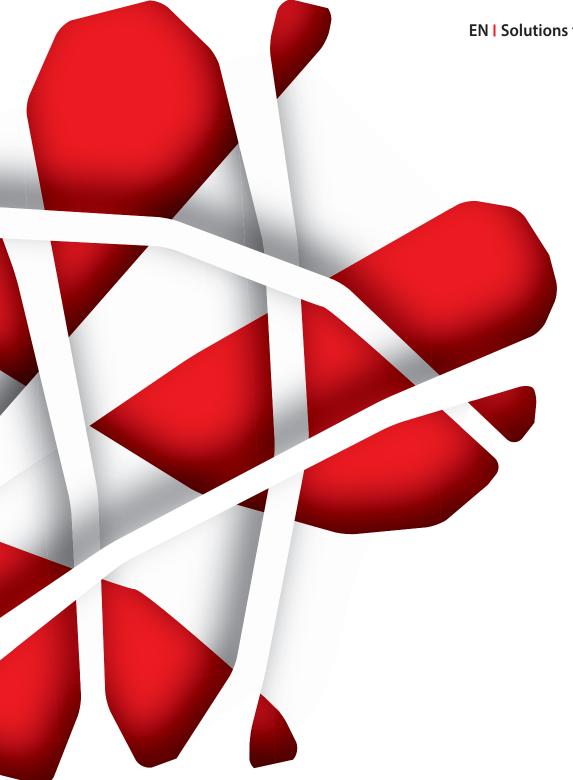


EN | Solutions for the dental laboratory





# Catalogue **2024**





Progress, constantly. Creating value, to make the quality of the products accessible to the world. With creativity, and especially with the ability to transform every challenge into a development opportunity. To dynamically seize the market trends and understand the needs of partners, clients and customers. To make our solutions accessible worldwide. All this is the basis of Zhermack's growth, and since its foundation, over 40 years ago, the company has never ceased to develop and grow.

The clarity of the dream continues to drive Zhermack along this road, to "make you feel confident in everyday life". This is Zhermack's goal and philosophy of life. And it is a dream that is realised every day. Because everything aims at transmitting confidence. The way is charted with the awareness that Zhermack must contribute to improve oral health throughout the world, now and for future generations.

The contribution of Zhermack to people's oral health stems from the value that is given to the quality of its products. A quality that is born from scientific research and from the commitment to continuous education, to reach and always set new goals that contribute to improve the lives of people all over the world.





«Zhermack is a company that is committed with constancy to creating value, to make the quality of its products accessible worldwide. Zhermack's success resides in its ability to be creative, to transform every challenge into a growth opportunity, and to be dynamic, in order to seize the market trends and understand the needs of partners, clients and end customers».

> Paolo Ambrosini General Manager

## Our solutions.

Specific products and solutions for the dental laboratory, conceived exploiting the skills acquired with materials for the dental practice. Starting from development and production of duplication silicones and masks, Zhermack has extended its offer with quality products such as dental stones, resins and investments to satisfy the needs of the numerous laboratory processes involved in the fabrication of fixed and removable prostheses. A system to accompany lab technicians in their daily work.

## We produce measurable results.

Zhermack directly manages all the working stages - from formulation to packaging, from the production of raw materials to the mixing - to produce all its solutions. Validated and controlled processes are the guarantee with which Zhermack is able to offer products that are constant in their characteristics, as well as certified in guality.

This, together with the technological and process integration adopted over time, is what makes Zhermack one of the major producers in the field of dental products.

## Quality, certified. Year after year.

Zhermack meets the needs of its customers, maintaining and improving its Quality Management System day after day. Zhermack started its certification process in 1993.

Today the global regulatory framework is very complex and, to simplify access to the global market for its products, Zhermack has taken a big step in 2018: EN ISO 13485:2016 and MDSAP (Medical Device Single Audit Program) certifications.





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NOTE: The images and texts related to the technical data of the individual products and accessories may be changed during the period of validity of the catalogue. The images are only representative of the showed products. Not all products are sold in every country. For further information on product availability, please contact your local representative.

## Solutions for the dental laboratory



#### Hygiene

Impressions arriving from the dental practice are often contaminated with saliva and blood. Correct disinfection is vital to protect the health of laboratory technicians. Zhermack **disinfectants** with a **broad spectrum of action** are **enhanced with surfactants to improve the flow of the stone during pouring**.

- Zeta 7 Spray (with surfactants)
- Zeta 7 Solution (without surfactants)

#### Model preparation

An accurate model is the basis of every well-made prosthesis.

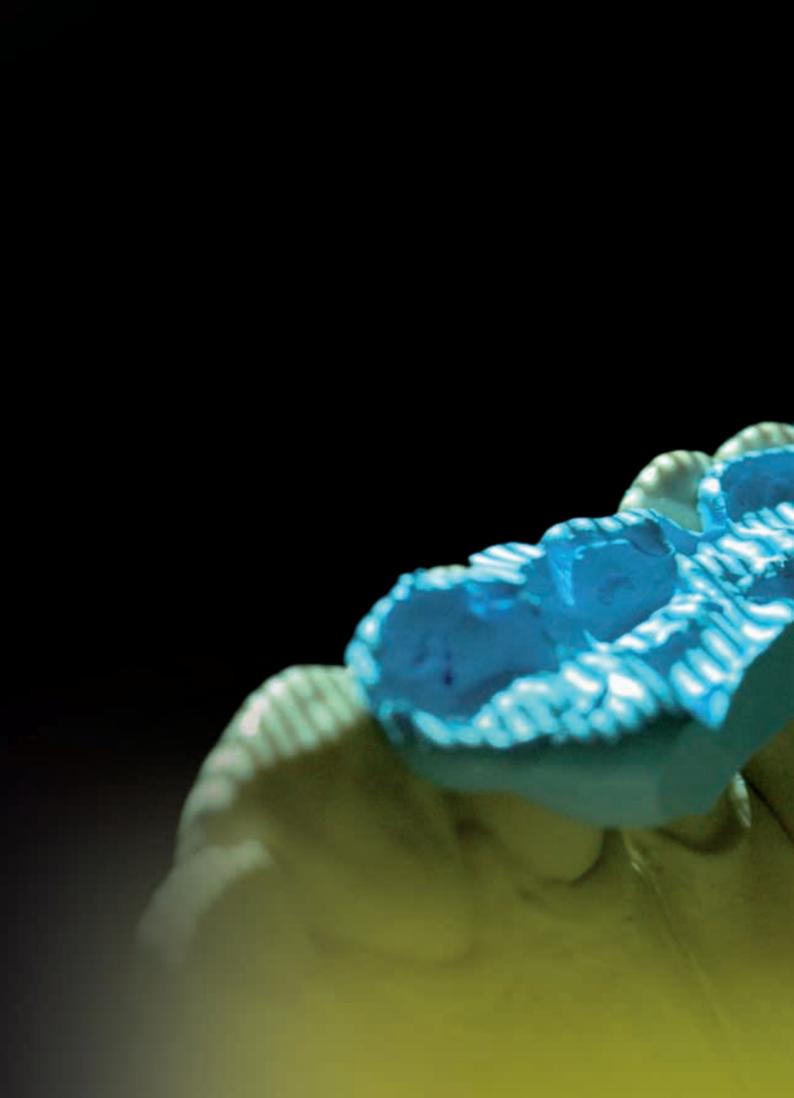
Zhermack offers a **complete system** of impression materials, materials for models and equipment, all developed to be used as a system to ensure maximum precision. It also offers a series of scannable products to facilitate the lab technician's work with **CAD/CAM technology**.

- Platinum
- Zetalabor and Titanium
- Elite Double
- Gingifast
- Elite Dental Stones
- Elite Transparent

#### Prosthesis preparation

The prosthodontic market requires ever more speed and precision. Thanks to more than 40 years' experience, Zhermack has developed a wide offer to **optimise time in the laboratory**, without compromising on quality.

- Elite LC Tray
- Acrytemp
- Elite Vest





## **CAD/CAM solutions**

The CAD/CAM solutions developed by Zhermack combine traditional techniques (impression taking, model preparation, prosthesis) with the most innovative digital techniques. Saving time in data acquisition, simplifying and improving the quality of CAD/CAM processes.

The Zhermack offer includes a wide range of scannable silicones and stones readable without using reflective sprays.

| BITE REGISTRATION<br>Platinum 75 CAD<br>Occlufast CAD |          |
|---|----------|
| STONE MODELS<br>Elite Master<br>Elite Rock            | 14<br>14 |
| GINGIVAL REPRODUCTION Gingifast CAD                   | 15       |

A-Silicone

**Platinum 75 CAD** is an addition silicone recommended for all CAD/CAM users for making scannable bite regulation keys in the articulator.

#### Characteristics

- Accurate reproduction of details
- 75 Shore A hardness
- Mixing ratio 1:1



Platinum 75 CAD

#### Advantages

- Quicker working time to improve efficiency in the laboratory
- Easy to finish, including with bur
- Scannable without using reflective sprays



Platinum 75 CAD scan



| Mixing time<br>(min:s) | Working time*<br>(min:s) | Setting time*<br>(min:s) | Detail<br>reproduction<br>(μm) | Elastic<br>recovery | Strain in compression | Linear dimensional<br>change (after 24 h) | Hardness<br>(Shore A after 24 h) | Heat<br>resistance |
|------------------------|--------------------------|--------------------------|--------------------------------|---------------------|-----------------------|---|----------------------------------|--------------------|
| 0:30                   | 1:00                     | 7:00                     | 20                             | > 99.5 %            | < 1 %                 | 0.05 %                                    | 75                               | 200 °C             |

\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).

#### Platinum 75 CAD - A-Silicone for bite registration



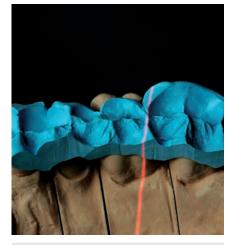


Occlufast CAD is a scannable addition silicone for accurate bite registration.

Occlufast CAD is the solution developed for practitioners looking for a product that facilitates digital work-flow access, by improving communication with the dental technician.

#### **Characteristics**

- Scannability\*
- Dimensional stability, up to 7 days



Occlufast CAD

#### **Advantages**

- Scannability favours digital work-flow access
- Dimensional stability makes it possible to maintain the accuracy of the bite registration for up to 7 days from the time it is taken, even once it has been disinfected using products containing quaternary ammonium salts, mixtures of alcohol and surface tension reducers



Occlufast CAD scan



| Mixing ratio<br>Base: Catalyst | Working time**<br>(min:s) | Setting time**<br>(min:s) | Detail<br>reproduction<br>(µm) | Linear dimensional<br>change (after 24 h) | Hardness<br>(Shore A) |
|--------------------------------|---------------------------|---------------------------|--------------------------------|---|-----------------------|
| 1:1                            | 0:30                      | 1:00                      | 20                             | 0.05 %                                    | 95                    |

Packaging

\*\*The times mentioned must be intended at 35 °C - 95 °F.

|       | Occlufast CAD - A-Silicone for bite registrat |  |  |  |  |  |
|-------|---|--|--|--|--|--|
|       | Code  | Packag   |  |  |  |  |
| III t | C200800                                       | 2 x 50 ml cartridges (Base + Catalyst) + 12 mixing tips (medium) |  |  |  |  |

\*Occlufast CAD can be scanned using optical scanners (structured light and laser) and CBCT without using opacifier powders.



