1: PRODUCT AND COMPANY IDENTIFICATION

Trade name: FL250CR SN62PB36AG2

1.3 Details of the supplier of the safety data sheet
Manufacturer/Supplier:
Kester Inc.
800 West Thorndale Avenue
Itasca, IL 60143 USA
Tel (630) 616-4000

ITW Specialty Materials (Suzhou) Co., Ltd.
Heng Qiao Road
Wujiang Economic Development Zone
Suzhou, Jiangsu 215200 China
Tel +86 512 82060808

Kester GmbH
Ganghofer Strasse 45
D-82216 Gerlindden Germany
Tel +49 (0) 8142 4885 0

Information department: Product Compliance: EHS_Kester@kester.com

1.4 Emergency telephone number:
CHEMTREC 24-Hour Emergency Response Telephone Number : (800) 424-9300
CHEMTREC 24-Hour Emergency Response (Outside US & Canada) Telephone Number : (703) 527-3887

2: HAZARDS IDENTIFICATION

2.1 Classification of the substance or mixture
Classification according to Regulation (EC) No 1272/2008

GHS08 Health hazard

Carc. 2 H351 Suspected of causing cancer.
Repr. 1 H360 May damage fertility or the unborn child.
STOT RE 2 H373 May cause damage to organs through prolonged or repeated exposure.

GHS07

Acute Tox. 4 H302 Harmful if swallowed.
Acute Tox. 4 H332 Harmful if inhaled.
Skin Sens. 1 H317 May cause an allergic skin reaction.

2.2 Label elements
Labelling according to Regulation (EC) No 1272/2008
The product is classified and labeled according to the CLP regulation.

Hazard pictograms

GHS07 GHS08

(Contd. on page 2)
Signal word Danger

Hazard-determining components of labeling:
LEAD (Pb)
Rosin
Halogenated organic diol

Hazard statements
Harmful if swallowed or if inhaled.
May cause an allergic skin reaction.
Suspected of causing cancer.
May damage fertility or the unborn child.
May cause damage to organs through prolonged or repeated exposure.

Precautionary statements
Do not breathe dust/fume/gas/mist/vapors/spray.
Wear protective gloves/protective clothing/eye protection/face protection.
Wash thoroughly after handling.
Do not eat, drink or smoke when using this product.
Contaminated work clothing must not be allowed out of the workplace.
Do not handle until all safety precautions have been read and understood.

IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
IF INHALED: Remove person to fresh air and keep comfortable for breathing.
If skin irritation or rash occurs: Get medical advice/attention.
IF ON SKIN: Wash with plenty of water.
Take off contaminated clothing and wash it before reuse.
Store in a dry place.
Dispose of contents/container in accordance with local/regional/national/international regulations.

Hazard description:

WHMIS Symbols

Classification system:
NFPA ratings (scale 0 - 4)

Health = 2
Fire = 0
Reactivity = 0

HMIS-ratings (scale 0 - 4)

Health = *1
Fire = 0
Reactivity = 0

2.3 Other hazards
Results of PBT and vPvB assessment
PBT: Not applicable.
vPvB: Not applicable.

3: COMPOSITION OF MIXTURE

Description: Mixture of the substances listed below with nonhazardous additions.
### 4: FIRST AID MEASURES

4.1 Description of first aid measures

**General information:**
Symptoms of poisoning may even occur after several hours; therefore medical observation for at least 48 hours after the accident. Follow general first aid procedures.

**After inhalation:** Supply fresh air; consult doctor in case of complaints.

**After skin contact:** Immediately wash with water and soap and rinse thoroughly.

**After eye contact:** Rinse opened eye for several minutes under running water.

**After swallowing:** Seek immediate medical advice.

4.2 Most important symptoms and effects, both acute and delayed No further relevant information available.

4.3 Indication of any immediate medical attention and special treatment needed
No further relevant information available.

### 5: FIREFIGHTING MEASURES

5.1 Extinguishing media

Suitable extinguishing agents:
CO₂, extinguishing powder or water spray. Fight larger fires with water spray or alcohol resistant foam.

