

Safety Data Sheet according to the Regulation (EC) No. 1907/2006 (REACH)**1. Identification of the Substance/Mixture and the Company/Undertaking****1.1. Product Identifier**

Trade Name of the Product: colour pastes for epoxy resin
Article Number: KL1910, KL1911, KL1912, KL1913/P262, KL1914,
KL1915, KL1916

1.2. Relevant Identified Uses of the Substance or Mixture and Uses Advised Against

Recommended Intended Use(s):
for colouring epoxy resins

1.3. Details of the Supplier of the Safety Data Sheet

Manufacturer: R&G Faserverbundwerkstoffe GmbH
Im Meißel 7 - 13
71111 Waldenbruch (Germany)

phone: +49 7157 5304-60
fax: +49 7157 5304-70
P.O. box: 1145
email: info@r-g.de
www.r-g.de

Supplier: Company FIOR & GENTZ Gesellschaft für Entwicklung und
Vertrieb von orthopädietechnischen Systemen mbH
Dorette-von-Stern-Straße 5
21337 Lüneburg (Germany)
phone: +49 4131 24445-0
fax: +49 4131 24445-5
email: info@fior-gentz.de
www.fior-gentz.com

Informing Department: management

1.4 Emergency Telephone Number

Poison Information Centre Freiburg
phone: +49 (0)761 19240

2. Hazards Identification**2.1 Classification of the Substance or Mixture
Regulation (EC) No. 1272/2008**

Hazard Categories:
sensitisation of respiratory tract/skin: sens. skin 1

Hazard Warnings:
May cause an allergic skin reaction.

2.2 Label Elements**Regulation (EC) No. 1272/2008****Hazardous Components on Labels:**

fatty acid, C18 unsaturated, trimers, combination with oleylamine

fatty acid, tall oil, combination with oleylamine

[N,N,N',N',N'',N''-hexaethyl-29H,31H-phthalocyanintrimethylaminato(2-)-N29,N

Signal Word: attention**Pictograms:****Hazard Warnings:**

H317 May cause an allergic skin reaction.

Regulation (EC) No. 1272/2008:

This mixture is not classified as hazardous according to Regulation (EC) No. 1272/2008.

This mixture is not classified as hazardous according to Regulation (EC) No. 1999/45/EC.

Safety Instructions:

P261 Avoid inhalation of dust/smoke/gas/mist/vapours/aerosols.

P272 Do not wear contaminated clothing outside the workplace.

P280 Wear protective gloves/clothing, eye and face protection.

P302+P352 IN CASE OF SKIN CONTACT: Wash with plenty of water and soap.

P333+P313 In case of skin irritation or rashes: seek medical advice/help.

P362+P364 Take off contaminated clothing and wash before reuse.

2.3. Other Hazards

no information available

3. Composition/Information on Components**3.2 Mixtures****Hazardous Ingredients**

CAS No.	Description			Part
	EC No.	Index No.	REACH No.	
	GHS classification			
123-86-4	n-butyl acetate			2.5 < 5%
	204-658-1		01-2119485493-29	
	flam. liq. 3, STOT SE 3; H226 H336			
147900-93-4	fatty acid, C18 unsaturated, trimers, combination with oleylamine			0.25 < 0.5%
	604-612-4		01-2119971821-33	
	acute tox. 4, skin sens. 1, STOT RE 2, Aquatic Chronic 2; H302 H317 H373 H411			
85711-55-3	fatty acid, tall oil, combination with oleylamine			0.25 < 0.5%
	288-315-1		01-2119974148-28	
	eye dam. 1, skin sens. 1A, STOT RE 2; H318 H317 H373			
28654-73-1	[N,N,N',N',N'',N''-hexaethyl-29H,31H-phthalocyanintrimethylaminato(2-)-N29,N			0.1 < 0.25%
	249-125-4		01-2119971074-38	
	skin sens. 1B, H317			

Full text of H- and EUH-phrases: see section 16.

4. First Aid Measures

4.1 Description of First Aid Measures

General Information:

Consult a doctor when symptoms occur or in cases of doubt. Never give anything by mouth to an unconscious or convulsing person. In case of unconsciousness, place in recovery position and seek medical device.

After Inhalation:

Set the affected person on fresh air, keeping the person warm and steady. In case of respiratory problems or arrest, induce artificial respiration.

Skin Contact:

Take off immediately all contaminated clothing. After contact with skin, immediately wash with plenty of water and soap. Do not use for cleaning purposes: organic solvents/diluents.

After Eye Contact:

Rinse cautiously with water for several minutes. Remove contact lenses if present and easy to do. Keep on rinsing. Immediately seek medical advice.

