

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

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SDS No.: 175644

V005.0

Revision: 21.09.2017 printing date: 30.04.2018

Replaces version from: 06.02.2017

LOCTITE MP 100 SN62AGS90 F known as SN62 MP100 AGS90 500G/JL

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

1.1. Product identifier

LOCTITE MP 100 SN62AGS90 F known as SN62 MP100 AGS90 500G/JL

Contains:

Lead

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

Intended use: Solder Paste

1.3. Details of the supplier of the safety data sheet

Henkel Ltd Wood Lane End

HP2 4RQ Hemel Hempstead

Great Britain

Phone: +44 1442 278000 +44 1442 278071 Fax-no.:

ua-productsafety.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 (CLP):

Toxic to reproduction Category 1A

H360FD May damage fertility. May damage the unborn child.

Effects on or via lactation

H362 May cause harm to breast-fed children.

Specific target organ toxicity - repeated exposure

Category 1

H372 Causes damage to organs (Blood, Kidney, Central Nervous system) through prolonged or repeated exposure (inhalation-dust, oral)

Acute hazards to the aquatic environment

Category 1

H400 Very toxic to aquatic life.

Category 1

Chronic hazards to the aquatic environment

H410 Very toxic to aquatic life with long lasting effect

2.2. Label elements

Label elements (CLP):

2000/01



Signal word: Danger

Hazard statement: H360FD May damage fertility. May damage the unborn child.

H362 May cause harm to breast-fed children.

H372 Causes damage to organs (Blood, Kidney, Central Nervous system) through

prolonged or repeated exposure (inhalation-dust, oral) H410 Very toxic to aquatic life with long lasting effects.

Supplemental information Restricted to professional users.

Precautionary statement: P201 Obtain special instructions before use.

Prevention P261 Avoid breathing fume.

P263 Avoid contact during pregnancy and while nursing.

P273 Avoid release to the environment.

P280 Wear protective gloves/protective clothing.

Precautionary statement: P308+P313 IF exposed or concerned: Get medical advice/attention.

Response

2.3. Other hazards

This product contains modified rosin.

Contains lead which may harm your health. Lead can cause birth defects and other reproductive harm.

Regulations forbid the use of lead solder in any private or public drinking water supply system.

Do not heat above 500 °C

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.

Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very Bioaccumulative (vPvB) criteria.

SECTION 3: Composition/information on ingredients

3.2. Mixtures

500G/JL

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

Hazardous components CAS-No.	EC Number	content	Classification
Tin 7440-31-5	231-141-8 01-2119486474-28	50- 100 %	
Lead 7439-92-1	231-100-4 01-2119510714-47	20- 40 %	Lact. H362 Repr. 1A H360FD STOT RE 1; Oral H372 STOT RE 1; Inhalation - dust H372 Aquatic Acute 1 H400 Aquatic Chronic 1 H410
Modified rosin 144413-22-9	434-230-1, 434- 230-1 01-2120117087-62	1-< 5 %	Aquatic Chronic 4 H413
Silver >= 99,9 % Ag in powder (>100nm<1mm) 7440-22-4	231-131-3 01-2119555669-21	1-< 5%	Aquatic Acute 1 H400 Aquatic Chronic 1 H410 M factor (Acute Aquat Tox): 10 M factor (Chron Aquat Tox): 10

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.

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 running water (for 10 minutes), seek medical attention from a specialist.

Ingestion:

Rinse mouth, drink 1-2 glasses of water, do not induce vomiting, consult a doctor.

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

Chronic overexposure to lead may result in damage to the blood forming, nervous, urinary and reproductive systems. Severe lead toxicity will cause sterility, abortion and neonatal mortality and morbidity.

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).

INGESTION: Nausea, vomiting, diarrhea, abdominal pain.

RESPIRATORY: Irritation, coughing, shortness of breath, chest tightness.

Prolonged or repeated contact may cause skin irritation.

Prolonged or repeated contact may cause eye irritation.

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:

water, carbon dioxide, foam, powder

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 and full protective clothing, such as turn-out gear.

Additional information:

In case of fire, keep containers cool with water spray.

SECTION 6: Accidental release measures

6.1. Personal precautions, protective equipment and emergency procedures

Avoid contact with skin and eyes.

Wear protective equipment.

Ensure adequate ventilation.

6.2. Environmental precautions

Do not let product enter drains.

Do not allow to enter the ground / soil.

