SuperLine
Product / Manual Catalog

SuperLine
Product / Manual Catalog
2017

Dentium
For Dentists By Dentists

Specifications are subject to change without any notice.
Some products listed in this catalog are not available in the market due to pending approval.

SPMC-1706 [Rev.1]

HEAD OFFICE
10F, 21, Teheran-ro 87-gil, Gangnam-gu, Seoul, Korea Tel +82-2-555-3750 Fax +82-2-501-9560

HOMEPAGE
www.dentium.com

Contents

SuperLine	SuperLine Characteristics	04
	SuperLine Fixture Specifications	05
	SuperLine Fixture	06
Surgical Components	Cover Screw	07
	GBR Healing Abutment	07
	Healing Abutment	08
Prosthetic Procedure 1	Dual / Combi Abutment - Abutment Level Impression	10
	Combi Abutment	11
	Dual Abutment	12
	Abutment Level Impression Components	14
	Restorative Kit	15
Prosthetic Procedure 2	Dual / Custom / Milling / Angled / Direct-Casting / Metal-Casting / Temporary (Plastic & Ti) Abutment - Fixture Level Impression	16
	Fixture Level Impression Components	17
	Custom Abutment	19
	Milling Abutment	20
	Angled Abutment	22
	Direct-Casting Abutment	24
	Metal-Casting Abutment	24
	Ti-Temporary Abutment	25
	Plastic Temporary Abutment	25
Prosthetic Procedure 3	Screw Abutment - Abutment Level Impression	26
	Screw Abutment	27
	Angled Screw Abutment	28
	Screw Abutment Impression Components	29
Prosthetic Procedure 4	Overdenture Procedure - Positioner / Mini Ball / Magnetic Attachment	32
	Positioner	33
	Mini Ball Attachment	35
	Magnetic Attachment	36
Instruments	Surgical Kit (Full)	38
	Surgical Kit (Standard)	39
	Surgical Kit (Short Implant)	40
	Drill Stopper Kit	41
	Surgical Instruments	42
	DASK	50
	Sinus Bur Kit	51
	Sinus Kit	52
	DASK / Sinus Bur Kit / TN Brush	53
	Osteotome Kit	54
	Trephine Kit	55
	Prosthetic Kit	56
	Planning Kit	57
	Prosthetic and Laboratory Instrument	58
	Help Kit	59
	Polymer Guide Kit	60
New	Sinus Kit	61
	Ridge Expander Kit	62
	Implant Guide Kit	63
	Digital Full Kit	64
	Digital Simple Kit	65
	Surgical Manual	**67**
	Prosthesis Manual	**77**

S.L.A. Surface

S.L.A. (Sandblasting with Large grits and Acid etching)

· Higher bone-to-implant contact

· Faster bone formation on the surface

reference: Kim H., et. al. "The Biocompatability of SLA-treated Titanium Implants" Biomed. Mater. 2008; 3(2):025011

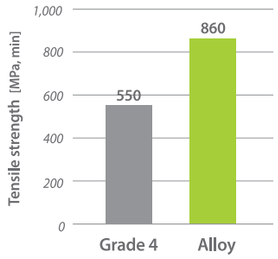
In vivo test

SuperLine

SuperLine Characteristics

Joint stability & Improved strength for zirconia crown

· Abutment material: Grade 4 ➡ Alloy



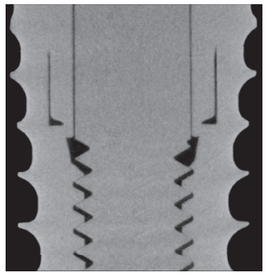
· Long hex design: Improved recognition

Improved soft tissue management

· Concave abutment design

· Non-coating

Improved wall thickness



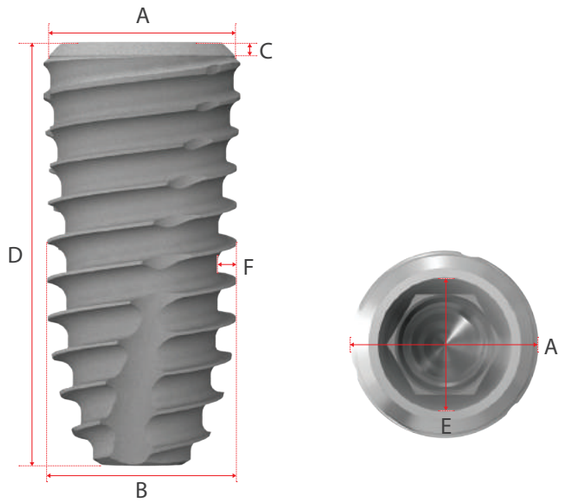
Double thread & Tapered design

Double threaded tapered body design may provide good success rate in immediate loading cases.

reference: Kim et. al., "A Prospective, 1-year observational study of double-threaded tapered body dental implants with immediate loading" J Prosthet Dent 2015;114:46-51

Increased thread height and sharper

SuperLine Fixture Specifications



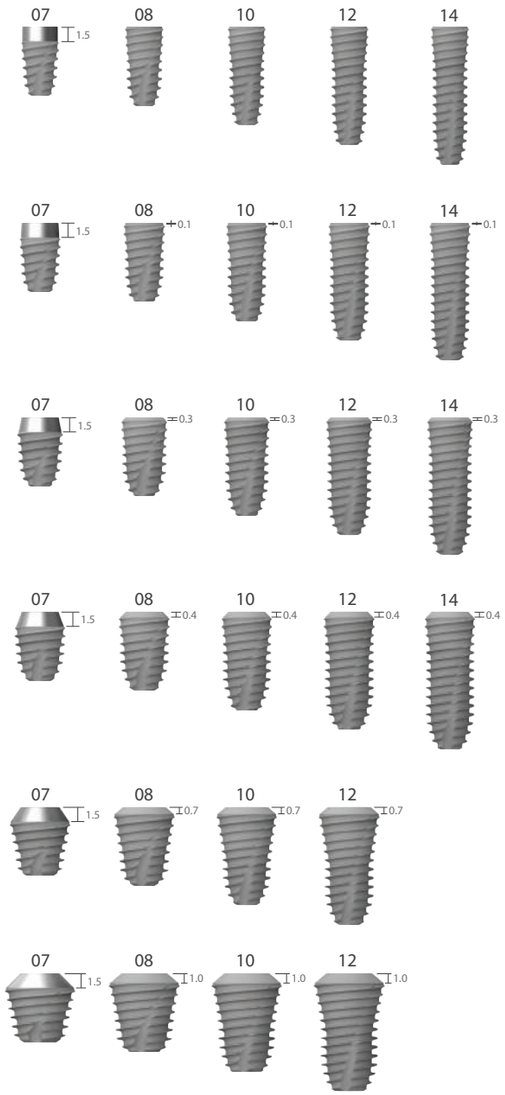
	Fixture (Mount Free)						
A	Platform Diameter(Ø)		3.6	4.0	4.4	4.9	6.0	7.0
B	Body Diameter(Ø)		3.6	4.0	4.5	5.0	5.0	5.8
C	Bevel Height (mm)	L: 7	1.5	1.5	1.5	1.5	1.5	1.5
		L: 8, 10, 12, 14	0	0.1	0.3	0.4	0.7	1.0
D	Total Length(mm)		7, 8, 10, 12, 14					
E	Abutment Interface(Ø)		3.33	3.33	3.33	3.33	3.33	3.33
F	Thread Depth(mm)		0.38	0.40	0.45	0.50	0.55	0.60
	Cap Color		 Yellow	Green	Blue	Red	Orange	Violet
	Selection Guideline		Anterior	Anterior	Premolar	Molar	Molar	Molar

SuperLine Fixture

Unit: mm, Scale 1.5 : 1

· Cover screw is not included in the package

Platform	Body	L	Art. No.
Ø 3.6	Ø 3.6	7	FX 36 07 SW
		8	FX 36 08 SW
		10	FX 36 10 SW
		12	FX 36 12 SW
		14	FX 36 14 SW
Ø 4.0	Ø 4.0	7	FX 40 07 SW
		8	FX 40 08 SW
		10	FX 40 10 SW
		12	FX 40 12 SW
		14	FX 40 14 SW
Ø 4.4	Ø 4.5	7	FX 45 07 SW
		8	FX 45 08 SW
		10	FX 45 10 SW
		12	FX 45 12 SW
		14	FX 45 14 SW
Ø 4.9	Ø 5.0	7	FX 50 07 SW
		8	FX 50 08 SW
		10	FX 50 10 SW
		12	FX 50 12 SW
		14	FX 50 14 SW
Ø 6.0	Ø 5.0	7	FX 60 07 SW
		8	FX 60 08 SW
		10	FX 60 10 SW
		12	FX 60 12 SW
Ø 7.0	Ø 5.8	7	FX 70 07 SW
		8	FX 70 08 SW
		10	FX 70 10 SW
		12	FX 70 12 SW

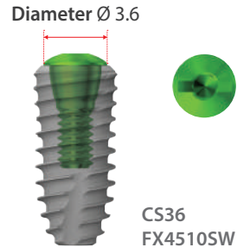


※ Note: To prevent damage to the Implant driver or fixture, do not over torque during fixture insertion.

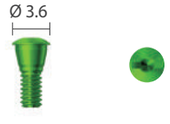
Cover Screw

Unit: mm, Scale 1.5 : 1

• Single use only
• Must sterilize prior to use



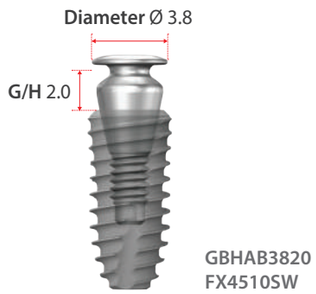
Color	Diameter	Art. No.
Green	Ø 3.6	CS 36



※ Hex driver: Use no more than 5N·cm of torque when screwing a cover screw to a fixture.
If hex is worn, slot on the head of the product can be used to rotate it.

GBR Healing Abutment

Unit: mm, Scale 1.5 : 1

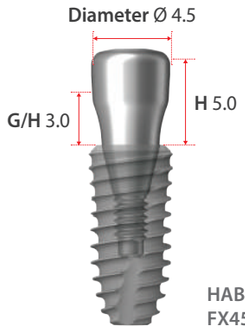


Diameter	G/H	Art. No.
Ø 3.3	3.5	GBHAB 33 35
Ø 3.8	0.5	GBHAB 38 05
Ø 3.8	2.0	GBHAB 38 20

※ Hex driver: Use no more than 10N·cm of torque when screwing a healing abutment to a fixture.
If hex is worn, slot on the head of the product can be used to rotate it.

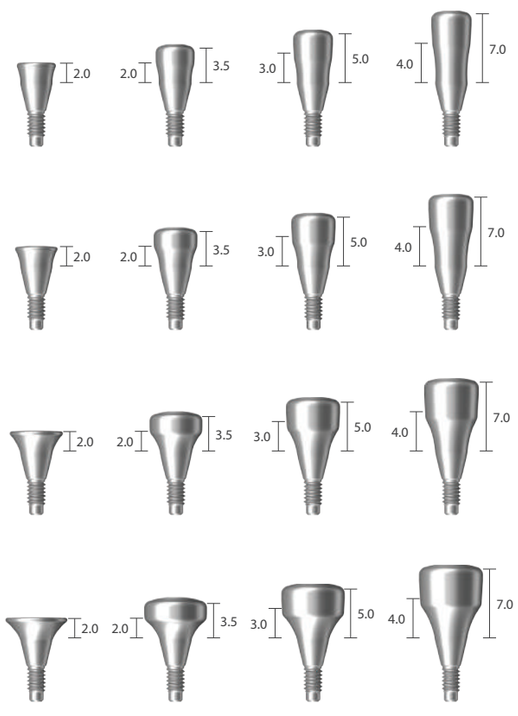
Healing Abutment

Unit: mm, Scale 1.5 : 1



HAB453050E
FX4510SW

Diameter	G/H	H	Art. No.
Ø 4.0	2.0	2.0	HAB 40 20 20 E
	2.0	3.5	HAB 40 20 35 E
	3.0	5.0	HAB 40 30 50 E
	4.0	7.0	HAB 40 40 70 E
Ø 4.5	2.0	2.0	HAB 45 20 20 E
	2.0	3.5	HAB 45 20 35 E
	3.0	5.0	HAB 45 30 50 E
	4.0	7.0	HAB 45 40 70 E
Ø 5.5	2.0	2.0	HAB 55 20 20 E
	2.0	3.5	HAB 55 20 35 E
	3.0	5.0	HAB 55 30 50 E
	4.0	7.0	HAB 55 40 70 E
Ø 6.5	2.0	2.0	HAB 65 20 20 E
	2.0	3.5	HAB 65 20 35 E
	3.0	5.0	HAB 65 30 50 E
	4.0	7.0	HAB 65 40 70 E

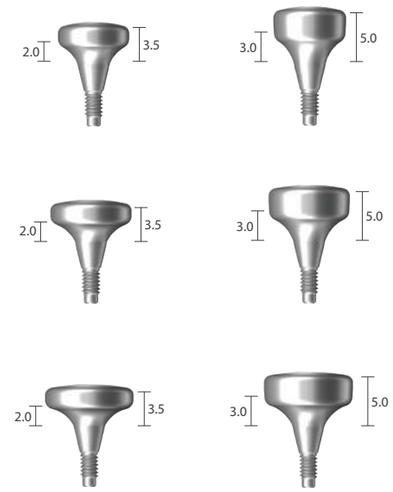


※ Hex driver: Use no more than 10N·cm of torque when screwing a healing abutment to a fixture.
If hex is worn, slot on the head of the product can be used to rotate it.

Healing Abutment

Unit: mm, Scale 1.5 : 1

Diameter	G/H	H	Art. No.
Ø 7.5	2.0	3.5	HAB 75 20 35 E
	3.0	5.0	HAB 75 30 50 E
Ø 8.5	2.0	3.5	HAB 85 20 35 E
	3.0	5.0	HAB 85 30 50 E
Ø 9.5	2.0	3.5	HAB 95 20 35 E
	3.0	5.0	HAB 95 30 50 E



※ Hex driver: Use no more than 10N·cm of torque when screwing a healing abutment to a fixture.
If hex is worn, slot on the head of the product can be used to rotate it.

Prosthetic Procedure 1

Impression Technique and Restoration Selection

Dual / Combi Abutment

Abutment Level Impression

Closed Tray Technique

Page **13**

Combi Abutment

Ø 4.5 / Ø 5.5 / Ø 6.5

Page **14, 15**

Dual Abutment

Hex / Non-hex

Ø 4.5 / Ø 5.5 / Ø 6.5

Page **16**

Impression Coping

Transfer (Snap on)

Ø 4.5 / Ø 5.5 / Ø 6.5

Page **16**

Analog

Long

Ø 4.5 / Ø 5.5 / Ø 6.5

Page **16**

Analog

Short

Ø 4.5 / Ø 5.5 / Ø 6.5

Burn-out Cylinder

Page **16**

Bridge

Rotational

Ø 4.5 / Ø 5.5 / Ø 6.5

Page **16**

Single

Non-rotational

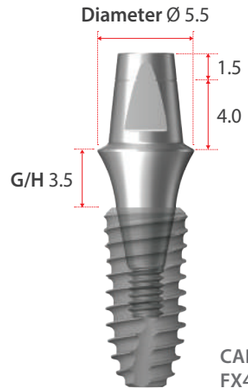
Ø 4.5 / Ø 5.5 / Ø 6.5

Modification

Cemented Restoration

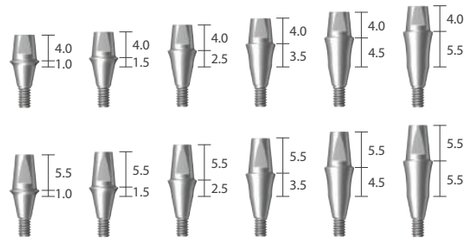
Combi Abutment

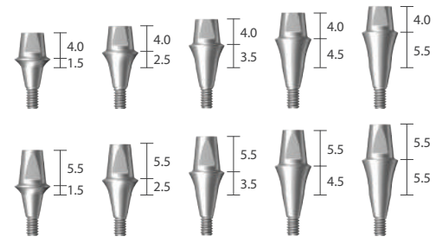
Unit: mm, Scale 1 : 1

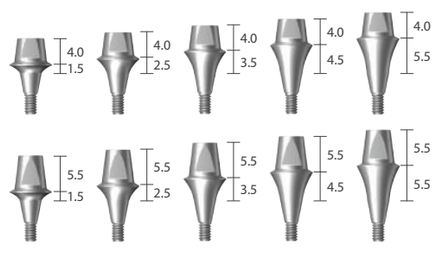


CAB5535E
FX4510SW

Diameter	G/H	Type	Art. No.	Type	Art. No.
Ø 4.5	1.0	**Short**	CAB 45 10 SE	**Long**	CAB 45 10 E
	1.5		CAB 45 15 SE		CAB 45 15 E
	2.5		CAB 45 25 SE		CAB 45 25 E
	3.5		CAB 45 35 SE		CAB 45 35 E
	4.5		CAB 45 45 SE		CAB 45 45 E
	5.5		CAB 45 55 SE		CAB 45 55 E
Ø 5.5	1.5	**Short**	CAB 55 15 SE	**Long**	CAB 55 15 E
	2.5		CAB 55 25 SE		CAB 55 25 E
	3.5		CAB 55 35 SE		CAB 55 35 E
	4.5		CAB 55 45 SE		CAB 55 45 E
	5.5		CAB 55 55 SE		CAB 55 55 E
Ø 6.5	1.5	**Short**	CAB 65 15 SE	**Long**	CAB 65 15 E
	2.5		CAB 65 25 SE		CAB 65 25 E
	3.5		CAB 65 35 SE		CAB 65 35 E
	4.5		CAB 65 45 SE		CAB 65 45 E
	5.5		CAB 65 55 SE		CAB 65 55 E





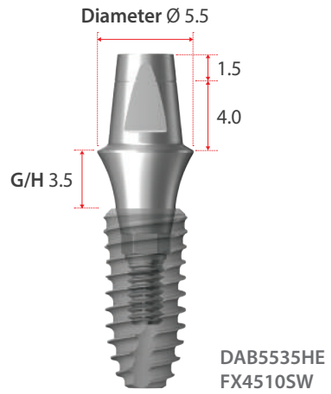


※ Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the combi abutment with fixture.

Dual Abutment_Hex

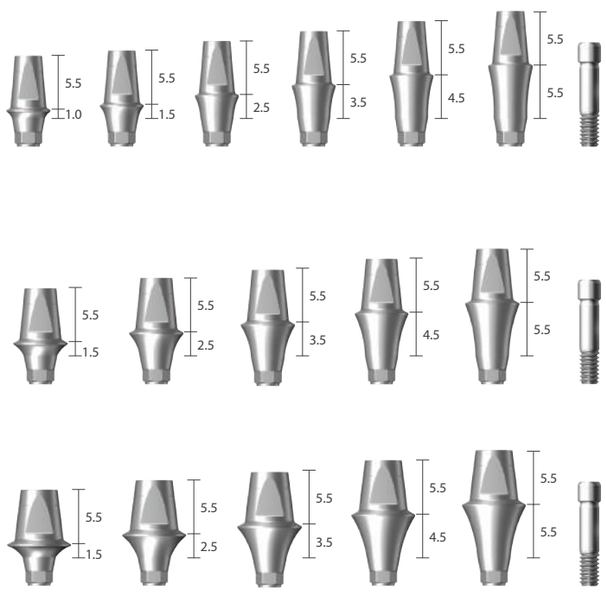
Unit: mm, Scale 1.5 : 1

· Abutment screw is included



DAB5535HE
FX4510SW

Diameter	G/H	Art. No.
Ø 4.5	1.0	DAB 45 10 HE
	1.5	DAB 45 15 HE
	2.5	DAB 45 25 HE
	3.5	DAB 45 35 HE
	4.5	DAB 45 45 HE
	5.5	DAB 45 55 HE
Ø 5.5	1.5	DAB 55 15 HE
	2.5	DAB 55 25 HE
	3.5	DAB 55 35 HE
	4.5	DAB 55 45 HE
	5.5	DAB 55 55 HE
Ø 6.5	1.5	DAB 65 15 HE
	2.5	DAB 65 25 HE
	3.5	DAB 65 35 HE
	4.5	DAB 65 45 HE
	5.5	DAB 65 55 HE

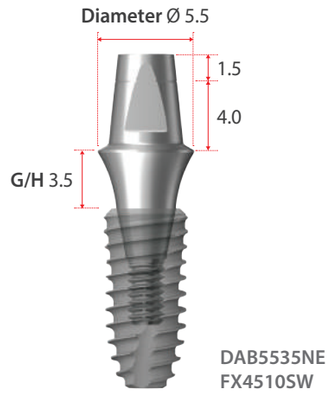


※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the dual abutment with fixture.

Dual Abutment_Non-hex

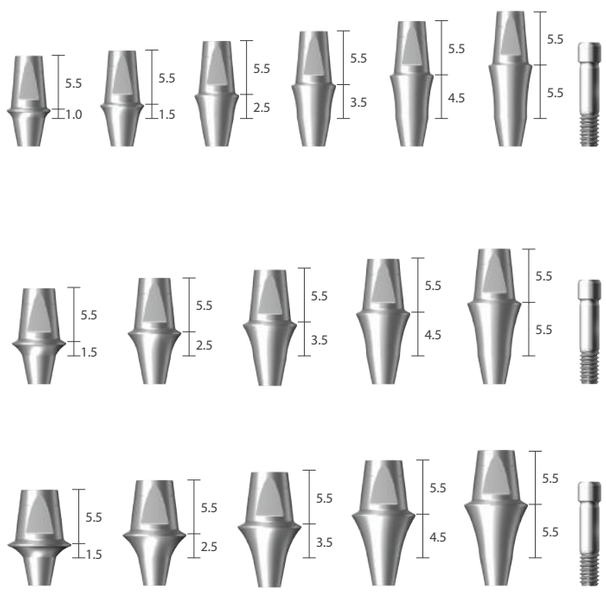
Unit: mm, Scale 1.5 : 1

· Abutment screw is included



DAB5535NE
FX4510SW

Diameter	G/H	Art. No.
Ø 4.5	1.0	DAB 45 10 NE
	1.5	DAB 45 15 NE
	2.5	DAB 45 25 NE
	3.5	DAB 45 35 NE
	4.5	DAB 45 45 NE
	5.5	DAB 45 55 NE
Ø 5.5	1.5	DAB 55 15 NE
	2.5	DAB 55 25 NE
	3.5	DAB 55 35 NE
	4.5	DAB 55 45 NE
	5.5	DAB 55 55 NE
Ø 6.5	1.5	DAB 65 15 NE
	2.5	DAB 65 25 NE
	3.5	DAB 65 35 NE
	4.5	DAB 65 45 NE
	5.5	DAB 65 55 NE



※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the dual abutment with fixture.

Abutment Level Impression Components

Unit: mm, Scale 1 : 1

Comfort Cap I Snap on

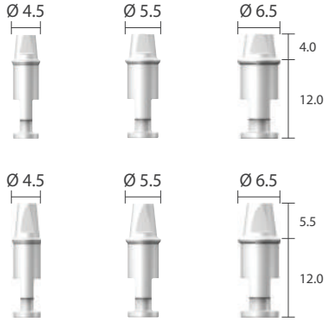
Type	Diameter	Art. No.
Short	Ø 4.5	CCC 45 CS
	Ø 5.5	CCC 55 CS
	Ø 6.5	CCC 65 CS
Long	Ø 4.5	CCC 45 C
	Ø 5.5	CCC 55 C
	Ø 6.5	CCC 65 C

Impression Coping

Diameter	Art. No.
Ø 4.5	CIC 45 L
Ø 5.5	CIC 55 L
Ø 6.5	CIC 65 L

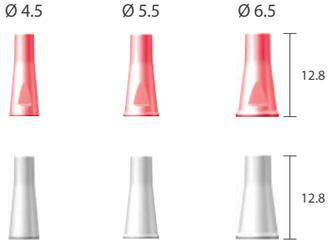
Lab Analog

Type	Diameter	Art. No.
Short	Ø 4.5	CAN 45 SL
	Ø 5.5	CAN 55 SL
	Ø 6.5	CAN 65 SL
Long	Ø 4.5	CAN 45 LL
	Ø 5.5	CAN 55 LL
	Ø 6.5	CAN 65 LL



Burn-out Cylinder

Type	Diameter	Art. No.
Single	Ø 4.5	CBC 45 SL
	Ø 5.5	CBC 55 SL
	Ø 6.5	CBC 65 SL
Bridge	Ø 4.5	CBC 45 BL
	Ø 5.5	CBC 55 BL
	Ø 6.5	CBC 65 BL



Restorative Kit

Combi & Dual Abutment

Art. No	Lab. Components				
	Comfort Cap	Impression Coping	Analog	Burn-out Cylinder	
XSDAB 45 S XSDAB 45	CCC 45 CS CCC 45 C	CIC 45 L	CAN 45 SL CAN 45 LL	CBC 45 SL	CBC 45 BL
XSDAB 55 S XSDAB 55	CCC 55 CS CCC 55 C	CIC 55 L	CAN 55 SL CAN 55 LL	CBC 55 SL	CBC 55 BL
XSDAB 65 S XSDAB 65	CCC 65 CS CCC 65 C	CIC 65 L	CAN 65 SL CAN 65 LL	CBC 65 SL	CBC 65 BL

Prosthetic Procedure 2

Impression Technique and Restoration Selection

Dual / Custom / Milling / Angled / Direct-Casting / Metal-Casting / Ti-Temporary / Plastic Temporary Abutment

Fixture Level Impression

Page 19

Impression Coping Pick-up

Open tray technique (Complicated case)
Ø 4.0 / Ø 4.5 / Ø 5.5 / Ø 6.5

Hex Non-hex

Page 20

Impression Coping Transfer

Closed tray technique (Simple case)
Ø 4.0 / Ø 4.5 / Ø 5.5 / Ø 6.5

Hex Non-hex

Page 19, 20

Analog

Ø 4.5

Page 14, 15

Dual Abutment

Hex / Non-hex
Ø 4.5 / Ø 5.5 / Ø 6.5

Page 21

Custom Abutment

Hex / Non-hex
Ø 4.5 / Ø 5.5

Page 26

Direct-Casting Abutment

Hex / Non-hex
Ø 4.5

Page 26

Metal-Casting Abutment

Hex / Non-hex
Ø 4.5

Page 22, 23

Milling Abutment

Hex / Non-hex
Ø 4.0 / Ø 4.5 /
Ø 5.5 / Ø 6.5 / Ø 7.5

Page 24, 25

Angled Abutment

Hex / Non-hex
15° / 25°
Ø 4.5 / Ø 5.5

Page 27

Ti-Temporary Abutment

Hex / Non-hex
Ø 4.5

Page 27

Plastic Temporary Abutment

Hex / Non-hex
Ø 4.5 / Ø 5.5 / Ø 6.5

Modification

Cemented Restoration

Modification

Screw-Retained Restoration

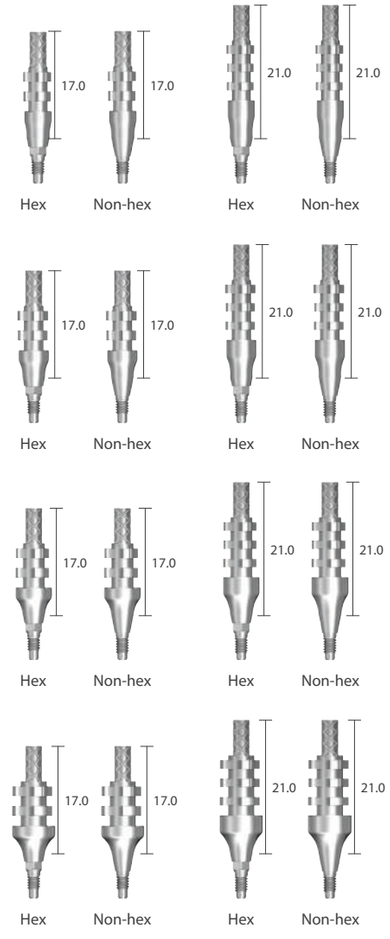
Fixture Level Impression Components

Unit: mm, Scale 1 : 1

· Impression coping screw is included with Impression coping.

