SAFETY DATA SHEET

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

1.1 Product identifier

- Product Name: Eco Machine Polish
- Contains 5-chloro-2-methyl-2H-isothiazol-3-one and 2-methyl-2H-isothiazol-3-one

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

- Use of the substance/mixture: Polish Compound for Disc Repair Equipment; Solely to be used with the ELM range of Disc Repair Machinery as per the operating instructions.
- Use advised against: Not for sale to the general public

1.3 Details of the supplier of the safety data sheet

- Name of Supplier: Total Disc Repair Ltd
- Address of Supplier: Unit 1
  Christchurch Business Park
  Radar Way
  Christchurch
  Dorset
  BH23 4FL
  UK
- Telephone: +44 (0) 1202 489 500
- Email: support@totaldiscrepair.com

1.4 Emergency telephone number

- Emergency Telephone: +44 (0) 1202 489 500

SECTION 2: Hazards identification

2.1 Classification of the substance or mixture

- Classification (REGULATION (EC) No 1272/2008) [CLP/GHS]: Skin Irrit. 2, H315; Skin Sens. 1A, H317; Aquatic Chronic 3, H412; EUH066
- Additional information: For full text of Hazard- and EU Hazard-statements: see section 16

2.2 Label elements

- Signal Word: Warning
- Hazard statements
  H315 - Causes skin irritation.
  H317 - May cause an allergic skin reaction.
  H412 - Harmful to aquatic life with long lasting effects.
- Precautionary statements
  P264 - Wash hands thoroughly after handling.
  P280 - Wear protective gloves
  P333+P313 - If skin irritation or rash occurs: Get medical advice/attention.
  P501 - Dispose of contents/container in accordance with local/regional/national/international regulations.
- Supplemental Hazard information (EU)
  EUH066 - Repeated exposure may cause skin dryness or cracking.

2.3 Other hazards

SECTION 2: Hazards identification (....)

- Not a PBT according to REACH Annex XIII
- Not a vPvB according to REACH Annex XIII

SECTION 3: Composition/information on ingredients

3.1 Substances

3.2 Mixtures

Chemical Name	Conc.	CAS No.	EC No.	Classification (REGULATION (EC) No 1272/2008) [CLP/GHS]	WEL /OEL
Non-hazardous ingredients	55 - 57%	Mixture	-	Not Classified	No
Aluminium oxide	5 - 15%	1344-28-1	215-691-6	Not Classified	Yes
Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics	5 - 15%	-	926-141-6	Asp. Tox. 1, H304; EUH066	No
Naphtha (petroleum), hydrotreated heavy	1 - 10%	64742-48-9	265-150-3	Asp. Tox. 1, H304; Skin Irrit. 2, H315; STOT SE 3, H336; Aquatic Chronic 2, H411; ***Note P***	No
White mineral oil	1 - 5%	8042-47-5	232-455-8	Asp. Tox. 1, H304	No
Glycerol; Glycerine	1 - 5%	56-81-5	200-289-5	Not Classified	Yes
Nonane	0.01 - 0.5%	111-84-2	203-913-4	Aquatic Acute 1, H400; M factor (Acute) =1; Aquatic Chronic 1, H410; M factor (Chronic) =1	No
5-chloro-2-methyl-2H-isothiazol-3-one	< 0.02%	26172-55-4	247-500-7	Acute Tox. 3, H301; Acute Tox. 2, H310; Acute Tox. 2, H330; Skin Corr. 1B, H314; Skin Sens. 1A, H317; Aquatic Acute 1, H400; M factor (Acute) =10; EUH071	No
2-methyl-2H-isothiazol-3-one	< 0.005%	2682-20-4	220-239-6	Acute Tox. 3, H301; Acute Tox. 3, H311; Acute Tox. 2, H330; Skin Corr. 1B, H314; Skin Sens. 1A, H317; Eye Dam. 1, H318; Aquatic Acute 1, H400; M factor (Acute) =10; Aquatic Chronic 1, H410; M factor (Chronic) =1; EUH071	No

Note P - CAS 64742-48-9 naphtha (petroleum), hydrotreated heavy contains <0.1% w/w benzene

