OSSTEM IMPLANT

Surgical Manual

Positioning Guide KIT

(Positioning Guide Full KIT)

Introduction

Welcome,

and thank you for choosing Osstem Implant products. This catalogue is designed to support dental professionals with product information, clinical workflows, and practical guidance for daily use. It is important to inform patients about the option of dental implant treatment and the potential benefits it may provide. For further information, please contact your local Osstem representative.

Important Notice

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Electronic IFU (per (EU) 2021/2226)

- Surgical Drill & KIT System is eligible for provision of electronic instructions for use (e-IFU) under Regulation (EU) 2021/2226 for professional users.
- e-IFUs are available at [website URL: ifu.osstem.com] in the official languages required by the Member State(s) where the device is placed on the market.
- The e-IFU content is consistent with the paper version; all updates are promptly reflected in both versions.
- If requested, a paper copy of the IFU will be supplied free of charge, within 7 calendar days.
- The e-IFU website maintains historical versions for traceability of all previously applicable instructions.
- Labeling on the product/package indicates the provision of e-IFU and how to access it online.

Surgical Manual | English Edition

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Note: *This brochure is based on the global 2021 Osstem Surgical Manual and has been visually revised and adapted for the European market. Product availability and specifications may vary by country and are subject to change without notice. Images are for illustrative purposes only. For professional use only.*

Positioning Guide KIT

KIT that enables easy placement and direction setting in partially edentulous cases without using a surgical stent

Single guide


Select guide


Connect guide and perform drilling


Check path and crown width


Place implant

Bridge guide


Select single guide and perform drilling


Connect bridge guide


Perform drilling


Check path and crown width, then place implant

1 Indication

A When you wish to place implant in correct position

B When you wish to place implant in correct direction

C When you wish to place implant without a surgical stent (single or bridge case)

2 Features

A Single guides are provided by diameter

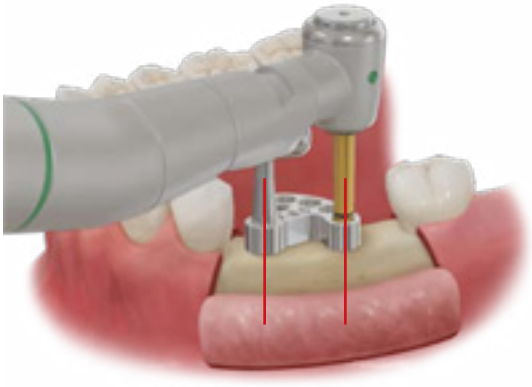
· Able to calculate the distance between teeth with the diameter of the guide. Put the guide at adjacent tooth in order to set placement position and implant diameter.

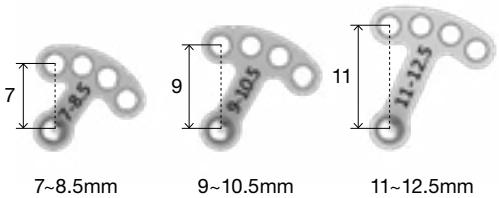
B Can be used as a virtual tooth by placing the Single guide on guide pin

· After initial drilling, place the guide pin in the drill hole and place single guide on the guide pin in order to use it as a guide for next drilling.

C Easy to adjust distance and direction

· After initial drilling, if the bridge guide is used, implants can be placed parallel to each other.





3 Tools of KIT

Positioning Guide KIT

Guide selection tool (1, 2)

Drilling tool (3, 4)

Path check tool (5, 6)

1 Single guide

2 Bridge guide

3 Initial drill

4 Ø2.2 Twist tdrill

5 Guide pin

6 Guide pin for Implant (Mini)

Guide pin for Implant (Regular)

4 User guide for KIT

Includes tools that can be selected according to the size of the missing teeth so that the distance and direction can be adjusted during drilling.

1 Single guide

7~8.5mm 9~10.5mm 11~12.5mm

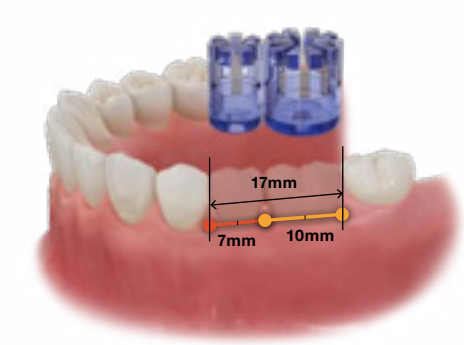
2 Bridge guide

❶ Single guide

Includes 6 types of specifications ranging from Ø5.0 to 10.0 in accordance with the mesiodistal diameter of the tooth.

User guide

· Check area with missing teeth.
· Select single guide.



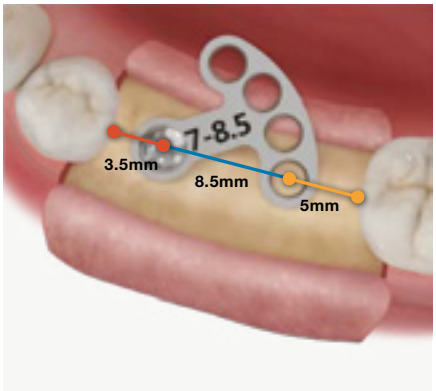
F	Ø5.0	Ø6.0	Ø7.0	Ø8.0	Ø9.0	Ø10.0
Single guide type	 SGB050	 SGB060	 SGB070	 SGB080	 SGB090	 SGB100
Recommended area	Mandibular central incisor, mandibular lateral incisor	Maxillary lateral incisor, mandibular lateral incisor	Maxillary canine, maxillary 1st premolar, maxillary 2nd premolar Mandibular canine, mandibular 1st premolar. mandibular 2nd premolar	Maxillary central incisor, maxillary canine	Maxillary 2nd molar	Maxillary 1st molar, mandibular 1st molar, mandibular 2nd molar

❷ Bridge guide

Guide can adjust the distance and direction during drilling (range: 7.0 ~ 12.5mm, 0.5mm increments)

User guide

· Check area with missing teeth.
· Select single guide.
· Connect the single guide to the initial drill.
· Perform drilling.
· Place the bridge guide into the drill hole.
· Set the distance and direction.



