

AMEA®

1975

PRODUCER OF SPECIAL ALLOYS SINCE

IGE A  
I M P L A N T   S Y S T E M

PRODUCT CATALOG 2025



**“The only way to do great work is to love what you do.  
If you haven't yet found what's right for you continue to  
look for it, don't stop, you will know you have found it as  
soon as you see it in front of you”**

**Steve Jobs**



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# HISTORY

**Mesa Italia S.r.l. is a leading Italian manufacturer of dental alloys since 1975.** The strength of the Mesa company is the long family tradition that has allowed founder Giacomo Sala to pass on the same creative ambition to his two sons Lorenzo and Valerio, promoting a product, the quality of which is recognized both nationally and internationally.

Business continuity, combined with an enduring drive for research and innovation, has enabled the company to make its product portfolio even more comprehensive by channeling interest into the implantology field.

Several divisions operate within the company:

- Administrative and Commercial
- Technological
- Warehouse
- Scientific





The administrative and commercial division is staffed by highly qualified, client-focused personnel who can provide technical and commercial support in 5 languages so as to facilitate every request on the use of the various commodity products for sale; it is present in Italy with agents, while, in the rest of the world, it is represented by distributors managed by area heads.

The technical department consists of four engineers and skilled technicians who, with the help of high-precision tools, enable the production of high-quality machined products.

The “warehousing” division relies on automated vertical warehouses that not only rationalize space but also allow operators precise preparation of orders to be filled.

The science division is in charge of educational communication and scientific-technical research. Oral maxillofacial surgeons and a team of dental technicians are in charge of theoretical and clinical courses.



# INNOVATION

Mesa Italia bases its “know how” in machining, is well aware of the problems arising from any machining defect and imposes scrupulous evaluation and validation protocols on the devices it produces.

The careful selection of raw materials is a daily effort to maintain an excellent level of quality in the products we market.

The production process is carried out by a staff of highly skilled engineers and operators who conduct daily studies on production technology. Mechanical production is done with state-of-the-art sliding headstock machines.

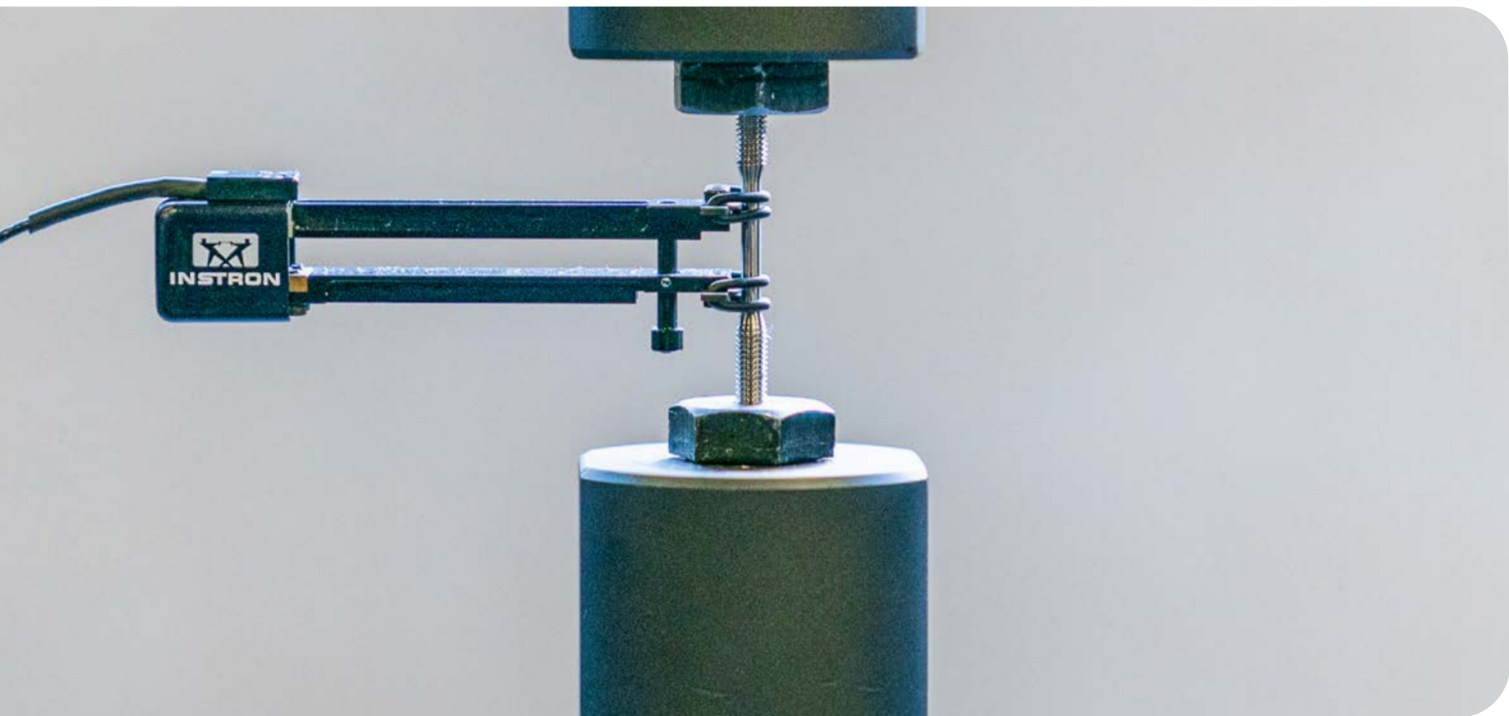
All stages of our production process take place exclusively in Italy and are subject to constant quality control.

# RESEARCH

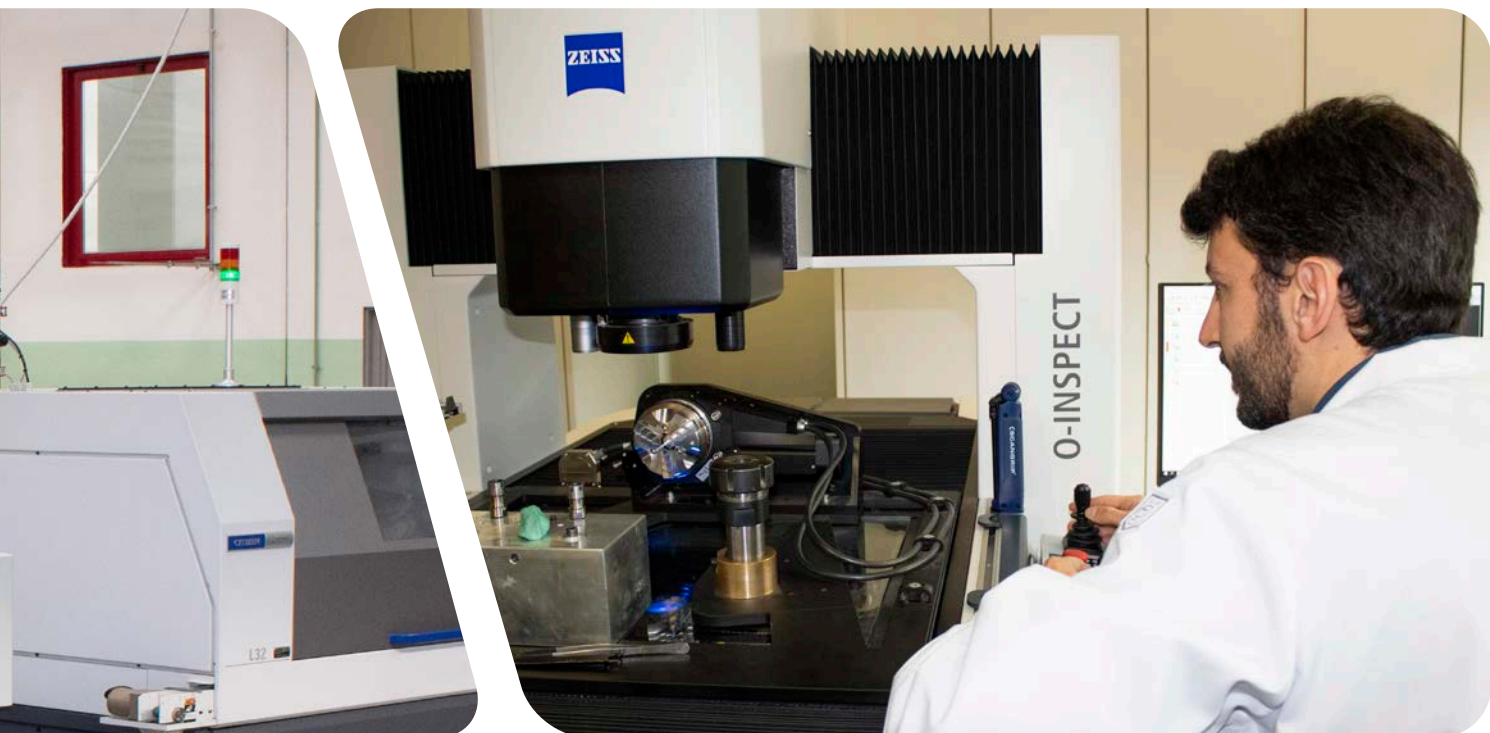
Igea Implant System was born from the Mesa company's 50 years of experience in the dental field as well as from constructive discussions with dentists. The research and development team based their knowledge on the latest state of the art and designed a system with a simple and functional systematics.





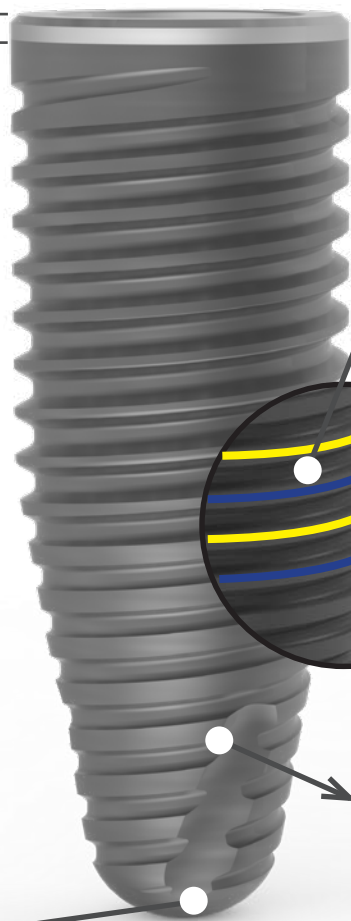


The two terms simple and functional well summarize the dual goal the company is committed to: ensuring innovative solutions that at the same time meet clinicians' expectations. Thanks to collaboration with Italian University Institutions, microleakage tests on our fixture and compatibility studies on the materials of our implant system were carried out. The company has equipped itself with an INSTRON fatigue test system, on which static and dynamic tests were carried out taking ISO 14801:2017 "Dentistry, Implants, Dynamic fatigue test for endo-osseous dental implants" as reference.



