

# **SAFETY DATA SHEET**

## **BRUSH CLEANER & THINNERS**

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

1.1 Product identifier

Product name : BRUSH CLEANER & THINNERS

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

Identified uses

Consumer use

Uses advised against

None

Product use : Thinner

## 1.3 Details of the supplier of the safety data sheet

ICI Paints AkzoNobel, Wexham Road, Slough, Berkshire, SL2 5DS, U.K.

Tel.: +44 (0) 333 222 71 71 www.hammerite.co.uk

e-mail address of person responsible for this SDS

: hammerite.advice@akzonobel.com

### 1.4 Emergency telephone number

National advisory body/Poison Center

**Telephone number** : +44 (0)344 892 0111

## **SECTION 2: Hazards identification**

## 2.1 Classification of the substance or mixture

Product definition : Mixture

#### Classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

Flam. Liq. 3, H226 Eye Dam. 1, H318 STOT SE 3, H336 Asp. Tox. 1, H304

The product is classified as hazardous according to Regulation (EC) 1272/2008 as amended.

See Section 16 for the full text of the H statements declared above.

See Section 11 for more detailed information on health effects and symptoms.

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-20241/18AkzoNobel

**BRUSH CLEANER & THINNERS** 

## **SECTION 2: Hazards identification**

#### 2.2 Label elements

Hazard pictograms









Signal word : Danger

**Hazard statements** : H226 - Flammable liquid and vapor.

H304 - May be fatal if swallowed and enters airways.

H318 - Causes serious eye damage. H336 - May cause drowsiness or dizziness.

**Precautionary statements** 

**General**: P102 - Keep out of reach of children.

P101 - If medical advice is needed, have product container or label at hand.

**Prevention**: P280 - Wear eye or face protection.

P210 - Keep away from heat, hot surfaces, sparks, open flames and other ignition

sources. No smoking.

P271 - Use only outdoors or in a well-ventilated area.

P261 - Avoid breathing vapor.

**Response** : P304 + P312 - IF INHALED: Call a POISON CENTER or doctor if you feel unwell.

P301 + P310 + P331 - IF SWALLOWED: Immediately call a POISON CENTER or

doctor. Do NOT induce vomiting.

P305 + P351 + P338 + P310 - IF IN EYES: Rinse cautiously with water for several minutes. Remove contact lenses, if present and easy to do. Continue rinsing.

Immediately call a POISON CENTER or doctor.

**Storage** : P405 - Store locked up.

P403 + P233 - Store in a well-ventilated place. Keep container tightly closed.

P403 + P235 - Keep cool.

**Disposal**: P501 - Dispose of contents and container in accordance with all local, regional,

national or international regulations.

**Hazardous ingredients**: hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics

cyclohexanone

Supplemental label

elements

: Repeated exposure may cause skin dryness or cracking.

Annex XVII - Restrictions on the manufacture, placing on the market and use of certain dangerous substances, mixtures and

articles

**Special packaging requirements** 

Containers to be fitted with child-resistant

fastenings

: Yes, applicable.

Tactile warning of danger : Yes, applicable.

2.3 Other hazards

Product meets the criteria for PBT or vPvB according to Regulation (EC) No. 1907/2006, Annex XIII : This mixture does not contain any substances that are assessed to be a PBT or a

vPvB.

Other hazards which do not result in classification

: None known.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 2/18 AkzoNobel

**BRUSH CLEANER & THINNERS** 

## **SECTION 3: Composition/information on ingredients**

3.2 Mixtures : Mixture

Product/ingredient name	Identifiers	%	Classification	Specific Conc. Limits, M-factors and ATEs	Туре
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	REACH #: 01-2119463258-33 EC: 919-857-5 CAS: 64742-48-9 Index: 649-327-00-6	≥90	Flam. Liq. 3, H226 STOT SE 3, H336 Asp. Tox. 1, H304 EUH066	-	[1]
cyclohexanone	REACH #: 01-2119453616-35 EC: 203-631-1 CAS: 108-94-1	<10	Flam. Liq. 3, H226 Acute Tox. 4, H302 Acute Tox. 4, H312 Acute Tox. 4, H332 Skin Irrit. 2, H315 Eye Dam. 1, H318	ATE [Oral] = 500 mg/kg ATE [Dermal] = 1100 mg/kg ATE [Inhalation (vapours)] = 11 mg/	[1] [2]
n-butyl acetate	REACH #: 01-2119485493-29 EC: 204-658-1 CAS: 123-86-4 Index: 607-025-00-1	≤3	Flam. Liq. 3, H226 STOT SE 3, H336 EUH066	-	[1] [2]
			See Section 16 for the full text of the H statements declared above.		

There are no additional ingredients present which, within the current knowledge of the supplier and in the concentrations applicable, are classified as hazardous to health or the environment, are PBTs, vPvBs or Substances of equivalent concern, or have been assigned a workplace exposure limit and hence require reporting in this section.

#### Type

- [1] Substance classified with a physical, health or environmental hazard
- [2] Substance with a workplace exposure limit

Occupational exposure limits, if available, are listed in Section 8.

## **SECTION 4: First aid measures**

## 4.1 Description of first aid measures

Eye contact

: Get medical attention immediately. Call a poison center or physician. Immediately flush eyes with plenty of water, occasionally lifting the upper and lower eyelids. Check for and remove any contact lenses if easy to do. Continue to rinse for at least 10 minutes. Chemical burns must be treated promptly by a physician.