Type 4 stones

Elite Master and Elite Rock are type 4 stones to make scannable master models without using reflective sprays.

Elite Master is reinforced with resin particles, making the material easy to work and resistant to chipping.

Elite Rock is an extra hard stone with high compressive strength, recommended for making master models for fixed prostheses.

Elite Master is scannable in all colours, Elite Rock only in Silver Grey.

#### **Characteristics**

Elite Master:

- Scannable without using reflective sprays
- Formaldehyde free
- Resistant to chipping Elite Rock:
- Also available in fast version to optimise working time
- Low expansion, even after 48 hours
- Accurate reproduction of details

#### **Advantages**

- Time savings in data acquisition with optical scanners
- Greater precision compared to use of reflective sprays •
- Cleaner environment





Elite Master



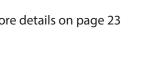
Elite Master scan

| Product         | Water/powder<br>ratio | Mixing time<br>(manual)<br>(min:s) | Mixing time<br>(vacuum)<br>(min:s) | Working time<br>(min:s) | Setting time<br>(VICAT)<br>(min:s) | Removal time<br>(min:s) | Setting<br>expansion<br>2 h | Setting<br>expansion<br>48 h | Compressive<br>strength<br>1 h | Compressive<br>strength<br>48 h |
|-----------------|-----------------------|------------------------------------|------------------------------------|-------------------------|------------------------------------|-------------------------|-----------------------------|------------------------------|--------------------------------|---------------------------------|
| Elite Master    | 21 ml / 100 g         | 1:00                               | 0:30                               | 12:00                   | 14:00                              | 45:00                   | 0.08 %                      | 0.19%                        | 50 MPa<br>(510 kg / cm²)       | 75 MPa<br>(756 kg / cm²)        |
| Elite Rock      | 20 ml / 100 g         | 1:00                               | 0:30                               | 12:00                   | 14:00                              | 45:00                   | 0.08 %                      | 0.19%                        | 52 MPa<br>(530 kg / cm²)       | 81 MPa<br>(826 kg / cm²)        |
| Elite Rock Fast | 20 ml / 100 g         | 1:00                               | 0:30                               | 5:00                    | 9:00                               | 25:00                   | 0.08 %                      | 0.19%                        | 52 MPa<br>(530 kg / cm²)       | 81 MPa<br>(826 kg / cm²)        |

More details on page 23

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Dental



Zhermack 💋

**Gingifast CAD** is a scannable fluid addition silicone, suitable for reproducing gingival morphology on models.

The elastic version with high tear resistance is recommended in the presence of undercuts or very thin thicknesses. The rigid version is ideal for implant prosthesis applications.

#### Characteristic

- Two hardness versions: Elastic 40 Shore A, Rigid 70 Shore A
- Rapid working times
- Mixing ratio 1:1



Gingifast CAD Elastic and Rigid

#### **Advantages**

- Time savings in data acquisition with CAD/CAM
- Greater precision compared to use of reflective sprays
- Compatible with both direct and indirect techniques
- Reduction of waste, thanks to the smaller tips



Gingifast CAD Elastic scan

|         | GINGIFAST<br>CAD |                    |        |
|---------|------------------|--------------------|--------|
| dista 1 | - (0)            | Danady<br>CINCIEAS |        |
| خللغ    |                  | TCAD               | Tilly, |
|         |                  |                    |        |

| Product           | Mixing ratio | Working time*<br>(min:s) | Setting time*<br>(min:s) | Hardness (Shore A) |
|-------------------|--------------|--------------------------|--------------------------|--------------------|
| Gingifast Elastic | 1:1          | 2:00                     | 10:00                    | 40                 |
| Gingifats Rigid   | 1:1          | 2:00                     | 10:00                    | 70                 |

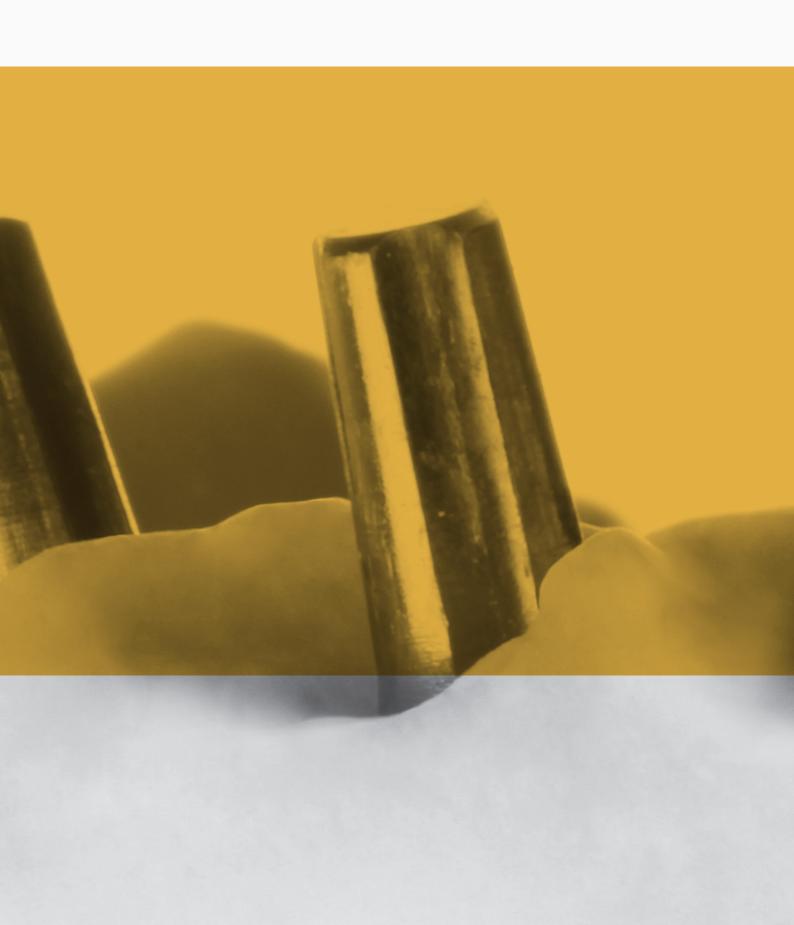
\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).

#### **Gingifast CAD - A-Silicones for gingival reproduction**



| Code    | Product               | Packaging   |
|---------|-----------------------|---|
| C203227 | Gingifast CAD Elastic | 2 x 50 cartridges + 12 mixing tips (extra small) + 10 ml bottle Separator |
| C203232 | Gingifast CAD Rigid   | 2 x 50 cartridges + 12 mixing tips (extra small) + 10 ml bottle Separator |





## **Model preparation**

An accurate model is the basis of every well-made prosthesis. Possible errors during this phase have repercussions on subsequent phases and are extremely difficult to eliminate.

Sensitive to the needs of lab technicians, Zhermack has designed a system of laboratory and impression materials able to work in synergy to obtain accurate models.





## Model preparation Stone models

The choice of material to develop the model contributes to the success of the prosthesis. The types 3 and 4 stones in the Elite range are formulated, developed and produced in-house by Zhermack which controls the various phases of the production process to offer high quality constant standards.

Available in a wide range of colours and different packs, Zhermack stones can meet the main diverse needs of the laboratory.

They are compatible with the most commonly used impression materials present on the market (including polyethers and hydrocolloids) and are formulated to deliver the best performance when used in combination with Zhermack materials.

#### MASTER MODEL AND BASES

| - · · · · · · · · · · · · · · · · · · · |   |
|---|---|
| Elite Master 22                         | 2 |
| Elite Rock 22                           | 2 |
| Elite Rock Fast 22                      | 2 |
| Elite Base 22                           | 2 |
| Elite Stone 22                          |   |
| ANTAGONIST MODEL                        |   |
| Elite Model                             | 1 |
| Elite Model Fast 24                     |   |
| ARTICULATOR                             |   |
| Elite Arti                              | 5 |
| Elite Arti Fast                         | 5 |
| ORTHODONTIC MODEL                       |   |
| Elite Ortho 27                          | 7 |

#### **Dental stones classification**

The international regulation 6873:2013 classifies dental stones in different types, based on their linear setting expansion and compressive strength.

Higher type does not always mean higher quality for a stone. Type 5 stones, for example, are characterized by a high compressive strength but have also a high expansion, thus they are suitable for specific applications only. Type 3 and 4 stones are instead the best for the dental use, because characterized by high compressive strength and

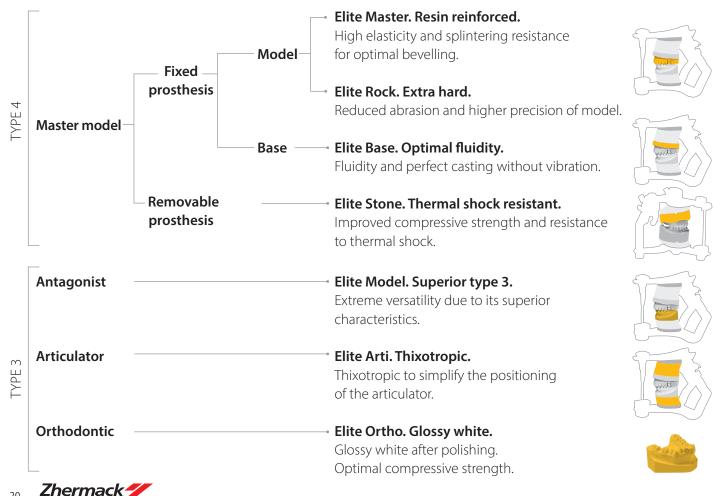
low expansion that allow a higher dimensional stability over time and therefore precision in the reproduction of detail.

| Туре          |      | Linear setting<br>% | Compressiv<br>MI |      |      |      |
|---------------|------|---------------------|------------------|------|------|------|
|               | 2    | h                   | 24               | 4 h  | 1    | h    |
|               | min. | max.                | min.             | max. | min. | max. |
| 1             | 0.00 | 0.15                | -                | -    | 4.0  | 8.0  |
| 2 (Class 1)*  | 0.00 | 0.05                | -                | -    | 9.0  | -    |
| 2 (Class 2)** | 0.06 | 0.30                | -                | -    | 9.0  | -    |
| 3             | 0.00 | 0.20                | -                | -    | 20.0 | -    |
| 4             | 0.00 | 0.15                | 0.00             | 0.18 | 35.0 | -    |
| 5             | 0.16 | 0.30                | -                | -    | 35.0 | _    |

\*dental stone for mounting

\*\*dental stone for models

#### Zhermack dental stones





#### A stone for every application

#### For fixed prostheses

#### Stone for bases | Elite Base

- Optimised to be used in combination
   with master model → same expansion (type 4)
- Easy to cast  $\rightarrow$  fluid

#### Stone for master model | Elite Rock or Elite Master

- Accurate reproduction of details  $\rightarrow$  low expansion
- Chamfering without splintering → resin particles
- Hard stone  $\rightarrow$  compressive strength

#### Stone for antagonist | Elite Model

- Cheaper than master model → type 3
- Hard stone  $\rightarrow$  compressive strength

#### Stone for articulator | Elite Arti

- Maintain correct occlusion → low expansion
- Simplifying positioning in the articulator → thixotropic
- Perfect fixing with antagonist → adhesion

#### For removable prostheses

#### Stone for articulator | Elite Arti

- Maintain correct occlusion → low expansion
- Simplify positioning in the articulator  $\rightarrow$  thixotropic
- Perfect fixing with antagonis  $\rightarrow$  adhesion

#### Stone for master model | Elite Stone

- To be used at high temperature → resistant to thermal shocks
- To be used with frameworks → wear resistance







### Elite Master | Elite Rock | Elite Base | Elite Stone

Type 4 stones for master models and bases

Model preparation / Stone models

Type 4 stones have high compressive strength and low expansion, ideal for making master models. Each stone developed by Zhermack has specific technical characteristics for each individual application.