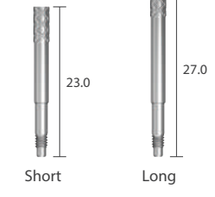
Impression Coping Pick-up

Diameter	Size	Type	Art. No.
Ø 4.0	Short	Hex	DPU 40 11 HE
	Short	Non-hex	DPU 40 11 NE
	Long	Hex	DPU 40 15 HE
	Long	Non-hex	DPU 40 15 NE
Ø 4.5	Short	Hex	DPU 45 11 HE
	Short	Non-hex	DPU 45 11 NE
	Long	Hex	DPU 45 15 HE
	Long	Non-hex	DPU 45 15 NE
Ø 5.5	Short	Hex	DPU 55 11 HE
	Short	Non-hex	DPU 55 11 NE
	Long	Hex	DPU 55 15 HE
	Long	Non-hex	DPU 55 15 NE
Ø 6.5	Short	Hex	DPU 65 11 HE
	Short	Non-hex	DPU 65 11 NE
	Long	Hex	DPU 65 15 HE
	Long	Non-hex	DPU 65 15 NE



Impression Coping Transfer Screw

Size	L	Art. No.
Short	23.0	DPS 11 E
Long	27.0	DPS 15 E



Analog

Diameter	L	Art. No.
Ø 4.5	12.0	DANSE

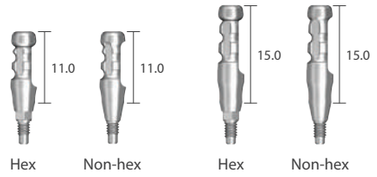
Fixture Level Impression Components

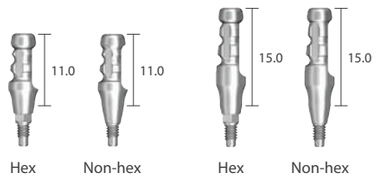
Unit: mm, Scale 1 : 1

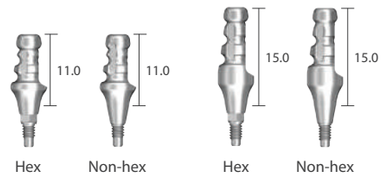
· Impression coping screw is included with Impression coping.

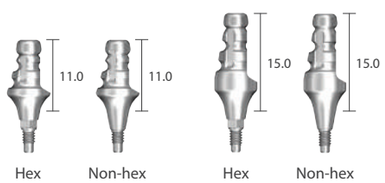
Impression Coping Transfer

Diameter	Size	Type	Art. No.
Ø 4.0	Short	Hex	DTF 40 11 HE
	Short	Non-hex	DTF 40 11 NE
	Long	Hex	DTF 40 15 HE
	Long	Non-hex	DTF 40 15 NE
Ø 4.5	Short	Hex	DTF 45 11 HE
	Short	Non-hex	DTF 45 11 NE
	Long	Hex	DTF 45 15 HE
	Long	Non-hex	DTF 45 15 NE
Ø 5.5	Short	Hex	DTF 55 11 HE
	Short	Non-hex	DTF 55 11 NE
	Long	Hex	DTF 55 15 HE
	Long	Non-hex	DTF 55 15 NE
Ø 6.5	Short	Hex	DTF 65 11 HE
	Short	Non-hex	DTF 65 11 NE
	Long	Hex	DTF 65 15 HE
	Long	Non-hex	DTF 65 15 NE



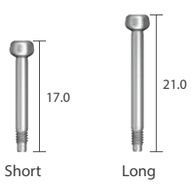






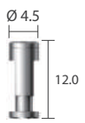
Impression Coping Transfer Screw

Size	L	Art. No.
Short	17.0	DTS 11 E
Long	21.0	DTS 15 E



Analog

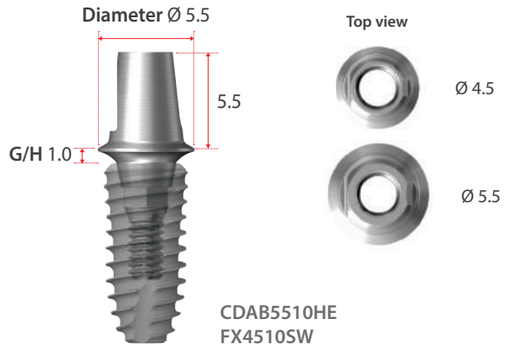
Diameter	L	Art. No.
Ø 4.5	12.0	DANSE



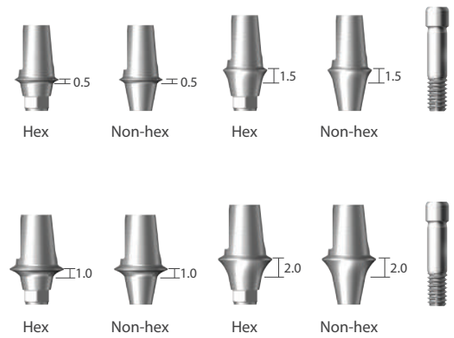
Custom Abutment

Unit: mm, Scale 1.5 : 1

· Abutment screw is included.



Diameter	G/H	Type	Art. No.
Ø 4.5	0.5	Hex	CDAB 45 05 HE
	0.5	Non-hex	CDAB 45 05 NE
	1.5	Hex	CDAB 45 15 HE
	1.5	Non-hex	CDAB 45 15 NE
Ø 5.5	1.0	Hex	CDAB 55 10 HE
	1.0	Non-hex	CDAB 55 10 NE
	2.0	Hex	CDAB 55 20 HE
	2.0	Non-hex	CDAB 55 20 NE

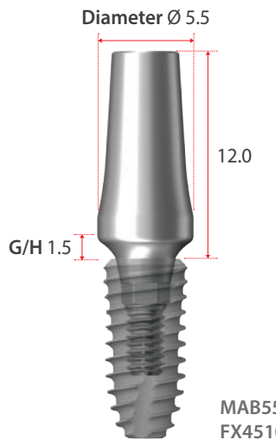


※ Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the custom abutment with fixture.

Milling Abutment

Unit: mm, Scale 1.5 : 1

· Abutment screw is included.



MAB55157HE
FX4510SW

Diameter	G/H	Type	Art. No.
Ø 4.0	1.0	Hex	MAB 40 105 HE
	1.0	Non-hex	MAB 40 105 NE

Diameter	G/H	Type	Art. No.
Ø 4.5	1.5	Hex	MAB 45 156 HE
	1.5	Non-hex	MAB 45 156 NE

Diameter	G/H	Type	Art. No.
Ø 5.5	1.5	Hex	MAB 55 157 HE
	1.5	Non-hex	MAB 55 157 NE
	2.5	Hex	MAB 55 257 HE
	2.5	Non-hex	MAB 55 257 NE

※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the milling abutment with fixture.

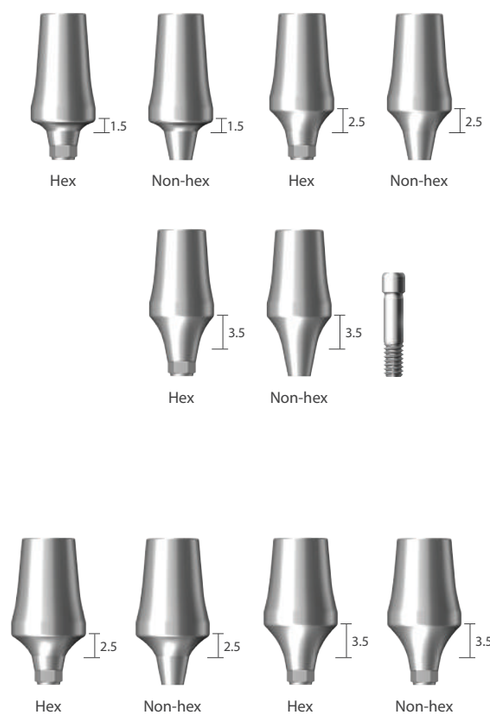
Milling Abutment

Unit: mm, Scale 1.5 : 1

· Abutment screw is included.

Diameter	G/H	Type	Art. No.
Ø 6.5	1.5	Hex	MAB 65 158 HE
	1.5	Non-hex	MAB 65 158 NE
	2.5	Hex	MAB 65 258 HE
	2.5	Non-hex	MAB 65 258 NE
	3.5	Hex	MAB 65 358 HE
	3.5	Non-hex	MAB 65 358 NE

Diameter	G/H	Type	Art. No.
Ø 7.5	2.5	Hex	MAB 75 259 HE
	2.5	Non-hex	MAB 75 259 NE
	3.5	Hex	MAB 75 359 HE
	3.5	Non-hex	MAB 75 359 NE

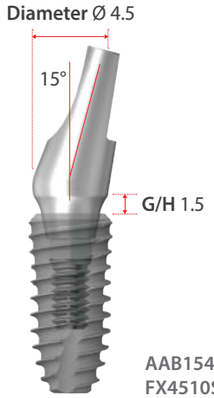


※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the milling abutment with fixture.

Angled Abutment_15°

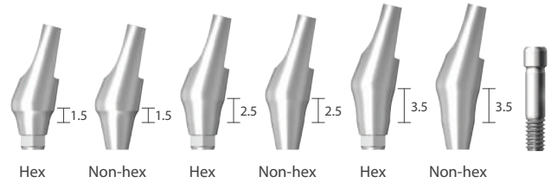
Unit: mm, Scale 1.5 : 1

· Abutment screw is included.



AAB154515HE
FX4510SW

Diameter	G/H	Type	Art. No.
Ø 4.5	1.5	Hex	AAB 15 45 15 HE
	1.5	Non-hex	AAB 15 45 15 NE
	2.5	Hex	AAB 15 45 25 HE
	2.5	Non-hex	AAB 15 45 25 NE
	3.5	Hex	AAB 15 45 35 HE
	3.5	Non-hex	AAB 15 45 35 NE



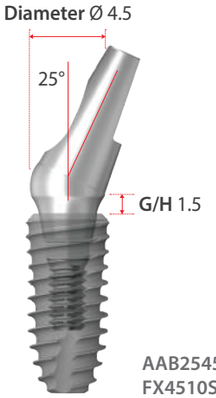
Diameter	G/H	Type	Art. No.
Ø 5.5	1.5	Hex	AAB 15 55 15 HE
	1.5	Non-hex	AAB 15 55 15 NE
	2.5	Hex	AAB 15 55 25 HE
	2.5	Non-hex	AAB 15 55 25 NE
	3.5	Hex	AAB 15 55 35 HE
	3.5	Non-hex	AAB 15 55 35 NE

※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the angled abutment with fixture.

Angled Abutment_25°

Unit: mm, Scale 1.5 : 1

· Abutment screw is included.



AAB254515HE
FX4510SW

Diameter	G/H	Type	Art. No.
Ø 4.5	1.5	Hex	AAB 25 45 15 HE
	1.5	Non-hex	AAB 25 45 15 NE
	2.5	Hex	AAB 25 45 25 HE
	2.5	Non-hex	AAB 25 45 25 NE
	3.5	Hex	AAB 25 45 35 HE
	3.5	Non-hex	AAB 25 45 35 NE

Diameter	G/H	Type	Art. No.
Ø 5.5	1.5	Hex	AAB 25 55 15 HE
	1.5	Non-hex	AAB 25 55 15 NE
	2.5	Hex	AAB 25 55 25 HE
	2.5	Non-hex	AAB 25 55 25 NE
	3.5	Hex	AAB 25 55 35 HE
	3.5	Non-hex	AAB 25 55 35 NE

※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the angled abutment with fixture.

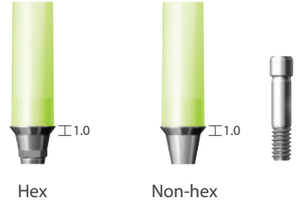
Direct-Casting Abutment

Unit: mm, Scale 1.5 : 1

• Abutment screw is included.

Gold

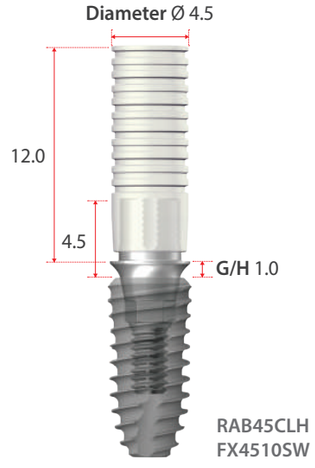
Diameter	G/H	Type	Art. No.
Ø 4.5	1.0	Hex	RAB 45 GH
		Non-hex	RAB 45 GN



Metal-Casting Abutment

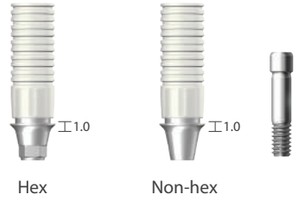
Unit: mm, Scale 1.5 : 1

• Abutment screw is included.



Co-Cr

Diameter	G/H	Type	Art. No.
Ø 4.5	1.0	Hex	RAB 45 CLH
		Non-hex	RAB 45 CLN

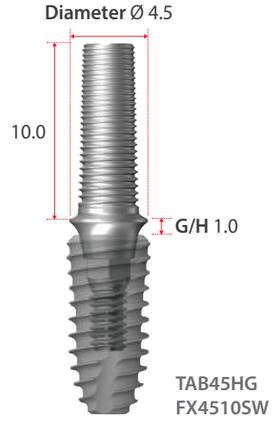


※ Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the direct casting/metal casting abutment with fixture.

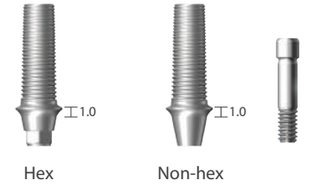
Ti-Temporary Abutment

Unit: mm, Scale 1.5 : 1

• Abutment screw is included.



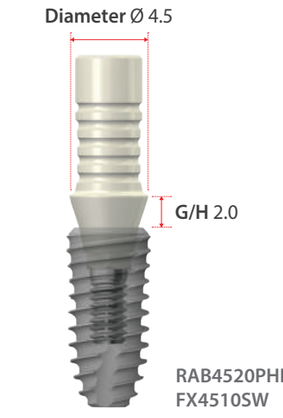
Diameter	G/H	Type	Art. No.
Ø 4.5	1.0	Hex	TAB 45 HG
		Non-hex	TAB 45 NG



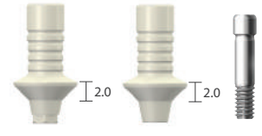
Plastic Temporary Abutment

Unit: mm, Scale 1.5 : 1

• Abutment screw is included.



Diameter	G/H	Type	Art. No.
Ø 4.5	2.0	Hex	RAB 45 20 PHL
		Non-hex	RAB 45 20 PNL
Ø 5.5	2.0	Hex	RAB 55 20 PHL
		Non-hex	RAB 55 20 PNL
Ø 6.5	2.0	Hex	RAB 65 20 PHL
		Non-hex	RAB 65 20 PNL



※ Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the temporary abutment with fixture.

Prosthetic Procedure 3

Impression Technique and Restoration Selection

Screw Abutment

Abutment Level Impression

Page 29

Screw Abutment

Ø 4.5 / Ø 5.5

Page 30

Angled Screw Abutment

Hex / Non-hex
20°
Ø 4.5 / Ø 5.5

Open tray technique

Closed tray technique

Page 31

Impression Coping Pick-up

Single / Bridge
Ø 4.5 / Ø 5.5 / Ø 6.5

Page 31

Impression Coping Transfer

Single / Bridge
Ø 4.5 / Ø 5.5 / Ø 6.5

Page 32

Analog

Ø 4.5 / Ø 5.5

Page 33

Burn-out Cylinder

Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Page 33

Gold Cylinder

Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Page 33

Metal Cylinder

Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Page 32

Ti Cylinder

Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Page 33

Ti Temporary Cylinder

Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Page 32

Polishing Protector

Ø 4.5 / Ø 5.5

Temporary Restoration

Page 32

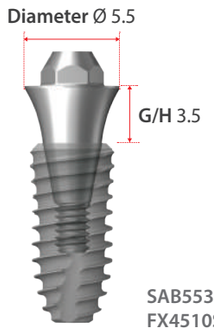
Ti-Retaining Screw

Screw-Retained Restoration

Screw Abutment

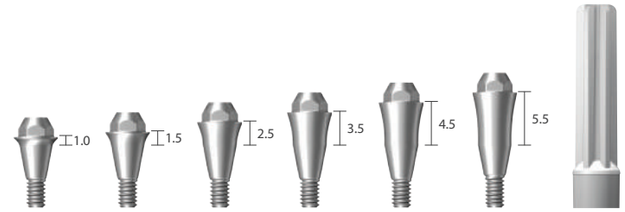
Unit: mm, Scale 1.5 : 1

Delivery Holder

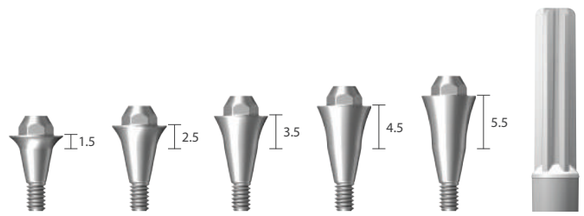


SAB5535E
FX4510SW

Diameter	G/H	Art. No.
Ø 4.5	1.0	SAB 45 10 E
	1.5	SAB 45 15 E
	2.5	SAB 45 25 E
	3.5	SAB 45 35 E
	4.5	SAB 45 45 E
	5.5	SAB 45 55 E



Diameter	G/H	Art. No.
Ø 5.5	1.5	SAB 55 15 E
	2.5	SAB 55 25 E
	3.5	SAB 55 35 E
	4.5	SAB 55 45 E
	5.5	SAB 55 55 E

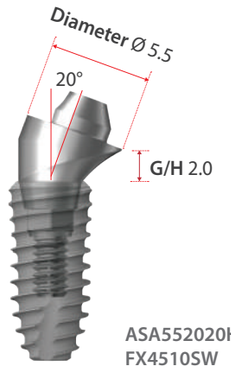


※ Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the screw abutment with fixture.

Angled Screw Abutment

Unit: mm, Scale 1.5 : 1

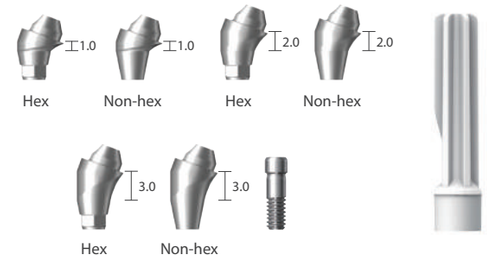
· Abutment screw is included.



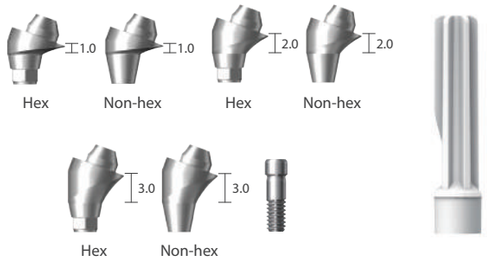
ASA552020HE
FX4510SW

Delivery
Holder

Diameter	G/H	Type	Art. No.
Ø 4.5	1.0	Hex	ASA 45 10 HE
	1.0	Non-hex	ASA 45 10 NE
	2.0	Hex	ASA 45 20 HE
	2.0	Non-hex	ASA 45 20 NE
	3.0	Hex	ASA 45 30 HE
	3.0	Non-hex	ASA 45 30 NE

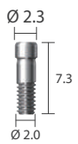


Diameter	G/H	Type	Art. No.
Ø 5.5	1.0	Hex	ASA 55 10 HE
	1.0	Non-hex	ASA 55 10 NE
	2.0	Hex	ASA 55 20 HE
	2.0	Non-hex	ASA 55 20 NE
	3.0	Hex	ASA 55 30 HE
	3.0	Non-hex	ASA 55 30 NE



Angled Screw Abutment Screw

Diameter	L	Art. No.
Ø 2.3	7.3	ASASC 20 23



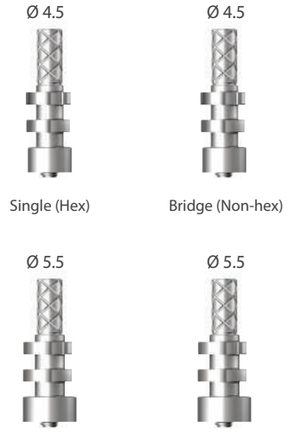
※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the angled screw abutment with fixture.

Screw Abutment Impression Components

Unit: mm, Scale 1.5 : 1

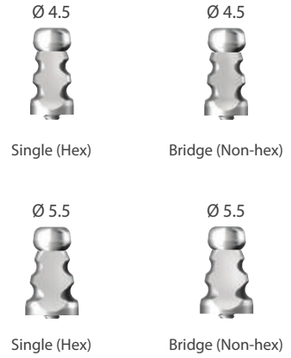
Impression Coping Pick-up

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	SPU 45 SL
	Bridge	Non-hex	SPU 45 BL
Ø 5.5	Single	Hex	SPU 55 SL
	Bridge	Non-hex	SPU 55 BL



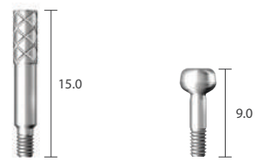
Impression Coping Transfer

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	STF 45 SL
	Bridge	Non-hex	STF 45 BL
Ø 5.5	Single	Hex	STF 55 SL
	Bridge	Non-hex	STF 55 BL



Impression Coping Screw

Type	L	Art. No.
Pick-up	15.0	SPS 09
Transfer	9.0	STS 09



Screw Abutment Impression Components

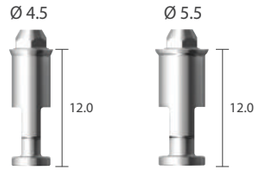
Unit: mm, Scale 1.5 : 1

Comfort Cap

Diameter	L	Art. No.
Ø 4.5	5.0	SCC 45 L
Ø 5.5		SCC 55 L

Analog

Diameter	L	Art. No.
Ø 4.5	12.0	SAN 45 L
Ø 5.5		SAN 55 L

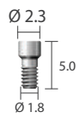


Polishing Protector

Diameter	L	Art. No.
Ø 4.5	4.71	SPP 45 L
Ø 5.5		SPP 55 L

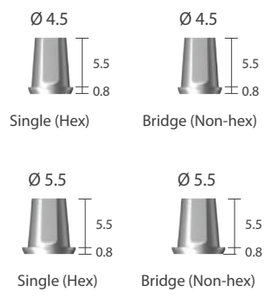
Ti-Retaining Screw

Diameter	L	Art. No.
Ø 2.3	5.0	SRT 18 T



Ti-Cylinder

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	STA 45 S
	Bridge	Non-hex	STA 45 B
Ø 5.5	Single	Hex	STA 55 S
	Bridge	Non-hex	STA 55 B

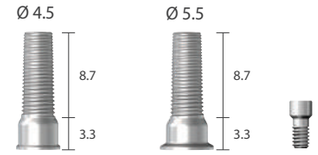


Screw Abutment Impression Components

Unit: mm, Scale 1.5 : 1

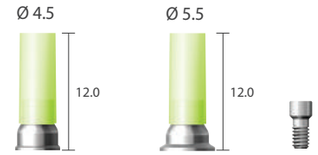
Ti-Temporary Cylinder

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	STC 45 SG
	Bridge	Non-hex	STC 45 BG
Ø 5.5	Single	Hex	STC 55 SG
	Bridge	Non-hex	STC 55 BG



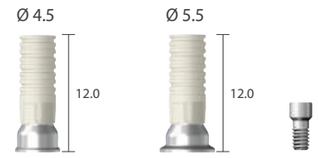
Gold Cylinder

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	SGC 45 SL
	Bridge	Non-hex	SGC 45 BL
Ø 5.5	Single	Hex	SGC 55 SL
	Bridge	Non-hex	SGC 55 BL



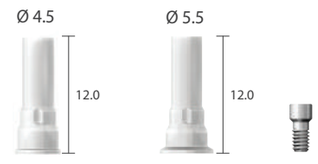
Metal Cylinder | Co-Cr

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	SGC 45 CSL
	Bridge	Non-hex	SGC 45 CBL
Ø 5.5	Single	Hex	SGC 55 CSL
	Bridge	Non-hex	SGC 55 CBL



Burn-out Cylinder

Diameter	Type		Art. No.
Ø 4.5	Single	Hex	SBC 45 SL
	Bridge	Non-hex	SBC 45 BL
Ø 5.5	Single	Hex	SBC 55 SL
	Bridge	Non-hex	SBC 55 BL



Prosthetic Procedure 4

Impression Technique and Restoration Type

Overdenture Procedure

Positioner / Mini Ball / Magnetic Attachment

Page 35

Positioner Abutment

Ø 3.5

Page 36

Mini Ball Abutment

Ø 3.5

Page 38, 39

Magnetic Implant Keeper

Dome type / Flat type

Ø 4.5 / Ø 5.5

Abutment Level Impression

Page 35

Positioner Impression Coping

Ø 4.5

Page 37

Mini Ball Impression Coping

Ø 3.5

Page 35

Positioner Analog

Ø 3.5

Page 37

Mini Ball Analog

Ø 3.5

Page 36

Block Out Spacer

Ø 6.5

Page 37

Socket Spacer

Ø 4.05 / Ø 4.85

Page 36

Positioner Socket

Metal / Plastic

Page 37

Mini Ball Female Socket / O-ring

Ø 4.05 / Ø 4.85

Page 38, 39

Magnetic Assay

Dome type / Flat type

Ø 4.5 / Ø 5.5

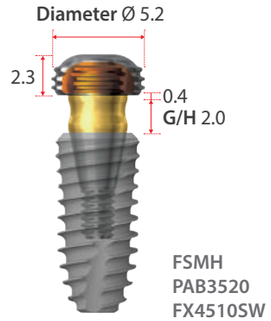
Positioner Attachment for Overdenture

Mini Ball and Socket Attachment for Overdenture

Magnetic Attachment for Overdenture

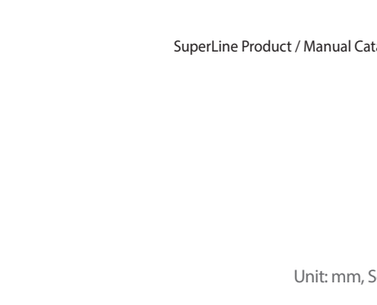
Positioner

Unit: mm, Scale 1.5 : 1



Positioner Abutment

Diameter	G/H	Art. No.
Ø 3.5	1.0	PAB 35 10
	2.0	PAB 35 20
	3.0	PAB 35 30
	4.0	PAB 35 40
	5.0	PAB 35 50
	6.0	PAB 35 60
	7.0	PAB 35 70



Positioner Impression Coping

Diameter	L	Art. No.
Ø 4.5	4.5	PIC

Positioner Analog

Diameter	L	Art. No.
Ø 3.5	12.4	PAN

※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the positioner abutment with fixture.

