# QUATTROCONE MICROCONE



**IMPLANT SYSTEMS** 

# **MEDENTIKA**Catalog



# The QUATTROCONE implant

Primary stability
Bone preserving
High precision conical connection between implant and abutment



### **SURFACE**

The highly pure, sand-blasted and acid-etched surface extends the entire length of the implant to the machined implant shoulder. It possesses macro-micro roughness that is ideally dimensioned for the deposition of bone-forming cells and thus enhances the ideal and above all reliable long-term osseointegration of the implant. It ensures well above average crestal bone formation in conjunction with the coronal microthread and the conical interface, throughout the implant shoulder to the interface.

### **FORM**

The body of the QUATTROCONE implant is root shaped and, in combination with a high-profile thread and three cutting edges, ensures high primary stability, even in challenging situations. Perfect for immediate implant placement and immediate loading.



#### **QUATTROCONE** implant

- D 3.5
- Titanium Grade 4
- Sterile packaged
- · Incl. closure screw

#### D 3.5 mm

Length	9 mm	11 mm	13 mm	15 mm
Implant connection	RI	RI	RI	RI
Article No.	3-01-02	3-01-03	3-01-04	3-01-05

### **QUATTROCONE** implant

- D 3.8
- · Titanium Grade 4
- Sterile packaged
- · Incl. closure screw

	mm

Length	7 mm	9 mm	11 mm	13 mm	15 mm
Implant connection	RI	RI	RI	RI	RI
Article No.	3-01-16	3-01-17	3-01-18	3-01-19	3-01-20

### **QUATTROCONE** implant

- D 4.3
- · Titanium Grade 4
- · Sterile packaged
- Incl. closure screw

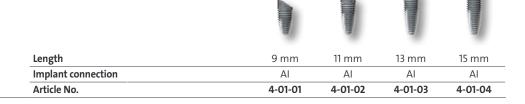
### D 4.3 mm

Length7 mm9 mrImplant connectionRIRI	m 11 mm 13 mm RI RI	15 mm RI
Implant connection RI RI	RI RI	RI

### **QUATTROCONE30** implant

- $\cdot \, \mathsf{angled}$
- D 4.3
- Titanium Grade 4
- Sterile packaged

#### D 4.3 mm



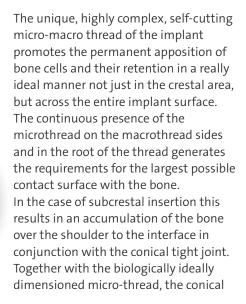
### **QUATTROCONE** implant

- D 5.0
- · Titanium Grade 4
- Sterile packaged
- · Incl. closure screw

#### D 5.0 mm

Length	7 mm	9 mm	11 mm	13 mm	15 mm
Implant connection	RI	RI	RI	RI	RI
Article No.	3-01-11	3-01-12	3-01-13	3-01-14	3-01-15

#### MICRO-MACRO THREAD



joint ensures that the bone also stays permanently in position. This for its part results in the supporting of the soft tissue above it and thus permanent red and white aesthetics. The thread, designed to be inserted atraumatically and the drilling protocol reduce the risk of pressure necrosis.

Short insertion time thanks to a thread pitch of 0.8 mm per turn (macro thread).



#### IMPLANT CONNECTION

The high precision friction-locked and keyed interface achieves the best possible levels of stability between the abutment and the implant.\*

- 1. One conical connection between the implant and the abutment in the case of implants with a diameter of 3.5 to 5.0 mm.
- 2. Conical connection between the implant and the abutment that is free of micromovements. As a result of this no mechanical irritations arise and the retention of the peri-implant bone is positively influenced.
- 3. The connection is virtually bacteria and liquid proof and can reduce the risk of infection. It supports the development of healthy tissue that is not irritable and prevents bone depletion.
- 4. Integrated system-linked platform switching shifts the transition between the implant and the abutment from the implant shoulder to a central position. This keeps bacterial stimuli away from the peri-implant tissue in conjunction with the tight conical connection and creates a broad horizontal basis for the stable apposition of hard and soft tissue.
- 5. The implant abutment connection meets all the system requirements for permanent red-white aesthetics in conjunction with a subcrestal implant position and the coronal microthread section.



<sup>\*</sup>Mechanically tested according to ISO 14801 by the Fraunhofer IWM in Freiburg (Germany).

# Color coding



The visible indication of the implant diameter, framed by the color coding, makes it easier to visually differentiate the respective implant diameters.

The drill parts for the implant bed preparation are also highlighted with these colors.



