









VITA

VITA YZ[®] ZIRCONIA

The basic steps for indication,
preparation, bonding and polishing



Product	Application areas	Technical values	
<p>VITA YZ® XT</p> 	<p>Extra translucent ZrO₂ blanks</p> <p>Partially veneered and monolithic restorations</p> <ul style="list-style-type: none"> • White • Color (monochromatic, tooth shades) • Multicolor (polychromatic, tooth shades) 	<p>Yttrium content (Y₂O₃)</p> <p>3-point flexural strength</p> <p>Translucency</p>	<p>5 mol%</p> <p>850 MPa</p> <p>50 %</p>
<p>VITA YZ® ST</p> 	<p>Super translucent ZrO₂ blanks</p> <p>Partially veneered and monolithic restorations</p> <ul style="list-style-type: none"> • White • Color (monochromatic, tooth shades) • Multicolor (polychromatic, tooth shades) 	<p>Yttrium content (Y₂O₃)</p> <p>3-point flexural strength</p> <p>Translucency</p>	<p>4 mol%</p> <p>1200 MPa</p> <p>46 %</p>
<p>VITA YZ® T / HT</p> 	<p>Translucent and high-translucent ZrO₂ blanks</p> <p>Fully veneered restorations</p> <ul style="list-style-type: none"> • White • Color (monochromatic, tooth shades) 	<p>Yttrium content (Y₂O₃)</p> <p>3-point flexural strength</p> <p>Translucency</p>	<p>3 mol%</p> <p>1350 MPa</p> <p>32 % / 42 %</p>

VITA YZ ZIRCONIA offers remarkable strength and exceptional esthetics for reliable restorations. VITA YZ materials enable the precise and accurate shade production of fully / partially veneered and monolithic restorations. Discover the advantages.

- High shade accuracy and vivid chroma for exceptional esthetics ¹⁻⁴
- Proven long-term clinical stability and biocompatibility ⁵⁻⁷
- High strength for the reliable restoration of teeth and implants ⁸⁻¹⁰
- Easy and reliable polishing ¹¹
- Tested material structure for reliable processing, veneering and integration ¹²⁻¹⁸
- Precise, outstanding fit ^{19, 20}
- Restoration that preserves the tooth structure, thanks to reduced wall thickness ²¹⁻²³





Dental technical workflow



Shade determination

CAD/CAM
process

Staining
technique

Sintering

Characteri-
zation

Polishing

Bonding

Our product recommendations

Digital shade determination

- VITA Easyshade V
- VITA Easyshade LITE

Visual shade determination

- VITA classical A1-D4 shade guide
- VITA Linearguide 3D-MASTER
- VITA Toothguide 3D-MASTER

Polishing instruments

- VITA CERAMICS Polishing Set clinical
- VITA CERAMICS Polishing Set technical

Polishing paste

- VITA Polish Cera

Self-adhesive

- VITA ADIVA SELF-ADHESIVE
- RelyX Unicem 2 (3M ESPE)

Fully adhesive

- VITA ADIVA FULL-ADHESIVE
- VITA ADIVA IA-CEM, ultra opaque
- MultiLink Automix (Ivoclar Vivadent)
- Panavia V5 (Kuraray)

Glass ionomers

- Ketac CEM (3M ESPE)
- Vivaglass CEM (Ivoclar Vivadent)
- GC Fuji I (GC Dental)

Indication	T Translucent	HT High Translucent	ST Super Translucent	XT Extra Translucent
	●	●	×	×
	—	○	●	●
	—	○	●	●
	—	○	●	●
	—	○	●	●
	○	●	●	●
	○	●	●	●
	○	●	●	×
	●	●	○	○
	●	●	○	○
	●	●	○	×
	●	●	○	○
	●	●	○	○
	●	●	○	×

- recommended
- possible
- ×
- not recommended

- monolithic anterior restoration
- fully/partially veneered anterior restoration

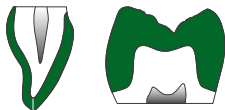
- monolithic posterior restoration
- fully/partially veneered posterior restoration

* VITA YZ T, HT and ST are approved for reconstructions on natural tooth stumps and implants. VITA YZ XT reconstructions are approved only for restorations on natural tooth stumps. The material-specific manufacturer's information on minimal wall thicknesses and connector cross-sections must be observed.

