SAFETY DATA SHEET

according to Commission Regulation (EU) 2020/878 as amended

Topnik Żel

Creation date	23rd June 2022		
Revision date	25th January 2023	Version	4.0

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

1.1. Product identifier — Topnik Żel

Substance / mixture: mixture

UFI: TH00-003M-T001-TPRP

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

Mixture's intended use

Flux agent.

Main intended use

PC-TEC-24 Welding, soldering, and flux products

Mixture uses advised against

The product should not be used in ways other then those referred in Section 1.

1.3. Details of the supplier of the safety data sheet

Manufacturer

Name or trade name	AG TermoPasty Grzegorz Gąsowski
Address	Kolejowa 33 E, Sokoły, 18-218 Poland
Identification number (CRN)	200133730
VAT Reg No	PL9661767714
Phone	862741342
E-mail	biuro@termopasty.pl
Web address	www.termopasty.pl

Competent person responsible for the safety data sheet

Name	AG TermoPasty Grzegorz Gąsowski
E-mail	biuro@termopasty.pl

1.4. Emergency telephone number

European emergency number: 112

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification of the mixture in accordance with Regulation (EC) No 1272/2008

The mixture is classified as dangerous.

Skin Irrit. 2, H315
Skin Sens. 1, H317
Eye Dam. 1, H318
Resp. Sens. 1, H334

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

Most serious adverse effects on human health and the environment

May cause an allergic skin reaction. Causes serious eye damage. Causes skin irritation. May cause allergy or asthma symptoms or breathing difficulties if inhaled.

2.2. Label elements

Hazard pictogram

Signal word

Danger

Hazardous substances

COLOPHONIUM
succinic anhydride

Hazard statements

H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Precautionary statements

P261	Avoid breathing vapours.
P280	Wear protective gloves/protective clothing/eye protection.
P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P333+P313	If skin irritation or rash occurs: Get medical advice/attention.
P342+P311	If experiencing respiratory symptoms: Call a POISON CENTER/doctor.

2.3. Other hazards

The mixture does not contain substances with endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605. Mixture does not contain any substance meet the criteria for PBT or vPvB in accordance with Annex XIII of Regulation (EC) No. 1907/2006 (REACH) as amended. Dust may form explosive mixture with air.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

Mixture contains these hazardous substances and substances with the highest permissible concentration in the working environment

Identification numbers	Substance name	Content in % weight	Classification according to Regulation (EC) No 1272/2008	Note
Index: 650-015-00-7 CAS: 8050-09-7 EC: 232-475-7 Registration number: 01-2119480418-32-XXXX	COLOPHONIUM	<50	Skin Sens. 1, H317	1
Index: 607-103-00-5 CAS: 108-30-5 EC: 203-570-0 Registration number: 01-2119485841-30-XXXX	succinic anhydride	<5	Acute Tox. 4, H302 Skin Corr. 1, H314 Skin Sens. 1, H317 Resp. Sens. 1, H334 STOT SE 3, H335	

Notes

1 A substance for which exposure limits are set.

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

SECTION 4: First aid measures

4.1. Description of first aid measures

Take care of your own safety. If any health problems are manifested or if in doubt, inform a doctor and show him information from this safety data sheet. If unconscious, put the person in the stabilized (recovery) position on his side with his head slightly bent backwards and make sure that airways are free; never induce vomiting. If the person vomits by himself, make sure that the vomit is not inhaled. In life threatening conditions first of all provide resuscitation of the affected person and ensure medical assistance. Respiratory arrest - provide artificial respiration immediately. Cardiac arrest - provide indirect cardiac massage immediately.

If inhaled

Terminate the exposure immediately; move the affected person to fresh air. Protect the person against growing cold. Provide medical treatment if irritation, dyspnoea or other symptoms persist.

If on skin

Remove contaminated clothes. Wash the affected area with plenty of water, lukewarm if possible. Soap, soap solution or shampoo should be used if there is no skin injury. Provide medical treatment if skin irritation persists.

If in eyes

Do not rub your eyes – it could lead to mechanical damage of the cornea. Rinse eyes immediately with a flow of running water, open the eyelids (also using force if needed); remove contact lenses immediately if worn by the affected person. No neutralization should be performed in any case! Rinsing should be continued for 10-30 minutes from the inner to the outer eye corner to make sure that the other eye is not involved. Depending on the situation, call medical rescue service or ensure medical treatment as promptly as possible. Everyone must be referred for treatment even if affected only a little.