# Diameters and lengths

MICROCONE implants are available in five diameters and different lengths. Due to the needs-based size graduation they are suitable for all dental implantology indications for a minimized number of single implants.



<sup>\*</sup> Implant connection NI (Narrow Interface)

Implant connection RI (Regular Interface)

### **MICROCONE** implant

- D 3.0
- · Titanium Grade 5 CF
- Sterile packaged
- · Incl. closure screw

#### D 3.0 mr

Length	11 mm	13 mm	15 mm
Implant connection	NI	NI	NI
Article No.	1-01-06	1-01-07	1-01-08

### **MICROCONE** implant

- D 3.5
- · Titanium Grade 4
- Sterile packaged
- · Incl. closure screw

### D 3.5 mm

Length	8 mm	9 mm	11 mm	13 mm	15 mm
Implant connection	RI	RI	RI	RI	RI
Article No.	2-01-30	2-01-31	2-01-32	2-01-33	2-01-34

### **MICROCONE** implant

- D 4.0
- · Titanium Grade 4
- · Sterile packaged
- Incl. closure screw

#### D 4.0 mm

					The second	
Length	6,5 mm	8 mm	9 mm	11 mm	13 mm	15 mm
Implant connection	RI	RI	RI	RI	RI	RI
Article No.	2-01-35	2-01-36	2-01-37	2-01-38	2-01-39	2-01-40

#### **MICROCONE** implant

- D 4.5
- Titanium Grade 4
- · Sterile packaged
- · Incl. closure screw

#### D 4.5 mm



### **MICROCONE** implant

- $\cdot \, \mathsf{conical}$
- · D 4.5/3.5
- · Titanium Grade 4
- Sterile packaged
- Incl. closure screw

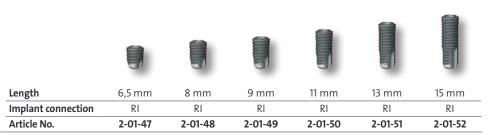
#### D 4.5/3.5 mm

	9			
Length	6,5 mm	9 mm	11 mm	13 mm
Implant connection	RI	RI	RI	RI
Article No.	2-01-53	2-01-54	2-01-55	2-01-56

### **MICROCONE** implant

- D 5.0
- · Titanium Grade 4
- · Sterile packaged
- · Incl. closure screw

D 5.0 mm



### **Gingiva former**

- D 3.0
- Titanium Grade 5 CF
- · Sterile packaged



Implant connection	RI
Gingiva height	4.0 mm
Diameter	D 3.0
Article No.	2-03-14

### **Gingiva former**

- D 4.0
- · Titanium Grade 5 CF
- · Sterile packaged







Implant connection	RI	RI	RI
Gingiva height	3.0 mm	4.0 mm	6.0 mm
Diameter	D 4.0	D 4.0	D 4.0
Article No.	2-03-18	2-03-19	2-03-20

### **Gingiva former**

- D 4.5
- · Titanium Grade 5 CF
- · Sterile packaged











Implant connection	RI	RI	RI	RI	RI
Gingiva height	1.0 mm	2.0 mm	3.0 mm	4.0 mm	6.0 mm
Diameter	D 4.5				
Article No.	2-03-02	2-03-03	2-03-15	2-03-04	2-03-05

### **Gingiva former**

- D 5.5 Titanium Grade 5 CF
- · Sterile packaged











Implant connection	RI	RI	RI	RI	RI
Gingiva height	1.0 mm	2.0 mm	3.0 mm	4.0 mm	6.0 mm
Diameter	D 5.5				
Article No.	2-03-06	2-03-07	2-03-16	2-03-08	2-03-09

### **Gingiva former**

- · D 6.5
- · Titanium Grade 5 CF
- Sterile packaged











Implant connection	RI	RI	RI	RI	RI
Gingiva height	1.0 mm	2.0 mm	3.0 mm	4.0 mm	6.0 mm
Diameter	D 6.5				
Article No.	2-03-10	2-03-11	2-03-17	2-03-12	2-03-13

### **Gingiva former**

- D 3.5Titanium Grade 5 CFSterile packaged







Implant connection	NI	NI	NI
Gingiva height	2.0 mm	4.0 mm	6.0 mm
Diameter	D 3.5	D 3.5	D 3.5
Article No.	1-03-01	1-03-02	1-03-03

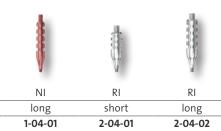
Implant connection

Version

Article No.