Positioner

Unit: mm, Scale 1.5 : 1

Positioner Socket Set

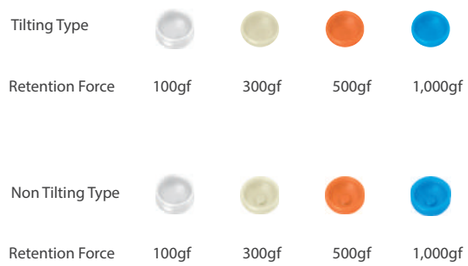
Type	Art. No.
Tilting type ±10°	FSMHS
Non Tilting type ±5°	FSMHSN

Positioner Metal Socket

Diameter	H	Art. No.
Ø 5.2	2.3	FSMH

Positioner Abutment

Type	Application		Art. No.
Tilting type ±10°	Blue	1,000gf	MSHP
	Orange	500gf	MSMP
	Ivory	300gf	MSLP
	White	100gf	MSOP
Non tilting type ±5°	Blue	1,000gf	MSHPN
	Orange	500gf	MSMPN
	Ivory	300gf	MSLPN
	White	100gf	MSOPN



Positioner Block Out Spacer

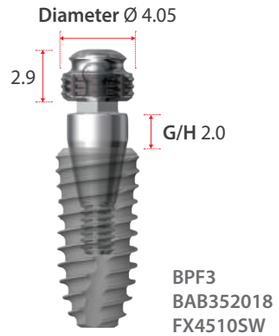
Diameter	H	Art. No.
Ø 6.5	0.5	FSMH

Positioner Core Tool

XPCT

Mini Ball Attachment

Unit: mm, Scale 1.5 : 1



Mini Ball Abutment

Diameter	G/H	Art. No.
Ø 3.3	0	BAB 35 00 18
Ø 3.5	1.0	BAB 35 10 18
Ø 3.5	2.0	BAB 35 20 18
Ø 3.5	3.0	BAB 35 30 18
Ø 3.5	4.0	BAB 35 40 18
Ø 3.5	5.0	BAB 35 50 18

Mini Ball Impression Coping

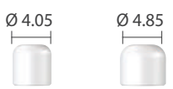
Diameter	L	Art. No.
Ø 4.0	5.0	GICA

Mini Ball Analog

Diameter	Art. No.
Ø 3.5	BANL

Socket Spacer

Diameter	Art. No.
Ø 4.05	GBIC 3 L
Ø 4.85	GBIC 2 L



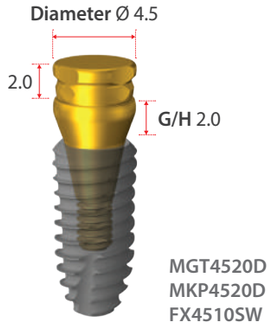
Female Socket

Diameter	Retention Force	Art. No.
Ø 4.05	300~500gf	BPF 3
Ø 4.85	500~700gf	BPF 2

※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the mini ball abutment with fixture.

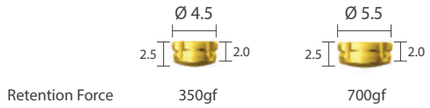
Magnetic Attachment_Dome Type

Unit: mm, Scale 1.5 : 1



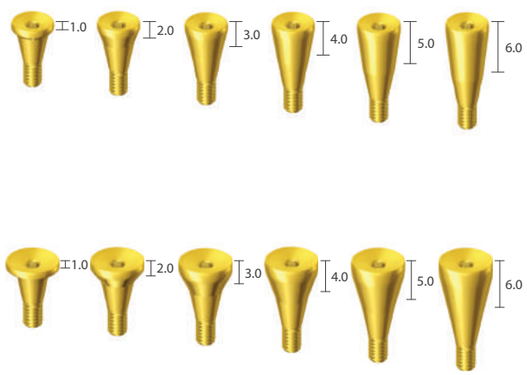
Magnetic Assay

Application	Diameter	H	Art. No.
MKP45D	Ø 4.5	2.0	MGT 45 20 D
MKP55D	Ø 5.5	2.0	MGT 55 20 D



Implant Keeper Diameter

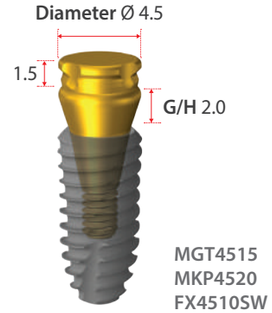
Diameter	G/H	Art. No.
Ø 4.5	1.0	MKP 45 10 D
	2.0	MKP 45 20 D
	3.0	MKP 45 30 D
	4.0	MKP 45 40 D
	5.0	MKP 45 50 D
	6.0	MKP 45 60 D
Ø 5.5	1.0	MKP 55 10 D
	2.0	MKP 55 20 D
	3.0	MKP 55 30 D
	4.0	MKP 55 40 D
	5.0	MKP 55 50 D
	6.0	MKP 55 60 D



※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the magnetic abutment with fixture.

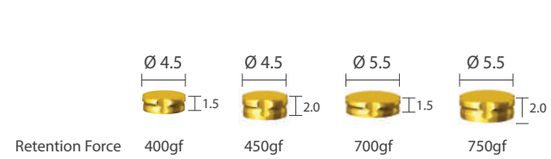
Magnetic Attachment_Flat Type

Unit: mm, Scale 1.5 : 1



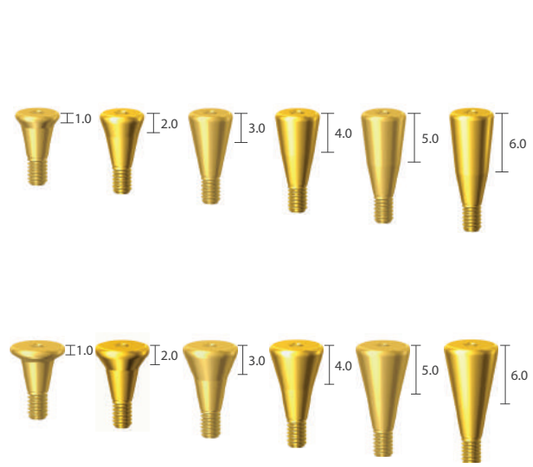
Magnetic Assay

Application	Diameter	H	Art. No.
MKP 45	Ø 4.5	1.5	MGT 45 15
	Ø 4.5	2.0	MGT 45 20
MKP 55	Ø 5.5	1.5	MGT 55 15
	Ø 5.5	2.0	MGT 55 20



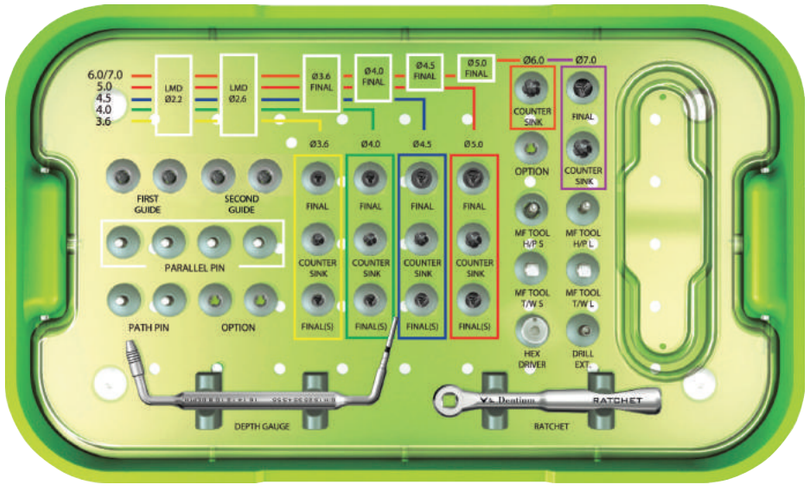
Implant Keeper Diameter

Diameter	G/H	Art. No.
Ø 4.5	1.0	MKP 45 10
	2.0	MKP 45 20
	3.0	MKP 45 30
	4.0	MKP 45 40
	5.0	MKP 45 50
	6.0	MKP 45 60
Ø 5.5	1.0	MKP 55 10
	2.0	MKP 55 20
	3.0	MKP 55 30
	4.0	MKP 55 40
	5.0	MKP 55 50
	6.0	MKP 55 60



※Note: It is recommended to keep the torque level at 25~30 N·cm to tighten the magnetic abutment with fixture.

Surgical Kit_Full



SuperLine Surgical Full Kit — UXNF

Kit Includes

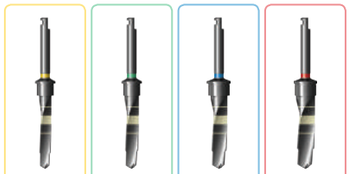
First Guide Drill

XLD2229 XLD2235 (Stopper)

Second Guide Drill

XLD2629 XLD2635 (Stopper)

Final Drill



XFD3435 XFD3835 XFD4335 XFD4835 XFD5831

Hand-piece Adapter

XFA27H XFA32H

Parallel Pin

XPP162220T

Countersink

XCS3629SW XCS4029SW XCS4529SW XCS5029SW XCS6029SW XCS7029SW

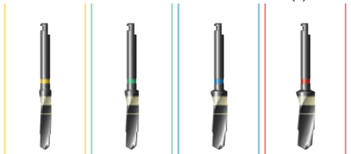
Ratchet Adapter

XFA26W XFA32W

MF Path Pin

XMFPA2

Final Drill(s)



XFD3429 XFD3829 XFD4329 XFD4829

Hex Driver

XHD26T

Drill Extension

XDE

Depth Gauge

XDGL

Ratchet

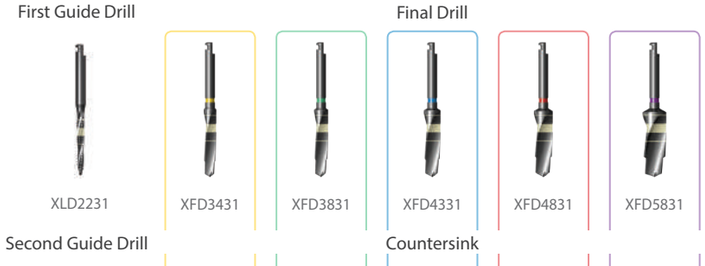
XRCA1

Surgical Kit_Standard

SuperLine Surgical Standard Kit — UXNS

Kit Includes

First Guide Drill



XLD2231 XFD3431 XFD3831 XFD4331 XFD4831 XFD5831

Second Guide Drill

XLD2631 XCS3629SW XCS4029SW XCS4529SW XCS5029SW XCS7029SW

Countersink

Ratchet

XRCA1

Parallel Pin

XPP162220T

MF Path Pin

XMFPA2

Hex Driver (Hand-piece)

XHD25H

XCS6029SW

Hand-piece Adapter

XFA30H

Hex Driver

XHD26T

Drill Extension

XDE

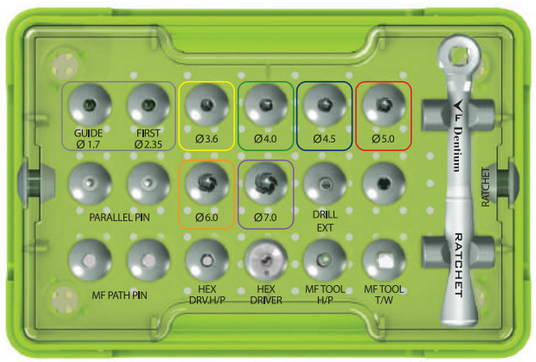
Ratchet Adapter

XFA26W

XPP162226T

XMFPA2

Surgical Kit_Short Implant



SuperLine Short Implant Surgical Kit XSIK

Kit Includes

First Guide Drill

XLD2207

Second Guide Drill

XLD2607

Final Drill

XFC3607

XFC4007

XFC4507

XFC5007

Parallel Pin

XPP162212

XFC6007

XFC7007

Ratchet

XRCA1

MF Path Pin

XMFPA2

Hex Driver

XHD25H

XHD26T

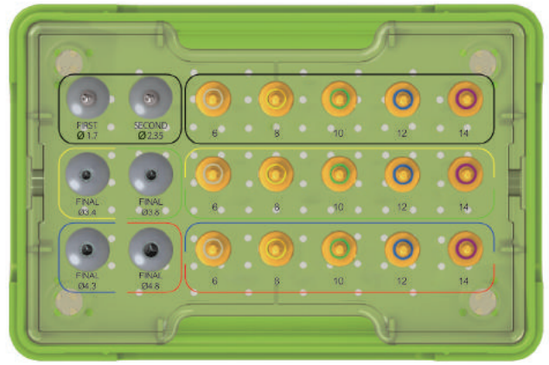
Hand-piece Adapter

XFA27H

Ratchet Adapter

XFA26W

Drill Stopper Kit



Drill Stopper Kit XDS

Kit Includes

Guide Drill Stopper

First

XLD2235

Second

XLD2635

Stopper - First Guide Drill, Second Guide Drill

XLDST06 XLDST08 XLDST10 XLDST12 XLDST14

Final Drill Stopper

34

XFD3435

38

XFD3835

Stopper - Final Drill / 34, 38

XFDST06 XFDST08 XFDST10 XFDST12 XFDST14

Final Drill Stopper

43

XFD4335

48

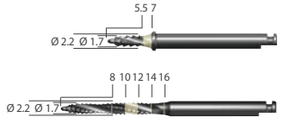
XFD4835

Stopper - Final Drill / 43, 48

XFDST06L XFDST08L XFDST10L XFDST12L XFDST14L

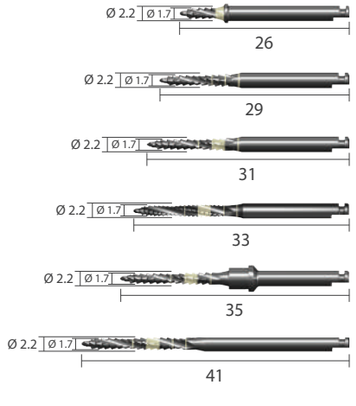
Surgical Instruments

Unit: mm, Scale 1 : 1

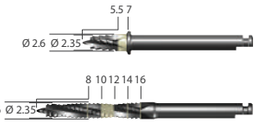


First Guide Drill

Diameter	L	Art. No.
Ø 2.2	26	XLD 22 07
	29	XLD 22 29
	31	XLD 22 31
	33	XLD 22 33
	35	XLD 22 35
	41	XLD 22 41

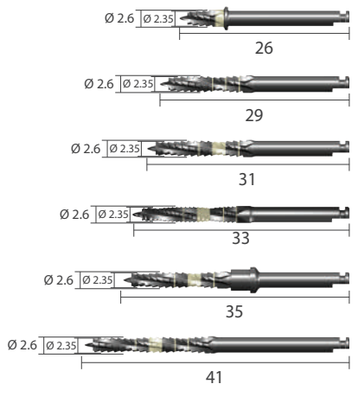


Stopper



Second Guide Drill

Diameter	L	Art. No.
Ø 2.6	26	XLD 26 07
	29	XLD 26 29
	31	XLD 26 31
	33	XLD 26 33
	35	XLD 26 35
	41	XLD 26 41

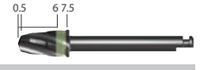


Stopper

※ Note: Drill speed 1,000rpm, 30~45 N·cm with irrigation

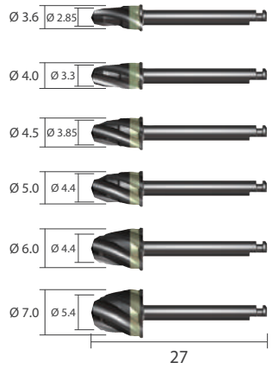
Surgical Instruments

Unit: mm, Scale 1 : 1



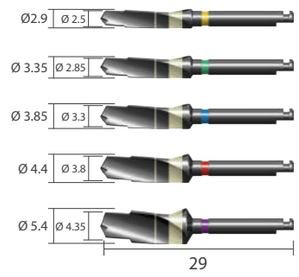
Final Drill I For Short Drill

Diameter	L	Art. No.
Ø 3.6	27	XFC 36 07
Ø 4.0		XFC 40 07
Ø 4.5		XFC 45 07
Ø 5.0		XFC 50 07
Ø 6.0		XFC 60 07
Ø 7.0		XFC 70 07



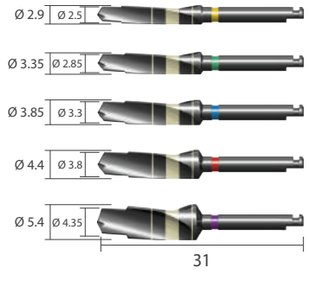
Final Drill

Diameter	L	Art. No.
Ø 2.9	**29**	XFD 34 29
Ø 3.35		XFD 38 29
Ø 3.85		XFD 43 29
Ø 4.4		XFD 48 29
Ø 5.4		XFD 58 29 SW



Final Drill

Diameter	L	Art. No.
Ø 2.9	**31**	XFD 34 31
Ø 3.35		XFD 38 31
Ø 3.85		XFD 43 31
Ø 4.4		XFD 48 31
Ø 5.4		XFD 58 31



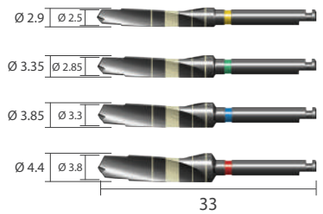
※ Note: Drill speed 1,000rpm, 30~45 N·cm with irrigation

Surgical Instruments

Unit: mm, Scale 1 : 1

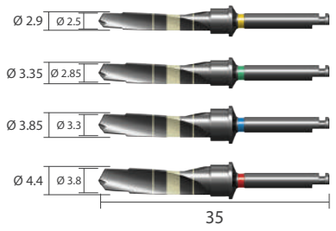
Final Drill

Diameter	L	Art. No.
Ø 2.9	33	XFD 34 33
Ø 3.35		XFD 38 33
Ø 3.85		XFD 43 33
Ø 4.4		XFD 48 33



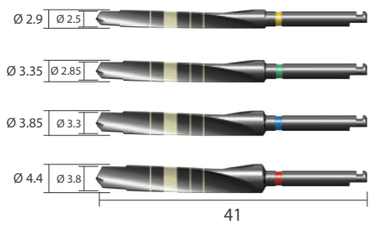
Final Drill I Stopper

Diameter	L	Art. No.
Ø 2.9	35	XFD 34 35
Ø 3.35		XFD 38 35
Ø 3.85		XFD 43 35
Ø 4.4		XFD 48 35



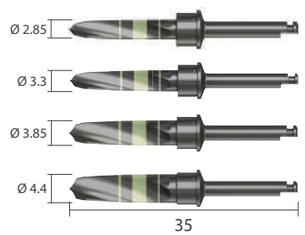
Final Drill

Diameter	L	Art. No.
Ø 2.9	41	XFD 34 41
Ø 3.35		XFD 38 41
Ø 3.85		XFD 43 41
Ø 4.4		XFD 48 41



Harvest Drill I Stopper

Diameter	L	Art. No.
Ø 2.85	35	XFH 34 35
Ø 3.3		XFH 38 35
Ø 3.85		XFH 43 35
Ø 4.4		XFH 48 35



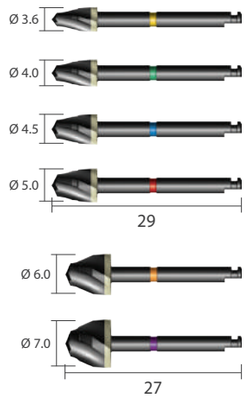
※Note: Drill speed 1,000rpm, 30~45 N·cm with irrigation

Surgical Instruments

Unit: mm, Scale 1 : 1

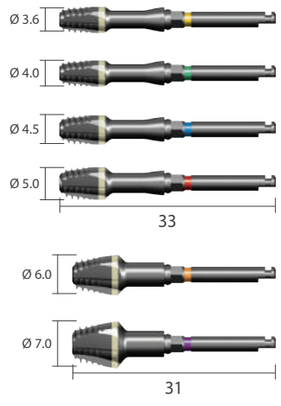
Countersink

Diameter	L	Art. No.
Ø 3.6	**29**	XCS 36 29 SW
Ø 4.0	**29**	XCS 40 29 SW
Ø 4.5	**29**	XCS 45 29 SW
Ø 5.0	**29**	XCS 50 29 SW
Ø 6.0	**27**	XCS 60 29 SW
Ø 7.0	**27**	XCS 70 29 SW



Condensing Drill

Diameter	L	Art. No.
Ø 3.6	**33**	XCD 36 33
Ø 4.0	**33**	XCD 40 33
Ø 4.5	**33**	XCD 45 33
Ø 5.0	**33**	XCD 50 33
Ø 6.0	**31**	XCD 60 31
Ø 7.0	**31**	XCD 70 31



Round Bur

Diameter	L	Art. No.
Ø 2.0	33	XRB 20 33
Ø 3.0		XRB 30 33

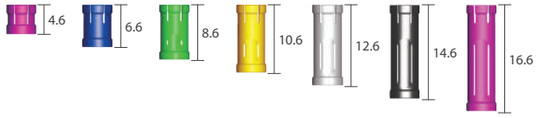
※Note: 1. Countersink Drill & Round Bur speed 1,000rpm, 30~45 N·cm with irrigation
2. Condensing Drill speed 20~60rpm, 30~45 N·cm with irrigation

Surgical Instruments

Unit: mm, Scale 1 : 1

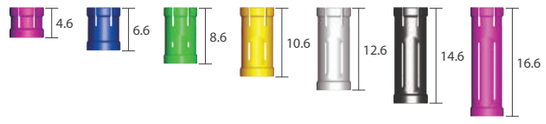
Stopper I For first guide drill, second guide drill

Diameter	Drilling Depth	L	Art. No.
Ø 4.45	14	4.6	XLDST 14
	12	6.6	XLDST 12
	10	8.6	XLDST 10
	08	10.6	XLDST 08
	06	12.6	XLDST 06
	04	14.6	XLDST 04
	02	16.6	XLDST 02



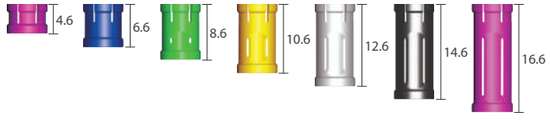
Stopper I For final drill 3435, 3835

Diameter	Drilling Depth	L	Art. No.
Ø 5.14	14	4.6	XFDST 14
	12	6.6	XFDST 12
	10	8.6	XFDST 10
	08	10.6	XFDST 08
	06	12.6	XFDST 06
	04	14.6	XFDST 04
	02	16.6	XFDST 02



Stopper I For final drill 4335, 4835

Diameter	Drilling Depth	L	Art. No.
Ø 5.14	14	4.6	XFDST 14 L
	12	6.6	XFDST 12 L
	10	8.6	XFDST 10 L
	08	10.6	XFDST 08 L
	06	12.6	XFDST 06 L
	04	14.6	XFDST 04 L
	02	16.6	XFDST 02 L

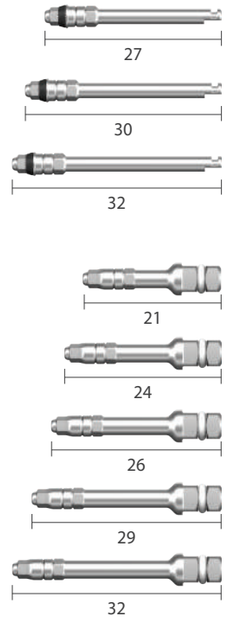


Surgical Instruments

Unit: mm, Scale 1 : 1

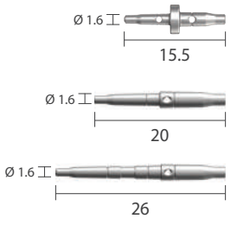
Adapter I Hex 2.5mm

Diameter	L	Art. No.
Hand-piece	**27**	XFA 27 H
	30	XFA 30 H
	32	XFA 32 H
Ratchet	**21**	XFA 21 W
	24	XFA 24 W
	26	XFA 26 W
	29	XFA 29 W
	32	XFA 32 W



Parallel Pin I For first guide drill, second guide drill

Diameter	L	Art. No.
Ø 1.6	**15.5**	XPP 162212
	20	XPP 162220 T
	26	XPP 162226 T



Path Pin

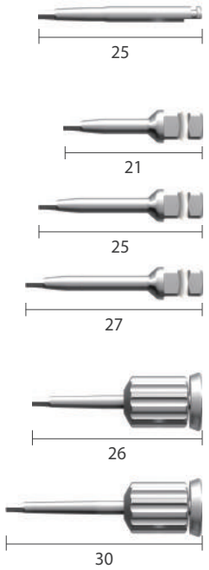
Diameter	L	Art. No.
Ø 1.6	18.6	XMFPA 2

Surgical Instruments

Unit: mm, Scale 1 : 1

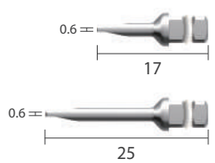
Hex Driver I Hex 1.28mm

Type	L	Art. No.
Hand-piece	25	XHD 25 H
Ratchet	21	XHD 21 W
	25	XHD 25 W
	27	XHD 27 W
Manual	26	XHD 26 T
	30	XHD 30 T



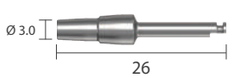
Slot Driver

Type	L	Art. No.
Ratchet	**17**	SDA 17 R
	25	SDA 25 R



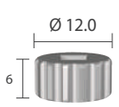
Drill Extension

Diameter	L	Art. No.
Ø 3.0	26	XDE



Driver

Type	Diameter	Art. No.
Manual	Ø 12.0	XHDHT

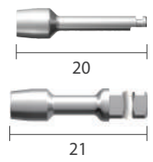


Surgical Instruments

Unit: mm, Scale 1 : 1

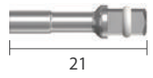
Screw & Ball Abutment Adapter

Type	L	Art. No.
Hand-piece	20	XMAA 1
Ratchet	21	XMA 21 W



Mini Ball Abutment Adapter

Type	L	Art. No.
Ratchet	21	IPST 21 W



Ratchet

Scale 0.7 : 1

XRCA 1

Torque Wrench

Scale 0.7 : 1

XNTW

Depth Gauge

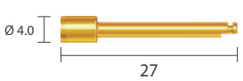
Scale 0.7 : 1

XDGL

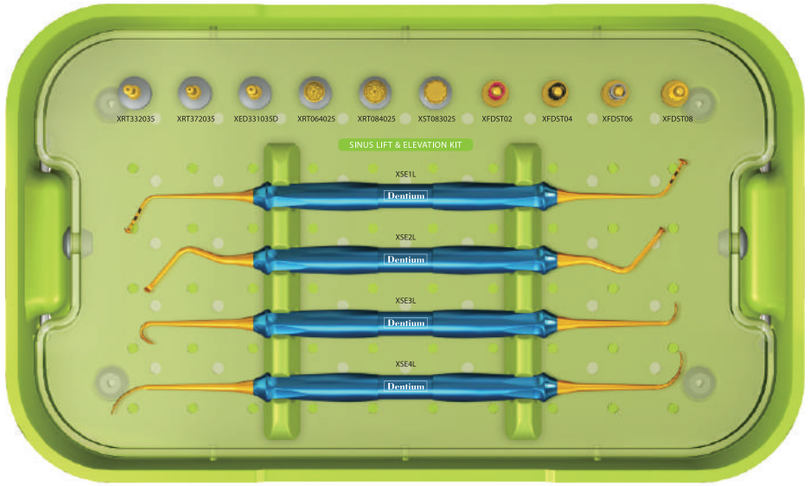
※Note: One side of Depth Gauge measures the osteotomy depth and the other side measures the gingival height from the top of the implant.