Inhalation

: Get medical attention immediately. Call a poison center or physician. Remove victim to fresh air and keep at rest in a position comfortable for breathing. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. If not breathing, if breathing is irregular or if respiratory arrest occurs, provide artificial respiration or oxygen by trained personnel. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie,

belt or waistband.

Skin contact

Get medical attention immediately. Call a poison center or physician. Wash skin thoroughly with soap and water or use recognized skin cleanser. Remove contaminated clothing and shoes. Wash contaminated clothing thoroughly with water before removing it, or wear gloves. Continue to rinse for at least 10 minutes. Chemical burns must be treated promptly by a physician. Wash clothing before reuse. Clean shoes thoroughly before reuse.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 3/18

**AkzoNobel** 

**BRUSH CLEANER & THINNERS** 

## **SECTION 4: First aid measures**

Ingestion

: Get medical attention immediately. Call a poison center or physician. Wash out mouth with water. Remove dentures if any. If material has been swallowed and the exposed person is conscious, give small quantities of water to drink. Stop if the exposed person feels sick as vomiting may be dangerous. Aspiration hazard if swallowed. Can enter lungs and cause damage. Do not induce vomiting. If vomiting occurs, the head should be kept low so that vomit does not enter the lungs. Chemical burns must be treated promptly by a physician. Never give anything by mouth to an unconscious person. If unconscious, place in recovery position and get medical attention immediately. Maintain an open airway. Loosen tight clothing such as a collar, tie, belt or waistband.

Protection of first-aiders

: No action shall be taken involving any personal risk or without suitable training. If it is suspected that fumes are still present, the rescuer should wear an appropriate mask or self-contained breathing apparatus. It may be dangerous to the person providing aid to give mouth-to-mouth resuscitation. Wash contaminated clothing thoroughly with water before removing it, or wear gloves.

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

## Over-exposure signs/symptoms

**Eye contact**: Adverse symptoms may include the following:

pain watering redness

**Inhalation** : Adverse symptoms may include the following:

nausea or vomiting

headache

drowsiness/fatigue dizziness/vertigo unconsciousness

**Skin contact**: Adverse symptoms may include the following:

pain or irritation

redness dryness cracking

blistering may occur

**Ingestion**: Adverse symptoms may include the following:

stomach pains nausea or vomiting

## 4.3 Indication of any immediate medical attention and special treatment needed

Notes to physician : Treat symptomatically. Contact poison treatment specialist immediately if large

quantities have been ingested or inhaled.

**Specific treatments**: No specific treatment.

# **SECTION 5: Firefighting measures**

#### 5.1 Extinguishing media

Suitable extinguishing

media

: Use dry chemical, CO<sub>2</sub>, water spray (fog) or foam.

Unsuitable extinguishing

media

: Do not use water jet.

### 5.2 Special hazards arising from the substance or mixture

Hazards from the substance or mixture

: Flammable liquid and vapor. Runoff to sewer may create fire or explosion hazard. In a fire or if heated, a pressure increase will occur and the container may burst, with the risk of a subsequent explosion.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 4/18 AkzoNobel

**BRUSH CLEANER & THINNERS** 

## **SECTION 5: Firefighting measures**

Hazardous combustion products

Decomposition products may include the following materials: carbon dioxide

carbon monoxide

#### 5.3 Advice for firefighters

Special protective actions for fire-fighters

: Promptly isolate the scene by removing all persons from the vicinity of the incident if there is a fire. No action shall be taken involving any personal risk or without suitable training. Move containers from fire area if this can be done without risk. Use water spray to keep fire-exposed containers cool.

Special protective equipment for fire-fighters : Fire-fighters should wear appropriate protective equipment and self-contained breathing apparatus (SCBA) with a full face-piece operated in positive pressure mode. Clothing for fire-fighters (including helmets, protective boots and gloves) conforming to European standard EN 469 will provide a basic level of protection for chemical incidents.

## SECTION 6: Accidental release measures

## 6.1 Personal precautions, protective equipment and emergency procedures

For non-emergency personnel

: No action shall be taken involving any personal risk or without suitable training. Evacuate surrounding areas. Keep unnecessary and unprotected personnel from entering. Do not touch or walk through spilled material. Shut off all ignition sources. No flares, smoking or flames in hazard area. Do not breathe vapor or mist. Provide adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Put on appropriate personal protective equipment.

For emergency responders: If specialized clothing is required to deal with the spillage, take note of any information in Section 8 on suitable and unsuitable materials. See also the information in "For non-emergency personnel".

## 6.2 Environmental precautions

: Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers. Inform the relevant authorities if the product has caused environmental pollution (sewers, waterways, soil or air).

#### 6.3 Methods and materials for containment and cleaning up

Small spill

: Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Dilute with water and mop up if water-soluble. Alternatively, or if water-insoluble, absorb with an inert dry material and place in an appropriate waste disposal container. Dispose of via a licensed waste disposal contractor.

