

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

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

1.1 Product identifier

Trade name

Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

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

Relevant identified uses of the substance or mixture

Refilling ink

Uses advised against

No data available.

1.3 Details of the supplier of the safety data sheet

Address

Legamaster International B.V.

Kwinkweerd 62

Postbus 111

7240 AC Lochem

The Netherlands

Telephone no. +31 (0) 573-713000

Information provided by / telephone

+31 (0) 573-713000

Advice on Safety Data Sheet

sdb_info@umco.de

1.4 Emergency telephone number

For medical advice (in German and English):

+49 (0)30 30686 790 (Giftnotruf Berlin)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification in accordance with Regulation (EC) No 1272/2008 (CLP)

Eye Dam. 1; H318

Flam. Liq. 2; H225

STOT SE 3; H336

Classification information

This product is assessed and classified using the methods and criteria below referred to in Article 9 of Regulation (EC) n° 1272/2008:

Physical hazards: determined through assessment data based on the methods or standards referred to in part 2 of Annex I to CLP

Health hazards and environmental hazards: determined through toxicological and ecotoxicological assessment data based on the methods or standards referred to in Part 3, 4 and 5 of Annex I to CLP.

2.2 Label elements

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

Hazard pictograms



GHS02



GHS05



GHS07

Signal word

Danger

Hazardous component(s) to be indicated on label:

propan-1-ol

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

Hazard statements

H225 Highly flammable liquid and vapour.
 H318 Causes serious eye damage.
 H336 May cause drowsiness or dizziness.

Precautionary statements

P101 If medical advice is needed, have product container or label at hand.
 P102 Keep out of reach of children.
 P210 Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
 P271 Use only outdoors or in a well-ventilated area.
 P280 Wear protective gloves/protective clothing/eye protection/face protection.
 P305+P351+P338 IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.
 P310 Immediately call a POISON CENTER/doctor.
 P370+P378 In case of fire: Use water spray, extinguishing powder, foam or CO2 for extinction.
 P405 Store locked up.
 P501 Dispose of contents/container in accordance with local and national regulations.

2.3 Other hazards

No data available.

SECTION 3: Composition/information on ingredients
3.1 Substances

Not applicable. The product is not a substance.

3.2 Mixtures
Chemical characterization

Mixture (preparation)

Hazardous ingredients

No	Substance name	Additional information	
	CAS / EC / Index / REACH no	Classification (EC) 1272/2008 (CLP)	Concentration
			%
1	propan-1-ol		
	71-23-8 200-746-9 603-003-00-0 -	Eye Dam. 1; H318 Flam. Liq. 2; H225 STOT SE 3; H336	>= 50.00 - < 100.00 %-b.w.
2	propan-2-ol		
	67-63-0 200-661-7 603-117-00-0 -	Eye Irrit. 2; H319 Flam. Liq. 2; H225 STOT SE 3; H336	>= 2.50 - <= 10.00 %-b.w.
3	1-methoxy-2-propanol		
	107-98-2 203-539-1 603-064-00-3 -	Flam. Liq. 3; H226 STOT SE 3; H336	>= 2.50 - <= 10.00 %-b.w.

Full Text for all H-phrases and EUH-phrases: pls. see section 16

3.3 Other information

The data subject of this Material Safety Data sheet refer to the ink contained in this product (marker).

SECTION 4: First aid measures
4.1 Description of first aid measures
General information

In case of persisting adverse effects, consult a physician. Remove contaminated clothing and shoes immediately, and launder thoroughly before reusing. Poisonous symptoms can first be observed after several hours, therefore medical observation for at least 48 hours is necessary.

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

After inhalation

Remove affected person from the immediate area. Ensure supply of fresh air.

After skin contact

Wash off immediately with soap and water.

After eye contact

Remove contact lenses. Rinse eye thoroughly under running water keeping eyelids wide open and protecting the unaffected eye (at least 10 to 15 minutes). Seek medical assistance.

After ingestion

Do not induce vomiting. Call a doctor immediately. Never give anything by mouth to an unconscious person.

4.2 Most important symptoms and effects, both acute and delayed

No data available.

4.3 Indication of any immediate medical attention and special treatment needed

No data available.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media

Alcohol-resistant foam; Extinguishing powder; Carbon dioxide; Water spray jet

Unsuitable extinguishing media

High power water jet

5.2 Special hazards arising from the substance or mixture

In the event of fire, the following can be released: Carbon dioxide (CO₂); Carbon monoxide (CO)

5.3 Advice for firefighters

Cool endangered containers with water spray jet. Use self-contained breathing apparatus. Wear protective clothing. Suppress gases/vapours/mists with water spray jet.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

For non-emergency personnel

Refer to protective measures listed in sections 7 and 8. Avoid contact with skin, eyes and clothing. Ensure adequate ventilation. Keep away sources of ignition.