5.2 Special hazards arising from the substance or mixture In case of fire, the following can be released:

5.3 Advice for firefighters

Protective equipment: Wear self-contained respiratory protective device.

### 6: ACCIDENTAL RELEASE MEASURES

6.1 Personal precautions, protective equipment and emergency procedures Ensure adequate ventilation

6.2 Environmental precautions: Do not allow to enter sewers/ surface or ground water.

6.3 Methods and material for containment and cleaning up:
Dispose contaminated material as waste according to item 13.
Ensure adequate ventilation.

6.4 Reference to other sections
See Section 7 for information on safe handling.
See Section 8 for information on personal protection equipment.
See Section 13 for disposal information.
7: HANDLING AND STORAGE

7.1 Precautions for safe handling
Thorough dusting.
Prevent formation of dust.
Information about protection against explosions and fires: No special measures required.

7.2 Conditions for safe storage, including any incompatibilities
Storage:
Requirements to be met by storerooms and receptacles: Store in a cool location.
Information about storage in one common storage facility: Not required.
Further information about storage conditions: Keep receptacle tightly sealed.
7.3 Specific end use(s) No further relevant information available.

8: EXPOSURE CONTROLS / PERSONAL PROTECTION

Additional information about design of technical systems: No further data; see item 7.

8.1 Control parameters
Components with limit values that require monitoring at the workplace:
The following constituents are the only constituents of the product which have a PEL, TLV or other recommended exposure limit.
At this time, the other constituents have no known exposure limits.

<table>
<thead>
<tr>
<th>7440-31-5 TIN (Sn)</th>
<th>7439-92-1 LEAD (Pb)</th>
<th>7440-22-4 SILVER (Ag)</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>PEL</strong></td>
<td>Long-term value: 2 mg/m³</td>
<td>Long-term value: 0.05 mg/m³</td>
</tr>
<tr>
<td><strong>REL</strong></td>
<td>Long-term value: 2 mg/m³</td>
<td>Long-term value: 0.05 mg/m³</td>
</tr>
<tr>
<td><strong>TLV</strong></td>
<td>Long-term value: 2 mg/m³</td>
<td>Long-term value: 0.05 mg/m³</td>
</tr>
</tbody>
</table>

*see 29 CFR 1910.1025
*8-hr TWA, excl. lead arsenate; See PocketGuideApp.C
*and inorganic compounds, as Pb; BEI

| PEL | Long-term value: 0.01 mg/m³ |
| REL | Long-term value: 0.01 mg/m³ |
| **TLV** | Long-term value: 0.1 mg/m³ |

metal: dust and fume

Additional information:
PEL = Permissible Exposure Limit (OSHA)
TLV = Threshold Limit Value (ACGIH)
OSHA = Occupational Safety and Health Administration
ACGIH = American Conference of Governmental Industrial Hygienists

8.2 Exposure controls
Personal protective equipment:
General protective and hygienic measures:
The usual precautionary measures for handling chemicals should be followed.
Keep away from foodstuffs, beverages and feed.
Immediately remove all soiled and contaminated clothing. Wash hands before breaks and at the end of work.

Breathing equipment:
Not necessary if room is well-ventilated. Use suitable respiratory protective device in case of insufficient ventilation.

Protection of hands:

Protective gloves

Material of gloves:
Nitrile rubber, NBR
Natural rubber, NR

Penetration time of glove material:
The exact break through time has to be found out by the manufacturer of the protective gloves and has to be observed.

Eye protection:
Safety glasses

Face Shield with Safety Glasses when refilling.

9: PHYSICAL AND CHEMICAL PROPERTIES

9.1 Information on basic physical and chemical properties

General Information

Appearance:
Form: Solid
Color: Silver grey
Odor: Odorless

pH-value: Not applicable.