#### Large spill

: Stop leak if without risk. Move containers from spill area. Use spark-proof tools and explosion-proof equipment. Approach release from upwind. Prevent entry into sewers, water courses, basements or confined areas. Wash spillages into an effluent treatment plant or proceed as follows. Contain and collect spillage with noncombustible, absorbent material e.g. sand, earth, vermiculite or diatomaceous earth and place in container for disposal according to local regulations. Dispose of via a licensed waste disposal contractor. Contaminated absorbent material may pose the same hazard as the spilled product.

## 6.4 Reference to other sections

: See Section 1 for emergency contact information. See Section 8 for information on appropriate personal protective equipment. See Section 13 for additional waste treatment information.

Date of issue/Date of revision Version: 1 : 9-2-2024

**AkzoNobel** Date of previous issue : 9-2-2024 5/18

**BRUSH CLEANER & THINNERS** 

## **SECTION 7: Handling and storage**

The information in this section contains generic advice and guidance.

#### 7.1 Precautions for safe handling

#### **Protective measures**

: Put on appropriate personal protective equipment (see Section 8). Do not get in eyes or on skin or clothing. Do not breathe vapor or mist. Do not swallow. Use only with adequate ventilation. Wear appropriate respirator when ventilation is inadequate. Do not enter storage areas and confined spaces unless adequately ventilated. Keep in the original container or an approved alternative made from a compatible material, kept tightly closed when not in use. Store and use away from heat, sparks, open flame or any other ignition source. Use explosion-proof electrical (ventilating, lighting and material handling) equipment. Use only non-sparking tools. Take precautionary measures against electrostatic discharges. Empty containers retain product residue and can be hazardous. Do not reuse container.

# Advice on general occupational hygiene

: Eating, drinking and smoking should be prohibited in areas where this material is handled, stored and processed. Workers should wash hands and face before eating, drinking and smoking. Remove contaminated clothing and protective equipment before entering eating areas. See also Section 8 for additional information on hygiene measures.

### 7.2 Conditions for safe storage, including any incompatibilities

Store in accordance with local regulations. Store in a segregated and approved area. Store in original container protected from direct sunlight in a dry, cool and well-ventilated area, away from incompatible materials (see Section 10) and food and drink. Store locked up. Eliminate all ignition sources. Separate from oxidizing materials. Keep container tightly closed and sealed until ready for use. Containers that have been opened must be carefully resealed and kept upright to prevent leakage. Do not store in unlabeled containers. Use appropriate containment to avoid environmental contamination. See Section 10 for incompatible materials before handling or use.

#### **Seveso Directive - Reporting thresholds**

## **Danger criteria**

	Notification and MAPP threshold	Safety report threshold
P5c	5000 tonne	50000 tonne

#### 7.3 Specific end use(s)

Recommendations : Not available.
Industrial sector specific : Not available.
solutions

# **SECTION 8: Exposure controls/personal protection**

The information in this section contains generic advice and guidance. Information is provided based on typical anticipated uses of the product. Additional measures might be required for bulk handling or other uses that could significantly increase worker exposure or environmental releases.

## 8.1 Control parameters

### Occupational exposure limits

Product/ingredient name	Exposure limit values
cyclohexanone	EH40/2005 WELs (United Kingdom (UK), 1/2020). Absorbed through skin.
	STEL: 20 ppm 15 minutes.
	TWA: 10 ppm 8 hours.
	STEL: 82 mg/m³ 15 minutes.
	TWA: 41 mg/m³ 8 hours.
n-butyl acetate	EH40/2005 WELs (United Kingdom (UK), 1/2020).
	STEL: 966 mg/m³ 15 minutes.
	STEL: 200 ppm 15 minutes.

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-20246/18AkzoNobel

**BRUSH CLEANER & THINNERS** 

## **SECTION 8: Exposure controls/personal protection**

TWA: 724 mg/m<sup>3</sup> 8 hours. TWA: 150 ppm 8 hours.

# Recommended monitoring procedures

: If this product contains ingredients with exposure limits, personal, workplace atmosphere or biological monitoring may be required to determine the effectiveness of the ventilation or other control measures and/or the necessity to use respiratory protective equipment. Reference should be made to monitoring standards, such as the following: European Standard EN 689 (Workplace atmospheres - Guidance for the assessment of exposure by inhalation to chemical agents for comparison with limit values and measurement strategy) European Standard EN 14042 (Workplace atmospheres - Guide for the application and use of procedures for the assessment of exposure to chemical and biological agents) European Standard EN 482 (Workplace atmospheres - General requirements for the performance of procedures for the measurement of chemical agents) Reference to national guidance documents for methods for the determination of hazardous substances will also be required.

