

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

Revision: 2

Revision Date: 08.05.2017 SW

1. Chemical product and company identification

Product name:
LiWa Iso Step 2

Application of the product:
(Isolating liquid for building a layer of plaster)

Manufacturer:
Willmann + Pein GmbH

Street:
Schusterring 35

Zip-Code / Town
25355 Barmstedt

Contact for technical Information:
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Emergency Information (24 hours)
Dr. Wolfgang Willmann
Phone: +49 (0) 170 405 30 52

2. Hazard Identification**2.1 Classification of the substance or mixture**

According to Regulation (EC) No. 1272/2008:

H225	Highly flammable liquid and vapour.
Skin irrit. 2	causes skin irritation
STOT RE 2	may cause damage to organs through prolonged or repeated exposure
Repr. 2	Suspected of damaging fertility or the unborn child.
- Aquatic Chronic 2	Toxic to aquatic life with long lasting effects
- STOT SE 3	May cause drowsiness or dizziness



Gefahr



Achtung



Achtung



H225	Highly flammable liquid and vapour
P210	Keep away from heat, hot surfaces, sparks, open flames and other ignition sources. No smoking.
P233	Keep container tightly closed.
P240	Ground/bond container and receiving equipment.
P241	Use explosion-proof electrical/ventilating/lighting/.../equipment.
P242	Use only non-sparking tools.
P243	Take precautionary measures against static discharge.
P280	Wear protective gloves/protective clothing/eye protection/face protection.
P303+P361+P353	IF ON SKIN (or hair): Take off immediately all contaminated clothing. Rinse skin with water/shower.

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P370+P378 P403+P235 P501	In case of fire: Use...to extinguish. Store in a well-ventilated place. Keep cool. Dispose of contents/container to....
H315 P264 P302+P352 P321 P332+P313 P362+P364	Causes skin irritation Wash...thoroughly after handling. IF ON SKIN: Wash with plenty of water/... Specific treatment (see...on this label) If skin irritation occurs: Get medical advice/attention. Take off contaminated clothing and wash it before reuse.
H373 P260 P314	May cause damage to organs through prolonged or repeated exposure Do not breathe dust/fume/gas/mist/vapours/spray. Get medical advice/attention if you feel unwell.
H361 P201 P202 P308+P313 P405	Suspected of damaging fertility or the unborn child. Obtain special instructions before use. Do not handle until all safety precautions have been read and understood. If exposed or concerned: Get medical advice/attention. Store locked up.
H411 P273 P391	Toxic to aquatic life with long lasting effects. Avoid release to the environment. Collect spillage.

3. Composition/Information on Ingredients

Chemical characterization

Description: Isolating material based on n-hexane

Hazardous Ingredients:			
CAS: 110-54-3	n-hexane	Xn, F; N, R 11-38-48	75-90%
EINECS: 201-159-0		20-62-51/53-65-67	

Additional Indications:

The accent of the mentioned risk-advice is to see at chapter 16.

4. First-Aid-Measures

After Inhalation:

supply fresh air, in case of disorders contact physician.

After skin contact:

Rinse with plenty of water, wash with water and soap

After eye contact:

Rinse with plenty of water while eyes are opened. In case of continuing disorders contact a physician.

After swallowing:

Effect vomiting, immediately contact a physician.

5. Fire-Fighting-Measures

Suitable extinguishing media:

CO₂, dry powder or water spray. Combat large fires with waterspray-stream or with alcoholresistant foam.

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For safety reasons not suitable extinguishing media:

Full water-stream, Water

Spezial hazard caused by the substance, it's buring products or accuring gases:

At heating or in case of fire the building of toxic-gases is possible. Carbon monoxide (CO)

Special protective equipment:

No special equipment required.

6. Accidental release measures**Personal precautions:**

Wear protective equipment. Keep exposed persons away.

Environmental preautions:

Avoid diffusion into sewerage and cellars. If diffused into bodies of water or sewerage inform responsible public authorities

Methods for cleaning/asorption:

Pick up with liquid-binding material (for ex. Sand, diatomaceous earth, universal-binding material, saw-dust).

