ROOTT

Cassetes U

SURGICAL CASSETTE TRS-MINI instructions for use

The TRS-mini surgical cassette has a new design and layout:
- Compact and easy to carry
- Laser markings on the tray
- Has drill length check

For implant systems: ROOTT R C CS M S

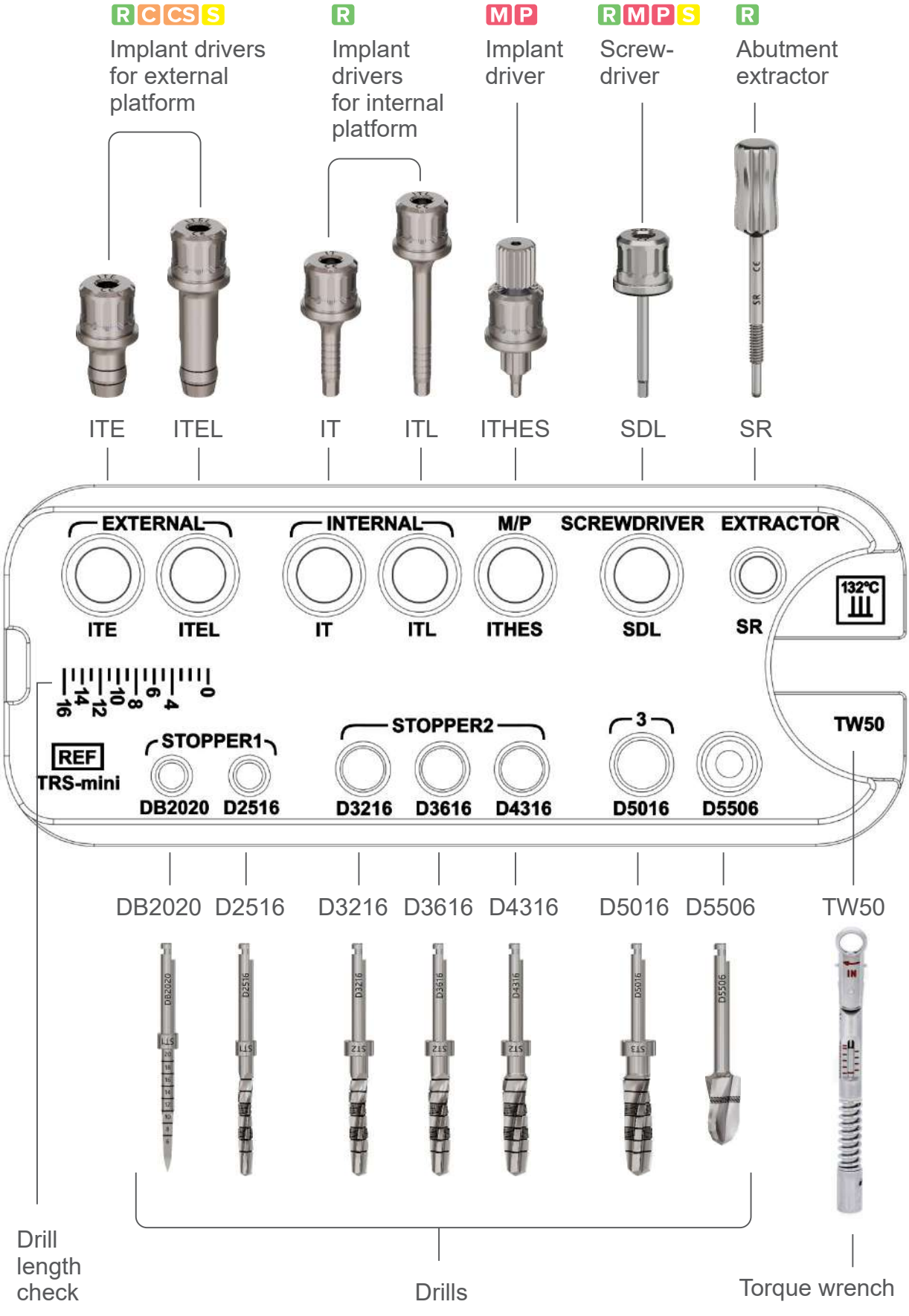
How to open and close TRS-mini surgical cassette

Take a cassette so that the logo of ROOTT is facing towards you. Push the coverlid to the right side till every instrument in the cassette is visible and remove coverlid.