Ingestion:

If swallowed, rinse mouth with plenty of water (only if the person is conscious) and get medical help immediately. Do NOT induce vomiting.

4.2 Most Important Symptoms and Effects, Both Immediate and Delayed

Consult a doctor when symptoms occur or in cases of doubt.

4.3 Indication of Any Immediate Medical Attention and Special Treatment Needed

Treat symptomatically.

5. Firefighting Measures

5.1 Extinguishing Media

Suitable Extinguishing Media:

alcohol resistant foam, carbon dioxide, powder, water spray jet

Unsuitable Extinguishing Media:

full water jet

5.2 Special Hazards Arising from the Substance or Mixture

In case of fire, these may form: smoke, gases/vapours, harmful to health

5.3 Advice for Firefighters

Wear self-contained breathing apparatus and chemical protective clothing.

Additional Requirements:

Use water spray jet to protect people and cool containers in the hazard area. Collect extinguishing water separately. Do not discharge into drains or surface/ground waters.

6. Accidental Release Measures

6.1 Personal Precautions, Protective Equipment and Emergency Procedures

Eliminate all ignition sources. Ventilate the area with fresh air. Do not breathe vapour.

6.2 Environmental Protection Measures

Do not discharge into drains or surface/ground waters. In case of leaking gas or surface waters, soil or sewers entering, inform the competent authorities.

6.3 Methods and Material for Containment and Cleaning

Soak up in absorbent material (sand, diatomaceous earth, acid-binding agent, general-purpose binder). Collect and dispose in convenient, closed containers.

Do not use for cleaning purposes: organic solvents/diluents

6.4 Reference to Other Paragraphs

Safe Handling:	see section 7
Personal Protective Equipment:	see section 8
Disposal:	see section 13

7. Handling and Storage

7.1 Precautions for Safe Handling

Advice on Safe Handling:

Use the material only in places where open light, fire and other sources of ignition are kept away. Use explosion-proof electrical equipment. Take precautionary measures against static discharges. Provide earthing of containers, equipment, pumps and suction devices. Only use antistatic (spark-free) tools. Keep away from heat sources (e.g. hot surfaces), sparks and open flames.

Convenient floor material: conductive

Avoid contact with skin, eyes and clothing. Do not breathe gas/fumes/vapour/spray (appropriate wording to be specified by the manufacturer). When using do not eat, drink or smoke. Do not empty the container with pressure.

Advice on Protection Against Fire and Explosion:

Vapours are heavier than air. Vapours may form explosive mixtures with air.

7.2 Conditions for Safe Storage, Including any Incompatibilities

Storage Rooms and Container Requirements:

Keep container tightly closed. Do not empty the container with pressure. No smoking. Store in a place that can only be accessed by authorised persons. Store containers tightly closed and upright to prevent any leakage. Floors must meet the criteria concerning the "Directives for avoiding ignition risks due to electrostatic build-up (TRBS 2153)".

Incompatible Products:

Keep away from: strong acids, strong lyes, oxidising agents

Further Information on Storage Conditions

Note the instructions for use on the label. Keep container in a well-ventilated place. Keep container in a dry place. Recommended storage temperature: 5 to 25°C. Protect from heat and direct solar radiation. Eliminate all ignition sources.

Storage Class According to TRGS 510:	12 (flammable liquids which can not be assigned to the formerly mentioned SC)
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7.3 Specific End Uses

See Technical Data Sheet. Note the instructions for use.

8. Exposure Controls and Personal Protective Equipment

8.1 Control Parameters

Occupational Exposure Limits (TRGS 900)

CAS No.	Description	ppm	mg/m ³	F/m ³	Peak Limitation	Type
123-86-4	n-butyl acetate	62	300		2(l)	

8.2 Limiting and Monitoring of Exposure

Appropriate Engineering Controls:	Ensure well-ventilated areas or exhaust ventilation at critical points. In case of insufficient ventilation, wear breathing apparatus.
Protection and Hygiene Measures:	After contact with skin, immediately wash with plenty of water and soap.
Eye/Face Protection:	tight-closing safety goggles
Hand Protection:	<p>Wear appropriate protective gloves (EN ISO 374). glove material thickness: > 0.4mm breakthrough time (maximum wearing time): > 480min.</p> <p>When handling chemical products, only chemical protective gloves bearing the CE marking including the four-digit verification number may be worn. Chemical protective gloves must be chosen carefully, considering their design in dependence on the concentration and amount of occupational hazardous substances. In case of special applications, it is recommended to check the chemical resistance with the manufacturer of the gloves.</p> <p>Barrier cream for preventive skin protection. Apply barrier cream before handling the product.</p>
Body Protection:	Wear suitable protective clothing (antistatic), natural fibres (e.g. cotton), heat-resistant synthetic fibres.
Respiratory Protection:	In case of insufficient ventilation, wear breathing apparatus. Note the limits of wearing the clothing according to the German Ordinance on Hazardous Substances (GefStoffV) in combination with the regulations concerning the use of breathing apparatuses (BGR 190). Only use breathing apparatuses bearing the CE marking including the four-digit verification number.
Limiting and Controlling Environmental Exposure:	Do not discharge into drains or surface/ground waters. See chapter 7 Additional measures are not required.