For emergency responders

No data available. Personal protective equipment (PPE) - see Section 8.

6.2 Environmental precautions

Do not discharge into the drains/surface waters/groundwater. Do not discharge into the subsoil/soil.

6.3 Methods and material for containment and cleaning up

Take up with absorbent material (e.g., sand, kieselguhr, universal binder). Send in suitable containers for recovery or disposal.

6.4 Reference to other sections

No data available.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Advice on safe handling

Provide good ventilation of working area (local exhaust ventilation, if necessary). If workplace exposure limits are exceeded, respiratory protection approved for this particular job must be worn. Product inherent handling risks must be minimised taking the appropriate measures for protection and preventive actions. The working process should be designed to rule out the release of hazardous substances or skin contact as far as it is possible by the state of the art.

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

General protective and hygiene measures

Do not eat, drink or smoke during work time. Keep away from foodstuffs and beverages. Avoid contact with eyes and skin. Remove soiled or soaked clothing immediately. Do not inhale vapours. Clean skin thoroughly after work; apply skin cream.

Advice on protection against fire and explosion

Vapours can form an explosive mixture with air. Take precautionary measures against static charges. Keep away from sources of heat and ignition.

7.2 Conditions for safe storage, including any incompatibilities

Technical measures and storage conditions

Keep container tightly closed and dry in a cool, well-ventilated place. Protect from heat and direct sunlight.

Requirements for storage rooms and vessels

Containers which are opened must be carefully closed and kept upright to prevent leakage. Always keep in containers of same material as the original one.

Advice on storage assembly

None known

7.3 Specific end use(s)

No data available.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limit values

No	Substance name	CAS no.	EC no.
1	propan-1-ol	71-23-8	200-746-9
	List of approved workplace exposure limits (WELs) / EH40		
	Propan-1-ol		
	STEL	625 mg/m ³	250 ml/m ³
	TWA	500 mg/m ³	200 ml/m ³
	Skin resorption / sensibilisation	Sk	
2	propan-2-ol	67-63-0	200-661-7
	List of approved workplace exposure limits (WELs) / EH40		
	Propan-2-ol		
	STEL	1250 mg/m ³	500 ml/m ³
	TWA	999 mg/m ³	400 ml/m ³
3	1-methoxy-2-propanol	107-98-2	203-539-1
	2000/39/EWG		
	1-Methoxypropanol-2		
	STEL	568 mg/m ³	150 ml/m ³
	TWA	375 mg/m ³	100 ml/m ³
	Skin resorption / sensibilisation	Skin	
	List of approved workplace exposure limits (WELs) / EH40		
	1-Methoxypropan-2-ol		
	STEL	560 mg/m ³	150 ml/m ³
	TWA	375 mg/m ³	100 ml/m ³
	Skin resorption / sensibilisation	Sk	

8.2 Exposure controls

Appropriate engineering controls

No data available.

Personal protective equipment

Respiratory protection

If workplace exposure limits are exceeded, a respiration protection approved for this particular job must be worn. In case of aerosol and mist formation, take appropriate measures for breathing protection in the event workplace threshold values are not specified.

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

Eye / face protection

Safety glasses with side protection shield (EN 166)

Hand protection

Sufficient protection is given wearing suitable protective gloves checked according to i.e. EN 374, in the event of risk of skin contact with the product. Before use, the protective gloves should be tested in any case for its specific work-station suitability (i.e. mechanical resistance, product compatibility and antistatic properties). Adhere to the manufacturer's instructions and information relating to the use, storage, care and replacement of protective gloves. Protective gloves shall be replaced immediately when physically damaged or worn. Design operations thus to avoid permanent use of protective gloves.

Other

Normal chemical work clothing.

Environmental exposure controls

No data available.