Includes a drilling tools that matches the guides.

❸ **Initial drill**

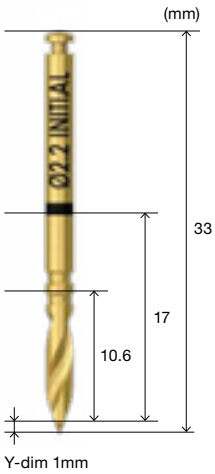
❹ **Ø2.2 Twist drill**

❸ Initial drill

Used for initial drilling. Drilling depth can be controlled when connected with Single Guide

User guide

· Connect Initial drill to the handpiece.
· Connect single guide tothe initial drill.
· Check the marking line of the initial drill, and drill at 800~1200rpm.

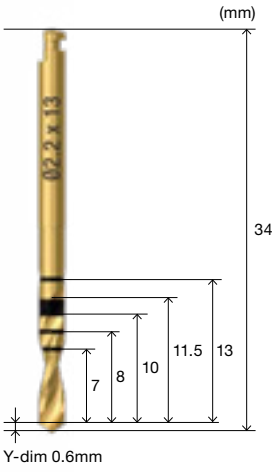


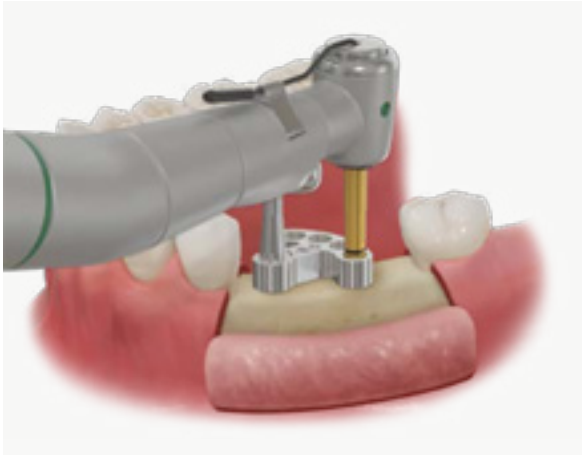
❹ Ø2.2 Twist drill

Use with bridge guide for initial drilling
* A twist drill cannot be used with a single guide

User guide

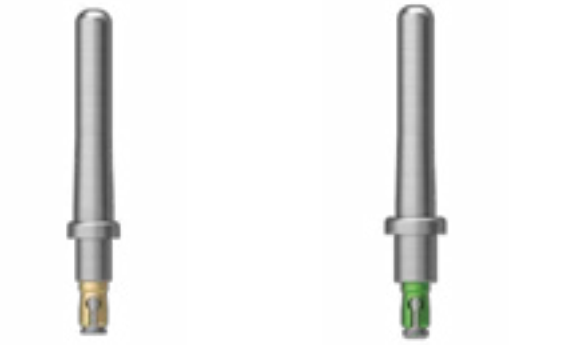
· Connect the Ø2.2 Twist drill to the handpiece.
· Place the Ø2.2 Twist drill into the hole of the bridge guide.
· Check the marking line of the Ø2.2 Twist drill, and drill at 800~1200rpm.





A tool that can check the path of the drilling site after drilling,
and check the final prosthesis space by placinga single guide on it.

5 Guide pin



Mini Regular

6 Guide pin for Implant

❺ Guide pin

Used for checking the path of the drilling site and serves as a pin for fixing the Single Guides.
Able to check the final prosthesis space by connecting it to the Single Guides.

User guide

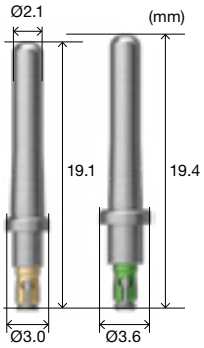
· Place the guide pin into the hole created after initial drilling.
· Place the single guide, which was used for initial drilling, on the guide pin.

❻ Guide Pin For Implant

Used for checking the position and size of the implant even after the implant is already placed, by placing it into the implant.

User guide

· After using the initial drill, place the implant with the 122 taper kit.
· Place the Guide Pin For Implant into the implant.
· Connect the same single guide that was used for the initial drill.



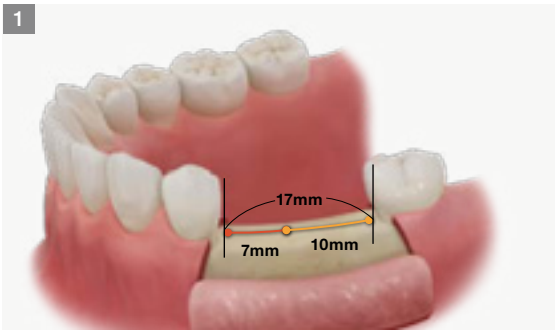
Mini Regular

5 KIT sequence

Placement using a single guide

Ⓝ: Tool number

1

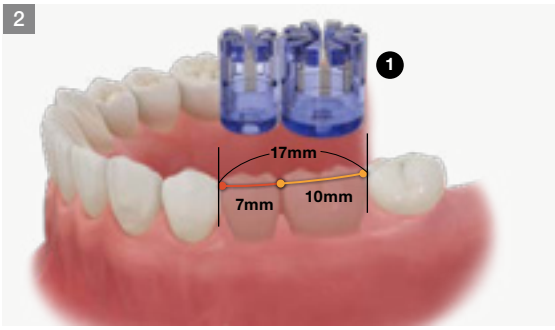


Check implant placement position in the mouth.

· Check the mesiodistal width of #35, 36.

	#35	#36
Mesiodistal width	7mm	10mm

2



Drilling: #35 (Initial drill / Ø7.0 single guide)

· Select single guide that matches the mesiodistal width.

· After placingt the Ø7.0 single guide on the initial drill, drill at position #35.

