



Safety Data Sheet according to (EC) No 1907/2006

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MM01921 Tinner Cleaner

sds no. : 181481

V006.0

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

1.1. Product identifier

MM01921 Tinner Cleaner

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

Intended use:

Tip Tinner/Cleaner

1.3. Details of the supplier of the safety data sheet

Henkel AG & Co. KGaA

Henkelstr. 67

40191 Düsseldorf

Germany

Phone: +49 (211) 797-0

ua-productsafety.uk@uk.henkel.com

1.4. Emergency telephone number

24 Hours Emergency Tel: +44 (0)1442 278497

SECTION 2: Hazards identification

2.1. Classification of the substance or mixture

Classification (DPD):

No classification required.

2.2. Label elements

Label elements (DPD):

The product is not subject to classification according to the calculation methods of the "General Classification Guideline for Preparations of the EC" as issued in the last version.

Avoid breathing fumes given out during soldering.

Flux fumes may irritate the nose, throat and lungs and may after prolonged/repeated exposure give an allergic reaction (asthma).

After handling solder wash hands with soap and water before eating, drinking or smoking.

Keep out of reach of children.

Additional labeling:

Safety data sheet available for professional user on request.

2.3. Other hazards

Fumes evolved at soldering temperatures will irritate the nose, throat and lungs.

SECTION 3: Composition/information on ingredients

Declaration of the ingredients according to CLP (EC) No 1272/2008:

Hazardous components CAS-No.	EC Number REACH-Reg No.	content	Classification
Tin 7440-31-5	231-141-8 01-2119486474-28	40- 50 %	
Citric acid 77-92-9	201-069-1 01-2119457026-42	5- 10 %	Serious eye irritation 2 H319
Silver 7440-22-4	231-131-3	1- 5 %	
Copper 7440-50-8	231-159-6	0,1- 1 %	Serious eye irritation 2 H319 Specific target organ toxicity - single exposure 3 H335 Skin irritation 2 H315 Acute toxicity 3; Oral H302 Chronic hazards to the aquatic environment 3 H412 Acute toxicity 4; Oral H302 Skin irritation 2; Dermal H315 Serious eye irritation 2 H319 Specific target organ toxicity - single exposure 3; Inhalation H335 Chronic hazards to the aquatic environment 3 H412

For full text of the H - statements and other abbreviations see section 16 "Other information".
Substances without classification may have community workplace exposure limits available.

Declaration of ingredients according to DPD (EC) No 1999/45:

Hazardous components CAS-No.	EC Number REACH-Reg No.	content	Classification
Tin 7440-31-5	231-141-8 01-2119486474-28	40 - 50 %	
Citric acid 77-92-9	201-069-1 01-2119457026-42	5 - 10 %	Xi - Irritant; R36
Silver 7440-22-4	231-131-3	1 - 5 %	
Copper 7440-50-8	231-159-6	0,1 - 1 %	R52/53 Xn - Harmful; R22 Xi - Irritant; R36/37/38

For full text of the R-Phrases indicated by codes see section 16 'Other Information'.
Substances without classification may have community workplace exposure limits available.

SECTION 4: First aid measures**4.1. Description of first aid measures****Inhalation:**

Move to fresh air. If symptoms persist, seek medical advice.

Skin contact:

Rinse with running water and soap.
Obtain medical attention if irritation persists.

Eye contact:

Rinse immediately with plenty of water, also under the eyelids, for at least 15 minutes.
Seek medical advice.

Ingestion:

Do not induce vomiting.
Seek medical advice.

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

Prolonged or repeated skin contact with silver and its salts may cause a blue-gray discoloration of the skin and mucous membranes that is irreversible (Argyria).

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

See section: Description of first aid measures

SECTION 5: Firefighting measures

5.1. Extinguishing media

Suitable extinguishing media:

carbon dioxide, foam, powder, water spray jet, fine water spray

Extinguishing media which must not be used for safety reasons:

High pressure waterjet

5.2. Special hazards arising from the substance or mixture

High temperatures may produce heavy metal dust, fumes or vapours.

5.3. Advice for firefighters

Wear self-contained breathing apparatus.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Wear protective equipment.

6.2. Environmental precautions

Do not let product enter drains.

6.3. Methods and material for containment and cleaning up

Scrape up spilled material and place in a closed container for disposal.

6.4. Reference to other sections

See advice in chapter 8

SECTION 7: Handling and storage

7.1. Precautions for safe handling

Use only in well-ventilated areas.
Avoid skin and eye contact.

Hygiene measures:

Wash hands before work breaks and after finishing work.
Do not eat, drink or smoke while working.

7.2. Conditions for safe storage, including any incompatibilities

Store in a cool place in closed original container.