If swallowed

Rinse out the mouth with water and provide 2-5 dL of water. Provide medical treatment if the person has any health problems.

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

If inhaled

Inhaling dust can cause corrosion of the breathing system. May cause allergy or asthma symptoms or breathing difficulties if inhaled.

If on skin

May cause an allergic skin reaction.

If in eyes

Causes serious eye damage.

If swallowed

Corrosion of the digestion system can occur.

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

Symptomatic treatment.

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media

Alcohol-resistant foam, carbon dioxide, powder, water spray jet, water mist.

Unsuitable extinguishing media

Water - full jet.

5.2. Special hazards arising from the substance or mixture

In the event of fire, carbon monoxide, carbon dioxide and other toxic gases may arise. Inhalation of hazardous degradation (pyrolysis) products may cause serious health damage.

5.3. Advice for firefighters

Self-Contained Breathing Apparatus (SCBA) with a chemical protection suit only where personal (close) contact is likely. Use a self-contained breathing apparatus and full-body protective clothing. Do not allow run-off of contaminated fire extinguishing material to enter drains or surface and ground water.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Use personal protective equipment for work. Follow the instructions in the Sections 7 and 8. Do not inhale dust. Prevent contact with skin and eyes.

6.2. Environmental precautions

Prevent contamination of the soil and entering surface or ground water.

6.3. Methods and material for containment and cleaning up

Place the product mechanically in an appropriate manner. Dispose of the collected material according to the instructions in the section 13.

6.4. Reference to other sections

See the Section 7, 8 and 13.

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Do not inhale dust. Prevent contact with skin and eyes. Contaminated work clothing should not be allowed out of the workplace. Wash hands and exposed parts of the body thoroughly after handling. Use personal protective equipment as per Section 8. Observe valid legal regulations on safety and health protection.

7.2. Conditions for safe storage, including any incompatibilities

Store in tightly closed containers in cold, dry and well ventilated areas designated for this purpose.

Content	Packaging type	Material of package
1,4 ml	syringe	PP
10 ml	syringe	PP
100 ml	box	PP
14 ml	syringe	PP

7.3. Specific end use(s)

not available

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

The mixture contains no substances for which occupational exposure limits are set.

United Kingdom **EH40/2005 Workplace exposure limits (Fourth Edition 2020)**

Substance name (component)	Type	Value	Note
COLOPHONIUM (CAS: 8050-09-7)	WEL 8h	0,05 mg/m³	Capable of causing occupational asthma.
	WEL 15min	0,15 mg/m³	

DNEL

COLOPHONIUM

Workers / consumers	Route of exposure	Value	Effect	Value determination	Source
Workers	Dermal	25 mg/kg bw/day	Chronic effects systemic		
Workers	Inhalation	176.32 mg/m³	Chronic effects systemic		
Consumers	Oral	15 mg/kg bw/day	Chronic effects systemic		
Consumers	Dermal	15 mg/kg bw/day	Chronic effects systemic		
Consumers	Inhalation	52.174 mg/m³	Chronic effects systemic		

succinic anhydride

Workers / consumers	Route of exposure	Value	Effect	Value determination	Source
Workers	Inhalation	10 mg/m³	Chronic effects systemic		
Workers	Dermal	83.3 mg/kg bw	Chronic effects systemic		
Workers	Inhalation	0.41 mg/m³	Chronic effects local		
Workers	Inhalation	10 mg/m³	Acute effects systemic		
Workers	Dermal	167 mg/kg bw	Acute effects systemic		
Workers	Inhalation	0.41 mg/m³	Acute effects local		
Workers	Dermal	0.04 mg/cm²	Acute effects local		

PNEC

COLOPHONIUM

Route of exposure	Value	Value determination	Source
Drinking water	0.005 mg/l		
Marine water	0.0005 mg/l		

COLOPHONIUM

Route of exposure	Value	Value determination	Source
Freshwater sediment	108 mg/kg of dry substance		
Sea sediments	10.8 mg/kg of dry substance		
Soil (agricultural)	21.4 mg/kg of dry substance		
Microorganisms in sewage treatment	1000 mg/l		

succinic anhydride

Route of exposure	Value	Value determination	Source
Drinking water	0.1 mg/l		
Marine water	0.01 mg/l		
Water (intermittent release)	1 mg/l		
Microorganisms in sewage treatment	3 mg/l		

8.2. Exposure controls

Follow the usual measures intended for health protection at work and especially for good ventilation. This can be achieved only by local suction or efficient general ventilation. Do not eat, drink and smoke during work. Wash your hands thoroughly with water and soap after work and before breaks for a meal and rest.