6.3. Methods and material for containment and cleaning up

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

Dispose of contaminated material as waste according to Section 13.

6.4. Reference to other sections

See advice in section 8

SECTION 7: Handling and storage

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7.1. Precautions for safe handling

Avoid skin and eye contact.

See advice in section 8

Do not heat above 500 $^{\circ}\mathrm{C}$

Extraction is necessary to remove fumes evolved during reflow.

When using do not eat, drink or smoke.

Wash hands before breaks and immediately after handling the product.

Avoid breathing fumes given out during soldering.

Hygiene measures:

Good industrial hygiene practices should be observed.

Do not eat, drink or smoke while working.

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

7.2. Conditions for safe storage, including any incompatibilities

Ensure good ventilation/extraction.

Refer to Technical Data Sheet

7.3. Specific end use(s)

Solder Paste

500G/JL

SECTION 8: Exposure controls/personal protection

8.1. Control parameters

Occupational Exposure Limits

Valid for

Great Britain

Ingredient [Regulated substance]	ppm	mg/m ³	Value type	Short term exposure limit category / Remarks	Regulatory list
Lead 7439-92-1 [LEAD AND LEAD COMPOUNDS, OTHER THAN LEAD ALKYLS (AS PB)]		0,15	Time Weighted Average (TWA):	lategory / Kenarks	EH40 WEL
Lead 7439-92-1 [INORGANIC LEAD AND ITS COMPOUNDS]		0,15	Time Weighted Average (TWA):		EU_OEL
Lead 7439-92-1 [LEAD AND ITS IONIC COMPOUNDS]			Biological Limit Value:		EU_OEL_II
Silver 7440-22-4 [SILVER (METALLIC)]		0,1	Time Weighted Average (TWA):		EH40 WEL
Silver 7440-22-4 [SILVER, METALLIC]		0,1	Time Weighted Average (TWA):	Indicative	ECTLV

Occupational Exposure Limits

Valid for

Ireland

Ingredient [Regulated substance]	ppm	mg/m ³	Value type	Short term exposure limit category / Remarks	Regulatory list
Tin 7440-31-5 [TIN, METAL (AS SN)]		2	Time Weighted Average (TWA):	Indicative OELV	IR_OEL
Fin 7440-31-5 (TIN (INORGANIC COMPOUNDS AS SN)]		2	Time Weighted Average (TWA):	Indicative	ECTLV
Lead 7439-92-1 [LEAD AND ITS COMPOUNDS (EXCEPT TETRAETHYL LEAD)]		0,15	Time Weighted Average (TWA):	Binding OELV	IR_OEL
Lead 7439-92-1 INORGANIC LEAD AND ITS COMPOUNDS]		0,15	Time Weighted Average (TWA):		EU_OEL
Lead 7439-92-1 [LEAD AND ITS IONIC COMPOUNDS]			Biological Limit Value:		EU_OEL_II
Silver 7440-22-4 [SILVER (METALLIC)]		0,1	Time Weighted Average (TWA):	Indicative OELV	IR_OEL
Silver 7440-22-4 [SILVER, METALLIC]		0,1	Time Weighted Average (TWA):	Indicative	ECTLV

Predicted No-Effect Concentration (PNEC):

