Within the present knowledge of the supplier, this product is not regarded as hazardous waste, as defined by EU Directive 91/689/EEC.

Packaging Methods of disposal:

The generation of waste should be avoided or minimized wherever possible. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible.

Special precautions:

This material and its container must be disposed of in a safe way. Empty containers or liners may retain some product residues. Avoid dispersal of spilt material and runoff and contact with soil, waterways, drains and sewers.

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

**SECTION 14: Transport information**

- 14.1 **UN number or ID number** Not applicable
- 14.2 **UN proper shipping name** Not applicable
- 14.3 **Transport hazard class(es)** Not applicable
- 14.4 **Packing group** Not applicable
- 14.5 **Environmental hazards** Not applicable
- 14.6 **Special precautions for user** Not applicable
- 14.7 **Maritime transport in bulk according to IMO instruments** Not applicable

**SECTION 15: Regulatory information**

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

**EU Regulation (EC) No. 1907/2006 (REACH):**

**Annex XIV:**

List of Substances of Very High Concern for Authorization: None of the components are listed.

**Annex XVII:**

Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and articles: None of the components are listed.

**Seveso Directive 2 012/18/EU (Seveso III)**

No dangerous substance/hazard categories

**Regulation concerning the establishment of a European Pollutant Release and Transfer Register (PRTR)**

Not listed.

**Water Framework Directive (WFD)**

Not listed.

**Regulation (EU) 2019/1148 of the European Parliament and of the Council of 20 June 2019 on the marketing and use of explosives precursors, amending Regulation (EC) No 1907/2006 and repealing Regulation (EU) No 98/2013**

Not listed.

**Regulation on persistent organic pollutants (POP)**

Not listed.

**National regulations (Netherlands)**

**SZW-lijst CMR effects**

Not listed.

**15.2 Chemical Safety Assessment**

Not available

**SECTION 16: Other information**

**Indication of changes (revised safety data sheet)**

-

**Abbreviations and acronyms**

Abbr.	Descriptions of used abbreviations
ADN	Accord européen relatif au transport international des marchandises dangereuses par voies de navigation intérieures (European Agreement concerning the International Carriage of Dangerous Goods by



**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

<b>Abbr.</b>	<b>Descriptions of used abbreviations</b>
	Inland Waterways)
ADR	Accord relatif au transport international des marchandises dangereuses par route (Agreement concerning the International Carriage of Dangerous Goods by Road)
BOD	Biochemical Oxygen Demand
CAS	Chemical Abstracts Service (service that maintains the most comprehensive list of chemical substances)
CLP	Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures
CMR	Carcinogenic, Mutagenic or toxic for Reproduction
COD	Chemical oxygen demand
DGR	Dangerous Goods Regulations (see IATA/DGR)
DMEL	Derived Minimal Effect Level
DNEL	Derived No-Effect Level
EC50	Effective Concentration 50 %. The EC50 corresponds to the concentration of a tested substance causing 50 % changes in response (e.g. on growth) during a specified time interval
EC No	The EC Inventory (EINECS, ELINCS and the NLP-list) is the source for the seven-digit EC number, an identifier of substances commercially available within the EU (European Union)
EINECS	European Inventory of Existing Commercial Chemical Substances
ELINCS	European List of Notified Chemical Substances
EmS	Emergency Schedule
ErC50 ≡ EC50	in this method, that concentration of test substance which results in a 50 % reduction in either growth (EbC50) or growth rate (ErC50) relative to the control
GHS	"Globally Harmonized System of Classification and Labelling of Chemicals" developed by the United Nations
IATA	International Air Transport Association
IATA/DGR	Dangerous Goods Regulations (DGR) for the air transport (IATA)
ICAO	International Civil Aviation Organization
ICAO-TI	Technical instructions for the safe transport of dangerous goods by air
IMDG	International Maritime Dangerous Goods Code
index No	The Index number is the identification code given to the substance in Part 3 of Annex VI to Regulation (EC) No 1272/2008
LC50	Lethal Concentration 50%: the LC50 corresponds to the concentration of a tested substance causing 50 % lethality during a specified time interval
LD50	Lethal Dose 50 %: the LD50 corresponds to the dose of a tested substance causing 50 % lethality during a specified time interval
LEL	Lower explosion limit (LEL)
NLP	No-Longer Polymer
PBT	Persistent, Bioaccumulative and Toxic
ppm	Parts per million
PNEC	Predicted No-Effect Concentration

**PET-G various colours**

Date of compilation:

14. 08. 2023

Revision: (date)

-

<b>Abbr.</b>	<b>Descriptions of used abbreviations</b>
REACH	Registration, Evaluation, Authorisation and Restriction of Chemicals
RID	Règlement concernant le transport International ferroviaire des marchandises Dangereuses (Regulations concerning the International carriage of Dangerous goods by Rail)
STEL	Short-term exposure limit
SVHC	Substance of Very High Concern
TWA	Time-weighted average
UEL	Upper explosion limit (UEL)
VOC	Volatile Organic Compounds
vPvB	Very Persistent and very Bioaccumulative

**Key literature references and sources for data**

Regulation (EC) No 1272/2008 on classification, labelling and packaging of substances and mixtures. Regulation (EC) No. 1907/2006 (REACH), amended by 2020/878/EU.

Transport of dangerous goods by road, rail and inland waterway (ADR/RID/ADN). International Maritime Dangerous Goods

Code (IMDG). Dangerous Goods Regulations (DGR) for the air transport (IATA).

**Full text of all classifications and hazard statements**

none

**Disclaimer**

This information is based upon the present state of our knowledge. This SDS has been compiled and is solely intended for this product. For this product it is not legally required to provide an SDS under Article 31 of the REACH Regulation, because the product is not classified as hazardous. This document is prepared as a voluntary and additional service to provide general safety information.

*End of safety data sheet*