MATERIALS FOR BLOCK-MOULD
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1 MODEL PREPARATION

RECKLI MOULD WAX

Application
The release agent are ready-to-use and can be brushed or sprayed. For a safe release 2-3 layers are to be applied. Before application of a following layer the preceding one must be completely dry.

Consumption
approx. 50 g/m²
2
FRONT LAYER POURING TECHNIQUE

RECKLI PUR-ELASTOMER K

Property
elastic

Application
Preparation of the surface according to 1. RECKLI PUR Elastomer K is a two-component liquid resin curing nearly free of shrinkage. Hardener and base component are mixed thoroughly and poured on to the model surface (s. technical data sheet).

Layer thickness depending on the case of application
10-20 mm

Consumption
approx. 1.35 kg/l

Pot life
approx. 15 minutes (200 g)
3
FRONT LAYER
BRUSHING TECHNIQUE

3.1
RECKLI EPOXY OH
RECKLI EPOXY OH SCRATCH-RESISTANT

Property
hard

Application
RECKLI Epoxy OH is a hard, impact-resistant gelcoat resin being applied onto the model surface in two layers. We suggest to add a small quantity of pigment paste to one of the layers, so that the layer thickness can be controlled easier.

Total layer thickness
approx. 2-3 mm

A bonding layer is applied between the Epoxy OH gel-coat layer and the backing (v. 4.2). The backing is stamped into the wet bonding layer (v. 5).

Consumption
approx. 1.5 kg/m² per mm layer thickness

Pot life
approx. 20-30 minutes (200 g)
3.2

RECKLI PUR ELASTOMER THIX

Property
elastic

Application
RECKLI PUR Elastomer thix is a two-component putty resins. RECKLI PUR Elastomer thix results into a layer thickness of approx. 1 mm per operation. A bonding layer (v. 4.1) is to be applied between frontlayer and backing (v. 5).

Consumption
approx. 1.4 kg/m² per mm layer thickness

Pot life
approx. 8-10 minutes (200 g)
4

BONDING LAYERS

4.1

RECKLI CONSTRUCTION RESIN EP
RECKLI EPOXY PB

Surface
Flexible front-layer

Working steps
The bonding layer's function is to form a strong and firm bond between the cured, elastic front-layer of RECKLI PUR Elastomer or RECKLI PUR Elastomer thix and the backing. The best bonding values are achieved, if glass fibres are added to and mixed with RECKLI Construction Resin EP or RECKLI Epoxy PB until there is a pasty consistency like sauerkraut. This pasty mass is manually applied onto the front-layer, whereas the hands are to be protected by rubber gloves. The backing material is stamped into this fresh bonding layer.

Layer thickness
approx. 2-3 mm

Recipe
Construction Resin EP or Epoxi PB 80 % 1000 g/l
Glass fibres 3-5 mm 20 % 250 g/l

Consumption
approx. 1.5-2.0 kg resin per m² for 2-3 mm layer thickness

Pot life
Construction Resin EP approx. 40-50 minutes (200 g)
Epoxy PB approx. 30-35 minutes (200 g)
In order to get a bonding layer for hard surfaces, a certain quantity of quartz powder depending on the powder’s ingredients is added to RECKLI Construction Resin EP or RECKLI Epoxy PB until there is a pasty, consistency suitable for painting. This filled resin mass is painted onto the hard front-layer.

**Layer thickness**
approx. 2-3 mm

The backing material is stamped into this fresh bonding layer.

**Recipe**
- Construction Resin EP or Epoxy PB: 65% 1000 g/l
- Quartz powder W 1: 35% 250 g/l

**Consumption**
approx. 1.5-2.0 kg resin per m² for 2-3 mm layer thickness

**Pot life**
- Construction Resin EP approx. 40-50 minutes (200 g)
- Epoxy PB approx. 30-35 minutes (200 g)
5

BACKINGS

EPOXY MORTAR

5.1 RECKLI CONSTRUCTION RESIN EP

Property
Temperature resistance 40 °C

Application
RECKLI Construction Resin EP and RECKLI Epoxy PB are binders based on epoxy resins for the manufacture of polymer concrete. For making backings with high exactness of measurements, the binder can be mixed with quartz sand with varying grain sizes from 0.2 mm. Light backings with a specific gravity of approx. 0.6 g/cm³ can be produced by using RECKLI Filler L instead of quartz sand.

