Safety Data Sheet

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This Safety Data Sheet has been prepared in accordance with the SS586 Specification for Hazard Communication for Hazardous Chemicals and Dangerous Goods.

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SECTION 1: Identification

1.1. Product identifier
3M™ Perfect-It™ Ultrafine Machine Polish, PN 06068, 06069, 06073, 39062 and 3M™ Perfect-It™ EX Ultrafine Machine Polish PN 06068, 06069, 06073, 39062, 06097

1.2. Recommended use and restrictions on use

Recommended use
Automotive., Automotive Polish

1.3. Supplier's details
Address: 3M Technologies (S) Pte Ltd,10 Ang Mo Kio Street 65, Singapore 569059
Telephone: +65 6450 8888
Website: www.3m.com.sg

1.4. Emergency telephone number
+65 6591 6601 (8.15am - 5.00pm, Monday - Friday)

SECTION 2: Hazard identification

2.1. Classification of the substance or mixture
Skin Sensitizer: Category 1.

2.2. Label elements
SIGNAL WORD
WARNING!

Symbols
Exclamation mark |

Pictograms

HAZARD STATEMENTS

H317 May cause an allergic skin reaction.

PRECAUTIONARY STATEMENTS

Prevention:

P280E Wear protective gloves.

Response:

P333 + P313 If skin irritation or rash occurs: Get medical attention.

Disposal:

P501 Dispose of contents and container in accordance with applicable local, regional, national, and international regulations.

2.3. Other hazards

Aspiration hazard classification does not apply due to the kinematic viscosity of the product.

SECTION 3: Composition/information on ingredients

This material is a mixture.

Ingredient	CAS Nbr	% by Wt
Water	7732-18-5	40 - 80
Distillates (petroleum), hydrotreated light	64742-47-8	< 20
Dodecamethylcyclohexasiloxane	540-97-6	5 - 15
Aluminum Oxide (non-fibrous)	1344-28-1	< 10
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	1 - 5
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	< 1.5
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	< 1.5
Undecan-1-ol, ethoxylated	34398-01-1	< 0.3
1,2-Benzisothiazol-3(2H)-one	2634-33-5	< 0.05

SECTION 4: First aid measures

4.1. Description of first aid measures

Inhalation

Remove person to fresh air. If you feel unwell, get medical attention.

Skin contact

Immediately wash with soap and water. Remove contaminated clothing and wash before reuse. If signs/symptoms develop, get medical attention.

Eye contact

Flush with large amounts of water. Remove contact lenses if easy to do. Continue rinsing. If signs/symptoms persist, get medical attention.

If swallowed

Rinse mouth. If you feel unwell, get medical attention.

4.2. Most important symptoms and effects, both acute and delayed

Allergic skin reaction (redness, swelling, blistering, and itching).

4.3. Indication of any immediate medical attention and special treatment required
Not applicable

SECTION 5: Fire-fighting measures

5.1. Suitable extinguishing media
In case of fire: Use a dry chemical extinguisher to extinguish.

5.2. Special hazards arising from the substance or mixture
None inherent in this product.

Hazardous Decomposition or By-Products

Substance	Condition
Carbon monoxide.	During combustion.
Carbon dioxide.	During combustion.
Oxides of nitrogen.	During combustion.

5.3. Special protective actions for fire-fighters
Wear full protective clothing, including helmet, self-contained, positive pressure or pressure demand breathing apparatus, bunker coat and pants, bands around arms, waist and legs, face mask, and protective covering for exposed areas of the head.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures
Evacuate area. Ventilate the area with fresh air. Use personal protective equipment based on the results of an exposure assessment. Refer to Section 8 for PPE recommendations. If anticipated exposure resulting from an accidental release exceeds the protective capabilities of the PPE listed in Section 8, or are unknown, select PPE that offers an appropriate level of protection. Consider the physical and chemical hazards of the material when doing so. Examples of PPE ensembles for emergency response could include wearing bunker gear for a release of flammable material; wearing chemical protective clothing if the spilled material is a corrosive, a sensitizer, a significant dermal irritant, or can be absorbed through the skin; or donning a positive pressure supplied-air respirator for chemicals with inhalation hazards. For information regarding physical and health hazards, refer to sections 2 and 11 of the SDS.