SECTION 4: First aid measures

4.1 Description of first aid measures

- Contact with eyes
  If substance has got into eyes, immediately wash out with plenty of water for several minutes
  Irrigate eyes thoroughly whilst lifting eyelids
  Remove contact lenses, if present and easy to do. Continue rinsing.
  If eye irritation persists: Get medical advice/attention.
- Contact with skin
  Take off contaminated clothing and wash it before reuse.
  Wash affected area with plenty of soap and water
  If skin irritation or rash occurs: Get medical advice/attention.
- Ingestion
  Rinse mouth with water (do not swallow)
  Give 200-300mls (half pint) water to drink
  Do not induce vomiting unless directed by medical personnel.
  Get medical advice/attention.
- Inhalation
  If breathing is difficult, remove victim to fresh air and keep at rest in a position comfortable for breathing.
  Keep warm and at rest, in a half upright position. Loosen clothing
  IF exposed or concerned: Get medical advice/attention.

4.2 Most important symptoms and effects, both acute and delayed

- Contact with eyes
  May cause redness and irritation
- Contact with skin
  Causes redness and irritation
  May cause an allergic skin reaction.
  Repeated exposure may cause skin dryness or cracking
  Possible blistering of the skin of affected areas
- Ingestion
  May cause stomach pain
  May cause nausea/vomiting
  May cause diarrhoea
  May cause gastro-intestinal irritation
- Inhalation
  May cause respiratory tract irritation.
  May cause dry throat
  May cause coughing
  May cause headache
  Dust may cause respiratory irritation.

4.3 Indication of any immediate medical attention and special treatment needed

- Treat symptomatically

SECTION 5: Firefighting measures

5.1 Extinguishing media

- Suitable extinguishing media: water spray; foam; dry powder; carbon dioxide
- Unsuitable extinguishing media: high volume water jet

5.2 Special hazards arising from the substance or mixture

- Gives off irritating or toxic fumes (or gases) in a fire.

SECTION 5: Firefighting measures (....)

5.3 Advice for firefighters

- Collect contaminated fire extinguishing water separately. This MUST not be discharged into drains. Prevent fire extinguishing water from contaminating surface or ground water.
- Keep container(s) exposed to fire cool, by spraying with water
- Special protective equipment: Wear self-contained breathing apparatus (SCBA). Wear full protective clothing including chemical protection suit.

SECTION 6: Accidental release measures

6.1 Personal precautions, protective equipment and emergency procedures

- Rescuers should take suitable precautions to avoid becoming casualties themselves
- No action shall be taken involving any personal risk or without suitable training
- Personal precautions for non-emergency personnel: Do not touch or walk through spilt material; Avoid contact with skin and eyes
- Personal precautions for emergency responders: Evacuate the area and keep personnel upwind; Wear protective clothing as per section 8; Wash thoroughly after dealing with spillage

6.2 Environmental precautions

- Avoid release to the environment.
- Do not allow to enter public sewers and watercourses
- If polluted water reaches drainage systems or water courses, immediately inform appropriate authorities

6.3 Methods and material for containment and cleaning up

- Stop leak if safe to do so.
- Small spills
  Wipe up spillage with damp absorbent cloth or towel
- Large spills
  Contain the spillage using bunding
  Dyke to prevent entry to sewer or waterway. Transfer liquid to a holding container
  Absorb spillage in inert material and shovel up
  Place in appropriate container
  Seal containers and label them
  Remove contaminated material to safe location for subsequent disposal
  Dispose of contents/container to an authorised waste collection point
  Ventilate the area and wash spill site after material pick-up is complete
  Wash thoroughly after dealing with spillage

6.4 Reference to other sections

- See section(s): 7, 8 &13

SECTION 7: Handling and storage

7.1 Precautions for safe handling

- Avoid formation of spray/mist/aerosols
- Avoid breathing vapours, mist or gas
- Do not get in eyes, on skin, or on clothing.
- Do not eat, drink or smoke when using this product.
- Persons suffering from asthma, eczema or skin problems should avoid contact, including dermal contact, with this product.
- Wear protective clothing as per section 8
- Take off contaminated clothing.
- Contaminated clothing should be laundered before reuse
- Wash thoroughly after handling.
- Eyewash bottles should be available
- Combustible dust may form by action of this product on another material (substrate).
- Dust generated from the substrate during use of this product may be explosive if in sufficient

SECTION 7: Handling and storage (....)

concentration with an ignition source.
- Dust deposits should not be allowed to accumulate on surfaces because of the potential for secondary explosions.

