

Safety Data Sheet Non-Emulsifying Agent B232

1. Identification of the substance/preparation and of the Company/undertaking

1.1 Product identifier

Product name Non-Emulsifying Agent B232
Product code B232

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

Recommended use Additive in oilfield applications

Uses advised against Consumer use

1.3 Details of the supplier of the safety data sheet

Supplier identification
Schlumberger Oilfield UK PLC
Victory House, Churchill Court
Manor Royal, Crawley
West Sussex RH10 9LU
+ 47 920 12570
SDS@slb.com

1.4 Emergency Telephone Number

Emergency telephone - (24 Hour) Australia +61 2801 44558, Asia Pacific +65 3158 1074, China +86 10 5100 3039, Europe +44 (0) 1235 239 670, Middle East and Africa +44 (0) 1235 239 671, New Zealand +64 9929 1483, USA 001 281 561 1600

2. Hazards Identification

2.1 Classification of the substance or mixture

Regulation (EC) No. 1272/2008

Health hazards

Skin corrosion/irritation	Category 1 Subcategory 1B
Serious eye damage/eye irritation	Category 2

Environmental hazards Not classified

Physical Hazards

Flammable Liquids	Category 3
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2.2 Label Elements



Signal word
DANGER

Hazard statements

H314 - Causes severe skin burns and eye damage

H226 - Flammable liquid and vapor

Precautionary Statements - EU (§28, 1272/2008)

P210 - Keep away from heat/sparks/open flames/hot surfaces. - No smoking

P280 - Wear protective gloves/protective clothing and eye/face protection

P370 + P378 - In case of fire: Use dry sand, dry chemical or alcohol-resistant foam for extinction

P301 + P330 + P331 - IF SWALLOWED: rinse mouth. Do NOT induce vomiting

P303 + P361 + P353 - IF ON SKIN (or hair): Remove/ Take off immediately all contaminated clothing. Rinse skin with water/ shower

P305 + P351 + P338 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing

Supplementary precautionary statements

P403 + P235 - Store in a well-ventilated place. Keep cool

P264 - Wash face, hands and any exposed skin thoroughly after handling

P260 - Do not breathe dust/fume/gas/mist/vapours/spray

P304 + P340 - IF INHALED: Remove victim to fresh air and keep at rest in a position comfortable for breathing.

P363 - Wash contaminated clothing before re-use

P310 - Immediately call a POISON CENTER or doctor/ physician

P233 - Keep container tightly closed

P240 - Ground/bond container and receiving equipment

P241 - Use explosion-proof electrical/ ventilating/ lighting/ equipment

P242 - Use only non-sparking tools

P243 - Take precautionary measures against static discharge

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

Classification according to EU Directives 67/548/EEC or 1999/45/EC

Indication of danger

C - Corrosive

R-code(s)

R10; R34

Contains

Alkyl hydroxyethyl benzyl ammonium chloride

Propan-2-ol

For the full text of the R-phrases and H-Statements mentioned in this Section, see Section 16.

2.3 Other data

Not classified as PBT/vPvB by current EU criteria

3. Composition/information on Ingredients

3.1 Substances

Not Applicable

3.2 Mixtures

Component	EC-No.	CAS-No	Weight % - range	Classification (67/548)	Classification (Reg. 1272/2008)	REACH registration number
Alkyl hydroxyethyl benzyl ammonium chloride	263-078-7	61789-68-2	10 - <25	C;R34 Xn;R22 F;R11 N;R50	Skin Corr. 1B (H314) Acute Tox. 4 (H302) Aquatic Acute 1 (H400)	No data available
Propan-2-ol	200-661-7	67-63-0	5 - 15	F;R11 R67 Xi;R36	Flam. Liq. 2, (H225) STOT SE 3 (H336) Eye Irrit. 2 (H319)	01-2119457558-25-x xxx

Comments

The product contains other ingredients which do not contribute to the overall classification.