#### **DNELs/DMELs**

Product/ingredient name	Type	Exposure	Value	Population	Effects
hydrocarbon, C9-C11, n-alkane, iso- alkane, cyclic, <2% of aromatics	DNEL	Long term Inhalation	0.41 mg/m <sup>3</sup>	General population	Systemic
	DNEL	Long term Inhalation	1.9 mg/m³	Workers	Systemic
	DNEL	Long term Inhalation	178.57 mg/ m³	General population	Local
	DNEL	Long term Oral	300 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	300 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	300 mg/kg bw/day	Workers	Systemic
	DNEL	Short term Inhalation	640 mg/m <sup>3</sup>	General population	Local
	DNEL	Long term Inhalation	837.5 mg/ m³	Workers	Local
	DNEL	Short term Inhalation	1066.67 mg/m³	Workers	Local
	DNEL	Short term Inhalation	1152 mg/ m <sup>3</sup>	General population	Systemic
	DNEL	Short term Inhalation	1286.4 mg/ m <sup>3</sup>	Workers	Systemic
cyclohexanone	DNEL	Short term Dermal	1 mg/kg bw/day	General population	Systemic
	DNEL	Long term Dermal	1 mg/kg bw/day	General population	Systemic
	DNEL	Short term Oral	1.5 mg/kg bw/day	General population	Systemic
	DNEL	Long term Oral	1.5 mg/kg bw/day	General population	Systemic
	DNEL	Short term Dermal	4 mg/kg bw/day	Workers	Systemic
	DNEL	Long term Dermal	4 mg/kg bw/day	Workers	Systemic
	DNEL	Long term Inhalation	10 mg/m³	General population	Systemic
	DNEL	Long term Inhalation	20 mg/m <sup>3</sup>	General population	Local
	DNEL	Short term Inhalation	20 mg/m <sup>3</sup>	General population	Systemic
	DNEL	Short term Inhalation	40 mg/m³	General population	Local

**AkzoNobel** 

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-20247/18

**BRUSH CLEANER & THINNERS** 

DNEL	Long term Inhalation	40 mg/m³	Workers	Local
DNEL	Long term	40 mg/m <sup>3</sup>	Workers	Systemic
DNEL	Short term	80 mg/m³	Workers	Local
DNEL	Short term	80 mg/m³	Workers	Systemic
DNEL	Short term Oral	2 mg/kg	General	Systemic
DNEL	Long term Oral	2 mg/kg	General	Systemic
DNEL	Long term Dermal	3.4 mg/kg	General	Systemic
DNEL	Short term Dermal	6 mg/kg	General	Systemic
DNEL	Long term Dermal	7 mg/kg	Workers	Systemic
DNEL	Short term Dermal	11 mg/kg	Workers	Systemic
DNEL	Long term Inhalation	12 mg/m³	General population	Systemic
DNEL	Long term Inhalation	35.7 mg/m³	General	Local
DNEL	Long term Inhalation	48 mg/m³	Workers	Systemic
DNEL	Short term Inhalation	300 mg/m <sup>3</sup>	General population	Local
DNEL	Short term Inhalation	300 mg/m <sup>3</sup>	General population	Systemic
DNEL	Long term Inhalation	300 mg/m <sup>3</sup>	Workers	Local
DNEL	Short term Inhalation	600 mg/m <sup>3</sup>	Workers	Local
DNEL	Short term Inhalation	600 mg/m <sup>3</sup>	Workers	Systemic
	DNEL DNEL DNEL DNEL DNEL DNEL DNEL DNEL	Inhalation DNEL Long term Inhalation DNEL Short term Inhalation DNEL Short term Oral DNEL Long term Oral DNEL Long term Dermal DNEL Long term Dermal DNEL Short term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Long term Inhalation DNEL Long term Inhalation DNEL Long term Inhalation DNEL Short term Inhalation DNEL Long term Inhalation DNEL Short term	Inhalation DNEL Long term Inhalation DNEL Short term 80 mg/m³ Inhalation DNEL Short term 80 mg/m³ Inhalation DNEL Short term Oral 2 mg/kg bw/day DNEL Long term Dermal 3.4 mg/kg bw/day DNEL Short term Dermal 6 mg/kg bw/day DNEL Long term Dermal 7 mg/kg bw/day DNEL Short term Dermal 5 bw/day DNEL Long term Dermal 7 mg/kg bw/day DNEL Long term Dermal 11 mg/kg bw/day DNEL Long term 12 mg/m³ Inhalation DNEL Long term 35.7 mg/m³ Inhalation DNEL Short term 300 mg/m³ Inhalation DNEL Short term 300 mg/m³ Inhalation DNEL Long term 300 mg/m³ Inhalation DNEL Short term 600 mg/m³ Inhalation DNEL Short term 600 mg/m³	Inhalation DNEL Long term Inhalation DNEL Short term Inhalation DNEL Short term Inhalation DNEL Short term Oral Short term Oral Short term Oral DNEL Long term Oral DNEL Long term Dermal Short term Dermal DNEL Short term Dermal DNEL Short term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Short term Dermal DNEL Short term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Short term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Long term Dermal DNEL Long term DNEL Short term DNEL Long term DNEL Short term Short term Short term DNEL Short term Sho

#### **PNECs**

No PNECs available.

## 8.2 Exposure controls

Appropriate engineering controls

: Use only with adequate ventilation. Use process enclosures, local exhaust ventilation or other engineering controls to keep worker exposure to airborne contaminants below any recommended or statutory limits. The engineering controls also need to keep gas, vapor or dust concentrations below any lower explosive limits. Use explosion-proof ventilation equipment.

## **Individual protection measures**

Hygiene measures

: Wash hands, forearms and face thoroughly after handling chemical products, before eating, smoking and using the lavatory and at the end of the working period. Appropriate techniques should be used to remove potentially contaminated clothing. Wash contaminated clothing before reusing. Ensure that eyewash stations and safety showers are close to the workstation location.

Eye/face protection

: Safety eyewear complying with an approved standard should be used when a risk assessment indicates this is necessary to avoid exposure to liquid splashes, mists, gases or dusts. If contact is possible, the following protection should be worn, unless the assessment indicates a higher degree of protection: chemical splash goggles and/or face shield. If inhalation hazards exist, a full-face respirator may be required instead.