6.2. Environmental precautions
Avoid release to the environment. For larger spills, cover drains and build dykes to prevent entry into sewer systems or bodies of water.

6.3. Methods and material for containment and cleaning up
Contain spill. Working from around the edges of the spill inward, cover with bentonite, vermiculite, or commercially available inorganic absorbent material. Mix in sufficient absorbent until it appears dry. Remember, adding an absorbent material does not remove a physical, health, or environmental hazard. Collect as much of the spilled material as possible. Place in a closed container approved for transportation by appropriate authorities. Clean up residue with an appropriate solvent selected by a qualified and authorised person. Ventilate the area with fresh air. Read and follow safety precautions on the solvent label and Safety Data Sheet. Seal the container. Dispose of collected material as soon as possible in accordance with applicable local/regional/national/international regulations.

SECTION 7: Handling and storage

7.1. Precautions for safe handling
Keep out of reach of children. Avoid breathing dust/fume/gas/mist/vapours/spray. Do not get in eyes, on skin, or on clothing. Do not eat, drink or smoke when using this product. Wash thoroughly after handling. Contaminated work clothing should not be allowed out of the workplace. Avoid release to the environment. Wash contaminated clothing before reuse. Avoid contact with oxidising agents (eg. chlorine, chromic acid etc.)

7.2. Conditions for safe storage including any incompatibilities
Store away from acids. Store away from oxidising agents.

SECTION 8: Exposure controls/personal protection

8.1 Control parameters

Occupational exposure limits
If a component is disclosed in section 3 but does not appear in the table below, an occupational exposure limit is not available for the component.

Ingredient	CAS Nbr	Agency	Limit type	Additional comments
Aluminum metal and insoluble compounds, respirable fraction	1344-28-1	ACGIH	TWA(respirable fraction):1 mg/m3	A4: Not class. as human carcin
Aluminum Oxide (non-fibrous)	1344-28-1	Singapore PELs	TWA(8 hours):10 mg/m3	
Oil Mist, mineral	64742-55-8	Singapore PELs	TWA(as mist)(8 hours):5 mg/m3;STEL(as mist)(15 minutes):10 mg/m3	
Oil Mist, mineral	64742-56-9	Singapore PELs	TWA(as mist)(8 hours):5 mg/m3;STEL(as mist)(15 minutes):10 mg/m3	
Oil Mist, mineral	64742-65-0	Singapore PELs	TWA(as mist)(8 hours):5 mg/m3;STEL(as mist)(15 minutes):10 mg/m3	

ACGIH : American Conference of Governmental Industrial Hygienists
AIHA : American Industrial Hygiene Association
CMRG : Chemical Manufacturer's Recommended Guidelines
Singapore PELs : Singapore. Workplace Safety and Health (Permissible Exposure Levels of Toxic Substances) Order
TWA: Time-Weighted-Average
STEL: Short Term Exposure Limit
CEIL: Ceiling

8.2. Exposure controls

8.2.1. Engineering controls
Use general dilution ventilation and/or local exhaust ventilation to control airborne exposures to below relevant Exposure Limits and/or control dust/fume/gas/mist/vapours/spray. If ventilation is not adequate, use respiratory protection equipment.

8.2.2. Personal protective equipment (PPE)

Eye/face protection

Select and use eye/face protection to prevent contact based on the results of an exposure assessment. The following eye/face protection(s) are recommended:
Safety glasses with side shields.

Skin/hand protection
Select and use gloves and/or protective clothing approved to relevant local standards to prevent skin contact based on the results of an exposure assessment. Selection should be based on use factors such as exposure levels, concentration of the substance or mixture, frequency and duration, physical challenges such as temperature extremes, and other use conditions. Consult with your glove and/or protective clothing manufacturer for selection of appropriate compatible gloves/protective clothing.

For prolonged or repeated contact, gloves made from the following material(s) are recommended (breakthrough times are >4 hours): Nitrile rubber.

Any glove recommended for prolonged/repeated contact is also suitable for short-term/splash contact.

If this product is used in a manner that presents a higher potential for exposure (e.g., spraying, high splash potential, etc.), then use of a protective apron may be necessary. See recommended glove material(s) for determining appropriate apron material(s). If a glove material is not available as an apron, polymer laminate is a suitable option.