4. First aid measures

4.1 Description of first-aid measures

Inhalation	Keep at rest. Move the exposed person to fresh air at once. If breathing is difficult, (trained personnel should) give oxygen. Seek medical attention at once.
Ingestion	Do NOT induce vomiting. Rinse mouth. Risk of product entering the lungs on vomiting after ingestion. Never give anything by mouth to an unconscious person. Immediate medical attention is required.
Skin contact	Promptly wash contaminated skin with soap or mild detergent and water. Promptly remove clothing if soaked through and wash as above. Burns: Flush with water immediately. While flushing, remove clothes which do not adhere to affected area. Call an ambulance. Continue flushing during transport to hospital. Chemical burns must be treated by a physician.
Eye contact	Remove contact lenses. Immediately flush eyes with water for 15 minutes while holding eyelids open. Seek medical attention at once.

4.2 Most important symptoms and effects, both acute and delayed

General advice	Seek medical attention for all burns, regardless how minor they may seem. The severity of the symptoms described will vary dependant of the concentration and the length of exposure. If adverse symptoms develop, the casualty should be transferred to hospital as soon as possible.
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Main symptoms

Inhalation	Please see Section 11. Toxicological Information for further information.
Ingestion	Please see Section 11. Toxicological Information for further information.
Skin contact	Please see Section 11. Toxicological Information for further information.
Eye contact	Please see Section 11. Toxicological Information for further information.

4.3 Indication of any immediate medical attention and special treatment needed

Notes to physician Treat symptomatically.

5. Fire-fighting measures**5.1 Extinguishing media****Suitable extinguishing media**

Water Fog, Alcohol Foam, CO₂, Dry Chemical.

Extinguishing media which shall not be used for safety reasons

None known.

5.2 Special hazards arising from the substance or mixture**Precautions against fire and explosion**

flammable liquid. Runoff may create fire or explosion hazard. Flash back possible over considerable distance.

Hazardous combustion products

Fire or high temperatures create: Carbon oxides (CO_x), Harmful organic chemical fumes.

5.3 Advice for firefighters**Special protective equipment for fire-fighters**

As in any fire, wear self-contained breathing apparatus and full protective gear.

Special Fire-Fighting Procedures

Containers close to fire should be removed immediately or cooled with water.

6. Accidental release measures**6.1 Personal precautions, protective equipment and emergency procedures**

Do not get in eyes, on skin, or on clothing. Wash thoroughly after handling. Do not breathe vapors or spray mist. Use personal protective equipment. See also section 8.

6.2 Environmental precautions

The product should not be allowed to enter drains, water courses or the soil.

Environmental exposure controls

Avoid release to the environment.

6.3 Methods and materials for containment and cleaning up

Methods for Containment

Prevent further leakage or spillage if safe to do so. Dike far ahead of liquid spill for later disposal.

Methods for cleaning up

Contain and collect spillage with non-combustible absorbent material, (e.g. sand, earth, diatomaceous earth, vermiculite) and place in container for disposal according to local/national regulations (see Section 13).

6.4 Reference to other sections

See section 13 for more information.

7. Handling and Storage

7.1 Precautions for safe handling

Handling

Handle in accordance with good industrial hygiene and safety practice. Avoid contact with skin, eyes and clothing. Avoid spills and splashing during use. Do not breathe vapors or spray mist.

Hygiene measures

Use good work and personal hygiene practices to avoid exposure. When using do not smoke, eat or drink. Wash hands and face before breaks and immediately after handling the product.

7.2 Conditions for safe storage, including any incompatibilities

Technical measures/precautions

Ensure adequate ventilation. Keep airborne concentrations below exposure limits. Take precautionary measures against static discharges. Use spark-proof tools and explosion-proof equipment.

Storage

Keep containers tightly closed in a dry, cool and well-ventilated place. Keep away from open flames, hot surfaces and sources of ignition To avoid ignition of vapours by static electricity discharge, all metal parts of the equipment must be grounded Do not store and transport with oxidizers.

Storage class

Corrosive storage.

Packaging material

Use specially constructed containers only Steel or high density polyethylene (HDPE) container approved for flammables

7.3 Specific end uses

See also Section 1.2.