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-20248/18AkzoNobel

**BRUSH CLEANER & THINNERS** 

## SECTION 8: Exposure controls/personal protection

### **Skin protection**

## **Hand protection**

: Chemical-resistant, impervious gloves complying with an approved standard should be worn at all times when handling chemical products if a risk assessment indicates this is necessary. Considering the parameters specified by the glove manufacturer, check during use that the gloves are still retaining their protective properties. It should be noted that the time to breakthrough for any glove material may be different for different glove manufacturers. In the case of mixtures, consisting of several substances, the protection time of the gloves cannot be accurately estimated.

When prolonged or frequently repeated contact may occur, a glove with a protection class of 6 (breakthrough time >480 minutes according to EN374) is recommended. Recommended gloves: Viton ® or Nitrile, thickness ≥ 0.38 mm. When only brief contact is expected, a glove with protection class of 2 or higher (breakthrough time >30 minutes according to EN374) is recommended.

Recommended gloves: Nitrile, thickness ≥ 0.12 mm.

Gloves should be replaced regularly and if there is any sign of damage to the glove material.

The performance or effectiveness of the glove may be reduced by physical/ chemical damage and poor maintenance.

The user must check that the final choice of type of glove selected for handling this product is the most appropriate and takes into account the particular conditions of use, as included in the user's risk assessment.

#### **Body protection**

: Personal protective equipment for the body should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product. When there is a risk of ignition from static electricity, wear anti-static protective clothing. For the greatest protection from static discharges, clothing should include anti-static overalls, boots and gloves. Refer to European Standard EN 1149 for further information on material and design requirements and test methods.

#### Other skin protection

: Appropriate footwear and any additional skin protection measures should be selected based on the task being performed and the risks involved and should be approved by a specialist before handling this product.

## Respiratory protection

: Based on the hazard and potential for exposure, select a respirator that meets the appropriate standard or certification. Respirators must be used according to a respiratory protection program to ensure proper fitting, training, and other important aspects of use.

### **Environmental exposure** controls

: Emissions from ventilation or work process equipment should be checked to ensure they comply with the requirements of environmental protection legislation. In some cases, fume scrubbers, filters or engineering modifications to the process equipment will be necessary to reduce emissions to acceptable levels.

# SECTION 9: Physical and chemical properties

The conditions of measurement of all properties are at standard temperature and pressure unless otherwise indicated.

#### 9.1 Information on basic physical and chemical properties

## **Appearance**

**Physical state** : Liquid. Color : White.

Odor : Characteristic. **Odor threshold** : Not available. Melting point/freezing point : Not available. **Boiling point, initial boiling** : 149°C (300.2°F)

point, and boiling range

**Flammability** Not available.

Date of issue/Date of revision : 9-2-2024 Version : 1

**AkzoNobel** Date of previous issue :9-2-2024 9/18

**BRUSH CLEANER & THINNERS** 

## **SECTION 9: Physical and chemical properties**

Lower and upper explosion

limit

Greatest known range: Lower: 1.4% Upper: 7.6% (hydrocarbon, C9-C11, n-

alkane, iso-alkane, cyclic, <2% of aromatics)

Flash point : Closed cup: 35°C (95°F) [Pensky-Martens]

Auto-ignition temperature :

Ingredient name	°C	°F	Method
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	280 to 470	536 to 878	
n-butyl acetate	415	779	EU A.15
cyclohexanone	420	788	

**Decomposition temperature**: Not available.

pH : Not applicable. [DIN EN 1262]

Viscosity : Kinematic (room temperature): 13 mm<sup>2</sup>/s [DIN EN ISO 3219]

Kinematic (40°C): 1 mm<sup>2</sup>/s [DIN EN ISO 3219]

Solubility(ies) :

Media	Result
cold water	Not soluble [OECD (TG 105)]

Partition coefficient: n-octanol/ : Not applicable.

water

Vapor pressure :

	Vapor Pressure at 20°C			V	apor pressu	re at 50°C
Ingredient name	mm Hg	kPa	Method	mm Hg	kPa	Method
n-butyl acetate	11.25	1.5	DIN EN 13016-2			
cyclohexanone	3.75	0.5				
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	0.75 to 2.25	0.1 to 0.3				

Relative density : 0.778

Vapor density : Not available.

**Particle characteristics** 

Median particle size : Not applicable.

Percentage of particles with aerodynamic diameter ≤ 10

μm

: 0

Minimum ignition energy (mJ): Not available.Fundamental burning velocity: Not applicable.SADT: Not available.Heat of combustion: Not available.

**Aerosol product** 

**Type of aerosol**: Not applicable.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 10/18 AkzoNobel

**BRUSH CLEANER & THINNERS** 

## SECTION 10: Stability and reactivity

**10.1 Reactivity** : No specific test data related to reactivity available for this product or its ingredients.

**10.2 Chemical stability** : The product is stable.

10.3 Possibility of hazardous reactions

: Under normal conditions of storage and use, hazardous reactions will not occur.

**10.4 Conditions to avoid** : Avoid all possible sources of ignition (spark or flame). Do not pressurize, cut, weld,

braze, solder, drill, grind or expose containers to heat or sources of ignition.