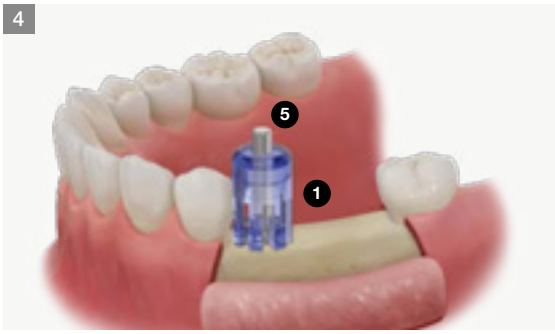
· Recommended RPM: 800~1,200rpm

3

Check position and direction (Guide pin)

· After placing the guide pin into the drill hole, check the drill position and direction.

4



Check direction (Ø7.0 single guide)

· After placing the Ø7.0 single guide on the guide pin, check the direction of the prosthesis.

5

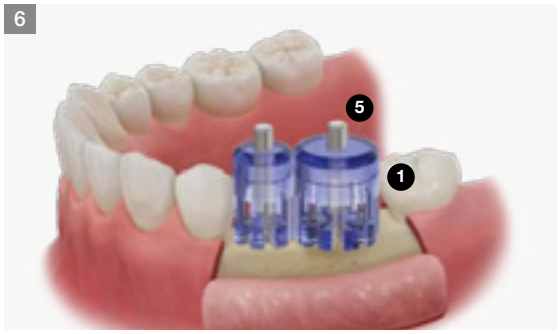
Drilling: #36 (Initial drill / Ø10.0 single guide)

· Select a single guide that matches the mesiodistal width.

· After placing the Ø10.0 single guide on the initial drill, drill at position #36.

· Recommended RPM: 800~1,200rpm

6



Check direction (Ø10.0 single guide)

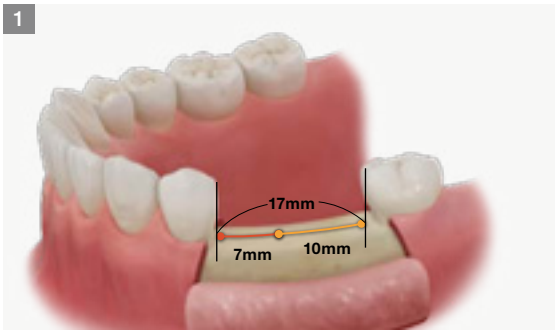
· After placing the Ø10.0 single guide on the guide pin, check the direction of the prosthesis.

· Then, proceed with ordinary implant surgery.

Placement using a bridge guide

Ⓝ: Tool number

1

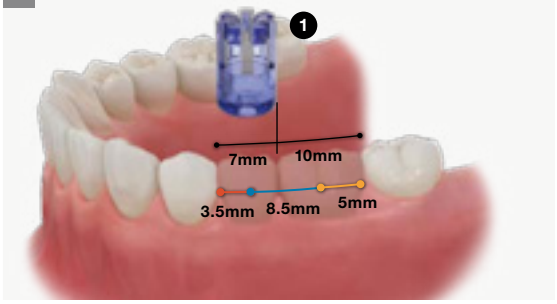


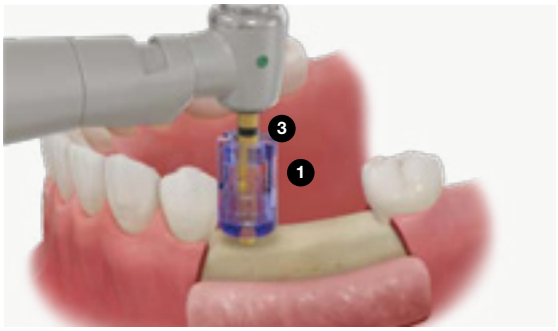
Check implant placement position in the mouth.

· Check the mesiodistal width of #35, 36.

	#35	#36
Mesiodistal width	7mm	10mm

2





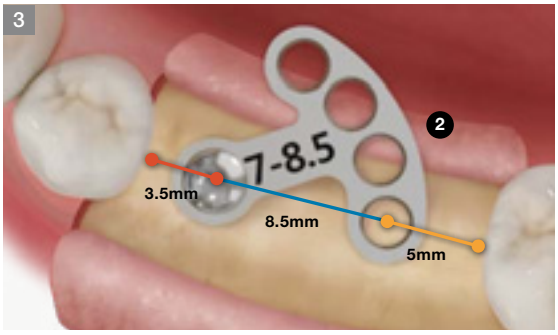
Drilling: #35 (Initial drill / Ø7.0 Single guide)

· Select a single guide that matches the mesiodistal width.

· After placing the Ø7.0 single guide on the initial drill, drill at position #35.

· Recommended RPM: 800~1,200rpm

3



Select guide: #35
(7~8.5mm bridge guide-fan type)

· Match the length between the center of #35 and #36 which is 8.5mm.

4

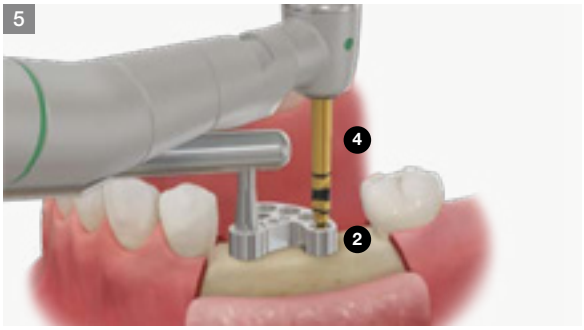
Connect guide: #35
(7~8.5mm bridge guide-fan type)

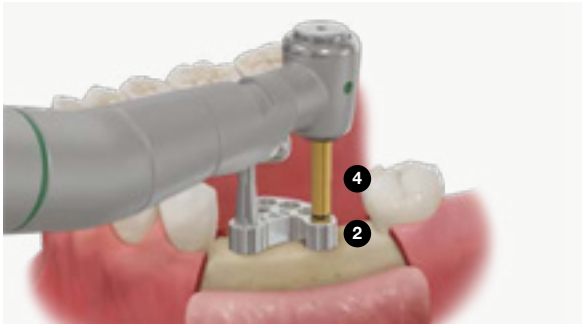
· Connect a multi joint handle to the 7~8.5mm bridge guide-fan type outside the oral cavity.

· Place the fastened bridge guide at #35 in the oral cavity.

· Te 8.5mm hole of the bridge guide should be positioned at #36.