# IMPLANT DESCRIPTION

**MACHINED NECK** (0.3 mm):  
preserves the implant from the  
bacterial colonization



**DUAL-PRINCIPLE THREADING:**  
allows a uniform and easy  
insertion with half of the turns.

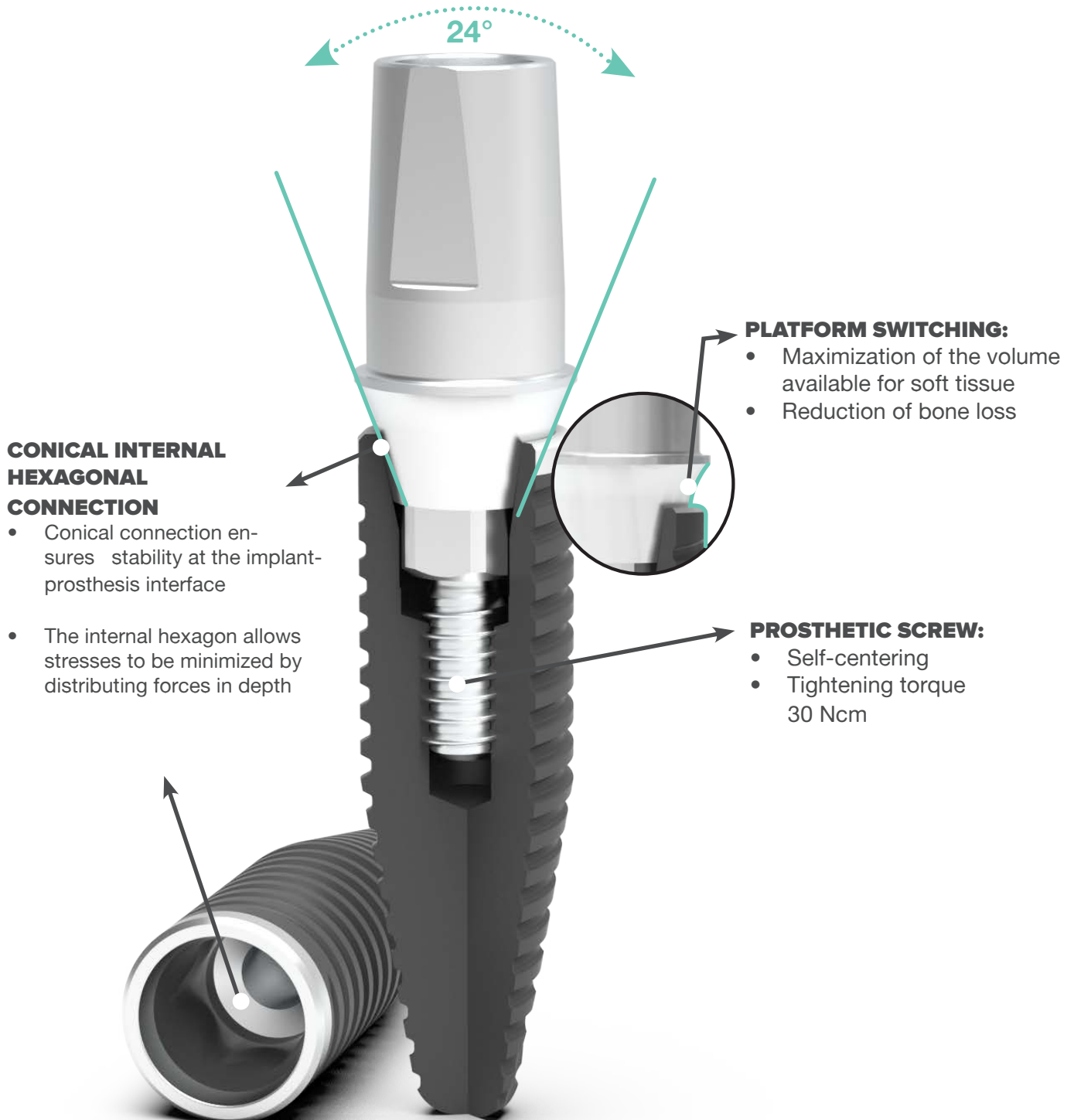
**THREAD PITCH:**  
1.2 mm, except  
for the ø5 mm  
equal to 1.6 mm

**APICAL CUTTING FLUTES:**  
achieve primary stability in  
all types of bone density

**ATRAUMATIC CONICAL APEX:**  
Minimizes the risk of damage to  
underlying anatomical structures

The **CONICAL-CYLINDRICAL** shape of the implant guarantees an optimal and uniform distribution of masticatory load.

# CONICAL HEXAGONAL CONNECTION



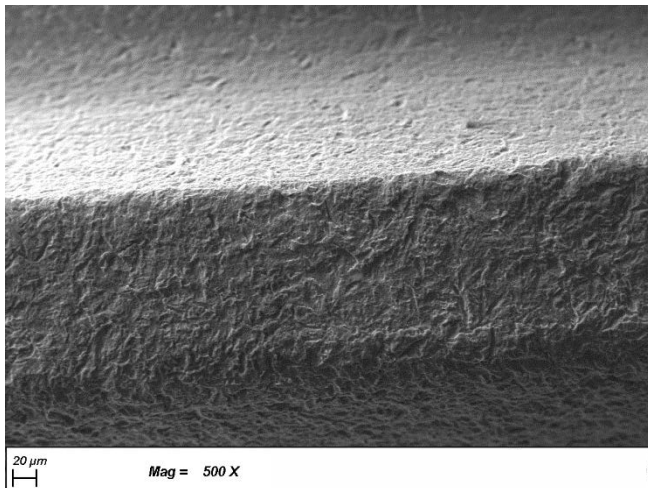
The conical connection with internal hexagon **offers the possibility of balancing load forces** acting on the prosthetic component **preventing** even potential **unscrewing phenomena**.







# THE IMPLANT SURFACE

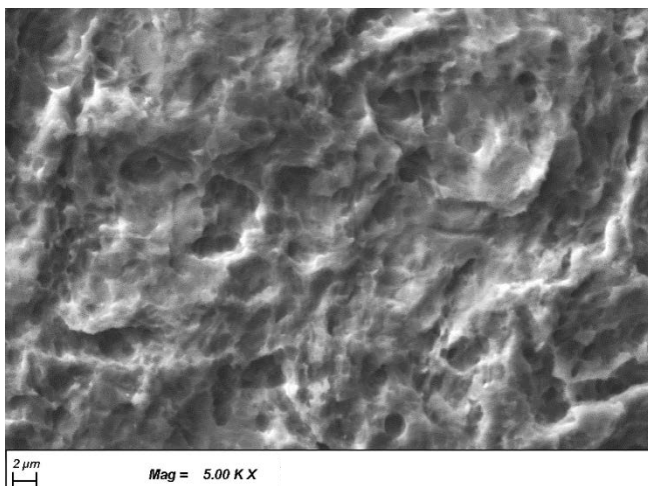


## MATERIAL

The company uses Grade 4 Titanium to produce all IGEA dental implants. This material provides rapid osseointegration, excellent biocompatibility and has the highest mechanical resistance among commercially pure Titanium grades.

## CLEANING

Mesa Italia operates thorough cleaning processes on all equipment through advanced technologies to remove any traces of dirt from industrial processing.



## SLA

The surface treatment performed on Mesa Igea implants involves a sandblasting process followed by acid etching in order to increase the contact surface area and promote osteoblastic cell differentiation.

# IGEA

## NARROW and REGULAR

# IMPLANTS







**N= NARROW**

The use of Igea  
**Narrow** Implants is  
recommended in anterior  
areas.

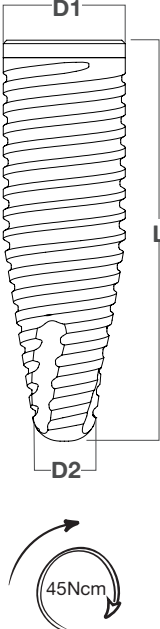
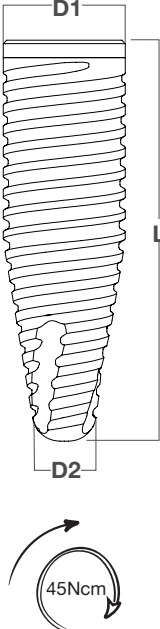
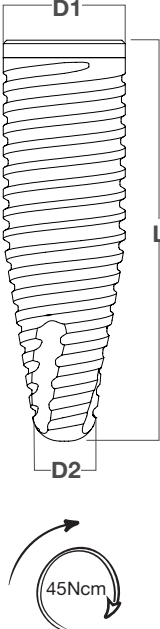
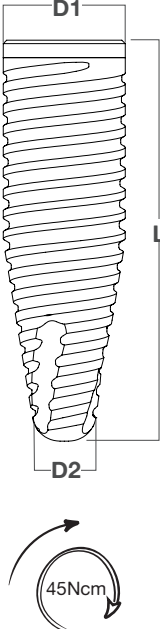


**R= REGULAR**

## COLOR CODE

 3.5 mm | 
  3.8 mm | 
  4.3 mm | 
  5.0 mm

## NARROW AND REGULAR IMPLANT

	D1 mm	D2 mm	L mm	Code
	3.5	1.6	8	Ti4-Igea-1003
			10	Ti4-Igea-1002
			11.5	Ti4-Igea-1001
			13	Ti4-Igea-1004
			15	Ti4-Igea-1005
	3.8	1.9	8	Ti4-Igea-1006
			10	Ti4-Igea-1007
			11.5	Ti4-Igea-1008
			13	Ti4-Igea-1009
			15	Ti4-Igea-1010
	4.3	2.2	8	Ti4-Igea-1026
			10	Ti4-Igea-1027
			11.5	Ti4-Igea-1028
			13	Ti4-Igea-1029
			15	Ti4-Igea-1030
	5.0	2.6	8	Ti4-Igea-1021
			10	Ti4-Igea-1022
			11.5	Ti4-Igea-1023
			13	Ti4-Igea-1024
			15	Ti4-Igea-1025



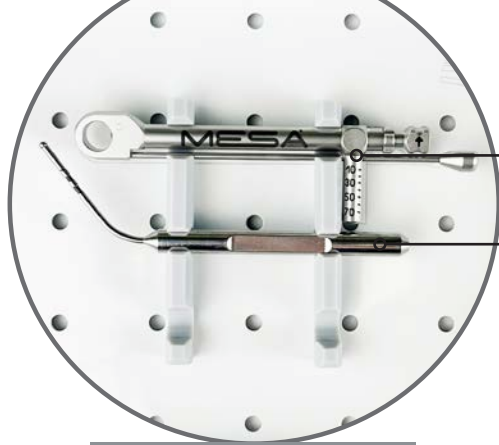






Surgical Box  
41530000A

- **AUTOClave BOX:** made of thermo-plastic, impact-resistant, autoclavable material.
  - **ERGONOMIC KIT:** silicone tool holders ensure tightness even during transport and sterilization.
  - **SIMPLE AND PERSONALIZED:** accessories are arranged according to the various steps of the surgical protocol, inserts are color-coded to the implant diameter, laser-written symbols allow for optimal orientation.
- ✓ All instruments, including the box, should be cleaned and sterilized before use: refer to the instructions for use for sterilization guidelines.