**10.5 Incompatible materials** : Reactive or incompatible with the following materials:

oxidizing materials

10.6 Hazardous decomposition products

: Under normal conditions of storage and use, hazardous decomposition products

should not be produced.

## SECTION 11: Toxicological information

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

There are no data available on the mixture itself. The mixture has been assessed following the conventional method of the CLP Regulation (EC) No 1272/2008 and is classified for toxicological properties accordingly. See Sections 2 and 3 for details.

#### **Acute toxicity**

Product/ingredient name	Result	Species	Dose	Exposure
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	LC50 Inhalation Vapor	Rat	8500 mg/m³	4 hours
	LD50 Oral	Rat	>6 g/kg	-
cyclohexanone	LC50 Inhalation Gas.	Rat	8000 ppm	4 hours
	LD50 Dermal	Rabbit	1 mL/kg	-
	LD50 Intraperitoneal	Guinea pig	930 mg/kg	-
	LD50 Intraperitoneal	Mouse	1230 mg/kg	-
	LD50 Intraperitoneal	Mouse	1230 mg/kg	-
	LD50 Intraperitoneal	Rabbit	1540 mg/kg	-
	LD50 Intraperitoneal	Rabbit	1540 mg/kg	-
	LD50 Intraperitoneal	Rat	1130 mg/kg	-
	LD50 Intraperitoneal	Rat	1130 mg/kg	-
	LD50 Oral	Rat	1800 mg/kg	-
	LD50 Subcutaneous	Rat	2170 mg/kg	-
n-butyl acetate	LD50 Oral	Rat	10768 mg/kg	-

## Conclusion/Summary

: Not available.

## **Acute toxicity estimates**

Product/ingredient name	Oral (mg/ kg)	Dermal (mg/kg)	Inhalation (gases) (ppm)	Inhalation (vapors) (mg/l)	Inhalation (dusts and mists) (mg/l)
Product as-supplied cyclohexanone	10000	22000	N/A	220	N/A
	500	1100	N/A	11	N/A

## Irritation/Corrosion

Date of issue/Date of revision	: 9-2-2024	Version :1	
Date of previous issue	: 9-2-2024	11/18	AkzoNobel

**BRUSH CLEANER & THINNERS** 

# **SECTION 11: Toxicological information**

Product/ingredient name	Result	Species	Score	Exposure	Observation
cyclohexanone	Eyes - Severe irritant	Rabbit	-	20 mg	-
	Eyes - Severe irritant	Rabbit	-	24 hours 250	-
				ug	
	Skin - Mild irritant	Rabbit	-	500 mg	-
n-butyl acetate	Eyes - Moderate irritant	Rabbit	-	100 mg	-
	Skin - Moderate irritant	Rabbit	-	24 hours 500	-
				mg	

**Conclusion/Summary** 

: Not available.

**Sensitization** 

**Conclusion/Summary**: Not available.

**Mutagenicity** 

Conclusion/Summary : Not available.

**Carcinogenicity** 

**Conclusion/Summary**: Not available.

Reproductive toxicity

**Conclusion/Summary**: Not available.

**Teratogenicity** 

Conclusion/Summary: Not available.

Specific target organ toxicity (single exposure)

Product/ingredient name	Category	Route of exposure	Target organs
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	Category 3	-	Narcotic effects
n-butyl acetate	Category 3	-	Narcotic effects

## Specific target organ toxicity (repeated exposure)

Not available.

#### **Aspiration hazard**

Product/ingredient name	Result
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	ASPIRATION HAZARD - Category 1

Information on the likely

: Not available.

routes of exposure

Potential acute health effects

**Eye contact** : Causes serious eye damage.

**Inhalation** : Can cause central nervous system (CNS) depression. May cause drowsiness or

dizziness.

**Skin contact**: Defatting to the skin. May cause skin dryness and irritation.

ingestion : Can cause central nervous system (CNS) depression. May be fatal if swallowed

and enters airways.

### Symptoms related to the physical, chemical and toxicological characteristics

**Eye contact**: Adverse symptoms may include the following:

pain watering redness

Date of issue/Date of revision : 9-2-2024 Version :1

Date of previous issue :9-2-2024 12/18 AkzoNobel

**BRUSH CLEANER & THINNERS** 

## SECTION 11: Toxicological information

**Inhalation** : Adverse symptoms may include the following:

nausea or vomiting

headache

drowsiness/fatigue dizziness/vertigo unconsciousness

**Skin contact**: Adverse symptoms may include the following:

pain or irritation redness dryness cracking

blistering may occur

**Ingestion**: Adverse symptoms may include the following:

stomach pains nausea or vomiting

## Delayed and immediate effects and also chronic effects from short and long term exposure

**Short term exposure** 

Potential immediate

: Not available.

effects

Potential delayed effects: Not available.

Long term exposure

**Potential immediate** 

: Not available.

effects

Potential delayed effects : Not available.

Potential chronic health effects

Not available.

**Conclusion/Summary**: Not available.

General : Prolonged or repeated contact can defat the skin and lead to irritation, cracking and/

or dermatitis.

Carcinogenicity : No known significant effects or critical hazards.
 Mutagenicity : No known significant effects or critical hazards.
 Reproductive toxicity : No known significant effects or critical hazards.

### 11.2 Information on other hazards

## 11.2.1 Endocrine disrupting properties

Not available.