Change in condition
Melting point/Melting range: Undetermined.
Boiling point/Boiling range: >999 °C (>1830 °F)
Flash point: >100 °C (>212 °F)

Flammability (solid, gaseous): Not determined.

Auto igniting: Product is not selfigniting.

Danger of explosion: Product does not present an explosion hazard.

Vapor pressure: Not applicable.

Density at 20 °C (68 °F): 6 g/cm³ (50.07 lbs/gal)
Vapor density: Not applicable.

Solubility in / Miscibility with
Water: Insoluble.

Solvent content:
Organic solvents: 1.4 %
Trade name: FL250CR SN62PB36AG2

Solids content: 96.1%

10: STABILITY AND REACTIVITY

10.1 Reactivity No further relevant information available.
10.2 Chemical stability
Thermal decomposition / conditions to be avoided: No decomposition if used according to specifications.
10.3 Possibility of hazardous reactions No dangerous reactions known.
10.4 Conditions to avoid No further relevant information available.
10.5 Incompatible materials: No further relevant information available.
10.6 Hazardous decomposition products: No dangerous decomposition products known.

11: TOXICOLOGICAL INFORMATION

11.1 Information on toxicological effects
Acute toxicity:
Harmful if swallowed or if inhaled.

LD/LC50 values that are relevant for classification:

<table>
<thead>
<tr>
<th>Rosin</th>
<th>Oral</th>
<th>LD50</th>
<th>&gt;4000 mg/kg (Rat)</th>
</tr>
</thead>
<tbody>
<tr>
<td>112-73-2 bis(2-butoxyethyl) ether</td>
<td>Oral</td>
<td>LD50</td>
<td>3900 mg/kg (rat)</td>
</tr>
</tbody>
</table>

Primary irritant effect:
on the skin: Based on available data, the classification criteria are not met.
on the eye: Based on available data, the classification criteria are not met.

Sensitization:
May cause an allergic skin reaction.

Additional toxicological information:
Carcinogenic categories
IARC (International Agency for Research on Cancer)
7439-92-1 | LEAD (Pb) | 2B
102-71-6 | 2,2',2''-nitrilotriethanol | 3

NTP (National Toxicology Program)
7439-92-1 | LEAD (Pb) | H

OSHA-Ca (Occupational Safety & Health Administration)
None of the ingredients is listed.

12: ECOLOGICAL INFORMATION

12.1 Toxicity
Aquatic toxicity: No further relevant information available.

Additional ecological information:
General notes:
Do not allow undiluted product or large quantities of it to reach ground water, water course or sewage system.
Danger to drinking water if even small quantities leak into the ground.

(Contd. on page 7)
13: DISPOSAL CONSIDERATIONS

13.1 Waste treatment methods
Recommendation:
Must not be disposed of together with household garbage. Do not allow product to reach sewage system.

Uncleaned packagings:
Recommendation: Disposal must be made according to official regulations.

14: TRANSPORT INFORMATION

14.1 UN-Number
DOT, ADR, ADN, IMDG, IATA Not applicable

14.2 UN proper shipping name
DOT, ADR, ADN, IMDG, IATA Not applicable

14.3 Transport hazard class(es)

14.4 Packing group
DOT, IMDG, IATA Not applicable

14.5 Special precautions for user
Not applicable.

14.7 Transport in bulk according to Annex II of MARPOL73/78 and the IBC Code Not applicable.

15: REGULATORY INFORMATION

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

USA The following information relates to product regulation specific to the USA.

SARA (Superfund Amendments and Reauthorization Act)

Section 355 (extremely hazardous substances):
None of the ingredient is listed.

Section 313 (Specific toxic chemical listings):
7439-92-1 LEAD (Pb)
7440-22-4 SILVER (Ag)
112-73-2 bis(2-ethylhexyl) ether

TSCA (Toxic Substances Control Act): Kester certifies that all components listed below for the subject finished product are on the TSCA Inventory of Chemical Substances and are not subject to any chemical specific regulation under TSCA Section 12(b) export notification requirements delineated at 40 CFR part 707, subpart D.

