

according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

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

1.1. Product identifier

G-LEAF Coating 00001, G-LEAF Coating 00003

Substance / mixture mixture

UFI U300-F08K-N00J-AV21

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

#### Mixture's intended use

Ingredients for solvent-based paints or coating paint. Industrial uses - coating and paint. Professional uses.

#### Mixture uses advised against

Other uses must be evaluated on a case-by-case.

#### Main intended use

PC-PNT-OTH Other paints and coating materials

## 1.3. Details of the supplier of the safety data sheet

#### Manufacturer

Name or trade name BeDimensional S.p.A.

Address Via Lungotorrente Secca, n. 30/r 16163 – Genoa

Phone (+39) 010 2364170 E-mail info@bedimensional.it

Competent person responsible for the safety data sheet

Name Andrea Gamucci

E-mail a.gamucci@bedimensional.it

#### 1.4. Emergency telephone number

Poison Control Center of Milan 02 66101029 (CAV Ospedale Niguarda CaGranda -Milano)

### **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. 1A, H317 Eye Irrit. 2, H319 Aquatic Chronic 3, H412

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

## Most serious adverse effects on human health and the environment

Causes skin irritation. Causes serious eye irritation. May cause an allergic skin reaction. Harmful to aquatic life with long lasting effects.

#### 2.2. Label elements

# Hazard pictogram



### Signal word

Warning

### **Hazardous substances**

reaction mass of: 5-chloro-2- methyl-4-isothiazolin-3-one [EC no. 247-500-7]and 2-methyl-2H -isothiazol-3- one [EC no. 220-239-6] (3:1)



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

Hazard statements

H315 Causes skin irritation.

H317 May cause an allergic skin reaction. H319 Causes serious eye irritation.

H412 Harmful to aquatic life with long lasting effects.

**Precautionary statements** 

P261 Avoid breathing vapours.

P264 Wash hands and exposed parts of the body thoroughly after handling.

P280 Wear protective gloves.

P333+P313 If skin irritation or rash occurs: Get medical advice/attention.
P337+P313 If eye irritation persists: Get medical advice/attention.
P362+P364 Take off contaminated clothing and wash it before reuse.

#### 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.

## **SECTION 3: Composition/information on ingredients**

#### 3.2. Mixtures

#### **Chemical characterization**

Mixture of substances and additives specified below.

 ${\bf Mixture\ contains\ these\ hazardous\ substances\ and\ substances\ with\ the\ highest\ permissible\ concentration\ in\ the\ working\ environment}$ 

Identification numbers	Substance name	Content in % weight	Classification according to Regulation (EC) No 1272/2008	Note
CAS: 1034343-98-0 EC: 801-282-5	Graphene	0-20	Skin Irrit. 2, H315 Eye Irrit. 2, H319 STOT SE 3, H335	
Index: 603-064-00-3 CAS: 107-98-2 EC: 203-539-1	1-methoxy-2-propanol	<0,4	Flam. Liq. 3, H226 STOT SE 3, H336	2
Index: 603-085-00-8 CAS: 52-51-7 EC: 200-143-0	bronopol (INN)	0,035- <0,05	Acute Tox. 4, H302+H312 Skin Irrit. 2, H315 Eye Dam. 1, H318 STOT SE 3, H335 Aquatic Acute 1, H400 (M=10)	3
Index: 613-167-00-5 CAS: 55965-84-9	reaction mass of: 5-chloro-2- methyl-4-isothiazolin-3-one [EC no. 247-500-7]and 2-methyl-2H -isothiazol-3- one [EC no. 220-239-6] (3:1)	0,005- <0,01	Acute Tox. 3, H301 Acute Tox. 2, H310+H330 Skin Corr. 1C, H314 Skin Sens. 1A, H317 Eye Dam. 1, H318 Aquatic Acute 1, H400 (M=100) Aquatic Chronic 1, H410 (M=100) EUH071 Specific concentration limit: Eye Irrit. 2, H319: $0,06\% \le C < 0,6\%$ Skin Sens. 1A, H317: $C \ge 0,0015\%$ Skin Irrit. 2, H315: $0,06\% \le C < 0,6\%$ Skin Corr. 1C, H314: $C \ge 0,6\%$ Eye Dam. 1, H318: $C \ge 0,6\%$	1



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

- Note B: Some substances (acids, bases, etc.) are placed on the market in aqueous solutions at various concentrations and, therefore, these solutions require different classification and labelling since the hazards vary at different concentrations. In Part 3 entries with Note B have a general designation of the following type: 'nitric acid ... %'. In this case the supplier must state the percentage concentration of the solution on the label. Unless otherwise stated, it is assumed that the percentage concentration is calculated on a weight/weight basis.
- 2 Substance with a Union workplace exposure limit.
- 3 Nanoform

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 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 eves

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. Rinsing should continue at least for 10 minutes. Provide medical treatment, specialized if possible.

### 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

Not expected.

#### If on skin

May cause an allergic skin reaction.

### If in eyes

Causes serious eye irritation.

#### If swallowed

Irritation, nausea.

### 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.



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

# **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. 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

Spilled product should be covered with suitable (non-flammable) absorbing material (sand, diatomaceous earth, earth and other suitable absorption materials); to be contained in well closed containers and removed as per the Section 13. In the event of leakage of the substantial amount of the product, inform fire brigade and other competent bodies. After removal of the product, wash the contaminated site with plenty of water. Do not use solvents.

### 6.4. Reference to other sections

See the Section 7, 8 and 13.