Name on list	Environmental Compartment	Exposure period	Value				Remarks
	Compar timent	periou	mg/l	ppm	mg/kg	others	
Tin	aqua		3		3 3		
7440-31-5	(freshwater)						
Tin	aqua (marine						
7440-31-5	water)						
Tin	sewage						
7440-31-5	treatment plant						
	(STP)						
Tin	sediment						
7440-31-5 Tin	(freshwater) sediment		+				
7440-31-5	(marine water)						
7440-31-3 Tin			+				
7440-31-5	Air						
Tin	soil					-	
7440-31-5	3011						
Tin	Predator						
7440-31-5	redutor						
Lead	aqua		6,5 μg/l				
7439-92-1	(freshwater)		1.0				
Lead	aqua (marine		3,4 µg/l				
7439-92-1	water)		1				
Lead	sediment				41 mg/kg		
7439-92-1	(freshwater)						
Lead	sediment				164 mg/kg		
7439-92-1	(marine water)						
Lead	soil				147 mg/kg		
7439-92-1			1 0				
Lead	sewage		1 mg/l				
7439-92-1	treatment plant (STP)						
Silver >= 99,9 % Ag as powder	aqua		0,00004				
(>100nm<1mm) classified for environment	(freshwater)		mg/l				
7440-22-4	(======)		8				
Silver >= 99,9 % Ag as powder	aqua (marine		0,00086				
(>100nm<1mm) classified for environment	water)		mg/l				
7440-22-4							
Silver >= 99,9 % Ag as powder	sewage		0,025 mg/l				
(>100nm<1mm) classified for environment	treatment plant						
7440-22-4	(STP)				100.10		
Silver >= 99,9 % Ag as powder	sediment				438,13		
(>100nm<1mm) classified for environment	(freshwater)				mg/kg		
7440-22-4 Silver >= 99,9 % Ag as powder	sediment		1		438,13		
(>100nm<1mm) classified for environment					mg/kg]	
7440-22-4	(marine water)				IIIS/ Ng]	
Silver >= 99,9 % Ag as powder	Air		1		1	1	
(>100nm<1mm) classified for environment							
7440-22-4]	
Silver >= 99,9 % Ag as powder	soil				1,41 mg/kg		
(>100nm<1mm) classified for environment							
7440-22-4						1	

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Derived No-Effect Level (DNEL):

Name on list	Application Area	Route of Exposure	Health Effect	Exposure Time	Value	Remarks
Tin 7440-31-5	General population	dermal	Long term exposure - systemic effects		80 mg/kg	
Tin 7440-31-5	Workers	inhalation	Long term exposure - systemic effects		71 mg/m3	
Tin 7440-31-5	Workers	dermal	Long term exposure - systemic effects		10 mg/kg	
Tin 7440-31-5	General population	inhalation	Long term exposure - systemic effects		17 mg/m3	
Tin 7440-31-5	General population	oral	Long term exposure - systemic effects		5 mg/kg	
Silver >= 99,9 % Ag as powder (>100nm<1mm) classified for environment 7440-22-4	Workers	inhalation	Long term exposure - systemic effects		0,1 mg/m3	
Silver >= 99,9 % Ag as powder (>100nm<1mm) classified for environment 7440-22-4	General population	inhalation	Long term exposure - systemic effects		0,04 mg/m3	
Silver >= 99,9 % Ag as powder (>100nm<1mm) classified for environment 7440-22-4	General population	oral	Long term exposure - systemic effects		1,2 mg/kg	

Biological Exposure Indices:

Ingredient [Regulated substance]	Parameters	Biological specimen	Sampling time	 Basis of biol. exposure index	 Additional Information
Lead 7439-92-1 [LEAD AND ITS IONIC COMPOUNDS]	Lead	Blood		EU HCA2	

Ingredient [Regulated substance]	Parameters	Biological specimen	Sampling time	Conc.	Basis of biol. exposure index	 Additional Information
Lead	Lead	Blood			EU HCA2	
7439-92-1						
[LEAD AND ITS IONIC						
COMPOUNDS]						

8.2. Exposure controls:

Engineering controls:

Ensure adequate ventilation, especially in confined areas.

Extraction is necessary to remove fumes evolved during reflow.

Respiratory protection:

Ensure adequate ventilation.

An approved mask or respirator fitted with an organic vapour cartridge should be worn if the product is used in a poorly ventilated area

Filter type: A (EN 14387)

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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:

Safety glasses with sideshields or chemical safety goggles should be worn if there is a risk of splashing. Protective eye equipment should conform to EN166.

Skin protection:

Wear suitable protective clothing.

Protective clothing should conform to EN 14605 for liquid splashes or to EN 13982 for dusts.

Advices to personal protection equipment:

The information provided on personal protective equipment is for guidance purposes only. A full risk assessment should be conducted prior to using this product to determine the appropriate personal protective equipment to suit local conditions. Personal protective equipment should conform to the relevant EN standard.