7.2 Conditions for safe storage, including any incompatibilities

- Keep locked up and out of reach of children
- Keep away from food, drink and animal feedingstuffs
- Keep only in the original container
- Keep container tightly closed, in a cool, well ventilated place
- Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
- Opened containers should be carefully resealed and stored in an upright position
- Keep away from acid

7.3 Specific end use(s)

- Polish Compound for Disc Repair Equipment

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

- For currently recommended monitoring procedures, see HSE series 'Methods for the Determination of Hazardous Substances' (MDHS)

- Aluminium oxide
  WEL (long term) 10 mg/m^3 (inhalable dust, UK)
  WEL (long term) 4 mg/m^3 (respirable dust, UK)
  DNEL (inhalational) 15.63 mg/m^3 Industry, Long Term, Systemic Effects
  DNEL (inhalational) 15.63 mg/m^3 Industry, Long Term, Local Effects
  DNEL (oral) 3.29 mg/kg (bw/day) Consumer, Long Term, Systemic Effects
  PNEC (STP) 20 mg/l

- Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics
  No exposure limits have been set for this substance

- Naphtha (petroleum), hydrotreated heavy
  No exposure limits have been set for this substance

- White mineral oil
  No exposure limits have been set for this substance

- Glycerol; Glycerine
  WEL (long term) 10 mg/m^3 (mist, UK)
  DNEL (inhalational) 56 mg/m^3 Industry, Long Term, Local Effects
  DNEL (inhalational) 33 mg/m^3 Consumer, Long Term, Local Effects
  DNEL (oral) 229 mg/kg (bw/day) Consumer, Long Term, Systemic Effects
  PNEC aqua (freshwater) 885 ug/l
  PNEC aqua (intermittent releases, freshwater) 8.85 mg/l
  PNEC aqua (marine water) 88.5 ug/l
  PNEC (STP) 1 g/l
  PNEC sediment (freshwater) 3.3 mg/kg
  PNEC sediment (marine water) 330 ug/kg
  PNEC terrestrial (soil) 141 ug/kg

- Nonane
  DNEL (inhalational) 2 035 mg/m^3 Industry, Long Term, Systemic Effects
  DNEL (dermal) 733 mg/kg (bw/day) Consumer, Long Term, Systemic Effects
  DNEL (inhalational) 608 mg/m^3 Consumer, Long Term, Systemic Effects
  DNEL (dermal) 699 mg/kg (bw/day) Consumer, Long Term, Systemic Effects
  DNEL (oral) 699 mg/kg (bw/day) Consumer, Long Term, Systemic Effects
  PNEC aqua (freshwater) 3.6 ug/l
  PNEC aqua (intermittent releases, freshwater) 14 ug/l
  PNEC aqua (marine water) 3.6 ug/l
  PNEC (STP) 54 ug/l

SECTION 8: Exposure controls/personal protection (....)

PNEC sediment (freshwater) 620 ug/kg
PNEC sediment (marine water) 620 ug/kg
PNEC terrestrial (soil) 250 ug/kg

- 5-chloro-2-methyl-2H-isothiazol-3-one
  No exposure limits have been set for this substance

- 2-methyl-2H-isothiazol-3-one
  DNEL (inhalational) 21 ug/m^3 Industry, Long Term, Local Effects
  DNEL (inhalational) 43 ug/m^3 Industry, Acute/Short Term, Local Effects
  DNEL (inhalational) 21 ug/m^3 Consumer, Long Term, Local Effects
  DNEL (inhalational) 43 ug/m^3 Consumer, Acute/Short Term, Local Effects
  DNEL (oral) 27 ug/kg (bw/day) Consumer, Long Term, Systemic Effects
  DNEL (oral) 53 ug/kg (bw/day) Consumer, Acute/Short Term, Systemic Effects
  PNEC aqua (freshwater) 3.39 ug/l
  PNEC aqua (intermittent releases, freshwater) 3.39 ug/l
  PNEC aqua (marine water) 3.39 ug/l
  PNEC aqua (intermittent releases, marine water) 3.39 ug/l
  PNEC (STP) 230 ug/l
  PNEC terrestrial (soil) 47.1 ug/kg

8.2 Exposure controls

- Selection and use of personal protective equipment should be based on a risk assessment of exposure potential

- Engineering controls
  Engineering controls should be provided which maintain airborne concentrations below the relevant guidelines
  Use local exhaust ventilation and/or enclosures.
  The efficiency of the ventilation system must be monitored regularly because of the possibility of blockage.