## INTERNAL ZONE

RATCHET WRENCH

DEPTH PROBE

SHORT / LONG  
FORMED DRILLS

SPIRAL DRILLS

POINTED DRILL

CONTRA-ANGLE  
DRIVERS

MANUAL  
SHORT / LONG  
DRIVERS AND  
FOR RATCHET

UNIVERSAL MU  
DRIVER

MANUAL MU DRIVER

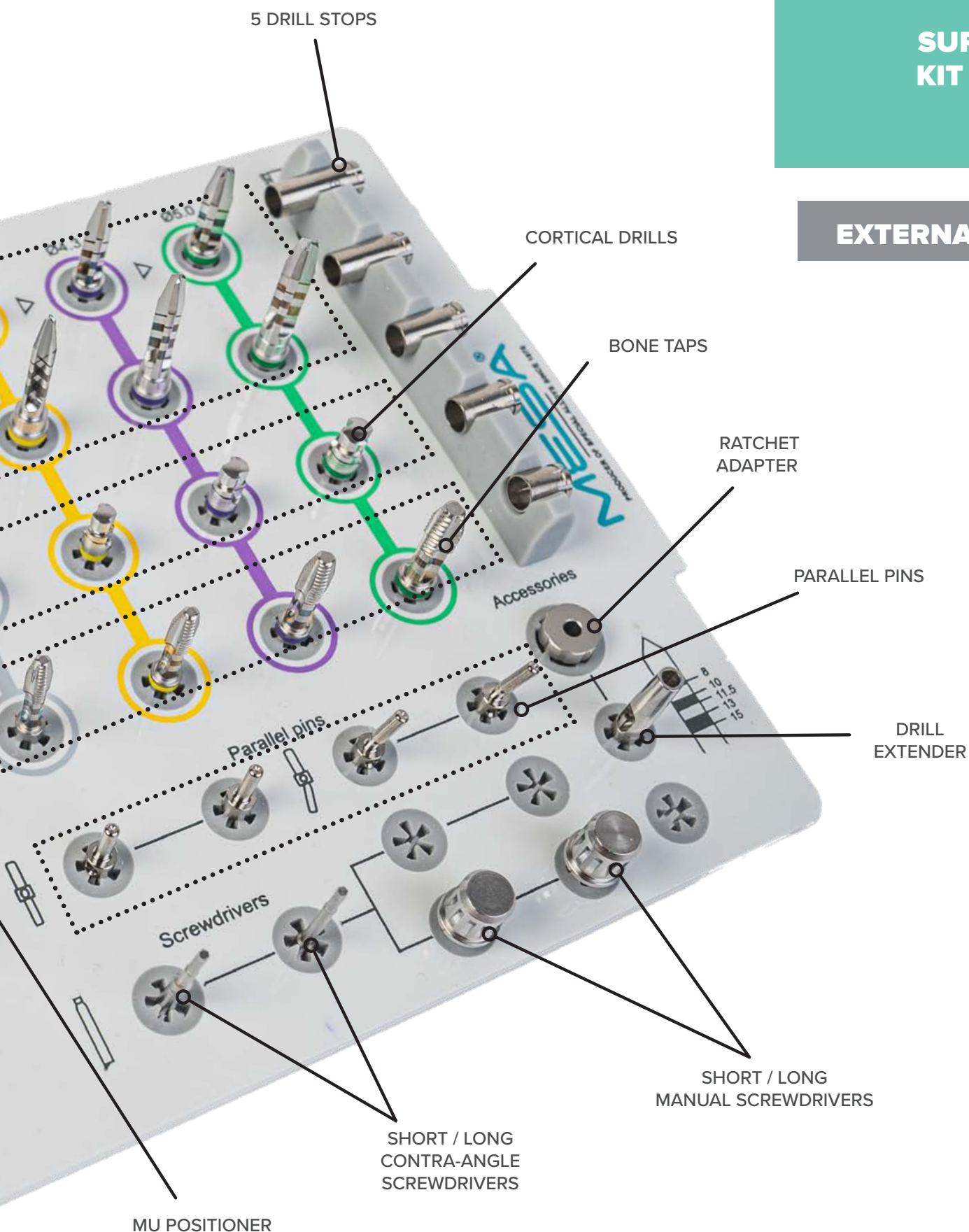
BONE PROFILERS  
ø4.3 / ø5.0 / ø6.0

BONE PROFILER  
GUIDES



# SURGICAL KIT TOOLS

## EXTERNAL ZONE



# DRILLS

MEDICAL STAINLESS STEEL

D mm

Description

Code



## POINTED DRILL



2

Osteotomy drill to be used to incise the cortical bone and create the entry point for subsequent use of the spiral drill.

SST-0031



## SPIRAL DRILL



2.0























Drill that allows the execution of a calibrated osteotomy, drilling a hole of minimum diameter in the maxilla or mandible, with support of the depth bands present.

**For spiral long drills, drill stops are also available.**

SST-0107  
(SHORT)














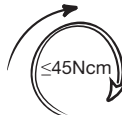









SST-0067  
(LONG)



	D mm	Description	Code
	 2.9	<div></div> <h3>SHORT FORMED DRILLS</h3> <p>The formed drill is a tapered drill designed to be used in the final steps of implant socket execution. The markings on the body of the drill indicate the depth relative to the bone level. Color-coding helps the operator to match drill diameters to implant diameters of the IGEA implant line.</p>	SST-0076 
	 3.2		SST-0077
	 3.7		SST-0079 
	 4.4		SST-0081
		<div></div> <h3>LONG FORMED DRILLS</h3> <p>The formed drill is a tapered drill designed to be used in the final steps of implant socket execution. The markings on the body of the drill indicate the depth relative to the bone level. Color-coding helps the operator to match drill diameters to implant diameters of the IGEA implant line.</p> <p><b>The drills can be used in combination with the stops that prevent the surgeon from drilling</b> into the bone beyond the limit indicated by the stop itself.</p>	
	 2.9		SST-0070 
	 3.2		SST-0071
	 3.7		SST-0073 
	 4.4		SST-0075

# CORTICAL DRILLS AND BONE TAPS

MEDICAL STAINLESS STEEL

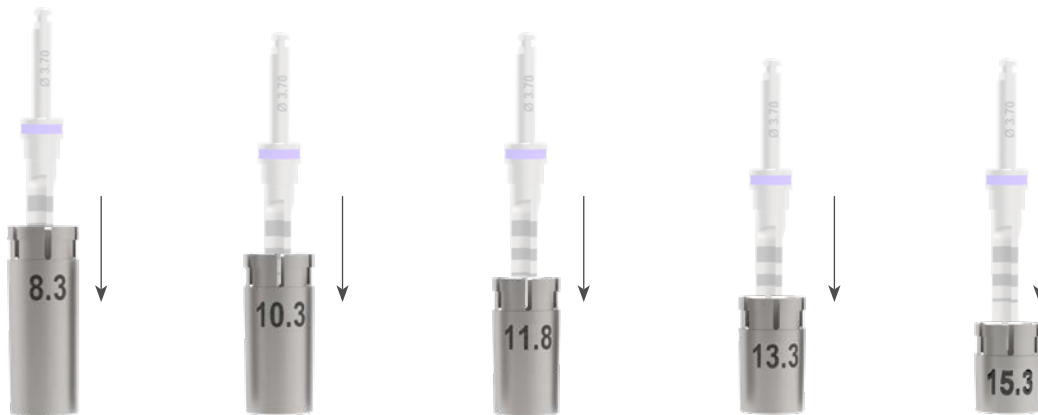
	D mm	Description	Code
	 3.5	<div><p><b>CORTICAL DRILL</b></p><p>Drill recommended to widen the cortical collar in case of compact bone, in order to facilitate implant insertion. Do not plunge beyond the black line.</p></div>	SST-0109 
	 3.8		SST-0110
	 4.3		SST-0111 
	 5.0		SST-0112
	 3.5	<div><p><b>BONE TAPS</b></p><p>Surgical instrument used to make threads within the bone and assist the self-threading action of the implant.</p><p>Its function is to prepare the calibrated implant site for the insertion of the implant for which it is intended.</p><p>Use is recommended for implant placement in compact bone.</p><p>Do not perform a back-and-forth motion, but screw the bone tap until the indicated torque is reached. At the end of the screwing, reverse the direction of the rotation and unscrew.</p></div>	SST-0082 
	 3.8		SST-0083
	 4.3		SST-0085 
	 5.0		SST-0087



## DRILL STOPS

TITANIUM GRADE 23

\*8.3 mm | \*10.3 mm | \*11.8 mm | \*13.3 mm | \*15.3 mm



SST-0100

SST-0101

SST-0102

SST-0103

SST-0104








The **DRILL STOPS** allow the working length of the drill to be limited to a predetermined height.

- They come with a laser marking for immediate length identification.
- Available for long formed drills and spiral drills.
- \*The length shown on the Stops indicates the drilling depth including the apical drill increment of 0.3 mm.



# BONE PROFILERS

MEDICAL STAINLESS STEEL




	D mm	Description	Code
	4.3	 <p><b>BONE PROFILER</b></p>	SST-0088
	5.0	Surgical instrument made to level the bone ridge around the implant in order to create the necessary space for the prosthetic component to be properly placed.	SST-0089
	6.0		SST-0090
		<p><b>BONE PROFILER GUIDE</b></p> <p>It is used in combination with the Bone Profiler in order to ensure its optimal use.</p>	SST-0063  SST-0064 

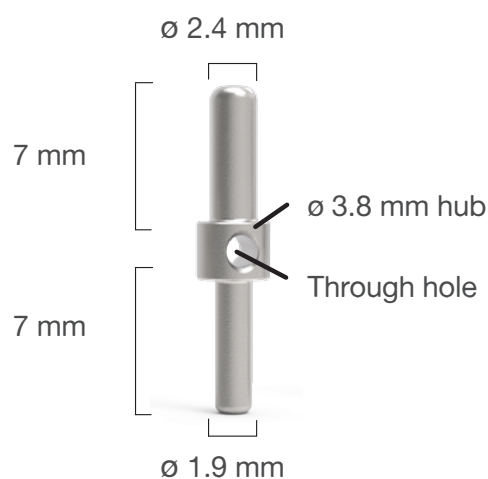




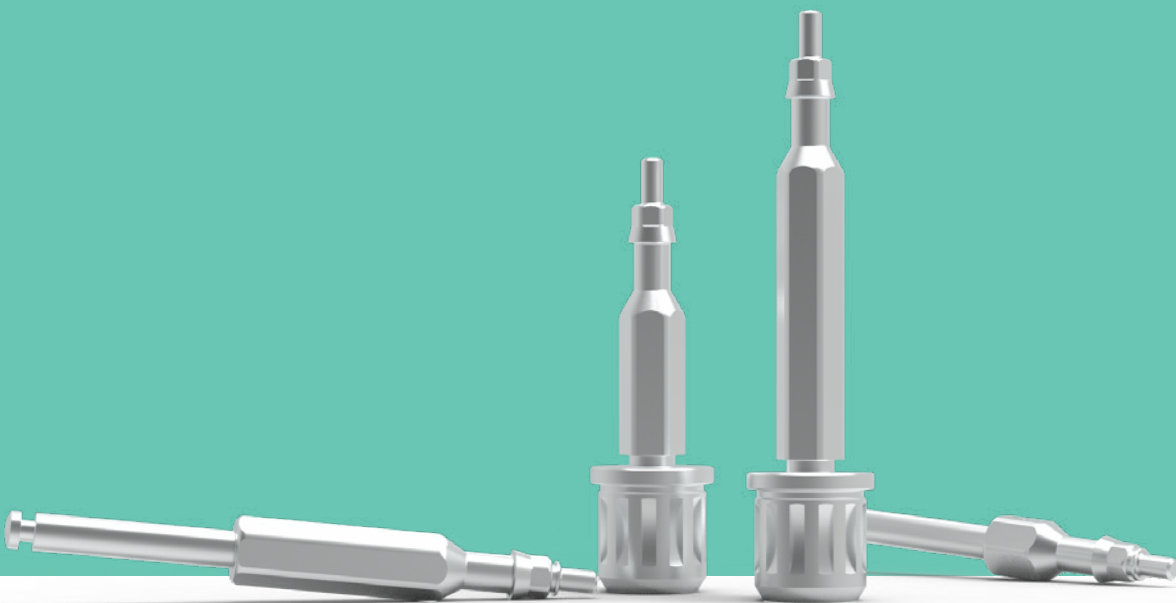
# PARALLEL PINS

TITANIUM GRADE 23

D mm	Description	Code
 0°		SST-1401
 17°	<b>PARALLEL PINS</b>  The parallel pin is designed with opposite ends of different diameters: $\varnothing$ 1.9 and $\varnothing$ 2.4; this allows the clinician to use the pin early in the drilling sequence to ensure proper implant placement and alignment.	SST-1402
 30°		SST-1403



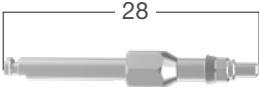



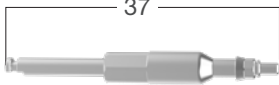


# DRIVERS, SCREWDRIVERS AND RATCHETS



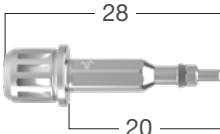


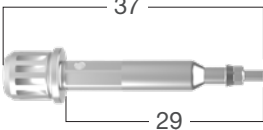


Contra-angle driver is a surgical tool designed to allow the insertion of the dental implant into the bone site.  
**The recommended speed for implant insertion is 15 rpm, not exceeding 25 rpm. Do not irrigate.**

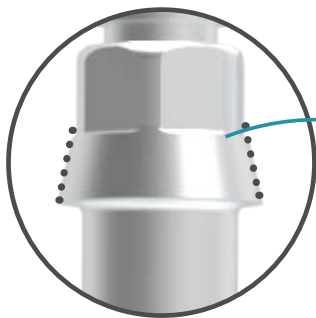
# IMPLANT DRIVERS

MEDICAL STAINLESS STEEL

L	Description	Code
 28	 <b>CONTRA-ANGLE DRIVER</b>	SST-0132 
<b>SHORT</b>		SST-0133 
 37		SST-0135 
<b>LONG</b>		SST-0136 

For the extraction of the implant use only the contra-angle driver

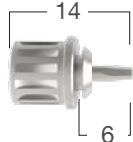
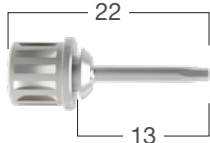
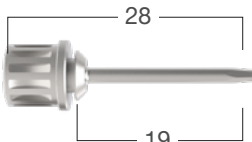

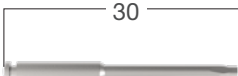
L	Description	Code
 28 20	<b>MANUAL DRIVER AND FOR RATCHET</b>	MST-1207 
<b>SHORT</b>		MST-1203 
 37 29		MST-1208 
<b>LONG</b>		MST-1204 



The engage of the driver is considered completed only when the conical part is no longer visible.