Put the coverlid with the ROOTT logo facing towards you in the grooves, and push it to the left side until it covers all of the instruments.

Surgical cassette must be cleaned, disinfected and sterilized before use and between each use. Do not use damaged instruments.
Cassette does not include instruments, these are sold separately.

CONTENT


R C CS S
Implant drivers for external platform
R
Implant drivers for internal platform
M P
Implant driver
R M P S
Screw-driver
R
Abutment extractor
ITE
ITEL
IT
ITL
ITHES
SDL
SR
EXTERNAL
INTERNAL
M/P
SCREWDRIVER
EXTRACTOR
132°C
ITE
ITEL
IT
ITL
ITHES
SDL
SR
16 14 12 10 8 6 4 0
REF
TRS-mini
STOPPER1
DB2020
D2516
STOPPER2
D3216
D3616
D4316
3
D5016
D5506
TW50
DB2020
D2516
D3216
D3616
D4316
D5016
D5506
TW50
Drill length check
Drills
Torque wrench

Drills

Lance drill DB2020 can be used for initial drilling by setting the drilling axis before using tapered drills. Drill has laser markings every 2 mm from 6 to 20 mm.

DB2020

Drill D5506 is used for cortical drilling.
As optional solution to widen the osteotomy.

D5506

Tapered drills are used for final cavity preparation. Use a drill with a diameter lower than the diameter of the implant to be placed. Drill to the appropriate depth, required for a specific case. Laser markings every 2 mm from 4 to 16 mm.

D2516

D3216

D3616

D4316

D5016

Screwdriver

For all ROOTT dental implant system screws. Long screwdriver is suitable for all superstructures. Conical tip of the hex helps to grab screw.

SDL

Implant drivers

For external platform. To control the implant insertion depth, have two lasered round lines at 2 and 4 mm.

ITE

ITEL

Hole for lifting in case if tool is stacked

For internal platform. Have length indicators.

IT

ITL

Length indicators 1 mm between each line

For M platform via carrier. Consists of two parts: implant driver and screwdriver.

ITHES SITHES

Abutment extractor

For easy superstructure removal in case if conical connection hold tight a part inside of ROOTT R implant.

SR

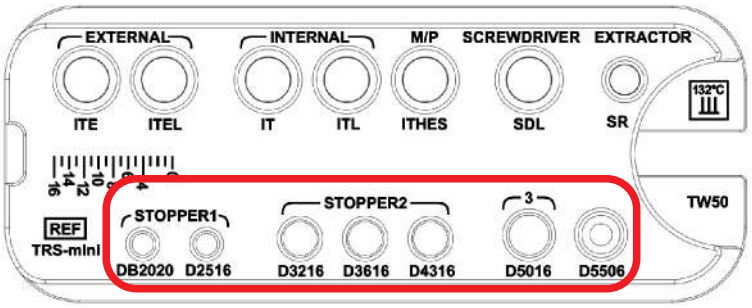
Torque wrench

Torque wrench is suitable for all instruments with head for ratchet. Maximal torque is 50 Ncm.

TW50

Example:
ROOTT R implant
Ø 3.8 mm
Length – 12 mm

R3812 DB2020 D2516 D3216 D3616 D5506



Step 1 Take a lance drill DB2020 to make the first mark on the bone.

Step 2 Use drill length check to check drill length. Use laser marking to identify position with regards to intraosseous length of implant. Drill to the same depth as implant length.

