

# Material Safety Data Sheet

According to regulation (EC) No. 1907/2006 (REACH)

# Labshop

Chemicals, Restoration and Art Supplies

## 76805 Polyurethane Dispersion PU 52

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Revised edition: 18.12.2015

Version: 3.5

Printed: 10.05.2016

### 1. Identification of the Substance/Mixture and of the Company/Undertaking

#### 1.1. Product Identifier

Product Name: Polyurethane Dispersion PU 52

Article No.: 76805

#### 1.2. Relevant identified Uses of the Substance or Mixture and Uses advised against

Identified uses:

Binding agent

Uses advised against:

#### 1.3. Details of the Supplier of the Safety Data Sheet (Producer/Importer)

Company: Interlabshop B.V.  
Address: Lage Brink 23, 7317 BD Apeldoorn The Netherlands  
Tel./Fax.: Tel. +3155-5215016  
Internet: www.Labshop.nl  
EMail: labshop@labshop.nl

1.4. Importer: --

Emergency No. --

Emergency No.: --

### 2. Hazards Identification

#### 2.1. Classification of the Substance or Mixture

Classification according to EC Regulation 1272/2008

Skin irritation, hazard category 2  
Eye irritation, category 2  
Specific Target Organ Toxicity (single exposure), category 3

H315 Causes skin irritation.

Cat.: 2

H319 Causes serious eye irritation.

Cat.: 2

H335 May cause respiratory irritation.

Cat.: 3

Classification according to EC Regulation No. 67/548 or No. 1999/45

Irritating (Xi) R36 Irritating to eyes.

Irritating (Xi) R37 Irritating to respiratory system.

Irritating (Xi) R38 Irritating to skin.

Safety Phrases:

Possible Environmental Effects:

See Section 12.

#### 2.2. Label Elements

Classification according to EC Regulation 1272/2008

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*Hazard designation:*



GHS07-1

*Signal word:*

Warning

*Hazard designation:*

H315	Causes skin irritation.
H319	Causes serious eye irritation.
H335	May cause respiratory irritation.

*Safety designation:*

P280	Wear protective gloves/ clothing/ eye/ face protection.
P312	Call a poison center or physician if you feel unwell.
P337+P313	If eye irritation persists: Get medical advice/ attention.

*Hazardous components for labelling:*

Triethylamine

### 2.3. Other Hazards

*EUH208: contains 1,2-Benzisothiazol-3(2H)-one. Can cause allergic reactions.*

## 3. Composition/Information on Ingredients

### 3.1. Substance

### 3.2. Mixture

*Chemical Characterization:* Aqueous polyurethane dispersion.

*Hazardous Ingredients:*

Triethylamine (C,Xn; R20/21/22-35; H225-302-311-331-314); REACH Reg. No. 01-2119475467-26-xxxx	1 - 1.5 %	CAS-Nr: 121-44-8 EINECS-Nr: 204-469-4 EC-Nr: 612-004-00-5
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1,2-Benzisothiazol-3(2H)-one (Xn,N; R22-38-41-43-50; H302-315-317-318-400)	< 0.01 %	CAS-Nr: 2634-33-5 EINECS-Nr: 220-120-9 EC-Nr: 613-088-00-6
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*Additional information:*

## 4. First Aid Measures

### 4.1. Description of the First Aid Measures

*General information:*

Seek medical attention in case of complaints.  
Show this safety data sheet to the doctor in attendance.

*After inhalation:*

Supply fresh air. Consult physician if symptoms persist.

*After skin contact:*

Wash with soap and rinse with plenty of water.