SECTION 9: Physical and chemical properties

9.1. Information on basic physical and chemical properties

Appearance paste grey

Odor mild

Odour threshold No data available / Not applicable

pH Not applicable Melting point $179.0 \,^{\circ}\text{C} \, (354.2 \,^{\circ}\text{F})$

Solidification temperature No data available / Not applicable

Initial boiling point

Not determined
Flash point

124 °C (255.2 °F)

Evaporation rate

No data available / Not applicable
Flammability

No data available / Not applicable
Explosive limits

No data available / Not applicable

Vapour pressure Not determined Relative vapour density: Heavier than air Density 4,8600 g/cm3

()
Bulk density
No data available / Not applicable
Solubility
No data available / Not applicable

Solubility (qualitative)

Partition coefficient: n-octanol/water

Auto-ignition temperature

Insoluble

Not determined

186 °C (366.8 °F)

Decomposition temperature

Viscosity

No data available / Not applicable

No data available / Not applicable

Viscosity (kinematic)

No data available / Not applicable

Explosive properties

No data available / Not applicable

Oxidising properties

No data available / Not applicable

9.2. Other information

No data available / Not applicable

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SECTION 10: Stability and reactivity

10.1. Reactivity

Reacts with strong oxidants.

10.2. Chemical stability

Stable under recommended storage conditions.

10.3. Possibility of hazardous reactions

See section reactivity

10.4. Conditions to avoid

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

10.5. Incompatible materials

See section reactivity.

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 mixture is classified based on the available hazard information for the ingredients as defined in the classification criteria for mixtures for each hazard class or differentiation in Annex I to Regulation (EC) No 1272/2008. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.

STOT-repeated exposure:

Causes damage to organs (Blood, Kidney, Central Nervous system) through prolonged or repeated exposure (inhalation-dust, oral)

Inhalative toxicity:

Fumes evolved at soldering temperatures will irritate the nose, throat and lungs. Prolonged or repeated exposure to flux fumes may result in sensitisation in sensitive workers.

Dermal toxicity:

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).

Skin irritation:

Prolonged or repeated contact may cause skin irritation.

Eye irritation:

Solder pastes may be abrasive to the eyes and the fumes are irritating.

Prolonged or repeated contact may cause eye irritation.

Reproductive toxicity:

May damage fertility. May damage the unborn child.

May cause harm to breast-fed children.

Other remarks:

Chronic overexposure to lead may result in damage to the blood forming, nervous, urinary and reproductive systems. Severe lead toxicity will cause sterility, abortion and neonatal mortality and morbidity.

Acute oral toxicity:

Hazardous components	Value	Value	Route of	Exposure	Species	Method
CAS-No.	type		application	time		
Tin	LD50	> 2.000 mg/kg	oral		rat	OECD Guideline 423 (Acute
7440-31-5						Oral toxicity)
Modified rosin	LD50	> 2.000 mg/kg	oral		rat	OECD Guideline 423 (Acute
144413-22-9						Oral toxicity)
Silver >= 99,9 % Ag in	LD50	> 2.000 mg/kg	oral		rat	OECD Guideline 401 (Acute
powder (>100nm<1mm)						Oral Toxicity)
7440-22-4						,

Acute inhalative toxicity:

Hazardous components	Value	Value	Route of	Exposure	Species	Method
CAS-No.	type		application	time		

Acute dermal toxicity:

Hazardous components	Value	Value	Route of	Exposure	Species	Method
CAS-No.	type		application	time		
Tin	LD50	> 2.000 mg/kg	dermal		rat	OECD Guideline 402 (Acute
7440-31-5						Dermal Toxicity)
Modified rosin	LD50	> 2.000 mg/kg	dermal		rat	OECD Guideline 402 (Acute
144413-22-9						Dermal Toxicity)
Silver >= 99,9 % Ag in	LD50	> 2.000 mg/kg	dermal		rat	OECD Guideline 402 (Acute
powder (>100nm<1mm)						Dermal Toxicity)
7440-22-4						

Skin corrosion/irritation:

Hazardous components CAS-No.	Result	Exposure time	Species	Method
Tin 7440-31-5	not irritating		rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)
Modified rosin 144413-22-9	not irritating	4 h	rabbit	OECD Guideline 404 (Acute Dermal Irritation / Corrosion)

Serious eye damage/irritation:

Hazardous components	Result	Exposure	Species	Method
CAS-No.		time		
Tin	not irritating		rabbit	OECD Guideline 405 (Acute
7440-31-5				Eye Irritation / Corrosion)
Modified rosin	moderately irritating	24 h	rabbit	OECD Guideline 405 (Acute
144413-22-9				Eye Irritation / Corrosion)

Respiratory or skin sensitization:

Hazardous components CAS-No.	Result	Test type	Species	Method
Modified rosin 144413-22-9	not sensitising	Guinea pig maximisat	guinea pig	OECD Guideline 406 (Skin Sensitisation)
		ion test		