**Elite Master** is the stone for master models in fixed prosthesis applications with resin particles, for chamfering without splintering. **Elite Rock** is an extra hard stone for master models in fixed prosthesis applications.

**Elite Base** has excellent fluidity for preparation of bases, including without vibrator.

**Elite Stone** is a stone specifically conceived for master models in removable prostheses, resistant to thermal shock and abrasion from frameworks.

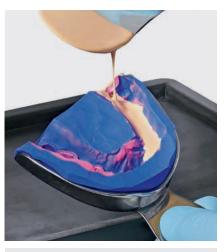
Thanks to its special formula optimised for reading with CAD/CAM systems, models made with Elite Master (in all colours) and Elite Rock (Silver Grey) are scannable without using reflective sprays.



Elite Master

#### Characteristics

- Low expansion, even after 48 hours
- Accurate reproduction of detail
- "Fast" version to save time (Elite Rock) Elite Master:
- Formaldehyde free
- Resistant to chipping



Elite Rock

#### **Advantages**

- Elite Master: chamfering without splintering, thanks to the high resistance given by the resin particles incorporated in the stone
- Thixotropic to simplify fabrication of the model
- Elite Base: high fluidity, even without vibration



Elite Base



#### MASTER MODEL FIXED PROSTHESIS REMOVABLE PROSTHESIS MODEL Elite Master Elite Rock Resin reinforced Extra hard Chipping resistance for optimal chamfering Improved compressive strenght and higher precision of model Elite Stone Thermal shock resistant Reduced abrasion and resistance to thermal shock BASE Elite Base Optimal Fluidity Fluidity and perfect preparation without vibration

|                           | Elite Master               | Elite Rock                                | Elite Rock Fast          | Elite Base                          | Elite Stone                           |
|---------------------------|----------------------------|---|--------------------------|-------------------------------------|---------------------------------------|
| Scannable                 | All                        | Silver Grey                               | Silver Grey              | -                                   | -                                     |
| Application               | Master model (fixed, dies) | Master model (fixed)                      | Master model (fixed)     | Bases for model                     | Master model (removable)              |
| Color                     | Desert Sand, Sandy Brown   | Sandy Brown, Cream, White,<br>Silver Grey | Sandy Brown, Cream       | Terracotta Red,<br>Royal Blue, Grey | Aqua Green, Pink,<br>Navy Blue, Brown |
| Туре                      | 4                          | 4   | 4                        | 4                                   | 4                                     |
| Main feature              | Resin reinforced           | Extra hard                                | Extra hard               | Optimal fluidity                    | Thermal shock resistant               |
| Water / Powder            | 21 ml / 100 g              | 20 ml / 100 g                             | 20 ml / 100 g            | 23 ml / 100 g                       | 25 ml / 100 g                         |
| Mixing time (m)*          | 1:00                       | 1:00                                      | 1:00                     | 1:00                                | 1:00                                  |
| Mixing time (v)**         | 0:30                       | 0:30                                      | 0:30                     | 0:30                                | 0:30                                  |
| Working time              | 12:00                      | 12:00                                     | 5:00                     | 5:00                                | 8:00                                  |
| Setting time***           | 14:00                      | 14:00                                     | 9:00                     | 18:00                               | 14:00                                 |
| Removal time              | 45:00                      | 45:00                                     | 25:00                    | 45:00                               | 45:00                                 |
| Expansion after 2 h       | 0.08 %                     | 0.08 %                                    | 0.08 %                   | 0.05 %                              | 0.08 %                                |
| Expansion after 48 h      | 0.19 %                     | 0.19 %                                    | 0.19 %                   | 0.10 %                              | 0.09 %                                |
| Compressive strength 1 h  | 50 MPa<br>(510 kg / cm²)   | 52 MPa<br>(530 kg / cm²)                  | 52 MPa<br>(530 kg / cm²) | 40 MPa<br>(408 kg / cm²)            | 42 MPa<br>(428 kg / cm²)              |
| Compressive strength 48 h | 75 MPa<br>(765 kg / cm²)   | 81 MPa<br>(826 kg / cm²)                  | 81 MPa<br>(826 kg / cm²) | 83 MPa<br>(846 kg / cm²)            | 60 MPa<br>(612 kg / cm²)              |

\* manual | \*\* vacuum, 240 rpm | \*\*\* Vicat

Zhermack 23 Dental

0

### Elite Model | Elite Model Fast

Type 3 stones for antagonists

**Elite Model** is a high quality type 3 stone indicated for making antagonists and filling flasks in removable prosthesis applications with heat-curing resins.

#### Characteristics

- Low expansion
- High mechanical characteristics
- Universal use

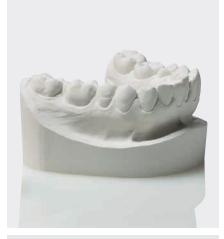
#### Advantages

- Model fabrication facilitated by the high thixotropy
- Extreme versatility due to its superior characteristics compared to other stones of the same type



Elite Model

|                           | Elite Model              | Elite Model Fast             |
|---------------------------|--------------------------|------------------------------|
| Application               | Antagonist               | Antagonist                   |
| Color                     | Ivory, Steel Blue        | Light Cream, Sky Blue, White |
| Туре                      | 3                        | 3                            |
| Main feature              | Thixotropic              | Thixotropic                  |
| Water / Powder            | 30 ml / 100 g            | 30 ml / 100 g                |
| Mixing time (m)*          | 1:00                     | 1:00                         |
| Mixing time (v)**         | 0:30                     | 0:30                         |
| Working time              | 7:00                     | 4:00                         |
| Setting time***           | 12:00                    | 8:00                         |
| Removal time              | 45:00                    | 15:00                        |
| Expansion after 2 h       | 0.04 %                   | 0.10 %                       |
| Expansion after 48 h      | 0.07 %                   | 0.10 %                       |
| Compressive strength 1 h  | 31 MPa<br>(316 kg / cm²) | 36 MPa<br>(366 kg / cm²)     |
| Compressive strength 48 h | 62 MPa<br>(632 kg / cm²) | 65 MPa<br>(662 kg / cm²)     |



Elite Model Fast

\* manual | \*\* vacuum, 240 rpm | \*\*\* Vicat







Types 3 stones for articulators

**Elite Arti** is a type 3 stone with low expansion to keep the occlusion unaltered in the articulator.

#### Characteristics

- Thixotropic
- Minimal expansion
- Also available in fast version
- White colour

#### Advantages

- Minimal expansion to keep the occlusion unaltered
- Thixotropic to simplify positioning in the articulator



Elite Arti

|                           | Elite Arti                     | Elite Arti Fast                |  |
|---------------------------|--------------------------------|--------------------------------|--|
| Application               | Mounting model for articulator | Mounting model for articulator |  |
| Color                     | White                          | White                          |  |
| Туре                      | 3                              | 3                              |  |
| Main feature              | Thixotropic                    | Thixotropic                    |  |
| Water / Powder            | 30 ml / 100 g                  | 30 ml / 100 g                  |  |
| Mixing time (m)*          | 1:00                           | 0:45                           |  |
| Working time              | 3:00                           | 2:00                           |  |
| Setting time**            | 5:00                           | 3:00                           |  |
| Expansion after 2 h       | 0.02 %                         | 0.02 %                         |  |
| Expansion after 48 h      | 0.06 %                         | 0.06 %                         |  |
| Compressive strength 1 h  | 26 MPa<br>(265 kg / cm²)       | 26 MPa<br>(265 kg / cm²)       |  |
| Compressive strength 48 h | 59 MPa<br>(602 kg / cm²)       | 59 MPa<br>(602 kg / cm²)       |  |



Elite Arti

\* manual | \*\* Vicat



**Elite Ortho** is a specific stone for orthodontic models, glossy white.

#### Characteristics

- Glossy white
- Thixotropic
- Low expansion

#### Advantages

- Specific for orthodontic models
- Adapt for study models

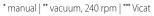


Elite Ortho

|                           | Elite Ortho              |  |
|---------------------------|--------------------------|--|
| Application               | Orthodontic model        |  |
| Color                     | White                    |  |
| Туре                      | 3                        |  |
| Main feature              | Glossy white             |  |
| Water / Powder            | 24 ml / 100 g            |  |
| Mixing time (m)*          | 0:60                     |  |
| Mixing time (v)**         | 0:30                     |  |
| Working time              | 7:00                     |  |
| Setting time***           | 14:00                    |  |
| Removal time              | 45:00                    |  |
| Expansion after 2 h       | 0.04 %                   |  |
| Expansion after 48 h      | 0.05 %                   |  |
| Compressive strength 1 h  | 32 MPa<br>(326 kg / cm²) |  |
| Compressive strength 48 h | 60 MPa<br>(612 kg / cm²) |  |