### Implant pick-up Open tray

- $\cdot$  incl. retention screw
- · Titanium Grade 5 CF



<b>Implant</b>	pick-up	Closed
tray		

- · incl. abutment screw
- incl. Positioning cap
- · Titanium Grade 5 CF

	R
NI	RI

Implant connection	NI	RI
Article No.	1-04-08	2-04-17

### Custom implant pick-up Open tray

- $\cdot$  incl. retention screw
- · Titanium Grade 5 CF

RI	RI
short	long

ersion	311011	10116
rersion	short	long
mplant connection	RI	RI

### Custom implant pick-up Closed tray

- $\cdot \text{ incl. abutment screw}$
- · incl. Positioning cap
- Titanium Grade 5 CF



Implant connection	RI
Article No.	2-04-18

### Positioning caps for implant pick-up Closed tray

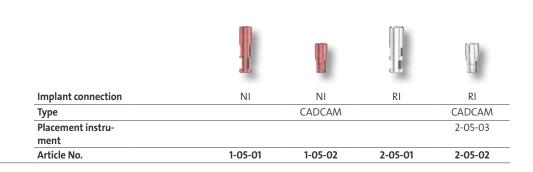
• POM



Implant connection	RI
Article No.	2-04-19

### **Laboratory implant**

· Titanium Grade 5 CF



### **Temporary abutment**

- Titanium Grade 5 CF
- · incl. abutment screw
- $\cdot \ \text{Recommended torque:}$

15 Ncm: NI 25 Ncm: RI





Implant connection	NI	RI
Placement	Hex 1.26	Hex 1.26
instrument		
Abutment screw	1-06-01	2-06-03
Laboratory screw	1-06-02	2-06-04
Article No.	1-17-04	2-17-07

# Standard abutment straight

- · Titanium Grade 5 CF
- $\cdot \, \text{incl. abutment screw}$
- · Recommended torque: 15 Ncm







Implant connection	NI	NI	NI
Gingiva height	1.5 mm	3.0 mm	5.0 mm
Diameter	3.5 mm	3.5 mm	3.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	1-06-01	1-06-01	1-06-01
Laboratory screw	1-06-02	1-06-02	1-06-02
Article No.	1-07-01	1-07-02	1-07-07

# Standard abutment straight

- Titanium Grade 5 CF
- $\cdot \, \text{incl. abutment screw}$
- Recommended torque: 25 Ncm



Implant connection	RI
Gingiva height	0 mm
Diameter	3.5 mm
Placement	Hex 1.26
instrument	
Abutment screw	2-06-03
Laboratory screw	2-06-04
Article No.	2-07-20

# Standard abutment straight

- Titanium Grade 5 CF
- $\cdot \, \text{incl. abutment screw}$
- Recommended torque: 25 Ncm







Implant connection	RI	RI	RI
Gingiva height	1.5 mm	1.5 mm	1.5 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement instrument	Hex 1.26	Hex 1.26	Hex 1.26
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No.	2-07-01	2-07-02	2-07-03

### **Temporary abutment** straight

- · Titan/PVDF
- · incl. abutment screw
- Recommended torque: 25 Ncm



Implant connection	RI
Gingiva height	3.5 mm
Diameter	5.5 mm
Abutment screw	2-06-03
Laboratory screw	2-06-04
Article No.	2-17-08

### **Temporary abutment** angled

- Titan/PVDF
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over cornerRecommended torque: 25 Ncm





Implant connection	RI
Gingiva height	3.5 mm
Diameter	5.5 mm
Abutment screw	2-06-03
Laboratory screw	2-06-04
Article No. Type 1	2-17-09
Article No. Type 2	2-17-10

### Standard abutment straight

- · Titanium Grade 5 CF
- $\cdot \ \text{incl. abutment screw}$
- Recommended torque: 25 Ncm







Implant connection	RI	RI	RI
Gingiva height	3.0 mm	3.0 mm	3.0 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No.	2-07-04	2-07-05	2-07-06

### **Standard abutment** straight

- Titanium Grade 5 CF
- · incl. abutment screw
- Recommended torque: 25 Ncm







Implant connection	RI	RI	RI
Gingiva height	5.0 mm	5.0 mm	5.0 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No.	2-07-23	2-07-24	2-07-25

### Standard abutment angled 18°

- · Titanium Grade 5 CF
- $\cdot \text{ incl. abutment screw}$
- Type 1 = angled over flat
- Type 2 = angled over corner Recommended torque: 15 Ncm