Step 3 Take a tapered drill D2516 to enlarge the diameter of the hole. Use wider tapered drills to prepare hole for wider diameter implants.

**Optional*
If after using the previous drill the torque is still more than 50 Ncm while inserting the implant, the cavity has to be widened. Just widen the osteotomy with drill D5506.

NOTE!
Not suitable for all implants and all bone densities.
See table 1.

Full drilling protocol for ROOTT R implants

Drilling protocol for TRS-mini set

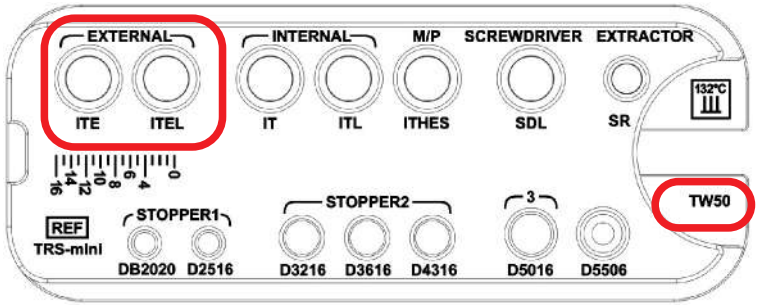



Implant	D4 BONE	D2-D3 BONE	D1 BONE
Ø 3.0 mm	X	DB2020 D2516	X
Ø 3.5 mm	DB2020 D2516	X	DB2020 D2516 D3216
Ø 3.8 mm	X	DB2020 D2516 D3216	DB2020 D2516 D3216 D3616
Ø 4.2 mm	X	DB2020 D2516 D3216	DB2020 D2516 D3216 D3616
Ø 4.8 mm	DB2020 D2516 D3216 D3616	X	DB2020 D2516 D3216 D3616 D4316
Ø 5.5 mm	X	DB2020 D2516 D3216 D3616 D4316 D5016	X

Table 1

Example:
ROOTT R implant
Ø 3.8 mm
Length – 12 mm

R3812 ITE ITEL



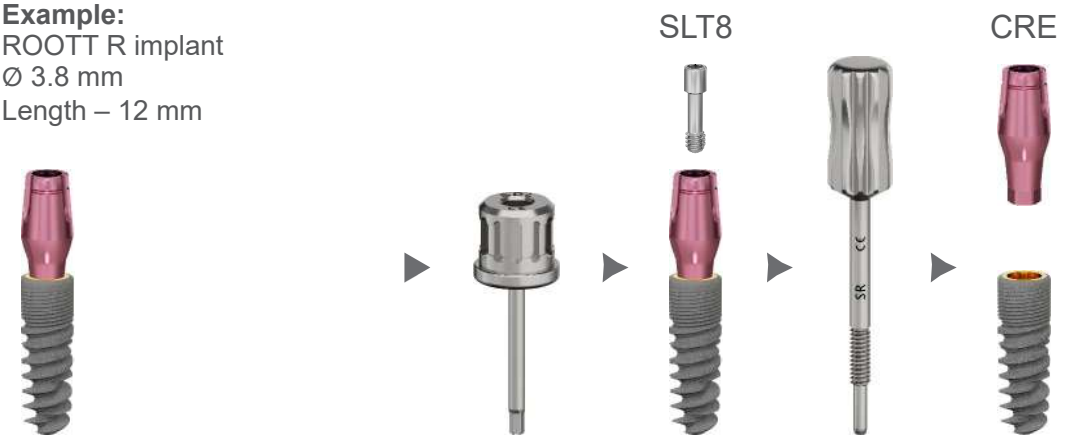
Step 1 Take an implant driver for external platform ITE/ITEL for inserting an implant via a carrier.