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

Form/Colour	
liquid	
green	
Odour	
characteristic	
Odour threshold	
No data available	
pH value	
No data available	
Boiling point / boiling range	
Value	82 °C
Melting point / melting range	
No data available	
Decomposition point / decomposition range	
No data available	
Flash point	
Value	13 °C
Ignition temperature	
Value	287 °C
Auto-ignition temperature	
Remarks	Product is not selfigniting.
Oxidising properties	
No data available	
Explosive properties	
This product is not explosive. In and after use danger of production of inflammable compounds.	
Flammability (solid, gas)	
No data available	
Lower flammability or explosive limits	
Value	2.1 % vol
Upper flammability or explosive limits	
Value	13.5 % vol

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

Vapour pressure		
Value	19	hPa
Reference temperature	20	°C

Vapour density		
No data available		

Evaporation rate		
No data available		

Relative density		
No data available		

Density		
no data available		

Solubility in water		
Remarks	partially miscible	

Solubility(ies)		
No data available		

Partition coefficient: n-octanol/water		
No data available		

Viscosity		
Value	11.5	mPa*s
Reference temperature	20	°C
Type	dynamic	

Solvent content		
Value	81.3	%

Solids content		
Value	6.5	%

9.2 Other information

Other information		
No data available.		

SECTION 10: Stability and reactivity

10.1 Reactivity

No data available.

10.2 Chemical stability

Stable under recommended storage and handling conditions (See section 7).

10.3 Possibility of hazardous reactions

No data available.

10.4 Conditions to avoid

No data available.

10.5 Incompatible materials

No data available.

10.6 Hazardous decomposition products

No hazardous decomposition products known.

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

SECTION 11: Toxicological information

11.1 Information on toxicological effects

Acute oral toxicity			
No	Substance name	CAS no.	EC no.
1	propan-1-ol	71-23-8	200-746-9
LD50		8000	mg/kg bodyweight
Species	rat		
Source	Manufacturer		
2	propan-2-ol	67-63-0	200-661-7
LD50		5280	mg/kg bodyweight
Species	rat		
Source	Manufacturer		
3	1-methoxy-2-propanol	107-98-2	203-539-1
LD50		5660	mg/kg bodyweight
Species	rat		
Source	Manufacturer		

Acute dermal toxicity			
No	Substance name	CAS no.	EC no.
1	propan-1-ol	71-23-8	200-746-9
LD50		4000	mg/kg bodyweight
Species	rabbit		
Source	Manufacturer		
2	propan-2-ol	67-63-0	200-661-7
LD50		12800	mg/kg bodyweight
Species	rabbit		
Source	Manufacturer		
3	1-methoxy-2-propanol	107-98-2	203-539-1
LD50		9999.99	mg/kg bodyweight
Species	rabbit		
Source	Manufacturer		

Acute inhalational toxicity			
No	Substance name	CAS no.	EC no.
1	propan-1-ol	71-23-8	200-746-9
LC50		33.8	mg/l
Duration of exposure		4	h
State of aggregation	Vapour		
Species	rat		
Method	OECD 403		
Source	ECHA		
2	propan-2-ol	67-63-0	200-661-7
LC50		72.6	mg/l
Duration of exposure		4	h
State of aggregation	Vapour		
Species	rat		
Source	Manufacturer		

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

Skin corrosion/irritation
No data available
Serious eye damage/irritation
No data available
Respiratory or skin sensitisation
No data available
Germ cell mutagenicity
No data available
Reproduction toxicity
No data available
Carcinogenicity
No data available
STOT-single exposure
No data available
STOT-repeated exposure
No data available
Aspiration hazard
No data available
Delayed and immediate effects as well as chronic effects from short and long-term exposure
Inhalation of solvent vapours in higher concentration may lead to nausea, headache, drowsiness and dizziness. Repeated and prolonged skin contact may cause removal of natural fat from the skin and irritation of the skin. Eye contact with the product may lead to irritation.

SECTION 12: Ecological information

12.1 Toxicity

Toxicity to fish (acute)			
No	Substance name	CAS no.	EC no.
1	propan-2-ol	67-63-0	200-661-7
EC50		9640	mg/l
Duration of exposure		96	h
Species	Pimephales promelas		
Source	Manufacturer		

Toxicity to fish (chronic)
No data available

Toxicity to Daphnia (acute)			
No	Substance name	CAS no.	EC no.
1	propan-2-ol	67-63-0	200-661-7
EC50		13299	mg/l
Duration of exposure		48	h
Species	Daphnia magna		
Source	Manufacturer		

Toxicity to Daphnia (chronic)
No data available

Toxicity to algae (acute)			
No	Substance name	CAS no.	EC no.
1	propan-2-ol	67-63-0	200-661-7
EC50	>	1000	mg/l
Duration of exposure		72	h
Species	Desmodesmus subspicatus		
Source	Manufacturer		

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

Toxicity to algae (chronic)
No data available

Bacteria toxicity
No data available

12.2 Persistence and degradability

Biodegradability			
No	Substance name	CAS no.	EC no.
1	propan-2-ol	67-63-0	200-661-7
Value		95	%
Duration		21	day(s)
Method		OECD 301 E	
Source		Manufacturer	
Evaluation		readily biodegradable	

12.3 Bioaccumulative potential

No data available.