# PROSTHETIC SCREWDRIVERS

MEDICAL STAINLESS STEEL

L	Description	Code
	<b>EXTRA-SHORT</b>	MST-1108
	<b>SHORT</b>	MST-1109
	<b>LONG</b>	MST-1110
	<b>SHORT</b>	SST-0093
	<b>LONG</b>	SST-0094



## ACCESSORIES



### RATCHET ADAPTER

MST-1301



### DRILL EXTENDER

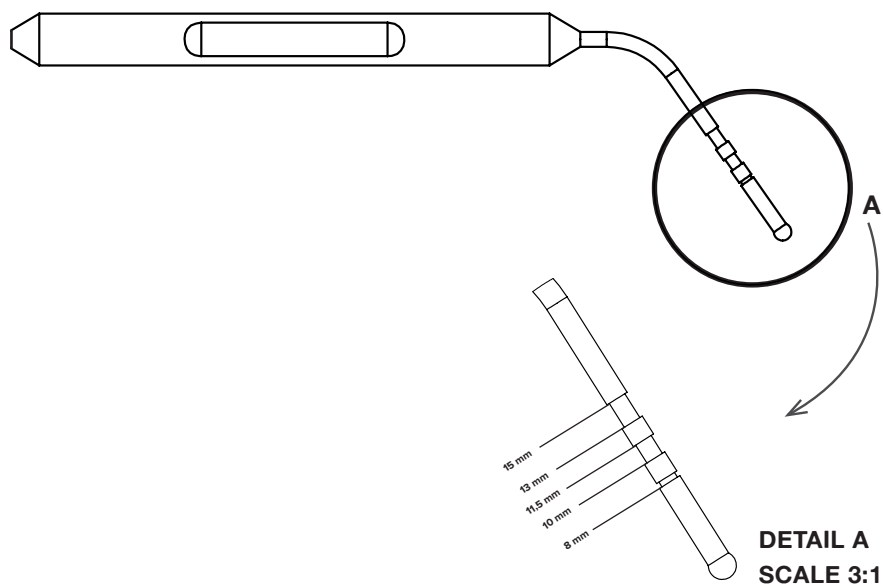
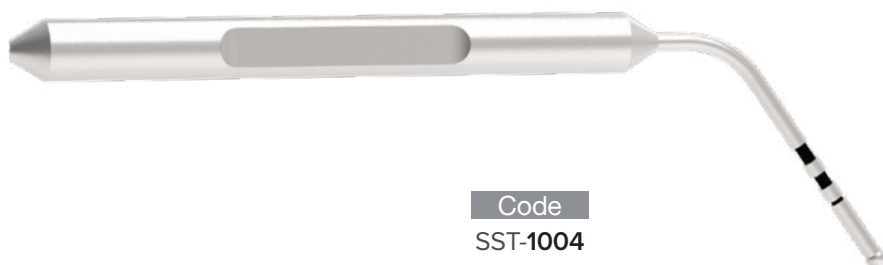
Tool that allows for greater length availability for handpiece instruments.

SST-0124



## DEPTH PROBE



TITANIUM GRADE 23



**Osteotomy depth:** control of the depth of the implant site quota.

# RATCHETS

MEDICAL STAINLESS STEEL

	Description	Code
	<b>RATCHET WRENCH</b>  Ratchets for implant insertion and tightening of prosthetic screws with indicative torque measures.	MST-1001
	<b>RATCHET</b>	MST-1006

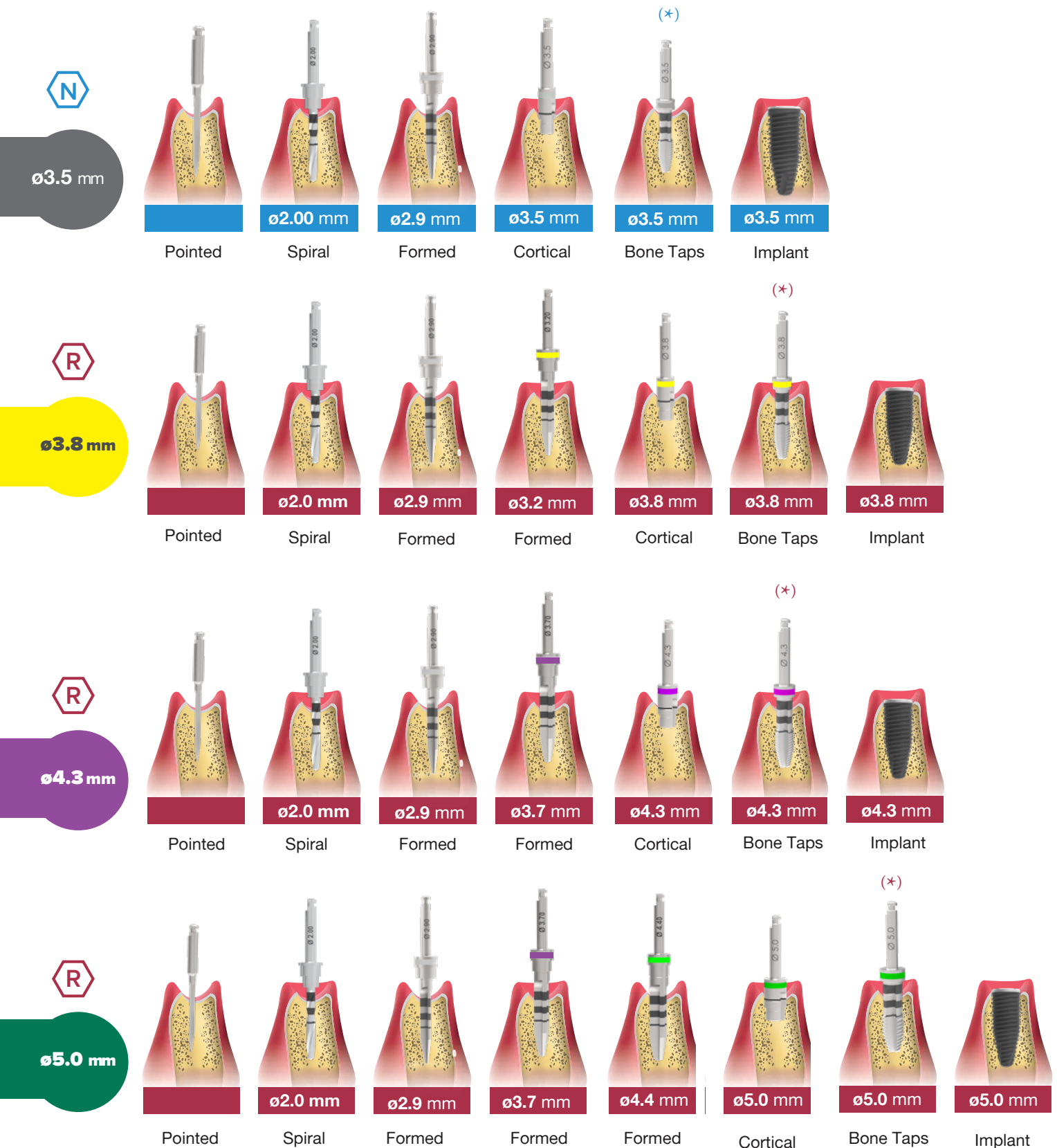






The implant platform should be placed at the bone crest (crestal placement)

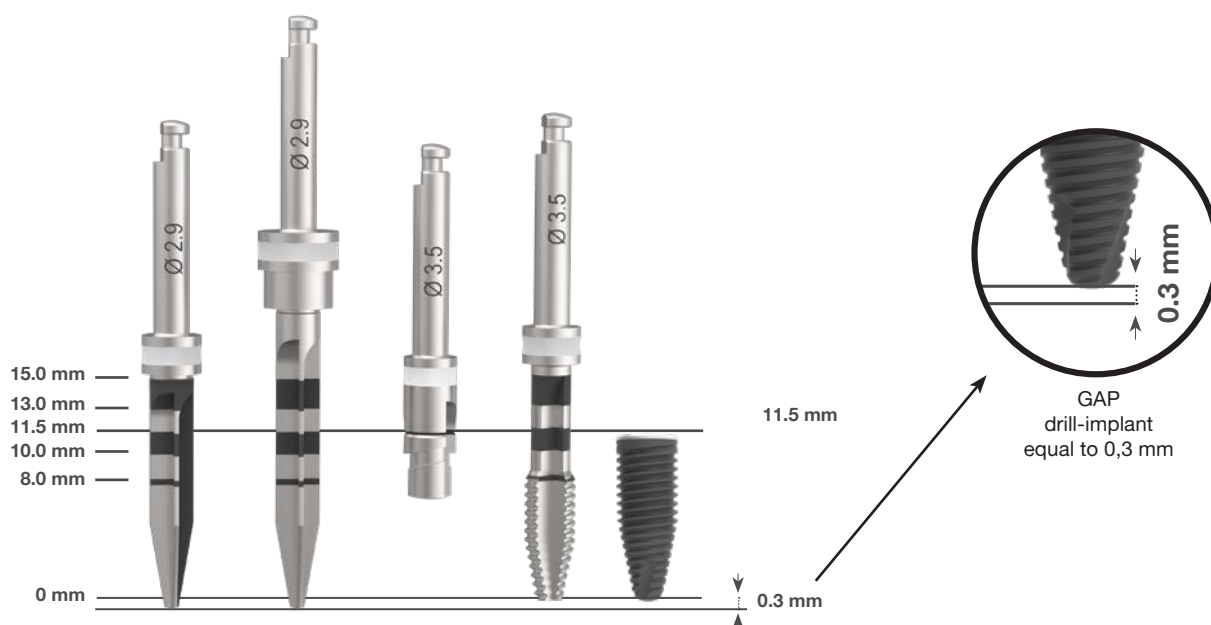
**NOTE:** Do not exceed a tightening torque of 45 Ncm for implants:  
excessive torque can damage the implant and can cause bone necrosis.



(\*)(\*) In order to maintain the desired insertion torque, in dense bone, it is recommended the use of the bone tap, at the maximum speed of 30 rpm and only with the diameter corresponding to the width of the implant bed.



The surgical protocol of the Igea implant was developed to provide surgeons with the following guidance on how to choose the most appropriate tools for site preparation implant depending on the type of bone. However, it is the surgeon's job to apply the most appropriate protocol based on one's experience.



All drills and bone taps are made of stainless steel for medical use.

The line of surgical drills is comprehensive and easy to use.

All diameters of MESA IGEA implants share the pointed drill and spiral drills; depending then on the implant diameter, specific formed drills are provided.

## FEATURES AND ADVANTAGES:

Each formed drill has depth bands highlighted in contrasting colors and is color-coded for better identification.

## DRILL SPEED:

For each type of drills, bone taps and bone profilers, it is recommended to follow the specific indications, advised in the related descriptions.

