

according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

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

1.1 Product identifier

Trade name : PALACOS R 1x40 INT

Product code : 66017778

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

Use of the Sub: : Pharmaceutical intermediate

stance/Mixture

1.3 Details of the supplier of the safety data sheet

Company : Heraeus Medical GmbH

Philipp-Reis-Str. 8 - 13 61273 Wehrheim

Telephone : +496181353000

E-mail address of person : sds@heraeus.com

responsible for the SDS (Heraeus Holding: EHS Chemical Safety)

1.4 Emergency telephone number

Emergency telephone num- : +49 6132-84463

ber International Emergency Number

This telephone number is available 24 hours per day, 7 days

per week.

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification (REGULATION (EC) No 1272/2008)

Flammable liquids, Category 2 H225: Highly flammable liquid and vapour.

Skin irritation, Category 2 H315: Causes skin irritation.

Skin sensitisation, Category 1 H317: May cause an allergic skin reaction. Specific target organ toxicity - single ex-

posure, Category 3, Respiratory Tract

2.2 Label elements

Labelling (REGULATION (EC) No 1272/2008)



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Hazard pictograms :





Signal word : Danger

Hazard statements : H225 Highly flammable liquid and vapour.

H315 Causes skin irritation.

H317 May cause an allergic skin reaction.H335 May cause respiratory irritation.

Precautionary statements : Prevention:

P210 Keep away from heat, hot surfaces, sparks, open

flames and other ignition sources. No smoking.

P261 Avoid breathing mist or vapours.

P280 Wear protective gloves/ protective clothing/ eye protec-

tion/ face protection/ hearing protection.

Response:

P303 + P361 + P353 IF ON SKIN (or hair): Take off immedi-

ately all contaminated clothing. Rinse skin with water.

P304 + P340 + P312 IF INHALED: Remove person to fresh

air and keep comfortable for breathing. Call a POISON

CENTER/ doctor if you feel unwell.

P370 + P378 In case of fire: Use dry sand, dry chemical or

alcohol-resistant foam to extinguish.

Hazardous components which must be listed on the label:

methyl methacrylate

2.3 Other hazards

This substance/mixture contains no components considered to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of 0.1% or higher.

Ecological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Toxicological information: The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

SECTION 3: Composition/information on ingredients

3.2 Mixtures

Chemical nature : organic

Components

Chemical name	CAS-No. EC-No. Index-No.	Classification	Concentration (% w/w)
methyl methacrylate	Registration number 80-62-6 201-297-1 607-035-00-6 01-2119452498-28- XXXX	Flam. Liq. 2; H225 Skin Irrit. 2; H315 Skin Sens. 1; H317 STOT SE 3; H335	>= 90 - <= 100
N,N-dimethyl-p-toluidine	99-97-8 202-805-4 612-056-00-9 01-2119956633-31- XXXX	Acute Tox. 3; H301 Acute Tox. 3; H331 Acute Tox. 3; H311 STOT RE 2; H373 (Reproductive organs) Aquatic Chronic 3; H412 Acute toxicity estimate Acute oral toxicity: 100 mg/kg Acute dermal toxicity: 300 mg/kg	>= 1 - < 2,5

The registration numbers listed here are valid if the company listed in Chapter 1 is located in the EU. For ingredients without a registration number there is no registration, because due to the annual amount no registration is required or the substance or its use according to Article 2 of the REACh Regulation (EC 1907/2006) is excluded from registration.

For explanation of abbreviations see section 16.

SECTION 4: First aid measures

4.1 Description of first aid measures

General advice : First aider needs to protect himself.



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Move out of dangerous area.

Show this safety data sheet to the doctor in attendance.

If inhaled : Move to fresh air.

If breathing is irregular or stopped, administer artificial respira-

tion.

Get medical attention.

In case of skin contact : Take off all contaminated clothing immediately.

Wash off with:

Polyethylene glycol 400. Obtain medical attention.

In case of eye contact : In case of eye contact, remove contact lens and rinse imme-

diately with plenty of water, also under the eyelids, for at least

15 minutes.

Keep eye wide open while rinsing.