Elite Ortho





## **Elite Dental Stones**

Codes

#### Model preparation / Stone models



|                  | 200 g   | 1 kg    | 3 kg    | 25 kg carton | 25 kg drum |
|------------------|---------|---------|---------|--------------|------------|
| Elite Master     |         |         |         |              |            |
| Desert Sand      | C410400 | -       | C410402 | C410403      | C410404    |
| Sandy Brown      | -       | -       | C410410 | C410411      | C410412    |
| Elite Rock       |         |         |         |              |            |
| Sandy Brown      | -       | C410032 | C410030 | C410200      | C410334    |
| Cream            | -       | -       | C410020 | C410201      | C410332    |
| Silver Grey      | -       | -       | C410010 | C410202      | C410330    |
| White            | -       | -       | C410000 | C410204      | C410336    |
| Elite Rock Fast  |         |         |         |              |            |
| Sandy Brown      | C410152 | C410151 | C410150 | C410205      | -          |
| Cream            | -       | -       | C410160 | C410207      | -          |
| Elite Base       |         |         |         |              |            |
| Terracotta Red   | -       | -       | C410448 | C410446      | C410447    |
| Royal Blue       | -       | -       | C410437 | C410435      | C410436    |
| Grey             | -       | -       | -       | -            | C410439    |
| Elite Stone      |         |         |         |              |            |
| Pink             | -       | -       | C410048 | C410214      | C410315    |
| Navy Blue        | -       | -       | -       | -            | C410310    |
| Brown            | -       | -       | C410040 | C410211      | C410312    |
| Aqua Green       | -       | -       | -       | -            | C410313    |
| Elite Model      |         |         |         |              |            |
| Steel Blue       | -       | -       | C410070 | C410221      | -          |
| lvory            | -       | -       | C410080 | C410220      | C410304    |
| Elite Model Fast |         |         |         |              |            |
| Sky Blue         | -       | -       | C410065 | C410224      | C410306    |
| Light Cream      | C410069 | -       | C410067 | C410226      | C410308    |
| White            | -       | -       | C410063 | C410228      | C410309    |
| Elite Arti       |         |         |         |              |            |
| White            | -       | -       | C410100 | C410240      | C410350    |
| Elite Arti Fast  |         |         |         |              |            |
| White            | C410107 | -       | C410105 | C410241      | C410351    |
| Elite Ortho      |         |         |         |              |            |
| White            | -       | -       | C410090 | C410230      | C410320    |

Zhermack 1 Dental

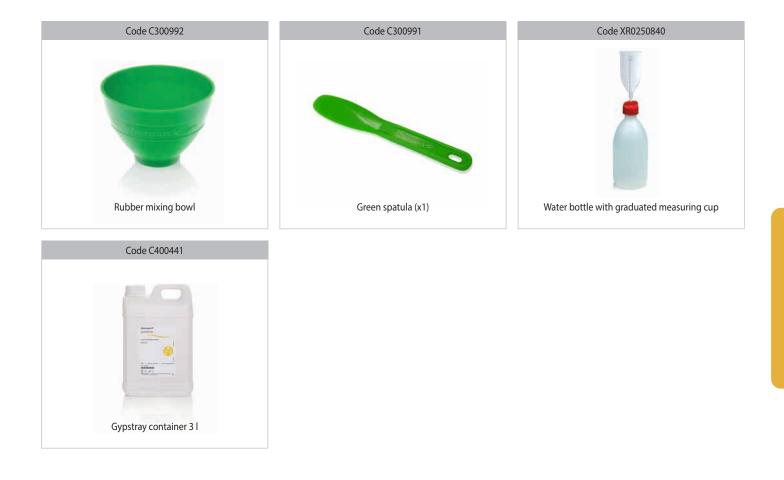


## **Elite Dental Stones**

Accessories

#### Model preparation / Stone models









## Model preparation

Zhermack products for the dental laboratory include a wide range of top quality silicones to simplify work and reduce the possibility of error.

We directly manage all phases of production to guarantee constant reliable quality.

| A-SILICONES<br>Elite Transparent | 32 |
|----------------------------------|----|
| Platinum 75 CAD                  |    |
| Platinum 85 TOUCH                | 36 |
| Platinum 85                      | 36 |
| Platinum 95                      | 36 |
| C-SILICONES                      |    |
| Zetalabor                        | 42 |
| Titanium                         | 42 |

#### Elite Transparent is a transparent fluid two-component

addition silicone.

Formulated for making transparent silicone masks in the laboratory for composites and light-curing resins.

#### Characteristics

- Highly transparent
- Low viscosity
- High final hardness 72 Shore A





#### **Advantages**

- Shorter working times
- Composites or resins act on more compact surfaces without dispersion layer, thanks to the light curing in an oxygen free atmosphere
- Easy and quick to apply
- Possibility to retain the mask for future use



Elite Transparent result

|     |   | 4                               |
|-----|---|---------------------------------|
|     |   | Burnan V<br>BUTB TRAN<br>murray |
| -   | A | 1. Contractor                   |
| 000 |   |                                 |

| Working time* | Setting time* | Linear dimensional  | Hardness            | Tensile   | Tear     |
|---------------|---------------|---------------------|---------------------|-----------|----------|
| (min:s)       | (min:s)       | change (after 24 h) | (Shore A after 1 h) | strength  | strength |
| 1:30          | 15:00         | 0.18 %              | 72                  | 6.5 N/mm² |          |

\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).



| Elite Transparent - A- | Silicone for masks |
|------------------------|--------------------|
|------------------------|--------------------|

| Code    | Packaging                                   |
|---------|---|
| C401600 | 1 x 50 ml cartridge + 6 mixing tips (small) |



## **Elite Transparent**

User's guide

#### Model preparation / Masks

#### Elite Transparent - Temporary restorations with Elite Transparent



1. Model



2. Wax-up



3. Application of Elite Transparent



6. Filling the mask with composite (dentine)



4. Application of a transparent film to smooth the mask. Once this phase is complete, during silicone curing, the model can be placed under pressure at 2 bars



9. Cut back (dentine reduction to make space for the enamel)



10. Filling the mask with composite (enamel)



7. Mask repositioning and light curing



11. Mask repositioning and light curing



8. Unfinished temporary restoration

FINAL RESULT after finishing and polishing



### Guide to use

A-Silicones vs C-Silicones

#### Model preparation / Masks

#### **Addition silicones**

- Excellent dimensional stability
- Resistant to heat up to 200°C
- Excellent surface definition

#### **Condensation silicones**

- Lower dimensional stability
- Resistant to heat up to 100°C
- Lower surface definition









#### Zetalabor (80 Shore A) Titanium (90 Shore A)

Indicated for short processes and use with heat-curing and self-curing resins.

Platinum 75 CAD Platinum 85 TOUCH Platinum 85 Platinum 95

Indicated for lengthy processes (e.g. work on implants with diagnostic wax-up), processes requiring high definition and detail reproduction (e.g. veneers), use with thermoplastic materials with a high curing temperature, heat-cured resins and self-curing resins.



#### **Examples of application**

Removable prosthesis with self-curing resin











Removable prosthesis complete denture with hot curing resin



Removable prosthesis complete denture with cold-curing resin































**Platinum** is a high precision addition silicone available in 95, 85, 85 TOUCH and 75 CAD versions. All silicones in the line are characterised by excellent dimensional stability, short working times and ease of use.

Zhermack offers a complete system of putty silicones with different hardnesses, delivering high performance in numerous applications, including dental aesthetics. To satisfy the various needs of daily practice, Platinum 75 CAD silicone is designed for scanning with CAD/CAM systems and is ideal in combination with Platinum 95 for excellent reproduction of details. Recommended to make masks and counter-moulds.



Platinum 85

#### Characteristics

- Availability in a wide range of hardnesses
- Accurate reproduction of details
- Resistant to heat up to 200° C
- Mixing ratio 1:1



Platinum 85 TOUCH



Platinum 95

#### Advantages

- Can be used for long processes (for example, implants with diagnostic wax-up) without altering the dimensional references
- Can be used with thermoplastic materials, thanks to heat resistance of up to 200° C
- Easy to work, including with a bur





| Product              | Counter-mould<br>for removable<br>prosthesis in<br>thermoplastic<br>materials | Counter-mould<br>for removable<br>prosthesis in<br>heat-curing resins | Masks for<br>prosthesis in<br>self-curing resins | Use with<br>verticulator | Masks for gingival<br>reproduction in<br>indirect technique | Masks for<br>composite and<br>polyglass<br>composite<br>provisional | Removable<br>prosthesis<br>repair | Occlusal key on<br>articulator |
|----------------------|---|---|--|--------------------------|---|---|-----------------------------------|--------------------------------|
| Platinum 75<br>CAD*  |   |   |  |                          | 0   | 0   |                                   | •                              |
| Platinum 85<br>TOUCH |   | 0   | 0  |                          | 0   | •   | 0                                 |                                |
| Platinum 85          | •   | ٠   | •  | •                        | •   | 0   | 0                                 | ο                              |
| Platinum 95          | 0   | 0   |  | •                        |   | 0   | 0                                 | •                              |

• highly recommended or recommended

\*scannable without using reflective sprays

| Product              | Mixing<br>time<br>(min:s) | Working<br>time*<br>(min:s) | Setting<br>time*<br>(min:s) | Detail<br>reproduction<br>(µm) | Elastic<br>recovery | Strain in<br>compression | Linear<br>dimensional change<br>(after 24 h) | Hardness<br>(Shore A after 24 h) | Heat<br>resistance |
|----------------------|---------------------------|-----------------------------|-----------------------------|--------------------------------|---------------------|--------------------------|--|----------------------------------|--------------------|
| Platinum 75<br>CAD   | 0:30                      | 1:00                        | 7:00                        | 20                             | > 99.5 %            | < 1 %                    | 0.05 %                                       | 75                               | 200 °C             |
| Platinum 85<br>TOUCH | 0:30                      | 1:00                        | 7:00                        | 20                             | > 99.5 %            | < 1%                     | 0.05 %                                       | 85                               | 200 °C             |
| Platinum 85          | 0:30                      | 2:00                        | 8:00                        | 20                             | > 99.5 %            | < 1 %                    | 0.05 %                                       | 85                               | 200 °C             |
| Platinum 95          | 0:30                      | 2:00                        | 8:00                        | 20                             | > 99.5 %            | < 1 %                    | 0.05 %                                       | 95                               | 200 °C             |

\*The times mentioned above are intended from the start of the mixing phase at 23°C (73°F).