8. Exposure Controls/Personal Protection

8.1 Control parameters

Component	EU OEL - Third List	Austria	Australia	Denmark
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Alkyl hydroxyethyl benzyl ammonium chloride	Not determined	Not determined	Not determined	Not determined
Propan-2-ol	Not determined	Not determined	400 ppm TWA; 983 mg/m ³ TWA 500 ppm STEL; 1230 mg/m ³ STEL	200 ppm 490 mg/m ³

Component	Finland	France	Germany	Hungary
Alkyl hydroxyethyl benzyl ammonium chloride	Not determined	Not determined	Not determined	Not determined
Propan-2-ol	Not determined	Not determined	200 ppm MAK 500 mg/m ³ MAK	Not determined

Component	New Zealand	Italy	Netherlands	Norway
Alkyl hydroxyethyl benzyl ammonium chloride		Not determined	Not determined	Not determined
Propan-2-ol	500 ppm STEL 1230 mg/m ³ STEL 400 ppm TWA 983 mg/m ³ TWA	Not determined	Not determined	100 ppm 245 mg/m ³

Component	Poland	Portugal	Romania	Russia
Alkyl hydroxyethyl benzyl ammonium chloride	Not determined	Not determined	Not determined	Not determined
Propan-2-ol	1200 mg/m ³ STEL Skin 900 mg/m ³ TWA	400 ppm STEL 200 ppm TWA	Not determined	50 mg/m ³ STEL vapor 10 mg/m ³ TWA vapor

Component	Spain	Switzerland	Turkey	UK
Alkyl hydroxyethyl benzyl ammonium chloride	Not determined	Not determined	Not determined	Not determined
Propan-2-ol	400 ppm VLA-EC 1000 mg/m ³ VLA-EC 200 ppm VLA-ED it is prohibited the partial or complete commercialization or use of this substance as a phytosanitary o biocide compound 500 mg/m ³ VLA-ED it is prohibited the partial or complete commercialization or use of this substance as a phytosanitary o biocide compound	400 ppm STEL 1000 mg/m ³ STEL 200 ppm MAK 500 mg/m ³ MAK	Not determined	500 ppm STEL 1250 mg/m ³ STEL 400 ppm TWA 999 mg/m ³ TWA

Component Information

Derived No Effect Level (DNEL)

Long term exposure systemic effects

Propan-2-ol

Dermal	888 mg/kg bw/day
Inhalation	500 mg/m ³

Predicted No Effect Concentration (PNEC)

Propan-2-ol

Fresh Water	140.9 mg/L
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Sea Water	140.9 mg/L
Fresh water sediment	552 mg/kg
Sea sediment	552 mg/kg
Soil	28 mg/kg
Impact on Sewage Treatment	2251 mg/L
Intermittent release	140.9 mg/L

8.2 Exposure controls

All chemical Personal Protective Equipment (PPE) should be selected based on an assessment of both the chemical hazard present and the risk of exposure to those hazards. The PPE recommendations below are based on an assessment of the chemical hazards associated with this product. Where this product is used in a mixture with other products or fluids, additional hazards may be created and as such further assessment of risk may be required. The risk of exposure and need of respiratory protection will vary from workplace to workplace and should be assessed by the user in each situation.

Engineering measures to reduce exposure

Ensure adequate ventilation. Keep airborne concentrations below exposure limits. Control the source.

Personal protective equipment

Eye protection	Chemical splash goggles and face shield.
Hand protection	Impervious gloves made of: Neoprene, Nitrile, PVC, Be aware that liquid may penetrate the gloves. Frequent change is advisable.
Respiratory protection	In case of insufficient ventilation, wear suitable respiratory equipment, Type A/P3.
Skin and body protection	Chemical resistant suit, Eye wash and emergency shower must be available at the work place.

Hygiene measures

Wash hands before eating, drinking or smoking, Remove and wash contaminated clothing before re-use.