7.3. Specific end use(s)

Tip Tinner/Cleaner

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Valid for
Great Britain

Ingredient	ppm	mg/m ³	Type	Category	Remarks
TIN (INORGANIC COMPOUNDS AS SN) 7440-31-5		2	Time Weighted Average (TWA):	Indicative	ECTLV
SILVER (METALLIC) 7440-22-4		0,1	Time Weighted Average (TWA):		EH40 WEL
SILVER, METALLIC 7440-22-4		0,1	Time Weighted Average (TWA):	Indicative	ECTLV
COPPER, INHALABLE DUSTS AND MISTS (AS CU) 7440-50-8		2	Short Term Exposure Limit (STEL):		EH40 WEL
COPPER, FUME 7440-50-8		0,2	Time Weighted Average (TWA):		EH40 WEL
COPPER, INHALABLE DUSTS AND MISTS (AS CU) 7440-50-8		1	Time Weighted Average (TWA):		EH40 WEL

Predicted No-Effect Concentration (PNEC):

Name on list	Environmental Compartment	Exposure period	Value				Remarks
			mg/l	ppm	mg/kg	others	
Citric acid 77-92-9	aqua (freshwater)					0,44 mg/L	
Citric acid 77-92-9	aqua (marine water)					0,44 mg/L	
Citric acid 77-92-9	STP					1000 mg/L	
Citric acid 77-92-9	sediment (freshwater)					34,6 mg/kg	
Citric acid 77-92-9	sediment (marine water)					3,46 mg/kg	
Citric acid 77-92-9	soil					33,1 mg/kg	

8.2. Exposure controls:

Respiratory protection:

In case of insufficient ventilation, wear suitable respiratory equipment.

Hand protection:

Chemical-resistant protective gloves (EN 374).

Suitable materials for short-term contact or splashes (recommended: at least protection index 2, corresponding to > 30 minutes permeation time as per EN 374):

nitrile rubber (NBR; ≥ 0.4 mm thickness)

Suitable materials for longer, direct contact (recommended: protection index 6, corresponding to > 480 minutes permeation time as per EN 374):

nitrile rubber (NBR; ≥ 0.4 mm thickness)

This information is based on literature references and on information provided by glove manufacturers, or is derived by analogy with similar substances. Please note that in practice the working life of chemical-resistant protective gloves may be considerably shorter than the permeation time determined in accordance with EN 374 as a result of the many influencing factors (e.g. temperature). If signs of wear and tear are noticed then the gloves should be replaced.

Eye protection:

Wear protective glasses.

Skin protection:

Suitable protective clothing

SECTION 9: Physical and chemical properties**9.1. Information on basic physical and chemical properties**

Appearance	paste grey
Odor	mild
pH	not applicable
Initial boiling point	Not determined
Flash point	None
Decomposition temperature	No data available / Not applicable
Vapour pressure	Not determined
Vapour pressure	Not determined
Density	3,5 g/cm ³
()	
Bulk density	No data available / Not applicable
Viscosity	No data available / Not applicable
Viscosity (kinematic)	No data available / Not applicable
Explosive properties	No data available / Not applicable
Solubility (qualitative)	Insoluble
(Solvent: Water)	
Solidification temperature	No data available / Not applicable
Melting point	217 °C (422.6 °F)
Flammability	No data available / Not applicable
Auto-ignition temperature	No data available / Not applicable
Explosive limits	No data available / Not applicable
Partition coefficient: n-octanol/water	No data available / Not applicable
Evaporation rate	No data available / Not applicable
Vapor density	No data available / Not applicable
Oxidising properties	No data available / Not applicable

9.2. Other information

No data available / Not applicable

SECTION 10: Stability and reactivity**10.1. Reactivity**

Solder alloy will react with concentrated nitric acid to produce toxic fumes of nitrogen oxides.

10.2. Chemical stability

Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

See section reactivity

10.4. Conditions to avoid

None if used for intended purpose.

10.5. Incompatible materials

None if used properly.

10.6. Hazardous decomposition products

Thermal decomposition can lead to release of irritating gases and vapors.

SECTION 11: Toxicological information**11.1. Information on toxicological effects****General toxicological information:**

The preparation is classified based on the conventional method outlined in Article 6(1)(a) of Directive 1999/45/EC. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.

Oral toxicity:

May cause irritation to the digestive tract.

Inhalative toxicity:

Fumes evolved at soldering temperatures will irritate the nose, throat and lungs.

Skin irritation:

Prolonged or repeated contact may cause skin irritation.

Eye irritation:

Prolonged or repeated contact may cause eye irritation.
Fumes emitted during soldering may irritate the eyes.