Respiratory protection

An exposure assessment may be needed to decide if a respirator is required. If a respirator is needed, use respirators as part of a full respiratory protection program. Based on the results of the exposure assessment, select from the following respirator type(s) to reduce inhalation exposure:
Half facepiece or full facepiece air-purifying respirator suitable for organic vapours and particulates

For questions about suitability for a specific application, consult with your respirator manufacturer.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Physical state	Liquid.
Color	Blue
Odor	Mild Solvent
Odour threshold	*No data available.*
pH	7.5 - 8.5
Melting point/Freezing point	*No data available.*
Boiling point/Initial boiling point/Boiling range	100 ºC
Flash point	Flash point > 93 °C (200 °F) [*Test Method:*Closed Cup]
Evaporation rate	*No data available.*
Flammability	Not applicable.
Flammable Limits(LEL)	*No data available.*
Flammable Limits(UEL)	*No data available.*
Vapour pressure	18 mm Hg
Relative Vapor Density	*No data available.*
Density	0.92 - 0.93 g/ml
Relative density	0.92 - 0.93 [*Ref Std:*WATER=1]
Water solubility	*No data available.*
Solubility- non-water	*No data available.*
Partition coefficient: n-octanol/water	*No data available.*
Autoignition temperature	*No data available.*
Decomposition temperature	*No data available.*
Kinematic Viscosity	14,054 mm²/sec
Volatile organic compounds (VOC)	0.1 % weight [*Test Method:*calculated per CARB title 2]
Percent volatile	74.6 % weight [*Test Method:*Estimated]
VOC less H2O & exempt solvents	316 g/l [*Test Method:*calculated SCAQMD rule 443.1]
Molecular weight	*Not applicable.*

Particle Characteristics	*Not applicable.*

SECTION 10: Stability and reactivity

10.1 Reactivity
This material may be reactive with certain agents under certain conditions - see the remaining headings in this section

10.2 Chemical stability

Stable.

10.3 Possibility of hazardous reactions
Hazardous polymerisation will not occur.

10.4 Conditions to avoid
Sparks and/or flames.

10.5 Incompatible materials
Strong acids.
Strong oxidising agents.

10.6 Hazardous decomposition products

Substance	Condition
None known.	

Refer to section 5.2 for hazardous decomposition products during combustion.

SECTION 11: Toxicological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient classifications are mandated by a competent authority. In addition, toxicological data on ingredients may not be reflected in the material classification and/or the signs and symptoms of exposure, because an ingredient may be present below the threshold for labelling, an ingredient may not be available for exposure, or the data may not be relevant to the material as a whole.

11.1 Information on Toxicological effects

Signs and Symptoms of Exposure

Based on test data and/or information on the components, this material may produce the following health effects:

Inhalation
Respiratory tract irritation: Signs/symptoms may include cough, sneezing, nasal discharge, headache, hoarseness, and nose and throat pain.

Skin contact
Mild Skin Irritation: Signs/symptoms may include localized redness, swelling, itching, and dryness. Allergic skin reaction (non-photo induced): Signs/symptoms may include redness, swelling, blistering, and itching.

Eye contact
Dust created by cutting, grinding, sanding, or machining may cause eye irritation: Signs/symptoms may include redness, swelling, pain, tearing, and blurred or hazy vision.

Ingestion
Gastrointestinal irritation: Signs/symptoms may include abdominal pain, stomach upset, nausea, vomiting and diarrhoea.

Toxicological Data
If a component is disclosed in section 3 but does not appear in a table below, either no data are available for that endpoint or the data are not sufficient for classification.

Acute Toxicity

Name	Route	Species	Value
Overall product	Ingestion		No data available; calculated ATE >5,000 mg/kg
Dodecamethylcyclohexasiloxane	Dermal	Rat	LD50 > 2,000 mg/kg