### Platinum

User's guide

#### Model preparation / Masks

#### Platinum - Injectable technique with Platinum 85 TOUCH for temporary restorations



1. Master model



2. CrCo structure for reinforced temporary restoration



3. Waxed up structure



4. Construction of mask in Platinum 85 TOUCH



5. Mask removal



8. End of Acrytemp injection





9. Unfinished temporary restoration (following mask removal)



6. Once you have removed the wax, clean, rub and reposition the reinforcements on the model



FINAL RESULT after finishing and polishing



7. Mask repositioning and Acrytemp injection

#### Platinum - Indirect temporary restorations by using Platinum 85 TOUCH



1. Model



2. Mask in Platinum 85 TOUCH



3. Prepared model



4. Filling the mask with Acrytemp



5. Repositioning the mask onto the model and Acrytemp oozing out of the vent channels



6. Mask removal





FINAL RESULT after finishing and polishing



#### Platinum - Removable complete denture with cold-curing resin for pouring technique



1. Waxed-up prosthesis



4. Secondary containment mask, in Platinum 95



7. Wax removal from model and teeth



2. Addition of pouring channels and creation of orientation points on the model



5. Base construction in Platinum 95 to keep the structure in a vertical position, marking of orientation points to check the correct repositioning of the silicone



3. Primary mask in Platinum 85 TOUCH, with total coverage of the wax-up (allows superior detail reproduction of the wax-up)



6. Mask removal



8. Repositioning the teeth in the silicone mask



9. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



13. The pouring is complete when the resin oozes out of the opposite channel

 Add a central pouring channel if the palate thickness is extremely thin.
 In this case, pour the resin in from the central channel



10. Mix and wait until you have a honey-like texture as shown



14. Result of the mask removal



11. Reposition the mask and secure it in the correct position with an elastic band



15. Polishing and finishing of the prosthesis





FINISHED PROSTHESIS



Platinum Codes

#### Model preparation / Masks





| Platinum 75 CAD - Scannable A-Silicone |   |  |  |  |  |
|--|---|--|--|--|--|
| Code                                   | Packaging                               |  |  |  |  |
| C400741                                | 1 tub 800 α Base + 1 tub 800 α Catalyst |  |  |  |  |

#### Platinum 85 TOUCH - High precision A-Silicone

| Code    | Packaging                                 |
|---------|---|
| C400750 | 1 tub 4.3 kg Base + 1 tub 4.3 kg Catalyst |
| C400751 | 1 tub 200 g Base + 1 tub 200 g Catalyst   |

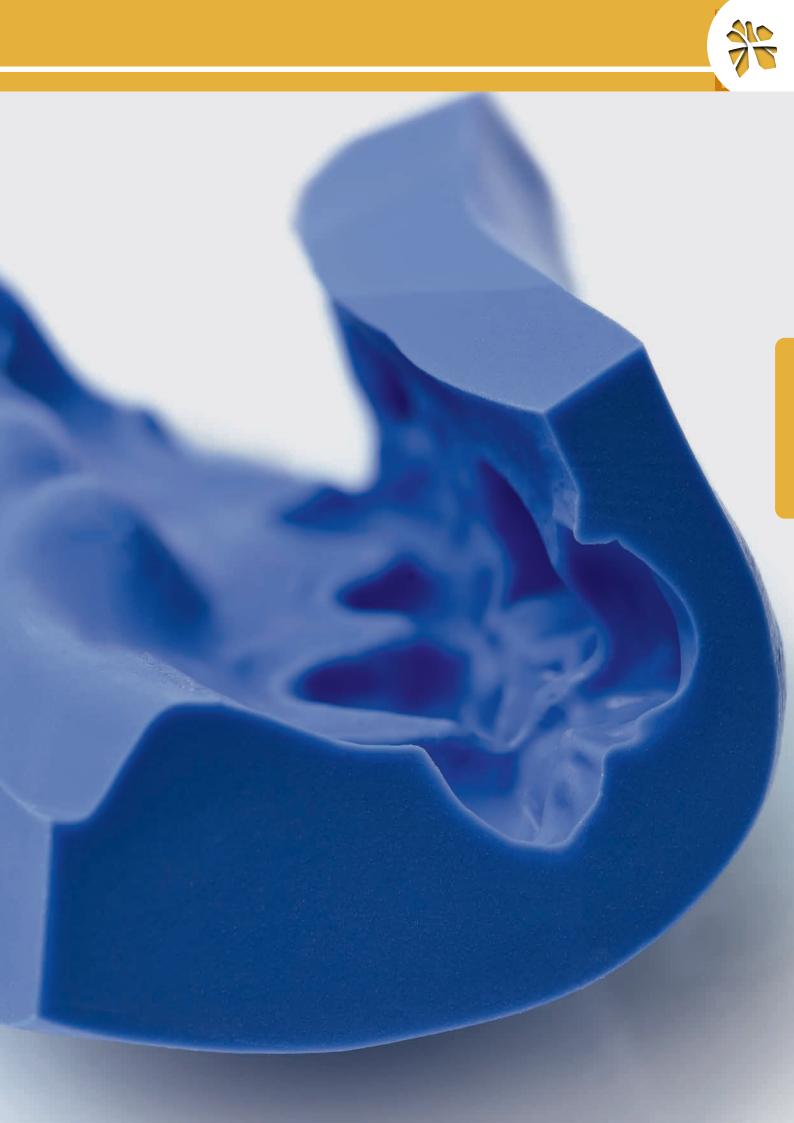
#### Platinum 85 - High precision A-Silicone

| Code    | Packaging                               |
|---------|---|
| C400727 | 1 tub 450 g Base + 1 tub 450 g Catalyst |
| C400725 | 1 tub 1 kg Base + 1 tub 1 kg Catalyst   |
| C400723 | 1 tub 5 kg Base + 1 tub 5 kg Catalyst   |

#### Platinum 95 - High precision A-Silicone

| Co     | de | Packaging                               |
|--------|----|---|
| C40072 | 20 | 1 tub 450 g Base + 1 tub 450 g Catalyst |
| C40070 | 00 | 1 tub 1 kg Base + 1 tub 1 kg Catalyst   |
| C40071 | 10 | 1 tub 5 kg Base + 1 tub 5 kg Catalyst   |





**C-Silicones** 

#### Model preparation / Masks

Designed for the dental laboratory, **Zetalabor** and **Titanium** condensation silicones are characterised by high hardness and good mechanical properties.

They can be used in various applications requiring short times and not excessively high working temperatures. Zetalabor and Titanium are recommended for counter-moulds in removable prosthesis applications, masks for creating artificial gums using the indirect technique, moulds for preparation self-curing resins and numerous other applications. For more than 40 years, their ease of use has helped speed up laboratory procedures and improve the everyday performance of lab technicians.

**Indurent LAB** is the gel catalyst completing the range. Its characteristic red colour makes it easy to recognise when the mixture is homogeneous.



Counter-mould on flask

#### Characteristics

- Resistant to heat up to 100° C
- Good precision
- Silicones to mix with the gel catalyst only

#### **Advantages**

- Time saving
- Excellent quality/price ratio
- For use with hot and cold resin techniques



Prosthesis relining



Mask for pouring self-curing resins





| Product                            | Counter-mould for<br>removable prosthesis<br>in heat-curing resins | Masks for prosthesis in self-curing resins | Masks for gingival<br>reproduction<br>in indirect technique | Masks for composite<br>and polyglass<br>composite provisional | Removable<br>prosthesis repair | Occlusal key<br>for mounting on<br>articulator |  |  |
|------------------------------------|--|--|---|---|--------------------------------|--|--|--|
| Zetalabor                          | •  | •  | •   | 0   | ٠                              |  |  |  |
| Titanium                           | •  | 0  |   |   | 0                              | o  |  |  |
| ● highly recommended ○ recommended |  |  |   |   |                                |  |  |  |

| Product   | Mixing time<br>(min:s) | Working time*<br>(min:s) | Setting time*<br>(min:s) | Detail<br>reproduction (µm) | Elastic<br>recovery | Strain in compression | Linear dimensional<br>change (after 24 h) | Hardness<br>(Shore A after 1 h) |
|-----------|------------------------|--------------------------|--------------------------|-----------------------------|---------------------|-----------------------|---|---------------------------------|
| Zetalabor | 0:30                   | 2:00                     | 6:00                     | 20                          | 98 %                | < 2 %                 | 0,25 %                                    | 80                              |
| Titanium  | 0:30                   | 1:30                     | 6:00                     | 50                          | 99 %                | < 1 %                 | 0,25 %                                    | 90                              |

\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).



### Zetalabor | Titanium

User's guide

#### Model preparation / Masks

#### Zetalabor - Mixing technique



1. Take one or more measures of Zetalabor (note: the measuring spoon must be filled flush with the surface)



4. Fold the material onto itself



2. Spread Zetalabor on the palm of your hand and impress the rim of the measuring spoon onto the material as many times as the measures used



Mix together using your fingertips (to avoid heating the material), forming small S shapes



3. For each measure, spread two strips of Zhermack Indurent LAB catalyst the same length as the measure, i.e. about 4 cm



6. Mix until the material is even in colour, without stripes

#### Zetalabor - Injectable technique for temporary restorations



1. Master model



2. CrCo structure for reinforced temporary restoration



3. Waxed up structure



4. Construction of Zetalabor mask



5. Mask removal



Zhermack 💋

8. End of Acrytemp injection

Dental

44



9. Unfinished temporary restoration (following mask removal)



6. Once you have removed the wax, clean, rub and reposition the reinforcements on the model



FINAL RESULT after finishing and polishing



7. Mask repositioning and Acrytemp injection

#### Zetalabor - Indirect temporary restorations



1. Model



2. Zetalabor mask



3. Prepared model



4. Filling the mask with Acrytemp



5. Repositioning the mask onto the model and Acrytemp oozing out of the casting channels



6. Mask removal





after finishing and polishing

#### Zetalabor - Framework prosthesis with cold-curing resin for pouring technique



1. Model with framework prosthesis



2. Framework prosthesis on model and saddle with wax-up



3. Creation of the mask



4. Finishing the mask



5. Removal of wax and repositioning of teeth on the mask



6. Repositioning the mask onto the model with framework prosthesis



7. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



12. Polishing and finishing



8. Mix and wait until you have a honey-like texture as shown



FINAL RESULT



9. Pour the resin



10. Result after resin polymerization



11. Mask removal



### Zetalabor | Titanium

User's guide

#### Model preparation / Masks

#### Zetalabor - Removable complete denture with cold-curing resin for pouring technique



1. Master model with wax-up



4. Secondary containment mask, in Titanium





2. Addition of pouring channels and creation of orientation points on the model



marking of orientation points to check the correct repositioning of the silicone



3. Primary mask in Zetalabor, with total coverage of the wax-up (allows superior detail reproduction of the wax-up)



5. Base construction in Titanium to keep the structure in a vertical position,



6. Mask removal



7. Wax removal from model and teeth



8. Repositioning the teeth in the silicone mask



9. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



13. The pouring is complete when the resin oozes out of the opposite channel





11. Reposition the mask and secure it in the correct position with an elastic band



12. Pour the resin into one of the two pouring channels



FINISHED PROSTHESIS



14. Result of the mask removal

- ► This technique can also be used with Zetalabor only
- ► Add a central pouring channel if the palate thickness is extremely thin. In this case, pour the resin in from the central channel



15. Polishing and finishing

#### Zetalabor - Prosthesis reparation with self-curing resin



1. Prosthesis for repair



5. Remove the prosthesis from the silicone base and prepare the broken prosthesis



2. Fixing the two parts of the prosthesis using sticky wax



6. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



3. Measuring and mixing Zetalabor (4 measures)



PROSTHESIS REPAIR



4. Creating the model in Zetalabor

#### Zetalabor - Removable complete denture with heat-curing resin



1. Master model with wax-up



2. Filling the flask with the wax-up



3. Covering the teeth with Zetalabor, leaving the cusps and incisal margins free and creating mechanical retentions



4. Detail of the areas to leave free on the cusps and incisal margins



### Zetalabor | Titanium

Codes

Model preparation / Masks



#### Zetalabor - C-Silicone rigid

| Code    | Packaging                         |
|---------|-----------------------------------|
| C400791 | 1 tub 900 g                       |
| C400790 | 1 tub 2.6 kg                      |
| C400811 | 1 tub 5 kg                        |
| C400804 | 1 tub 10 kg                       |
| C400812 | 1 tub 25 kg                       |
| C400798 | 1 tub 5 kg + 2 Indurent LAB 60 ml |

#### Titanium - C-Silicone extra-rigid

| Code    | Packaging                         |
|---------|-----------------------------------|
| C400605 | 1 tub da 2.6 kg                   |
| C400611 | 1 tub 5 kg                        |
| C400818 | 1 tub 5 kg + 2 Indurent LAB 60 ml |

#### Indurent LAB - Gel catalyst for Zetalabor and Titanium

| Code    | Packaging    |
|---------|--------------|
| C100900 | 1 tube 60 ml |







# Model preparation Duplication

Interpreting the needs of lab technicians, Zhermack R&D laboratories have developed Elite Double, a wide range of duplication silicones characterised by accurate reproduction of details and excellent dimensional stability.

