

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

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

1.1 Product identifier

Trade name : DISPERBYK-145

Product code : 000000000000141348

Substance name : Alkylolammonium salt

CAS-No. : 398475-96-2

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

Use of the Sub-
stance/Mixture : Wetting & Dispersing Additive

1.3 Details of the supplier of the safety data sheet

Company : BYK-Chemie GmbH
Abelstrasse 45
46483 Wesel

Telephone : +49 281 670-0

Telefax : +49 281 65735

Information : Regulatory Affairs

Telephone : +49 281 670-23532

Telefax : +49 281 670-23533

E-mail address : GHS.BYK@altana.com

1.4 Emergency telephone number

Europe +44 1235 239670

Middle East/Africa +44 1235 239671

Americas +1 215 207 0061

East/South East Asia +65 3158 1074

(Local India: 000 800 100 7479)

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

Classification (REGULATION (EC) No 1272/2008)

Eye irritation, Category 2 H319: Causes serious eye irritation.

Long-term (chronic) aquatic hazard, Category 2 H411: Toxic to aquatic life with long lasting effects.

DISPERBYK-145

Version 1.0
SDB_LI

Revision Date: 10.01.2023

Date of last issue: -
Print Date 28.03.2023

2.2 Label elements

Labelling (REGULATION (EC) No 1272/2008)

Hazard pictograms :



Signal word : Warning

Hazard statements : H319 Causes serious eye irritation.
H411 Toxic to aquatic life with long lasting effects.

Precautionary statements : **Prevention:**

P264 Wash skin thoroughly after handling.
P273 Avoid release to the environment.
P280 Wear eye protection/ face protection.

Response:

P337 + P313 If eye irritation persists: Get medical advice/
attention.
P391 Collect spillage.

Disposal:

P501 Dispose of contents/ container to an approved waste
disposal plant.

Hazardous components which must be listed on the label:

- 398475-96-2 1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate

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.

SECTION 3: Composition/information on ingredients

3.1 Substances

Substance name : Alkylolammonium salt

CAS-No. : 398475-96-2

DISPERBYK-145

Version 1.0
SDB_LI

Revision Date: 10.01.2023

Date of last issue: -
Print Date 28.03.2023

Chemical nature : Phosphoric acid ester salt of a high molecular copolymer with pigment affinic groups

Components

Chemical name	CAS-No. EC-No.	Concentration (% w/w)	M-Factor, SCL, ATE
1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate	398475-96-2	>= 50 - <= 100	

SECTION 4: First aid measures

4.1 Description of first aid measures

General advice : Move out of dangerous area.
Show this safety data sheet to the doctor in attendance.
Do not leave the victim unattended.

If inhaled : If unconscious, place in recovery position and seek medical advice.
If symptoms persist, call a physician.

In case of eye contact : Immediately flush eye(s) with plenty of water.
Remove contact lenses.
Protect unharmed eye.
Keep eye wide open while rinsing.
If eye irritation persists, consult a specialist.

If swallowed : Keep respiratory tract clear.
Do not give milk or alcoholic beverages.
Never give anything by mouth to an unconscious person.
If symptoms persist, call a physician.

4.2 Most important symptoms and effects, both acute and delayed

Symptoms : No information available.

Risks : No information available.

4.3 Indication of any immediate medical attention and special treatment needed

Treatment : No information available.

DISPERBYK-145

Version 1.0
SDB_LI

Revision Date: 10.01.2023

Date of last issue: -
Print Date 28.03.2023

SECTION 5: Firefighting measures

5.1 Extinguishing media

Suitable extinguishing media : Water spray

Foam
Carbon dioxide (CO₂)
Dry chemical

Unsuitable extinguishing media : High volume water jet

5.2 Special hazards arising from the substance or mixture

Specific hazards during fire-fighting : Do not allow run-off from fire fighting to enter drains or water courses.

Hazardous combustion products : Nitrogen oxides (NO_x)
Carbon oxides
Oxides of phosphorus

5.3 Advice for firefighters

Special protective equipment for firefighters : Wear self-contained breathing apparatus for firefighting if necessary.

Further information : Collect contaminated fire extinguishing water separately. This must not be discharged into drains.
Fire residues and contaminated fire extinguishing water must be disposed of in accordance with local regulations.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

Personal precautions : Use personal protective equipment.

6.2 Environmental precautions

Environmental precautions : Prevent product from entering drains.
Prevent further leakage or spillage if safe to do so.
If the product contaminates rivers and lakes or drains inform respective authorities.

6.3 Methods and material for containment and cleaning up

Methods for cleaning up : Soak up with inert absorbent material (e.g. sand, silica gel, acid binder, universal binder, sawdust).
Keep in suitable, closed containers for disposal.