Protect unharmed eye.
Call a physician immediately.

If swallowed : Immediately give large quantities of water to drink.

Do NOT induce vomiting.

Get medical attention immediately.

4.2 Most important symptoms and effects, both acute and delayed

Risks : Causes skin irritation.

May cause an allergic skin reaction. May cause respiratory irritation.

4.3 Indication of any immediate medical attention and special treatment needed

Treatment : Treat symptomatically.

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media : Use extinguishing measures that are appropriate to local cir-

cumstances and the surrounding environment.

5.2 Special hazards arising from the substance or mixture

Specific hazards during fire-

J

Exposure to decomposition products may be a hazard to

health.

Hazardous combustion prod: :

ucts

fighting

Carbon oxides

Nitrogen oxides (NOx)



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

5.3 Advice for firefighters

for firefighters

Special protective equipment : In the event of fire, wear self-contained breathing apparatus.

Use personal protective equipment.

Further information Use a water spray to cool fully closed containers.

Prevent fire extinguishing water from contaminating surface

water or the ground water system.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions Follow safe handling advice and personal protective equip-

> ment recommendations. Ensure adequate ventilation. Evacuate personnel to safe areas.

Refer to protective measures listed in sections 7 and 8.

6.2 Environmental precautions

Environmental precautions Do not allow contact with soil, surface or ground water.

Do not let product enter drains.

6.3 Methods and material for containment and cleaning up

Methods for cleaning up Contain spillage, soak up with non-combustible absorbent

material, (e.g. sand, earth, diatomaceous earth, vermiculite) and transfer to a container for disposal according to local /

national regulations (see section 13).

Sweep up or vacuum up spillage and collect in suitable con-

tainer for disposal.

6.4 Reference to other sections

See sections: 7, 8, 11, 12 and 13.

SECTION 7: Handling and storage

7.1 Precautions for safe handling

Technical measures Ensure all equipment is electrically grounded before beginning

transfer operations.

Advice on safe handling Take precautionary measures against static discharges.

Provide sufficient air exchange and/or exhaust in work rooms.

Wear personal protective equipment.

Keep away from heat and sources of ignition.

Avoid inhalation, ingestion and contact with skin and eyes.



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Smoking, eating and drinking should be prohibited in the ap-

plication area.

Hygiene measures : Keep away from food and drink. Wash hands before breaks

and at the end of workday. Keep working clothes separately. Remove and wash contaminated clothing and gloves, includ-

ing the inside, before re-use.

7.2 Conditions for safe storage, including any incompatibilities

Requirements for storage areas and containers

Keep tightly closed in a dry, cool and well-ventilated place. Keep locked up or in an area accessible only to qualified or

authorised persons.

Keep away from heat and sources of ignition.

Storage class (TRGS 510) : 3

7.3 Specific end use(s)

Specific use(s) : No data available

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational Exposure Limits

Components	CAS-No.	Value type (Form of exposure)	Control parameters	Basis
methyl methacry- late	80-62-6	TWA	50 ppm	2009/161/EU
	Further information: Indicative			
		STEL	100 ppm	2009/161/EU
	Further information: Indicative			
		AGW	50 ppm	DE TRGS
			210 mg/m3	900
	Peak-limit: excursion factor (category): 2;(I)			
	Further information: When there is compliance with the OEL and biological tolerance values, there is no risk of harming the unborn child			

Derived No Effect Level (DNEL) according to Regulation (EC) No. 1907/2006:

	•	•	` '	
Substance name	End Use	Exposure routes	Potential health ef-	Value
			fects	
methyl methacrylate	Workers	Inhalation	Long-term systemic	208 mg/m3
			effects	
	Workers	Inhalation	Long-term local ef-	208 mg/m3
			fects	
	Workers	Skin contact	Long-term systemic	13,67 mg/kg
			effects	bw/day