Tissue Punch

Diameter	L	Art. No.
Ø 4.0	27	XTS 40



DASK



Dentium Advanced Sinus Kit — DASK

Kit Includes

DASK Drill

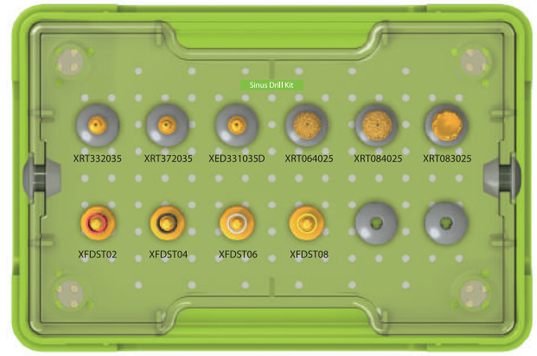
XRT332035 XRT372035 XED331035D XRT064025 XRT084025 XST083025

Stopper

XFDST 02 XFDST 04 XFDST 06 XFDST 08

Sinus Elevation Instrument

Sinus Bur Kit



Sinus Bur Kit — SDK

Kit Includes

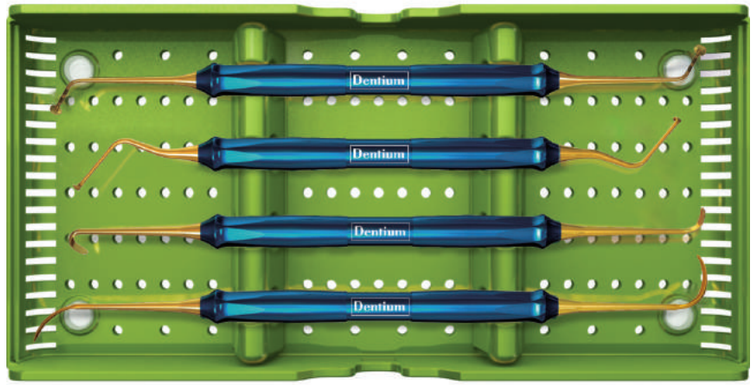
DASK Drill

XRT332035 XRT372035 XED331035D XRT064025 XRT084025 XST083025

Stopper

XFDST 02 XFDST 04 XFDST 06 XFDST 08

Sinus Kit



Sinus Bur Kit	XSKL
Kit Includes	

Sinus Elevation Instrument

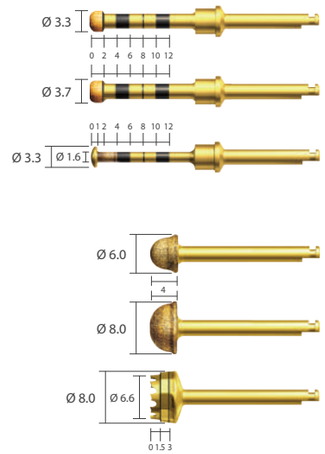
DASK / Sinus Bur Kit

Unit: mm, Scale 1 : 1

DASK Drill

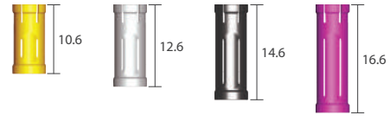
Type	DASK Drill #	Art. No.
Crestal Approach	DASK Drill #1	XRT 33 20 35
	DASK Drill #2	XRT 37 20 35
	DASK Drill #3	XED 33 10 35 D
Lateral Approach	DASK Drill #4	XRT 06 40 25
	DASK Drill #5	XRT 08 40 25
	DASK Drill #6	XST 08 30 25

※Note: Drill speed 800 to 1,200rpm, 30~45N·cm with irrigation



Stopper I For XRT332035, XRT372035, XED331035D

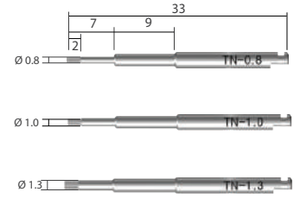
Diameter	Drilling Depth	L	Art. No.
Ø 5.14	**08**	10.6	XFDST 08
	06	12.6	XFDST 06
	04	14.6	XFDST 04
	02	16.6	XFDST 02



TN Brush

TN Brush

Diameter	Art. No.
Ø0.8	TN-0.8
Ø1.0	TN-1.0
Ø1.3	TN-1.3

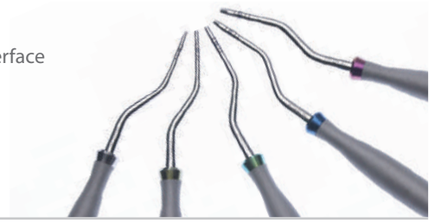


Osteotome Kit

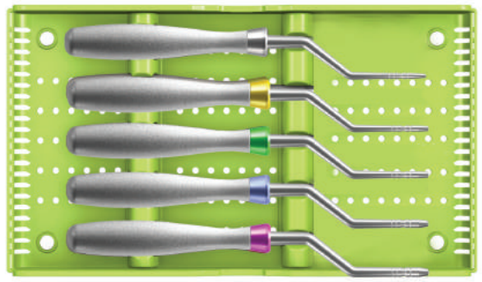
Unit: mm, Scale 1 : 1

Osteotome

Osteotome compresses the bone laterally, providing denser bony interface rather than removing valuable bone from the surgical site.



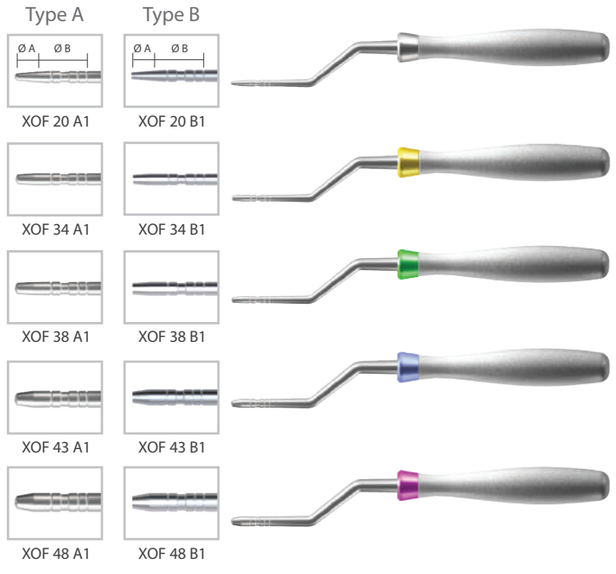
Osteotome Kit



	XOFK	XOFBK
	Type A (Convex)	Type B (Concave)
	XOF 20 A1	XOF 20 B1
	XOF 34 A1	XOF 34 B1
	XOF 38 A1	XOF 38 B1
	XOF 43 A1	XOF 43 B1
	XOF 48 A1	XOF 48 B1

Osteotome I Final drill type I Scale 0.4 :1

Type	Ø A	Ø B	Art. No.
 **Type A** (Convex)	Ø 1.7	Ø 2.8	XOF 20 A1
	Ø 2.3	Ø 2.8	XOF 34 A1
	Ø 2.7	Ø 3.2	XOF 38 A1
	Ø 2.8	Ø 3.8	XOF 43 A1
	Ø 3.0	Ø 4.3	XOF 48 A1
 **Type B** (Concave)	Ø 1.7	Ø 2.8	XOF 20 B1
	Ø 2.3	Ø 2.8	XOF 34 B1
	Ø 2.7	Ø 3.2	XOF 38 B1
	Ø 2.8	Ø 3.8	XOF 43 B1
	Ø 3.0	Ø 4.3	XOF 48 B1

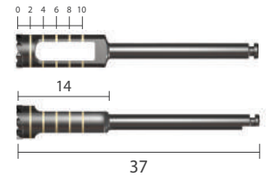


Trephine Kit

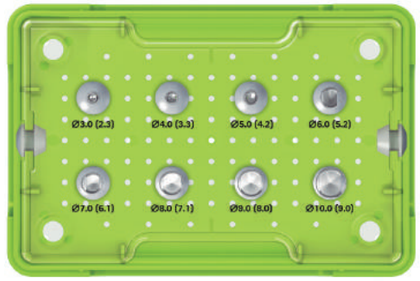
Unit: mm, Scale 1 : 1

Trephine Bur

- Excellent fine cutting
- Strong engagement when attaching the trephine to cortical bone
- Cut-outs facilitates ease of harvest retrieval
- 5 scale marks on the Trephine drill from 2mm to 10mm
- Easy harvesting



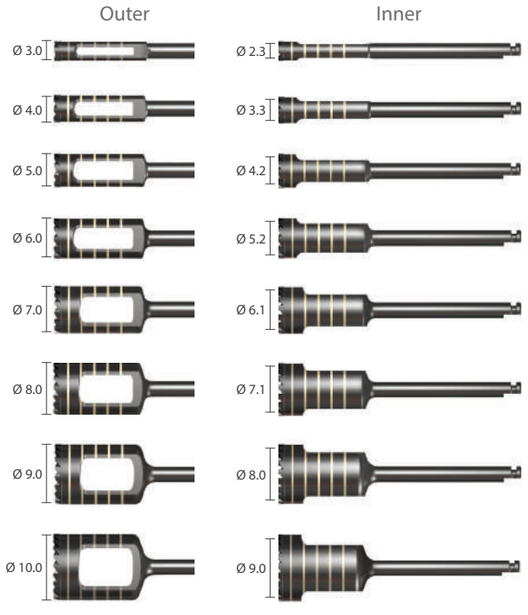
Trephine Kit



XIT			
Kit Includes			
XTP 24 03	XTP 34 04	XTP 44 05	XTP 54 06
XTP 64 07	XTP 74 08	XTP 84 09	XTP 94 10

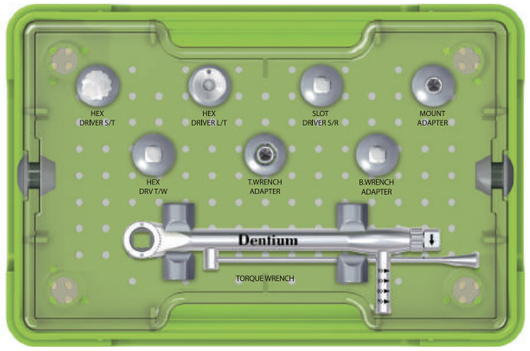
Trephine Bur

Outer Diameter	Inner Diameter	Art. No.
Ø 3.0	Ø 2.3	XTP 24 03
Ø 4.0	Ø 3.3	XTP 34 04
Ø 5.0	Ø 4.2	XTP 44 05
Ø 6.0	Ø 5.2	XTP 54 06
Ø 7.0	Ø 6.1	XTP 64 07
Ø 8.0	Ø 7.1	XTP 74 08
Ø 9.0	Ø 8.0	XTP 84 09
Ø 10.0	Ø 9.0	XTP 94 10



Prosthetic Kit

Unit: mm, Scale 1 : 1



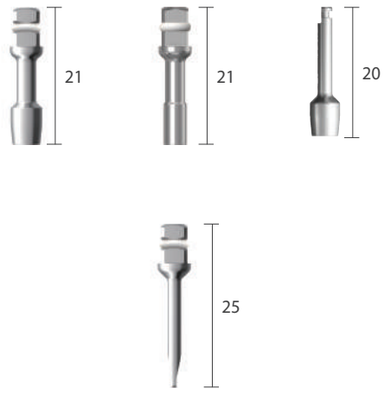
XIP

Hex Driver

Type	L	Art. No.
S/T	15	XHD 15
L/T	30	XHD 30 T
Torque Wrench	25	XHD 25 W

Adapter

Type	L	Art. No.
Torque Wrench	21	XMA 21 W
Mini Ball	21	IPST 21 W
Mount	20	XMAA 1



Slot Driver

SDA 25 R

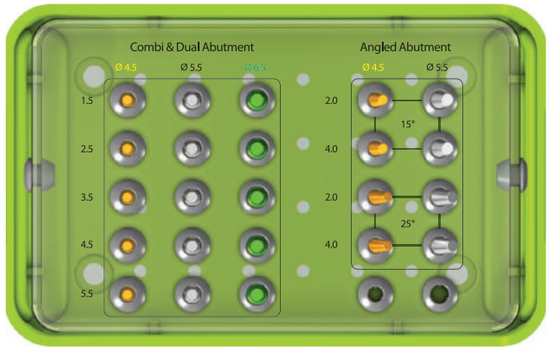
Torque Werench

Scale 0.7 : 1

XNTW

Planning Kit

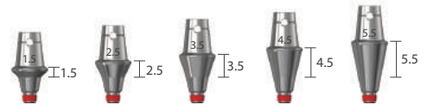
Unit: mm, Scale 1 : 1

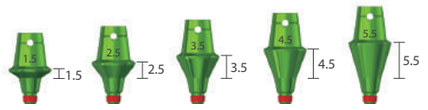


XPK

For Combi & Dual Abutment

Diameter	G/H	Art. No.
Ø 4.5	1.5	PDAB 45 15
	2.5	PDAB 45 25
	3.5	PDAB 45 35
	4.5	PDAB 45 45
	5.5	PDAB 45 55
Ø 5.5	1.5	PDAB 55 15
	2.5	PDAB 55 25
	3.5	PDAB 55 35
	4.5	PDAB 55 45
	5.5	PDAB 55 55
Ø 6.5	1.5	PDAB 65 15
	2.5	PDAB 65 25
	3.5	PDAB 65 35
	4.5	PDAB 65 45
	5.5	PDAB 65 55





For Angled Abutment

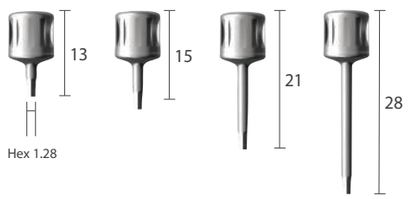
Angled	Diameter	G/H	Art. No.
15°	Ø 4.5	**2.0**	PAAB 15 45 20
		4.0	PAAB 15 45 40
	Ø 5.5	**2.0**	PAAB 15 55 20
		4.0	PAAB 15 55 40
25°	Ø 4.5	**2.0**	PAAB 25 45 20
		4.0	PAAB 25 45 40
	Ø 5.5	**2.0**	PAAB 25 55 20
		4.0	PAAB25 55 40

Prosthetic and Laboratory Instrument

Unit: mm, Scale 1 : 1

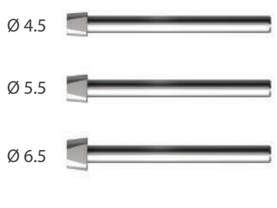
Hex Driver

Hex	L	Art. No.
1.28	**13**	XHD 13
	15	XHD 15
	21	XHD 21
	28	XHD 28



Reamer Guide

Application	Diameter	Art. No.
Combi / Dual Abutment	Ø 4.5	CRG 45 L
	Ø 5.5	CRG 55 L
	Ø 6.5	CRG 65 L



Application	Type	Art. No.
Screw Abutment	Bridge	SRG BL
	Single	SRG SL

Reamer Handle

Scale 0.5 : 1

CRH

Hand Wrench

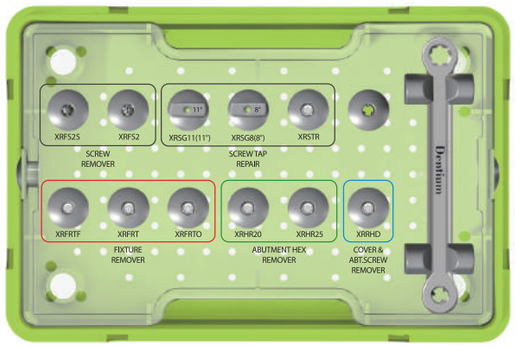
XHW

Reamer

Application	Art. No.
Combi / Dual Abutment	CRM
Screw Abutment	SRM

Help Kit

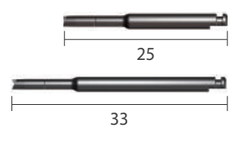
Unit: mm, Scale 1 : 1



XIH

Screw Remover

L	Art. No.
25	XRFS 2 S
33	XRFS 2

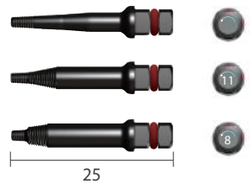


Screw Tap Repair

Type	Art. No.
Tap	XRSTR
11° Guide	XRSG 11
8 ° Guide	XRSG 8

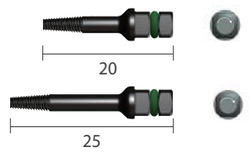
Fixture Remover

Type	Art. No.
-	XRFRT
11°	XRFARTF
8 °	XRFRTO



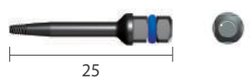
Abutment Hex Remover

L	Art. No.
20	XRHR 20
25	XRHR 25



Cover & Abutment Screw Remover

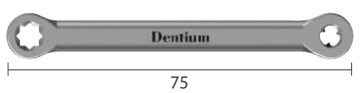
L	Art. No.
25	XRRHD



Wrench

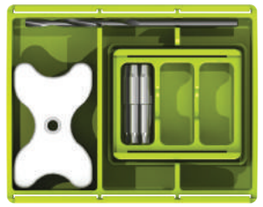
Scale 1 : 0.7

WRFRW



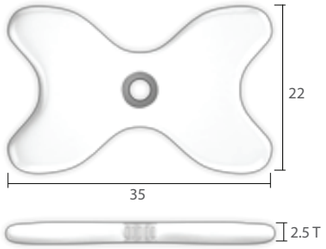
Polymer Guide Kit

Unit: mm, Scale 1 : 1



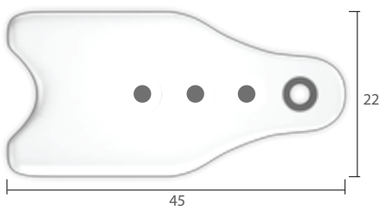
PGSSK

PGSCK



Single Standard (5ea)

T	Art. No.
2.5	XSG 34 **35** S



Cantilever Multi-Ready (5ea)

T	Art. No.
2.5	XSG 34 **45** C

· Stone Drill  XGD **23 60** (5ea)

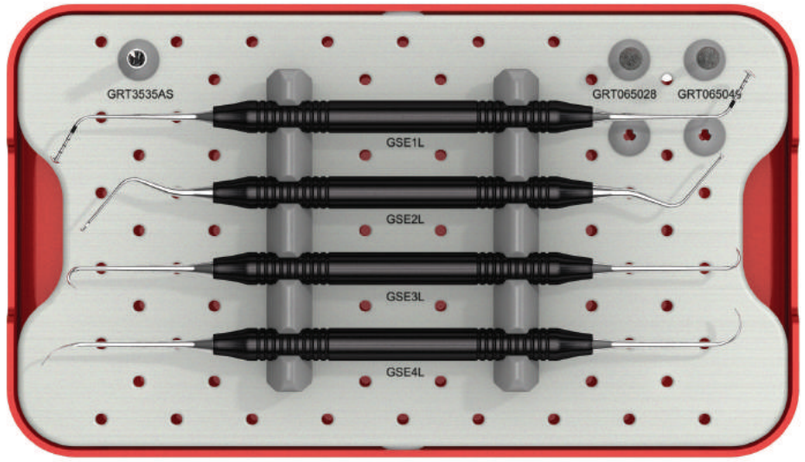
· Guide Pin  XGP **34 23 S** (5ea)

· Additional Metal Sleeve
(for Cantilever Multi-Ready)  XPGS **34 25 A** (5ea)

New Instrument Kit

Sinus Kit

Unit: mm, Scale 1 : 1



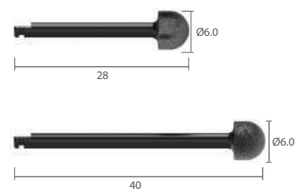
GSEK

Crestal Drill

Diameter	L	Art No.
Ø3.5	35	GRT 35 35 AS

Lateral Drill

Diameter	L	Art No.
Ø6.0	28	GRT 06 50 28
Ø6.0	40	GRT 06 50 40

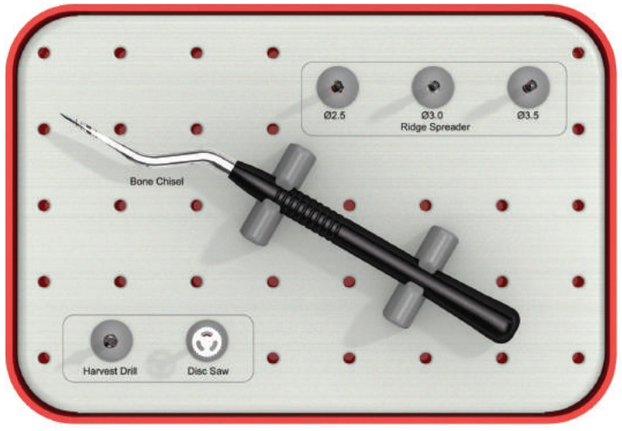


Sinus Curette Scale 1 : 2 / mm

New Instrument Kit

Ridge Expander Kit

Unit: mm, Scale 1 : 1



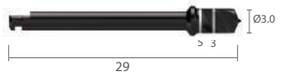
GREK

Ridge Spreader

Diameter	L	Art No.
Ø1.3 / Ø2.5	32	GRS 13 25
Ø1.8 / Ø3.0	32	GRS 18 30
Ø2.3 / Ø3.5	32	GRS 23 35

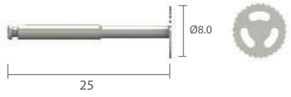
Harvest Drill

Diameter	L	Art No.
Ø3.0	29	GHD 30 29



Disc Saw

Diameter	L	Art No.
Ø8.0	25	GDS 80 25



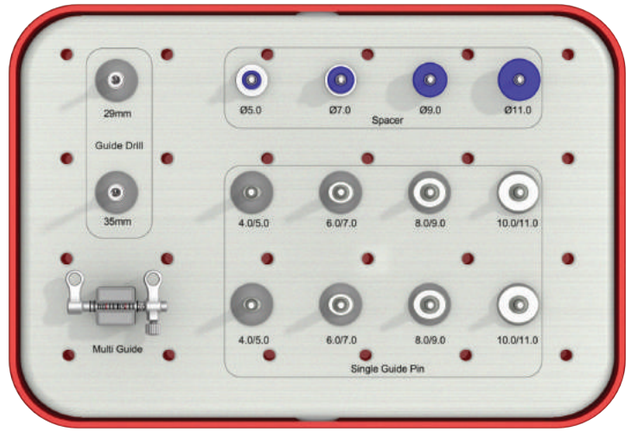
Bone Chisel

Art No.	GBC 18 45 13

New Instrument Kit

Implant Guide Kit

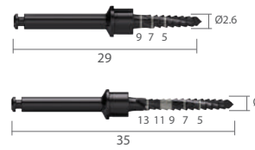
Unit: mm, Scale 1 : 1



GIGK

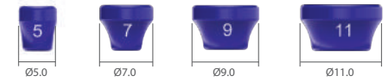
Guide Drill

Diameter	L	Art No.
Ø2.6	29	GGD 26 29
	35	GGD 26 35



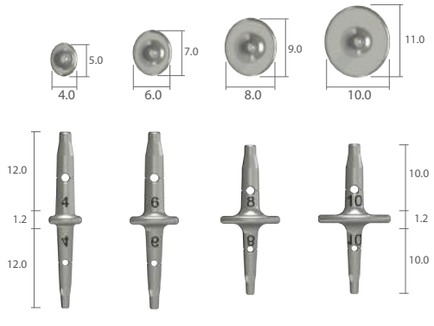
Spacer

Width	Art No.
5.0	GSP 05
7.0	GSP 07
9.0	GSP 09
11.0	GSP 11



Single Guide Pin

Width	Art No.
4.0 / 5.0	GGP 04 05
6.0 / 7.0	GGP 06 07
8.0 / 9.0	GGP 08 09
10.0 / 11.0	GGP 10 11



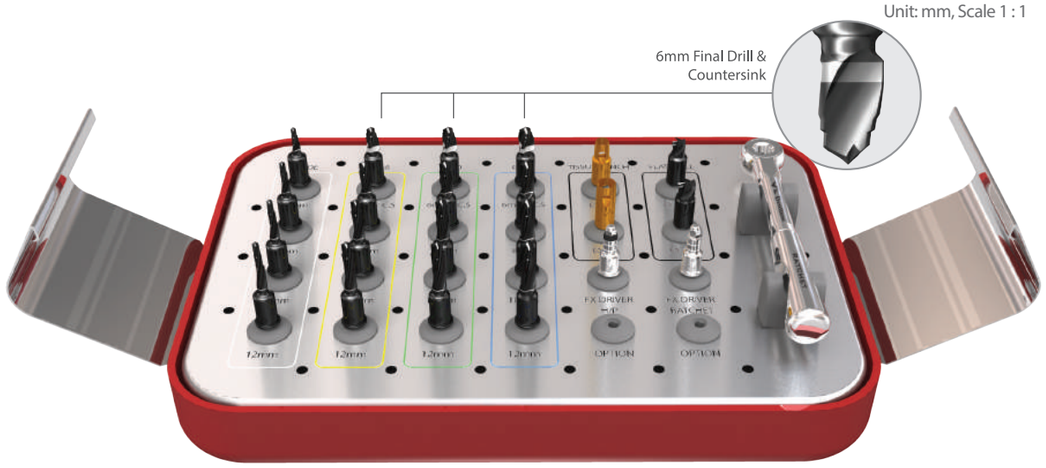
Multi Guide

Art No.	GMG2

New Instrument Kit

Digital Full Kit

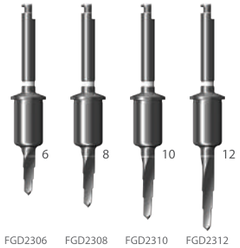
Unit: mm, Scale 1 : 1



XGSFK

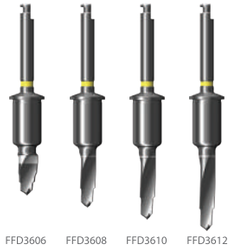
SuperLine FX4510SW Guided drilling Sequence