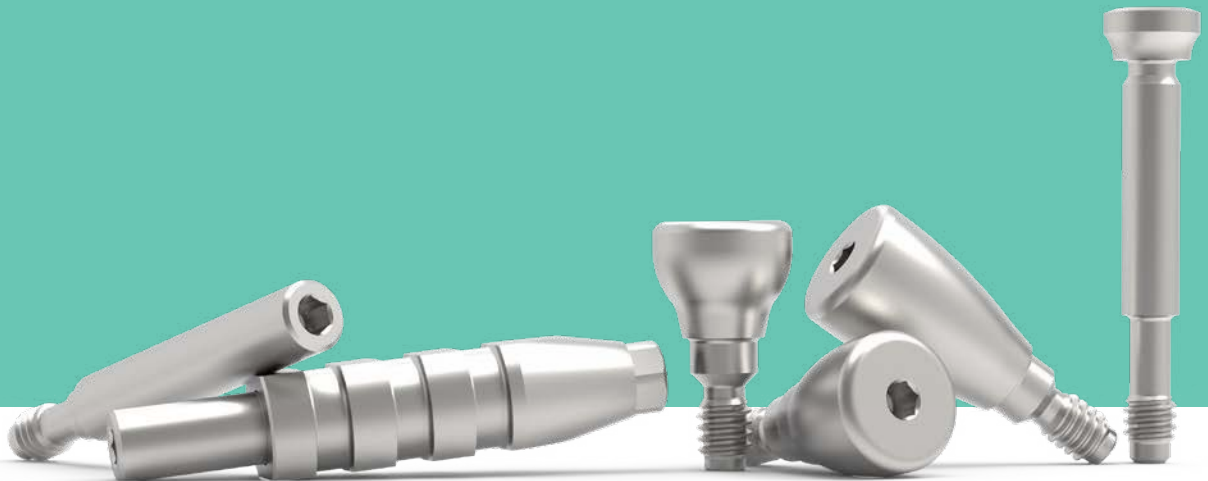
Perform all drilling **with a vertical back-and-forth movement accompanied by copious external irrigation** in order to minimize heat production and preserve bone viability.

Do not perform a back-and-forth motion while using the bone taps.

## DURABILITY OF DRILLS:

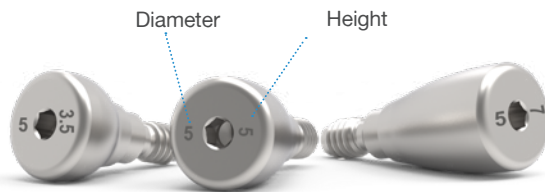
Do not use drills that are damaged, not sharp, or for more than 20 applications to reduce risks of overheating or bone trauma that may compromise the osteointegration process.

# PRE-PROSTHETIC



**Healing screws prepare the site for superstructure insertion and they “shape” the soft tissue surrounding the implant.**




The appropriate screw should be chosen according to the thickness of the mucosa.

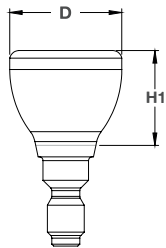


Laser marking for immediate identification of diameter and height

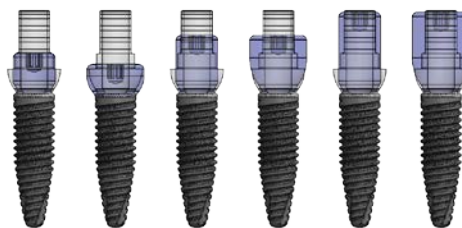
# HEALING SCREWS



TITANIUM GRADE 23

	H1 mm	D mm	Thread	Code
	3.5	3.7 5	M1.6	HLS-1300 HLS-1304
	5	3.7 5	M1.6	HLS-1302 HLS-1306
	7	3.7 5	M1.6	HLS-1308 HLS-1310



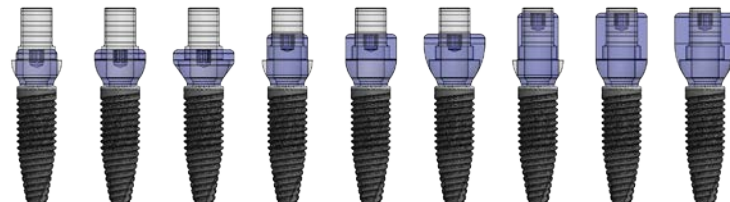
H3.5 ø3.7 H3.5 ø5 H5 ø3.7 H5 ø5 H7 ø3.7 H7 ø5



	H1 mm	D mm	Thread	Code
	3.5	4 5 6	M2	HLS-1301 HLS-1305 HLS-1309
	5	4 5 6	M2	HLS-1303 HLS-1307 HLS-1311
	7	4 5 6	M2	HLS-1312 HLS-1313 HLS-1314


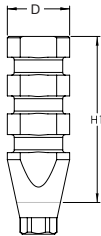





H3.5 ø4 H3.5 ø5 H3.5 ø6 H5 ø4 H5 ø5 H5 ø6 H7 ø4 H7 ø5 H7 ø6




# IMPRESSION COPING OPEN TRAY



TITANIUM GRADE 23

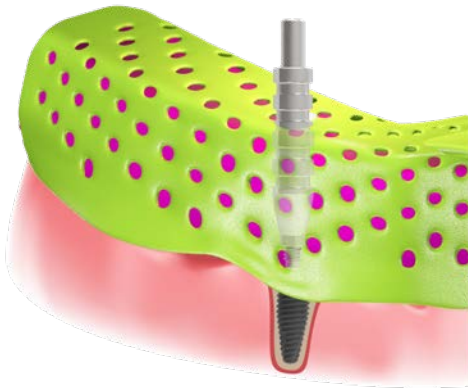




H1 mm	D mm	Code	
12	4.2	TAB-1600	
	4.5	TAB-1601	

OPEN  
TRAY  
SCREWS



L mm	Thread	Code	
19	M1.6	SCR-1405	
24	M1.6	SCR-1413	
19	M2	SCR-1406	
24	M2	SCR-1414	

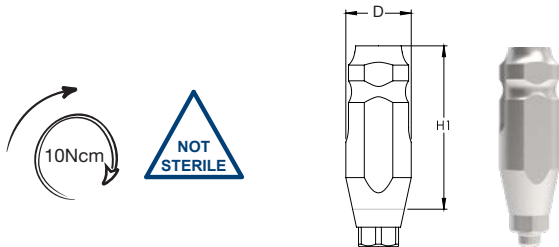




For open transfer, the impression should be made with the open tray or individual tray impression technique.



# IMPRESSION COPING CLOSED TRAY



TITANIUM GRADE 23



H1 mm	D mm	Code
10	4.1	TAB-1602 
	4.4	TAB-1603 

## CLOSED TRAY SCREW



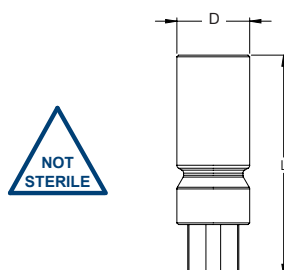
L mm	Thread	Code
16	M1.6	SCR-1408 
16	M2	SCR-1409 



For closed transfer, the impression should be made with the closed spoon or closed tray technique.



# IMPLANT REPLICA

MEDICAL STAINLESS STEEL



L mm	D mm	Code
13	3.65	REP-1614 
	4.3	REP-1615 

## REPLICA SCREW



L mm	Thread	Code
3.7	M1.6	SCR-1412



USE  
IN DIGITAL  
MODEL

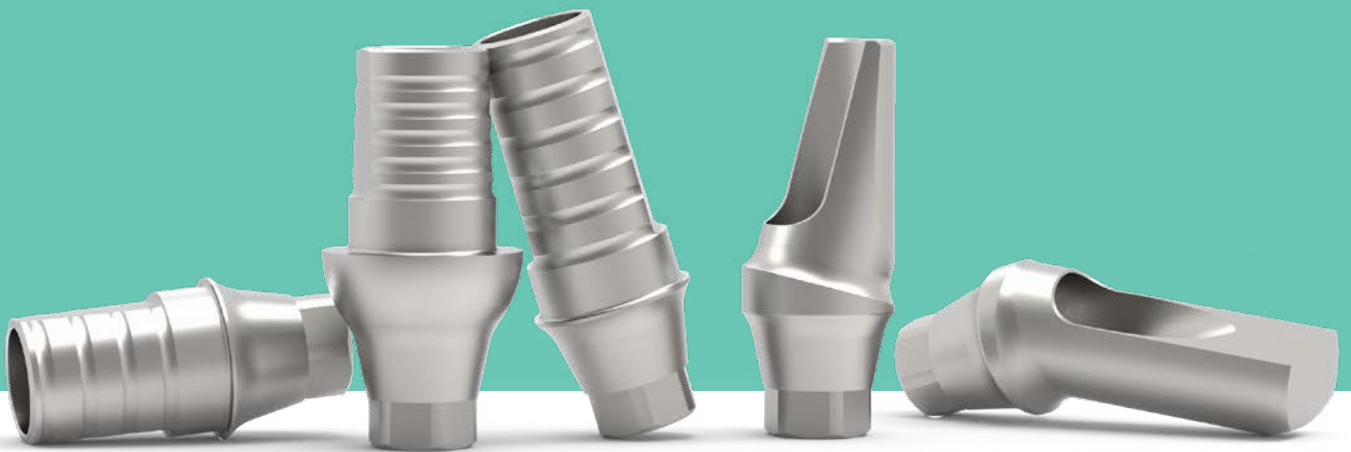


USE  
IN PLASTER

The IGEA line replica is suitable for use in **both plaster models and in 3D printed models**. For the use of plaster models, the screw should be tightened on the body of the replica to create an undercut to prevent its axial movements.



# CEMENT-RETAINED PROSTHESES AND OVERCASTABLE ABUTMENTS



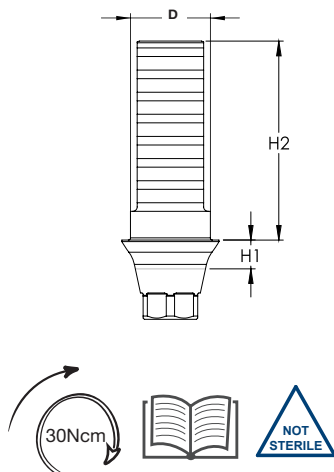






In the study and design of prosthetic components, Mesa has paid special attention to offer optimal solutions to the clinician in order to make the fabrication of prosthetic elements simple and flexible.

**The utmost precision of each of our components helps ensure long-term restoration success.**





# TITANIUM STRAIGHT ABUTMENTS

TITANIUM GRADE 23

		H1 mm	H2 mm	D mm	Type	Code
		1	9	3.3	hexed non-hexed	CEM-1144  CEM-1146
				3.6	hexed non-hexed	CEM-1148  CEM-1150
		2.5	9	3.3	hexed non-hexed	CEM-1152  CEM-1154
				3.6	hexed non-hexed	CEM-1156  CEM-1158

## PROSTHETIC SCREW

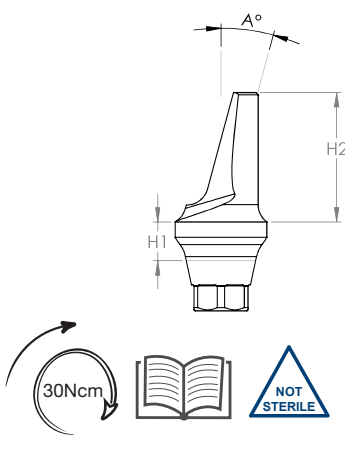








Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 

The abutments are screwed directly onto the implant using the connection screw.  
They are used to support both single crowns and bridges.  
They are available in non-rotating and rotating versions.