To ensure clinical success of restorations made from VITA YZ XT, the following minimum layer thicknesses must be adhered to:

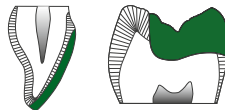
Anterior / posterior crowns (fully anatomical or substructure)

Incisal:	0.8 mm
Occlusal:	0.8 mm
Circumferential:	0.7 mm



Inlays / Onlays / Veneers

Incisal:	0.8 mm
Occlusal:	0.8 mm
Circumferential:	0.7 mm



Fully anatomical anterior bridges and substructures with one pontic

Incisal:	1.0 mm
Circumferential:	0.8 mm
Connector cross-sections:	9.0 mm ²



Fully anatomical posterior bridges and substructures with one pontic

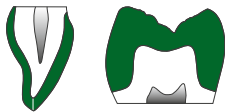
Occlusal:	1.2 mm
Circumferential:	1.0 mm
Connector cross-sections:	12.0 mm ²



To ensure clinical success of restorations made from VITA YZ ST, the following minimum layer thicknesses must be adhered to:

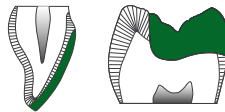
Anterior / posterior crowns (fully anatomical or substructure)

Incisal:	0.6 mm
Occlusal:	0.6 mm
Circumferential:	0.5 mm



Inlays / Onlays / Veneers

Incisal:	0.6 mm
Occlusal:	0.6 mm
Circumferential:	0.5 mm



Fully anatomical anterior bridges and substructures with one pontic

Incisal:	0.6 mm
Circumferential:	0.6 mm
Connector cross-sections:	9.0 mm ²



Fully anatomical posterior bridges and substructures with one pontic

Occlusal:	0.7 mm
Circumferential:	0.6 mm
Connector cross-sections:	12.0 mm ²



Fully anatomical anterior bridges and substructures with two pontics

Incisal:	0.8 mm
Circumferential:	0.6 mm
Connector cross-sections:	12.0 mm ²



Fully anatomical multi-unit posterior bridges and substructures with two pontics

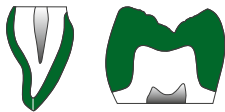
Occlusal:	0.8 mm
Circumferential:	0.6 mm
Connector cross-sections:	15.0 mm ²



To ensure clinical success of restorations made from VITA YZ T / HT, the following minimum layer thicknesses must be adhered to:

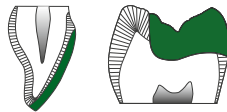
Anterior / posterior crowns (fully anatomical or substructure)

Incisal:	0.5 mm
Occlusal:	0.5 mm
Circumferential:	0.4 mm



Inlays / Onlays / Veneers

Incisal:	0.5 mm
Occlusal:	0.5 mm
Circumferential:	0.4 mm



Fully anatomical anterior bridges and substructures with one pontic

Incisal:	0.5 mm
Circumferential:	0.5 mm
Connector cross-sections:	7.0 mm ²



Fully anatomical posterior bridges and substructures with one pontic

Occlusal:	0.6 mm
Circumferential:	0.5 mm
Connector cross-sections:	9.0 mm ²



Fully anatomical anterior bridges and substructures with two pontics

Incisal:	0.6 mm
Circumferential:	0.5 mm
Connector cross-sections:	9.0 mm ²



Fully anatomical posterior bridges and substructures with two pontics

Occlusal:	0.7 mm
Circumferential:	0.6 mm
Connector cross-sections:	12.0 mm ²





Polishing of the occlusal surface, especially of the areas that are in direct contact with the antagonist, is particularly important for monolithic restorations.

Preparation

- Grind zirconia wet

Prepolishing

Speed:
7,000 - 12,000 rpm

diamond-coated
polishing instruments, pink

High luster finish

Speed:
4,000 - 8,000 rpm

diamond-coated
polishing instruments, grey

Final high-gloss polishing

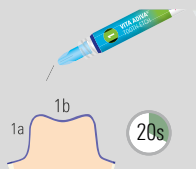
Speed:
5,000 - 10,000 rpm

Dry cotton buff. Note: Maintain recommended speed and work with moderate contact pressure to avoid excessive heat development.

VITA Polish Cera:

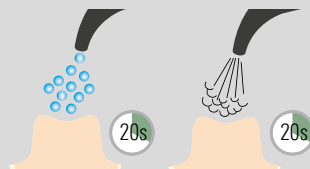
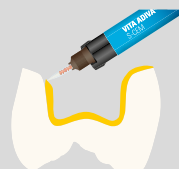
Apply polishing paste using a soft goat hair or bison polishing brush. It is very suitable in conjunction with the polishing instruments of the VITA CERAMICS Polishing Sets clinical and technical.

Etching



Etch the tooth substance with 37% phosphoric acid gel, e.g., VITA ADIVA TOOTH-ETCH, for 20 sec.

Clean spraying/drying

Application of bonding composite
Light curing

Bonding, e.g., with self-adhesive composite VITA ADIVA S-CEM.

*Self-adhesive bonding is the standard method for zirconia.

Full-adhesive bonding is also possible according to your personal preference.

More information on bonding of VITA YZ restorations can be found at www.vita-zahnfabrik.com/adiva

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