Guide Drill



FGD2306 FGD2308 FGD2310 FGD2312

FX 36 Final Drill



FFD3606 FFD3608 FFD3610 FFD3612

FX 40 Final Drill

FFD4006 FFD4008 FFD4010 FFD4012

FX 45 Final Drill

FFD4506 FFD4508 FFD4510 FFD4512

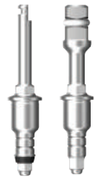
Tissue Punch

FTP35 FTP45

Flat Drill

FFL35 FFL45

Fixture Adapter



FFA28H FFA28W

Ti-Sleeve

FMS49

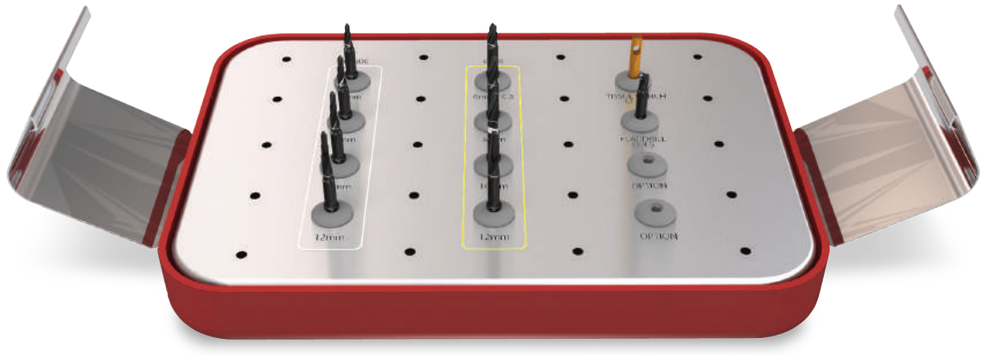
Ratchet

XRCA1

New Instrument Kit

Digital Simple Kit

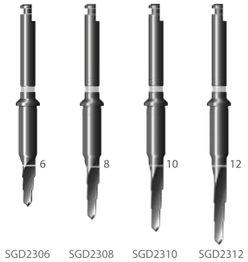
Unit: mm, Scale 1 : 1



XGSSK

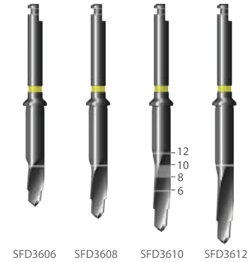
SuperLine FX3610SW Guide drilling Sequence

Guide Drill



SGD2306 SGD2308 SGD2310 SGD2312

FX 36 Final Drill



SFD3606 SFD3608 SFD3610 SFD3612

Tissue Punch

STP25

Flat Drill

SFL25

Ti-Sleeve

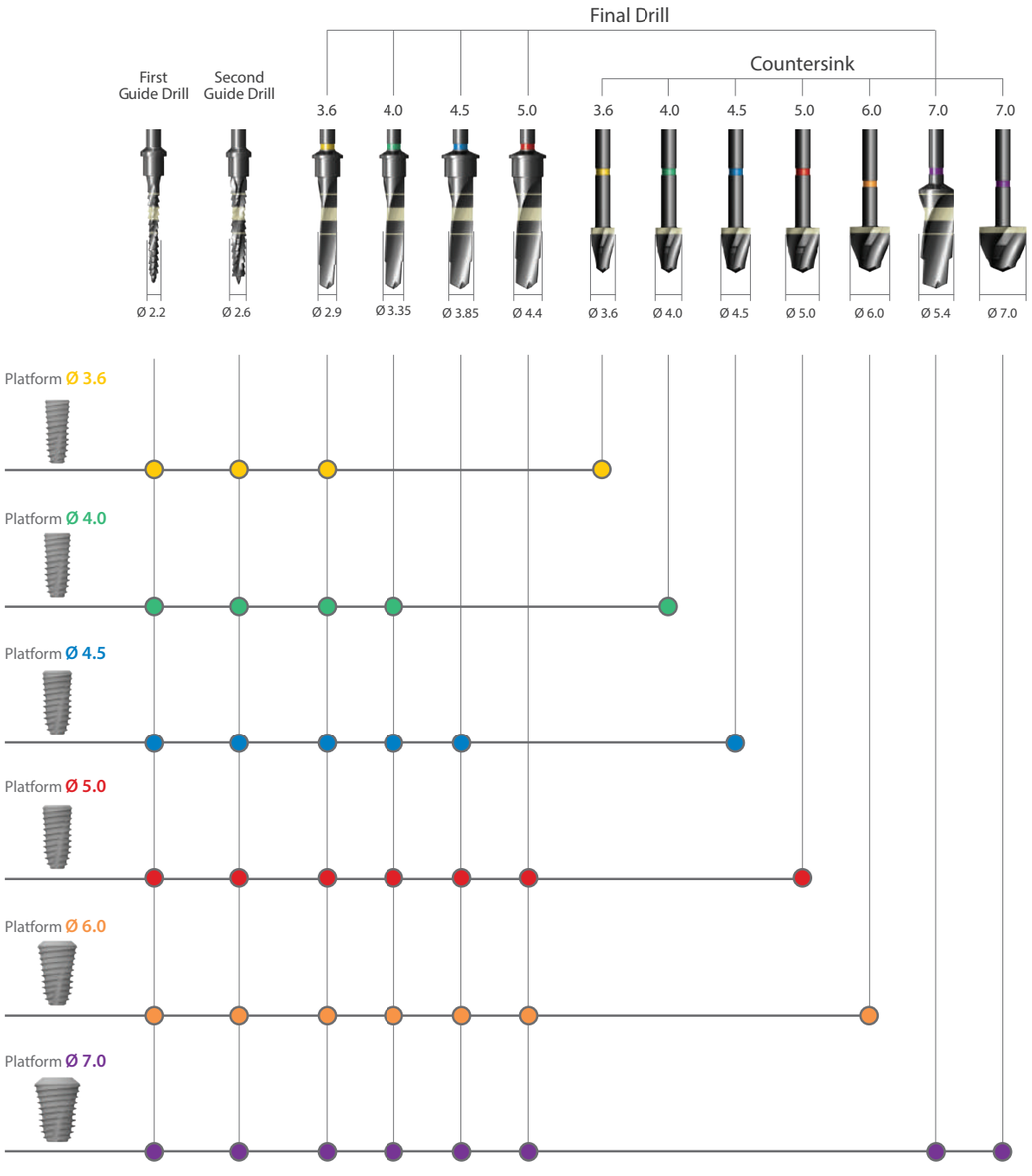
SMS30

Contents

SURGICAL MANUAL	Surgical Drill Sequence I	67
	Surgical Drill Sequence II	69
	Drilling Depth Guide	71
	Fixture Connection	73
	Installation Procedure & Warnings	74
	Surgical Kit Maintenance	75
PROSTHESIS MANUAL	Understanding the Implant and Prosthesis	77
	Types of Abutment	78
	Dual Abutment	79
	Combi Abutment	80
	Custom / Milling Abutment	81
	Angled Abutment	82
	Direct-Casting / Metal-Casting Abutment	83
	Temporary Abutment	84
	Screw Abutment	85
	Points to Consider in Abutment Selection	86
	Minimum Height Requirement for SuperLine Prosthetic Abutment	87
	Prosthetic Procedure 1	88
	Abutment Level - Dual Abutment	89
	Abutment Level - Combi Abutment	92
	Proshtetic Procedure 2	94
	Fixture Level - [Pick-up Type] _Dual Abutment	95
	Fixture Level - [Transfer Type]_Dual Abutment	98
	Fixture Level - [Transfer Type]_Milling Abutment	101
	Fixture Level - [Pick-up Type]_Angled Abutment	103
	Fixture Level - Direct-Casting Abutment	105
	Fixture Level - Metal-Casting Abutment	106
	Fixture Level - [Pick up Type]_Temporary Abutment	107
	Proshtetic Procedure 3	108
	Abutment Level - [Transfer Type]_Screw Abutment	109
	Cementation Repair Method (SCRP)	112
	Proshtetic Procedure 4	114
	Positioner	115
	Mini Ball Attachment	118
	Magnetic Attachment	119

Surgical Drill Sequence I

Drilling Sequence Guide (Final Drill)

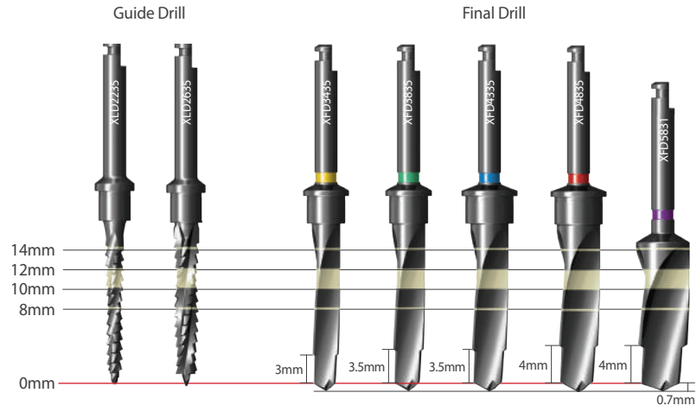


During Fixture Insertion, 70N·cm Torque at 50rpm is Recommended

· Countersink drill is used in cases with dense cortical bone.

· If the bone density is D1~D2, it is recommended to countersink after final drill.

· The actual diameter of the Countersink drill is 0.1mm larger than the fixture platform.



Determination of Fixture Top Level

Top level of fixture needs to be located 0.5mm below the marginal crestal bone level to minimize bone loss after implantation.

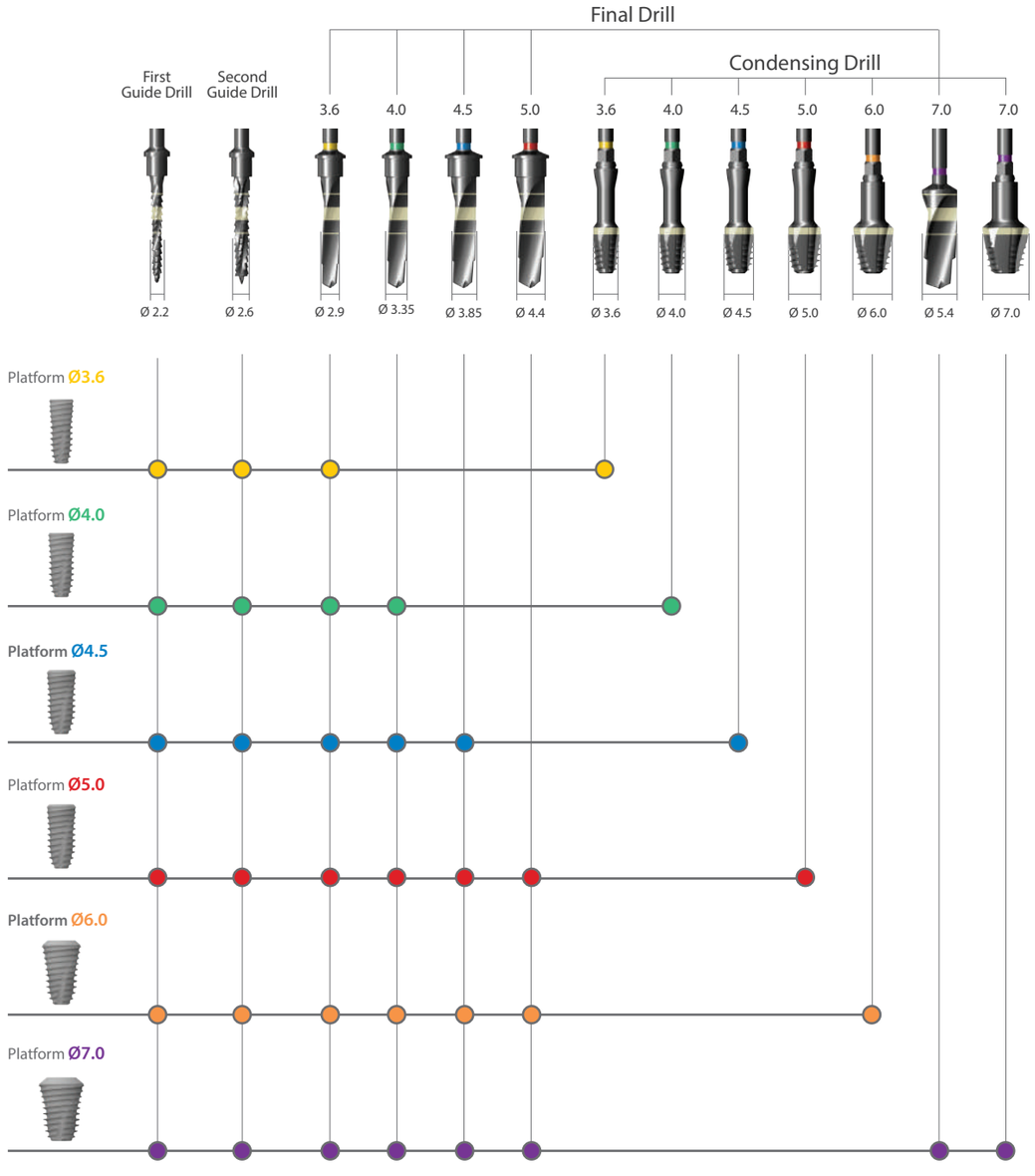
Depth Indication

· Use the depth gauge after first drill / First guide drill to check depth of drilling.

· Place the depth gauge against the wall of the osteotomy.

Surgical Drill Sequence II

Drilling Sequence Guide (Condensing Drill)

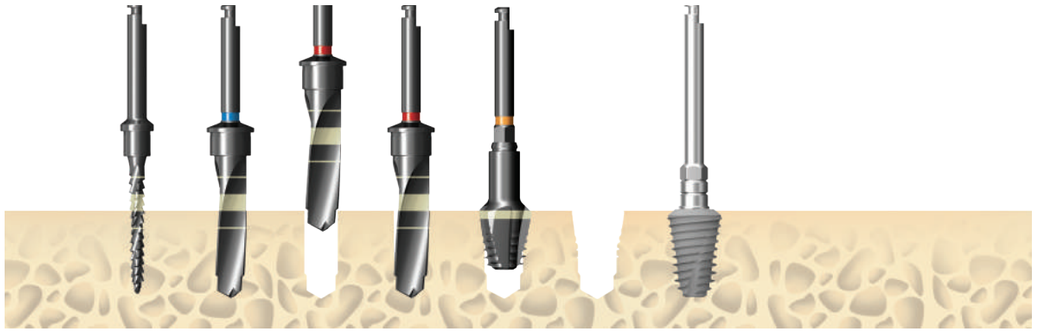


Condensing Drill

· Condensing Drill speed 20~60rpm, 30~45 N·cm with irrigation
· If the bone density is D1~D2, it is recommended to Condensing drill after final drill.
· The actual diameter of the Condensing drill is 0.1mm larger than the fixture platform.

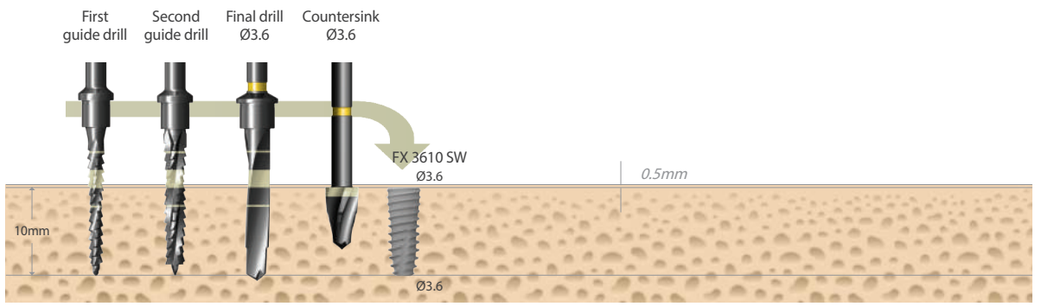
Early loading with precise tap drill

· Tap drills for exquisite surgery to enable early loading.
· Smooth and precise surgery with tap drill in type 1~2 bone
· 4mm of tapping depth for optimum torque control.

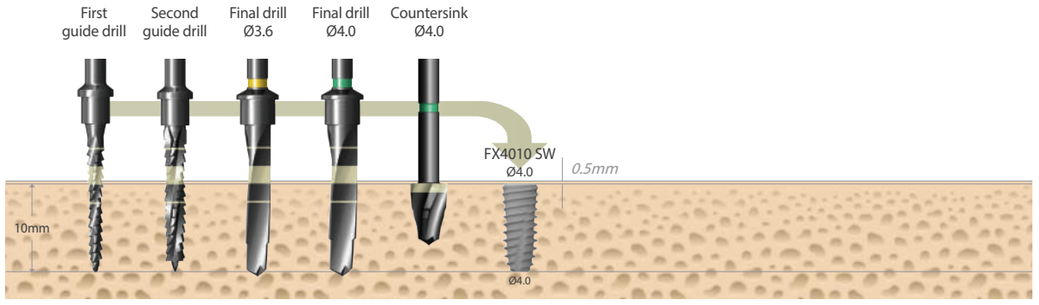


Drilling Depth Guide

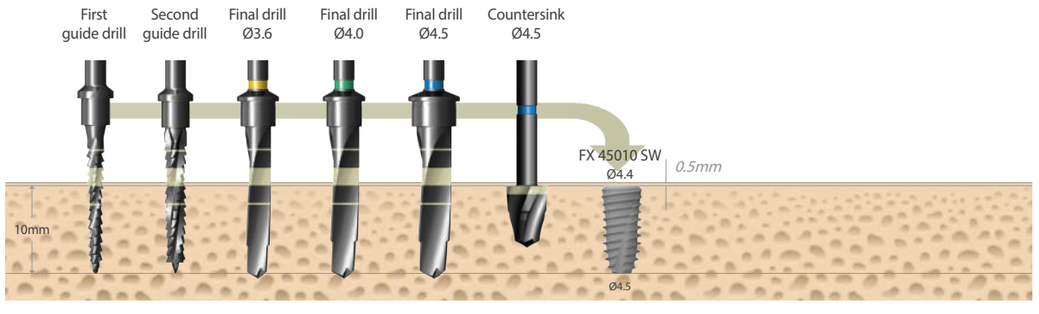
Platform: Ø3.6 / Body: Ø3.6 (1000rpm / 30~45N·cm)



Platform: Ø4.0 / Body: Ø4.0 (1000rpm / 30~45N·cm)

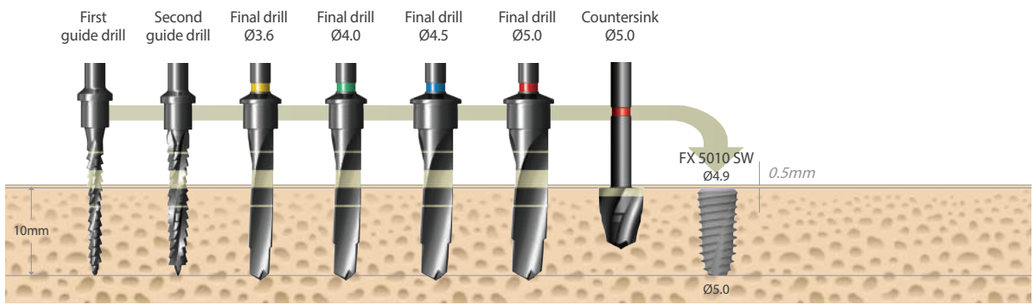


Platform: Ø4.4 / Body: Ø4.5 (1000rpm / 30~45N·cm)

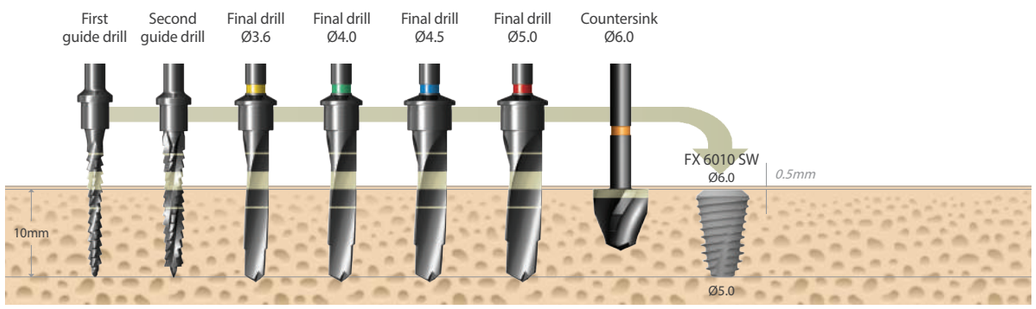


Drilling Depth Guide

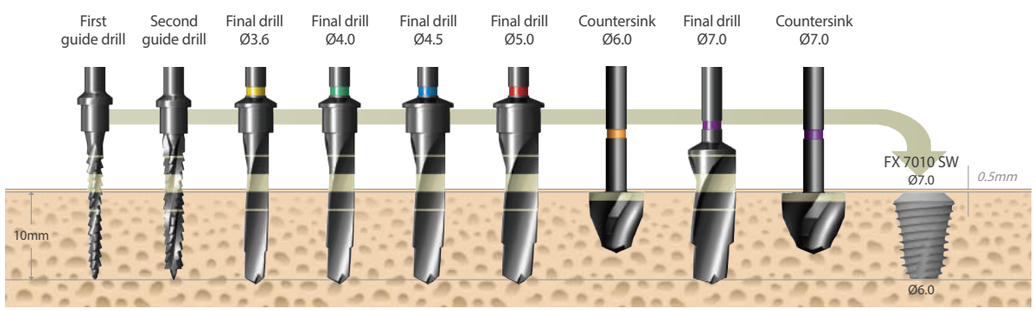
Platform: Ø4.9 / Body: Ø5.0 (1000rpm / 30~45N·cm)



Platform: Ø6.0 / Body: Ø5.0 (1000rpm / 30~45N·cm)

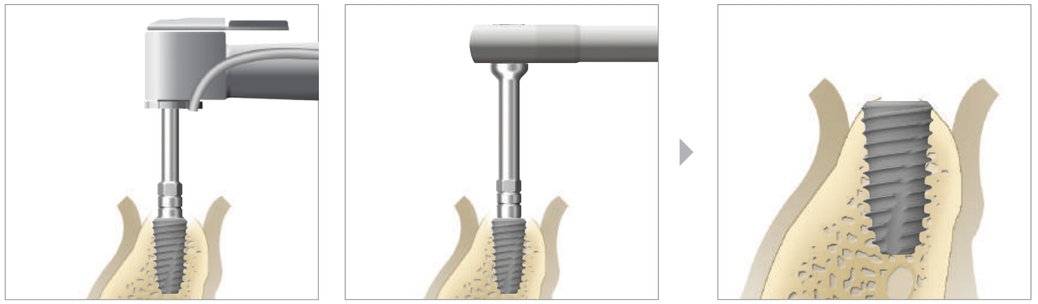


Platform: Ø7.0 / Body: Ø7.0 (1000rpm / 30~45N·cm)



Fixture Connection

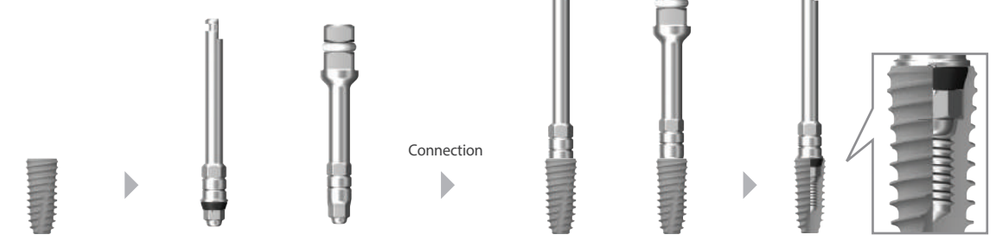
Caution_ When opening the fixture pack, hold the fixture container upward and engage the adapter into the fixture.



By hand-piece
20rpm / 35 N·cm

By ratchet

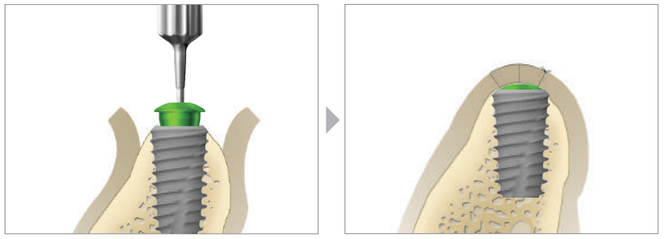
Directions Using the Hand-piece / Ratchet Adapter



The Hand-piece Adapter/Ratchet Adapter must be connected firmly together with the internal hex inside the fixture

Installation Procedure & Warnings

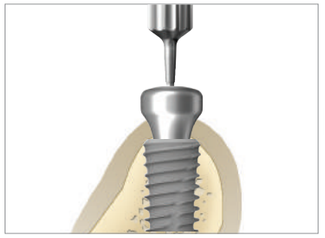
Cover Screw



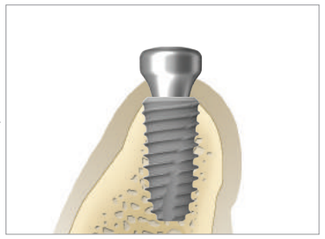
By Hex Driver

Cover Screw(CS36) connection

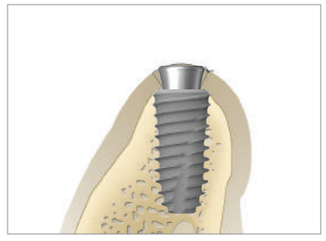
Healing Abutment



By Hex Driver



Healing Abutment connection



Healing Abutment (HAB402020L) connection in thin gingiva

Warnings

Dental Implant surgery and restoration involve complex dental procedures. Appropriate and adequate training in proper technique is strongly recommended prior to use.