*After eye contact:*

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*Rinse open eyes with plenty of water for at least 15 minutes.  
Consult physician.*

*After ingestion:*

*If symptoms persist consult physician.*

### 4.2. Most important Symptoms and Effects, both Acute and Delayed

*Symptoms:*

*Irritates eyes, skin and respiratory system.*

*Skin contact: causes irritation and sensitization.*

*Effects:*

*No further information available.*

### 4.3. Indication of any Immediate Medical Attention and special Treatment needed

*Treatment:*

*Symptomatic treatment (decontamination, vital functions), no specific antidote known.*

---

## 5. Fire-Fighting Measures

### 5.1. Extinguishing Media

*Suitable extinguishing media:*

*CO<sub>2</sub>, extinguishing powder, water jet.*

*Fight larger fire with water jet or alcohol resistant foam.*

*Unsuitable extinguishing media:*

### 5.2. Special Hazards arising from the Substance or Mixture

*Special hazards:*

*Formation of hazardous decomposition products at high temperatures.*

*In case of fire: formation of hazard fumes possible, e.g. carbon monoxide (CO), hydrogen cyanide (HCN), toxic gases/vapors.*

### 5.3. Advice for Firefighters

*Protective equipment:*

*Wear self-contained respiratory protective device.*

*Further information:*

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## 6. Accidental Release Measures

### 6.1. Personal Precautions, Protective Equipment and Emergency Procedures

*Personal precautions:*

*Avoid contact with skin, eyes and clothing. Do not ingest or inhale.  
Wear protective clothing.*

### 6.2. Environmental Precautions

*Environmental precautions:*

*Prevent contamination of soils, drains and surface water.*

### 6.3. Methods and Material for Containment and Cleaning Up

*Methods and material:*

*Contain with absorbent material (sand, diatomaceous earth,*

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*universal absorbent, Oil Dri) and dispose accordingly.*

### 6. 4. Reference to other Sections

*For information for safe handling see Section 7.*

*Protective clothing, see Section 8.*

*See Section 13 for information on disposal.*

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## 7. Handling and Storage

### 7. 1. Precautions for Safe Handling

*Instructions on safe handling:*

*Avoid contact with eyes, skin and clothing.*

*Provide adequate ventilation.*

*Hygienic measures:*

*Do not eat or drink during work. Do not smoke.*

*Take off contaminated clothing immediately and reuse only after thoroughly cleaning these.*

### 7. 2. Conditions for Safe Storage, including any Incompatibilities

*Storage conditions:*

*Protect from frost.*

*Keep container tightly closed*

*Requirements for storage areas and containers:*

*No special measures necessary.*

*Information on fire and explosion protection:*

*No special measures necessary.*

*Storage class (VCI):*

*12; Non-combustible liquids*

*Further Information:*

### 7. 3. Specific End Use(s)

*Further information:*

*No information available.*

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## 8. Exposure Controls/Personal Protection

### 8. 1. Parameters to be Controlled

*Parameters to be controlled (DE):*

*Triethylamine, CAS 121-44-8*

*MAK (TRGS 900): 4,2 mg/m<sup>3</sup>; 1 ml/m<sup>3</sup>*

*Parameters to be controlled:*

*Derived No-Effect Level (DNEL):*

*Triethylamine (CAS 121-44-8): 8.4 mg/m<sup>3</sup> (worker, inhalation, long-term exposition - systemic effects)*

*Predicted No-Effect Concentration (PNEC):*

*Triethylamine (CAS 121-44-8):*

*Fresh water: 0.064 mg/l*

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*Sea water: 0.0064mg/l*  
*Fresh water sediment: 0.1992 mg/kg*  
*Soil: 2.361 mg/kg*  
*Sewage treatment system (STP): 100 mg/l*  
*Periodic release: 0.064 mg/l*

*Additional Information:*

### 8.2. Exposure Controls

*Technical protective measures:*

*No further measures, see Section 7.*

*Personal Protection*

*General protective measures:*

*The usual precautionary measures are to be adhered to when handling chemicals.*

*Respiratory protection:*

*Respiratory equipment required in case of insufficient ventilation, filter type A.*

*Hand protection:*

*Protective gloves. The glove material has to be impermeable and resistant to the product / substance / preparation.*