9. Physical and Chemical Properties

9.1 Information on basic physical and chemical properties

Physical state	Liquid
Appearance	Clear
Odour	Alcohol
Colour	Colourless
Odor threshold	No information available

Property	Values	Remarks
pH	2.0 - 4.0	
pH @ dilution		
Melting/freezing point	< -5°C	
Boiling point/range	~ 83 °C	
Flash Point	> 24 °C	Closed cup
Evaporation rate	No information available	
Flammability (solid, gas)	Not Applicable	

Flammability Limits in Air

Upper flammability Limit	No data available	
Lower flammability limit	No data available	
Vapor pressure	No information available	
Vapor density	> 1 (air = 1)	
Specific gravity	No information available	
Bulk density	No information available	Not Applicable
Relative density	0.95 - 1.02	@ 16°C.
Water solubility	Soluble	
Solubility in other solvents	No information available	
Autoignition temperature	No information available	
Decomposition temperature	No information available	
Kinematic viscosity	< 10 cSt @ 40 °C	
Viscosity, dynamic	No information available	
Log Pow	No information available	

Explosive properties	To avoid ignition of vapours by static electricity discharge, all metal parts of the equipment must be grounded
Oxidizing properties	None known.

9.2 Other information

Pour point	No information available
Molecular weight	No information available
VOC content(%)	No information available
Density VALUE	No information available

10. Stability and Reactivity

10.1 Reactivity

No specific reactivity hazards associated with this product.

10.2 Chemical stability

Stable under normal temperature conditions and recommended use.

10.3 Possibility of Hazardous Reactions

Hazardous polymerization

Hazardous polymerisation does not occur.

10.4 Conditions to avoid

Heat, flames and sparks. S16 - Keep away from sources of ignition - No smoking. Keep away from direct sunlight.

10.5 Incompatible materials

Oxidizing agents.

10.6 Hazardous decomposition products

See also section 5.2.

11. Toxicological Information

11.1 Information on toxicological effects

Acute toxicity

Inhalation	Corrosive to respiratory system. May cause drowsiness or dizziness. Inhaled corrosive substances can lead to a toxic oedema of the lungs. VAPORS MAY CAUSE DROWSINESS AND DIZZINESS.
Eye contact	Causes burns. Causes serious eye damage.
Skin contact	Causes severe skin burns.
Ingestion	Causes burns.
Acute toxicity	.

Component	LD50 Oral	LD50 Dermal	LD50 Inhalation
Alkyl hydroxyethyl benzyl ammonium chloride	No data available	No data available	No data available
Propan-2-ol	= 4396 mg/kg (Rat)	= 12870 mg/kg (Rabbit) = 12800 mg/kg (Rat)	= 72.6 mg/L (Rat) 4 h

Sensitisation	This product does not contain any components suspected to be sensitizing.
Mutagenic effects	This product does not contain any known or suspected mutagens.
Carcinogenicity	This product does not contain any known or suspected carcinogens.
Reproductive toxicity	None known.
Routes of exposure	None known. Skin contact. Eye contact. Inhalation. Ingestion.
Routes of entry	No route of entry noted.
Specific target organ toxicity (single exposure)	Not classified
Specific target organ toxicity (repeated exposure)	Not classified.
Aspiration hazard	No hazard from product as supplied.

12. Ecological Information

12.1 Toxicity

This product contains an ingredient that is classified, according to European regulations, as "Very toxic to aquatic life."

Toxicity to algae

See component information below.

Toxicity to fish

See component information below.

Toxicity to daphnia and other aquatic invertebrates

See component information below.

Component	Toxicity to fish	Toxicity to algae	Toxicity to daphnia and other aquatic invertebrates
Alkyl hydroxyethyl benzyl ammonium chloride 61789-68-2 (10 - <25)	No information available	No information available	No information available
Propan-2-ol 67-63-0 (5 - 15)	9640 mg/L LC50 (Pimephales promelas) = 96 h 1400000 µg/L LC50 (Lepomis macrochirus) = 96 h 11130 mg/L LC50 (Pimephales promelas) = 96 h	1000 mg/L EC50 (Desmodesmus subspicatus) = 96 h 1000 mg/L EC50 (Desmodesmus subspicatus) = 72 h	13299 mg/L EC50 (Daphnia magna) = 48 h

12.2 Persistence and degradability

No product level data available.