- Respiratory protection
  In case of insufficient ventilation, wear suitable respiratory equipment
  Where a reusable half mask respirator is required, use EN 140, with gas/vapour filter EN 14387 type ABEK, or EN 405; EN 1827 and EN 143 particle filter
  Where a full face mask respirator is required, use EN 136, with gas/vapour filter EN 14387 type ABEK and particle filter EN 143

- Eye/face protection
  Wear safety glasses approved to standard EN 166.

- Skin protection
  Wear suitable protective clothing
  Wear protective gloves. The selected protective gloves have to satisfy the specifications of EU Directive 89/686/EEC and standard EN 374.
  The selection of a suitable glove depends on work conditions and whether the product is present on its own or in combination with other substances. Breakthrough time is dependent on the characteristics of the brand of glove used and the supplier should be consulted.

- Hygiene measures
  Use good personal hygiene practices
  Do not eat, drink or smoke when using this product.
  Wash thoroughly after handling.
  Contaminated clothing should be laundered before reuse
  Ensure eyewash stations and safety showers are nearby

SECTION 9: Physical and chemical properties

9.1 Information on basic physical and chemical properties

SECTION 9: Physical and chemical properties (....)

- Appearance: White liquid emulsion
- Odour: Petroleum odour
- Odour threshold: No information available
- pH: 8.1 - 8.5
- Melting point/freezing point: No information available
- Initial boiling point and boiling range: 100 °C
- Flashpoint: 94 °C
- Evaporation Rate: No information available
- Flammability (solid,gas): Not applicable
- Upper/lower flammability or explosive limits: Not applicable
- Vapour Pressure: No information available
- Vapour Density: No information available
- Relative Density: [Water = 1] 1.01 (density = 1.01 g/cm^3)
- Solubility(ies): Partially soluble in water
- Partition Coefficient (n-Octanol/Water): No information available
- Autoignition Temperature: No information available
- Decomposition temperature: No information available
- Viscosity: Dynamic 14,000 - 21,000 mPa.s; Kinematic > 20.5 mm^2/s
- Explosive Properties: Not applicable
- Oxidising properties: Not applicable

9.2 Other information

- No information available

SECTION 10: Stability and reactivity

10.1 Reactivity

- No information available

10.2 Chemical stability

- Considered stable under normal conditions

10.3 Possibility of hazardous reactions

- Hazardous polymerisation will not occur under normal conditions of storage and use

10.4 Conditions to avoid

- Keep away from heat

10.5 Incompatible materials

- Incompatible with strong acids

10.6 Hazardous decomposition products

- Decomposition products may include hydrocarbons
- Decomposition products may include carbon oxides

SECTION 11: Toxicological information

11.1 Information on toxicological effects

- Acute Toxicity
  Based on available data, the classification criteria are not met
  ATE mix (oral) (calculated) > 2 000 mg/kg
  ATE mix (inhal) (calculated) > 50 mg/l/4h (vapour)
  ATE mix (dermal) (calculated) > 5 000 mg/kg

SECTION 11: Toxicological information (....)

Chemical Name	LD50 (oral, rat)	LC50 (inhalation, rat)	LD50 (dermal, rabbit)
Aluminium oxide	10 000 - 15 900 mg/kg	888 - 2 300 mg/m³ (4 hr)	> 5 000 mg/kg
Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics	5 000 - 15 000 mg/kg	4.951 - 9.3 mg/l (4 hr)	3 160 - 5 000 mg/kg
Naphtha (petroleum), hydrotreated heavy	5 000 mg/kg	> 2.3 mg/l (4 hr)	> 2 000 mg/kg
White mineral oil	5 000 mg/kg	5 mg/l (4 hr)	> 2 000 mg/kg
Glycerol; Glycerine	27 mg/kg	No data available	(guinea pig) 45 ml/kg
Nonane	5 000 mg/kg	17 mg/l (4 hr)	> 2 000 mg/kg
5-chloro-2-methyl-2H-isothiazol-3-one	40 mg/kg	0.33 mg/l (4 hr)	87 mg/kg
2-methyl-2H-isothiazol-3-one	120 - 327.7 mg/kg	100 - 422 mg/m³ (4 hr)	242 - 2 000 mg/kg