Dodecamethylcyclohexasiloxane	Ingestion	Rat	LD50 > 2,000 mg/kg
Distillates (petroleum), hydrotreated light	Inhalation-Dust/Mist (4 hours)	Rat	LC50 > 5.4 mg/l
Distillates (petroleum), hydrotreated light	Dermal	similar compounds	LD50 > 5,000 mg/kg
Distillates (petroleum), hydrotreated light	Ingestion	similar compounds	LD50 > 5,000 mg/kg
Aluminum Oxide (non-fibrous)	Dermal		LD50 estimated to be > 5,000 mg/kg
Aluminum Oxide (non-fibrous)	Inhalation-Dust/Mist (4 hours)	Rat	LC50 > 2.3 mg/l
Aluminum Oxide (non-fibrous)	Ingestion	Rat	LD50 > 5,000 mg/kg
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	Rabbit	LD50 > 5,000 mg/kg
Solvent dewaxed heavy paraffinic distillate (petroleum)	Ingestion	Rat	LD50 > 5,000 mg/kg
Solvent dewaxed heavy paraffinic distillate (petroleum)	Inhalation-Dust/Mist (4 hours)	similar compounds	LC50 > 4 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	Dermal	Rabbit	LD50 > 5,000 mg/kg
Distillates (petroleum), solvent-dewaxed light paraffinic	Inhalation-Dust/Mist (4 hours)	Rat	LC50 > 4 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	Ingestion	Rat	LD50 > 5,000 mg/kg
Hydrotreated light paraffinic distillates (petroleum)	Dermal	similar compounds	LD50 > 2,000 mg/kg
Hydrotreated light paraffinic distillates (petroleum)	Inhalation-Dust/Mist (4 hours)	similar compounds	LC50 > 5.53 mg/l
Hydrotreated light paraffinic distillates (petroleum)	Ingestion	similar compounds	LD50 > 5,000 mg/kg
Undecan-1-ol, ethoxylated	Dermal	Rabbit	LD50 > 2,000 mg/kg
Undecan-1-ol, ethoxylated	Ingestion	Rat	LD50 > 700 mg/kg
1,2-Benzisothiazol-3(2H)-one	Dermal	Rat	LD50 > 2,000 mg/kg
1,2-Benzisothiazol-3(2H)-one	Inhalation-Dust/Mist (4 hours)	Rat	LC50 0.21 mg/l
1,2-Benzisothiazol-3(2H)-one	Ingestion	Rat	LD50 450 mg/kg

ATE = acute toxicity estimate

Skin Corrosion/Irritation

Name	Species	Value
Dodecamethylcyclohexasiloxane	Rabbit	No significant irritation
Distillates (petroleum), hydrotreated light	similar compounds	Mild irritant
Aluminum Oxide (non-fibrous)	Rabbit	No significant irritation
Solvent dewaxed heavy paraffinic distillate (petroleum)	Rabbit	No significant irritation
Hydrotreated light paraffinic distillates (petroleum)	similar compounds	No significant irritation
Distillates (petroleum), solvent-dewaxed light paraffinic	Rabbit	Minimal irritation
Undecan-1-ol, ethoxylated	similar health hazards	Irritant
1,2-Benzisothiazol-3(2H)-one	Human	Irritant

Serious Eye Damage/Irritation

Name	Species	Value
Dodecamethylcyclohexasiloxane	Rabbit	No significant irritation

Distillates (petroleum), hydrotreated light	similar compounds	No significant irritation
Aluminum Oxide (non-fibrous)	Rabbit	No significant irritation
Solvent dewaxed heavy paraffinic distillate (petroleum)	Rabbit	No significant irritation
Hydrotreated light paraffinic distillates (petroleum)	similar compounds	No significant irritation
Distillates (petroleum), solvent-dewaxed light paraffinic	Rabbit	No significant irritation
Undecan-1-ol, ethoxylated	Professional judgement	Corrosive
1,2-Benzisothiazol-3(2H)-one	Rabbit	Corrosive

Sensitization:

Skin Sensitisation

Name	Species	Value
Dodecamethylcyclohexasiloxane	Guinea pig	Not classified
Distillates (petroleum), hydrotreated light	similar compounds	Not classified
Solvent dewaxed heavy paraffinic distillate (petroleum)	Guinea pig	Not classified
Hydrotreated light paraffinic distillates (petroleum)	similar compounds	Not classified
Distillates (petroleum), solvent-dewaxed light paraffinic	Guinea pig	Not classified
1,2-Benzisothiazol-3(2H)-one	Human	Sensitising

Respiratory Sensitisation

For the component/components, either no data are currently available or the data are not sufficient for classification.