5



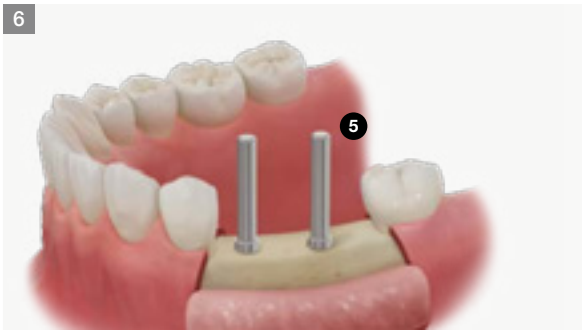


Drilling: #36 (Ø2.2 twist drill)

· After positioning the 8.5mm hole of the 7~8.5mm bridge guide-fan type at #36, drill with a Ø2.2 twist drill.

· Recommended RPM: 800~1,200rpm

6



Check position and direction (guide pin)

· After placintg the guide pin into the drill hole, check the drilling position and direction.

7

Check direction (Ø10.0 single guide)

· After placing the Ø10.0 single guide on the guide pin, check the direction of the prosthesis.

· Then, proceed with ordinary implant surgery

Positioning Guide **Full** KIT

KIT that enables easy placement and direction setting in partially edentulous cases and also fully edentulous cases without using a surgical stent.

Denture guide

Drilling with a 2.2 Twist drill on the median line.

Place the the Denture Guide in the hole on median line

Adjust the Denture guide's arch according to Dental arch of patient

Fix denture guide with L-wrench

Use 2.2 twist drill to drill

Place distance setup pin

Drilling with 2.2 Twist drill on the opposite side

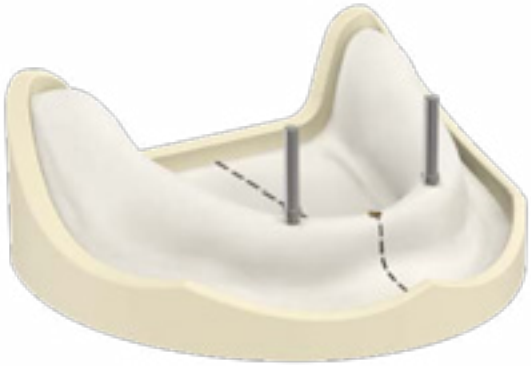
Connect guide pin and check drilling path

1 Indication

A When you wish to place implant in correct position

B When you wish to place implant in correct direction

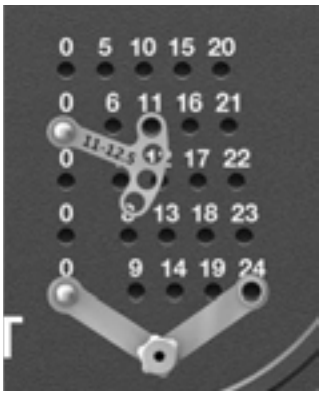
C When you wish to place implant without a surgical stent (single case, bridge case, or edentulous case)



2 Features

A Distance setting range is larger than that of the fan type bridge guide

· Compass type bridge guide can set distance ranging from 5mm to 24mm in 1mm increments.
The distance setting range is larger than that of the fan type bridge guide.



B Has a multi joint handle, making it easier to use guides when intermaxillary space is narrow.

· Connecting the bridge guide to the handle outside the oral cavity offers more stability and convenience when intermaxillary space is narrow.

C The denture guide can be adjusted according to the dental arch of the patient

· Denture guide's angle can be adjusted according to the shape of the patient's arch (completely edentulous case).

3 Tools of KIT

Positioning Guide Full KIT

Guide selection tool (1, 2) | Drilling tool (3) | Anchoring tool (4~6) | Path check tool

Single guide

Bridge guide

1 Bridge Guide -Compass Type

2 Denture Guide (bottom tray)

Initial drill

Ø2.2 Twist tdrill

3 Ø3.0 Twist drill

4 Distance Setup Pin

5 Multi joint Handle (bottom tray)

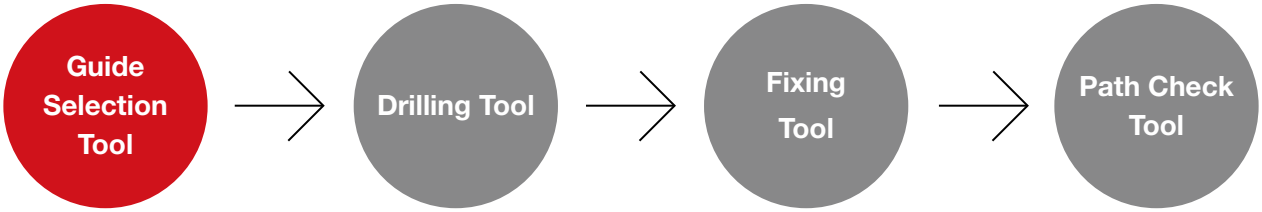
6 L-Wrench (bottom tray)

Guide pin

Guide pin for Implant (Mini)

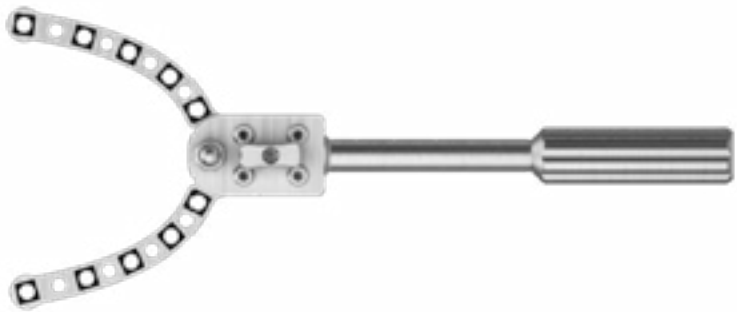
Guide pin for Implant (Regular)

4 User guide for KIT



Includes tools that can be selected according to the size of the missing teeth so that the distance and direction can be adjusted during drilling.

1 Bridge Guide-Compass Type



2 Denture Guide

❶ Bridge Guide - Compass Type

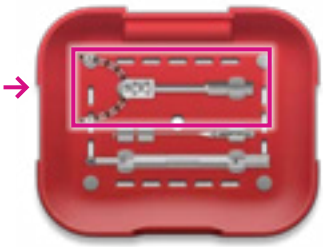
Guide that controls the distance and direction during drilling.