Implant connection	NI	NI	NI
Gingiva height	1.5 mm	3.0 mm	5.0 mm
Diameter	3.5 mm	3.5 mm	3.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	1-06-01	1-06-01	1-06-01
Laboratory screw	1-06-02	1-06-02	1-06-02
Article No. Type 1	1-07-03	1-07-04	1-07-08
Article No. Type 2	1-07-05	1-07-06	1-07-09

### Standard abutment angled 18°

- Titanium Grade 5 CF
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over corner
- · Recommended torque: 25 Ncm

Type 1



Type 2











Implant connection	RI	RI	RI
Gingiva height	1.5 mm	1.5 mm	1.5 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement instrument	Hex 1.26	Hex 1.26	Hex 1.26
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No. Type 1	2-07-07	2-07-08	2-07-09
Article No. Type 2	2-07-13	2-07-14	2-07-15

### Standard abutment angled 18°

- · Titanium Grade 5 CF
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over corner
- · Recommended torque: 25 Ncm

Type 1



Type 2











Implant connection	RI	RI	RI
Gingiva height	3.0 mm	3.0 mm	3.0 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No. Type 1	2-07-10	2-07-11	2-07-12
Article No. Type 2	2-07-16	2-07-17	2-07-18

### Standard abutment angled 18°

- · Titanium Grade 5 CF
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over corner
- · Recommended torque: 25 Ncm

Type 1



Type 2









Implant connection	RI	RI	RI
Gingiva height	5.0 mm	5.0 mm	5.0 mm
Diameter	4.5 mm	5.5 mm	6.5 mm
Placement	Hex 1.26	Hex 1.26	Hex 1.26
instrument			
Abutment screw	2-06-03	2-06-03	2-06-03
Laboratory screw	2-06-04	2-06-04	2-06-04
Article No. Type 1	2-07-26	2-07-27	2-07-28
Article No. Type 2	2-07-29	2-07-30	2-07-31

### **Multi-unit abutment** angled 17°

- · Titanium Grade 5 CF
- Sterile packaged
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over corner
- Recommended torque: 25 Ncm











Implant connection	RI	RI	RI
Gingiva height (mm)	1.1/2.5	2.1/3.5	4.1/5.5
Placement instrument	Hex 1.26	Hex 1.26	Hex 1.26
Abutment screw	2-06-02	2-06-02	2-06-02
Article No. Type 1	2-31-04	2-31-05	2-31-06
Article No. Type 2	2-31-10	2-31-11	2-31-12

### **Multi-unit abutment** angled 30°

- Titanium Grade 5 CF
- Sterile packaged
- · incl. abutment screw
- Type 1 = angled over flat
- Type 2 = angled over corner
- · Recommended torque: 25 Ncm











Implant connection	RI	RI	RI
Gingiva height (mm)	0.6/3.0	1.6/4.0	3.1/5.5
Placement instrument	Hex 1.26	Hex 1.26	Hex 1.26
Abutment screw	2-06-02	2-06-02	2-06-02
Article No. Type 1	2-31-07	2-31-08	2-31-09
Article No. Type 2	2-31-13	2-31-14	2-31-15

### Multi-unit bridge screw

- · Material: Titan Grade 5 KV
- Recommended torque: 15 Ncm







6-31-01

Placement
instrument
Article No

Hex 1.26 0-31-02

**Kugel Torx** 

### **Multi-unit prosthetic** components

- Recommended torque: 15 Ncm
- titanium base / titanium cap: incl. bridge screw
- Material: Titanium grade 5 KV
- · modelling sleeve: without Bridge screw Material: Tecanat (PC)









Description	titanium base	titanium base	titanium cap	modelling
		ASC	Flex	sleeve
Placement	Hex 1.26	Kugel Torx	Hex 1.26	
instrument				
Screw	0-31-02	6-31-01	0-31-02	
Article No.	0-31-09	6-31-02	0-31-20	0-31-11
Please note:	The Multi-unit modelling sleeve can be used with the Multi-unit titanium base and Multi-unit titanium cap.			

# Multi-unit abutment straight

- Titanium Grade 5 CF
- Sterile packaged
- Recommended torque: 25 Ncm









Implant connection	RI	RI	RI	RI
Gingiva height	1.5 mm	2.5 mm	3.5 mm	5.5 mm
Placement	0-13-76	0-13-76	0-13-76	0-13-76
instrument				
Article No.	2-31-01	2-31-16	2-31-02	2-31-03

# Multi-unit prosthetic components

- · incl. bridge screw
- · Recommended torque: 15 Ncm
- Material gold cap, castable: "(AU 60%; Pd 20%; Pt 19%; Ir 1%)"
- Material CoCr cap: CrCo alloy / CTE 14.1





Description	gold cap, castable	CoCr cap
Placement instrument	Hex 1.26	Hex 1.26
Screw	0-31-02	0-31-02
Article No.	0-31-07	0-31-08

# **Novaloc®** Processing package

- · Matrix housing, titanium/PEEK
- Retention insert white Retention force: light
- Retention insert yellow Retention force: medium
- Retention insert green Retention force: strong
- · Mounting collar, silicone
- · 2 pcs per package
- incl. mounting insert





Material	litanium	Peek
matrix housing		
Article No.	2010.601	2010.611

The entire product overview is available in section Novaloc.