Germ Cell Mutagenicity

Name	Route	Value
Dodecamethylcyclohexasiloxane	In Vitro	Not mutagenic
Dodecamethylcyclohexasiloxane	In vivo	Not mutagenic
Distillates (petroleum), hydrotreated light	In Vitro	Not mutagenic
Aluminum Oxide (non-fibrous)	In Vitro	Not mutagenic
Solvent dewaxed heavy paraffinic distillate (petroleum)	In Vitro	Not mutagenic
Hydrotreated light paraffinic distillates (petroleum)	In Vitro	Not mutagenic
Distillates (petroleum), solvent-dewaxed light paraffinic	In vivo	Not mutagenic
Distillates (petroleum), solvent-dewaxed light paraffinic	In Vitro	Some positive data exist, but the data are not sufficient for classification
1,2-Benzisothiazol-3(2H)-one	In vivo	Not mutagenic
1,2-Benzisothiazol-3(2H)-one	In Vitro	Some positive data exist, but the data are not sufficient for classification

Carcinogenicity

Name	Route	Species	Value
Aluminum Oxide (non-fibrous)	Inhalation	Rat	Not carcinogenic
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	Mouse	Not carcinogenic
Distillates (petroleum), solvent-dewaxed light paraffinic	Dermal	Mouse	Some positive data exist, but the data are not sufficient for classification

Reproductive Toxicity

Reproductive and/or Developmental Effects

Name	Route	Value	Species	Test result	Exposure Duration
Dodecamethylcyclohexasiloxane	Ingestion	Not classified for female reproduction	Rat	NOAEL 1,000 mg/kg/day	2 generation
Dodecamethylcyclohexasiloxane	Ingestion	Not classified for male reproduction	Rat	NOAEL 1,000 mg/kg/day	2 generation
Dodecamethylcyclohexasiloxane	Ingestion	Not classified for development	Multiple animal species	NOAEL 1,000 mg/kg/day	during gestation
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	Not classified for development	Rat	NOAEL 1,000 mg/kg/day	during gestation
1,2-Benzisothiazol-3(2H)-one	Ingestion	Not classified for female reproduction	Rat	NOAEL 112 mg/kg/day	2 generation
1,2-Benzisothiazol-3(2H)-one	Ingestion	Not classified for male reproduction	Rat	NOAEL 112 mg/kg/day	2 generation
1,2-Benzisothiazol-3(2H)-one	Ingestion	Not classified for development	Rat	NOAEL 112 mg/kg/day	2 generation

Target Organ(s)

Specific Target Organ Toxicity - single exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Dodecamethylcyclohexasiloxane	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	Rat	NOAEL not available	
Undecan-1-ol, ethoxylated	Inhalation	respiratory irritation	May cause respiratory irritation	similar health hazards	NOAEL Not available	
1,2-Benzisothiazol-3(2H)-one	Inhalation	respiratory irritation	Some positive data exist, but the data are not sufficient for classification	similar health hazards	NOAEL Not available	

Specific Target Organ Toxicity - repeated exposure

Name	Route	Target Organ(s)	Value	Species	Test result	Exposure Duration
Dodecamethylcyclohexasiloxane	Inhalation	liver	Not classified	Rat	NOAEL 0.546 mg/l	90 days
Dodecamethylcyclohexasiloxane	Inhalation	respiratory system	Not classified	Rat	NOAEL 0.018 mg/l	90 days
Dodecamethylcyclohexasiloxane	Inhalation	hematopoietic system	Not classified	Rat	NOAEL 0.546 mg/l	90 days
Dodecamethylcyclohexasiloxane	Inhalation	eyes	Not classified	Rat	NOAEL 0.546 mg/l	90 days
Dodecamethylcyclohexasiloxane	Ingestion	endocrine system	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Dodecamethylcyclohexasiloxane	Ingestion	liver	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Dodecamethylcyclohexasiloxane	Ingestion	hematopoietic system	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Dodecamethylcyclohexasiloxane	Ingestion	nervous system	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Dodecamethylcyclohexasiloxane	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Dodecamethylcyclohexasiloxane	Ingestion	respiratory system	Not classified	Rat	NOAEL 1,000 mg/kg/day	28 days
Aluminum Oxide (non-	Inhalation	pneumoconiosis	Some positive data exist, but the	Human	NOAEL Not	occupational