# TITANIUM ANGLED ABUTMENTS



TITANIUM GRADE 23

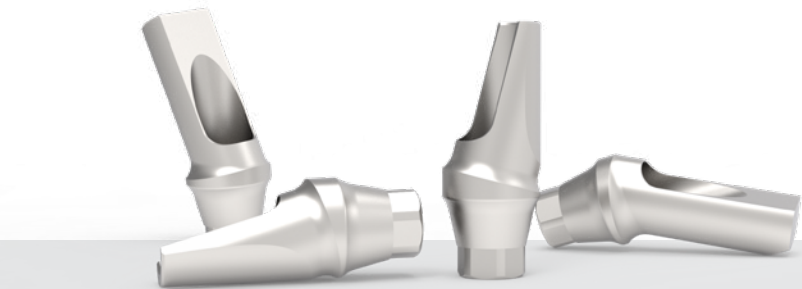
		A°	H1 mm	H2 mm	Hexagon	Code
	15°	1.8	6.0	 Hex A	CEM-1116 CEM-1118	
				 Hex B	CEM-1169 CEM-1171	
	25°	1.6	7.0	 Hex A	CEM-1136 CEM-1137	
				 Hex B	CEM-1173 CEM-1175	



## PROSTHETIC SCREW

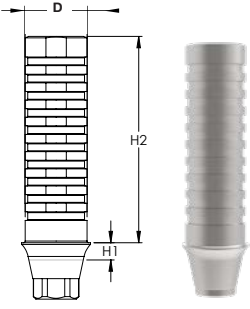




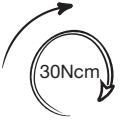


Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 



# TITANIUM TEMPORARY ABUTMENTS



TITANIUM GRADE 23

	H1 mm	H2 mm	D mm	Type	Code
	1	12	3.3	hexed non-hexed	CEM-1138 CEM-1139 
			3.6	hexed non-hexed	CEM-1140 CEM-1141 

## PROSTHETIC SCREW

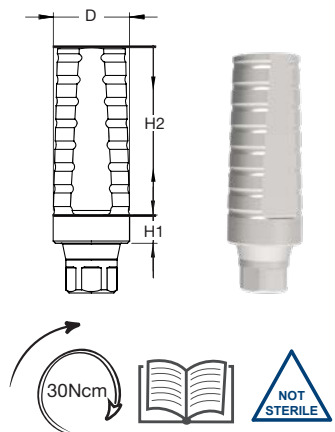




Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 





# TITANIUM RESCUE ABUTMENTS

TITANIUM GRADE 23

	H1 mm	H2 mm	D mm	Type	Code
	1.3	7.7	3.5	hexed non-hexed	CEM-1160  CEM-1161
	1.3	7.7	3.8	hexed non-hexed	CEM-1162 CEM-1163
	1.3	7.7	4.3	hexed non-hexed	CEM-1164  CEM-1165
	1.3	7.7	5.0	hexed non-hexed	CEM-1166 CEM-1167

## PROSTHETIC SCREW

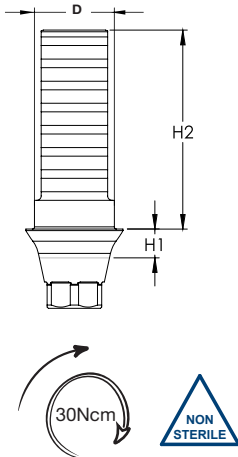






Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 

Rescue abutment is designed for implants that are placed in the supra gingival area.



# CR-CO OVERCASTABLE ABUTMENTS

CHROME-COBALT

	H1 mm	H2 mm	D mm	Type	Code	
	1	9	3.3	hexed non-hexed	OCA-1145 OCA-1147	
			3.6	hexed non-hexed	OCA-1149 OCA-1151	
			3.3	hexed non-hexed	OCA-1153 OCA-1155	
			3.6	hexed non-hexed	OCA-1157 OCA-1159	

## PROSTHETIC SCREW



Thread	Code	
M1.6	SCR-1400	
M2	SCR-1401	

They can be used for a variety of solutions:

- Overcasting with lost-wax modeling or by digital modeling
- Soldering
- Bonding of drilled or melting structure



# MULTI-UNIT SYSTEM



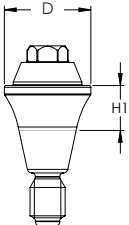

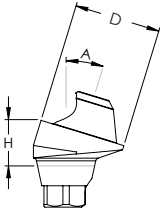

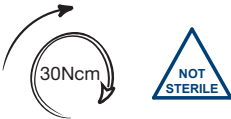

A modern multiprosthodontic system, to make screw-retained bridges, screw-retained bars, "toronto bridge", "all on four" and "all on six".

**The variety, precision and pliability of IGEA's screw-retained prosthetic components enable simple, immediate and effective correction of the disparallelism between implants for tension-free (passive-fit) insertion of the prosthesis.**



# MULTI-UNIT ABUTMENTS

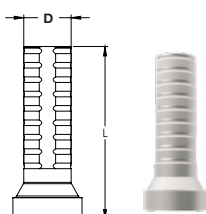
TITANIUM GRADE 23

		A°	H1 mm	D mm	Code	
 	0°		1.5		MUA-1200	
			2.5	4.8	MUA-1201	
			3.5		MUA-1208	
					MUA-1209	
					MUA-1214	
					MUA-1215	
 	17°		2.5	4.8	MUA-1202	N
					MUA-1203	R
			3.5		MUA-1210	MU
					MUA-1211	
 	30°		3.5	4.8	MUA-1204	
					MUA-1205	
			4.5		MUA-1212	
					MUA-1213	

## MULTI-UNIT ABUTMENT SCREW

Thread	Code
M1.6	SCR-1402 N
M2	SCR-1403 R

## MULTI-UNIT CYLINDER















L mm	D mm	Material	Code	
12	3.3	TITANIUM	CEM-1206	
12	3.3	CR-CO	OCA-1207	MU





## PROSTHETIC SCREW

Thread	Code
M1.4	SCR-1404 MU

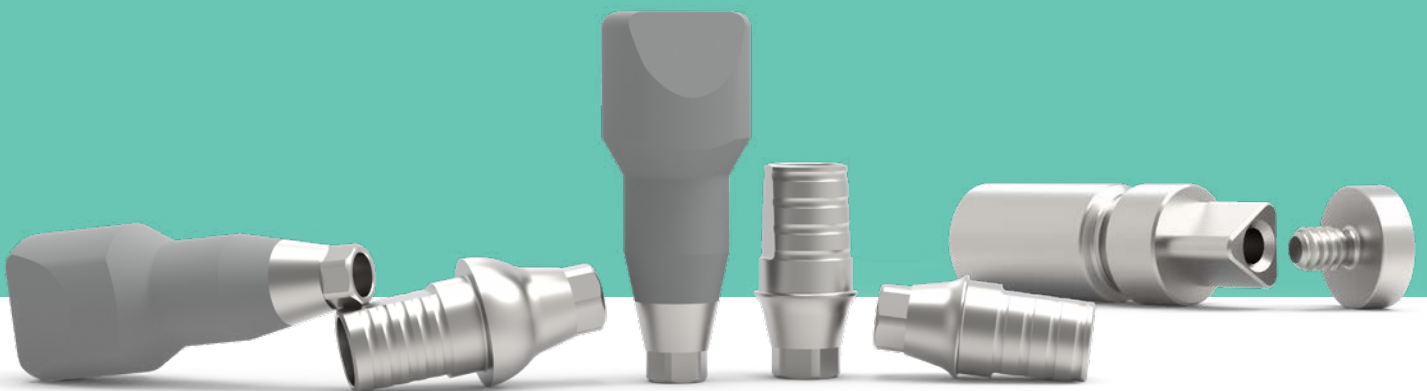
## MULTI-UNIT COMPONENTS

	Components		Screws	
TAB-1610		IMPRESSION COPING MU OPEN TRAY		SCR-1407 SCR-1415 M1.4
TAB-1612		IMPRESSION COPING MU CLOSED TRAY		SCR-1411 M1.4
HLS-1315 (h 4.5) HLS-1316 (h 6)		MU HEALING CAP		SCR-1404 M1.4
REP-1616		 MU REPLICA		SCR-1412 M1.6
SCA-1621		 MU SCAN-ABUTMENT		SCR-1404 M1.4

## ACCESSORIES

	Description	Code
	CONTRA-ANGLE MU DRIVER	SST-0092
	MANUAL MU DRIVER	MST-1205
	MU POSITIONER	MST-1206
	RATCHET ADAPTER	MST-1301

# DIGITAL LIBRARIES AND CAD/CAM ACCESSORIES



Our libraries are available for the following softwares: Exocad and 3Shape  
and can be downloaded from the website [www.mesaitalia.it](http://www.mesaitalia.it)


3shape  exocad

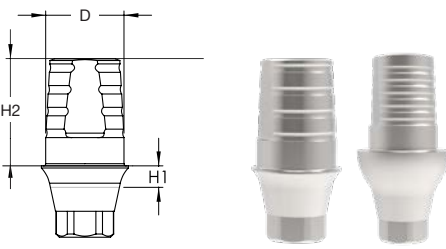
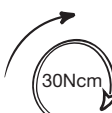






Before installation, the associated digitising components and accessories must be identified.

Ti-Base, Scan-Abutment and replica allow our implant line to have a wide range of restorative products  
enabling dentists and laboratories to embrace the  
digitization to design and create aesthetic and long-lasting restorations.

## Ti-BASE



TITANIUM GRADE 23

The components of the Igea system that can be downloaded in the digital libraries are marked with the symbol  next to the reference table.

		H1 mm	H2 mm	D mm	Type	Code
	  	1	5	3.3	hexed non-hexed	CEM-1100  CEM-1101
				3.6	hexed non-hexed	CEM-1104  CEM-1105
		2.5	5	3.3	hexed non-hexed	CEM-1108  CEM-1109
				3.6	hexed non-hexed	CEM-1112  CEM-1113

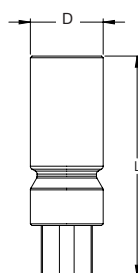
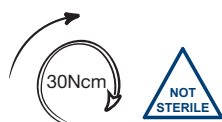
## PROSTHETIC SCREW





Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 

## IMPLANT REPLICA

MEDICAL STAINLESS STEEL



L mm	D mm	Code
13	3.65	REP-1614 
	4.3	REP-1615 

## REPLICA SCREW



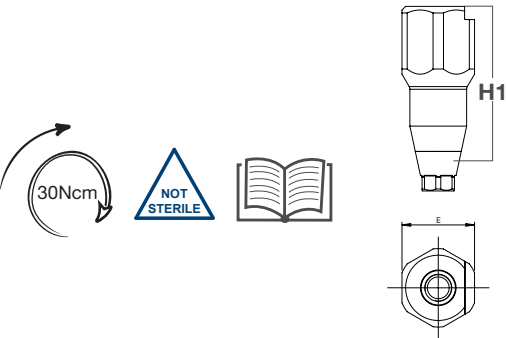
L mm	Thread	Code
3.7	M1.6	SCR-1412

The analogue of the IGEA line is suitable for use both for plaster models and **for 3D printed models.**



SCAN-ABUTMENT  
LARGE & SMALL

TITANIUM GRADE 23





LARGE

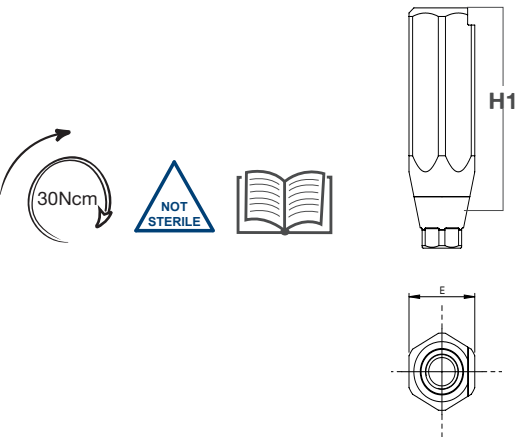


H1 mm	E mm	Code
12	5.5	SCA-1617 
		SCA-1618 

PROSTHETIC  
SCREW





Thread	Code
M1.6	SCR-1400 
M2	SCR-1401 





SMALL



H1 mm	E mm	Code
12	4.1	SCA-1619 
		SCA-1620 

PROSTHETIC  
SCREW





























Thread	Code
M.16	SCR-1400 
M2	SCR-1401 

# IGEA NARROW AND REGULAR SCREWS



IGEA screws allow for high-quality implant-abutment fixation, thus to prevent loosening that could cause damage to the finished work.