12.3 Bioaccumulative potential

No data available.

12.4 Mobility in soil
Mobility

The product is water soluble, and may spread in water systems.

12.5 Results of PBT and vPvB assessment

Not classified as PBT/vPvB by current EU criteria.

12.6 Other adverse effects.

None known.

13. Disposal Considerations

13.1 Waste treatment methods
Waste from residues / unused products

Dispose of in accordance with local regulations.

Contaminated packaging

Dispose of in accordance with local regulations. Dispose of contents/container to an approved waste disposal plant.

EWC waste disposal No.

According to the European Waste Catalogue, Waste Codes are not product specific, but application specific. Waste codes should be assigned by the user based on the application for which the product was used. The following Waste Codes are only suggestions: 16 03 05; 16 10 01

14. Transport Information

14.1 UN number

UN/ID No. (ADR/RID/ADN/ADG)	UN 2924
UN No. (IMDG)	UN 2924
UN No. (ICAO)	UN 2924

14.2 Proper shipping name

FLAMMABLE LIQUID, CORROSIVE, N.O.S. (Propan-2-ol, Alkyl hydroxyethyl benzyl ammonium chloride)

14.3. Hazard class(es)

ADR/RID/ADN Hazard class	3 (8)
IMDG Hazard class	3 (8)
ICAO Hazard class/division	3 (8)

14.4 Packing group

ADR/RID/ADN Packing Group	III
IMDG Packing group	III
ICAO Packing group	III



14.5 Environmental hazard

No

14.6 Special precautions

Hazard ID	38
EmS (IMDG)	F-E, S-C
Emergency action code	•3W

Tunnel restriction code	(D/E)
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14.7 Transport in bulk according to Annex II of MARPOL 73/78 and the IBC Code

Not Applicable Please contact SDS@slb.com for info regarding transport in Bulk.

15. Regulatory Information

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

Commission Regulation (EU) No 453/2010 of 20 May 2010 amending Regulation (EC) No 1907/2006 of the European Parliament and of the Council on the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH). Regulation (EC) No 1907/2006 of the European Parliament and of the Council of 18 December 2006 concerning the Registration, Evaluation, Authorisation and Restriction of Chemicals (REACH), establishing a European Chemicals Agency, amending Directive 1999/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, including amendments.

This safety data sheet complies with the requirements of Regulation (EC) No. 1272/2008.

International inventories

USA, Toxic Substances Control Act inventory (TSCA)	Complies
European Union - EINECS and ELINCS	Complies
Canada, Domestic Substance List (DSL)	Complies
Philippines (PICCS)	Does not Comply
Inventory - Japan - Existing and New Chemicals list	Does not Comply
China (IECSC)	Complies
Australia (AICS)	Does not Comply
Korea (KECL)	Complies
Inventory - New Zealand - Inventory of Chemicals (NZIoC)	Complies

15.2 Chemical Safety Report

No information available

16. Other Information

Prepared by	Global Chemical Regulatory Compliance (GCRC) , Beilin Li
Supersedes date	29/Jul/2010
Revision date	25/Jun/2014
Version	1

Text of R phrases mentioned in Section 3

R34 - Causes burns
R11 - Highly flammable
R50 - Very toxic to aquatic organisms
R22 - Harmful if swallowed
R67 - Vapors may cause drowsiness and dizziness
R36 - Irritating to eyes

Full text of H-Statements referred to under sections 2 and 3

H314 - Causes severe skin burns and eye damage
H226 - Flammable liquid and vapor
H302 - Harmful if swallowed
H400 - Very toxic to aquatic life
H225 - Highly flammable liquid and vapor
H336 - May cause drowsiness or dizziness
H319 - Causes serious eye irritation

N/A - Not Applicable, N/D - Not Determined.

Disclaimer

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