*Protective glove material:*

*Nitrile rubber (480 min, 0.4 mm)*  
*Fluoro carbon rubber - FKM (480 min, 0.7 mm).*

*Eye protection:*

*Tightly fitting safety goggles (EN 166).*

*Body protection:*

*Protective clothing.*

*Environmental precautions:*

*Prevent contamination of open water ways and sewage system.*  
*Avoid contamination of ground water.*

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## 9. Physical and Chemical Properties

### 9.1. Information on Basic Physical and Chemical Properties

*Form: liquid*

*Color: yellowish*

*Odor: characteristic*

*Odor threshold: No information available.*

*pH-Value: 7.5 - 8.5*

*Melting temperature: 0°C*

*Boiling temperature: 100°C*

*Flash point: not applicable*

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*Evaporation rate:*

*not applicable*

*Flammability (solid, gas):*

*not applicable*

*Upper explosion limit:*

*not determined*

*Lower explosion limit:*

*not determined*

*Vapor pressure:*

*23 hPa (20°C)*

*Vapor density:*

*This product is a non-volatile solid.*

*Density:*

*1.05 g/cm<sup>3</sup> (20°C)*

*Solubility in water:*

*miscible*

*Coefficient of variation (n-Octanol/Water):*

*not determined*

*Auto-ignition temperature:*

*not applicable*

*Decomposition temperature:*

*not determined*

*Viscosity, dynamic:*

*20 - 500 mPa.s (20°C)*

*Explosive properties:*

*Product does not present an explosion hazard.*

*Oxidizing properties:*

*no information available*

*Bulk density:*

*not determined*

### 9.2. Further Information

*Solubility in solvents:*

*Viscosity, kinematic*

*Burning class:*

*Solvent content:*

*Solid content: 38 - 40 %*

*Particle size:*

*Other information:*

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## 10. Stability and Reactivity

### 10.1. Reactivity

*Stable if used according to specifications.*

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### 10.2. Chemical Stability

*Triethylamine is released during the application and drying processes.*

### 10.3. Possibility of Hazardous Reactions

*No information available.*

### 10.4. Conditions to Avoid

*Conditions to avoid:*

*No information available.*

*Thermal decomposition:*

*No data available.*

### 10.5. Incompatible Materials

*No information available.*

### 10.6. Hazardous Decomposition Products

*No information available.*

### 10.7. Further Information

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## 11. Toxicological Information

### 11. 1. Information on Toxicological Effects

*Acute Toxicity*

*LD50, oral:*

*Triethylamine: 730 mg/kg (rat)*

*1,2-Benzisothiazol-3(2H)-one: 1193 mg/kg (rat)*

*LD50, dermal:*

*Triethylamine: 580 mg/kg (rabbit)*

*1,2-Benzisothiazol-3(2H)-one: 580 mg/kg (rat)*

*LC50, inhalation:*

*Triethylamine: 7.1 mg/kg (Ratte)*

*Primary effects*

*Irritant effect on skin:*

*Irritating to skin.*

*Irritant effect on eyes:*

*Irritating to eyes.*

*Inhalation:*

*Irritates the respiratory tract.*

*Ingestion:*

*Sensitization:*

*May cause sensitization by skin contact.*

*Mutagenicity:*

*No data available.*

*Reproductive toxicity:*

*No data available.*

*Cancerogenity:*

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*Under certain circumstances triethylamine can form nitrosamines with nitrosing agents (e.g. nitrates, nitrogen oxides). Nitroamines have shown cancerogenic effects in animal studies.*

**Teratogenicity:**

*No information available.*

**Specific target organ toxicity (STOT):**

*No data available.*

**Additional toxicological information:**

*Triethylamine:*

*Skin contact: risk of skin absorption.*

*Triethylamine causes liver and kidney damage in laboratory animals.*

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**12. Ecological Information****12.1. Aquatic Toxicity****Fish toxicity:**