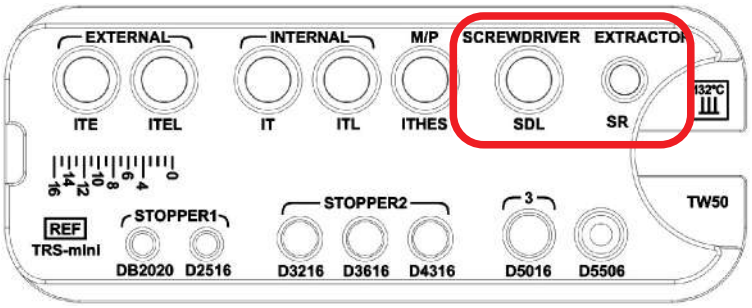
Step 2 Insert ITE/ITEL into the torque wrench TW50 and tighten the implant by rotating the wrench clockwise.

When the set torque is reached, the scale sleeve snaps around the axis in the wrench head.
The release can be heard and felt.

Do not continue to use the wrench after the torque is achieved.
The wrench or dental components could be damaged.

Example:
ROOTT R implant
Ø 3.8 mm
Length – 12 mm





Step 1 Take a multipurpose screwdriver SDL for screwing & unscrewing any screw of ROOTT dental implant system.

Due to the conical tip of the hex, it is more manageable to take out the screw from the superstructure. Therefore if struggling to remove the screw from the superstructure, movement side to side before pulling out is allowed.

Step 2 Unscrew screw SLT8 from CRE.

Step 3 Take an abutment extractor SR. Screw SR instead of your screw until part is released and remove CRE.

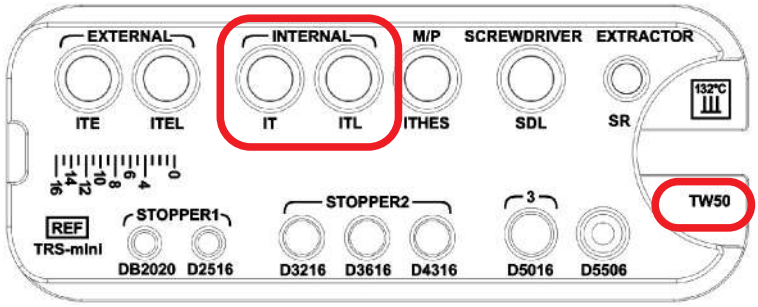
Abutment extractor SR - for easy superstructure removing in case if your conical connection hold tight a part inside of ROOTT R implant

STEP 4: Implant insertion directly

Example:
ROOTT R implant
Ø 3.8 mm
Length – 12 mm

R3812

IT ITL



Step 1 Take an implant driver for internal platform IT/ITL for inserting ROOTT R implants when the carrier part is removed.

Step 2 Place IT/ITL to torque wrench TW50 and insert implant to the prepared hole.

When the set torque is reached. The scale sleeve snaps around the axis in the wrench head. The release can be heard and felt.

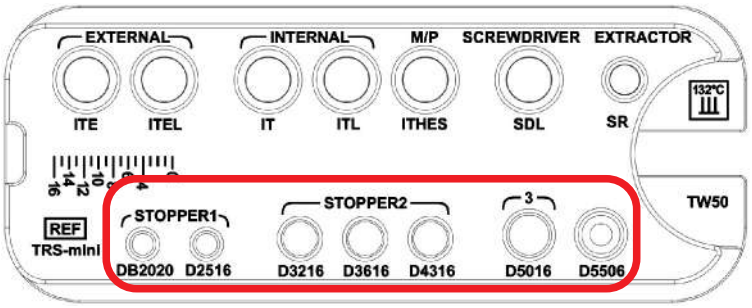
Do not continue to use the wrench after the torque is achieved. The wrench or dental components could be damaged.

For detailed information please read ROOTT R implant placement protocol

Example:
ROOTT C implant
Ø 4.0
Length – 12 mm

C4012

DB2020 D2516 D3216 D5506



Step 1 Take a lance drill DB2020 to make the first mark on the bone.