Germ cell mutagenicity:

Hazardous components	Result	Type of study /	Metabolic	Species	Method
CAS-No.		Route of	activation /		
		administration	Exposure time		
Tin	negative	bacterial reverse	with and without		OECD Guideline 471
7440-31-5		mutation assay (e.g			(Bacterial Reverse Mutation
		Ames test)			Assay)
	negative	in vitro mammalian	with and without		OECD Guideline 473 (In vitro
		chromosome			Mammalian Chromosome
		aberration test			Aberration Test)
	negative	mammalian cell	with and without		OECD Guideline 476 (In vitro
		gene mutation assay			Mammalian Cell Gene
					Mutation Test)
Modified rosin	negative	bacterial reverse	with and without		OECD Guideline 471
144413-22-9		mutation assay (e.g			(Bacterial Reverse Mutation
		Ames test)			Assay)
	negative	in vitro mammalian	with and without		OECD Guideline 473 (In vitro
		chromosome			Mammalian Chromosome
		aberration test			Aberration Test)
Silver >= 99,9 % Ag in	negative	in vitro mammalian	with and without		OECD Guideline 487 (In vitro
powder (>100nm<1mm)		cell micronucleus			Mammalian Cell
7440-22-4		test			Micronucleus Test)

Reproductive toxicity:

Hazardous substances	Result / Classification	Species	Exposure	Species	Method
CAS-No.			time		
Tin	NOAEL $P = > 1.000 \text{ mg/kg}$	oral: gavage	56 days	rat	OECD Guideline 421
7440-31-5					(Reproduction /
					Developmental Toxicity
					Screening Test)

Repeated dose toxicity

Hazardous components CAS-No.	Result	Route of application	Exposure time / Frequency of treatment	Species	Method
Tin 7440-31-5	NOAEL=> 1.000 mg/kg	oral: gavage	28 daysdaily	rat	OECD Guideline 407 (Repeated Dose 28-Day Oral Toxicity in Rodents)
Modified rosin 144413-22-9	NOAEL=150 mg/kg	oral: gavage	28 ddaily	rat	OECD Guideline 407 (Repeated Dose 28-Day Oral Toxicity in Rodents)

SECTION 12: Ecological information

General ecological information:

The mixture is classified based on the available hazard information for the ingredients as defined in the classification criteria for mixtures for each hazard class or differentiation in Annex I to Regulation (EC) No 1272/2008. Relevant available health/ecological information for the substances listed under Section 3 is provided in the following.

12.1. Toxicity

Ecotoxicity:

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

Very toxic to aquatic life with long lasting effects.

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Hazardous components CAS-No.	Value type	Value	Acute Toxicity	Exposure time	Species	Method
			Study			
Silver >= 99,9 % Ag in powder (>100nm<1mm) 7440-22-4	LC50	0,0012 mg/l	Fish	96 h	Pimephales promelas	other guideline:
	EC10	0,00019 mg/l	Fish	217 d	Salmo trutta	OECD Guideline 210 (fish early lite stage toxicity test)
Silver >= 99,9 % Ag in powder (>100nm<1mm) 7440-22-4	EC50	0,00022 mg/l	Daphnia	48 h	Daphnia magna	other guideline:
Silver >= 99,9 % Ag in powder (>100nm<1mm) 7440-22-4	EC10	0,00016 mg/l	Algae	15 d	other:	other guideline:
Silver >= 99,9 % Ag in powder (>100nm<1mm) 7440-22-4	NOEC	0,00032 mg/l	chronic Daphnia	21 d	Daphnia magna	EPA OPPTS 850.1300 (Daphnid Chronic Toxicity Test)

12.2. Persistence and degradability

Persistence and Biodegradability:

The product is not biodegradable.

Hazardous components	Result	Route of	Degradability	Method
CAS-No.		application		
Modified rosin	not readily biodegradable.	aerobic	25 %	OECD Guideline 301 B (Ready
144413-22-9				Biodegradability: CO2 Evolution
				Test)

12.3. Bioaccumulative potential / 12.4. Mobility in soil

Mobility:

The product is insoluble and sinks in water.