The high elasticity and high resistance to tearing make removal of the model from the silicone easy and safe.

For excellent results even in the most complex situations.

| A-SILICONES                |    |
|----------------------------|----|
| Elite Double 8             | 52 |
| Elite Double 16 Fast       | 52 |
| Elite Double 22            | 52 |
| Elite Double 22 Fast       | 52 |
| Elite Double 22 Extra Fast | 52 |
| Elite Double 32            | 52 |
| Elite Double 32 Fast       | 52 |
|                            |    |

The **Elite Double** line includes a wide range of duplication silicones. Designed to meet the lab technician's different needs in both fixed and removable prosthesis applications. The range consists of 7 products.

Elite Double has different colours, four different final hardnesses and three setting times: normal, fast and extra fast, the latter formulated specifically for automatic mixers. Elite Double retains high and constant fluidity throughout the working time, delivering a homogeneous bubble-free result.



#### Characteristics

- Resistance to stretching and tearing, including with thin thicknesses
- Accurate reproduction of detail
- High fluidity
- High dimensional stability over time
- High elastic recovery



Elite Double 22 Fast



Elite Double 16 Fast

#### Advantages

- Optimisation of working times, particularly when compared with duplication with hydrocolloids (setting time 5:00, 10:00, 20:00)
- The model can be duplicated a number of times, thanks to the dimensional stability over time and high elastic recovery
- Compatible with stones, polyurethane resins, acrylic resins and phosphate and alcohol-based investments
- High fluidity: does not require mixing in a vacuum





| Product                       | Duplication of cores,<br>integral ceramic coating | Duplication of models,<br>generally in gypsum and/or resin | Duplication of models, controlled expansion coating | Duplication of models, free expansion coating |
|-------------------------------|---|--|---|---|
| Elite Double 8                | •   |  |   |   |
| Elite Double<br>16 Fast       | ٠   | •  | ٠   |   |
| Elite Double 22               |   | •  | ٠   |   |
| Elite Double<br>22 Fast       |   | •  | ٠   |   |
| Elite Double<br>22 Extra Fast |   | •  | ٠   |   |
| Elite Double 32               |   | •  |   | •   |
| Elite Double<br>32 Fast       |   | •  |   | •   |

| Product                       | Mixing<br>ratio | Manual<br>mixing<br>time*<br>(min:s) | Mechanical<br>mixing time with<br>vacuum mixer*<br>(min:s) | Working<br>time*<br>(min:s) | Setting<br>time*<br>(min:s) | Detail<br>reproduction<br>(µm) | Elastic<br>recovery | Linear<br>dimensional<br>change<br>(after 24 h) | Hardness<br>(Shore A) | Load at<br>break      | Elongation<br>at break | Tear<br>resistance    |
|-------------------------------|-----------------|--------------------------------------|--|-----------------------------|-----------------------------|--------------------------------|---------------------|---|-----------------------|-----------------------|------------------------|-----------------------|
| Elite Double 8                | 1:1             | 1:00                                 | 0:30   | 10:00                       | 20:00                       | 2                              | 99.95 %             | 0.05 %  | 8                     | 2 N/mm²               | 380 %                  | 2.5 N/mm <sup>2</sup> |
| Elite Double<br>16 Fast       | 1:1             | 1:00                                 | 0:30   | 5:00                        | 10:00                       | 2                              | 99.95 %             | 0.05 %  | 16                    | 2.5 N/mm <sup>2</sup> | 550 %                  | 5 N/mm²               |
| Elite Double 22               | 1:1             | 1:00                                 | 0:30   | 10:00                       | 20:00                       | 2                              | 99.95 %             | 0.05 %  | 22                    | 2.5 N/mm <sup>2</sup> | 450 %                  | 5 N/mm²               |
| Elite Double<br>22 Fast       | 1:1             | 1:00                                 | 0:30   | 5:00                        | 10:00                       | 2                              | 99.95 %             | 0.05 %  | 22                    | 2.5 N/mm <sup>2</sup> | 450 %                  | 5 N/mm²               |
| Elite Double<br>22 Extra Fast | 1:1             | Automatic<br>mixer                   | Automatic<br>mixer   | 1:30                        | 5:00                        | 2                              | 99.95 %             | 0.05 %  | 22                    | 2.5 N/mm <sup>2</sup> | 450 %                  | 5 N/mm²               |
| Elite Double 32               | 1:1             | 1:00                                 | 0:30   | 10:00                       | 20:00                       | 2                              | 99.95 %             | 0.05 %  | 32                    | 2.5 N/mm <sup>2</sup> | 350 %                  | 5 N/mm²               |
| Elite Double<br>32 Fast       | 1:1             | 1:00                                 | 0:30   | 5:00                        | 10:00                       | 2                              | 99.95 %             | 0.05 %  | 32                    | 2.5 N/mm <sup>2</sup> | 350 %                  | 5 N/mm <sup>2</sup>   |

\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).



### Elite Double

User's guide

#### Model preparation / Duplication

#### Elite Double - Removable complete denture with cold-curing resin for pouring technique



1. Waxed-up prosthesis



2. Fixing the model to the base of the flask, using sticky wax



3. Application of pouring channels



4. Closing the flask



5. Pour Elite Double 16 into the flask



6. Opening the flask



7. Wax removal from model and teeth



8. Repositioning the teeth



9. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



13. The pouring is complete when the resin oozes out of the side channels



10. Mix and wait until you have a honey-like texture as shown



14. Result upon opening the flask



11. Close the flask again and secure it in the correct position with an elastic band



15. Polishing and finishing



12. Pour the resin into the central pouring channel



FINISHED PROSTHESIS





#### Elite Double - Removable complete denture with cold-curing resin for pouring technique



1. Waxed-up prosthesis



5. Pour Elite Double 16

8 Mask removal



2. Application of pouring channels and creation of orientation points on the model



6. Secondary containment mask in Platinum 95



9. Wax removal from model and teeth



3. Cover the palate with Platinum 95



4. Model boxing using sticky wax



7. Base construction in Platinum 95 to keep the structure in a vertical position, marking of orientation points to check the correct repositioning of the silicone



10. Repositioning the teeth in the silicone mask



11. Weigh the resin, measure the monomer and mix, pouring the monomer in first and then the resin



12. Mix and wait until you have a honey-like texture as shown



16. Result of the mask removal



13. Reposition the mask and secure it in the correct position with an elastic band



17. Polishing and finishing



14. Pour the resin into one of the two pouring channels



FINISHED PROSTHESIS



15. The pouring is complete when the resin oozes out of the opposite channel

► Add a central pouring channel if the palate thickness is extremely thin. In this case, pour the resin in from the central channel



### Elite Double

User's guide

#### Model preparation / Duplication

#### Elite Double - Model duplication



1. Master model



2. Fixing the model to the base of the flask, using sticky wax



3. Closing the flask



4. Pour Elite Double 22 into the flask



5. Opening the flask



6. Pour the investment into the silicone



DUPLICATE MODEL





#### Model preparation / Duplication





| Elite Doub | Elite Double 8 - A-Silicone for model duplication |  |  |  |  |  |
|------------|---|--|--|--|--|--|
| Code       | Packaging   |  |  |  |  |  |
| C400830    | 1 kg (Base) + 1 kg (Catalyst)                     |  |  |  |  |  |

#### Elite Double 16 Fast - A-Silicone for model duplication

| Code    | Packaging                       |
|---------|---------------------------------|
| C400825 | 250 g (Base) + 250 g (Catalyst) |
| C400831 | 1 kg (Base) + 1 kg (Catalyst)   |
| C400847 | 5 kg (Base) + 5 kg (Catalyst)   |

#### Elite Double 22 - A-Silicone for model duplication

| Code    | Packaging                       |
|---------|---------------------------------|
| C400821 | 250 g (Base) + 250 g (Catalyst) |
| C400832 | 1 kg (Base) + 1 kg (Catalyst)   |
| C400840 | 5 kg (Base) + 5 kg (Catalyst)   |

#### Elite Double 22 Fast - A-Silicone for model duplication

| Code    | Packaging                       |
|---------|---------------------------------|
| C400823 | 250 g (Base) + 250 g (Catalyst) |
| C400834 | 1 kg (Base) + 1 kg (Catalyst)   |
| C400842 | 5 kg (Base) + 5 kg (Catalyst)   |





#### Elite Double 22 Extra Fast - A-Silicone for model duplication

| Elite Doub | Jouble 22 Extra Fast - A-Silicone for model duplication |  |  |  |  |  |  |
|------------|---|--|--|--|--|--|--|
| Code       | Packaging   |  |  |  |  |  |  |
| C400849    | 5 kg (Base) + 5 kg (Catalyst)                           |  |  |  |  |  |  |

#### Elite Double 32 - A-Silicone for model duplication

| Code    | Packaging                     |
|---------|-------------------------------|
| C400833 | 1 kg (Base) + 1 kg (Catalyst) |
| C400841 | 5 kg (Base) + 5 kg (Catalyst) |

#### Elite Double 32 Fast - A-Silicone for model duplication

| Code    | Packaging                     |
|---------|-------------------------------|
| C400836 | 1 kg (Base) + 1 kg (Catalyst) |
| C400843 | 5 kg (Base) + 5 kg (Catalyst) |

#### Accessories







### Model preparation Gingival reproduction

To reproduce artificial gengiva on a model, Zhermack offers top quality, precise polyvinylsiloxane products with long stability to facilitate work in the laboratory.

They retain their characteristics unaltered throughout all phases of the process, giving the lab technician more peace of mind.

#### A-SILICONES

| Gingifast Elastic     | 62 |
|-----------------------|----|
| Gingifast Rigid       | 62 |
| Gingifast CAD Elastic | 62 |
| Gingifast CAD Rigid   | 62 |

**Gingifast** addition silicones are conceived to reproduce gingival morphology on models in fixed prosthesis and implant applications.

Zhermack proposes the most suitable gum mask for all types of application.

**Gingifast Elastic** guarantees excellent aesthetic results, thanks to its translucence and the presence of fibrils to give a natural effect. Particularly suitable in the presence of undercuts and thin thicknesses.