#### **SECTION 7: Handling and storage**

#### 7.1. Precautions for safe handling

Prevent formation of gases and vapours in concentrations exceeding the occupational exposure limits. 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. Avoid release to the environment.

### 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.

#### 7.3. Specific end use(s)

not available

## **SECTION 8: Exposure controls/personal protection**

#### 8.1. Control parameters

The mixture contains substances for which occupational exposure limits are set.

### **European Union**

# Commission Directive 2000/39/EC

Substance name (component)	Туре	Value	Note	
	OEL 8 hours	375 mg/m <sup>3</sup>		
	OEL 8 hours	100 ppm		
1-methoxy-2-propanol (CAS: 107-98-2)	OEL 15 minutes	568 mg/m <sup>3</sup>	Skin	
	OEL 15 minutes	150 ppm		

Italy Leg. April 9, 2008, no. 81

Substance name (component)	Type	Value	Note	
	8 hours	375 mg/m <sup>3</sup>		
	8 hours	100 ppm		
1-methoxy-2-propanol (CAS: 107-98-2)	Short term (15 minutes)	568 mg/m <sup>3</sup>	Skin	
	Short term (15 minutes)	150 ppm		

# 8.2. Exposure controls

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.

# 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.



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

#### Respiratory protection

Halfmask with a filter against organic vapours or a self-contained breathing apparatus as appropriate if exposure limit values of substances are exceeded or in a poorly ventilated environment.

#### Thermal hazard

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 Colour data not available Odour data not available data not available Melting point/freezing point Boiling point or initial boiling point and boiling range data not available Flammability data not available Lower and upper explosion limit not applicable Flash point data not available Auto-ignition temperature data not available Decomposition temperature data not available data not available Kinematic viscosity data not available Solubility in water data not available Partition coefficient n-octanol/water (log value) data not available Vapour pressure data not available Density and/or relative density data not available Relative vapour density data not available Particle characteristics data not available

Form

1-Heptanol, 2-propyl- , 7EO (CAS: 160875-66-1) liquid Benzene, mono-C10-13-alkyl derivs., distn. residues (CAS: 84961-70-6) liquid

Distillates (petroleum), hydrotreated heavy paraffinic

(CAS: 64742-54-7)

Graphene (CAS: 1034343-98-0) solid: bulk

# 9.2. Other information

not available

## **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.

liquid

## 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



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

## **SECTION 11: Toxicological information**

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

Inhalation of solvent vapors above values exceeding exposure limits for working environment may result in acute inhalation poisoning, depending on the level of concentration and exposure time. No toxicological data is available for the mixture

#### **Acute toxicity**

Based on available data the classification criteria are not met.

#### Skin corrosion/irritation

Causes skin irritation.

#### Serious eye damage/irritation

Causes serious eye irritation.

## Respiratory or skin sensitisation

May cause an allergic skin reaction.

#### 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

not available

# **SECTION 12: Ecological information**

### 12.1. Toxicity

### **Acute toxicity**

Harmful to aquatic life with long lasting effects.

# 12.2. Persistence and degradability

not available

#### 12.3. Bioaccumulative potential

Not available.

### 12.4. Mobility in soil

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 outin Commission Delegated Regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605.

## 12.7. Other adverse effects

Not available.



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

#### **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

**Additional information** 

#### Air transport - ICAO/IATA

Packaging instructions passenger

208

## **SECTION 15: Regulatory information**

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

Legislative Decree No. 200/2011 - Sanctions for the violation of the provisions on the export and import of dangerous chemical substances – Official Gazette no. 283 of 05 December 2011. Legislative decree no. 81 of 09 April 2008 on health and safety protection of employees in the workplace. 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 of 16th 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, as amended.

## 15.2. Chemical safety assessment

not available



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

#### **SECTION 16: Other information**

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

H226 Flammable liquid and vapour.

H301 Toxic 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.
H319 Causes serious eye irritation.
H335 May cause respiratory irritation.
H336 May cause drowsiness or dizziness.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects. H412 Harmful to aquatic life with long lasting effects.

H310+H330 Fatal in contact with skin or if inhaled.
H302+H312 Harmful if swallowed or in contact with skin.

## Guidelines for safe handling used in the safety data sheet

P261 Avoid breathing vapours.

P264 Wash hands and exposed parts of the body thoroughly after handling.

P280 Wear protective gloves.

P333+P313 If skin irritation or rash occurs: Get medical advice/attention.
P337+P313 If eye irritation persists: Get medical advice/attention.
P362+P364 Take off contaminated clothing and wash it before reuse.

#### A list of additional standard phrases used in the safety data sheet

EUH071 Corrosive to the respiratory tract.

### 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

EINECS European Inventory of Existing Commercial Chemical Substances

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

INCI International Nomenclature of Cosmetic Ingredients
ISO International Organization for Standardization
IUPAC International Union of Pure and Applied Chemistry

log Kow Octanol-water partition coefficient

MARPOL International Convention for the Prevention of Pollution from Ships

OEL Occupational Exposure Limits

PBT Persistent, Bioaccumulative and Toxic

ppm Parts per million



according to Regulation (EC) No 1907/2006 (REACH) as amended

# G-LEAF Coating 00001 - G-LEAF Coating 00003

Creation date 17th February 2022

Revision date Version 2.0

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

Aguatic Acute Hazardous to the aguatic environment

Aquatic Chronic Hazardous to the aquatic environment (chronic)

Eye Dam. Serious eye damage
Eye Irrit. Eye irritation
Flam. Liq. Flammable liquid
Skin Corr. Skin corrosion
Skin Irrit. Skin irritation
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.

## 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.