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

	Workers	Skin contact	Long-term local effects	1,5 mg/cm2
	Consumers	Inhalation	Long-term systemic effects	74,3 mg/m3
	Consumers	Inhalation	Long-term local ef- fects	104 mg/m3
	Consumers	Skin contact	Long-term systemic effects	8,2 mg/kg bw/day
	Consumers	Skin contact	Long-term local ef- fects	1,5 mg/cm2
	Workers	Skin contact	Acute local effects	1,5 mg/cm2
	Consumers	Skin contact	Acute local effects	1,5 mg/cm2
N,N-dimethyl-p- toluidine	Workers	Inhalation	Long-term systemic effects	1,224 mg/m3
	Workers	Skin contact	Long-term systemic effects	0,694 mg/kg bw/day
	Consumers	Inhalation	Long-term systemic effects	0,302 mg/m3
	Consumers	Skin contact	Long-term systemic effects	0,347 mg/kg bw/day
	Consumers	Ingestion	Long-term systemic effects	0,174 mg/kg bw/day

Predicted No Effect Concentration (PNEC) according to Regulation (EC) No. 1907/2006:

Substance name	Environmental Compartment	Value
methyl methacrylate	Fresh water	0,94 mg/l
	Marine water	0,94 mg/l
	Intermittent use/release	0,94 mg/l
	Sewage treatment plant	10 mg/l
	Fresh water sediment	5,74 mg/kg
	Soil	1,74 mg/kg
N,N-dimethyl-p-toluidine	Fresh water	0,0137 mg/l
	Marine water	0,00137 mg/l
	Intermittent use/release	0,137 mg/l
	Sewage treatment plant	1,36 mg/l
	Fresh water sediment	48,24 mg/kg
	Marine sediment	48,24 mg/kg
	Oral (Secondary Poisoning)	20,36 mg/kg food

8.2 Exposure controls

Engineering measures

Provide sufficient air exchange and/or exhaust in work rooms.

Personal protective equipment

Eye/face protection : Safety glasses with side-shields

Hand protection



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version **Revision Date:** Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

> Remarks Before removing gloves clean them with soap and water.

Gloves should be discarded and replaced if there is any indication of degradation or chemical breakthrough. Please observe the instructions regarding permeability and breakthrough time which are provided by the supplier of the gloves. Also take into consideration the specific local conditions under which the product is used, such as the danger of cuts, abrasion, and the contact time. As the product is a mixture of several substances, the durability of the glove materials cannot be calculated in advance and has to be tested before

use.

Skin and body protection Impervious clothing

Choose body protection according to the amount and concentration of the dangerous substance at the work place. Use respiratory protection unless adequate local exhaust

Respiratory protection

ventilation is provided or exposure assessment demonstrates that exposures are within recommended exposure guidelines.

Filter type Recommended Filter type:

Filter type ABEK-P

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state liquid Colour areen Odour ester-like

Odour Threshold No data available

Melting point/range No data available

Boiling point/boiling range 100 °C (1.013 hPa)

Flammability Not applicable

Upper explosion limit / Upper

flammability limit

12,5 %(V)

(20 °C)(1013 hPa)

Lower explosion limit / Lower : 2,1 %(V)

flammability limit

(20 °C)(1013 hPa)

Flash point 10 °C(1.013 hPa)

Auto-ignition temperature No data available

No data available Decomposition temperature

Not applicable pΗ



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Viscosity

Viscosity, dynamic : No data available

Viscosity, kinematic : < 40 mm2/s (23 °C)

< 20,5 mm2/s (40 °C)

Solubility(ies)

Water solubility : (20 °C, 1.013 hPa)

slightly soluble

Solubility in other solvents : No data available

Partition coefficient: n-

octanol/water

: No data available

Vapour pressure : \leq 1.100 hPa (50 °C)

Relative density : No data available

Density : <= 1 g/cm3 (20 °C, 1.013 hPa)

Relative vapour density : No data available

Particle characteristics

Particle size : Not applicable

9.2 Other information

Explosives : No data available

Oxidizing properties : No data available

Self-ignition : Not applicable

Evaporation rate : No data available

SECTION 10: Stability and reactivity

10.1 Reactivity

No dangerous reaction known under conditions of normal use.

10.2 Chemical stability

Stable under normal conditions.