Eye/face protection

Protective goggles or face shield (based on the nature of the work performed).

Skin protection

Hand protection: Protective gloves resistant to the product. When choosing appropriate thickness, material and permeability of the gloves, observe recommendations of their particular manufacturer. Observe other recommendations of the manufacturer. Other protection: protective workwear. Contaminated skin should be washed thoroughly.

Respiratory protection

Use a mask with anti-dust filter when the exposition limits of the substances are exceeded or at the place with insufficient ventilation. In case of inadequate ventilation wear respiratory protection.

Thermal hazard

Data not available.

Environmental exposure controls

Observe usual measures for protection of the environment, see Section 6.2.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	solid
Colour	gold, brown
Odour	characteristic
Melting point/freezing point	data not available
Boiling point or initial boiling point and boiling range	data not available
Flammability	data not available
Lower and upper explosion limit	data not available
Flash point	data not available
Auto-ignition temperature	data not available
Decomposition temperature	data not available
pH	non-soluble (in water)
Kinematic viscosity	data not available
Solubility in water	insoluble
Solubility in fats	data not available
Partition coefficient n-octanol/water (log value)	data not available
Vapour pressure	data not available

Density and/or relative density	
Density	ok.1,1 g/cm³ at 80 °C
Relative vapour density	data not available
Particle characteristics	data not available
Form	paste

9.2. Other information

Evaporation rate	non-applicable

SECTION 10: Stability and reactivity

10.1. Reactivity

not available

10.2. Chemical stability

The product is stable under normal conditions.

10.3. Possibility of hazardous reactions

Unknown.

10.4. Conditions to avoid

The product is stable and no degradation occurs under normal use. Protect against flames, sparks, overheating and against frost.

10.5. Incompatible materials

Protect against strong acids, bases and oxidizing agents.

10.6. Hazardous decomposition products

Not developed under normal uses. Dangerous outcomes such as carbon monoxide and carbon dioxide are formed at high temperature and in fire.

SECTION 11: Toxicological information

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

No toxicological data is available for the mixture.

Acute toxicity

Based on available data the classification criteria are not met.

COLOPHONIUM

Route of exposure	Parameter	Method	Value	Exposure time	Species	Sex
Oral	LD_{50}		2800 mg/kg		Rat	
Oral	LD_{50}		>1000		Guinea-pig	
Dermal	LD_{50}		>2000 mg/kg		Rat	

succinic anhydride

Route of exposure	Parameter	Method	Value	Exposure time	Species	Sex
Oral	LD_{50}	OECD 401	1.795 mg/kg		Rat	
Dermal	LD_{50}	OECD 402	>2000 mg/kg		Rat	

Skin corrosion/irritation

Causes skin irritation.

Serious eye damage/irritation

Causes serious eye damage.

Respiratory or skin sensitisation

May cause an allergic skin reaction. May cause allergy or asthma symptoms or breathing difficulties if inhaled.

Germ cell mutagenicity

Based on available data the classification criteria are not met.

Carcinogenicity

Based on available data the classification criteria are not met.

Reproductive toxicity

Based on available data the classification criteria are not met.

Toxicity for specific target organ - single exposure

Based on available data the classification criteria are not met.

Toxicity for specific target organ - repeated exposure
Based on available data the classification criteria are not met.
Aspiration hazard
Based on available data the classification criteria are not met.

11.2. Information on other hazards
The mixture does not contain substances with endocrine disrupting properties in accordance with the criteria set out in Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605.