6.4 Reference to other sections

For disposal considerations see section 13., For personal protection see section 8.

DISPERBYK-145

Version 1.0
SDB_LI

Revision Date: 10.01.2023

Date of last issue: -
Print Date 28.03.2023

SECTION 7: Handling and storage

7.1 Precautions for safe handling

- Advice on safe handling : Do not breathe vapours/dust.
Avoid contact with skin and eyes.
For personal protection see section 8.
Smoking, eating and drinking should be prohibited in the application area.
Dispose of rinse water in accordance with local and national regulations.
- Advice on protection against fire and explosion : Normal measures for preventive fire protection.
- Hygiene measures : When using do not eat or drink. When using do not smoke.
Wash hands before breaks and at the end of workday.

7.2 Conditions for safe storage, including any incompatibilities

- Requirements for storage areas and containers : Keep container tightly closed in a dry and well-ventilated place. Containers which are opened must be carefully re-sealed and kept upright to prevent leakage. Electrical installations / working materials must comply with the technological safety standards.
- Further information on storage stability : No decomposition if stored and applied as directed.

7.3 Specific end use(s)

- Specific use(s) : No data available

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Contains no substances with occupational exposure limit values.

8.2 Exposure controls

Personal protective equipment

- Eye protection : Eye wash bottle with pure water
Tightly fitting safety goggles
Wear face-shield and protective suit for abnormal processing problems.
- Hand protection
- Material : PVC disposable gloves
- Break through time : 120,00 min
- Remarks : The suitability for a specific workplace should be discussed with the producers of the protective gloves.

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

Skin and body protection : Impervious clothing
Choose body protection according to the amount and concentration of the dangerous substance at the work place.

Environmental exposure controls

General advice : Prevent product from entering drains.
Prevent further leakage or spillage if safe to do so.
If the product contaminates rivers and lakes or drains inform respective authorities.

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

Physical state : liquid

Colour : light yellow

Odour : not significant

Odour Threshold : No data available

Melting point/freezing point : < 0 °C
Method: derived

Initial boiling point and boiling range : > 146 °C
Method: derived

Upper explosion limit / Upper flammability limit : No data available

Lower explosion limit / Lower flammability limit : No data available

Flash point : > 100,00 °C
Method: 49 (Pensky-Martens)

Auto-ignition temperature : > 200 °C
Method: DIN 51794

Decomposition temperature : No data available

pH : 4,4 (20 °C)
Concentration: 1 %
Method: DIN 19268

Viscosity
Viscosity, dynamic : No data available

Solubility(ies)
Water solubility : 1,66 g/l (20 °C)
pH: 7
Method: OECD Test Guideline 105
GLP: yes

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

Solubility in other solvents : > 522 g/l(20 °C)
Solvent: Alcohol
Method: OECD Test Guideline 105
GLP: yes
completely soluble

Partition coefficient: n-octanol/water : No data available

Vapour pressure : < 1 hPa (20,00 °C)
Method: derived

Relative density : No data available

Density : 1,07 g/cm³ (20,00 °C)
Method: 4 (20°C oscillating U-tube)

Bulk density : Not applicable

Relative vapour density : No data available

9.2 Other information

Flammability (liquids) : Sustains combustion

Evaporation rate : No data available

SECTION 10: Stability and reactivity

10.1 Reactivity

No decomposition if stored and applied as directed.

10.2 Chemical stability

No decomposition if stored and applied as directed.

10.3 Possibility of hazardous reactions

Hazardous reactions : Metals
Gives off hydrogen by reaction with metals.
No decomposition if stored and applied as directed.

10.4 Conditions to avoid

Conditions to avoid : No data available

10.5 Incompatible materials

Materials to avoid : Strong oxidizing agents
Metals

10.6 Hazardous decomposition products

No decomposition if stored and applied as directed.

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

SECTION 11: Toxicological information

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

Acute toxicity

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Acute oral toxicity : LD50 (Rat, male and female): > 5.000 mg/kg
GLP: yes

Skin corrosion/irritation

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Species : Rabbit
Assessment : No skin irritation
Method : OECD Test Guideline 404
Result : No skin irritation
GLP : yes

Serious eye damage/eye irritation

Product:

Remarks : Causes serious eye irritation.