10.3 Possibility of hazardous reactions

Hazardous reactions : No dangerous reaction known under conditions of normal use.



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

10.4 Conditions to avoid

Conditions to avoid : No data available

Keep away from heat and sources of ignition.

10.5 Incompatible materials

Materials to avoid : No data available

10.6 Hazardous decomposition products

No data available

SECTION 11: Toxicological information

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

Acute toxicity

Not classified based on available information.

Product:

Acute oral toxicity : Acute toxicity estimate: > 2.000 mg/kg

Method: Calculation method

Acute inhalation toxicity : Acute toxicity estimate: > 20 mg/l

Exposure time: 4 h
Test atmosphere: vapour
Method: Calculation method

Acute dermal toxicity : Acute toxicity estimate: > 2.000 mg/kg

Method: Calculation method

Components:

methyl methacrylate:

Acute oral toxicity : LD50 (Rat): 7.900 mg/kg

Acute inhalation toxicity : LC50 (Rat): 29,8 mg/l

Exposure time: 4 h
Test atmosphere: vapour

Acute dermal toxicity : LD50 (Rabbit): > 5.000 mg/kg

N,N-dimethyl-p-toluidine:

Acute oral toxicity : Acute toxicity estimate (Rat): 100 mg/kg



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Method: Expert judgement

Remarks: Based on harmonised classification in EU regulation

1272/2008, Annex VI

Acute dermal toxicity : Acute toxicity estimate: 300 mg/kg

Method: Expert judgement

Remarks: Based on harmonised classification in EU regulation

1272/2008, Annex VI

Skin corrosion/irritation

Causes skin irritation.

Components:

methyl methacrylate:

Species : Rabbit Result : Skin irritation

N,N-dimethyl-p-toluidine:

Species : Rabbit

Method : OECD Test Guideline 404

Result : No skin irritation

Serious eye damage/eye irritation

Not classified based on available information.

Components:

methyl methacrylate:

Species : Rabbit

Result : No eye irritation

N,N-dimethyl-p-toluidine:

Species : Rabbit

Method : OECD Test Guideline 405

Result : No eye irritation

Respiratory or skin sensitisation

Skin sensitisation

May cause an allergic skin reaction.

Respiratory sensitisation

Not classified based on available information.



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Components:

methyl methacrylate:

Test Type : Local lymph node assay (LLNA)

Exposure routes : Skin contact
Species : Mouse
Result : positive

Assessment : Probability or evidence of skin sensitisation in humans

N,N-dimethyl-p-toluidine:

Exposure routes : Skin contact
Species : Guinea pig
Result : negative

Germ cell mutagenicity

Not classified based on available information.

Components:

methyl methacrylate:

Genotoxicity in vitro : Test Type: Bacterial reverse mutation assay (AMES)

Result: negative

Genotoxicity in vivo : Test Type: Mutagenicity (in vivo mammalian bone-marrow

cytogenetic test, chromosomal analysis)

Species: Rat

Application Route: Inhalation

Result: negative

N,N-dimethyl-p-toluidine:

Genotoxicity in vitro : Test Type: Bacterial reverse mutation assay (AMES)

Result: negative

Test Type: Chromosome aberration test in vitro

Result: negative

Carcinogenicity

Not classified based on available information.

Components:

methyl methacrylate:

Species : Mouse
Application Route : Inhalation
Exposure time : 102 weeks



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Result : negative

Reproductive toxicity

Not classified based on available information.

Components:

methyl methacrylate:

Effects on fertility : Test Type: Two-generation reproduction toxicity study

Species: Rat

Application Route: Ingestion Method: OECD Test Guideline 416

Result: negative

Effects on foetal develop-

ment

Test Type: Embryo-foetal development

Species: Rabbit

Application Route: Ingestion Method: OECD Test Guideline 414

Result: negative

STOT - single exposure

May cause respiratory irritation.

Components:

methyl methacrylate:

Assessment : May cause respiratory irritation.

STOT - repeated exposure

Not classified based on available information.