**Gingifast Rigid** is indicated for the direct technique. Thanks to its balanced hardness, it can be worked easily with burs and is the top product in the field of implant prosthetics.

**Gingifast CAD**, a scannable fluid silicone available in two versions, Rigid and Elastic, completes the range. Scannable and readable without requiring reflective sprays, it is conceived for maximum performance in acquiring 3D data, saving time, simplifying processes and improving quality.



Gingifast Rigid - direct technique

#### Characteristics

- Two hardnesses: Elastic 40 Shore A, Rigid 70 Shore A
- Setting time: 10:00
- Mixing ratio 1:1

#### Advantages

- Compatible with the various techniques used to make artificial gums (direct and indirect)
- Excellent aesthetic results
- With the Gingifast CAD formula, very small mixing tips can be used reducing silicone waste



Gingifast Rigid



Gingifast Elastic - indirect technique





| Product                  | Recommended in the presence<br>of undercuts | Recommended in the presence<br>of implants |
|--------------------------|---|--|
| Gingifast Elastic        | •   | o  |
| Gingifast Rigid          | 0   | •  |
| Gingifast CAD<br>Elastic | •   | •  |
| Gingifast CAD<br>Rigid   | 0   | •  |

ullet highly recommended  $\circ$  recommended

| Product                  | Mixing ratio<br>(Base:Catalyst) | Working time*<br>(min:s) | Setting time*<br>(min:s) | Hardness<br>(Shore A) | Scannable without<br>sprays | Workable with a bur |
|--------------------------|---------------------------------|--------------------------|--------------------------|-----------------------|-----------------------------|---------------------|
| Gingifast Elastic        | 1:1                             | 2:00                     | 10:00                    | 40                    |                             |                     |
| Gingifast Rigid          | 1:1                             | 2:00                     | 10:00                    | 70                    |                             | ٠                   |
| Gingifast CAD<br>Elastic | 1:1                             | 2:00                     | 10:00                    | 40                    | ٠                           | •                   |
| Gingifast CAD<br>Rigid   | 1:1                             | 2:00                     | 10:00                    | 70                    | ٠                           | •                   |

\*The times mentioned above are intended from the start of the mixing phase at 23 °C (73 °F).

### Gingifast

#### Model preparation / Gingival reproduction

#### Gingifast Rigid - Simultaneous technique



1. Analogue impression



2. Wax barriers



3. Application of the separator



4. Application of Gingifast Rigid



5. Creation of orientation points and impression boxing



6. Gypsum casting



FINAL RESULT

### Gingifast Elastic - Indirect technique



1. Master model



2. Zetalabor mask



3. Mask removal



4. Diestone



8. Gingifast Elastic injection complete (material oozes out of the venting channels)





5. Creation of holes for silicone injection and application of the separator to the mask



6. Mask repositioning onto the master model



7. Injection of Gingifast Elastic inside the mask



FINAL RESULT



9. Mask removal (venting channels present on the gum) and subsequent finishing of the gum, eliminating the venting channels



#### Model preparation / Gingival reproduction





| Gingifast E | ingifast Elastic - A-Silicone for gingival reproduction  |  |  |  |
|-------------|--|--|--|--|
| Code        | Packaging  |  |  |  |
| C401500     | 2 x 50 ml cartridges + 1 x 10 ml Gingifast Separator bottle + 12 mixing tips (small) + 12 yellow intraoral tips + 1 trigger spray nozzle |  |  |  |



| Gingifast Rigid - A-Silicone for gingival reproduction |  |  |  |  |
|--|--|--|--|--|
| Code   | Packaging  |  |  |  |
| C401520  | 2 x 50 ml cartridges + 1 x 10 ml Gingifast Separator bottle + 12 mixing tips (small) + 12 yellow intraoral tips + 1 trigger spray nozzle |  |  |  |



#### Gingifast CAD Elastic - Scannable A-Silicone for gingival reproduction

|         | 5 5 1  |
|---------|--|
| Code    | Packaging  |
| C203227 | 2 x 50 ml cartridges + 1 x 10 ml Gingifast Separator bottle + 12 mixing tips (extra small) |



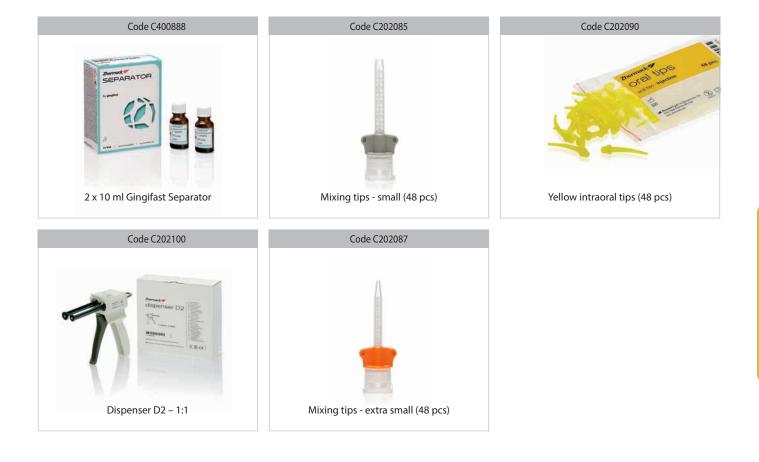
#### Gingifast CAD Rigid - Scannable A-Silicone for gingival reproduction

| Code    | Packaging  |
|---------|--|
| C203232 | 2 x 50 ml cartridges + 1 x 10 ml Gingifast Separator bottle + 12 mixing tips (extra small) |



#### Model preparation / Gingival reproduction







## Prosthesis preparation

Constant research, continuous improvement and years of experience in prosthodontics have enabled Zhermack to develop a system of high quality laboratory solutions that work in synergy to create accurate and aesthetic prostheses.

Zhermack's resins and investments simplify the work of the lab technician and allow high performance prostheses to be made easily, quickly and cheaply.



#### **Prosthesis preparation**

## **Custom trays**

For custom trays and bases for mounting teeth, Zhermack offers different resins adaptable to the main dental laboratory needs.

Easy and quick to use, Elite LC Tray is the line of light-curing resin plates to optimise working times without compromising on quality.

| LIGHT-CURING RESINS |    |  |  |  |  |  |  |
|---------------------|----|--|--|--|--|--|--|
| Elite LC Tray       | 72 |  |  |  |  |  |  |
| Elite LC Tray ROUND | 72 |  |  |  |  |  |  |



### Elite LC Tray | Elite LC Tray ROUND

Light-curing resins

#### **Prosthesis preparation** / Custom trays

**Elite LC Tray** is a line of light-curing resin plates for custom impression trays. Also indicated for making bases for mounting teeth and bite plates in removable prosthesis modeling.

**Elite LC Tray** can be used to make bases and custom trays of various sizes to meet the main requirements in this application. **Elite LC Tray ROUND** is particularly indicated for laboratories wanting medium-sized ergonomic plates.

#### Characteristics

- Cured with either halogen or UV light (3 5 minutes)
- Stable to daylight or artificial light for about 20:00
- Available in three colours: blue, white and pink
- Minimum shrinkage after curing

#### **Advantages**

- Easy to model, not sticky
- Quick, saves time with respect to traditional self-curing resins
- Uniform thickness





Elite LC Tray



Elite LC Tray ROUND

| Product                | Setting time (min:s) | Thickness | Hardness (Shore D) | Curing  |
|------------------------|----------------------|-----------|--------------------|---|
| Elite LC Tray          | 3:00 - 5:00          | 2.5 mm    | 80                 | UV light (350 - 400 nm)<br>Halogen light (420 - 480 nm) |
| Elite LC Tray<br>ROUND | 3:00 - 5:00          | 2.5 mm    | 80                 | UV light (350 - 400 nm)<br>Halogen light (420 - 480 nm) |

### Elite LC Tray - Light curing resin for custom impression trays

| Codes   | Packaging                    |
|---------|------------------------------|
| D500100 | Elite LC Tray White (50 pcs) |
| D500101 | Elite LC Tray Pink (50 pcs)  |
| D500102 | Elite LC Tray Blue (50 pcs)  |

### Elite LC Tray ROUND - Light curing resin for custom impression trays

| Codes   | Packaging                         |
|---------|-----------------------------------|
| D500052 | Elite LC Tray ROUND Pink (50 pcs) |

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**Prosthesis preparation** 

## **Temporary restorations**

Acrytemp is Zhermack's self-curing bis-acryl resin for short- and long-term temporary restorations. It comes in self-mixing cartridges, for proper and rapid application.

Its failure resistance and natural fluorescence help to achieve a reliable and aesthetic result, to satisfy the practitioner and the patient alike.

#### 

**Acrytemp** is a self-curing bis-acryl resin for short- and-longterm temporary restorations with a high failure resistance.

The flexural and compressive strength of **Acrytemp** allow the temporary restoration to resist masticatory loads, which helps reduce the risk of breakage and therefore the failure of the restoration. It also offers limited curing shrinkage and a limited exothermic reaction during the setting phase.

**Acrytemp** is methyl methacrylate-free and it possesses good chromatic stability and natural fluorescence.



Acrytemp

#### Characteristics\*

- High failure resistance
- Limited cure shrinkage
- Limited exothermic reaction during curing
- Absence of methyl methacrylate
- Natural fluorescence
- Good chromatic stability
- Available in 5 different shades

#### Advantages

- Low failure risk
- Volumetric stability
- Safe for the tissues
- Natural, long-lasting cosmetic result
- Applicational versatility

#### \*Technical data table.



Acrytemp



Acrytemp



| Product  | Working time<br>(min:s) | Setting time<br>in the mouth<br>(min:s) | Compressive<br>strength | Flexural<br>strength | Volumetric<br>shrinkage | Max. temperature<br>during curing |
|----------|-------------------------|---|-------------------------|----------------------|-------------------------|-----------------------------------|
| Acrytemp | 0:50                    | 1-2 minutes                             | 250 MPa                 | 65 MPa               | 5%                      | 37°C                              |