User guide

· Check area with missing teeth.
· Select single guide.
· Connect the single guide to the initial drill.
· Perform drilling.
· Adjust the distance of the bridge guide compass type with the indicator on the middle plate of the KIT.
· Fix the anchoring part of the compass type bridge guide by rotating it clockwise.

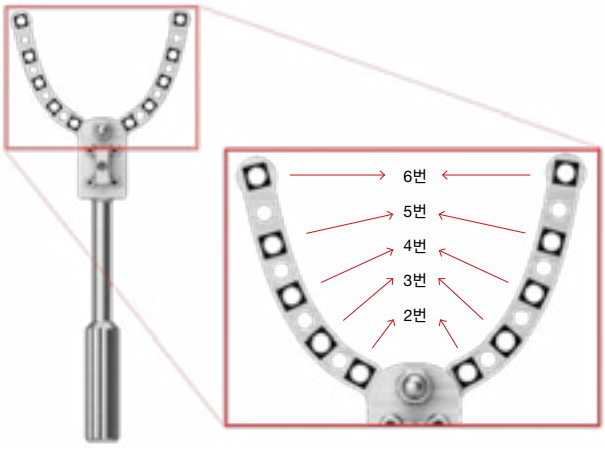
❷ Denture Guide

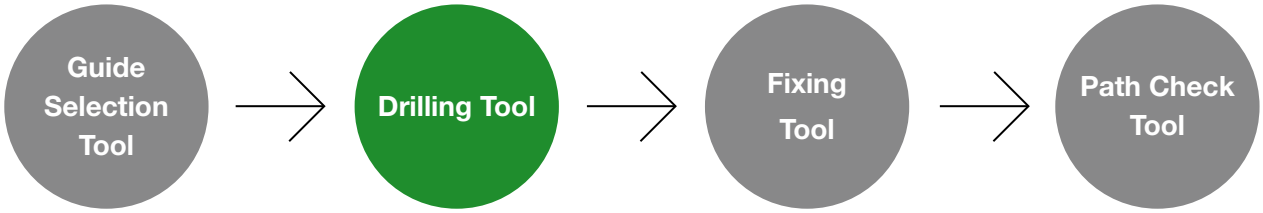
Guide with adjustable arch that fits individual dental arches of edentulous patients



User guide

· Drill the midline area with a Ø2.2 twist drill on the median line of the dental arch.
· Place the denture guide into the hole on median line.
· Adjust the arch shape according to the patient's dental arch.





It consists of a drilling tools that can be used with the guides.

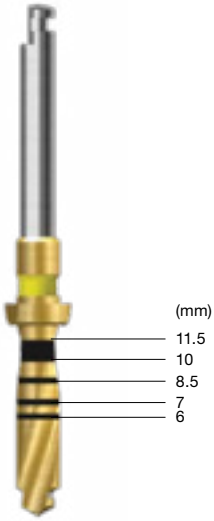
3 Ø3.0 Twist drill

❸ Ø3.0 Twist drill

The drill is used after drilling with the Ø2.2 twist drill for guiding the drill path

User guide

· Connect the Ø2.2 Twist drill to the handpiece.
· Connect the Ø2.2 Twist drill to the bridge guide.
· Check the marking line of the Ø2.2 Twist drill, and drill at 800~1200rpm.
· Remove the bridge guide.
· Connect the Ø3.0 Twist drill to the handpiece.
· Place the Ø3.0 Twist drill into the hole that was formed with the Ø2.2 Twist drill, and drill at 800~1,200rpm.



Guide Selection Tool → Drilling Tool → **Fixing Tool** → Path Check Tool

Includes tools used for fixing the bridge guide and the denture guide.

4 Distance Setup Pin

5 Multi joint Handle

6 L-Wrench

❹ Distance Setup Pin

Used for fixing the the compass type bridge guide after adjusting distance

User guide

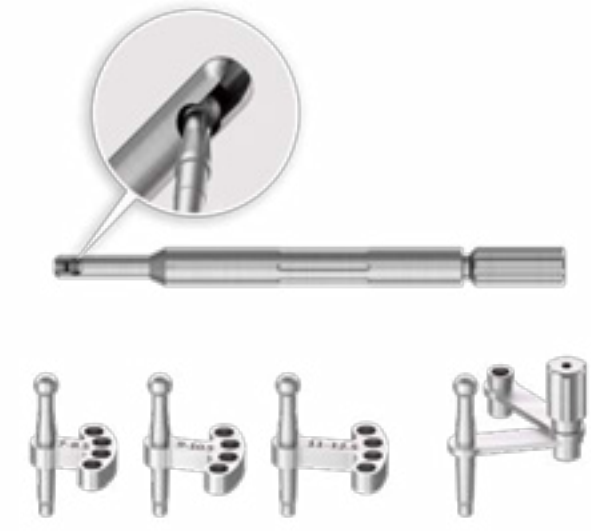
· Place the compass type bridge guide on the indicator of the middle tray of the KIT.
· When the distance is set, connect the Distance set up pin and fix the guide by rotating the center of the compass type bridge guide.
· After removing the distance setup pin, place the compass type bridge guide into the drill hole.

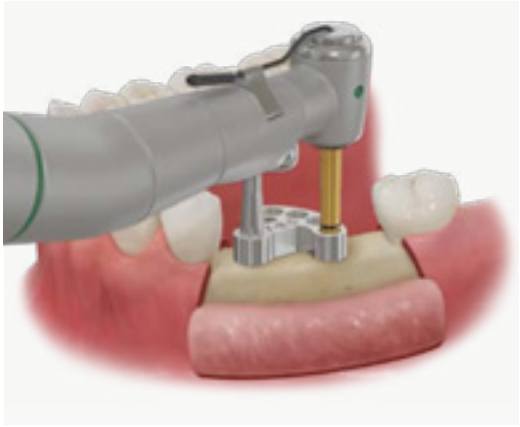
❺ Multi joint Handle

Tool for fixing the the Guide outside of the oral cavity.