- Improper medical examination and/or treatment plan can result in implant failure and/or loss of supportive bone.
- Improper initial stability and/or excessive occlusal forces during healing period may lead to osseointergration failure.
- Excessive insertion torque may lead to mechanical failure or implant biologic failure due to bone compression and necrosis.
- When forces or loads are greater than its design, implant or abutment fracture could happen. Therefore clinicians should make careful decisions with regards to clinical treatment planning to minimize the risk of fracture. Appropriate implant quantity, occlusal interface and a nightguard are essential. Potential excessive loading conditions may include the following:

01 Inadequate number of implants are placed.
02 Implant width and/or length are inappropriate for a treatment site.
03 Prosthesis which has excessive cantilever length due to inadequate biomechanical design
04 Continuous occlusal force are generated by incomplete connection between implant and abutment and/or abutment screw loosening.
05 Direct Casting Abutment angles are greater than 30° from the vertical axis of the implant. Direct Abutments are not for angulation.
06 Occlusal interferences causing excessive lateral forces
07 Patient parafunctions such as bruxism
08 Inadequate dental laboratory casting procedures
09 Improper prosthesis fit
10 Trauma from patient habits or accidents
11 Excessive marginal bone loss caused by inadequate bone width and/or advanced periimplantitis

Surgical Kit Maintenance

Manual Cleaning and Sterilization Procedure

It is important to use protective clothing and face shield while cleaning contaminated instruments. Always wear protective glasses, mask, gloves, etc. for your safety.

Cleaning

1 Rinse instruments immediately after use under running tap water (<40°C) for a minimum of one (1) minute to remove all debris including extraneous body fluids, bone debris and tissue.

2 Soak all instruments immediately after rinsing in an enzymatic cleaning solution* for 10 to 20 minutes (Do not soak overnight).

* Follow manufacturer's instructions and observe recommended cleaning solution concentrations (enzymatic detergent with a pH level between 7-10 and temperature not to exceed 40°C). Do not use incompatible cleaning solutions to clean instruments.

3 For internal irrigation drills, use a 1mL syringe and a 25 gauge needle to clean the drill irrigation hole with a minimum of 0.2 mL of the prepared cleaning solution. Repeat this step two (2) more times for a total of three (3) rinses.

4 Scrub with a soft brush for a minimum of 1 (one) minute to remove any debris inside the drill irrigation hole.

5 Rinse the instruments under running tap water (<40°C) for a minimum of 1 minute. Use a 1mL syringe and a 25 gauge needle with a minimum of 0.2 mL of tap water to forcefully flush inside the drill irrigation hole. Repeat flushing of drill irrigation hole two (2) more times for a total of three (3) flushings.

6 Place instruments into an ultrasonic cleaner with neutral detergent**. Keep instruments inside the ultrasonic bath for 15 minutes using a frequency of 25-50 kHz. Ensure multiple instruments placed within the bath remain separated.

** Follow manufacturer's instructions and observe recommended neutral detergent solution concentrations (neutral detergent with a pH level between 7-10 and temperature not to exceed 40°C). Do not use incompatible neutral detergent solutions to clean instruments.

7 Rinse instruments thoroughly with running tap water (<40°C) for a minimum of 1 (one) minute until all traces of neutral detergent solution are removed. Rinse inside drill irrigation hole using a 1mL syringe and a 25 gauge needle with a minimum of 0.2 mL of tap water. Repeat rinsing drill irrigation hole two (2) more times for a total of three (3) rinses.

8 Gently wipe instruments with a soft lint-free cloth or place the instruments in a drying cabinet (60°C for less than 10 hours) until fully dry. Blow residual water from drill irrigation hole using a 1mL syringe and a 25 gauge needle. Visually inspect instruments in a well-lit area to ensure they are clean, dry and free of residue.

9 Clean instrument trays with a germicidal cleaner prior to returning instruments into Kit.

10 Always check for damage or corrosion after rinsing and drying.

Sterilization

Dentium recommends either the Pre-vacuum or Gravity autoclave methods for sterilization under the conditions described below. However, autoclave performance can affect the efficacy of this process. Healthcare facilities should validate their sterilization processes employing the actual equipment and operators that routinely sterilize instruments.

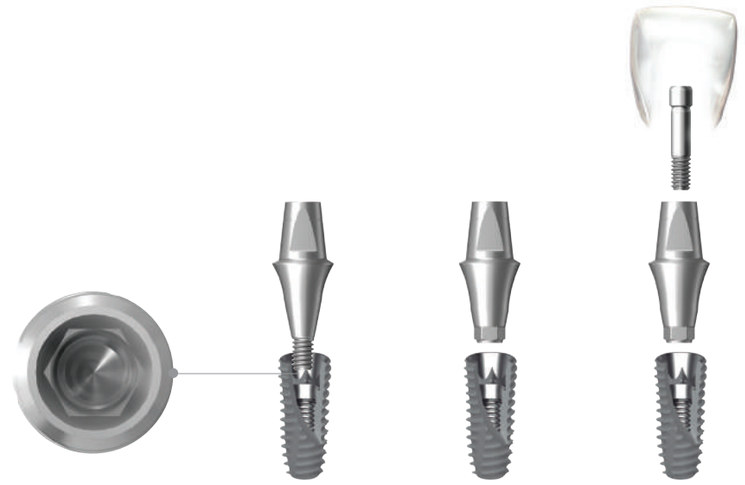
All autoclaves/sterilizers should be regularly validated, maintained and checked in accordance with EN 285/EN 13060, EN ISO 17665, ANSI AAMI ST79 to ensure compliance with these and related standards. Make sure packaging is suitable for steam sterilization.

Recommended Sterilization Parameters

Method-Moist Heat Sterilization	Pre-vacuum	Gravity
Set Point Temperature	132 ℃	132 ℃
Exposure time	4 minutes	30 minutes
Drying time	20 minutes	40 minutes

PROSTHESIS MANUAL

Understanding the Implant and Prosthesis



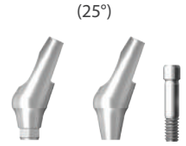
Biological Connection

- The tapered conical hex connection between implant and abutment interface provides hermetic sealing.
- The biological connection distributes the load to the fixture evenly. Therefore it may minimize bone loss.
- All implant diameters share the same internal connection. One abutment screw fits all abutments and fixtures.

Types of Abutment (Abutments are available in various diameters & gingival heights)

· Dual Abutment · Combi Abutment	Abutment level
· Dual Abutment · Dual Milling Abutment · Angled Abutment (15°/25°) · Direct-Casting Abutment · Metal-Casting Abutment · Temporary Abutment (Plastic & Titanium)	Fixture level
· Screw Abutment · Angled Screw Abutment (15°/ 30°)	Screw retained (Abutment level)
· Positioner Attachment · Ball Attachment · Magnetic Attachment	For denture use

Types of Abutment

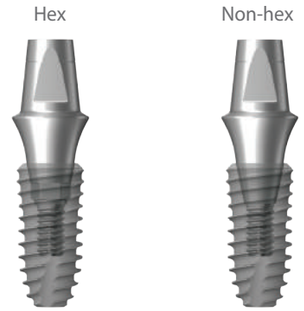
One-Piece	Two-Pieces	
 Combi Abutment	 Hex Non-hex Dual Abutment	 Hex Non-hex Milling Abutment
 Screw Abutment	(15°)  Hex Non-hex Angled Abutment	 Custom Abutment
(20°)  Hex Non-hex Angled Screw Abutment	(25°)  Hex Non-hex Angled Abutment	 Hex Non-hex Direct-Casting Abutment
 Cylinder	 Hex Non-hex Metal-Casting Abutment	Titanium Plastic  Hex Non-hex Hex Non-hex Temporary Abutment
Abutment Level	Fixture Level	

· Straight abutments are Dual and Combi Abutment.

· Depending on the insertion angle and position of the fixture, the Angled or Direct / Metal - Casting Abutment may be used.

· The Screw Abutment can be used when prosthesis retrieval is anticipated.

Dual Abutment



Dual Abutment

· It is possible to take an impression at both fixture level and abutment level.
(A Dual Abutment may be interchanged with a Combi Abutment)

· For abutment level impressions, the same prosthetic procedures apply to both Dual and Combi Abutments.

· For fixture level impressions, the abutment selection takes place on the master model.

· For fixture level impressions, a precise positioning jig for abutment may be required.

· Either hex or non-hex abutments may be used, according to operator's preference.

* If a cement retained restoration requires retrieval, cutting a hole in the occlusal surface would allow access to the screw to permit removal.

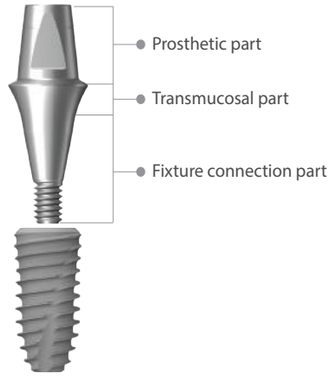
Hex / Non-hex

	Hex	Non-hex
Positioning Jig	Unnecessary	Required
Radiograph	Unnecessary	Unnecessary

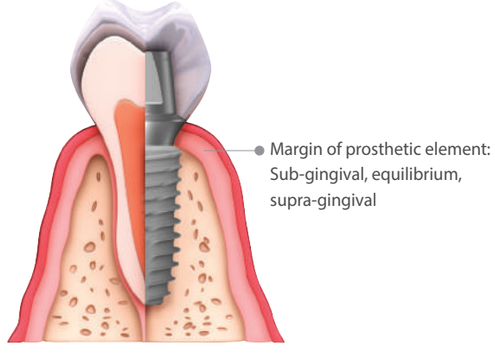
Dual Abutment Line Up (Hex / Non-hex)

Diameter	G/H	Vertical Angle
Ø4.5	1.0mm, 1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	5°
Ø5.5	1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	6°
Ø6.5	1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	7°

Combi Abutment



Combi Abutment



· The Combi Abutment is used when the implant position is optimal.

· If the abutment selection is made in the mouth, gauge the thickness of mucosa with the depth gauge to measure the gingival height thus allowing the appropriate abutment height.

· The Impression is taken with the snap cap.

· When using the Combi Abutment, it remains in the mouth after the impression is taken. (Do not remove or change its position)

· Tighten abutment screw to 25 - 35 N·cm. (retighten again before seating final prosthesis).

* If the Combi Abutment is too long it can be adjusted 1.5mm to the bottom of the laser mark on the vertical stack of the abutment. The Combi Abutment has a short analog for the 1.5mm adjustment.

* A resin jig can be made to record the reduction if reduced more the 1.5mm.

Combi Abutment Line Up

Diameter	G/H	Vertical Angle
Ø4.5	1.0mm, 1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	5°
Ø5.5	1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	6°
Ø6.5	1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm	7°

Custom / Milling Abutment

Custom Abutment

Milling Abutment

Custom Abutment

· Impression is taken at fixture level.

· When using a non-hex abutment a precise seating jig should be used.

Diameter	G/H	Type
Ø4.5	0.5mm, 1.5mm	Hex / Non-hex
Ø5.5	1.0mm, 2.0mm	

Milling Abutment

· Impression is taken at fixture level.

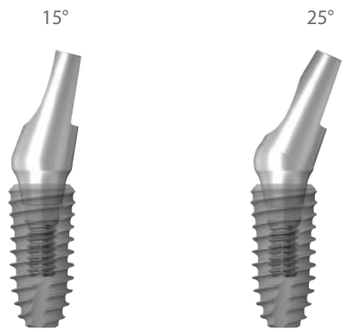
· When using a non-hex abutment a precise seating jig should be used.

· Either hex or non-hex abutments may be used, according to operators preference.

* If a cement retained restoration requires retrieval, cutting a hole in the occlusal surface would allow access to the screw for removal.

Diameter	G/H	Type
Ø4.0	1.0mm	Hex / Non-hex
Ø4.5	1.5mm	
Ø5.5	1.5mm, 2.5mm	
Ø6.5	1.5mm, 2.5mm, 3.5mm	
Ø7.5	2.5mm, 3.5mm	

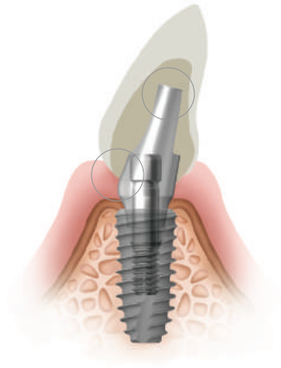
Angled Abutment



Angled Abutment

· The Angled Abutment is recommended when the restoration path of insertion is unfavorable in either anterior or posterior sites.

· Retention force can be increased through milling process.



Angled Abutment Line Up

Diameter	G/H	Angle
Ø4.5	1.5mm 2.5mm 3.5mm	15° / 25°
Ø5.5	1.5mm 2.5mm 3.5mm	

Direct-Casting / Metal-Casting Abutment

Direct-Casting Abutment

Metal-Casting Abutment

Direct-Casting Abutment

· Excellent for either single or bridgework

· Used as an esthetic custom made abutment.

· Used when angulation is not ideal and a standard abutment cannot be used.

· Used when there is inadequate inter-arch distance and a standard abutment cannot be used.

· A fixture level impression is taken, and the soft tissue contours can be supported.

Diameter	G/H	Type
Ø4.5	1.0mm	Hex / Non-hex

Metal-Casting Abutment

· Equivalent results for a fraction of the price

· Our highly affordable metal alloy replaces expensive gold to alleviate financial burden to all.

Diameter	G/H	Type
Ø4.5	1.0mm	Hex / Non-hex

Temporary Abutment

Ti-Temporary Abutment

Plastic Temporary Abutment

Temporary Abutment

· Temporary Abutments are available with titanium or plastic.

· The titanium abutment comes in both hex and non-hex with a gingival height of 1.0mm.

· The plastic abutment comes in diameters (Ø4.5, 5.5, 6.5) with a gingival height of 2.0mm.

Abutment	Diameter	G/H	Type
Ti-Temporary	Ø4.5	1.0mm	Hex / Non-hex
Plastic Temporary	Ø4.5 Ø5.5 Ø6.5	2.0mm	Hex / Non-hex

Screw Abutment

Screw Abutment

Agled Screw Abutment

If prosthesis repair is anticipated, use of a Screw Abutment retained prosthesis enables easy retrieval.

· Useful for connecting multiple units or when there is a preference for a screw retained prosthesis.

· Useful when respective long axes of implants differ. Each side tapers by 30º and this permits up to 60º divergence between two abutments.

· Useful when the prognosis of an adjacent restoration is not ideal thus permitting easy retrieval and modification of the restoration.

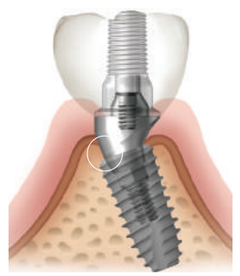
Ti-Retaining Screw (1.8mm - body diameter)

· Can minimize screw loosening due to increased approximal space.

• Can endure various kinds of masticatory force.

Screw Abutment Line Up

Diameter	G/H
Ø4.5	1.0mm, 1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm
Ø5.5	1.5mm, 2.5mm, 3.5mm, 4.5mm, 5.5mm



Angled Screw Abutment Line Up

Diameter	G/H	Angle
Ø4.5	1.0mm 2.0mm 3.0mm	20°
Ø5.5	1.0mm 2.0mm 3.0mm	

Points to Consider in Abutment Selection

Considerations in Selecting an Abutment

· Esthetic requirement
· Implant angulation
· Implant location
· Fixture installation depth (Gingival height)
· Interarch distance
· Prosthesis type
· Dentist & dental technician's preference

Impression of Implant

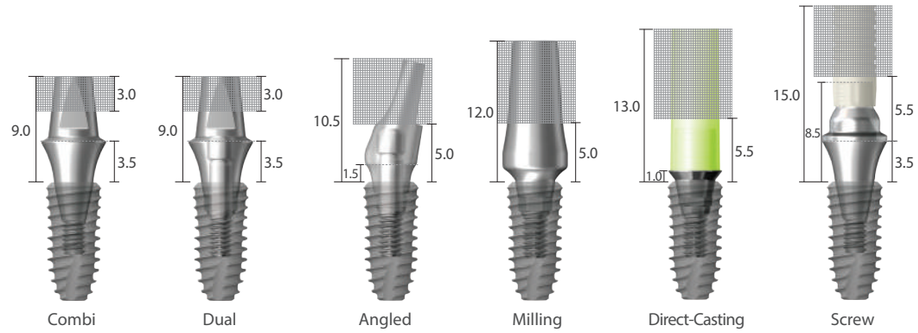
According to the case the impression can be taken at abutment or fixture level.

Fixture Level	Abutment Level
1. Dual Abutment	1. Dual Abutment
2. Dual Milling Abutment	2. Combi Abutment
3. Angled Abutment (15° / 25°)	3. Screw Abutment
4. Direct-Casting Abutment	4. Angled Screw Abutment (20°)
5. Metal-Casting Abutment	
6. Temporary Abutment (Plastic & Titanium)	

Abutment Impression Recommendation

Abutment	Type	Imprssion
Dual Abutment	Cementation type, screw-cementation type	Fixture level impression or abutment level impression
Combi Abutment	Cementation type	Abutment level impression
Angled Abutment	Cementation type, screw-cementation type	Fixture level impression
Screw Abutment	Screw retained type	Abutment level impression
Direct-Casting Abutment	Cementation type, screw-cementation type	Fixture level impression
Metal-Casting Abutment	Cementation type, screw-cementation type	Fixture level impression
Dual Milling Abutment	Cementation type, screw-cementation type	Fixture level impression

Minimum Height Requirement for SuperLine Prosthetic Abutment



* Diagram above indicates the minimum height required for SuperLine prosthetic abutment.

Maximum Amount of Reduction Allotted for SuperLine

Combi Abutment

· Eliminate 3.0mm from the top level Combi Abutment (laser marking:1.5mm)
Caution _ Damage may be caused to the screw if the abutment is reduced to less than 2.5mm above the gingival height.

Dual Abutment

· Preparation of the abutment top is possible as follows.

Gingival Height	Preparable Amount
1.5mm	2.0
2.5mm	3.0
3.5mm	4.0
4.5mm	5.0
5.5mm	6.0

Angled Abutment & Milling Abutment

· Preparation of the abutment top is possible as follows.

Direct-Casting Abutment & Metal-Casting Abutment

· Required minimum abutment height: at least 5.5mm above the Fixture top.

Direct-Casting Abutment & Metal-Casting Abutment

· The Screw Abutment cannot be modified, however the Casting Abutment can be modified for interarch distance, taking reduction into consideration of the height of the retaining screw.

Prosthetic Procedure 1

Impression Technique and Restoration Selection

Dual / Combi Abutment

Abutment Level Impression

Closed Tray Technique

Combi Abutment
Ø 4.5 / Ø 5.5 / Ø 6.5

Dual Abutment
Hex / Non-hex
Ø 4.5 / Ø 5.5 / Ø 6.5

Impression Coping
Transfer (Snap on)
Ø 4.5 / Ø 5.5 / Ø 6.5

Analog
Long
Ø 4.5 / Ø 5.5 / Ø 6.5

Analog
Short
Ø 4.5 / Ø 5.5 / Ø 6.5

Burn-out Cylinder

Bridge
Rotational
Ø 4.5 / Ø 5.5 / Ø 6.5

Single
Non-rotational
Ø 4.5 / Ø 5.5 / Ø 6.5

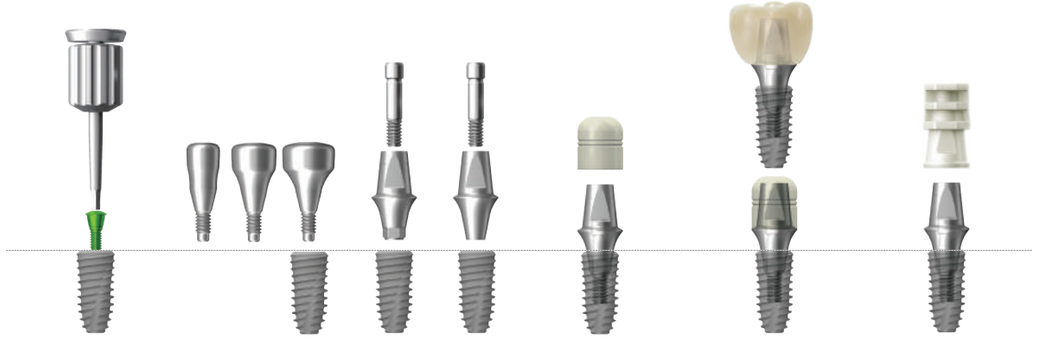
Modification

Cemented Restoration

Abutment Level_Dual Abutment

[Multiple Units]

Clinical Procedure



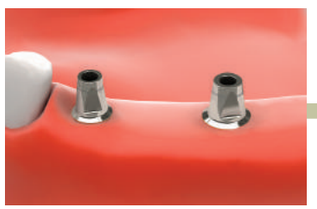
Cover Screw | Healing Abutment | Dual Abutment | Comfort Cap | Temporary Restoration or Comfort Cap | Abutment Level Impression

Chairside

Remove the Healing Abutment after formation of soft tissue.

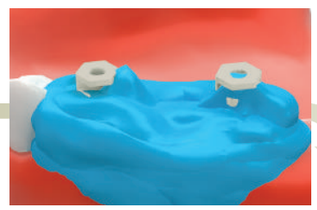
Dual Abutment (Hex / Non-hex)

Select the Dual Abutment by diameter and gingival height.

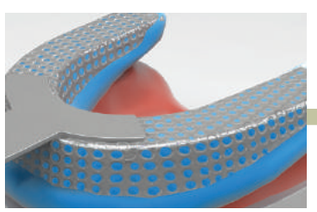


Retighten after 15 minutes
Tighten it to 25~30N·cm.

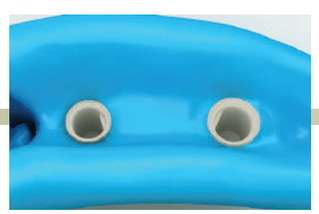
Seat the plastic cap over the abutment.



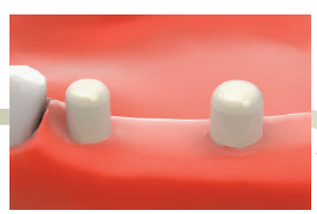
Injection of impression material



Impression taking



Cap comes off into the impression



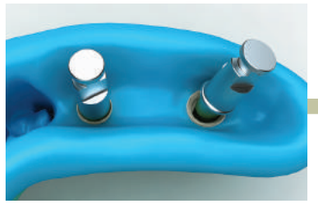
Fabrication of provisional restoration or insertion of comfort cap

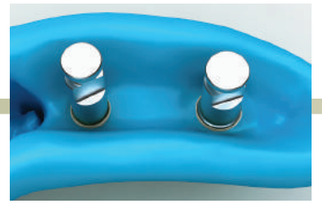
Abutment Level_Dual Abutment

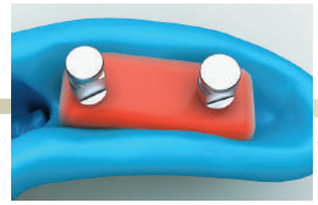
[Multiple Units]

Clinical Procedure

LabSide


Insertion of Combi Abutment analog into impression

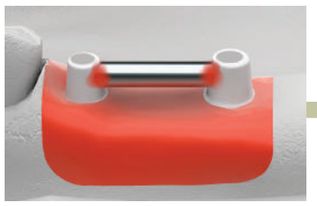

Make sure analog seats securely into the impression cap. (line up the flat side of analog to the flat side of the cap)


Soft tissue model

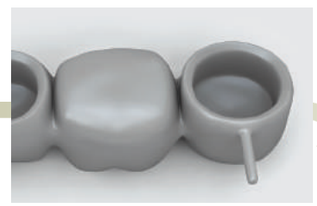

Fabrication of master cast


Seat burn-out cylinder securely into analog.


Consider distance of opposing teeth, Modify burn-out cylinder to its proper heigh if needed.

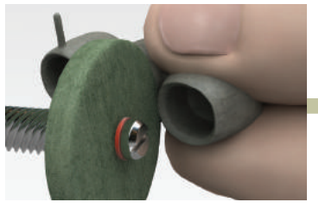

Fabrication of burn-out cylinder and plastic bar in preparation for wax-up

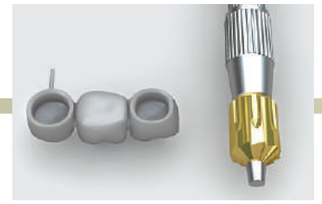

Completion of wax-up

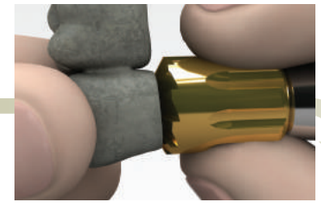

Fabrication of metal framework

Abutment Level_Dual Abutment

[Multiple Units]


Trimming of the extended margin by using the rubber wheel


Metal framework and reamer


Reamer is used to eliminate "Lip" caused by 'snap-on' mechanism.


Metal framework after removal of "Lip"

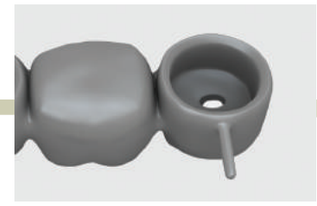

Metal framework

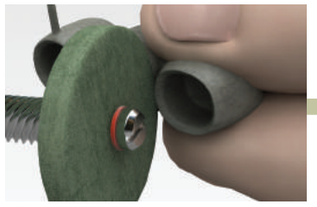

Porcelain build-up

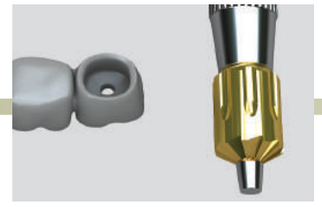
SCRP: Once an access hole has been created, it can be converted to a SCRP (Screw & Cemented Retained Prosthesis).

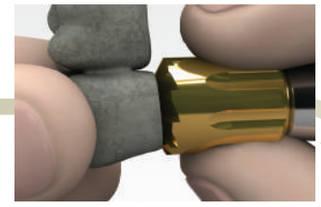

Final prosthesis

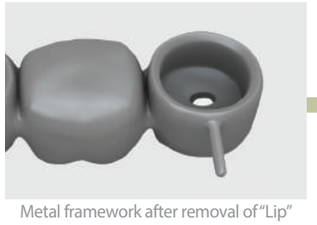

Access hole is made when burn-out cylinder is used to do the wax-up.

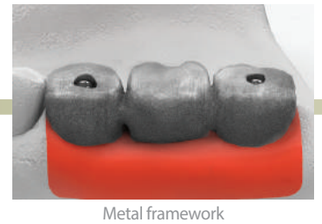

Extended margin around the metal framework due to 'snap-on' mechanism


Trim extended margin by rubber wheel


Metal framework and reamer


Eliminate the lip remnant caused by 'snap-on' mechanism by reamer.