SECTION 12: Ecological information

12.1. Toxicity

Acute toxicity

COLOPHONIUM

Parameter	Method	Value	Exposure time	Species	Environment	Source
LL_{100}	OECD 203	≤10 mg/l	24 hours	Fish (Branchydanio rerio)		anon,
NOELR	OECD 203	≤1 mg/l	96 hours	Fish (Branchydanio rerio)		anon.
LD_{50}	OECD 203	60.3 mg/l	96 hours	Fish (Branchydanio rerio)		Schreerbaum D
NOELR	OECD 203	≥1000 mg/l	96 hours	Fish (Pimephales promelas)		Kelly, C.R., Clayton, M.A.
LL_{50}	OECD 203	>1000 mg/l	96 hours	Fish (Pimephales promelas)		Kelly, C.R., Clayton, M.A.
EL_{50}	OECD 202	911 mg/l	48 hours	Daphnia (Daphnia magna)		Kelly, C.R., Clayton, M.A.
NOELR	OECD 202	75 mg/l	48 hours	Daphnia (Daphnia magna)		Kelly, C.R., Clayton, M.A.
NOELR	OECD 202	10	48 hours	Daphnia (Daphnia magna)		anon.
EL_{100}	OECD 202	≤100 mg/l	48 hours	Daphnia (Daphnia magna)		anon.
NOELR	OECD 201	≥1000 mg/l	72 hours	Algae (Pseudokirchneriella subcapitata)		Kelly, C.R., Clayton, M.A.
EL_{50}	OECD 201	.1000 mg/l	72 hours	Algae (Pseudokirchneriella subcapitata)		Kelly, C.R., Clayton, M.A.

succinic anhydride

Parameter	Method	Value	Exposure time	Species	Environment	Source
LC_{50}	OECD 203	>100 mg/l	96 hours	Fish (Danio rerio)		
EC_{50}	OECD 202	>100 mg/l	48 hours	Daphnia (Daphnia magna)		
ErC_{50}	OECD 201	>100 mg/l	72 hours	Algae (Pseudokirchneriella subcapitata)		

succinic anhydride

Parameter	Method	Value	Exposure time	Species	Environment	Source
EC_{50}	OECD 209	>300 mg/l	3 hours	Bacteria	Activated sludge	

12.2. Persistence and degradability

Biodegradability

COLOPHONIUM

Parameter	Value	Exposure time	Environment	Result
				Easily biodegradable

succinic anhydride

Parameter	Value	Exposure time	Environment	Result
	>96 %	28 days		Easily biodegradable

not available

12.3. Bioaccumulative potential

COLOPHONIUM

Parameter	Method	Value	Exposure time	Species	Environment	Temperature [°C]
BCF		56.23 ml/kg				

succinic anhydride

Parameter	Method	Value	Exposure time	Species	Environment	Temperature [°C]
Log Pow	OECD 117	2.44				40°C

Data not available.

12.4. Mobility in soil

Data not available.

12.5. Results of PBT and vPvB assessment

Product does not contain any substance meeting the criteria for PBT or vPvB in accordance with the Annex XIII of Regulation (EC) No 1907/2006 (REACH) as amended.

12.6. Endocrine disrupting properties

The mixture does not contain substances with 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

Data not available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

Hazard of environmental contamination; dispose of the waste in accordance with the local and/or national regulations. Proceed in accordance with valid regulations on waste disposal. Any unused product and contaminated packaging should be put in labelled containers for waste collection and submitted for disposal to a person authorised for waste removal (a specialized company) that is entitled for such activity. Do not empty unused product in drainage systems. The product must not be disposed of with municipal waste. Empty containers may be used at waste incinerators to produce energy or deposited in a dump with appropriate classification. Perfectly cleaned containers can be submitted for recycling.

Waste management legislation

Directive 2008/98/EC of the European Parliament and of the Council of 19 November 2008 on waste, as amended. Decision 2000/532/EC establishing a list of wastes, as amended.

SECTION 14: Transport information

14.1. UN number or ID number

not subject to transport regulations

14.2. UN proper shipping name

not relevant

14.3. Transport hazard class(es)

not relevant

14.4. Packing group

not relevant

14.5. Environmental hazards

not relevant

14.6. Special precautions for user

Reference in the Sections 4 to 8.

14.7. Maritime transport in bulk according to IMO instruments

not relevant

SECTION 15: Regulatory information

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

Regulation (EC) No. 1907/2006 of the European Parliament and of the Council of 18th December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing the European Chemicals Agency, amending Directive 1999/45/EC and repealing Council Regulation (EEC) No. 793/93 and Commission Regulation (EC) No. 1488/94 as well as Council Directive 76/769/EEC and Commission Directives 91/155/EEC, 93/67/EEC, 93/105/EC and 2000/21/EC, as amended. REGULATION (EC) No. 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL as amended.