Components:

N,N-dimethyl-p-toluidine:

Exposure routes : Ingestion

Target Organs : Reproductive organs

Assessment : Shown to produce significant health effects in animals at con-

centrations of >10 to 100 mg/kg bw.

Repeated dose toxicity

Components:

methyl methacrylate:

Species : Rat, male
NOAEL : > 124,1 mg/kg
Application Route : Ingestion



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Exposure time : 104 Weeks

N,N-dimethyl-p-toluidine:

Species : Rat

LOAEL : 62,5 mg/kg
Application Route : Ingestion
Exposure time : 90 Days

Aspiration toxicity

Not classified based on available information.

11.2 Information on other hazards

Endocrine disrupting properties

Product:

Assessment : The substance/mixture does not contain components consid-

ered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at

levels of 0.1% or higher.

SECTION 12: Ecological information

12.1 Toxicity

Components:

methyl methacrylate:

Toxicity to fish : LC50 (Oncorhynchus mykiss (rainbow trout)): > 79 mg/l

Exposure time: 96 h

Remarks: No toxicity at the limit of solubility

Toxicity to daphnia and other :

aquatic invertebrates

EC50 (Daphnia magna (Water flea)): 69 mg/l

Exposure time: 48 h

Toxicity to algae/aquatic

plants

ErC50 (Pseudokirchneriella subcapitata (green algae)): > 110

mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201

NOEC (Pseudokirchneriella subcapitata (green algae)): 110

mg/l

Exposure time: 72 h

Method: OECD Test Guideline 201



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Toxicity to microorganisms : EC50 : > 100 mg/l

Exposure time: 14 d

Toxicity to fish (Chronic tox-

icity)

NOEC: 9,4 mg/l

Exposure time: 35 d

Species: Danio rerio (zebra fish) Method: OECD Test Guideline 210

Toxicity to daphnia and other : aquatic invertebrates (Chron-

ic toxicity)

NOEC: 37 mg/l Exposure time: 21 d

Species: Daphnia magna (Water flea) Method: OECD Test Guideline 211

N,N-dimethyl-p-toluidine:

Toxicity to fish : LC50 (Pimephales promelas (fathead minnow)): 46 mg/l

Exposure time: 96 h

Toxicity to daphnia and other :

aquatic invertebrates

EC50 (Daphnia magna (Water flea)): 13,7 mg/l

Exposure time: 48 h

Toxicity to algae/aquatic

plants

ErC50 (Chlorella pyrenoidosa (algae)): 22 mg/l

Exposure time: 72 h

Toxicity to microorganisms : EC50 (Photobacterium phosphoreum): 13,6 mg/l

Exposure time: 30 min

12.2 Persistence and degradability

Components:

methyl methacrylate:

Biodegradability : Result: Readily biodegradable.

Biodegradation: 94 % Exposure time: 14 d

Method: OECD Test Guideline 301C

N,N-dimethyl-p-toluidine:

Biodegradability : Result: Not readily biodegradable.

Biodegradation: 1 % Exposure time: 28 d

12.3 Bioaccumulative potential

Components:

methyl methacrylate:

Heraeus

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Partition coefficient: n-

octanol/water

log Pow: 1,38

N,N-dimethyl-p-toluidine:

Partition coefficient: n-

octanol/water

: log Pow: 1,729

12.4 Mobility in soil

No data available

12.5 Results of PBT and vPvB assessment

Product:

Assessment : This substance/mixture contains no components considered

to be either persistent, bioaccumulative and toxic (PBT), or very persistent and very bioaccumulative (vPvB) at levels of

0.1% or higher.

12.6 Endocrine disrupting properties

Product:

Assessment : The substance/mixture does not contain components consid-

ered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation (EU) 2017/2100 or Commission Regulation (EU) 2018/605 at

levels of 0.1% or higher.

12.7 Other adverse effects

No data available

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product : If recycling is not practicable, dispose of in compliance with

local regulations.

Contaminated packaging : Dispose of as unused product.