Pot life
Construction Resin EP approx. 40-50 minutes (200 g)
Epoxy PB approx. 30-35 minutes (200 g)

Recipe quartz sand backing
Specific gravity approx. 1.8 g/cm³

Quartz sand 0.2-1 mm 90-95 % 1.62-1.71 kg/l
Construction Resin EP or Epoxy PB 10-15 % 0.18-0.09 kg/l

5.2 RECKLI EPOXY PB

Property
Temperature resistance 90 °C

Recipe light-filler backing
Specific gravity approx. 0.6 g/cm³

Filler L 65 % (according to weight) 0.4 kg/l
Construction Resin EP or Epoxy PB 35 % (according to weight) 0.2 kg/l

0.6 kg/l
6 SUPPORT MOULDS GRP TECHNIQUE

RECKLI EPOXY SUPPORTING MASS EP-F TYPE VB

Property
GRP Stamping Material, Temperature resistance 75 °C

Application
For manual production of thin-walled support moulds we suggest to firstly paint the fine layer RECKLI Epoxy OH onto the model surface before putting on the nearly dry stamping mass EP-F Type VB (consistency like sauerkraut). The closed fine layer smoothens the rough-fibred bearing layer EP-F Type VB on the surface.

This makes releasing and cleaning easier and reduces the danger of injuries by protruding fibres. The front and the back side are to be smoothened by RECKLI Epoxy OH.

RECKLI Supporting Mass EP-F Type VB is mixed manually (hands protected by rubber gloves) and applied in a layer thickness of 10 mm.

Consumption
6.0 kg/m² (10 mm layer)

Pot life
approx. 45-55 minutes (1000 g)
GYPSUM RELEASE AGENT

RECKLI GYPSUM RELEASE AGENT GTM

Property
Release Agent

Application
RECKLI Gypsum Release Agent GTM is a water-based, release agent with only little affects to the environment. It is used for release between block-mould surfaces made of RECKLI PUR Elastomers, RECKLI silicone rubbers or RECKLI epoxy resins and plaster. When this release agent is used, there is no swelling of the block-mould surfaces. The absorption capacity of the gypsum mould is hardly affected.

Consumption
approx. 50 g/m²
ADHESIVE FOR MOULD MAKING

RECKLI ADHESIVE PASTE EP

Property
Adhesive paste free of solvents, two components

Application
For low-tension adhesion of hard foam, timber, gypsum, ceramics, especially suitable for gluing of large-volume hard-foam blocks being used for computer-aided design (CAD) of models.

Consumption
approx. 800 g/m²

Pot life
approx. 40-50 minutes (200 g)

PRIMER FOR GYPSUM

RECKLI CONSTRUCTION RESIN EP

Property
Bonding agent between gypsum and RECKLI PUR Elastomer

Application
Bonding agent between gypsum and a front cast of RECKLI PUR Elastomer. A maximum drying time of 3-4 hours should not be exceeded. If it happens, a new application of primer is necessary; in this case the previous layer must be ground for better bonding.

Consumption
approx. 200 g/m²/painting
## PRODUCT OVERVIEW

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<td>Reckli PUR Elastomer K</td>
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<tr>
<td>Mixing Ratio</td>
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<tr>
<td>Specific Gravity</td>
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<td>Pot Life (21°C / 200 G)</td>
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<tr>
<td>Earliest Stripping</td>
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<td>Mass (21°C)</td>
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<td>Modulus</td>
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<td>Hardness Shore A</td>
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<th>POLYURETHANE-ELASTOMERS, PUTTY RESINS</th>
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**Notes as to Consumption Rates and Pot life**

The consumption rates we stated are due to experience from practice. Depending on the actual case of application there may be higher or lower consumption rates than those stated by us.