## 11.2.2 Other information

No additional information.

# **SECTION 12: Ecological information**

### 12.1 Toxicity

There are no data available on the mixture itself.

Do not allow to enter drains or watercourses.

The mixture has been assessed following the summation method of the CLP Regulation (EC) No 1272/2008 and is not classified as hazardous to the environment.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 13/18 AkzoNobel

**BRUSH CLEANER & THINNERS** 

# **SECTION 12: Ecological information**

Product/ingredient name	Result	Species	Exposure
cyclohexanone	Acute EC50 32.9 mg/l Fresh water	Algae - Chlamydomonas reinhardtii - Exponential growth phase	72 hours
	Acute LC50 630000 µg/l Fresh water	Fish - Pimephales promelas	96 hours
	Acute LC50 527000 µg/l Fresh water	Fish - Pimephales promelas	96 hours
	Acute LC50 732000 µg/l Fresh water	Fish - Pimephales promelas	96 hours
n-butyl acetate	Acute LC50 32 mg/l Marine water Acute LC50 62000 μg/l Fresh water	Crustaceans - Artemia salina Fish - Danio rerio	48 hours 96 hours

Conclusion/Summary

: Not available.

#### 12.2 Persistence and degradability

**Conclusion/Summary**: Not available.

#### 12.3 Bioaccumulative potential

Product/ingredient name	LogP <sub>ow</sub>	BCF	Potential
hydrocarbon, C9-C11, n-alkane, iso-alkane, cyclic, <2% of aromatics	-	10 to 2500	high
cyclohexanone n-butyl acetate	0.86 2.3		low low

#### 12.4 Mobility in soil

Soil/water partition

: Not available.

coefficient (Koc)

**Mobility** 

: Not available.

#### 12.5 Results of PBT and vPvB assessment

This mixture does not contain any substances that are assessed to be a PBT or a vPvB.

## 12.6 Endocrine disrupting properties

Not available.

#### 12.7 Other adverse effects

No known significant effects or critical hazards.

## **SECTION 13: Disposal considerations**

The information in this section contains generic advice and guidance. The list of Identified Uses in Section 1 should be consulted for any available use-specific information provided in the Exposure Scenario(s).

## 13.1 Waste treatment methods

#### **Product**

Methods of disposal

: The generation of waste should be avoided or minimized wherever possible. Disposal of this product, solutions and any by-products should at all times comply with the requirements of environmental protection and waste disposal legislation and any regional local authority requirements. Dispose of surplus and non-recyclable products via a licensed waste disposal contractor. Waste should not be disposed of untreated to the sewer unless fully compliant with the requirements of all authorities with jurisdiction.

**Hazardous waste** 

: The classification of the product may meet the criteria for a hazardous waste.

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-202414/18AkzoNobel

**BRUSH CLEANER & THINNERS** 

## SECTION 13: Disposal considerations

**Disposal considerations** 

Do not allow to enter drains or watercourses.

Dispose of according to all federal, state and local applicable regulations.

If this product is mixed with other wastes, the original waste product code may no

longer apply and the appropriate code should be assigned. For further information, contact your local waste authority.

#### European waste catalogue (EWC)

The European Waste Catalogue classification of this product, when disposed of as waste, is:

Waste code	Waste designation
EWC 08 01 99	wastes not otherwise specified

#### **Packaging**

Methods of disposal

: The generation of waste should be avoided or minimized wherever possible. Waste packaging should be recycled. Incineration or landfill should only be considered when recycling is not feasible.

**Disposal considerations** 

: Using information provided in this safety data sheet, advice should be obtained from

the relevant waste authority on the classification of empty containers.

Empty containers must be scrapped or reconditioned.

Dispose of containers contaminated by the product in accordance with local or

national legal provisions.

Special precautions

: This material and its container must be disposed of in a safe way. Care should be taken when handling emptied containers that have not been cleaned or rinsed out. Empty containers or liners may retain some product residues. Vapor from product residues may create a highly flammable or explosive atmosphere inside the container. Do not cut, weld or grind used containers unless they have been cleaned thoroughly internally. Avoid dispersal of spilled material and runoff and contact with soil, waterways, drains and sewers.

# **SECTION 14: Transport information**

	ADR/RID	IMDG
14.1 UN number or ID number	UN1263	UN1263
14.2 UN proper shipping name	PAINT RELATED MATERIAL	PAINT RELATED MATERIAL
14.3 Transport hazard class(es)	3	3
14.4 Packing group	III	III
14.5 Environmental hazards	No.	No.

## **Additional information**

ADR/RID : Tunnel code (D/E)

**IMDG** : **Emergency schedules** F-E, \_S-E\_

user

14.6 Special precautions for : Transport within user's premises: always transport in closed containers that are upright and secure. Ensure that persons transporting the product know what to do in

the event of an accident or spillage.

Date of issue/Date of revision : 9-2-2024 Version : 1 **AkzoNobel** Date of previous issue :9-2-2024 15/18

**BRUSH CLEANER & THINNERS** 

# **SECTION 14: Transport information**

14.7 Transport in bulk according to IMO

: Not applicable.

instruments

## **SECTION 15: Regulatory information**

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

## UK (GB) /REACH

### Annex XIV - List of substances subject to authorization

#### **Annex XIV**

None of the components are listed.