- Skin corrosion/irritation
  Causes skin irritation.
  Classification based on calculation and concentration thresholds

- Serious eye damage/irritation
  Based on available data, the classification criteria are not met

- Respiratory or skin sensitisation
  May cause an allergic skin reaction.
  Classification based on calculation and concentration thresholds

- Germ cell mutagenicity
  Based on available data, the classification criteria are not met
  5-chloro-2-methyl-2H-isothiazol-3-one (CAS 26172-55-4) is listed in Annex III of REACH as # Suspected mutagen: The Toolbox profiler 'DNA alerts for AMES, MN and CA by OASIS v.1.3' gives an alert for mutagenicity

- Carcinogenicity
  Based on available data, the classification criteria are not met

Chemical Name	NOAEL (oral, rat)	NOAEC (inhalation, rat)	NOAEL (dermal, rat)
Naphtha (petroleum), hydrotreated heavy	No data available	9 869 mg/m³	No data available
White mineral oil	No data available	1 200 mg/kg bw/day	No data available
2-methyl-2H-isothiazol-3-one	3.1 mg/kg bw/day	No data available	(mouse) 400 mg/kg bw/day

5-chloro-2-methyl-2H-isothiazol-3-one (CAS 26172-55-4) is listed in Annex III of REACH as # Suspected carcinogen: The Toolbox profiler 'Carcinogenicity (genotox and nongenotox) alerts by ISS' gives an alert for carcinogenicity
2-methyl-2H-isothiazol-3-one (CAS 2682-20-4) is listed in Annex III of REACH as # Suspected carcinogen: The Toolbox profiler Carcinogenicity (genotox and nongenotox) alerts by ISS gives an alert for carcinogenicity

- Reproductive toxicity
  Based on available data, the classification criteria are not met

SECTION 11: Toxicological information (....)

Chemical Name	NOAEL (oral, rat)	NOAEC (inhalation, rat)	NOAEL (dermal, rat)
Naphtha (petroleum), hydrotreated heavy	-	(effect on fertility) 20 000 mg/m³ (effect on developmental toxicity) 23 900 mg/m³	(effect on fertility) 500 mg/kg bw/day
White mineral oil	(effect on fertility) 1 000 mg/kg bw/day (effect on developmental toxicity) 5 000 mg/kg bw/day	(effect on developmental toxicity) 1 000 mg/m³	(effect on fertility) 2 000 mg/kg bw/day (effect on developmental toxicity) 2 000 mg/kg bw/day
Glycerol; Glycerine	2 000 mg/kg bw/day	No data available	No data available
5-chloro-2-methyl-2H-isothiazol-3-one	10 mg/kg bw/day	No data available	No data available
2-methyl-2H-isothiazol-3-one	(effect on fertility) 69 mg/kg bw/day (effect on developmental toxicity) (rabbit) 30 mg/kg bw/day	No data available	No data available

- Specific target organ toxicity (STOT) - single exposure
  Based on available data, the classification criteria are not met

Chemical Name	NOAEL
Naphtha (petroleum), hydrotreated heavy	(inhalation, dog) 6.5 mg/l (4hr)

- Specific target organ toxicity (STOT) - repeated exposure
  Based on available data, the classification criteria are not met

Chemical Name	NOAEL (oral, rat)	NOAEC (inhalation, rat)	NOAEL (dermal, rat)
Aluminium oxide	200 - 3 225 mg/kg bw/day	70 mg/m³ air	No data available
Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics	1 000 - 5 000 mg/kg bw/day	275 - 10 400 mg/m³ air	No data available
Naphtha (petroleum), hydrotreated heavy	No data available	1 402 mg/m³ air	No data available
White mineral oil	1 200 mg/kg bw/day	50 mg/m³ air	2 000 mg/kg bw/day
Glycerol; Glycerine	10 000 mg/kg bw/day	167 mg/m³ air	No data available
Nonane	100 mg/kg bw/day	8.4 - 24.3 mg/L air	No data available
2-methyl-2H-isothiazol-3-one	19 mg/kg bw/day	No data available	No data available

SECTION 11: Toxicological information (....)