### Placement instrument MedentiLOC abutment, angled

Please note:

- · Stainless steel
- · Ball Hex

Article No.	0-13-38	0-13-39
Version	Manual and ratchet	Contra-angle

# MedentiLOC Laboratory implant

 $\cdot \, \mathsf{Stainless} \, \mathsf{steel} \,$ 





Version	straight	angled
Article No.	0-21-01	0-21-02

### Novaloc abutment straight

- · Titanium Grade 5 CF
- ADLC coated
- · Recommended torque: 25 Ncm



### Novaloc abutment angled 15°

- Titanium Grade 5 CF
- $\cdot\,\mathsf{ADLC}\;\mathsf{coated}$
- · incl. abutment screw
- $\cdot$  Type 1 = angled over flat
- Type 2 = angled over corner
- · Recommended torque: 25 Ncm

Type 1



Type 2













Implant connection	RI	RI	RI	RI	RI
Gingiva height (mm)	1.0/2.0	2.0/3.0	3.0/4.0	4.0/5.0	5.0/6.0
Placement	Kugel Torx				
instrument					
Abutment screw	2-06-05	2-06-05	2-06-05	2-06-05	2-06-05
Article No. Type 1	2-23-06	2-23-07	2-23-08	2-23-09	2-23-10
Article No. Type 2	2-23-11	2-23-12	2-23-13	2-23-14	2-23-15

Please note: To screw in the angled Novaloc abutments you need the special Placement instrument Ball-Torx 0-13-60 or 0-13-59.

# Implant removal



Take the blister out of the outer packaging.



Remove the Tyvek film from the blister pack to expose the container with the implant.

(Caution: This removes the sterile barrier.)



Hold the container upright and push the lid down.



Secure the implant by slightly pressing on the sides of the container.



Turn the placement instrument clockwise slowly while inserting it into the implant until it slides into the square of the implant.



A "soft-click" signals that the implant is securely fixed in the placement instrument.



Before removing the implant, release the side pressure on the container.



You can now safely remove the implant.





Insert the implant into the prepared implant bed.



The supplied closure screw is screwed into the underside of the container.



Use the HEX 1.26 placement instrument to remove the closure screw.



Turn the closure screw hand tight (5-10 Ncm) into the implant.

# Implant bed preparation

Example for MICROCONE D 4.5 x 11.0

### **Incision phase**



The incision phase serves to form a mucosa flap to reveal the implantation point as bone.

The incision phase is case-dependent and must be considered based on the patient's individual requirements depending on the healing mode (submerged or open healing).

# First marker drill with the needle drill Ø 1.6 mm



The marking bore is inserted following the mobilization of the mucoperiosteal flap with the needle drill and can also alternatively be performed with the aid of a drilling template.

# Pilot drill hole with the pilot drill Ø 2.0 mm



The pilot hole is drilled with the  $\emptyset$  2.0 mm pilot drill. This defines the sagittal direction of the implant axis and the drilling depth (observe depth marking).

A template-based implantation is recommended for the definitive alignment and to prevent deviations from the implant planning.

During the drilling, it is essential to ensure sufficient cooling, e.g. NaCl liquid, to avoid overheating and thus damage to the bone.

### Reamer with the standard drill Ø 3.0 mm and Ø 3.5 mm



In this case, reaming is initially carried out with the standard drill bit  $\emptyset$  3.0 mm and then with the standard drill bit  $\emptyset$  3.5 mm.

The laser markings that correspond to the respective implant length serve to inspect the depths for their part.

## Subsequent reaming with the Ø 4.0 mm standard drill



The final enlargement drilling is completed using the standard drill bit  $\emptyset$  4.0 mm.

### Enlargement drilling with the cortical drill Ø 4.0/4.3 mm



It is recommended in the event of an extremely compact cortex and an average spongiosa or D1/D2 bone quality in the lower jaw, using additionally the cortical drill with 4.0/ 4.3 mm diameter.