## Substances of very high concern

None of the components are listed.

Annex XVII - Restrictions : Not applicable.

on the manufacture. placing on the market and use of certain dangerous substances,

mixtures and articles **Other EU regulations** 

VOC

: The provisions of Directive 2004/42/EC on VOC apply to this product. Refer to the

product label and/or technical data sheet for further information.

VOC for Ready-for-Use

**Mixture** 

: Not available.

**Industrial emissions** (integrated pollution

prevention and control) -

: Not listed

: Not listed

Air

**Industrial emissions** 

(integrated pollution prevention and control) -

Water

## Ozone depleting substances (1005/2009/EU)

Not listed.

## Prior Informed Consent (PIC) (649/2012/EU)

Not listed.

### **Persistent Organic Pollutants**

Not listed.

#### **Seveso Directive**

This product is controlled under the Seveso Directive.

## **Danger criteria**

## Category

P5c

## **International regulations**

## Chemical Weapon Convention List Schedules I, II & III Chemicals

Not listed.

## **Montreal Protocol**

Not listed.

Date of issue/Date of revision : 9-2-2024 Version : 1

**AkzoNobel** Date of previous issue :9-2-2024 16/18

**BRUSH CLEANER & THINNERS** 

## **SECTION 15: Regulatory information**

## Stockholm Convention on Persistent Organic Pollutants

Not listed.

### Rotterdam Convention on Prior Informed Consent (PIC)

Not listed.

## **UNECE Aarhus Protocol on POPs and Heavy Metals**

Not listed.

15.2 Chemical Safety

**Assessment** 

: No Chemical Safety Assessment has been carried out.

# **SECTION 16: Other information**

Indicates information that has changed from previously issued version.

Abbreviations and

acronyms

: ATE = Acute Toxicity Estimate

CLP = Classification, Labelling and Packaging Regulation [Regulation (EC) No.

1272/2008]

DMEL = Derived Minimal Effect Level DNEL = Derived No Effect Level

EUH statement = CLP-specific Hazard statement

N/A = Not available

PBT = Persistent, Bioaccumulative and Toxic PNEC = Predicted No Effect Concentration RRN = REACH Registration Number

SGG = Segregation Group

vPvB = Very Persistent and Very Bioaccumulative

## Procedure used to derive the classification according to Regulation (EC) No. 1272/2008 [CLP/GHS]

Classification	Justification
Flam. Liq. 3, H226	On basis of test data
Eye Dam. 1, H318	Calculation method
STOT SE 3, H336	Calculation method
Asp. Tox. 1, H304	Calculation method

#### Full text of abbreviated H statements

H226	Flammable liquid and vapor.
H302	Harmful if swallowed.
H304	May be fatal if swallowed and enters airways.
H312	Harmful in contact with skin.
H315	Causes skin irritation.
H318	Causes serious eye damage.
H332	Harmful if inhaled.
H336	May cause drowsiness or dizziness.
EUH066	Repeated exposure may cause skin dryness or cracking.

### Full text of classifications [CLP/GHS]

Acute Tox. 4	ACUTE TOXICITY - Category 4
Asp. Tox. 1	ASPIRATION HAZARD - Category 1
Eye Dam. 1	SERIOUS EYE DAMAGE/ EYE IRRITATION - Category 1
Flam. Liq. 3	FLAMMABLE LIQUIDS - Category 3
Skin Irrit. 2	SKIN CORROSION/IRRITATION - Category 2
STOT SE 3	SPECIFIC TARGET ORGAN TOXICITY (SINGLE EXPOSURE) -
	Category 3

Date of printing : 16-12-2024 Date of issue/ Date of : 9-2-2024

revision

Date of issue/Date of revision: 9-2-2024Version: 1Date of previous issue: 9-2-202417/18AkzoNobel

**BRUSH CLEANER & THINNERS** 

## **SECTION 16: Other information**

Date of previous issue : 9-2-2024

Version : 1

**Unique ID** : D2A5A60AAB0B1EDEB1E6D14BF0E01211

#### **Notice to reader**

IMPORTANT NOTE: The information in this data sheet is not intended to be exhaustive and is based on the present state of our knowledge and on current laws: any person using the product for any purpose other than that specifically recommended in the technical data sheet without first obtaining written confirmation from us as to the suitability of the product for the intended purpose does so at his own risk. It is always the responsibility of the user to take all necessary steps to fulfill the demands set out in the local rules and legislation. Always read the Material Data Sheet and the Technical Data Sheet for this product if available. All advice we give or any statement made about the product by us (whether in this data sheet or otherwise) is correct to the best of our knowledge but we have no control over the quality or the condition of the substrate or the many factors affecting the use and application of the product. Therefore, unless we specifically agree in writing otherwise, we do not accept any liability whatsoever for the performance of the product or for any loss or damage arising out of the use of the product. All products supplied and technical advice given are subject to our standard terms and conditions of sale. You should request a copy of this document and review it carefully. The information contained in this data sheet is subject to modification from time to time in the light of experience and our policy of continuous development. It is the user's responsibility to verify that this data sheet is current prior to using the product.

Brand names mentioned in this data sheet are trademarks of or are licensed to Akzo Nobel.

Date of issue/Date of revision : 9-2-2024 Version : 1

Date of previous issue : 9-2-2024 18/18 AkzoNobel