- Aspiration hazard
  Not classified due to the viscosity
  Naphtha, petroleum, hydrotreated heavy; Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics; White mineral oil; are classified as an aspiration hazard
- Contact with eyes
  May cause redness and irritation
- Contact with skin
  Causes redness and irritation
  May cause an allergic skin reaction.
  Repeated exposure may cause skin dryness or cracking.
  Possible blistering of the skin of affected areas
- Ingestion
  May cause stomach pain
  May cause nausea/vomiting
  May cause diarrhoea
  May cause gastro-intestinal irritation
- Inhalation
  May cause respiratory tract irritation.
  May cause dry throat
  May cause coughing
  May cause headache
  Dust may cause respiratory irritation.

SECTION 12: Ecological information

12.1 Toxicity

- Harmful to aquatic life with long lasting effects.
- Classification based on calculation and concentration thresholds
- Aluminium oxide
  LC50 (fish) 78 - 218 644.1 ug/l (4 days)
  EC50 (aquatic invertebrates) 1.5 - 2.56 mg/l (48 hr)
  EC50 (aquatic algae) 16.9 - 4 980 ug/l (72 hr)
- Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics
  LL50 (fish) 1 g/l (4 days)
  LL50 (aquatic invertebrates) 10 g/l (48 hr)
  EL50 (aquatic algae) 1 g/l (72 hr)
- Naphtha (petroleum), hydrotreated heavy
  LL50 (fish) 8.2 - 10 mg/l (4 days)
  EL50 (aquatic invertebrates) 4.5 mg/l (48 hr)
  EL50 (aquatic algae) 3.1 mg/l (72 hr)
- White mineral oil
  LL50 (fish) 100 - 10 000 mg/l (4 days)
  LL50 (aquatic invertebrates) 100 mg/l (48 hr)
- Glycerol; Glycerine
  LC50 (fish) 54 g/l (4 days)
  EC50 (aquatic invertebrates) 10 g/l (24 hr)
- Nonane
  LL50 (fish) 1.125 mg/l (4 days)
  EC50 (aquatic invertebrates) 200 ug/l (48 hr)
  EL50 (aquatic algae) 1.098 mg/l (72 hr)
- 5-chloro-2-methyl-2H-isothiazol-3-one
  LC50 (fish) 0.19 mg/l (4 days)
  EC50 (aquatic invertebrates) 0.18 mg/l (48 hr)
  EC50 (aquatic algae) 0.062 mg/l (96 hr)

SECTION 12: Ecological information (....)

- 2-methyl-2H-isothiazol-3-one
  LC50 (fish) 4.77 - 6 mg/l (4 days)
  EC50 (aquatic invertebrates) 0.93 - 2.98 mg/l (48 hr)
  EC50 (aquatic algae) 63 - 72.5 ug/l (96 hr)

12.2 Persistence and degradability

- Aluminium oxide
  Not applicable; inorganic
- Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics
  OECD 301F: (Ready Biodegradability - Manometric Respirometry Test) 69 % 28 day(s)
- Naphtha (petroleum), hydrotreated heavy
  OECD 301D: Closed bottle test 10 %, 28 day(s) (BOD/ThBOD)
- White mineral oil
  OECD 301B: CO_2 Evolution (Modified Sturm Test) 0 %, 28 day(s)
- Glycerol; Glycerine
  OECD 301C: MITI (I) 63 %, 14 day(s) (BOD/ThBOD)
- Nonane
  Readily biodegradable
  Biodegradation test, water, other 96%, 28 day(s) (BOD)
- 5-chloro-2-methyl-2H-isothiazol-3-one
  Biodegradation test, water, other 80%, 21 day(s) (BOD)
  This substance is listed in Annex III of REACH as # Suspected persistent in the environment: Biodegradation NITE database in the Toolbox contains at least one experimental data from 28 days ready biodegradability test (OECD TG 301C or 301D) reporting a value lower than 60%;The Danish QSAR database contains information indicating that the substance is predicted as non readily biodegradable
- 2-methyl-2H-isothiazol-3-one
  CO_2 evolution, 48%, 28 days
  This substance is listed in Annex III of REACH as # Suspected persistent in the environment: The Danish QSAR database contains information indicating that the substance is predicted as non readily biodegradable