12.4 Mobility in soil

No data available.

12.5 Results of PBT and vPvB assessment

No data available.

12.6 Other adverse effects

No data available.

12.7 Other information

Other information
Do not discharge product unmonitored into the environment.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product

Allocation of a waste code number, according to the European Waste Catalogue, should be carried out in agreement with the regional waste disposal company.

Packaging

Residuals must be removed from packaging and when emptied completely disposed of in accordance with the regulations for waste removal. Incompletely emptied packaging must be disposed of in the form of disposal specified by the regional disposer.

SECTION 14: Transport information

14.1 Transport ADR/RID/ADN

Class	3
Classification code	F1
Packing group	II
Hazard identification no.	33
UN number	UN1263
Technical name	PAINT RELATED MATERIAL
Special Provision 640	640D
Tunnel restriction code	D/E
Label	3

14.2 Transport IMDG

Class	3
Packing group	II
UN number	UN1263
Proper shipping name	PAINT RELATED MATERIAL
EmS	F-E+S-E
Label	3

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

14.3 Transport ICAO-TI / IATA

Class	3
Packing group	II
UN number	UN1263
Proper shipping name	Paint related material
Label	3

14.4 Other information

No data available.

14.5 Environmental hazards

Information on environmental hazards, if relevant, please see 14.1 - 14.3.

14.6 Special precautions for user

No data available.

14.7 Transport in bulk according to Annex II of Marpol and the IBC Code

Not relevant

SECTION 15: Regulatory information

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

EU regulations

Regulation (EC) No 1907/2006 (REACH) Annex XIV (List of substances subject to authorisation)

According to the data available and/or specifications supplied by upstream suppliers, this product does not contain any substances considered as substances requiring authorisation as listed on Annex XIV of the REACH regulation (EC) 1907/2006.

REACH candidate list of substances of very high concern (SVHC) for authorisation

According to available data and the information provided by preliminary suppliers, the product does not contain substances that are considered substances meeting the criteria for inclusion in annex XIV (List of Substances Subject to Authorisation) as laid down in Article 57 and article 59 of REACH (EC) 1907/2006.

Regulation (EC) No 1907/2006 (REACH) Annex XVII: RESTRICTIONS ON THE MANUFACTURE, PLACING ON THE MARKET AND USE OF CERTAIN DANGEROUS SUBSTANCES, PREPARATIONS AND ARTICLES

The product is considered being subject to REACH regulation (EC) 1907/2006 annexe XVII.	No 3, 40
---	----------

Directive 2012/18/EU on the control of major-accident hazards involving dangerous substances

This product is subject to Part I of Annex I, risk category:	P5b
--	-----

15.2 Chemical safety assessment

For this mixture a chemical safety assessment has not been carried out.

SECTION 16: Other information

Sources of key data used to compile the data sheet:

Regulation (EC) No 1907/2006 (REACH), 1272/2008 (CLP) as amended in each case.

EC Directives 2000/39/EC, 2006/15/EC, 2009/161/EU

National Threshold Limit Values of the corresponding countries as amended in each case.

Transport regulations according to ADR, RID, IMDG, IATA as amended in each case.

The data sources used to determine physical, toxic and ecotoxic data, are indicated directly in the corresponding chapter.

Full text of the H- and EUH- phrases drawn up in sections 2 and 3 (provided not already drawn up in these sections)

H226	Flammable liquid and vapour.
H319	Causes serious eye irritation.

Department issuing safety data sheet

UMCO Umwelt Consult GmbH

Georg-Wilhelm-Str. 183 , D-21107 Hamburg

Tel.: +49 40 / 79 02 36 300 Fax: +49 40 / 79 02 36 357 e-mail: umco@umco.de

Trade name: Boardmarker refill ink 119504, 119904 (green) contained in: TZ 140

Current version : 2.3.0, issued: 22.10.2015

Replaced version: 2.2.0, issued: 10.09.2015

Region: GB

This information is based on our present state of knowledge and experience.
The security data sheet describes products with a view to the security requirements.
However, it should not constitute a guarantee for any specific product properties and shall not establish a legally valid relationship.

Alterations/supplements:

Alterations to the previous edition are marked in the left-hand margin.

Document protected by copyright. Alterations or reproductions require the express written permission of UMCO Umwelt Consult GmbH.