## SCREWS AND CODES

	Use with	Thread	Code
	<b>ABUTMENT Ti-BASE SCAN-ABUTMENT</b>	<b>M1.6</b>	SCR- <b>1400</b> 
		<b>M2</b>	SCR- <b>1401</b> 
	<b>MU ABUTMENT</b>	<b>M1.6</b>	SCR- <b>1402</b> 
		<b>M2</b>	SCR- <b>1403</b> 
	<b>MU SCAN-ABUTMENT MU CYLINDER HEALING CAP</b>	<b>M1.4</b>	SCR- <b>1404</b> 
	<b>CLOSED TRAY</b>	<b>M1.6</b>	SCR- <b>1408</b> 
		<b>M2</b>	SCR- <b>1409</b> 
	<b>MU CLOSED TRAY</b>	<b>M1.4</b>	SCR- <b>1411</b> 
	<b>OPEN TRAY L19</b>	<b>M1.6</b>	SCR- <b>1405</b> 
			SCR- <b>1406</b> 
	<b>OPEN TRAY L 24</b>	<b>M2</b>	SCR- <b>1413</b> 
			SCR- <b>1414</b> 
	<b>MU OPEN TRAY L19</b>	<b>M1.4</b>	SCR- <b>1407</b> 
	<b>MU OPEN TRAY L 24</b>		SCR- <b>1415</b> 
	<b>REPLICA MU REPLICA</b>	<b>M1.6</b>	SCR- <b>1412</b>
	<b>DENTAL IMPLANT</b>	<b>M1.6</b>	SCR- <b>1501</b> 
		<b>M2</b>	CPS- <b>1500</b> 

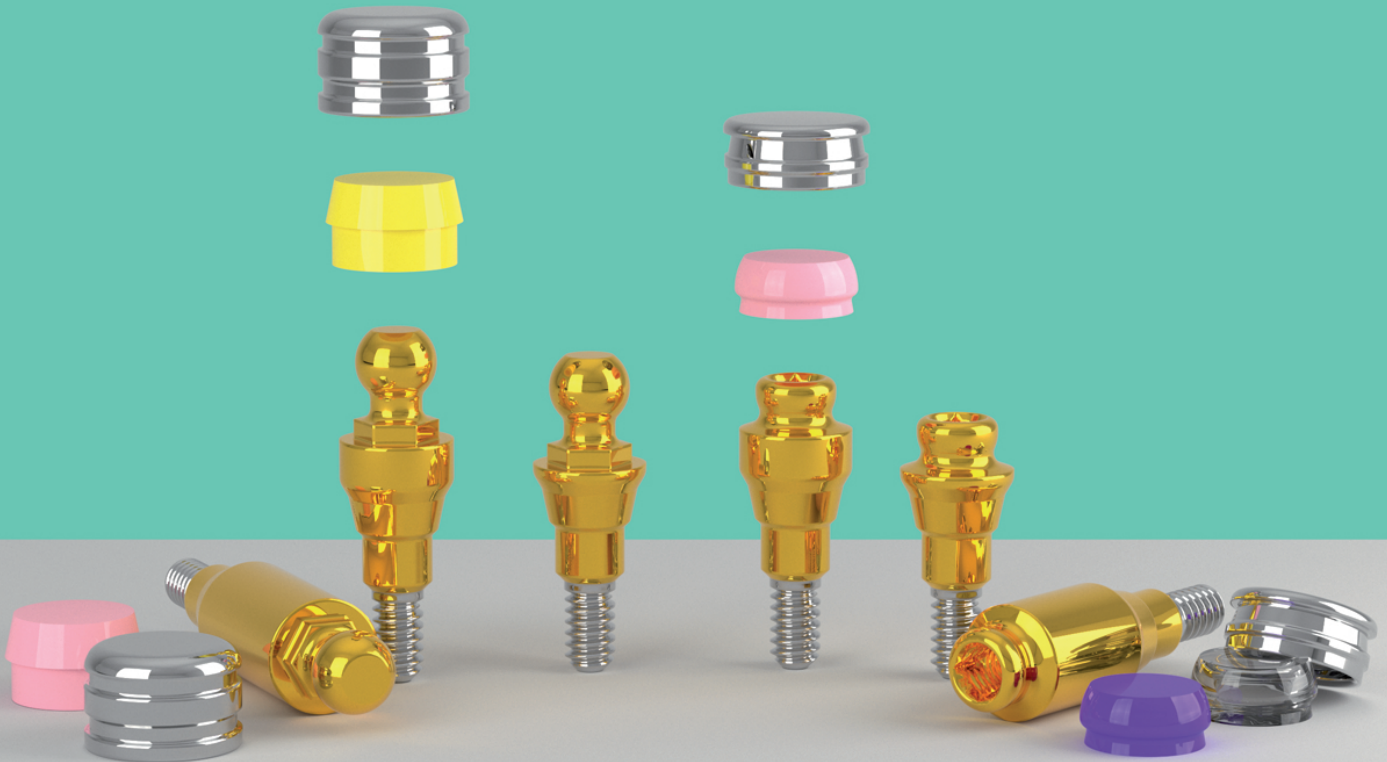




# OVERDENTURE

*Spheno*  
**BLOCK**



**DT** EQUATOR



**RHEIN83**



## OT EQUATOR IGEA NARROW AND REGULAR



H mm	 Code*	 Code*
0.5	030IGN0,5	030IGR0,5
1.0	030IGN1	030IGR1
2.0	030IGN2	030IGR2
3.0	030IGN3	030IGR3
4.0	030IGN4	030IGR4
5.0	030IGN5	030IGR5
6.0	030IGN6	030IGR6
7.0		030IGR7

### Complete package including:

- 1 Ot Equator custom abutment in different lengths in titanium with TIN coating\*



## OT EQUATOR IGEA NARROW AND REGULAR KIT



H mm	 Code*	 Code*
0.5	130IGN05	130IGN05
1.0	130IGN1	130IGR1
2.0	130IGN2	130IGR2
3.0	130IGN3	130IGR3
4.0	130IGN4	130IGR4
5.0	130IGN5	130IGR5
6.0	130IGN6	130IGR6
7.0		130IGR7

### Complete package including:

- 1 Ot Equator custom abutment in different lengths in titanium with TIN coating\*
- 1 black cap (for laboratory use)
- 4 Yellow Retentive Caps: 1 Yellow (extra soft), 1 Pink (Soft), 1 White (standard), 1 Purple (rigid)
- 1 Protective disc



## OT EQUATOR + SMART BOX IGEA NARROW AND REGULAR

H mm	 Code*	 Code*
0.5	131IGN05	131IGN05
1.0	131IGN1	131IGR1
2.0	131IGN2	131IGR2
3.0	131IGN3	131IGR3
4.0	131IGN4	131IGR4
5.0	131IGN5	131IGR5
6.0	131IGN6	131IGR6
7.0		131IGR7

### Complete package including:

- 1 Ot Equator custom Titanium abutment in different lengths
- 4 Retentive caps (different retention)
- 1 Cap self-parallelizing container
- 1 Protective disc



### EQUATOR SECTION COMPLETE

## RETENTIVE CAP ASSORTMENT KIT

### KIT-192ECE

- 1 stainless steel cap container
- 1 Black Cap (for laboratory use)
- 4 Yellow Retentive Caps: 1 Yellow (extra soft), 1 Pink (Soft), 1 White (standard), 1 Purple (rigid)
- 1 Protective disc



**PURPLE CAP** (4 pcs)  
Rigid seal (2.5 Kg)  
**140CEV**



**BLACK CAP** (4 pcs)  
For laboratory use  
**140CEN**



**WHITE CAP** (4 pcs)  
Standard seal (1.8 Kg)  
**140CET**



**STAINLESS STEEL CAP CONTAINER**  
(2 pcs)  
**141CAE**



**PINK CAP** (4 pcs)  
Soft seal (1.2 Kg)  
**140CER**



**IMPRESSION COPING CLOSED TRANSFER STRAPPING** (2 pcs)  
**044CAIN**



**YELLOW CAP** (4 pcs)  
Extra soft seal (0.6 Kg)  
**140CEG**



**LABORATORY ANALOG**  
(2 pcs)  
**144AE**



**SMARTBOX CONTAINER WITH BLACK CAP**  
FOR DIVERGENCES UP TO 50°  
**330SBE**



**EQUATOR KEY FOR RATCHET**  
**774CHE**



**INSERTER/EXTRACTOR FOR CAPS**  
(OT EQUATOR - NORMO)  
**487ICE**



**DRIVER FOR DYNAMOMETRIC HANDPIECE**  
**760CE**



# Sphero BLOCK

## SPHERO BLOCK NORMO (2.5mm)



H mm	Code*	Code*
1.0	002IGN1	002IGR1
2.0	002IGN2	002IGR2
3.0	002IGN3	002IGR3
4.0	002IGN4	002IGR4
5.0	002IGN5	002IGR5
6.0	002IGN6	002IGR6
7.0	002IGN7	002IGR7

## SPHERO BLOCK MICRO (1.8mm)



H mm	Code*	Code*
1.0	003IGN1R	003IGR1R
2.0	003IGN2R	003IGR2R
3.0	003IGN3R	003IGR3R
4.0	003IGN4R	003IGR4R
5.0	003IGN5R	003IGR5R
6.0	003IGN6R	003IGR6R
7.0	003IGN7R	003IGR7R

### Ot Sphero + smart box igea narrow kit

Complete package including:

- 1 Customized spherical abutment
- 3 Retentive caps (different retention)
- 1 Cap container
- 3 Directional rings
- 1 Protective disc



**TRANSPARENT CAP**  
STANDARD RETENTION  
040CRN



**BLACK CAP FOR THE LABORATORY**  
043CLN



**PINK CAP**  
SOFT RETENTION  
040CRNSN



**STAINLESS STEEL CONTAINER**  
041CAN



**YELLOW CAP**  
EXTRASOFT RETENTION  
060CRNAY



**SPHERO BLOCK KEY for ratchet**  
771CEF



**INSERTER/EXTRACTOR FOR CAPS**  
(OT EQUATOR - NORMO)  
485ICE



**CONNECTOR FOR DYNAMOMETRIC HANDPIECE**  
760CE



### REVERSIBLE DYNAMOMETRIC RATCHET

For tightening of Sphero-Block and Ot Equator  
Values of torque from 15 to 35 Ncm - Max 50 Ncm,  
suggested torque 25 Ncm

**760CRD-US**





## RAW MATERIALS

Mesa Italia has always been careful to select the best raw materials on the market.

**Commercially pure Grade 4 Titanium** is used for the production of the **implant**, which, in addition to ensure rapid osseointegration, has the highest mechanical resistance among commercially pure Titanium grades.

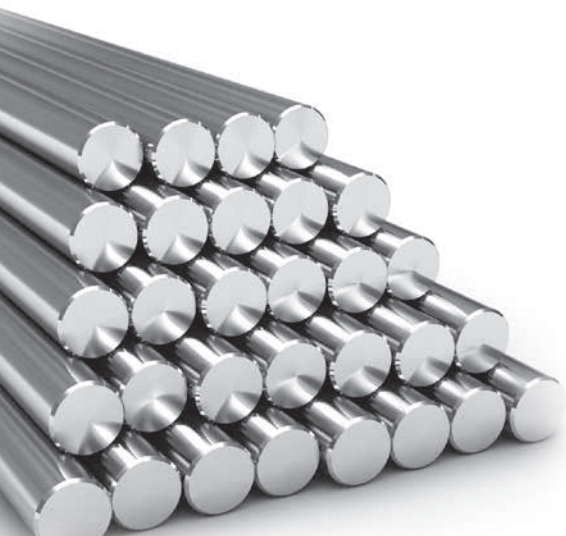
### MEDICAL GRADE 4 TITANIUM TECHNICAL SPECIFICATIONS

CHEMICAL COMPOSITION	CONCENTRATION (% m/m)
Nitrogen (N)	< 0.05
Carbon (C)	< 0.08
Hydrogen (H)	< 0.015
Iron (Fe)	< 0.50
Oxygen (O)	< 0.40
Titanium (Ti)	Remaining

MECHANICAL PROPERTIES	MINIMUM VALUES
Breaking load	> 550 MPa
Yield strength (0.2%)	> 483 MPa
Elongation	> 15%

Our implants conform to the specifications expressed in current regulations for the use of Grade 4 Titanium in implantology:

- ASTM F67: Standard Specification for unalloyed titanium, for surgical implant applications





The prosthetic components are made with **Grade 23 Titanium alloy**, the higher purity version of **Grade 5**, which provides not only excellent biocompatibility but also high fracture resistance, making it suitable for the fabrication of prostheses.