Step 2 Use drill length check to check drill length. Use laser marking to identify position with regards to intraosseous length of implant. Drill to the same depth as implant length.

Step 3 Take a tapered drill D2516 to enlarge the diameter of the hole. Use wider tapered drills to prepare hole for wider diameter implants.

**Optional*
If after using the previous drill the torque is still more than 50 Ncm while inserting the implant, the cavity has to be widened. Just widen the osteotomy with drill D5506.

NOTE!
Not suitable for all implants and all bone densities. See table 2.

Full drilling protocol for ROOTT C/CS implants

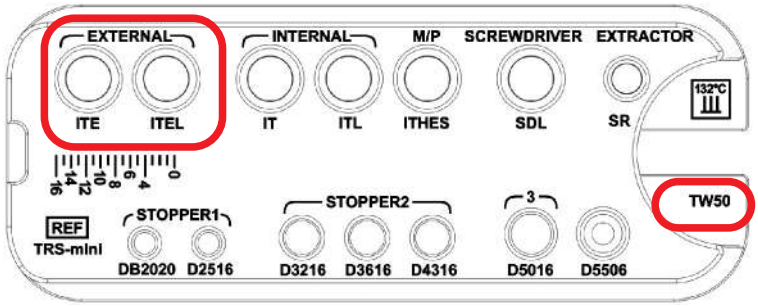
Drilling protocol for TRS-mini set

Implant	D4 BONE	D2-D3 BONE	D1 BONE	* - drill to the depth as specified
Ø 3.0 mm	DB2020	X	DB2020 D2516*	*C3006, C3008 - 4mm C3010, C3012 - 6 mm C3014, C3016 - 8 mm C3016, C3020 -10 mm
Ø 3.5 mm	X	DB2020 D2516*	X	*C3506, C3508 - 4mm C3510, C3512 - 6 mm C3514, C3516 - 8 mm C3516, C3520 -10 mm
Ø 4.0 mm	6-20 mm DB2020 D2516*	X	6-8 mm DB2020 D2516 D3216* 10-20 mm DB2020 D2516* D3216*	*C4006, C4008 - 4mm C4010, C4012 - 6 mm C4014, C4016 - 8 mm C4016, C4020 -10 mm
Ø 4.5 mm	X	6-20 mm DB2020 D2516 D3216*	6-20 mm DB2020 D2516 D3216* D3616*	*C4506, C4508 - 4mm C4510, C4512 - 6 mm C4514, C4516 - 8 mm C4516, C4520 -10 mm
Ø 5.0 mm	6-8 mm DB2020 D2516 D3216 10-14 mm DB2020 D2516* D3216*	6-8 mm DB2020 D2516 D3216 D3616 10-14 mm DB2020 D2516 D3216* D3616*	X	*C5006, C5008 - 4mm C5010, C5012 - 6 mm C5014 - 8 mm
Ø 5.5 mm	X	6-8 mm DB2020 D2516 D3216 D3616 D4316* 10-14 mm DB2020 D2516 D3216* D3616* D4316*	X	*C5506, C5508 - 4mm C5510, C5512 - 6 mm C5514 - 8 mm

Table 2

Example:
ROOTT C implant
Ø 4.0
Length – 12 mm

C4012 ITE ITEL



Step 1 Take an implant driver for external platform ITE/ITEL for inserting an implant via a carrier.

Step 2 Place ITE/ITEL to torque wrench TW50 and insert implant to the prepared hole.

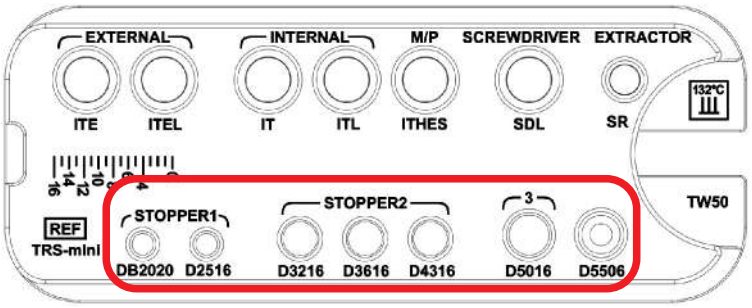
When the set torque is reached, the scale sleeve snaps around the axis in the wrench head. The release can be heard and felt.