#### Acrytemp - Bisacrylic self-curing resin

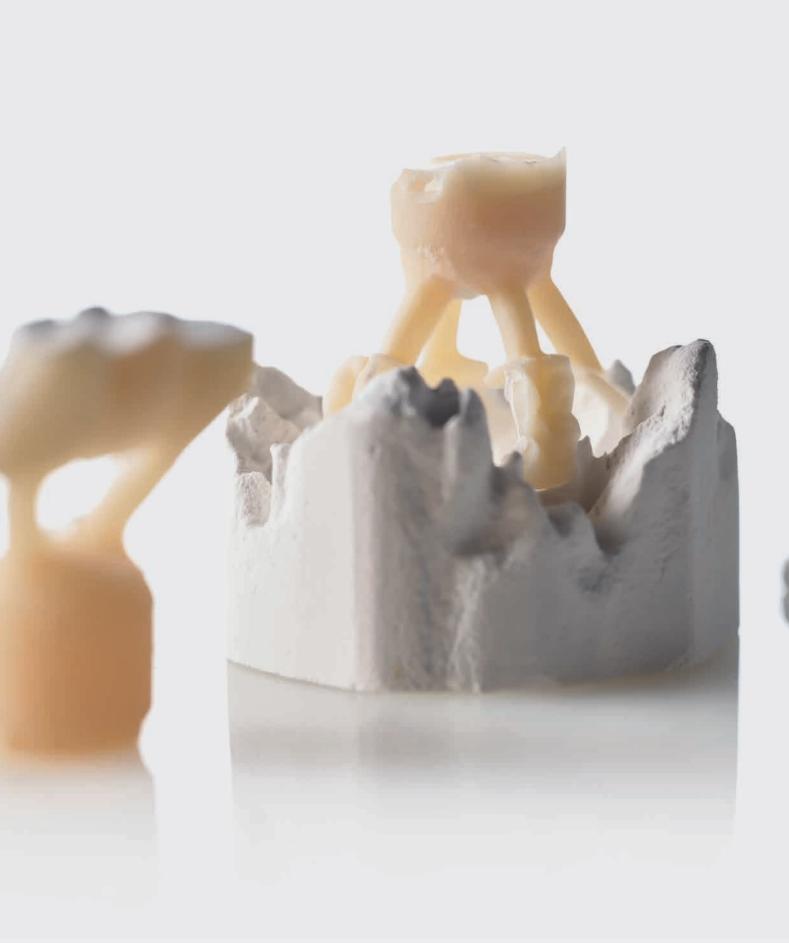
| Code    | Colour | Packaging   |
|---------|--------|---|
| C700201 | A1     | Standard Pack: 1 cartridge 50 ml (76 g)* + 15 mixing tips 4:1 |
| C700200 | A2     | Standard Pack: 1 cartridge 50 ml (76 g)* + 15 mixing tips 4:1 |
| C700215 | A3     | Standard Pack: 1 cartridge 50 ml (76 g)* + 15 mixing tips 4:1 |
| C700205 | A3.5   | Standard Pack: 1 cartridge 50 ml (76 g)* + 15 mixing tips 4:1 |
| C700211 | B1     | Standard Pack: 1 cartridge 50 ml (76 g)* + 15 mixing tips 4:1 |

#### \* The 4:1 Acrytemp cartridge is compatible with the most common 4:1 and 10:1 dispensers.

 Code C700230
 Code C700240

 Image: D2 - 4:1 dispenser
 Image: D2 - 4:1 dispenser







Prosthesis preparation

## Investments

The Elite Vest line of investments is conceived to simplify the use of the investment in the laboratory and reduce stocks.

All the most common fixed and removable prosthesis applications can be covered with just two powders (one for fixed prostheses and one for frameworks) and a universal liquid.

# PHOSPHATE INVESTMENTSElite Vest Plus80Elite Vest Cast80Elite Vest Liquid80

#### Prosthesis preparation / Investments

Just two types of powder and one universal liquid allow casts to be made with all alloys\* and pressable ceramics.

Elite Vest Plus is the universal precision investment for fixed prostheses, compatible with non precious alloys\*, precious alloys and pressable ceramics. Elite Vest Cast is a precision investment specific for frameworks, compatible with base alloys\* and precious alloys. Elite Vest Liquid is the universal mixing liquid for both investments.

#### Characteristics

- Quick or traditional preheating
- Fine powder, carbon-free formulas with expansion adaptable to the working technique
- Excellent precision, particularly in implants and large bridges



Elite Vest Plus

#### **Advantages**

- Easy to use and manage: just two products for all types of work
- Flexibility: expansion can be adapted to the different needs
- Work speed: smooth alloy surface after preparation



Elite Vest Plus - cast metal coping



Elite Vest Plus

\* excluding titanium alloys



| Product           | Fixed prosthesis<br>(crowns, inlays, onlays) |  | (crowns and bridg                       | rosthesis<br>ges, partial crowns,<br>elescopic crowns) | Frameworks (combined extended removable<br>partial prosthesis in a single piece, combined<br>extended removable partial prosthesis with<br>clasps, normal removable partial prosthesis) |   |
|-------------------|--|--|---|--|---|---|
|                   | Pressable ceramics                           | Au alloys<br>with a high gold<br>content | Au alloys<br>with a low gold<br>content | Palladium alloys                                       | Base alloys   |   |
| Elite Vest Plus   | ٠  | •  | ٠                                       | •  | •   |   |
| Elite Vest Cast   |  |  |   |  |   | • |
| Elite Vest Liquid | ٠  | •  | ٠                                       | ٠  | •   | • |

| Technical features                                  | Elite Vest Plus     | Elite Vest Cast     |
|---|---------------------|---------------------|
| Powder/liquid ratio (Elite Vest Liquid)             | 100 g / 24 - 26 ml  | 100 g / 18 - 20 ml  |
| Manual mixing time (min:s)                          | 00:15 - 00:30       | 00:15 - 00:20       |
| Vacuum mixing time (320 rpm) (min:s)                | 00:60               | 00:60               |
| Vacuum maintenance time after mixing (min:s)        | 00:15 - 00:30       | 00:10 - 00:15       |
| Working time* (min:s)                               | 6:00                | 5:00                |
| Time in preheat oven (from start of mixing) (min:s) | 23:00 - 25:00       | 23:00 - 25:00       |
| Ideal liquid storage temperature                    | 18 - 22 °C (> 5 °C) | 18 - 22 °C (> 5 °C) |
| Preheat temperature                                 | 850 - 900 °C        | 900 - 930 °C        |
| Maximum preheat temperature                         | 1200 °C             | 1050 °C             |

\*Times indicated may vary according to room temperature.

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#### Prosthesis preparation / Investments





## **Elite Vest Plus**

| Linte vesti | 105            |
|-------------|----------------|
| Code        | Packaging      |
| C420000     | 40 x 160 g bag |



#### **Elite Vest Cast** Code Packaging C420002 30 x 400 g bag



#### **Elite Vest Liquid**

Code

C420010

Bottle 1 L

Packaging



#### Prosthesis preparation / Investments







## Hygiene

Cleaning and disinfecting impressions coming from the dental surgery are a safeguard against infections. Choosing effective products with a broad spectrum of action is therefore essential to protect the health of laboratory technicians.

Quick acting easy-to-use products, free from phenols and aldehydes - toxic substances. Like the products in the Zeta Hygiene range, developed from Zhermack's experience in the cold disinfection and sterilisation of medical-surgical devices. Comprehensive solutions, regulated by strict production standards and controlled and tested according to the European regulations for an adequate protection every time.



## Hygiene Hygiene lab applications

Solutions for impressions cleaning and disinfection and for the cleaning of alginate and gypsum residues on instruments.

## IMPRESSIONS DISINFECTANTS Zeta 7 Spray 88 Zeta 7 Solution 88

| CLEANERS FOR THE REMOVAL OF TRAYS A | ND INSTRUMENTS |
|-------------------------------------|----------------|
| ALGINATE AND GYPSUM RESIDUES        |                |
| Algitray                            | 89             |
| Gypstray                            |                |

### Zeta 7 Spray | Zeta 7 Solution

Impressions disinfectants

#### **Hygiene /** Hygiene lab applications

Zhermack offers high performance products for impression disinfection: broad spectrum of action, according to the European Norms validated on disinfection, and high compatibility with different types of impression material.

Zeta 7 Spray is a ready to use disinfectant for a quick and easy disinfection of impressions.

Zeta 7 Solution is a broad spectrum concentrated disinfectant.

#### Characteristics

- Broad spectrum of action developed and tested according to the European Norms on disinfection
- Compatibility with materials for the impression taking (addition and condensation silicones, alginate, polyether, polysulphide and polyvinyl)

#### **Advantages**

- Efficacy: broad protection for professionals in dental practices and laboratories
- High performance: respects the dimensional stability of impressions characteristics and their compatibility with gypsum and improves accuracy in the reproduction of gypsum models





Zeta 7 Spray



Zeta 7 Solution

| Product         | Type of<br>product             | Active<br>ingredients  | Dilution                    | Action<br>time | Distinctive characteristics   | Spectrum of action  |
|-----------------|--------------------------------|--|-----------------------------|----------------|---|---|
| Zeta 7 Spray    | <b>y</b> Disinfectant Alcohols |  | Ready<br>to use             | 3 minutes      | Improve smoothness of<br>gypsum on impressions<br>surfaces and reduce the<br>formation of bubbles | Bactericidal: EN 13727 (S. aureus, P. aeruginosa, E. hirae)<br>Yeasticidal: EN 13624 (C. albicans)<br>Tuberculocidal: EN 14348, EN 14563 (M. terrae)<br>Virucidal: EN 14476 (Poliovirus, Adenovirus, Parvovirus,<br>Norovirus including HIV, HBV, HCV)<br>Tests carried out in dirty conditions.                          |
| Zeta 7 Solution | Disinfectant                   | Quaternary<br>Disinfectant Ammonium Salts,<br>Phenoxyethanol |                             | 10 minutes     | Concentrated, allows<br>for the preparation of up<br>to 100 litres of disinfectant<br>solution    | Bactericidal: EN 13727 (S. aureus, P. aeruginosa, E. hirae)<br>Yeasticidal: EN 13624 (C. albicans)<br>Bactericidal, Yeasticidal: VAH (30')<br>Tuberculocidal: EN 14348 (M. terrae)<br>Virucidal against enveloped viruses: EN 14476 (Vaccinia<br>Virus including HIV, HBV, HCV)<br>Tests carried out in dirty conditions. |
|                 | Co                             | de l   | Product                     |                | I   | Packaging   |
|                 | C810050 Zeta 7 Spray           |  | 750 ml bottle with foam cap |                |   |   |
|                 | C81004                         | 8 Zeta   | a 7 Solution                | 1 litre bottle |   |   |







#### Algitray | Gypstray Cleaners for the removal of trays and instruments alginate and gypsum residues

Hygiene / Hygiene lab applications

Algitray and Gypstray are ideal for the cleaning and removal of alginates and gypsum residues from trays and instruments. Guarantees deep cleaning action even in less accessible areas, with respect for to treated materials.

Algitray is a specific cleaner, free of phosphates and surfactants, for removing alginate residues from impression trays and other instruments. Gypstray is a ready to use solution for the removal of gypsum residues from impression trays, spatulas or other instruments.

## Algitray and Gypstray

#### **Advantages**

- Efficacy: help remove traces of alginate and gypsum even in less accessible areas
- Protection of materials: non-aggressive formula



| Product  | Type of product                        | Active ingredients  | Dilution              |  |
|----------|--|---------------------|-----------------------|--|
| Algitray | Cleaner for removing alginate residues | Alginate dissolvers | Solution powder: 10 % |  |
| Gypstray | Cleaner for removing gypsum residues   | Gypsum dissolvers   | Ready to use          |  |







Dental

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Elite Base page 22

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Elite Ortho **page 27** 

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Titanium page 42



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Zetalabor page 42



## Fulfilling your needs