12.3 Bioaccumulative potential

- Aluminium oxide
  No information available
- Hydrocarbons, C11-C14, n-alkanes, isoalkanes, cyclics, <2% aromatics
  Log Kow: - 6 - 8.2
  Potential bioaccumulation
- Naphtha (petroleum), hydrotreated heavy
  No information available
- White mineral oil
  No information available
- Glycerol; Glycerine
  Log Kow: -1.76
- Nonane
  Log Kow: 5.65
- 5-chloro-2-methyl-2H-isothiazol-3-one
  Log Kow: 0.45
- 2-methyl-2H-isothiazol-3-one

SECTION 12: Ecological information (....)

Log Kow: 0.5

12.4 Mobility in soil

- No information available

12.5 Results of PBT and vPvB assessment

- Not a PBT according to REACH Annex XIII
- Not a vPvB according to REACH Annex XIII

12.6 Other adverse effects

- No information available

SECTION 13: Disposal considerations

13.1 Waste treatment methods

- Disposal should be in accordance with local, state or national legislation
- Dispose of contents/container to an authorised waste collection point
- This material and/or its container must be disposed of as hazardous waste
- Incineration by an approved method could be considered
- Do not reuse empty containers without commercial cleaning or reconditioning

13.2 Classification

- The waste must be identified according to the List of Wastes (2000/532/EC)
- Hazardous Property Code(s): HP 4 Irritant; HP 13 Sensitising; HP 14 Ecotoxic
- UK Waste Codes: (as supplied)
  12 01 09* Machining emulsions and solutions free of halogens
  12 01 20* Spent grinding bodies and grinding materials containing dangerous substances

SECTION 14: Transport information

Not classified as hazardous for transport

14.1 UN number

- UN No.: Not applicable

14.2 UN proper shipping name

- Proper Shipping Name: Not applicable

14.3 Transport hazard class(es)

- Hazard Class: Not applicable

14.4 Packing group

- Packing Group: Not applicable

14.5 Environmental hazards

- Not Classified

14.6 Special precautions for user

- No special precautions are required for this product

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

- Not applicable

14.8 Road/Rail (ADR/RID)

SECTION 14: Transport information (....)

- Proper Shipping Name: Not applicable
- ADR UN No.: Not applicable
- ADR Hazard Class: Not applicable
- ADR Packing Group: Not applicable
- Tunnel Code: Not applicable

14.9 Sea (IMDG)

- Proper Shipping Name: Not applicable
- IMDG UN No.: Not applicable
- IMDG Hazard Class: Not applicable
- IMDG Pack Group.: Not applicable

14.10 Air (ICAO/IATA)

- Proper Shipping Name: Not applicable
- ICAO UN No.: Not applicable
- ICAO Hazard Class: Not applicable
- ICAO Packing Group: Not applicable