Acute toxicity:

Hazardous components CAS-No.	Value type	Value	Route of application	Exposure time	Species	Method
Citric acid 77-92-9	LD50	4.500 mg/kg	oral		mouse	
Silver 7440-22-4	LD50	> 2.000 mg/kg	oral		rat	OECD Guideline 401 (Acute Oral Toxicity)

Skin corrosion/irritation:

Hazardous components CAS-No.	Result	Exposure time	Species	Method
Citric acid 77-92-9	slightly irritating		rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)
Silver 7440-22-4	slightly irritating		rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)
Copper 7440-50-8	irritating			

Serious eye damage/irritation:

Hazardous components CAS-No.	Result	Exposure time	Species	Method
Citric acid 77-92-9	highly irritating		rabbit	OECD Guideline 405 (Acute Eye Irritation / Corrosion)
Silver 7440-22-4	slightly irritating		rabbit	OECD Guideline 405 (Acute Eye Irritation / Corrosion)
Copper 7440-50-8	irritating			

Germ cell mutagenicity:

Hazardous components CAS-No.	Result	Type of study / Route of administration	Metabolic activation / Exposure time	Species	Method
Citric acid 77-92-9	negative	bacterial reverse mutation assay (e.g Ames test)	with and without		

SECTION 12: Ecological information

General ecological information:

The preparation is classified based on the conventional method outlined in Article 6(1)(a) of Directive 1999/45/EC. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.

Ecotoxicity:

Do not empty into drains / surface water / ground water.

Mobility:

The product is insoluble and sinks in water.

Persistence and Biodegradability:

The product is not biodegradable.

Bioaccumulative potential:

No data available.

12.1. Toxicity

Hazardous components CAS-No.	Value type	Value	Acute Toxicity Study	Exposure time	Species	Method
Citric acid 77-92-9	LC50	> 250 mg/l	Fish	48 h	Leuciscus idus	OECD Guideline 201 (Alga, Growth Inhibition Test) OECD Guideline 203 (Fish, Acute Toxicity Test)
Citric acid 77-92-9	EC50	275 mg/l	Daphnia	24 h	Daphnia magna	
Citric acid 77-92-9	EC50	> 640 mg/l	Algae	7 d	Scenedesmus quadricauda	
Copper 7440-50-8	LC50	> 10 mg/l	Fish	96 h	Lepomis macrochirus	

12.2. Persistence and degradability

Hazardous components CAS-No.	Result	Route of application	Degradability	Method
Citric acid 77-92-9	readily biodegradable	aerobic	79 %	EU Method C.4-E (Determination of the "Ready" Biodegradability Closed Bottle Test)

12.3. Bioaccumulative potential / 12.4. Mobility in soil

Hazardous components CAS-No.	LogKow	Bioconcentration factor (BCF)	Exposure time	Species	Temperature	Method
Citric acid 77-92-9	-1,72				20 °C	EU Method A.8 (Partition Coefficient)

SECTION 13: Disposal considerations**13.1. Waste treatment methods**

Product disposal:

Wherever possible unwanted solder alloy should be recycled for recovery of metal.

Disposal of uncleaned packages:

Dispose of as unused product.

Waste code

06 04 05 - wastes containing other heavy metals

SECTION 14: Transport information**General information:**

Not hazardous according to RID, ADR, ADNR, IMDG, IATA-DGR.

SECTION 15: Regulatory information**15.1. Safety, health and environmental regulations/legislation specific for the substance or mixture**VOC content < 3,00 %
(1999/13/EC)**National regulations/information (Great Britain):**

Remarks

The Health & Safety at Work Act 1974.
The Control of Substances Hazardous to Health Regulations. L5:General
Approved Code of Practice to the COSHH Regulations. HS(G)97:A Step by Step
Guide to the COSHH Regulations. HS(G)193: COSHH essentials: Easy steps to
control chemicals.

SECTION 16: Other information

The labelling of the product is indicated in Section 2. The full text
of all abbreviations indicated by codes in this safety data sheet are as follows:

R22 Harmful if swallowed.

R36 Irritating to eyes.

R36/37/38 Irritating to eyes, respiratory system and skin.

R52/53 Harmful to aquatic organisms, may cause long-term adverse effects in the aquatic environment.

H302 Harmful if swallowed.

H315 Causes skin irritation.

H319 Causes serious eye irritation.

H335 May cause respiratory irritation.

H412 Harmful to aquatic life with long lasting effects.

Further information:

This information is based on our current level of knowledge and relates to the product in the state in which it is delivered. It is intended to describe our products from the point of view of safety requirements and is not intended to guarantee any particular properties.

This safety data sheet was prepared in accordance with Council Directive 67/548/EEC and its subsequent amendments, and Commission Directive 1999/45/EC.