Dispose contaminated material as waste according to point 13. Do not flush away with water or cleaning agents

Additional Advice:

No release of hazardous goods.

7. Handling and Storage**Handling:****Indications for safety handling:**

Keep container tightly closed. Take care of sufficient aeration / offtake at working place. Avoid aerosol building

Indications for fire- and explosion-prevention:

Keep source of ignitions away - do not smoke. Take measures against electrostatical charge.

Storing:**Demands to stockrooms and containers:**

Store at a cool place.

Indications for combined-storage:

Not required.

Further details for storage-conditions:

Store tightly closed container in a cool and dry place.

8. Exposure Controls/Personal Protection**Additional advice for composition of technical constructions:**

Not further details, see point 7.

Constituent parts with working-place oriented, to be controlled limit values:	
110-54-3 n-Hexane	
MAK	180 mg/m ³ , 50 ml/m ³
	Y; DFG

Additional advice:

At preparation valid lists are based.

Personal protective:**General protection- and hygenic measures:**

Store away from foods, drinks and feeding stuff.

Take off dirty, moisted clothes immediately.

Wash hands before pauses and after work.

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Avoid contact with eyes.
 Avoid contact with eyes and skin.

Breath protection:

Not required

Hand-protection:

The protection-glove-material has to be impermeable and resistant against the product/material/preparation. The choice of the protection-glove-material has to be adhered to the penetration-time/permeation-time and the degradation.

Protection-glove-material:

The choice of a proper protection is not only dependant of the material but also of further attributes and different from manufacturer to manufacturer. Because the product is a mixture of several materials the constancy of the protection-glove-material is not predictable and must be proofed before using.

Penetration-time of the Protection-Glove-Material:

The exact penetration-time is to be known from the manufacturer and to be adhered.

For permanent contact in application areas without raised risk of injury (f. ex. laboratory) protection-gloves out of following materials are dedicated:

PVA (Polyvinylalcohol)

For permanent contact of maximal 15 minutes Protection-Gloves out of the following Materials are practible:

Butyl rubber
 Fluor rubber (Viton)
 Nitril rubber
 Chloroprene rubber
 Protection-gloves made of neoprene.

Eye-protection:

not absolutely required.

Body-protection:

Slightly protection-wear.

9. Physical and chemical Properties

Appearance:

Form: Liquid on inert base
Colour: Colourless
Odour: like gasoline

Safety relevant data:

Melting point/area: Not defined
Boiling point/area: 69°C
Flashpoint: -26°C
Ignition point: 240°C
Self-inflammable: The product is not self-inflammable.
Explosion-risk: The product is not explosive, but a building of explosion-risk steams/air-mixtures is possible.

Explosion-limit:

Lower: 1,2 Vol %
Upper: 7,4Vol%
Vapour-pressure at 20°C: 160 hPa
Density at 20°C: 0,7 g/cm³
Solubility/miscibility with water: not or rather sparse miscible

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Contents of solubilities:

Organic solubility:	81,0%
Solid-body-contents:	19,0%

10. Stability and Reactivity**Conditions to avoid:**

No decomposition if used and stored conventionally.

Hazardous reactions:

No hazardous reactions known.

Hazardous decomposition-products:

None

11. Toxicological information**Acute toxicity:****Primary irritation:**

At skin:	Irritating to skin and mucous membrane
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At eyes:	Not Irritating
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Sensitization:	No sensitization affect known.
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Kinetic of the toxic reaction:

According the new Material Safety Data Sheet according to REACH, specifications about kinetic of the toxic reaction, metabolism of the substance and allocation of the substance in the human body must be mentioned at this place. Data for this is not available .

Experience of the practice:

No data existing

Further detail:

The product is to be handled with the usual care when handling chemicals. The product is to be labelled.

Additional toxicological advices:

Based on the Analysis of the broadly categorization-rules of the EC for compositions in final valid version the products features following dangers: Irritating

12. Ecological information**General data:**

Water-hazardous-class (calculated accord. VwVwS):	Slightly water-dangerous
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Do not attain into ground-water, water-bodies or sewer-sytem if not undilated.