Bioaccumulative potential:

Octanol/Water distribution coefficient: Not determined

Hazardous components	LogPow	Bioconcentration	Exposure	Species	Temperature	Method
CAS-No.		factor (BCF)	time			
Modified rosin	> 6					EU Method A.8 (Partition
144413-22-9						Coefficient)
Silver >= 99,9 % Ag in		70	42 d	Cyprinus carpio	20 °C	other guideline:
powder (>100nm<1mm)						
7440-22-4						

12.5. Results of PBT and vPvB assessment

Hazardous components	PBT/vPvB
CAS-No.	
Tin	Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very
7440-31-5	Bioaccumulative (vPvB) criteria.
Lead	Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very
7439-92-1	Bioaccumulative (vPvB) criteria.
Silver >= 99,9 % Ag in powder (>100nm<1mm	Not fulfilling Persistent, Bioaccumulative and Toxic (PBT), very Persistent and very
	Bioaccumulative (vPvB) criteria.
7440-22-4	

12.6. Other adverse effects

No data available.

SECTION 13: Disposal considerations

13.1. Waste treatment methods

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Product disposal:

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

Dispose of as hazardous waste in compliance with local and national regulations.

Disposal of uncleaned packages:

Dispose of as unused product.

Waste code

06 04 05* Waste containing other heavy metals

The valid EWC waste code numbers are source-related. The manufacturer is therefore unable to specify EWC waste codes for the articles or products used in the various sectors. The EWC codes listed are intended as a recommendation for users. We will be happy to advise you.

SECTION 14: Transport information

14.1. **UN** number

ADR	3082
RID	3082
ADN	3082
IMDG	3082
IATA	3082

14.2. UN proper shipping name

ADR	ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIOUID, N.O.S	4
ADK	ENVIRONMENTALLI HAZAKDOUS SUBSTANCE, LIUUID, N.O.S	,.

(Silver,Lead)

RID ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

(Silver,Lead)

ADN ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

(Silver,Lead)

IMDG ENVIRONMENTALLY HAZARDOUS SUBSTANCE, LIQUID, N.O.S.

(Silver,Lead)

IATA Environmentally hazardous substance, liquid, n.o.s. (Silver, Lead)

14.3. Transport hazard class(es)

ADR	9
RID	9
ADN	9
IMDG	9
IATA	9

14.4. Packing group

ADR	III
RID	III
ADN	III
IMDG	III
IATA	III

14.5. **Environmental hazards**

ADR	not applicable
RID	not applicable
ADN	not applicable
IMDG	Marine pollutant
IATA	not applicable

14.6. Special precautions for user

ADR not applicable MSDS-No.: 175644 500G/JL

> Tunnelcode: not applicable RID not applicable ADN **IMDG** not applicable not applicable **IATA**

The transport classifications in this section apply generally to packed and bulk goods alike. For containers with a net volume of no more than 5 L for liquid substances or a net mass of no more than 5 kg for solid substances per individual or inner package, the exemptions SP 375 (ADR), 197 (IATA), 969 (IMDG) may be applied, which can result in a deviation from the transport classification for packed goods.

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

not applicable

V005.0

SECTION 15: Regulatory information

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

VOC content (2010/75/EC)

15.2. Chemical safety assessment

A chemical safety assessment has not been carried out.

National regulations/information (Great Britain):

The Health & Safety at Work Act 1974. Remarks

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.

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IND (G)248L:Solder fume and you. IND(G)249L:Controlling health risks from rosin (colophony) based solder fluxes.

The Control of Lead at Work Regulations. L132:Control of Lead at Work: Approved Code of Practice and Guidance.

Employees should be under medical surveillance if the risk assessment made under the Control of Lead at Work Regulations indicates they are likely to be exposed to significant concentrations of lead, or if an Employment Medical Advisor or appointed doctor so certifies.

A woman employed on work which exposes her to lead should notify her employer as soon as possible if she becomes pregnant. The Employment Medical Advisor / Appointed Doctor should be informed of the pregnancy.

Under the Management of Health and Safety at Work Regulations, employers are required to assess the particular risks to health at work of pregnant workers and workers who have recently given birth or who are breast feeding.

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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:

H360FD May damage fertility. May damage the unborn child.

H362 May cause harm to breast-fed children.

H372 Causes damage to organs through prolonged or repeated exposure.

H400 Very toxic to aquatic life.

H410 Very toxic to aquatic life with long lasting effects.

H413 May cause long lasting harmful effects to aquatic life.

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.

Relevant changes in this safety data sheet are indicated by vertical lines at the left margin in the body of this document. Corresponding text is displayed in a different color on shadowed fields.