9. Physical and Chemical Properties

9.1 Information on Basic Physical and Chemical Properties

Physical State:	liquid
Colour:	different
Odour:	characteristic
pH Value (at 20°C/68°F):	not determined

Change in State:	
Melting Point:	not applicable
Initial Boiling Point and Boiling Range:	124°C (255.2°F)
Flash Point:	not applicable

Ignitability:	
Solid:	not determined
Gas:	not applicable

Explosion Hazards (not applicable):	
Lower Explosion Limit:	1.2 Vol.-%
Upper Explosion Limit:	7.5 Vol.-%
Ignition Temperature:	390°C (734°F)

Auto-Ignition Temperature:	
Solid:	not determined
Gas:	not applicable
Decomposition temperature:	not applicable

Oxidising Properties (not applicable):	
Vapour Pressure (at 20°C/68°F):	0.38 hPa
Density (at 20°C/68°F):	1,18g/cm ³
Water Solubility:	practically insoluble

Solubility in Other Solvents (not determined):	
Partition Coefficient:	not determined
Dyn. Viscosity:	paste
Kin. Viscosity:	paste
Vapour Density:	not applicable
Evaporation Rate:	not applicable
Solvent Concentration:	organic solvents: 4% by weight water: 0% by weight

9.2 Other Information

Solid Content:	95.65%
Odour Threshold:	not determined

10. Stability and Reactivity

10.1 Reactivity

no information available

10.2 Chemical Stability

The product is stable when stored at normal ambient temperatures.

10.3 Possibility of Hazardous Reactions

Exothermic reactions with: strong acids, strong lyes, oxidising agents

10.4 Conditions to Avoid

High temperatures can give rise to hazardous decomposition products.

10.5 Incompatible Materials

strong acids, strong lyes, oxidising agents

10.6 Hazardous Decomposition Products

High temperatures can give rise to hazardous decomposition products.

Hazardous decomposition products: carbon monoxide, carbon dioxide (CO₂), smoke, nitrogen oxides (NO_x)

11. Toxicological Information

11.1 Information on Toxicological Effects

Acute Toxicity:

The classification criteria are not met due to the available data.

CAS No.	Description					
	route of exposure	dose	species	source	method	
147900-93-4	Fatty Acid, C18 Unsaturated, Trimers, Combination with Oleylamine					
	oral	ATE 500mg/kg				

Skin Irritation and Corrosion Effects:

The classification criteria are not met due to the available data.

Sensitising Effects:

May cause an allergic skin reaction (fatty acid, C18 unsaturated, trimers, combination with oleylamine; fatty acid, tall oil, combination with oleylamine; [N,N,N',N',N'',N''-hexaethyl-29H,31H-phthalocyanintrimethylaminato(2-)-N29,N).

Carcinogenic, Mutagenic and Toxic for Reproduction Effects:

The classification criteria are not met due to the available data.

Conclusive evaluation of the CMR properties:

This substance does not meet the criteria for the CMR categories 1A or 1B according to CLP

Specific Target Organ Toxicity – Single Exposure:

The classification criteria are not met due to the available data.

Specific Target Organ Toxicity – Repeated Exposure:

The classification criteria are not met due to the available data.

Aspiration Hazard:

The classification criteria are not met due to the available data.

Practical Experiences:**Other Observations:**

Inhalation of solvent contents above the AGW (occupational exposure limit) value may lead to health damages as e.g. respiratory tract or mucous membranes irritations.

Damages the organs: liver, kidneys, central nervous system.

The following symptoms may occur: Headache, dizziness, fatigue, muscular dystrophy, numbness, in severe cases: unconsciousness.

Solvents may cause some of the above mentioned effects when absorbed by skin. Repeated or continued exposition may cause skin irritations and dermatitis due to the degreasing properties of the product.