Metal framework after removal of "Lip"

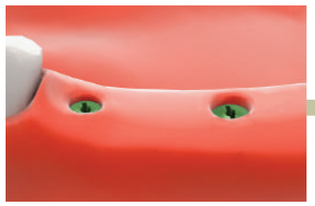

Metal framework


Final prosthesis

Abutment Level_Combi Abutment

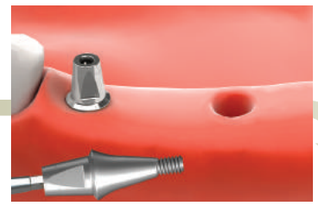
[Multiple Units]

Chairside



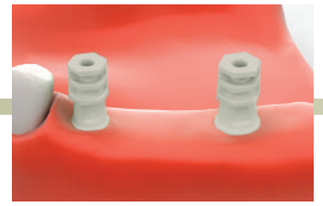
Second stage surgery
(uncovering)

Following the 2nd stage surgery, soft tissue is healed around the Healing Abutment. Healing Abutment should be selected according to the size of abutment.

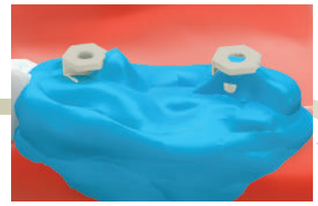


Choose abutment with gingival height then tighten it to 25~30N·cm. Re tighten after 15 minutes.

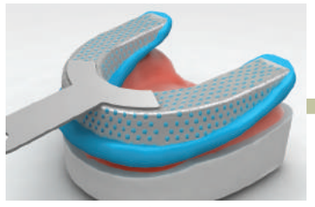
Image of combi Impression coping and abutment assembly



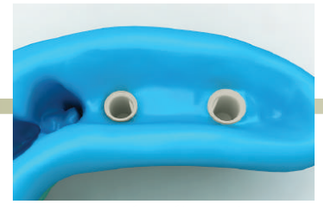
Snap-on the plastic impression coping with the same sized diameter abutment



Impression taking
Injection of impression material



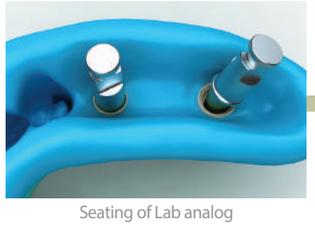
Impression taking



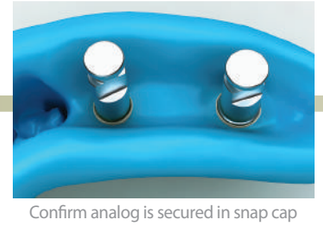
Inner-surface of impression

Extended margin around the metal framework due to 'snap-on' mechanism

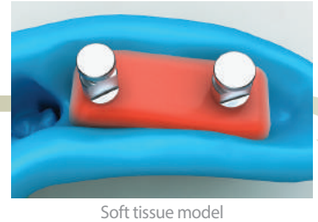
Chairside



Seating of Lab analog



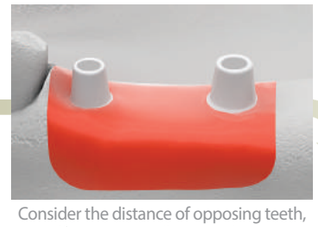
Confirm analog is secured in snap cap



Soft tissue model

Fabrication of master cast

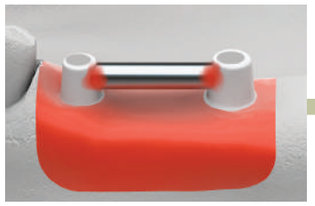
Placement of burn-out cylinder



Consider the distance of opposing teeth, modify burn-out cylinders to its proper height.

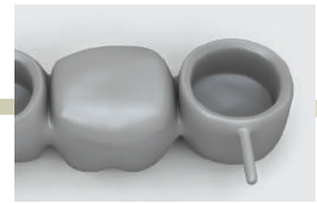
Abutment Level_Combi Abutment

[Multiple Units]

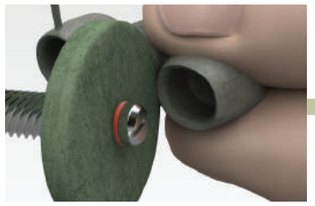


Connect the plastic bar in the middle of the trimmed burn-out cylinders to help support the resin pattern. Wax pattern may have shrinkage.

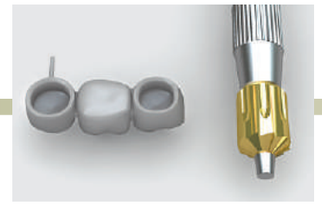
Wax-up



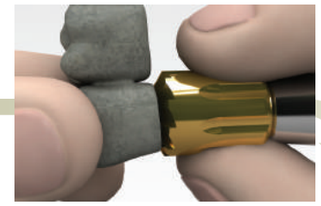
Completed framework



Trimming the extended margin with a rubber wheel



Metal framework and reamer



Removal of lip remnant with reamer caused by 'snap-on' mechanism

Metal Framework after removal of "Lip"

Metal coping adaptation
(Completed framework)

Porcelain build-up
final prosthesis

Chairside

* If the combi analog is trimmed due to limited inter-occlusal space in the lab, make a reduction jig. Then a slight modify of the abutment in the oral cavity may be necessary to the height of the jig.

Insertion of final prosthesis and occlusal adjustment

Prosthetic Procedure 2

Impression Technique and Restoration Selection

Dual / Custom / Milling / Angled / Direct-Casting / Metal-Casting / Ti-Temporary / Plastic Temporary Abutment

Fixture Level Impression

Impression Coping Pick-up
Open tray technique (Complicated case)
Ø 4.0 / Ø 4.5 / Ø 5.5 / Ø 6.5

Hex Non-hex

Impression Coping Transfer
Closed tray technique (Simple case)
Ø 4.0 / Ø 4.5 / Ø 5.5 / Ø 6.5

Hex Non-hex

Analog
Ø 4.5

Dual Abutment
Hex / Non-hex
Ø 4.5 / Ø 5.5 / Ø 6.5

Custom Abutment
Hex / Non-hex
Ø 4.5 / Ø 5.5

Direct-Casting Abutment
Hex / Non-hex
Ø 4.5

Metal-Casting Abutment
Hex / Non-hex
Ø 4.5

Milling Abutment
Hex / Non-hex
Ø 4.0 / Ø 4.5 /
Ø 5.5 / Ø 6.5 / Ø 7.5

Angled Abutment
Hex / Non-hex
15° / 25°
Ø 4.5 / Ø 5.5

Ti-Temporary Abutment
Hex / Non-hex
Ø 4.5

Plastic Temporary Abutment
Hex / Non-hex
Ø 4.5 / Ø 5.5 / Ø 6.5

Modification

Cemented Restoration

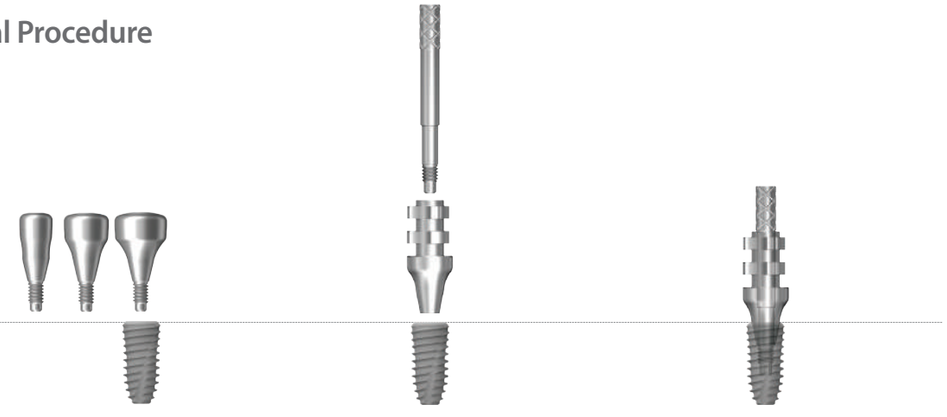
Modification

Screw-Retained Restoration

Fixture Level [Pick-up Type]_Dual Abutment

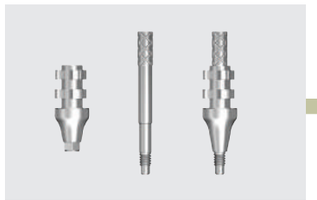
[Multiple Units]

Clinical Procedure

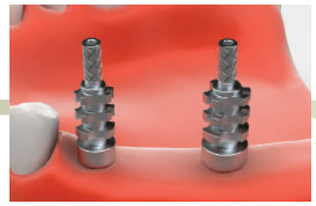


Healing Abutment | Impression Coping Pick-up Type | Fixture Level Impression Open Tray

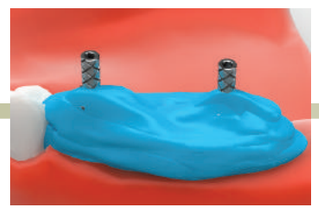
LabSide



Open tray impression (pick-up)

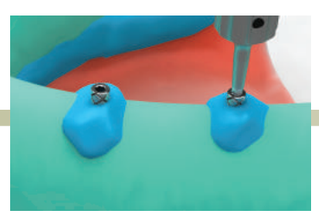


Apply adhesive on open tray.
(Individual tray)



Injecting the impression material

Impression taking



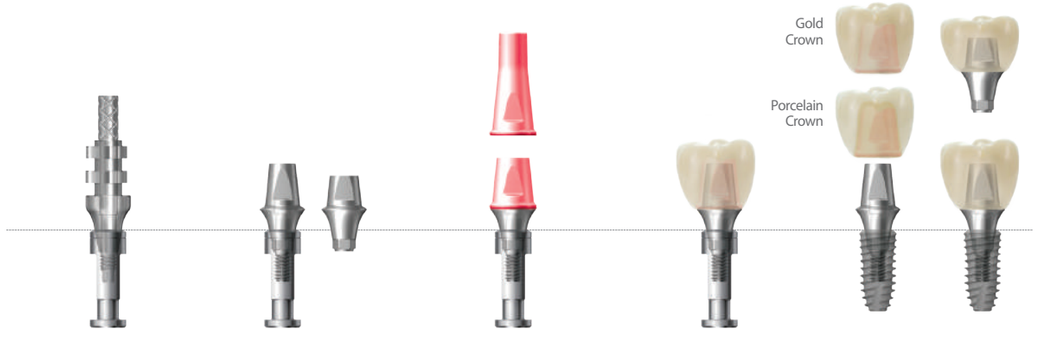
Remove the screw before removing the impression tray.

Inner surface of impression

Fixture Level [Pick-up Type]_Dual Abutment

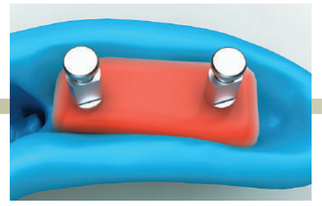
[Multiple Units]

Clinical Procedure



LabSide

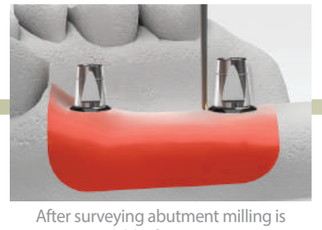
Connect lab analog with impression coping.



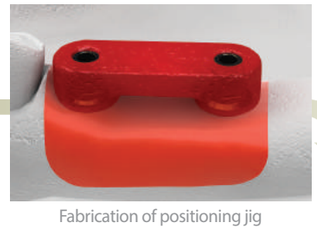
Soft tissue model

Fabrication of master cast

Connect a proper abutment

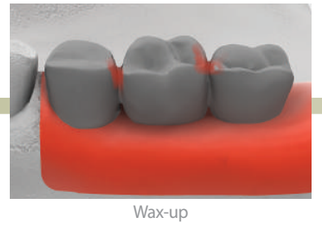


After surveying abutment milling is possible if necessary.

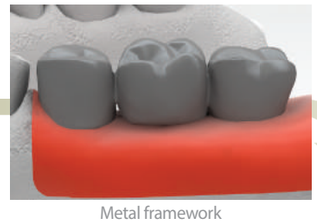


Fabrication of positioning jig

Fabrication of the cap with pattern resin



Wax-up



Metal framework

Fixture Level [Pick-up Type]_Dual Abutment

[Multiple Units]

Chairside

Final prosthesis

Use positioning jig to transfer the abutment in model to oral cavity then tighten it to 25~30N·cm.
Retighten after 15 minutes.

Insertion of the final prosthesis and occlusal adjustment

* In the process of seating the prosthesis, the prosthesis can be rebounded by gingival tissue.
In this case it is advised to apply occlusal load on the prosthesis for 10~15 minutes.

SCRP- Labside

Formation of access hole with long transfer coping screw

Wax-up

Metal framework

SCRP- Chairside

Final prosthesis

Use positioning jig to transfer the abutment in model to oral cavity then tighten it to 25~30N·cm.
Retighten after 15 minutes.

Insertion of final prosthesis and adjustment of occlusion

* In the process of seating the prosthesis, the prosthesis can be rebounded by gingival tissue.
In this case it is advised to apply occlusal load on the prosthesis for 10~15 minutes.

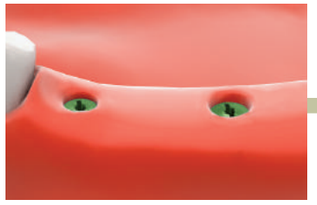
Fixture Level [Transfer Type]_Dual Abutment

[Multiple Units]

Clinical Procedure

Healing Abutment | Impression Coping Transfer Type | Fixture Level Impression Closed Tray

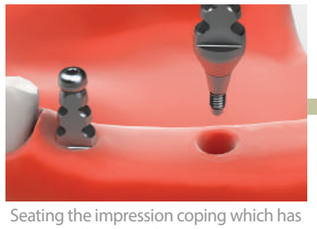
Chairside



Second stage surgery (Uncovering)

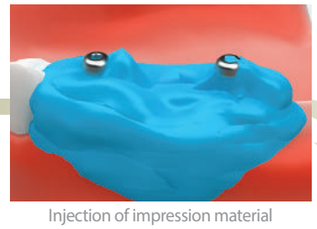
Soft tissue formed around Healing Abutment

Transfer type impression coping

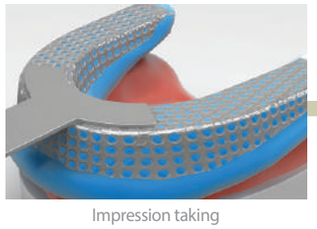


Seating the impression coping which has the same diameter as Healing Abutment

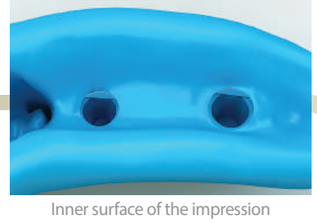
Impression of fixture level (No x-ray necessary for confirmation)



Injection of impression material



Impression taking

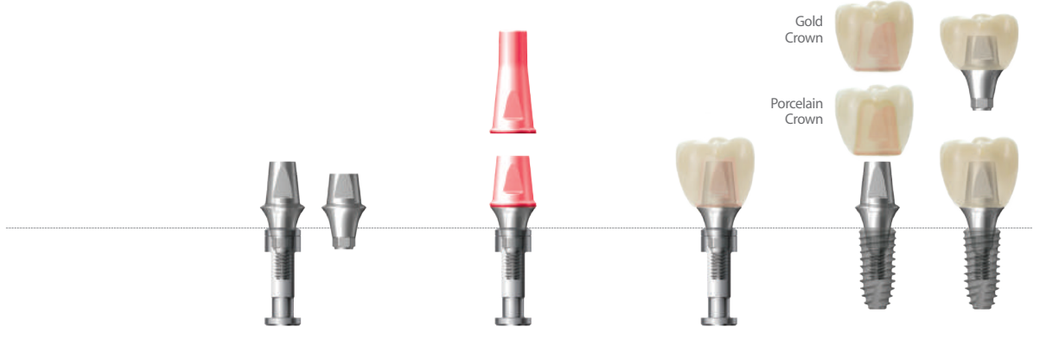


Inner surface of the impression

Fixture Level [Transfer Type]_Dual Abutment

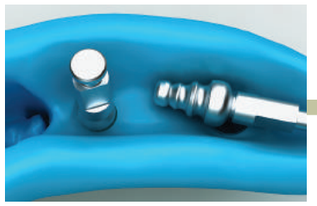
[Multiple Units]

Clinical Procedure

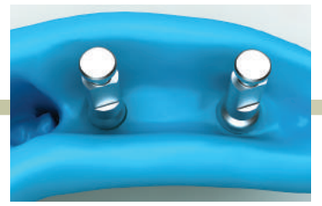


Lab Analog Connection | Height Modification of Dual Abutment | Burn-out Cylinder | Crown Wax-up | Final Restoration Cementation Type

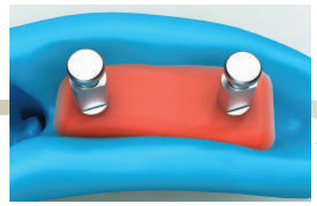
LabSide



Impression coping and analog connection. And insert impression coping into the impression.

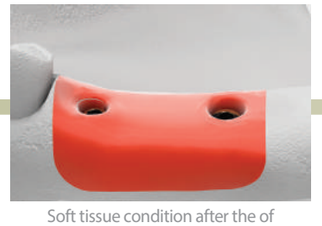


Make sure the impression coping is fully seated into the impression

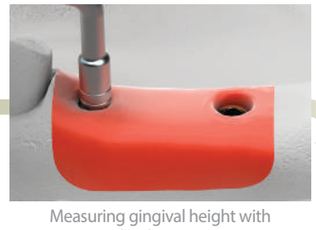


Soft tissue model

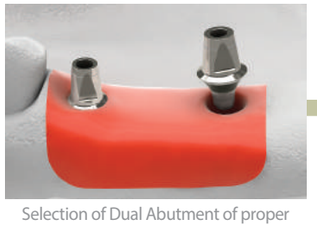
Fabrication of master cast



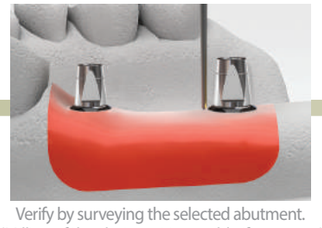
Soft tissue condition after the of impression coping



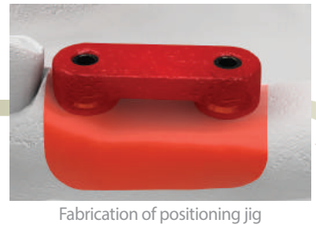
Measuring gingival height with depth gauge



Selection of Dual Abutment of proper diameter and gingival height



Verify by surveying the selected abutment. (Milling of the abutment is possible if necessary)



Fabrication of positioning jig

Fixture Level [Transfer Type]_Dual Abutment

[Multiple Units]

Seat the cap with pattern resin

Completion of wax-up

Completion of metal framework

Chairside

Final prosthesis built up on the framework with porcelain

Use positioning jig to transfer the abutment in model to oral cavity then tighten it to 25~30N·cm.
Retighten after 15 minutes.

Insertion of final prosthesis, adjust occlusion place lab wax into opening of abutment to protect screw head then cement.

SCRP- Labside

Make an access hole in the resin cap by using the long open tray transfer screw.

Completed wax-up

Metal framework

SCRP- Chairside

Final prosthesis built up on the framework with porcelain

Use positioning jig to transfer the abutment in model to oral cavity then tighten it to 25~30N·cm.
Retighten after 15 minutes.

Insertion of final prosthesis and occlusal adjustment. Place wax into opening of the abutment prior to sealing with composite.

* In the process of seating the prosthesis, the prosthesis can be rebounded by gingival tissue.
In this case it is advised to apply occlusal load on the prosthesis for 10~15 minutes.

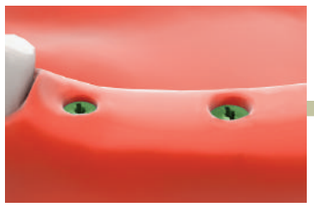
Fixture Level [Transfer Type]_Milling Abutment

[Single Unit]

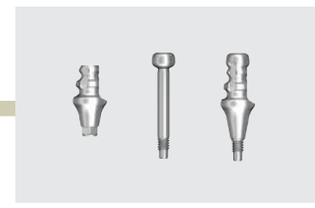
Clinical Procedure

Healing Abutment | Impression Coping Transfer Type | Fixture Level Impression Closed Tray

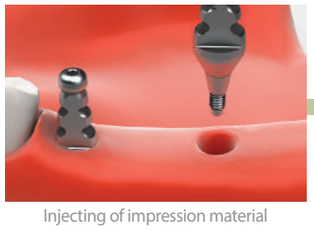
Chairside



Placement of Healing Abutment

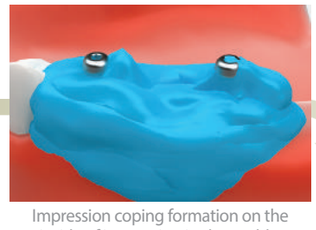


Placement of impression coping with the same diameter as Healing Abutment



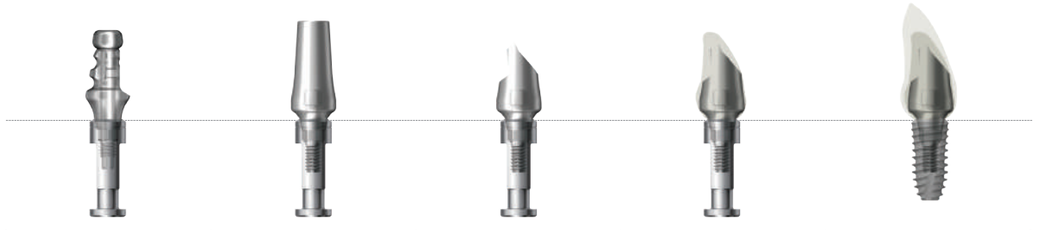
Injecting of impression material

Impression taking



Impression coping formation on the inside of impression is observable. (Traces of impression coping on the inner surface of impression)

Laboratory Procedure



Lab Analog Connection | Milling Abutment Connection | Modification | Crown Wax-up | Final Restoration Cementation Type

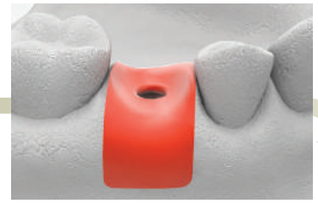
Fixture Level [Transfer Type]_Milling Abutment

[Single Unit]

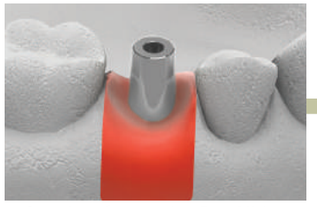
Labside

Impression coping and analog connection. And insert impression coping into the impression.

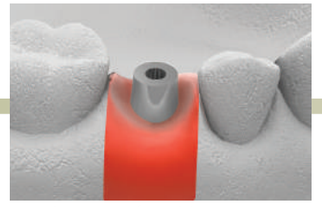
Soft tissue model



Master cast

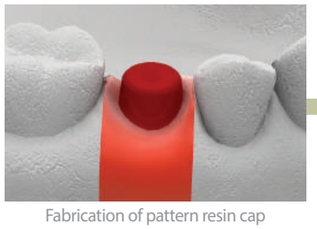


Selection of appropriate Dual Milling Abutment

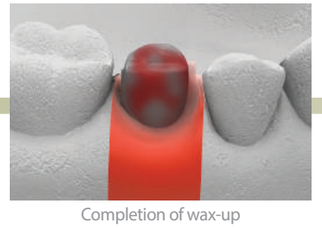


Abutment after milling process

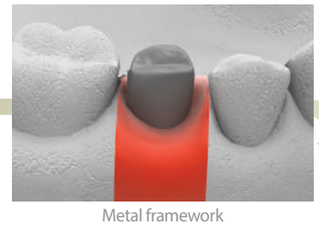
Fabrication of positioning jig



Fabrication of pattern resin cap



Completion of wax-up



Metal framework

Chairside

Final prosthesis

Use positioning jig to transfer the abutment in model to oral cavity then tighten it to 25~30N·cm.
Retighten after 15 minutes.

Insertion of final prosthesis and occlusal adjustment

* In the process of seating the prosthesis, the prosthesis can be rebounded by gingival tissue.
In this case it is advised to apply occlusal load on the prosthesis for 10~15 minutes.

Fixture Level [Pick-up Type]_Angled Abutment

[Single Unit]

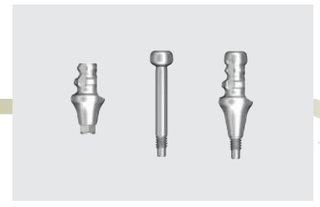
Clinical Procedure

Angled Abutment | Impression Coping Pick-up Type | Fixture Level Impression

Chairside

Pick-up type impression coping

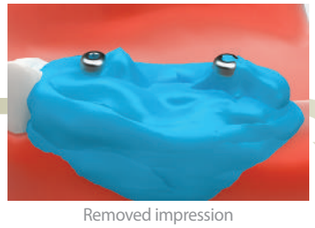
Placement of pick-up impression



Injecting impression material

Impression taking
(individual tray with holes)

Unscrew, then remove the impression.



Removed impression

Laboratory Procedure

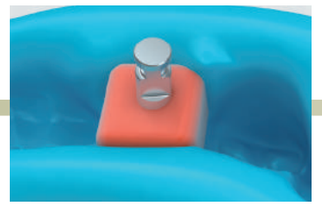
Lab Analog Connection | Angled Abutment Connection | Modification | Crown Wax-up | Final Restoration Cementation Type

Fixture Level [Pick-up Type]_Angled Abutment

[Single Unit]

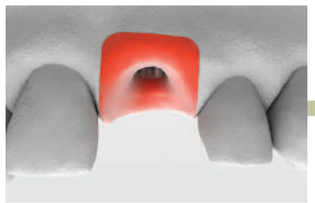
Labside

Impression coping with analog connections



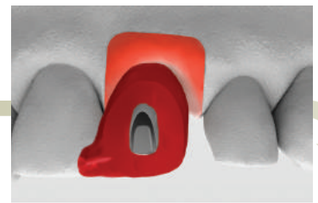
Soft tissue formation and fabrication of master model

Unscrew then separate impression from the model.

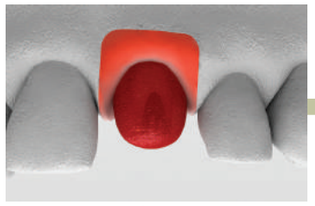


Master cast

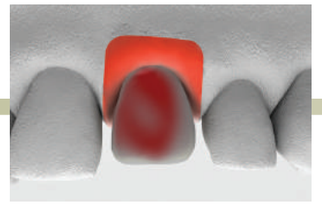
Select an Angled Abutment.