All ingredients are listed or exempt from listing.

California Proposition 65

Chemicals known to cause cancer:
LEAD (Pb)
Chemicals known to cause reproductive toxicity:
LEAD (Pb)

Carcinogenic categories
EPA (Environmental Protection Agency)
7439-92-1 LEAD (Pb) B2
7440-22-4 SILVER (Ag) D

NIOSH-Ca (National Institute for Occupational Safety and Health)
None of the ingredients is listed.

CANADA:
Workplace Hazardous Materials Identification (WHMIS):
This product has been classified in accordance with the hazard criteria of the Canadian Controlled Products Regulation (CPR) and the Safety Data Sheet (SDS) contains all of the information required by the CPR.
Labelling according to Regulation (EC) No 1272/2008
The product is classified and labeled according to the CLP regulation.

Hazard pictograms

Signal word Danger

Hazard-determining components of labeling:
LEAD (Pb)
Rosin
Halogenated organic diol

Hazard statements
Harmful if swallowed or if inhaled.
May cause an allergic skin reaction.
Suspected of causing cancer.
May damage fertility or the unborn child.
May cause damage to organs through prolonged or repeated exposure.

Precautionary statements
Do not breathe dust/fume/gas/mist/vapors/spray.
Wear protective gloves/protective clothing/eye protection/face protection.
Wash thoroughly after handling.
Do not eat, drink or smoke when using this product.
Contaminated work clothing must not be allowed out of the workplace.
Do not handle until all safety precautions have been read and understood.
IF SWALLOWED: Rinse mouth. Do NOT induce vomiting.
IF INHALED: Remove person to fresh air and keep comfortable for breathing.
If skin irritation or rash occurs: Get medical advice/attention.
IF ON SKIN: Wash with plenty of water.
Take off contaminated clothing and wash it before reuse.
Store in a dry place.
Dispose of contents/container in accordance with local/regional/national/international regulations.

15.2 Chemical safety assessment: A Chemical Safety Assessment has not been carried out.

16: OTHER INFORMATION

Department issuing Safety Data Sheet (SDS): Product Compliance / EHS Department
**Contact:** EHS_Kester@kester.com  
**Date of preparation / last revision:** 06/15/2016 / 4  

**Abbreviations and acronyms:**  
ADR: Accord européen sur le transport des marchandises dangereuses par Route (European Agreement concerning the International Carriage of Dangerous Goods by Road)  
IMDG: International Maritime Code for Dangerous Goods  
DOT: US Department of Transportation  
IATA: International Air Transport Association  
GHS: Globally Harmonised System of Classification and Labelling of Chemicals  
EINECS: European Inventory of Existing Commercial Chemical Substances  
ELINCS: European List of Notified Chemical Substances  
CAS: Chemical Abstracts Service (division of the American Chemical Society)  
NFPA: National Fire Protection Association (USA)  
HMIS: Hazardous Materials Identification System (USA)  
WHMIS: Workplace Hazardous Materials Information System (Canada)  
LC50: Lethal concentration, 50 percent  
LD50: Lethal dose, 50 percent  
PBT: Persistent, Bioaccumulative and Toxic  
vPvB: very Persistent and very Bioaccumulative  
NIOSH: National Institute for Occupational Safety  
OSHA: Occupational Safety & Health  
TLV: Threshold Limit Value  
PEL: Permissible Exposure Limit  
REL: Recommended Exposure Limit  
Acute Tox. 4: Acute toxicity, Hazard Category 4  
Acute Tox. 3: Acute toxicity, Hazard Category 3  
Skin Sens. 1: Sensitisation - Skin, Hazard Category 1  
Carc. 2: Carcinogenicity, Hazard Category 2  
Repr. 1: Reproductive toxicity, Hazard Category 1  
Repr. 1B: Reproductive toxicity, Hazard Category 1B  
STOT RE 2: Specific target organ toxicity - Repeated exposure, Hazard Category 2  
*Data compared to the previous version altered.*