SECTION 14: Transport information

14.1 UN number or ID number

ADN : UN 1247 **ADR** : UN 1247 **RID** : UN 1247

Heraeus

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version **Revision Date:** Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

IMDG UN 1247 IATA UN 1247

14.2 UN proper shipping name

ADN METHYL METHACRYLATE MONOMER, STABILIZED **ADR** METHYL METHACRYLATE MONOMER, STABILIZED **RID** METHYL METHACRYLATE MONOMER, STABILIZED **IMDG** METHYL METHACRYLATE MONOMER, STABILIZED

IATA Methyl methacrylate monomer, stabilized

14.3 Transport hazard class(es)

Class Subsidiary risks

ADN 3 **ADR** 3 RID 3 **IMDG** 3 **IATA** 3

14.4 Packing group

ADN

Packing group Ш Classification Code F1 Hazard Identification Number : 339 Labels 3

ADR

Packing group Ш Classification Code F1 Hazard Identification Number 339 Labels 3 Tunnel restriction code (D/E)

Packing group Ш Classification Code F1 Hazard Identification Number : 339 Labels 3

IMDG

Packing group Ш Labels 3

F-E, S-D **EmS Code**

IATA (Cargo)



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

364

Packing instruction (cargo

aircraft)

Packing instruction (LQ) : Y341
Packing group : II

Labels : Flammable Liquids

IATA (Passenger)

Packing instruction (passen- : 353

ger aircraft)

Packing instruction (LQ) : Y341
Packing group : II

Labels : Flammable Liquids

14.5 Environmental hazards

ADN

Environmentally hazardous : no

ADR

Environmentally hazardous : no

RID

Environmentally hazardous : no

IMDG

Marine pollutant : no

14.6 Special precautions for user

The transport classification(s) provided herein are for informational purposes only, and solely based upon the properties of the unpackaged material as it is described within this Safety Data Sheet. Transportation classifications may vary by mode of transportation, package sizes, and variations in regional or country regulations.

14.7 Maritime transport in bulk according to IMO instruments

Not applicable for product as supplied.

SECTION 15: Regulatory information

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

Conditions of restriction for the fol-

Number on list 3

Not applicable

Not applicable

lowing entries should be considered:

REACH - Restrictions on the manufacture, placing on the market and use of certain dangerous substances,

mixtures and articles (Annex XVII)

REACH - Candidate List of Substances of Very High

Concern for Authorisation (Article 59).

Regulation (EC) No 1005/2009 on substances that de-

plete the ozone layer

Regulation (EU) 2019/1021 on persistent organic pollu- : Not applicable

tants (recast)

Regulation (EC) No 649/2012 of the European Parlia: Not applicable

18/21



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

ment and the Council concerning the export and import

of dangerous chemicals

REACH - List of substances subject to authorisation : Not applicable

(Annex XIV)

Seveso III: Directive 2012/18/EU of the Euro-P5c FLAMMABLE LIQUIDS pean Parliament and of the Council on the control of major-accident hazards involving dangerous substances.

Water hazard class (Germa- : WGK 2 obviously hazardous to water

ny) Classification according to AwSV, Annex 1 (5.2)

Other regulations:

Take note of Directive 94/33/EC on the protection of young people at work or stricter national regulations, where applicable.

Take note of Directive 92/85/EEC regarding maternity protection or stricter national regulations, where applicable.

15.2 Chemical safety assessment

A Chemical Safety Assessment has not been carried out.

SECTION 16: Other information

Full text of H-Statements

H225 : Highly flammable liquid and vapour.

H301 : Toxic if swallowed.
H311 : Toxic in contact with skin.
H315 : Causes skin irritation.

H317 : May cause an allergic skin reaction.

H331 : Toxic if inhaled.

H335 : May cause respiratory irritation.

H373 : May cause damage to organs through prolonged or repeated

exposure.

H412 : Harmful to aquatic life with long lasting effects.

Full text of other abbreviations

Acute Tox. : Acute toxicity

Aquatic Chronic : Long-term (chronic) aquatic hazard

Flam. Liq. : Flammable liquids
Skin Irrit. : Skin irritation
Skin Sens. : Skin sensitisation

STOT RE : Specific target organ toxicity - repeated exposure STOT SE : Specific target organ toxicity - single exposure

2009/161/EU : Europe. COMMISSION DIRECTIVE 2009/161/EU establishing

a third list of indicative occupational exposure limit values in implementation of Council Directive 98/24/EC and amending



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

Commission Directive 2000/39/EC

DE TRGS 900 : Germany. TRGS 900 - Occupational exposure limit values.