User guide

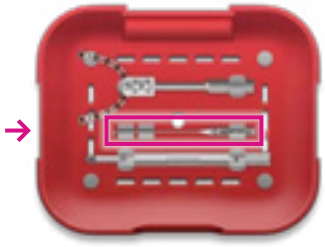
· Connect the multi joint handle to the bridge guide outside the oral cavity.





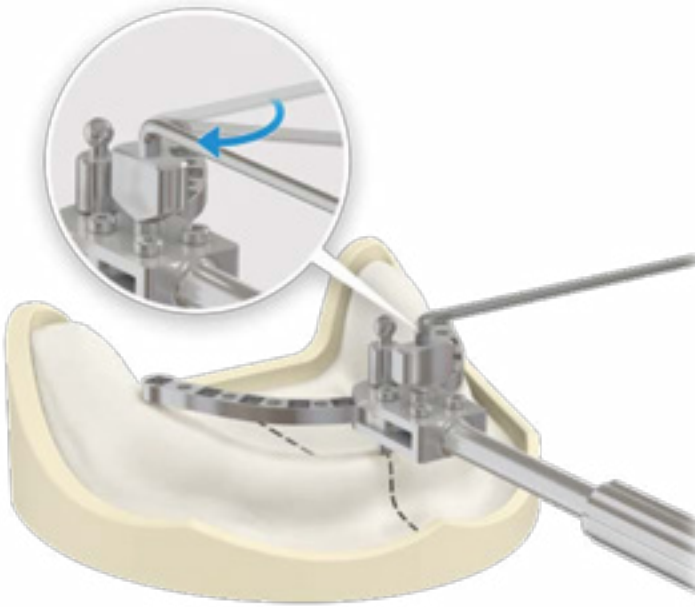
❻ L-Wrench

Tool that anchors the denture guide after adjusting the angle according to the shape of the patient's arch.



User guide

· When the denture guide is adjusted according to the patient's dental arch form, anchor the denture guide with the L-wrench.



5 KIT sequence

Placement using a denture guide

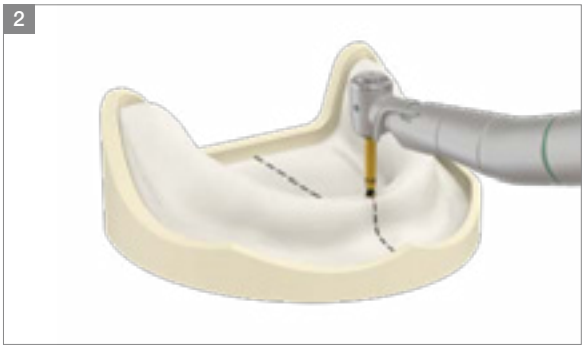
Ⓝ: Tool number

1

Setting the median inside the oral cavity

· Find and mark the median line in the oral cavity.

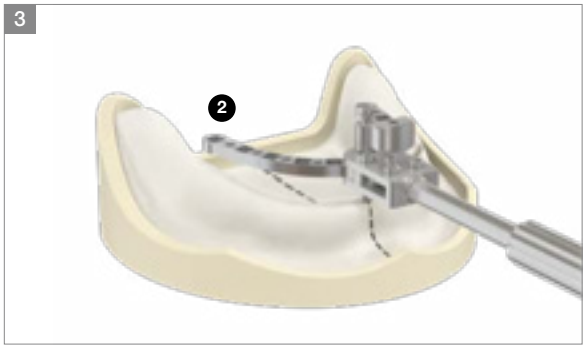
2



Midline drilling

· Expand the marking hole by drilling 10mm deep with the Ø2.2 twist drill.
· Ensure sufficient irrigation and pumping during drilling in order to prevent osteonecrosis.
· Recommended RPM: 800~1,200rpm

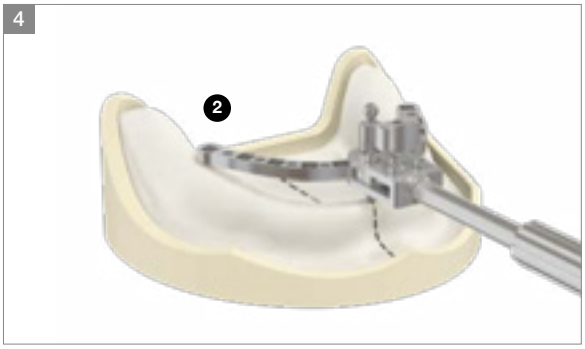
3



Place denture guide

· Place the denture guide into the hole at median line.

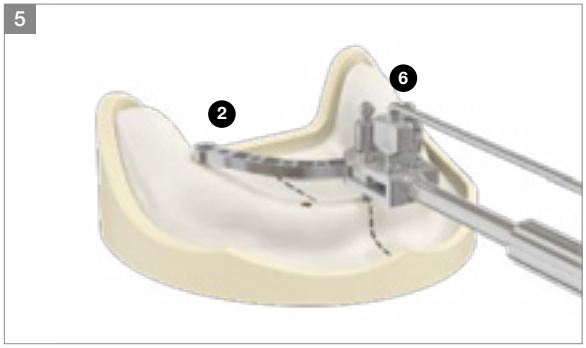
4



Adjust arch form

· Adjust the arch form of the denture guide according to the dental arch of the patient.

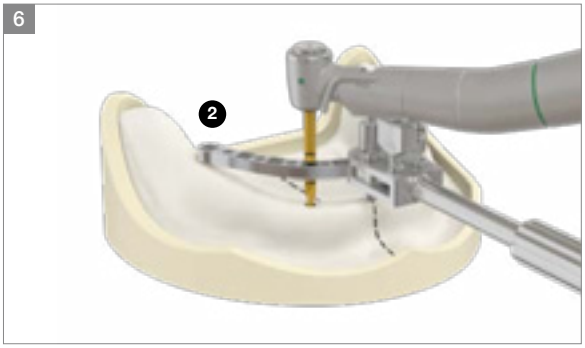
5



Fix with L-wrench

· Turn the L-wrench clockwise to fasten the denture guide..