SECTION 15: Regulatory information

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

- This safety data sheet is provided in compliance with REACH Regulation (EC) No 1907/2006 as amended by Regulation (EU) 2015/830
- Regulation (EC) No. 1272/2008 on the classification, labelling and packaging of substances and mixtures (CLP Regulation) applies in Europe
- 5-chloro-2-methyl-2H-isothiazol-3-one (CAS 26172-55-4) is listed in Annex III of REACH as # Suspected carcinogen: The Toolbox profiler 'Carcinogenicity (genotox and nongenotox) alerts by ISS' gives an alert for carcinogenicity # Suspected hazardous to the aquatic environment: The Danish QSAR database contains information indicating that the substance has a 96h LC50 to fish of 2.76 mg/L; The Danish QSAR database contains information indicating that the substance has a 48h EC50 to Daphnia of 3.49 mg/L; The Danish QSAR database contains information indicating that the substance has a 96h EC50 to green algae of <1 mg/L # Suspected mutagen: The Toolbox profiler 'DNA alerts for AMES, MN and CA by OASIS v.1.3' gives an alert for mutagenicity # Suspected persistent in the environment: Biodegradation NITE database in the Toolbox contains at least one experimental data from 28 days ready biodegradability test (OECD TG 301C or 301D) reporting a value lower than 60%;The Danish QSAR database contains information indicating that the substance is predicted as non readily biodegradable # Suspected skin sensitiser: The Toolbox profiler 'Protein binding alerts for skin sensitization by OASIS v1.3' gives an alert for skin sensitisation; Recommended for Skin Sens 1 by IMAP
- 2-methyl-2H-isothiazol-3-one (CAS 2682-20-4) is listed in Annex III of REACH as # Suspected carcinogen: The Toolbox profiler Carcinogenicity (genotox and nongenotox) alerts by ISS gives an alert for carcinogenicity # Suspected hazardous to the aquatic environment: The Danish QSAR database contains information indicating that the substance has a 96h LC50 to fish of 3.79 mg/L; The Danish QSAR database contains information indicating that the substance has a 48h EC50 to Daphnia of 4.67 mg/L; The Danish QSAR database contains information indicating that the substance has a 96h EC50 to green algae of <1 mg/L # Suspected persistent in the environment: The Danish QSAR database contains information indicating that the substance is predicted as non readily biodegradable # Suspected skin sensitiser: The Toolbox profiler Protein binding alerts for skin sensitization by OASIS v1.3 gives an alert for skin sensitisation; Recommended for Skin Sens 1 by IMAP

15.2 Chemical safety assessment

- No information available

SECTION 16: Other information

The above information is believed to be correct but does not purport to be all inclusive and shall only be used as a guide. The company will not be held liable for any damage resulting from handling or from contact with this

SECTION 16: Other information (....)

product.

Sources of data: Information from published literature and supplier safety data sheets

Revision No. 1.1.0. Revised July 2019.
Changes made: Updated subsection 9.1 to add density and viscosity data

Classification and procedure used to derive the classification for mixtures according to Regulation (EC) 1272/2008 [CLP]:

Asp. Tox. 1, H304:	Not classified due to the viscosity
Skin Irrit. 2, H315:	Classification based on calculation and concentration thresholds
Skin Sens. 1, H317:	Classification based on calculation and concentration thresholds
Aquatic Chronic 4, H413:	Classification based on calculation and concentration thresholds

Text not given with phrase codes where they are used elsewhere in this safety data sheet:

- EUH066: Repeated exposure may cause skin dryness or cracking
- EUH071: Corrosive to the respiratory tract
- H301: Toxic if swallowed
- H304: May be fatal if swallowed and enters airways
- H310: Fatal in contact with skin
- H311: Toxic in contact with skin
- H314: Causes severe skin burns and eye damage
- H315: Causes skin irritation.
- H317: May cause an allergic skin reaction.
- H318: Causes serious eye damage
- H330: Fatal if inhaled.
- H336: May cause drowsiness or dizziness
- H400: Very toxic to aquatic life
- H410: Very toxic to aquatic life with long lasting effects
- H411: Toxic to aquatic life with long lasting effects
- H412: Harmful to aquatic life with long lasting effects

Acronyms

- CAS: Chemical Abstracts Service
- DNEL: Derived No-Effect Level
- EC: European Community
- EC50: Effective Concentration, 50%
- EL50: Effective Loading Rate resulting in 50% effect.
- GHS: Globally Harmonised System
- LC50: Lethal Concentration, 50%
- LD50: Lethal Dose, 50%
- LL50: Lethal Loading Rate resulting in 50% effect.
- NOEC: No observed effect concentration
- NOAEL: No observed adverse effect level
- OEL: Occupational Exposure Limit
- PBT: Persistent, Bioaccumulative and Toxic
- PNEC: Predicted No-Effect Concentration
- REACH: Registration, Evaluation, Authorisation and Restriction of Chemicals
- STOT RE: Specific Target Organ Toxicity Repeated Exposure
- STOT SE: Specific Target Organ Toxicity Single Exposure
- vPvB: very Persistent and very Bioaccumulative
- WEL: Workplace Exposure Limit

--- end of safety datasheet ---