Our indications on pot life and workable time are to be understood as general directives, too. There is a strong dependency between pot life and the temperature of the material / the surrounding area. The quantity of the mixed material is also an important factor.

Temperatures of 18 °C to 20 °C are the basis for our indications. The mixed quantity is stated behind the pot life. Higher temperatures and larger mixing quantities reduce the workable time proportionally to a great extent.

Please observe the relevant technical pamphlets and our application directions.
## Epoxy Resins, Unfilled Casting Resins

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<tr>
<td>RECKLI Construction Resin EP</td>
<td>Universally suitable colourless two-component resin for nearly all applications in the building or concrete industry e.g. for coatings, as adhesive, bond course or binder for resin-based concrete, mortar or screed and compounds</td>
<td>Mixing Ratio: 2:1, Specific Gravity: 1.10, Water Absorption (24 h): 40-50, Early Stripping (RTFQ): 24-48, Viscosity (MPa.s): 1000-1200, Hardness: 70-75, Temperature Resistance: 40-100°C (Acc. to Martens), Resistance: Resistant</td>
</tr>
<tr>
<td>RECKLI Epoxy PB</td>
<td>Two component resin, transparent, very high resistance to thermal deformation, low viscosity, high filling grades possible, also suitable as binder for polymer concrete</td>
<td>Mixing Ratio: 4:1, Specific Gravity: 1.10, Water Absorption (24 h): 35, Early Stripping (RTFQ): 24-48, Viscosity (MPa.s): 230, Hardness: 140, Temperature Resistance: 60-100°C (Acc. to Martens), Resistance: Resistant</td>
</tr>
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## Epoxy Resins, Putty Resins

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<tr>
<td>RECKLI Adhesive Paste EP</td>
<td>Two component adhesive resin, slightly thixotropic, sticking of wood, card board, nature or artificial stone, several metals and several plastics, colour cream-white</td>
<td>Mixing Ratio: 4:1, Specific Gravity: 0.80, Water Absorption (24 h): 60-70, Early Stripping (RTFQ): 24, Hardness: 25, Temperature Resistance: 40-100°C (Acc. to Martens), Resistance: Resistant</td>
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## Epoxy Resins, Glass-fibre Reinforced

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<tr>
<td>RECKLI Supporting Mass EP-F Type VB</td>
<td>Glass-fibre reinforced two component tamp composition, high resistance to thermal deformation, low specific gravity, for layers up to 30 mm, colour grey</td>
<td>Mixing Ratio: 7:1, Specific Gravity: 0.60, Water Absorption (24 h): 45-55 (1000 g), Early Stripping (RTFQ): 12-24, Hardness: 75, Temperature Resistance: Resistant</td>
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## Release Agents for Mould Making

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<tr>
<td>RECKLI Mould Wax</td>
<td>Solvent containing precious hard wax for the safe separation when making casts of liquid resins on formliners or moulds made of RECKLI PUR Elastomers or RECKLI Epoxies</td>
<td>Approx. 50-100 cm³/m²</td>
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## Release Agents for Various Applications

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<tr>
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<tr>
<td>RECKLI Gypsum Release Agent GTM</td>
<td>Aqueous, non-polluting release agent for moulding gypsum from plastics like RECKLI-PUR Elastomers, -Silicones, -Epoxies, polyethylene or polyesters</td>
<td>Approx. 50 g/m² (on smooth surfaces, spray in fine coats, remove surplus from dips or cavities and pattern bottom)</td>
</tr>
</tbody>
</table>
1 Porcelain industry - Vase
2 Utility ceramics - Lampshade
3 Utility ceramics - Dutch tile for stove
4 Utility ceramics - Dutch tile for stove
5 Sanitary ceramics - Laboratory basin
6 Sanitary ceramics - Wash hand basin
7 Decorative ceramics - Elephant