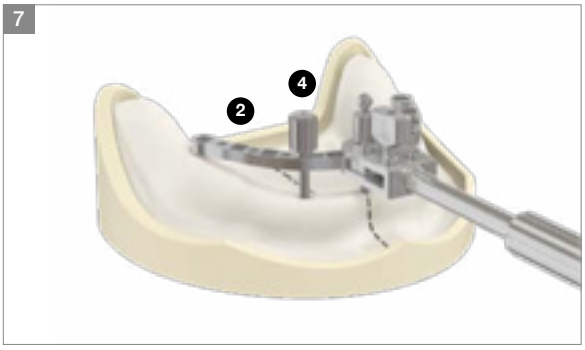
6



Drilling with Ø2.2 twist drill

· Check marking line and drill with a Ø2.2 twist drill as deep as the Implant that is planned to be placed.
· Ensure sufficient irrigation and pumping during drilling in order to prevent osteonecrosis.
· Recommended RPM: 800~1,200rpm

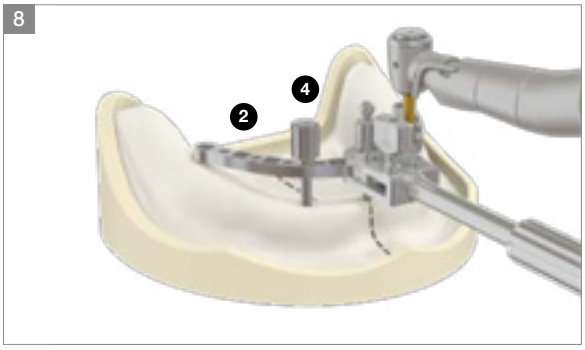
7



Place distance setup pin

· Place the distance setup pin into the drill hole and fix the denture guide.

8



Drilling with a Ø2.2 twist drill

· Check marking line and drill with a Ø2.2 twist drill as deep as the Implant that is planned to be placed.
· Ensure sufficient irrigation and pumping during drilling in order to prevent osteonecrosis.
· Recommended RPM: 800~1,200rpm

9

Connect guide pin and check drilling path

· Remove distance set up pin
· Remove the denture guide by turning the L-wrench counterclockwise.
· Check the path with the guide pins.

How to take care of the KITS

1

Soak (saline/distilled water)

· Soak the surgical instruments in saline or distilled water

2

Drying (remove moisture)

· Completely dry all drills, drivers, tools, etc by using a towel or fan.

3

First wash

· After surgery, immediately separate and wash all the used instruments.

4

Organize instruments in the KIT

· Place the completely dried instruments in the KIT
· Make sure they are properly placed in the correct location
· Refer to the color coding for reference

5

Second wash

· Thoroughly wash with distilled water or running water to avoid remnants of blood or foreign debris.

6

Sterilization and storage at room temperature

· Wrap clean kit in a sterilization wrap or pouch and place into sterilizer.
· Sterilize temperature - 121°C to 132°C, time duration 15 - 30 minutes, dried and stored at room temperature.
· KIT re-sterilization is recommended immediately before surgery.
· Before and after sterilization, thoroughly dry (the drills will corrode if not fully dried after sterilization)

Important Information and Legal Notices 2026.03 ver.1.1

1. IMPORTANT NOTICE

This catalogue is intended solely as an informational and educational guide for trained dental professionals. It does not replace the applicable Instructions for Use (IFU), product labelling, formal clinical training, treatment planning, or independent professional judgment.

All clinical protocols, drilling sequences, cleaning instructions, sterilization requirements, torque recommendations, indications, contraindications, warnings, and procedural steps must be verified against the current product-specific IFU and the applicable product label for the relevant REF/product code prior to use.

In the event of any discrepancy between this catalogue and the applicable IFU, product labelling, or other official Osstem documentation, the IFU, labelling, and official product documentation shall prevail.

2. PRODUCT INFORMATION, CHANGES, AND AVAILABILITY

All products, specifications, protocols, recommendations, illustrations, and other information contained in this catalogue are subject to change without prior notice.

Not all products may be approved, cleared, released, licensed, or otherwise available in all markets. Product availability, indications, and regulatory status may vary by country. For information on the current product portfolio, approved indications, and local availability, please contact your local Osstem representative or Customer Service and consult the current official Osstem documentation.

3. PROFESSIONAL USE ONLY

Osstem Implant products are intended for use by appropriately trained dental professionals only. Dental implant treatment involves complex professional procedures and requires appropriate education, clinical training, patient selection, treatment planning, and radiographic as well as clinical evaluation.

The suitability of any procedure must be assessed individually for each patient, taking into account anatomy, bone quality and quantity, occlusion, systemic conditions, oral hygiene, compliance, and any other relevant clinical factors.

4. PRODUCT DESCRIPTION AND COMPATIBILITY

Osstem Implant offers implant fixtures, prosthetic components, surgical instruments, and related materials for dental implant treatment. Product codes, specifications, lot numbers, dates of manufacture, and expiration dates, where applicable, must be checked on the product label before use.

Unless expressly stated otherwise in the applicable product documentation, Osstem Implant abutments, prosthetic components, instruments, and related accessories are intended to be used only with compatible Osstem Implant fixtures and components. Use in combination with components or instruments from other manufacturers may result in improper fit, incomplete locking, loosening, fracture, reduced performance, or other clinical complications.

5. STERILITY, CLEANING, REPROCESSING, AND STORAGE

Sterile products supplied in sterile packaging must be used only if the packaging is intact and the expiration date has not passed. If sterile packaging has been opened, damaged, or has expired, the product must not be used.

Single-use products must not be reused, reprocessed, or resterilized.

Reusable instruments must be cleaned, disinfected, inspected, maintained, and sterilized strictly in accordance with the applicable Osstem IFU before reuse.

Products must be stored in accordance with the applicable labelled storage conditions and protected from moisture, contamination, direct sunlight, and other adverse environmental conditions.

6. CLINICAL PROTOCOLS AND PROCEDURAL GUIDANCE

Any surgical, prosthetic, drilling, insertion, loading, cleaning, maintenance, or other procedural guidance shown in this catalogue is provided for general informational purposes only and must be adapted to the individual patient, the specific product, and the current approved IFU.