2009/161/EU / TWA : Limit Value - eight hours 2009/161/EU / STEL : Short term exposure limit DE TRGS 900 / AGW : Time Weighted Average

ADN - European Agreement concerning the International Carriage of Dangerous Goods by Inland Waterways; ADR - Agreement concerning the International Carriage of Dangerous Goods by Road; AIIC - Australian Inventory of Industrial Chemicals; ASTM - American Society for the Testing of Materials; bw - Body weight; CLP - Classification Labelling Packaging Regulation; Regulation (EC) No 1272/2008; CMR - Carcinogen, Mutagen or Reproductive Toxicant; DIN - Standard of the German Institute for Standardisation; DSL - Domestic Substances List (Canada); ECHA -European Chemicals Agency; EC-Number - European Community number; ECx - Concentration associated with x% response; ELx - Loading rate associated with x% response; EmS - Emergency Schedule; ENCS - Existing and New Chemical Substances (Japan); ErCx - Concentration associated with x% growth rate response; GHS - Globally Harmonized System; GLP - Good Laboratory Practice; IARC - International Agency for Research on Cancer; IATA - International Air Transport Association; IBC - International Code for the Construction and Equipment of Ships carrying Dangerous Chemicals in Bulk; IC50 - Half maximal inhibitory concentration; ICAO - International Civil Aviation Organization; IECSC - Inventory of Existing Chemical Substances in China; IMDG - International Maritime Dangerous Goods; IMO - International Maritime Organization; ISHL - Industrial Safety and Health Law (Japan); ISO - International Organisation for Standardization; KECI - Korea Existing Chemicals Inventory; LC50 - Lethal Concentration to 50 % of a test population; LD50 - Lethal Dose to 50% of a test population (Median Lethal Dose); MARPOL - International Convention for the Prevention of Pollution from Ships; n.o.s. - Not Otherwise Specified: NO(A)EC - No Observed (Adverse) Effect Concentration; NO(A)EL - No Observed (Adverse) Effect Level; NOELR - No Observable Effect Loading Rate; NZIoC - New Zealand Inventory of Chemicals; OECD - Organization for Economic Co-operation and Development; OPPTS - Office of Chemical Safety and Pollution Prevention; PBT - Persistent, Bioaccumulative and Toxic substance; PICCS - Philippines Inventory of Chemicals and Chemical Substances; (Q)SAR - (Quantitative) Structure Activity Relationship; REACH - Regulation (EC) No 1907/2006 of the European Parliament and of the Council concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals; RID - Regulations concerning the International Carriage of Dangerous Goods by Rail; SADT - Self-Accelerating Decomposition Temperature; SDS - Safety Data Sheet; SVHC - Substance of Very High Concern; TCSI - Taiwan Chemical Substance Inventory; TECI -Thailand Existing Chemicals Inventory; TRGS - Technical Rule for Hazardous Substances; TSCA - Toxic Substances Control Act (United States); UN - United Nations; vPvB - Very Persistent and Very Bioaccumulative

Further information

Classification of the mixture:

Classification procedure:

Flam. Liq. 2 H225 Based on product data or assessment Skin Irrit. 2 H315 Calculation method Skin Sens. 1 H317 Calculation method



according to Regulation (EC) No. 1907/2006

PALACOS R 1x40 INT

Version Revision Date: Date of last issue: 28.08.2021 7.0 07.02.2023 Date of first issue: 07.02.2020

The information provided in this Safety Data Sheet is correct to the best of our knowledge, information and belief at the date of its publication. The information given is designed only as a guidance for safe handling, use, processing, storage, transportation, disposal and release and is not to be considered a warranty or quality specification. The information relates only to the specific material designated and may not be valid for such material used in combination with any other materials or in any process, unless specified in the text.

DE / EN