fibrous)			data are not sufficient for classification		available	exposure
Aluminum Oxide (non-fibrous)	Inhalation	pulmonary fibrosis	Not classified	Human	NOAEL Not available	occupational exposure
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	skin	Not classified	Rat	NOAEL 2,000 mg/kg/day	13 weeks
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	liver	Not classified	Rat	NOAEL 2,000 mg/kg/day	13 weeks
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	hematopoietic system	Not classified	Rat	NOAEL 2,000 mg/kg/day	13 weeks
Solvent dewaxed heavy paraffinic distillate (petroleum)	Dermal	kidney and/or bladder	Not classified	Rat	NOAEL 2,000 mg/kg/day	13 weeks
Distillates (petroleum), solvent-dewaxed light paraffinic	Dermal	hematopoietic system	Not classified	Rabbit	NOAEL 5,000 mg/kg/day	3 weeks
Distillates (petroleum), solvent-dewaxed light paraffinic	Dermal	liver	Not classified	Rabbit	NOAEL 5,000 mg/kg/day	3 weeks
Distillates (petroleum), solvent-dewaxed light paraffinic	Dermal	kidney and/or bladder	Not classified	Rabbit	NOAEL 5,000 mg/kg/day	3 weeks
1,2-Benzisothiazol-3(2H)-one	Ingestion	liver	Not classified	Rat	NOAEL 322 mg/kg/day	90 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	hematopoietic system	Not classified	Rat	NOAEL 322 mg/kg/day	90 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	eyes	Not classified	Rat	NOAEL 322 mg/kg/day	90 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	kidney and/or bladder	Not classified	Rat	NOAEL 322 mg/kg/day	90 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	respiratory system	Not classified	Rat	NOAEL 322 mg/kg/day	90 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	heart	Not classified	Rat	NOAEL 150 mg/kg/day	28 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	endocrine system	Not classified	Rat	NOAEL 150 mg/kg/day	28 days
1,2-Benzisothiazol-3(2H)-one	Ingestion	nervous system	Not classified	Rat	NOAEL 150 mg/kg/day	28 days

Aspiration Hazard

Name	Value
Distillates (petroleum), hydrotreated light	Aspiration hazard
Solvent dewaxed heavy paraffinic distillate (petroleum)	Not an aspiration hazard
Hydrotreated light paraffinic distillates (petroleum)	Aspiration hazard
Distillates (petroleum), solvent-dewaxed light paraffinic	Aspiration hazard

Please contact the address or phone number listed on the first page of the SDS for additional toxicological information on this material and/or its components.

SECTION 12: Ecological information

The information below may not be consistent with the material classification in Section 2 if specific ingredient classifications are mandated by a competent authority. Additional information leading to material classification in Section 2 is available upon request. In addition, environmental fate and effects data on ingredients may not be reflected in this section because an ingredient is present below the threshold for labelling, an ingredient is not expected to be available for exposure, or the data is considered not relevant to the material as a whole.

12.1. Toxicity

Acute aquatic hazard:

GHS Acute 3: Harmful to aquatic life.

Chronic aquatic hazard:
Not chronically toxic to aquatic life by GHS criteria.

No product test data available.