Do not continue to use the wrench after the torque is achieved. The wrench or dental components could be damaged.

For detailed information please read ROOTT C/CS implant placement protocol

Example:
ROOTT M implant
Ø 4.0
Length – 12 mm

C4012m DB2020 D2516 D3216 D3616 D5506



Step 1 Take a lance drill DB2020 to make the first mark on the bone.

Step 2 Use drill length check to check drill length. Use laser marking to identify position with regards to intraosseous length of implant. Drill to the same depth as implant length.

Step 3 Take a tapered drill D2516 to enlarge the diameter of the hole. Use wider tapered drills to prepare hole for wider diameter implants.

**Optional*
If after using the previous drill the torque is still more than 50 Ncm while inserting the implant, the cavity has to be widened. Just widen the osteotomy with drill D5506.

NOTE!
Not suitable for all implants and all bone densities.
See table 3.

Full drilling protocol for ROOTT M implants

ROOTT M

Drilling protocol for TRS-mini set



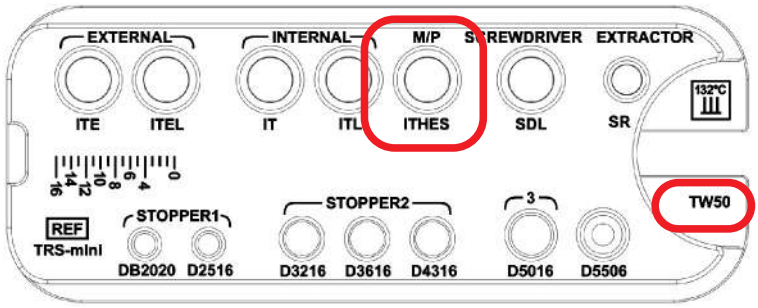

Implant	D4 BONE	D2-D3 BONE	D1 BONE	* - drill to the depth as specified
Ø 3.0 mm	DB2020	X	DB2020 D2516*	*C3008m - 4mm C3010m, C3012m - 6 mm C3014m, C3016m - 8 mm C3016m, C3020m -10 mm
Ø 3.5 mm	X	DB2020 D2516*	X	*C3506m, C3508 m- 4mm C3510m, C3512m - 6 mm C3514m, C3516m - 8 mm C3516m, C3520m -10 mm
Ø 4.0 mm	X	DB2020 D2516* D3216*	DB2020 D2516 D3216* D3616*	*C4006, C4008 - 4mm C4010, C34012 - 6 mm C4014, C4016 - 8 mm
Ø 5.0 mm	X	DB2020 D2516 D3216* D3616* D4316*	X	*C5006, C5008 - 4mm C5010, C5012 - 6 mm C5014 - 8 mm
Ø 6.0 mm	X	DB2020 D2516 D3216 D3616* D4316* D5016*	X	*C6006, C6008 - 4mm C6010, C6012 - 6 mm C6014 - 8 mm

Table 3

Example:
ROOTT M implant
Ø 4.0
Length – 12 mm

C4012m

ITHES
+ SITHES



Step 1 Take an implant driver ITHES for inserting ROOTT M implants via the carrier.