Ecotoxic effects:

Fish toxicity:	no data existing
Water organism:	no data existing
Daphnia toxicity:	no data existing
Mobility:	no data existing

Further details to ecology:

Do not allow product to reach ground water or sewage system.

Bioakkumulation potential:

No data available

Effect of the determination of the PTB- and vPvB-Report:

Endocrine disruption potential

If the material causes hormonal effects or prevents them is unknown.

13. Disposal considerations**Product:****Recommendation:**

Dont dispose together with domestic-waste. Do not drain into sewer-system.

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Disposal key according to AVV Regulation

European Waste Catalogue	
18 01 06	Chemicals, made of, or consisting hazardous materials

Uncleaned Packagings:**Recommendation:** Dispose according to the official rules.**Packagings:**

Packages that are not contaminated can be recycled

14. Transport informations/rules**Road Transport ADR, RID and GGVS/GGVE (cross border/national):****Land transport ADR/RID**

Classification

Class: 3 inflammable liquid materials

UN-Number: 1866

Classification code: -

Description of the good: Resin Solution

Hazard cause: -

Packaging

Packaging group: II

Hazard sheet: 3

Limited Quantities: no information

Maritime transport IMDG/GGVSea

IMDG/GGVSea Class: 3

UN-Number: 1866

EmS: F-E, S-E

Marine Pollutant: None

Description of the good: Resin Solution

Hazard cause: -

Packaging

Packaging group: II

Air transport ICAO-TI and IATA-DGR

ICAO/IATA-Class: 3

UN-Number: 1866

Description of the good: Resin Solution

Hazard cause: -

Packaging group: II

Hazard sheet: not applicable

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15. Regulatory Information

Hazardous appointing components for labelling
n-Hexane

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P501	Dispose of contents/container to....
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P264	Wash...thoroughly after handling.
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P362+P364	Take off contaminated clothing and wash it before reuse.
H373	May cause damage to organs through prolonged or repeated exposure
P260	Do not breathe dust/fume/gas/mist/vapours/spray.
P314	Get medical advice/attention if you feel unwell.
H361	Suspected of damaging fertility or the unborn child.
P201	Obtain special instructions before use.
P202	Do not handle until all safety precautions have been read and understood.

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P308+P313 If exposed or concerned: Get medical advice/attention.
P405 Store locked up.

H411 Toxic to aquatic life with long lasting effects.
P273 Avoid release to the environment.
P391 Collect spillage.

National Rules:**Technical Direction Air:**

class	contingent %
II	<1
III	75-90
NK	0,5

Water-Hazardous-Class: WGK 1 (categorization per list: VwVwS): Slightly water dangerous.

16. Other information

Further applicable EG Guidelines

Guideline for preparation (1999/45/EC), at last changed by the guideline 2006/8/EC.
Substance Guideline (67/548/EWG), at last changed by the guideline 2006/121 EC.
REACH-Guideline (EC) No. 1907/2006

Manufacturer's suggested application restriction:

For use of dental technicians only

Department issuing MSDS:

Dr. Wolfgang Willmann (Phone: +49 (0) 41 23 – 9228 0)

Additional Information:

Origin: ¹ <http://www.baua.de>

² <http://www.arbeitssicherheit.de>

Changes compared to the last version

Assimilation according REACH-Regulation (EC) No. 1907/2006

Some of the information presented and conclusions drawn herein are from sources other than direct test-data on the product itself.

The contents and format of this MSDS are in accordance with EEC Commission (EC) No. 1907 / 2006.

Disclaimer of Liability

The information in this MSDS was obtained from sources which we believe are reliable. However, the information is provided without any warranty, express or implied, regarding its correctness.

The conditions or methods of handling, storage, use or disposal of the product are beyond our control and may be beyond our knowledge.

For this and other reasons, we do not assume responsibility and expressly disclaim liability for loss, damage or expense arising out of or in any way connected with the handling, storage, use or disposal of the product.

This MSDS was prepared and is to be used only for this product. If the product is used as a component in another product, this MSDS information may not be applicable.

Safety Data Sheet certifying division

technical department

Contact person:

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