Material	CAS Nbr	Organism	Type	Exposure	Test endpoint	Test result
Distillates (petroleum), hydrotreated light	64742-47-8	Green algae	Analogous Compound	72 hours	EL50	>1,000 mg/l
Distillates (petroleum), hydrotreated light	64742-47-8	Water flea	Analogous Compound	48 hours	EL50	>1,000 mg/l
Distillates (petroleum), hydrotreated light	64742-47-8	Rainbow trout	Experimental	96 hours	LL50	>788,000 mg/l
Distillates (petroleum), hydrotreated light	64742-47-8	Scud	Experimental	96 hours	LL50	>10,000 mg/l
Distillates (petroleum), hydrotreated light	64742-47-8	Green algae	Analogous Compound	72 hours	NOEL	1,000 mg/l
Distillates (petroleum), hydrotreated light	64742-47-8	Water flea	Analogous Compound	21 days	NOEL	>1 mg/l
Dodecamethylcyclohexasiloxane	540-97-6	Activated sludge	Experimental	3 hours	EC50	>100 mg/l
Dodecamethylcyclohexasiloxane	540-97-6	Green algae	Experimental	72 hours	EC50	>100 mg/l
Dodecamethylcyclohexasiloxane	540-97-6	Fathead minnow	Experimental	49 days	NOEC	100 mg/l
Dodecamethylcyclohexasiloxane	540-97-6	Green algae	Experimental	72 hours	NOEC	100 mg/l
Dodecamethylcyclohexasiloxane	540-97-6	Water flea	Experimental	21 days	NOEC	100 mg/l
Aluminum Oxide (non-fibrous)	1344-28-1	N/A	Experimental	96 hours	LC50	>100 mg/l
Aluminum Oxide (non-fibrous)	1344-28-1	Green algae	Experimental	72 hours	EC50	>100 mg/l
Aluminum Oxide (non-fibrous)	1344-28-1	Water flea	Experimental	48 hours	LC50	>100 mg/l
Aluminum Oxide (non-fibrous)	1344-28-1	Green algae	Experimental	72 hours	NOEC	>100 mg/l
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Green algae	Analogous Compound	96 hours	EC50	>100 mg/l
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Water flea	Analogous Compound	48 hours	EC50	>100 mg/l
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Rainbow trout	Experimental	96 hours	LC50	>100 mg/l
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Water flea	Experimental	21 days	NOEC	100 mg/l
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Fathead minnow	Estimated	96 hours	LL50	>100 mg/l
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Water flea	Estimated	48 hours	EL50	>100 mg/l

Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Green algae	Estimated	72 hours	NOEL	100 mg/l
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Water flea	Estimated	21 days	NOEC	10 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Fathead minnow	Estimated	96 hours	LL50	>100 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Green algae	Estimated	72 hours	EL50	>100 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Water flea	Estimated	48 hours	EL50	>100 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Green algae	Estimated	72 hours	NOEL	100 mg/l
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Water flea	Estimated	21 days	NOEL	100 mg/l
Undecan-1-ol, ethoxylated	34398-01-1	Green algae	Analogous Compound	72 hours	ErC50	0.43 mg/l
Undecan-1-ol, ethoxylated	34398-01-1	Green algae	Analogous Compound	72 hours	NOEC	0.09 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Green algae	Experimental	72 hours	ErC50	0.11 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Rainbow trout	Experimental	96 hours	LC50	1.6 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Sheepshead Minnow	Experimental	96 hours	LC50	16.7 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Water flea	Experimental	48 hours	EC50	2.9 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Green algae	Experimental	72 hours	NOEC	0.0403 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Activated sludge	Experimental	3 hours	EC50	12.8 mg/l
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Bobwhite quail	Experimental	14 days	LD50	617 mg per kg of bodyweight
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Cabbage	Experimental	14 days	EC50	200 mg/kg (Dry Weight)
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Redworm	Experimental	14 days	LC50	>410.6 mg/kg (Dry Weight)
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Soil microbes	Experimental	28 days	EC50	>811.5 mg/kg (Dry Weight)

12.2. Persistence and degradability

Material	CAS Nbr	Test type	Duration	Study Type	Test result	Protocol
Distillates (petroleum), hydrotreated light	64742-47-8	Experimental Biodegradation	28 days	BOD	22 %BOD/ThOD	OECD 301F - Manometric respirometry
Dodecamethylcyclohexasiloxane	540-97-6	Experimental Biodegradation	28 days	CO2 evolution	4.47 %CO2 evolution/THCO2 evolution	OECD 310 CO2 Headspace
Aluminum Oxide (non-fibrous)	1344-28-1	Data not available-insufficient	N/A	N/A	N/A	N/A

Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Experimental Biodegradation	28 days	CO2 evolution	23 %CO2 evolution/THCO2 evolution	similar to OECD 301B
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Estimated Biodegradation	28 days	CO2 evolution	22 %CO2 evolution/THCO2 evolution	OECD 301B - Modified sturm or CO2
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Analogous Compound Biodegradation	28 days	BOD	31 %BOD/ThOD	OECD 301F - Manometric respirometry
Undecan-1-ol, ethoxylated	34398-01-1	Modeled Biodegradation	28 days	CO2 evolution	95 %CO2 evolution/THCO2 evolution	Catalogic™
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Biodegradation	28 days	BOD	0 %BOD/ThOD	OECD 301C - MITI test (I)
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Aquatic Inherent Biodegrad.	34 days	Dissolv. Organic Carbon Deplet	17 %removal of DOC	OECD 302A - Modified SCAS Test
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Biodegradation	21 days	Dissolv. Organic Carbon Deplet	80 %removal of DOC	OECD 303A - Simulated Aerobic
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Biodegradation		Half-life (t 1/2)	4 hours (t 1/2)	
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Hydrolysis		Hydrolytic half-life	>1 years (t 1/2)	OECD 111 Hydrolysis func of pH