Clinicians remain solely responsible for selecting the appropriate treatment protocol and for determining whether the intended procedure, component selection, loading protocol, and clinical application are appropriate for the individual case and within the approved indications for the relevant product.

7. WARNINGS, CONTRAINDICATIONS, AND POSSIBLE COMPLICATIONS

Improper patient selection, inadequate treatment planning, non-compliance with the applicable IFU, improper use, off-label use, product modification, poor oral hygiene, infection, insufficient bone quality or quantity, excessive occlusal loading, or other unfavorable clinical conditions may result in complications or treatment failure.

Possible complications and adverse events may include, without limitation, implant instability or failure, loosening, fracture, bone loss, infection, soft- or hard-tissue complications, prosthetic complications, delayed healing, or the need for revision or removal.

Contraindications and precautions must always be assessed in accordance with the applicable Osstem product documentation and accepted professional standards of care.

8. INTENDED PURPOSE

The products are tools and instruments for surgical placement of Osstem implant fixtures. The drill is used to make implant sites. The cortical drill and tap removes cortical bones or forms threads on bone for the purpose of preventing excessive torque generated when implanting a fixture on hard bone. The drivers are for the placement of the fixture, and the prosthesis is used for setting. In addition, other instruments and tools will be used as aids in the Implant procedure.

The applicable product-specific IFU must always be consulted to confirm the intended purpose, indications, limitations, and approved clinical applications of the relevant product.

9. ACCURACY OF INFORMATION

Although reasonable care has been taken in preparing this catalogue, typographical, editorial, translation, printing, and formatting errors may occur. Information may also become outdated as a result of product updates, regulatory changes, technical revisions, or clinical developments.

No representation is made that this catalogue is complete, current, or error-free in every respect. Users must verify all critical information against the current IFU, product labels, and other official Osstem documentation before clinical use.

10. ILLUSTRATIONS AND EXAMPLES

Product illustrations, diagrams, radiographic examples, case images, and step-by-step demonstrations are for illustrative purposes only. Unless expressly stated otherwise, they are not shown to scale and do not guarantee any clinical outcome.

Example cases do not constitute a promise or representation of treatment success in any individual case.

11. TRADEMARKS AND COMPANY NAMES

All trademarks, trade names, product names, brand names, and company names are the property of their respective owners.

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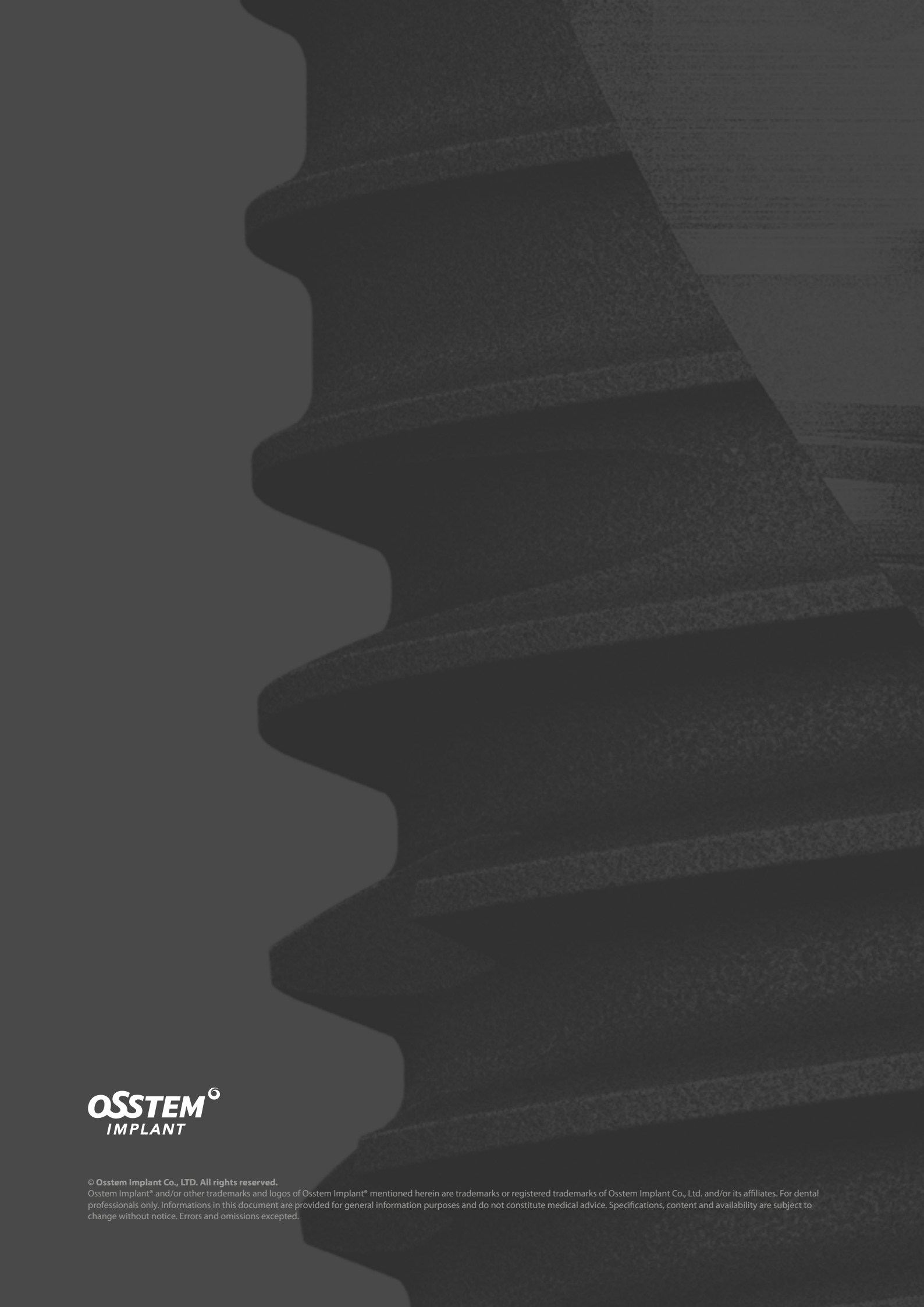

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