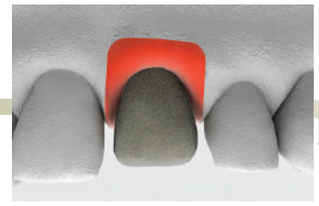


Modification of Angled Abutment & fabrication of positioning jig

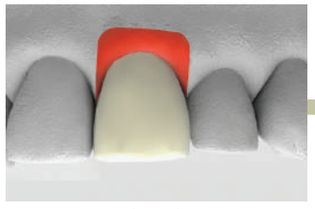


Fabrication of pattern resin cap

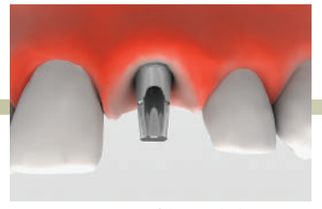




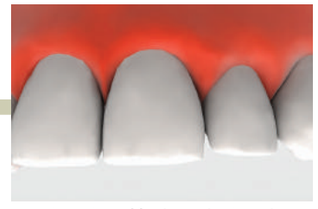
Metal or zirconia framework



Final prosthesis



Insertion of the Angled Abutment using positioning jig

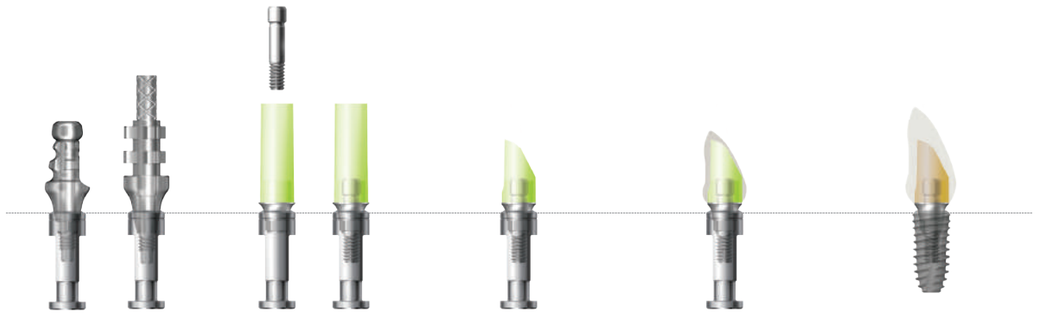


Insertion of final prosthesis and occlusal adjustment

Fixture Level_Direct-Casting Abutment

[Single Unit]

Laboratory Procedure

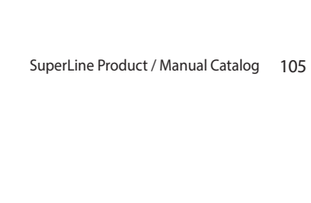


Lab Analog Connection | Direct-Casting Abutment Connection | Modification | Abutment Wax-up | Final Restoration Cementation Type

LabSide

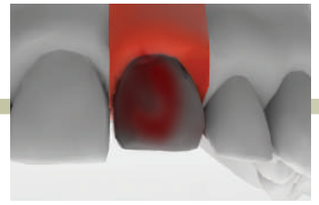
Placement of Direct-Casting Abutment

Completed custom abutment

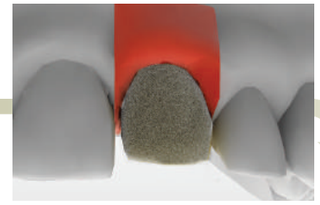


Fabrication of positioning jig

Fabrication of pattern resin cap

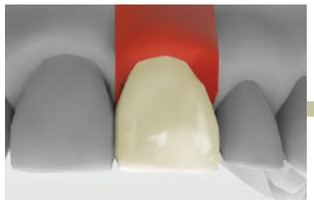


Wax-up



Metal framework

Chairside



Final prosthesis

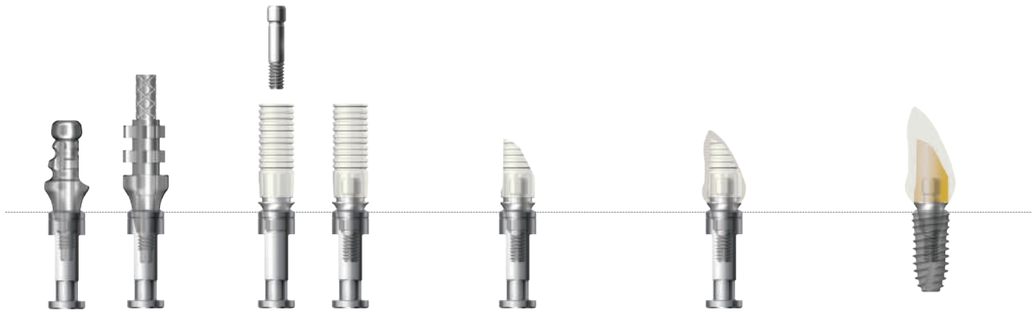
Insertion of custom abutment using positioning jig

Insertion of final prosthesis and occlusal adjustment

Fixture Level_Metal-Casting Abutment

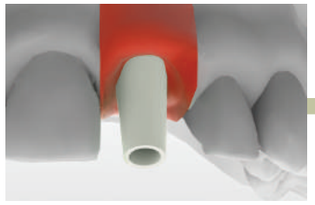
[Single Unit]

Laboratory Procedure

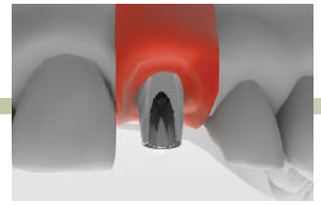


Lab Analog Connection | Metal-Casting Abutment Connection | Modification | Abutment Wax-up | Final Restoration Cementation Type

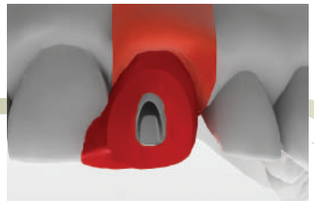
LabSide



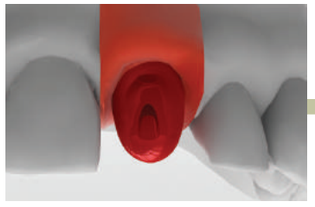
Placement of Metal-Casting Abutment



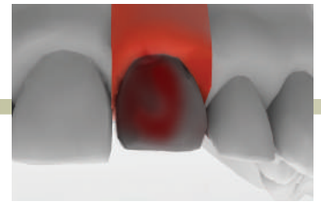
Completed custom abutment



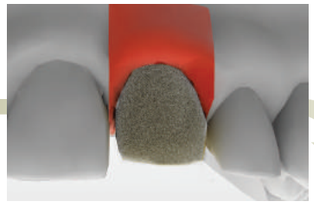
Fabrication of positioning jig



Fabrication of pattern resin cap

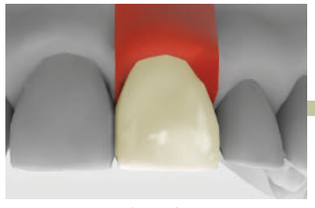


Wax-up

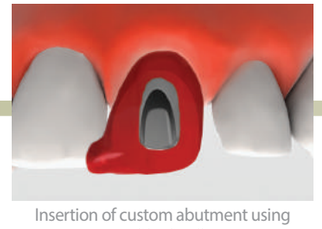


Metal framework

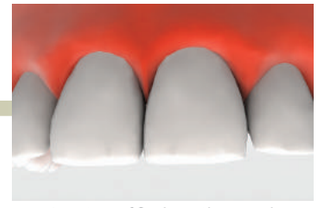
Chairside



Final prosthesis



Insertion of custom abutment using positioning jig



Insertion of final prosthesis and occlusal adjustment

Fixture Level [Pick-up Type]_Temporary Abutment

[Single Unit]

Ti-Temporary Abutment | Plastic Temporary Abutment

<Using Ti Abutment>

Considering the opposing teeth before seating the Temporary Abutment, trim off the abutment as needed and complete the Temporary Abutment prosthesis with direct resin.

<Using Plastic Abutment>

Prosthetic Procedure 3

Impression Technique and Restoration Selection

Screw Abutment

Abutment Level Impression

Screw Abutment
Ø 4.5 / Ø 5.5

Angled Screw Abutment
Hex / Non-hex
20°
Ø 4.5 / Ø 5.5

Open tray technique

Closed tray technique

Impression Coping Pick-up
Single / Bridge
Ø 4.5 / Ø 5.5 / Ø 6.5

Impression Coping Transfer
Single / Bridge
Ø 4.5 / Ø 5.5 / Ø 6.5

Analog
Ø 4.5 / Ø 5.5

Burn-out Cylinder
Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Gold Cylinder
Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Metal Cylinder
Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Ti Cylinder
Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Ti Temporary Cylinder
Single / Bridge
(Hex / Non-hex)
Ø 4.5 / Ø 5.5

Polishing Protector
Ø 4.5 / Ø 5.5

Temporary Restoration

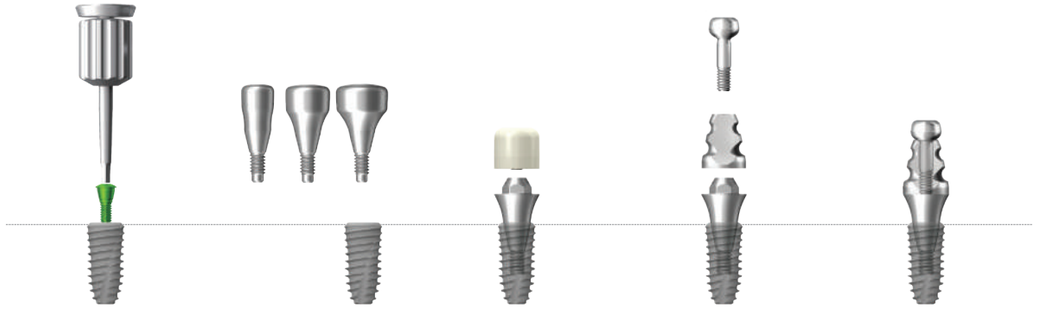
Ti-Retaining Screw

Screw-Retained Restoration

Abutment Level [Transfer Type]_Screw Abutment

[Multiple Units]

Clinical Procedure

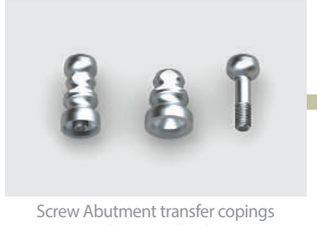


Cover Screw | Healing Abutment | Screw Abutment | Impression Coping Transfer Type | Abutment Level Impression

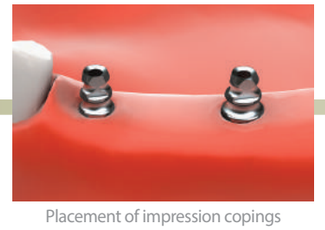
LabSide

Select and seat an appropriate Screw Abutment with delivery holder.

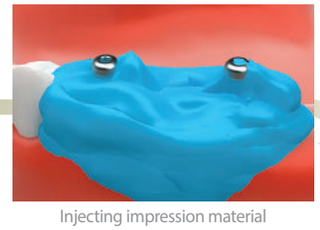
Tighten it to 25~30N·cm. Retighten after 15 minutes with Screw Abutment adaptor.



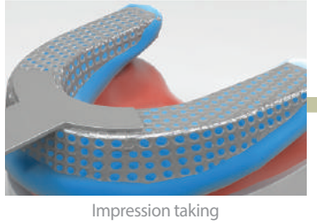
Screw Abutment transfer copings (abutment level)



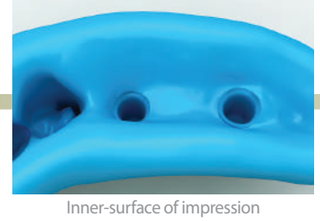
Placement of impression copings



Injecting impression material



Impression taking



Inner-surface of impression

Placement of comfort cap on Screw Abutment

Abutment Level [Transfer Type]_Screw Abutment

[Multiple Units]

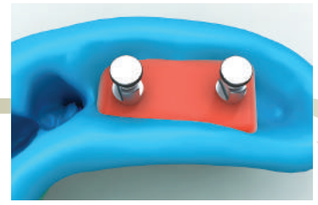
Laboratory Procedure

Lab Analog Connection | Cylinder Connection | Modification | Crown Wax-up | Final Restoration Screw Retained

LabSide

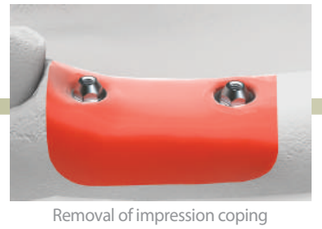
Connecting impression coping with Screw Abutment analog

Position impression coping and analog assembly in the exact location of the impression



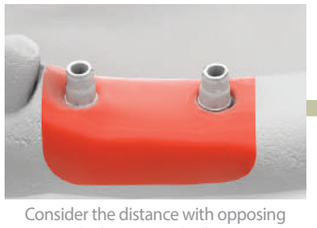
Soft tissue model

Fabrication of master cast



Removal of impression coping

Connect the Screw Abutment cylinder then tighten it with ti-retaining screw.



Consider the distance with opposing teeth, then trim cylinder to its appropriate height.

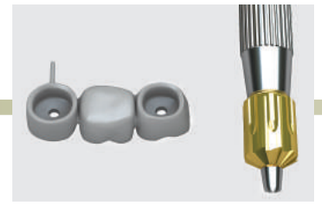
Connect the plastic bar in the middle of trimmed burn-out cylinders to help support the wax pattern. Wax pattern may have shrinkage.

Wax-up

Abutment Level [Transfer Type]_Screw Abutment

[Multiple Units]

Metal framework



Removal of lip remnant in the interior of metal framework by using reamer

Completion of metal framework

Completion of porcelain

Insertion of final prosthesis and occlusal adjustment. Tighten with ti-retaining screw (25~30N·cm.).

Cementation Repair Method (SCRP)

[Screw & Cement Retained Prosthesis]

In Light of Implant Prosthesis:

· A screw type restoration helps to simplify prosthesis repair, including insertion and removal of the prosthesis if necessary.

· Cement type restoration tend to have a stable occlusion and may enhance the adaptability.
However the weak point is that it cannot be removed after permanent cementation.

· A Dual Abutment can be cemented or screw retained.

· Combi Abutments are cement retained and no occlusal hole is necessary.

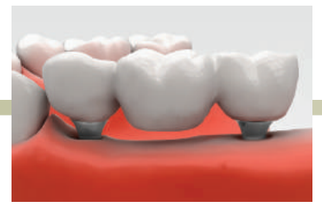
In Case of Screw Loosening or when Prosthesis Repair is Needed

In case of the following:
screw loosing Prosthesis repair

In order to unscrew, form access hole on the occlusal surface using bur.

Unscrew, then remove the prosthesis from the oral cavity.

Both cemented prosthesis and abutment are removed.



Finish the repair then seat it inside the oral cavity.

Tighten the prosthesis with 25~30N·cm by a screw driver.

* It is recommended that the abutment screw is retightened after 15 minutes.

Fill the access hole with cotton.

Fill the access hole with resin.

Final prosthesis

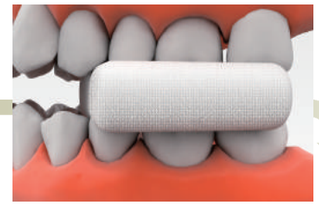
Cementation Repair Method (SCRP)

[Screw & Cement Retained Prosthesis]

Prosthesis Separation from Abutment due to Cement Loss

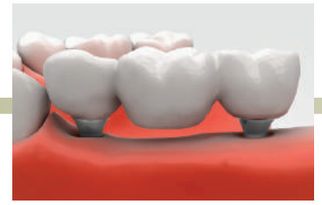
Remove the screw completely with screw driver and remove prosthesis from the patient's mouth.

Apply cement to the prosthesis.



Place it back into the patient's mouth.

After the cement setting, unscrew and remove the excessive cement.



Finish the repair and seat it inside the patient's mouth.

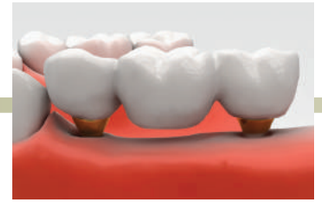
Tighten the prosthesis with 25~30N·cm with a screw driver.

Adding to the Interproximal Contact Surface due to Prosthesis Loosening

Prosthesis loosening due to contact loosening

Form access hole using bur

Unscrew, then remove the cemented prosthesis with abutment in the oral cavity.



Contact adding with resin on the prepared under space.

Insert the prosthesis in the oral cavity and screw it in. Afterwards, perform light curing, then polish the contact area.

* It is recommended that the abutment screw is retightened after 15 minutes.

Position the prosthesis in the mouth and tighten the screw with 25~30N·cm, then fill up the access hole.

Prosthetic Procedure 4

Impression Technique and Restoration Type

Overdenture Procedure

Positioner / Mini Ball / Magnetic Attachment

Positioner Abutment
Ø 3.5

Mini Ball Abutment
Ø 3.5

Magnetic Implant Keeper
Dome type / Flat type
Ø 4.5 / Ø 5.5

Abutment Level Impression

Positioner Impression Coping
Ø 4.5

Mini Ball Impression Coping
Ø 3.5

Positioner Analog
Ø 3.5

Mini Ball Analog
Ø 3.5

Block Out Spacer
Ø 6.5

Socket Spacer
Ø 4.05 / Ø 4.85

Positioner Socket
Metal / Plastic

Mini Ball Female Socket / O-ring
Ø 4.05 / Ø 4.85

Magnetic Assay
Dome type / Flat type
Ø 4.5 / Ø 5.5

Positioner Attachment for Overdenture

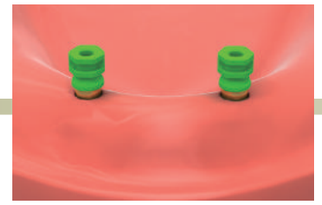
Mini Ball and Socket Attachment for Overdenture

Magnetic Attachment for Overdenture

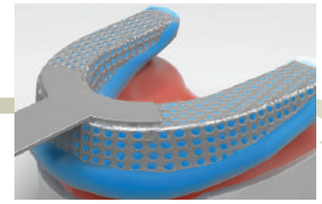
Positioner

Chairside

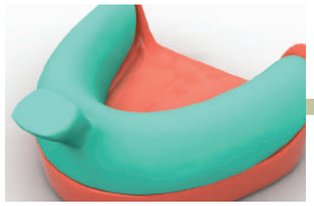
Connect the Positioner Abutment onto the fixture.



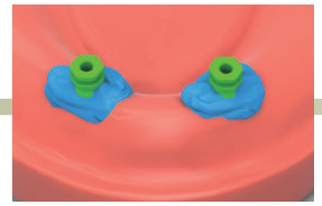
Affix the impression coping on the Positioner Abutment.



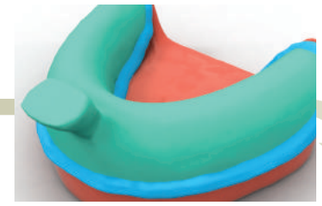
Take Impression for the production of individual tray.



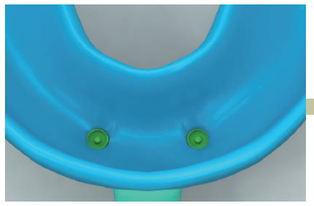
Produce the individual tray for denture impression.



After connecting the Positioner Abutment and the impression coping together, apply the impression material.



Take the final impression with the pre-pared individual tray.



After the impression material is set, discard the individual tray.

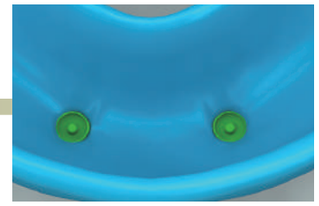
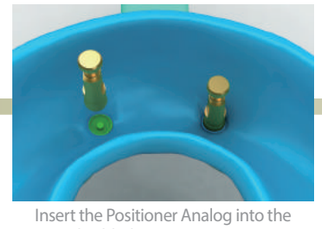


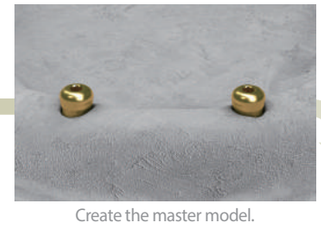
Image of the set final impression (with impression coping)

Labside

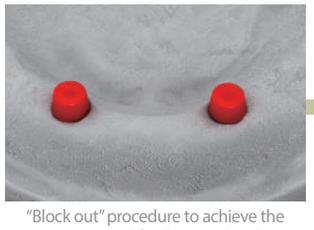
Positioner Analog



Insert the Positioner Analog into the embedded impression coping.



Create the master model.



"Block out" procedure to achieve the space required for the metal socket.

Fabrication of denture with conventional method

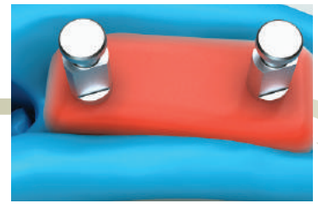
Positioner

Case 1

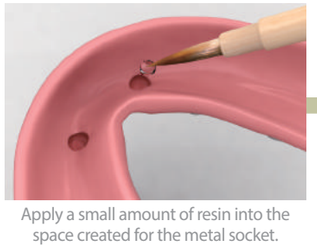
Chairside

Secure spaces for the female sockets.

Place the "block out spacer" on the Positioner Abutment in the patient's mouth.

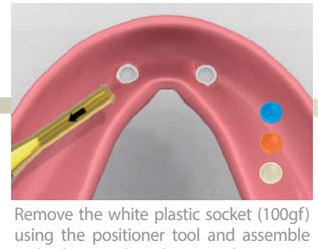


Connect the metal socket onto the Positioner Abutment.



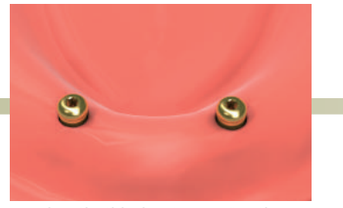
Apply a small amount of resin into the space created for the metal socket.

Position the denture in the mouth and wait until the resin is completely set.



Remove the white plastic socket (100gf) using the positioner tool and assemble with the regular plastic socket giving the desired retention force (300, 500 or 1000gf).

Secure spaces for the female sockets.



Place the "block out spacer" on the Positioner Abutment in the patient's mouth.

Connect the metal socket onto the Positioner Abutment.

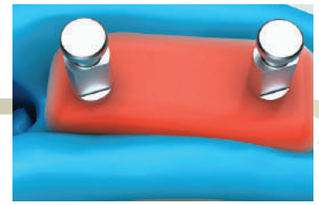
Positioner

Case 1

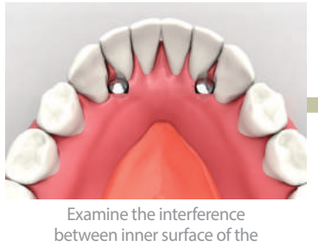
Chairside

Create holes for the placement of the metal sockets.

Place the "block out spacer" on the Positioner Abutment in the intraoral.

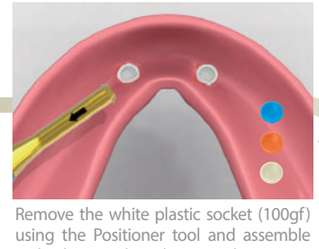


Connect the metal socket onto the Positioner Abutment.



Examine the interference between inner surface of the holes and the female sockets.

Apply the resin into the holes and wait until it is completely set.



Remove the white plastic socket (100gf) using the Positioner tool and assemble with the regular plastic socket giving the desired retention force (300, 500 or 1000gf).

Apply additional resin around the metal socket where there is a shortage of resin.

Apply resin around the metal socket.

After polishing, the overdenture is completed.

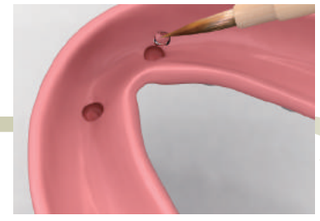
Mini Ball Attachment

Case 1

Chairside


Secure spaces for the female sockets.


Connect the female sockets to the Mini Ball Abutments in the intra-oral.


Apply small amount of the resin into the secured area.


Position the denture in the oral cavity and wait until the resin is completely set.


Female sockets are placed in the denture.

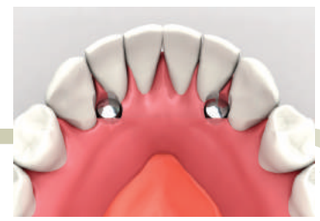

After polishing, the overdenture is completed.

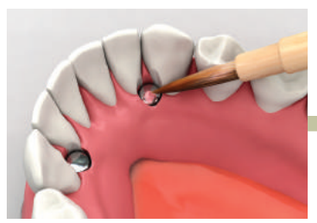
Case 2

Chairside


Create holes for placement of female sockets.


Connect the female sockets to the Mini Ball Abutments in the intra-oral.


Examine the interference between inner surface of the holes and the female sockets.


Apply the resin into the holes and wait until it is completely set.

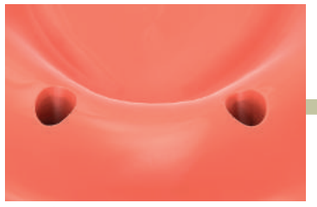

Female sockets are placed in the denture.

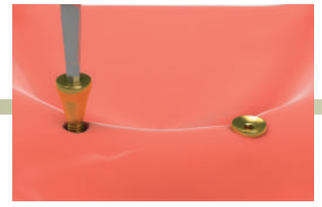

Apply resin around the female sockets.

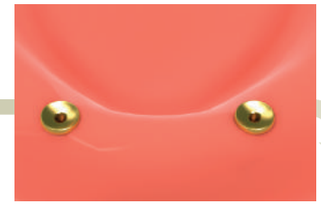

After polishing, the overdenture is completed.

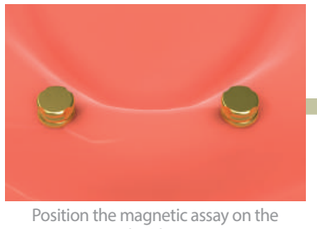
Magnetic Attachment

Chairside


After Healing Abutment removal


Connect implant keeper with fixture and tighten it with 25~30N·cm.


Implant keepers connected with the fixtures


Position the magnetic assay on the implant keeper.


Secure spaces for the magnetic assays.


Examine the interference between inner divot of the denture and the magnets.

Case 1

Chairside


Apply resin on the divot of the denture's inner surface.


Position the denture into the mouth and wait until the resin is completely set.


Magnetic assays are placed in the denture.


Apply some of resin around the magnetic assays.


After the resin is completely set, remove excess. After polishing, the overdenture is completed.

Magnetic Attachment

Case 2

Chairside

Create holes for the placement of the magnets.

Examine the interference between inner surface of the holes and the magnets.

Position the denture in the mouth and apply small amount of resin into the hole.

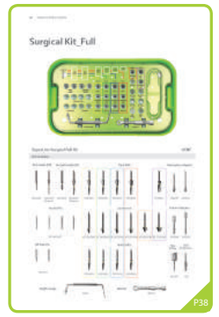
Wait until the resin is completely set.

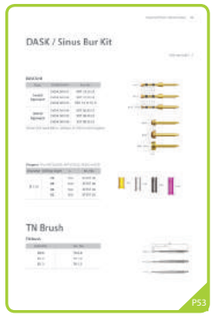
After setting, remove denture from the mouth.

Add the resin around the magnets.

After polishing, the overdenture is completed.

Renewal





New Product