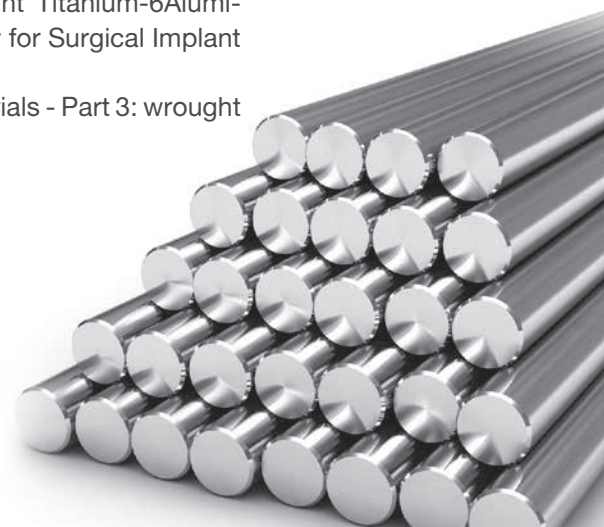
## SPECIFICATIONS TITANIUM GRADE 23 (Ti6Al4V ELI)

CHEMICAL COMPOSITION	CONCENTRATION (%)
Nitrogen (N)	< 0.05
Carbon (C)	< 0.08
Hydrogen (H)	< 0.012
Iron (Fe)	< 0.25
Oxygen (O)	< 0.13
Aluminum (Al)	5.50-6.50
Vanadium (V)	3.50-4.50
Titanium (Ti)	Remaining

MECHANICAL PROPERTIES	MINIMUM VALUES
Breaking load	> 860 MPa
Yield strength (0.2%)	> 795 MPa
Elongation	> 10%

Our components comply with the specifications expressed in current regulations for the use of Grade 23 Titanium in implantology:

- ASTM F136: Standard Specification for wrought Titanium-6Aluminum-4Vanadium ELI (Extra Low Interstitial) Alloy for Surgical Implant applications;
- ISO 5832-3: Implants for surgery - Metallic materials - Part 3: wrought Titanium 6-Aluminum 4-vanadium alloy



## RAW MATERIALS

**MESA's overcastable abutments are produced with Magnum Splendidum Chromium-Cobalt alloy**, the company's historic alloy that has excellent characteristics and is also ideal for overcasting.

Overcasting with Magnum Lucens alloy, which is equally known for its unique oxidation resistance and for a lower solidus/liquidus temperature (1253-1304°C) compared to standard Cr-Co alloys, is recommended.

Displayed in the tables below are data on the chemical composition and physical-mechanical properties of the alloys just described.

### CHEMICAL COMPOSITION OF CHROME-COBALT ALLOYS:

	CO(%)	CR(%)	W (%)	MO (%)	NB (%)	OTHER COMPONENTS
<b>Magnum Splendidum</b>	61	28	8.5	0	0.0	3 (Si, Mn, Fe)
<b>Magnum Lucens</b>	63	28	3	0	4.0	2 (Mn, Fe, Si)

### PHYSICAL-MECHANICAL PROPERTIES OF CHROME-COBALT ALLOYS:

	CET (25-500°)	FUSION TEMPERATURE
<b>Magnum Splendidum</b>	$14.2 \times 10^{-6} \text{K}^{-1}$	1440°C
<b>Magnum Lucens</b>	$14.1 \times 10^{-6} \text{K}^{-1}$	1360°C

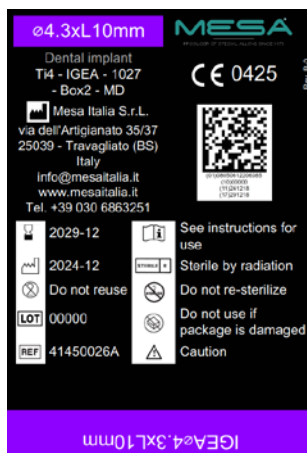


Mesa Discs - **Magnum Splendidum**





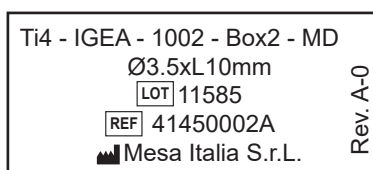
# IMPLANT PACKAGING



Mesa implants come in sterile packaging that guarantees, if intact and well preserved, the sterility of the same.

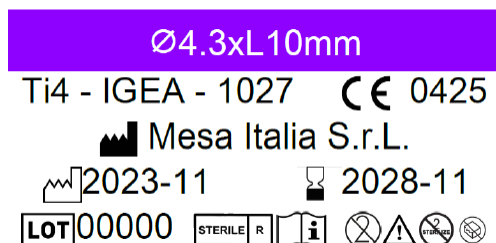
## CARDBOARD BOX

which adequately preserves the product, allows for easy storage and enables immediate visual identification due to the well-presented color code on the outer label.



Inside the box there are also:

- Three adhesive labels showing code and lot identifying the implant that must be applied to the implant passport and to the medical record.
- The paper instructions for use.



0425



Production date



Manufacturer



To be used within



Batch Code



Sterilized by irradiation



Not reusable



Do not re-sterilize



Danger



Sterile packaging.  
Do not use if the blister is open or damaged

## IMPLANT PICKING

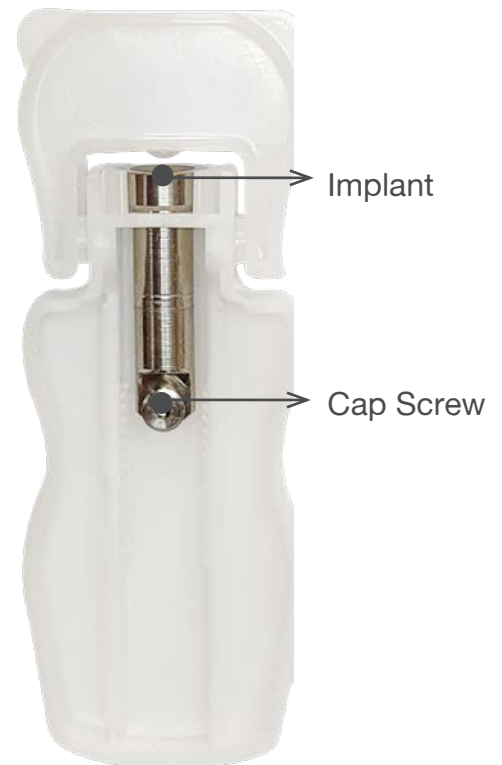
The implant is picked up directly from the Titanium container, by the operator using the contra-angle, without disrupting the sterile chain.



Rotate the cap backwards.



Pick up the implant with the motorized contra-angle driver.



## IMPLANT PACKAGING

- **Ease of use:**  
easy opening to allow convenient access to the implant and cap screw
- **Titanium holder** that serves as a support for the implant.



## ANATOMICAL CRITERIA

Before any implant surgery, a thorough patient anamnesis must be carried out (clinical and radiographic analysis are necessary) and all possible risks must be evaluated. The patient's expectations must also be well outlined. Close communication between the patient, dentist, surgeon, and dental technician is critical to achieve the desired prosthetic result.

Design, quantity, diameter, and length of implants to be placed will depend on the type of restoration planned and the quality and quantity of bone available.

Only by respecting the minimum distances between elements can the restoration be designed so that the necessary oral hygiene measures can be performed. Inappropriate choice of implant size can lead to hard- and soft-tissue complications, even to implant surgery failure.

The location of the implant can be considered in 3 dimensions:

- **Mesio-distal**

The presence of mesio-distal bone is an important factor in the choice of implant diameter as well as inter-implant distances in the case of multiple implants.

Therefore, stick to the following minimum measures:

- Minimum distance 2 mm between implant emergence and contiguous tooth (mesial and distal) at the level of the bone crest;
- Minimum distance 3 mm between two adjacent implant emergences (mesial and distal).

**Minimum 2 mm**



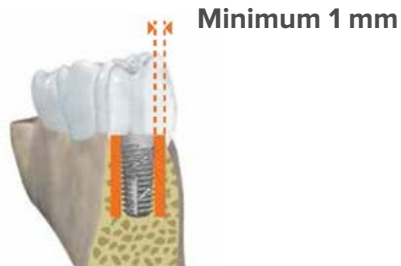
**Minimum 3 mm**



**NOTE:** suggested measurements are indicative, the greater the distance the lower the risk of post-surgical issues.

- **Lingual vestibule**

The minimum requirement for restoration contours equals 1.0 mm on both sides of the platform diameter. In anterior areas, it is desirable to have at least 2 mm vestibular cortical area.



- **Vertical anatomical boundaries**

It is recommended to maintain a distance of 1.0 to 2.0 mm between the maximum depth of the osteotomy and the upper limit of the mandibular canal to avoid injuring the neurovascular bundle.

Barfeie A, Wilson J, Rees: «Implant surface characteristic and their effect on osseointegration.» *British Dent J* (2015): 218:1-9.

CM, Abraham. «A Brief Historical Perspective on Dental Implants, Their Surface Coatings.» *Open Dent J* (2014; 8:50-55).

Ferreira Lemos, Lopez-Jarana, Falcao, Carrasco, Gil, Ríos-Santos and Herrero-Climent. «Effects of Different Undersizing Site Preparations on Implant Stability.» *Int J Environ Res Public Health*. (2020 Dec;): 17(23): 8965.

Ikar M., Grobeckere-Karl M., Steiner C., «Mechanical stress during implant surgery and its effects on marginal bone: a literature review.» *Quintessence Int* (2020): 51,142-150.

Larsson C., Wexell P. Thomsen B. Aronsson O, Tengvall P, Rodahl P.,. «Bone Response to Surface-Modified Titanium Implants:» *International Journal of Biomaterials* (Volume 2013.): Article ID 412482, 10 pages.

Lutering, Gerd and James C. Williams. *Commercially pure (CP) titanium and alpha alloys*. Berlin: Springer, 2003. p. 175-176., 2003.

OE, Ogle. «Implant surface material, design and osseointegration.» *Dent Clin North Am* (2015): 59:505-520.

Palmquist A., Esposito M, Lausmaa J, Thomsen P. «Titanium oral implants: surface characteristics, interface biology and clinical outcome.» *J R Soc Interface* (2010 Oct): Suppl 5(Suppl 5):S515-27.

Roccuzzo M., Roccuzzo A., Ramanuskaite A. «Papilla height in relation to the distance between bone crest and interproximal contact point at single-tooth implants: A.» *Clinical Oral Implant Research* (2018;): 29(Suppl. 15):50-61.

Velasco-Ortega E, Jimenez-Guerra et al. «Long-Term Clinical Outcomes of Treatment with Dental Implants with Acid Etched Surface.» *Materials* (2020): 13,1553.

Velasco-Ortega E, Ortiz-Garcia I et al-. «Osseointegration of Sandblasted and Acid-Etched Implant Surfaces. A Histological and Histomorphometric Study in the rabbit.» *Int. J. Mol. Sci.* ( 2021,): 22, 8507.

Wennerberg A., Albrektsson T., Chrcanovic B. «Long-term clinical outcome of implants with different surface modifications.» *Eur J Oral Implantol* (2018;): 11 Suppl 1:S123-S136.

## WARNINGS AND CERTIFICATIONS

### INSTRUCTIONS FOR USE

The information contained in this manual, supplements, without replacing, the instructions for use that accompany each Igea Implant System device and should not be construed as an alternative to the training and professional experience of the user.

Before using each product, it is recommended that you carefully read the instructions for use, which can also be found at [www.mesaitalia.it](http://www.mesaitalia.it).

Mesa Italia accepts no liability in the event of failure to comply with these instructions.

### CASE DOCUMENTATION AND TRACEABILITY

It is recommended that clinical, radiological, photographic and statistical documentation be recorded for each patient.

Each implant and prosthetic components should be tracked using the catalog number and lot number, which are on the respective labels accompanying the dental implant: implant labels should be attached to the patient card to facilitate traceability

### DISCLAIMER

The “IGEA” dental implant is intended only for professional use by licensed dental surgeons with extensive knowledge of dental prosthetics and should be inserted using only instruments and components supplied by the manufacturer.

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