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Species : Rabbit
Assessment : Irritating to eyes.
Method : OECD Test Guideline 405
Result : Irritating to eyes.
GLP : yes

Respiratory or skin sensitisation

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Remarks : No data available

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

Germ cell mutagenicity

Product:

Genotoxicity in vitro : Remarks: No data available

Genotoxicity in vivo : Remarks: No data available

Carcinogenicity

Product:

Remarks : No data available

Reproductive toxicity

Product:

Effects on fertility : Remarks: No data available

Effects on foetal development : Remarks: No data available

STOT - single exposure

Product:

Remarks : No data available

STOT - repeated exposure

Product:

Remarks : No data available

Repeated dose toxicity

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Remarks : No data available

Aspiration toxicity

Product:

No data available

11.2 Information on other hazards

Endocrine disrupting properties

Product:

Assessment : The substance/mixture does not contain components considered to have endocrine disrupting properties according to REACH Article 57(f) or Commission Delegated regulation

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

(EU) 2017/2100 or Commission Regulation (EU) 2018/605 at levels of 0.1% or higher.

Further information

Product:

Remarks : No data available

SECTION 12: Ecological information

12.1 Toxicity

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Toxicity to fish : LC50 (Oncorhynchus mykiss (rainbow trout)): 8,0 mg/l
Exposure time: 96 h
Method: OECD Test Guideline 203
GLP: yes

Toxicity to algae/aquatic plants : ErC50 (Pseudokirchneriella subcapitata (green algae)): > 1,0 mg/l
Exposure time: 72 h
Method: OECD Test Guideline 201
GLP: yes

12.2 Persistence and degradability

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Biodegradability : Result: Not readily biodegradable.
Method: OECD Test Guideline 301B
GLP: yes

12.3 Bioaccumulative potential

Components:

1,2-Ethanediamine, polymer with aziridine, reaction product with 2-propenoic acid, 2-ethylhexyl ester, salt with oxirane, methyl-, polymer with oxirane, monobutyl ether, phosphate:

Bioaccumulation : Remarks: No data available

12.4 Mobility in soil

No data available

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

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Print Date 28.03.2023

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 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.

12.7 Other adverse effects

Product:

Additional ecological information : An environmental hazard cannot be excluded in the event of unprofessional handling or disposal.
Toxic to aquatic life with long lasting effects.

SECTION 13: Disposal considerations

13.1 Waste treatment methods

Product : The product should not be allowed to enter drains, water courses or the soil.
Do not contaminate ponds, waterways or ditches with chemical or used container.
Send to a licensed waste management company.

Contaminated packaging : Empty remaining contents.
Dispose of as unused product.
Do not re-use empty containers.

SECTION 14: Transport information

14.1 UN number or ID number

ADR : UN 3082
RID : UN 3082
IMDG : UN 3082
IATA : UN 3082

14.2 UN proper shipping name

ADR : ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

	(Alkylammonium salt)
RID	: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Alkylammonium salt)
IMDG	: ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S. (Alkylammonium salt)
IATA	: Environmentally hazardous substance, liquid, n.o.s. (Alkylammonium salt)

14.3 Transport hazard class(es)

ADR	: 9
RID	: 9
IMDG	: 9
IATA	: 9

14.4 Packing group

ADR	
Packing group	: III
Classification Code	: M6
Hazard Identification Number	: 90
Labels	: 9
Tunnel restriction code	: -
RID	
Packing group	: III
Classification Code	: M6
Hazard Identification Number	: 90
Labels	: 9
IMDG	
Packing group	: III
Labels	: 9
EmS Code	: F-A, S-F
Remarks	: IMDG Code segregation group - none
IATA (Cargo)	
Packing instruction (cargo aircraft)	: 964
Packing group	: III
Labels	: Miscellaneous
IATA (Passenger)	
Packing instruction (passenger aircraft)	: 964
Packing instruction (LQ)	: Y964
Packing group	: III
Labels	: Miscellaneous

14.5 Environmental hazards

ADR	
Environmentally hazardous	: yes

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

RID

Environmentally hazardous : yes

IMDG

Marine pollutant : yes

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

REACH - Candidate List of Substances of Very High Concern for Authorisation (Article 59). : This product does not contain substances of very high concern (Regulation (EC) No 1907/2006 (REACH), Article 57).

REACH - List of substances subject to authorisation (Annex XIV) : Not applicable

Seveso III: Directive 2012/18/EU of the European Parliament and of the Council on the control of major-accident hazards involving dangerous substances. E2 ENVIRONMENTAL HAZARDS

15.2 Chemical safety assessment

Not applicable

SECTION 16: Other information

Items where relevant changes have been made to the previous version are highlighted in the body of this document by two vertical lines.

Full text of other abbreviations

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

SAFETY DATA SHEET

according to Regulation (EC) No. 1907/2006



DISPERBYK-145

Version 1.0

SDB_LI

Revision Date: 10.01.2023

Date of last issue: -

Print Date 28.03.2023

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

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.

REG_EU / EN