15.2. Chemical safety assessment

A chemical safety assessment has not been carried out (mixture).

SECTION 16: Other information

A list of standard risk phrases used in the safety data sheet

H302	Harmful if swallowed.
H314	Causes severe skin burns and eye damage.
H315	Causes skin irritation.
H317	May cause an allergic skin reaction.
H318	Causes serious eye damage.
H334	May cause allergy or asthma symptoms or breathing difficulties if inhaled.
H335	May cause respiratory irritation.

Guidelines for safe handling used in the safety data sheet

P261	Avoid breathing vapours.
P280	Wear protective gloves/protective clothing/eye protection.
P304+P340	IF INHALED: Remove person to fresh air and keep comfortable for breathing.
P333+P313	If skin irritation or rash occurs: Get medical advice/attention.
P342+P311	If experiencing respiratory symptoms: Call a POISON CENTER/doctor.

Other important information about human health protection

The product must not be - unless specifically approved by the manufacturer/importer - used for purposes other than as per the Section 1. The user is responsible for adherence to all related health protection regulations.

Key to abbreviations and acronyms used in the safety data sheet

ADR	European agreement concerning the international carriage of dangerous goods by road
BCF	Bioconcentration Factor
CAS	Chemical Abstracts Service
CLP	Regulation (EC) No 1272/2008 on classification, labelling and packaging of substance and mixtures
EC	Identification code for each substance listed in EINECS
EC_{50}	Concentration of a substance when it is affected 50% of the population
EINECS	European Inventory of Existing Commercial Chemical Substances
EL_{100}	Effective Loading for 100% of the tested organisms
EL_{50}	Effective Loading for 50% of the tested organisms
EmS	Emergency plan
EU	European Union

EuPCS	European Product Categorisation System
IATA	International Air Transport Association
IBC	International Code For The Construction And Equipment of Ships Carrying Dangerous Chemicals
ICAO	International Civil Aviation Organization
IMDG	International Maritime Dangerous Goods
IMO	International Maritime Organization
INCI	International Nomenclature of Cosmetic Ingredients
ISO	International Organization for Standardization
IUPAC	International Union of Pure and Applied Chemistry
LC_{50}	Lethal concentration of a substance in which it can be expected death of 50% of the population
LD_{50}	Lethal dose of a substance in which it can be expected death of 50% of the population
LL_{100}	Lethal Loading for 100% of tested organisms
LL_{50}	Lethal Loading for 50% of tested organisms
log Kow	Octanol-water partition coefficient
NOEL	No observed effect level
NOELR	No Observed Effect Loading Rate
OEL	Occupational Exposure Limits
PBT	Persistent, Bioaccumulative and Toxic
ppm	Parts per million
REACH	Registration, Evaluation, Authorisation and Restriction of Chemicals
RID	Agreement on the transport of dangerous goods by rail
UN	Four-figure identification number of the substance or article taken from the UN Model Regulations
UVCB	Substances of unknown or variable composition, complex reaction products or biological materials
VOC	Volatile organic compounds
vPvB	Very Persistent and very Bioaccumulative

Acute Tox.	Acute toxicity
Eye Dam.	Serious eye damage
Resp. Sens.	Respiratory sensitization
Skin Corr.	Skin corrosion
Skin Sens.	Skin sensitization
STOT SE	Specific target organ toxicity - single exposure

Training guidelines

Inform the personnel about the recommended ways of use, mandatory protective equipment, first aid and prohibited ways of handling the product.

Recommended restrictions of use

not available

Information about data sources used to compile the Safety Data Sheet

REGULATION (EC) No. 1907/2006 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL (REACH) as amended. REGULATION (EC) No. 1272/2008 OF THE EUROPEAN PARLIAMENT AND OF THE COUNCIL as amended. Data from the manufacturer of the substance / mixture, if available - information from registration dossiers.

The changes (which information has been added, deleted or modified)

The version 4.0 replaces the SDS version from 25 January 2023. Changes were made in sections 1, 2, 13, 15 and 16.

More information

Classification procedure - calculation method.

Statement

The safety data sheet provides information aimed at ensuring safety and health protection at work and environmental protection. The provided information corresponds to the current status of knowledge and experience and complies with valid legal regulations. The information should not be understood as guaranteeing the suitability and usability of the product for a particular application.