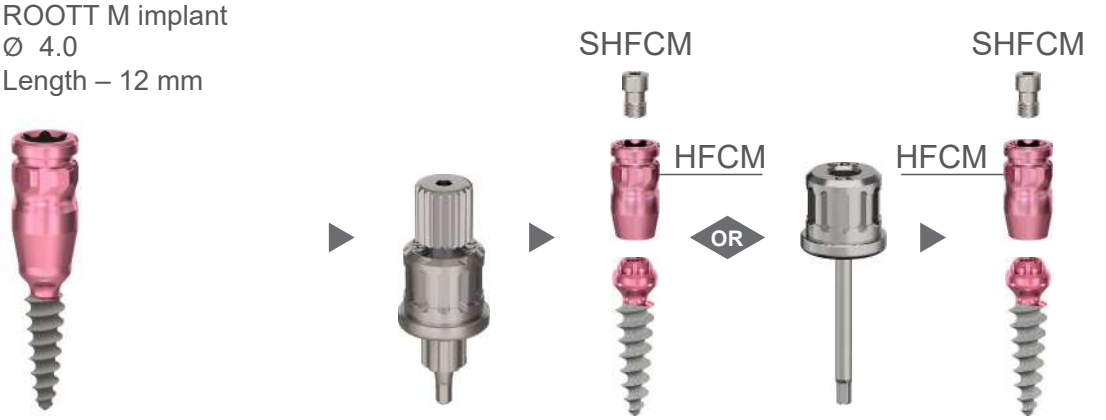
Step 2 Place ITHES to torque wrench TW50 and insert implant to the prepared hole.

When the set torque is reached, the scale sleeve snaps around the axis in the wrench head. The release can be heard and felt.

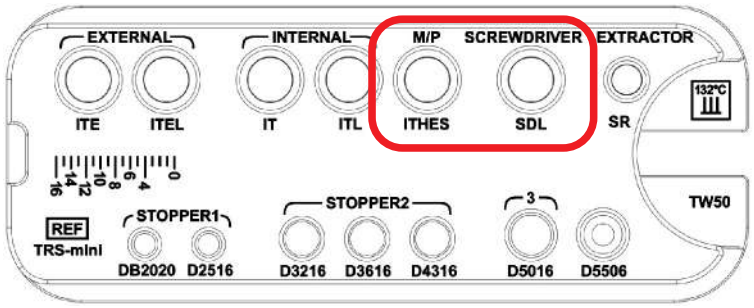
Do not continue to use the wrench after the torque is achieved. The wrench or dental components could be damaged.

STEP 3: Removing carrier

Example:
ROOTT M implant
Ø 4.0
Length – 12 mm



C4012m | ITHES + SITHES | ROOTT M implant | SDL | ROOTT M implant



Step 1 Carrier can be removed without removing the implant driver ITHES using its screwdriver SITHES.

Use screwdriver SITHES to unscrew SHFCM screw and remove carrier HFCM.

Step 2 Take a multipurpose screwdriver SDL for screwing & unscrewing any screw of ROOTT dental implant system.

Due to the conical tip of the hex, it is more manageable to take out the screw from the superstructure. Therefore if struggling to remove the screw from the superstructure, movement side to side before pulling out is allowed.

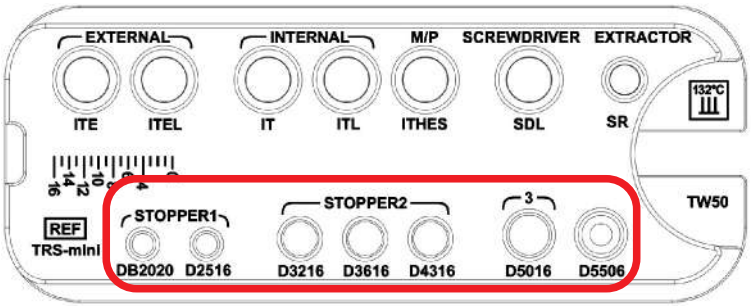
Step 3 Unscrew screw SHFCM and remove carrier HFCM.

For detailed information please read ROOTT M implant placement protocol

Example:
ROOTT S implant
Ø 3.0
Length – 12 mm

C3012ms

DB2020 D2516 D5506



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Step 3 Take a tapered drill D2516 to enlarge the diameter of the hole. Use wider tapered drills to prepare hole for wider diameter implants.