After eye contact: irritant

12. Ecological Information**12.1 Toxicity**

no data available

12.2 Persistence and Degradability

no data available

12.3 Bioaccumulation Potential

no data available

12.4 Mobility in Soil

no data available

12.5 Results of PBT and vPvB Assessment

The substances in this mixture do not meet the PBT/vPvB criteria according to REACH, annex XIII.

12.6 Other Harmful Effects

no information available

Additional Information:

Do not discharge into drains or surface/ground waters. Do not discharge into the sub-soil/soil.

13. Disposal Information**13.1 Waste Treatment Methods****Disposal Recommendations:**

Do not discharge into drains or surface/ground waters. This material and its container must be disposed of in a safe way. Disposal according to Directive 2008/98/EC for waste and hazardous waste.

Waste Code Product (unused product):

08 01 12 Waste from production, preparation, distribution and application (HZVA: Herstellung, Zubereitung, Vertrieb und Anwendung) of coatings (paints, varnishes, enamels), adhesives, sealants and printing inks; waste from HZVA and removal of paint and varnish; waste paint and varnish other than those mentioned in 08 01 11.

Disposal of Uncleaned Packaging and Recommended Cleaning Agents:

Non-contaminated and restlessly emptied packagings can be used for recycling.
Contaminated packagings must be handled like the substance.

14. Transport Information

Land Transport (ADR/RID):

14.1 UN Number

no hazardous material as defined by the transport regulations

14.2 UN Proper Shipping Name

no hazardous material as defined by the transport regulations

14.3 Transport Hazard Classes

no hazardous material as defined by the transport regulations

14.4 Packaging Group

no hazardous material as defined by the transport regulations

Inland Waterway Transport (ADN):

14.1 UN Number

no hazardous material as defined by the transport regulations

14.2 UN Proper Shipping Name

no hazardous material as defined by the transport regulations

14.3 Transport Hazard Classes

no hazardous material as defined by the transport regulations

14.4 Packaging Group

no hazardous material as defined by the transport regulations

Maritime Transport (IMDG):

14.1 UN Number

no hazardous material as defined by the transport regulations

14.2 UN Proper Shipping Name

no hazardous material as defined by the transport regulations

14.3 Transport Hazard Classes

no hazardous material as defined by the transport regulations

14.4 Packaging Group

no hazardous material as defined by the transport regulations

Air Transport (ICAO):

14.1 UN Number

no hazardous material as defined by the transport regulations

14.2 UN Proper Shipping Name

no hazardous material as defined by the transport regulations

14.3 Transport Hazard Classes

no hazardous material as defined by the transport regulations

14.4 Packaging Group

no hazardous material as defined by the transport regulations

14.5 Environmental Hazards

HAZARDOUS TO THE ENVIRONMENT: no

14.6. Special Precautions for Users

Keep container tightly closed.

14.7. Transport in Bulk According to Annex II of MARPOL and the IBC Code

not applicable

15. Legal Regulations**15.1 Safety, Health and Environmental Protection Regulations and Specific Legal Regulations for the Substance or Mixture****EU Regulations:**

data concerning the IE Directive 2010/75/EC (VOC)] <3%

National Regulations:

Application restrictions:

Follow the employment restrictions for adolescents (§ 22 of the youth employment law (JArb-SchG)). Follow the employment restrictions for child bearing and nursing mothers (§§ 11 and 12 Maternity Protection Act (MuSchG)).

Technical instructions air I:

5.2.5: Organic substances expressed as total carbon at m \geq 0.50kg/h: Conc. 50mg/m³

Percentage:

Water hazard class:

2 – significantly hazardous to water

Additional Requirements:

the trade association health and safety at work rules (BGR) BGR 190, BGR 192, BGR 195

15.2 Chemical Safety Assessment

Chemical safety assessments for substances in this mixture have not been performed.

16. Other Information**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
IATA:	International Air Transport Association
GHS:	Globally Harmonized 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
LC50:	Lethal concentration, 50%
LD50:	Lethal dose, 50%

Wording of H- and EUH-Phrases (Number and Full Text):

H226	Flammable liquid and vapour.
H302	Harmful if swallowed.
H317	May cause an allergic skin reaction.
H318	Causes severe eye damage
H336	May cause drowsiness and dizziness.
H373	May cause damage to organs through prolonged or repeated exposure.
H411	Toxic to aquatic organisms with long lasting effects.

Further Information:

The information contained herein is based on current knowledge and experience. The information do not constitute any guarantee with regard to product properties and do not create a contractual legal relationship. Existing laws and regulations are to be observed by the recipient of our products on his own responsibility.

(The data for the hazardous ingredients were taken respectively from the last version of the sub-contractor's safety data sheet.)