Wirosil®/Wirosil®plus

Duplicating silicone

Instructions for use

General information

Wirosil® is an addition-cured two-component silicone — Ratio 1:1 — that reproduces master models extremely accurately due to its excellent dimensional stability. With economy flask and stabilisation insert it enables work to be carried out easily and reliably without wasting material. Ideal for duplicating milled areas in combination work.

Processing

Wirosil®: Cut off the nozzles above the marking. After use, always close the nozzles with the caps.

- Mix the Wirosil® 1 and 2 components in the measuring and mixing cup in a ratio of 1:1 until showing a homogeneous colour. No colour reams should be seen. Observe the workable time of about 5 minutes (Wirosil®) and approx. 3 min 30 sec (Wirosil®plus).
- Pour very gently, in a thin stream, the mixed Wirosil® between the master model and the flask border. Follow the flask manufacturer's instructions.
- Depending on the room-temperature, Wirosil® is hardened after 30 to 40 minutes. It is advantageous to harden the Wirosil®-form at about 4 bar in the pressure unit.

Depending on the room-temperature, Wirosil® plus is hardened after 10 to 12 minutes. It is advantageous to harden the Wirosil® plus-form at about 4 bar in the pressure unit.

Important: When working with a pressure unit it has to be observed that the Wirosil®-form and the duplicating model are made under the same pressure-conditions.

 Blow with compressed air (blow-off nozzle) between the Wirosil® mould and the master model. Then draw out the master model.

Note with stronger deformations: For obtaining the full resilience of duplicating silicone, the duplicating should be filled with investmentmaterial about 30 min after removing the master model.

5. For investment material spray Aurofilm wetting agent onto the Wirosil® model.

Let the excess Aurofilm liquid dry at a weak air pressure (blow-off nozzle).

Important: With this technique Aurofilm has to be dried completely, as otherwise the investment material would not wet sufficiently the Wirosil® mould: formation of bubbles!

6. Mix the cobalt-chrome investment material, plaster or resin for models in accordance with processing instructions and pour it slowly into the Wirosil® mould standing on the vibrator.

Important: When a pressure pot is used, the same pressure conditions must be applied when making the Wirosil® model and the duplicate model.

 After setting of the investment material blow with compressed air (blow-off nozzle), between the Wirosil® model and the duplicate model. Then draw out the duplicate model.

Hints for saving material

- 1. Grind master model base to be at least 1 cm high!
- Put small Wirosil® rests remaining from previous duplications in the base such as to leave sufficient space for the liquid Wirosil®.
- Pour only a quantity of Wirosil® into the flask sufficient to cover by 2 mm the upper edge of the teeth row of the master model.

For duplicating the Wirosil® duplicating flask system is highly recommended which enables effective and economical work.

Availability

Basic assortment REF 52000 Wirosil® duplicating system

1 bottle (1 kg) Wirosil® 1

1 bottle (1 kg) Wirosil® 2

1 Wirosil® measuring and mixing bowl

1 Wirosil® spatula

1 Wirosil® duplicating flask, large

1 Wirosil® duplicating flask, small

1 atomizing bottle (100 ml) wetting agent Aurofilm

- 1 atomizing bottle (100 ml) model spray Durofluid
- 1 Wirosil® processing instructions
- 1 instruction for use of duplicating flasks

Individual package

Wirosil® duplicating silicone — REF 52001
1 bottle (1 kg) Wirosil® 1 white
1 bottle (1 kg) Wirosil® 2 light blue

Wirosil®plus REF 54854
1 bottle (1 kg) Wirosil®plus 1 white
1 bottle (1 kg) Wirosil®plus 2 light blue

Large package

Wirosil® duplicating silicone — 1 can (10 kg) Wirosil® 1 **REF 51995** 1 can (10 kg) Wirosil® 2

Accessories

1 Wirosil® duplicating flask, **REF 52072** 1 Wirosil® duplicating flask, **REF 52083** 1 stabilizing ring with 3 inserts for **REF 52079** small duplicating flask large duplicating **REF 52084** flask 1 atomizing bottle (100 ml) Aurofilm wetting agent **REF 52019** 1 atomizing bottle (100 ml) Durofluid model spray **REF 52008**

Wirosil®-data

Processing time about 5 min
Mixing time about 30 sec
Setting time (22 °C or 71 °F) 30 – 40 min
Shore-A hardness (1 hour) 17
Ductile yield 250 %
Contraction (DIN 14356) 0.03 %

Wirosil® plus-data

Processing time about 3 min 30 sec Mixing time about 30 sec Setting time (22 °C) 10-12 min Shore-A-hardness (1 hour) 20 Recovery from deformation 99,8 % Contraction (DIN 14356) 0,01 %

Warrant

Whether given verbally, in writing or by practical instructions, our recommendations for use are based upon our own experience and trials and can only be considered as standard values.

Our products are subject to a constant further development. Therefore alterations in construction and composition are reserved.

