

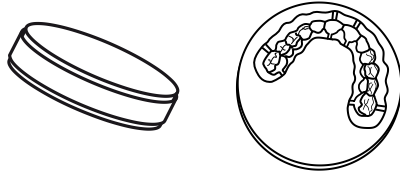
Ergitan® 3.7065 (Grade 4) Data Sheet

CAD/CAM Blanks Dental

Medical Alloys



Zapp is Certified to ISO 9001



Ergitan® 3.7065

Ergitan® 3.7065 is an unalloyed pure titanium with a higher content of oxygen in comparison to Ergitan® 3.7035 (Grade 2). This material has the highest tensile strength of unalloyed titanium. It shows an outstanding biocompatibility and is adopted by the human body because of its non-toxic and non-allergic elements.

CAD/CAM blanks are available from stock or can be produced acc. to customer-specific drawings.

Typical fields of application

- Crowns
- Bridges
- Individual designed constructions

Corresponding standards

- ASTM F67 (UNS R50700)

Guideline

- Following DIN EN ISO 22674:2006

Magnetism

Ergitan® 3.7065 is not magnetizable.

Corrosion resistance

Ergitan® 3.7065 is characterized by an extraordinary corrosion resistance because of the low Fe content. This material also has a high resistance against pitting corrosion. Due to the formation of a dense oxide layer Ergitan® 3.7065 provides good corrosion resistance in an oxidizing environment.

Machining

In annealed condition, machinability of Ergitan® 3.7065 is good. In comparison to high quality steels, cutting rate of Ergitan® 3.7065 should be reduced. It is important to ensure very good cooling.

Chemical composition *

Fe	O	H	C	N	Ti
max. 0.50	max. 0.40	max. 0.015	max. 0.08	max. 0.05	Bal.

* Average in mass -%

Mechanical properties

Tensile Strength	[MPa]	min. 550
Yield Strength	[MPa]	min. 483

Physical properties

Modulus of Elasticity E at 20 °C [GPa]	105
Specific Density [kg/dm³]	4.5
Thermal Conductivity at 20°C [W/m*K]	22
CTE Coefficient of Thermal Expansion [10 ⁻⁶ *K ⁻¹] 25 - 500 °C	9.8
Specific Heat at 20 °C [kJ/kg*°C]	526
Electric Resistivity ρ at 20 °C [Ω*mm²/m]	0.55

Delivery conditions*

Range of Dimension	98 – 100 mm
Finish	Processed surface
Shape	<input type="checkbox"/> Round <input type="checkbox"/> Round with step <input type="checkbox"/> Acc. to drawing
Thickness	8.00 10.00 12.00 13.50 14.00 15.00 16.00 17.50 18.00 20.00 ... up to 28.00
Service Conditions	<input type="checkbox"/> Labeled or laser marked on demand <input type="checkbox"/> Single or multiple packing units

* All others on request

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Further information regarding our products and locations are available in our image brochure and under www.zapp.com

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