12.3 : Bioaccumulative potential

Material	CAS Nbr	Test type	Duration	Study Type	Test result	Protocol
Distillates (petroleum), hydrotreated light	64742-47-8	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Dodecamethylcyclohexasiloxane	540-97-6	Experimental BCF - Fish	49 days	Bioaccumulation factor	1160	OECD305-Bioconcentration
Aluminum Oxide (non-fibrous)	1344-28-1	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Solvent dewaxed heavy paraffinic distillate (petroleum)	64742-65-0	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Hydrotreated light paraffinic distillates (petroleum)	64742-55-8	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Distillates (petroleum), solvent-dewaxed light paraffinic	64742-56-9	Data not available or insufficient for classification	N/A	N/A	N/A	N/A
Undecan-1-ol, ethoxylated	34398-01-1	Modeled Bioconcentration		Bioaccumulation factor	50	Catalogic™
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental BCF - Fish	56 days	Bioaccumulation factor	6.62	similar to OECD 305
1,2-Benzisothiazol-3(2H)-one	2634-33-5	Experimental Bioconcentration		Log Kow	1.45	OECD 107 log Kow shke flsk mtd

12.4. Mobility in soil
Please contact manufacturer for more details

12.5 Other adverse effects
No information available.

SECTION 13: Disposal considerations

13.1. Disposal methods

Dispose of contents/ container in accordance with the local/regional/national/international regulations.

Dispose of waste product in a permitted industrial waste facility. As a disposal alternative, incinerate in a permitted waste incineration facility. Proper destruction may require the use of additional fuel during incineration processes. Empty drums/barrels/containers used for transporting and handling hazardous chemicals (chemical substances/mixtures/preparations classified as Hazardous as per applicable regulations) shall be considered, stored, treated & disposed of as hazardous wastes unless otherwise defined by applicable waste regulations. Consult with the respective regulating authorities to determine the available treatment and disposal facilities.

SECTION 14: Transport Information

International Regulations

UN No.: Not restricted for transport.
UN Proper shipping name: Not restricted for transport.

Transportation Class (IMO): None assigned
Transportation Class (IATA): None assigned
Other Dangerous Goods Descriptions (IMO): None assigned
Other Dangerous Goods Descriptions (IATA): None assigned
Packing Group: None assigned
Marine pollutant: None assigned

SECTION 15: Regulatory information

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

Global inventory status
Contact 3M for more information. The components of this material are in compliance with the provisions of the Korea Chemical Control Act. Certain restrictions may apply. Contact the selling division for additional information. The components of this material are in compliance with the provisions of Australia National Industrial Chemical Notification and Assessment Scheme (NICNAS). Certain restrictions may apply. Contact the selling division for additional information. The components of this material are in compliance with the provisions of Philippines RA 6969 requirements. Certain restrictions may apply. Contact the selling division for additional information. This product complies with Measures on Environmental Management of New Chemical Substances. All ingredients are listed on or exempt from on China IECSC inventory. The components of this product are in compliance with the chemical notification requirements of TSCA. All required components of this product are listed on the active portion of the TSCA Inventory.

This product may contain component(s) that are regulated by the following:
Workplace Safety and Health Act & Workplace Safety and Health (General Provisions) Regulations: this product is subject to SDS, labelling, PEL and other requirements in the Act/Regulations.
Fire Safety (Petroleum and Flammable Materials) Regulations: This product is subject to the requirements in the Regulations

SECTION 16: Other information

DISCLAIMER: The information on this Safety Data Sheet is based on our experience and is correct to the best of our knowledge at the date of publication, but we do not accept any liability for any loss, damage or injury resulting from its use (except as required by law). The information may not be valid for any use not referred to in this Data Sheet or use of the product in combination with other materials. For these reasons, it is important that customers carry out their own test to satisfy themselves as to the suitability of the product for their own intended applications.

3M Singapore SDSs are available at www.3m.com.sg