**Optional*
If after using the previous drill the torque is still more than 50 Ncm while inserting the implant, the cavity has to be widened. Just widen the osteotomy with drill D5506.

NOTE!
Not suitable for all implants and all bone densities.
See table 4.

Full drilling protocol for ROOTT S implants

Drilling protocol for TRS-mini set



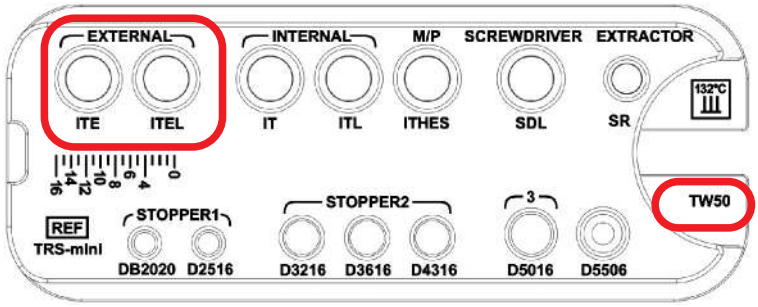

Implant	D4 BONE	D2-D3 BONE	D1 BONE	* - drill to the depth as specified
Ø 3.0 mm	DB2020	X	DB2020 D2516*	*C3008ms - 4mm C3010ms, C3012ms - 6 mm C3014ms, C3016ms - 8 mm
Ø 3.5 mm	X	DB2020 D2516*	X	*C3506ms, C3508ms- 4mm C3510ms, C3512ms - 6 mm C3514ms, C3516ms - 8 mm

Table 4

Example:
ROOTT S implant
Ø 3.0
Length – 12 mm

C3012ms

ITE ITEL



Step 1 Take an implant driver for external platform ITE/ITEL for inserting an implant via the carrier.

Step 2 Place ITE/ITEL to torque wrench TW50 and insert implant to the prepared hole.

When the set torque is reached, the scale sleeve snaps around the axis in the wrench head. The release can be heard and felt.

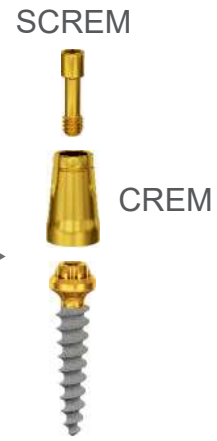
Do not continue to use the wrench after the torque is achieved. The wrench or dental components could be damaged.

STEP 3: Removing carrier

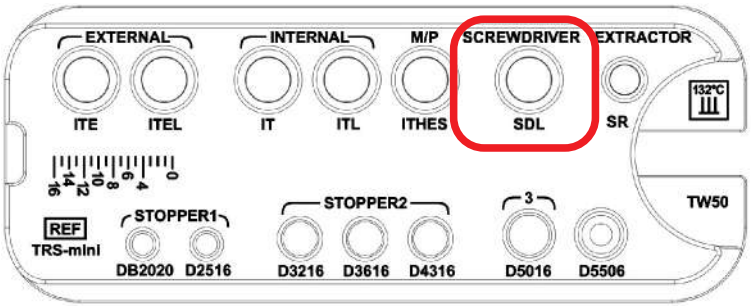
Example:
ROOTT S implant
Ø 3.0
Length – 12 mm

C3012ms

SDL



ROOTT S implant



Step 1 Take a multipurpose screwdriver SDL for screwing & unscrewing any screw of ROOTT dental implant system.

Due to the conical tip of the hex, it is more manageable to take out the screw from the superstructure. Therefore if struggling to remove the screw from the superstructure, movement side to side before pulling out is allowed.

Step 2 Unscrew screw SCREM and remove carrier CREM.

For detailed information please read ROOTT M implant placement protocol

ROOTT

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TRATE

Medical devices under these instructions are in compliance with established in EU regulatory requirements.

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2022.11