*Triethylamine: LC50: 36 mg/ml (96h, Oncorhynchus mykiss)*

*Triethylamine: NOEC: 3.2 mg/l (60d, Oncorhynchus mykiss)*

*1,2-Benzisothiazol-3(2H)-one: LC50: 2.18 mg/ml (96h, Oncorhynchus mykiss)*

**Daphnia toxicity:**

*Triethylamine: LC50: 17 mg/l (48h, Ceriodaphnia Dubia)*

*Triethylamine: NOEC: 7.1 mg/l (7d, Ceriodaphnia Dubia)*

*1,2-Benzisothiazol-3(2H)-one: EC50: 2.94 mg/ml (48h, Daphnia magna)*

**Bacteria toxicity:**

*Triethylamine: EC50: 95 mg/l (17h, Pseudomonas putida)*

**Algae toxicity:**

*1,2-Benzisothiazol-3(2H)-one: ErC50: 011 mg/l (72h, Pseudokirchneriella subcapitata)*

**12.2. Persistency and Degradability**

*No data available for the mixture.*

*Treiethylamin is readily biodegradable.*

**12.3. Bioaccumulation**

*No information available.*

**12.4. Mobility**

*No information available.*

**12.5. Results of PBT- und vPvP Assessment**

*According to Annex VIII to Regulation (EC) No. 1907/2006 (REACH): this product is neither a PBT (persistent/bioaccumulative/toxic) or vPvB (very persistent/very bioaccumulative/very toxic) substance nor does it contain a PBT or vPvB substance.*

**12.6. Other Adverse Effects****Water hazard class:**

*1, slightly hazardous*

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*Do not let product contaminate ground water, waterways or sewage system.*

*Behaviour in sewage systems:*

*Further ecological effects:*

*AOX Value:*

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### 13. Disposal Considerations

#### 13.1. Waste Treatment Methods

*Product:*

*Must not be disposed together with household garbage.*

*Do not let product enter water systems.*

*Dispose of according to official national and local regulations.*

*European Waste Code (EWC):*

*Uncleaned packaging:*

*Dispose of according to official local regulations.*

*Waste Code No.:*

---

### 14. Transport Information

#### 14.1. UN Number

*ADR, IMDG, IATA*

#### 14.2. UN Proper Shipping Name

*ADR/RID:*

*No hazardous goods according to ADR (land transportation).*

*IMDG/IATA:*

*No hazardous goods according to IMDG.*

#### 14.3. Transport Hazard Classes

*ADR Class:*

*not applicable*

*Hazard no.:*

*Classification code:*

*Tunnel no.:*

*IMDG Class (sea):*

*Hazard no.:*

*EmS No.:*

*IATA Class:*

*not applicable*

*Hazard no.:*

#### 14.4. Packaging Group

*ADR/RID:*

*not applicable*

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*IMDG:*

*IATA:*

**14. 5. Environmental Hazards**

*None*

**14. 6. Special Precautions for User**

*Not classified as a dangerous good under transport regulations.*

**14. 7. Transportation in Bulk according to Annex II of MARPOL 73/78 and IBC-Code**

*not applicable*

**14. 8. Further Information**

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**15. Regulatory Information**

**15. 1. Safety, Health and Environmental Regulations/Legislation specific for the Substance or Mixture**

*Water hazard class:*

*1, slightly hazardous for water (self-assessment)*

*Local regulations on chemical accidents:*

*Employment restrictions:*

*The employment restrictions for young workers in accordance with the Youth Employment Protection Law (94/33/EC) are to be observed.*

*Restriction and prohibition of application:*

*Technical instructions on air quality:*

**15. 2. Chemical Safety Assessment**

*A Chemical Safety Assessment is not necessary for this product.*

**15. 3. Further Information**

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**16. Other Information**

*This product should be stored, handled and used in accordance with good hygiene practices and in conformity with any legal regulations. This information contained herein is based on the present state of knowledge and is intended to describe our product from the point of view of safety requirements. It should be therefore not be construed as guaranteeing specific properties.*