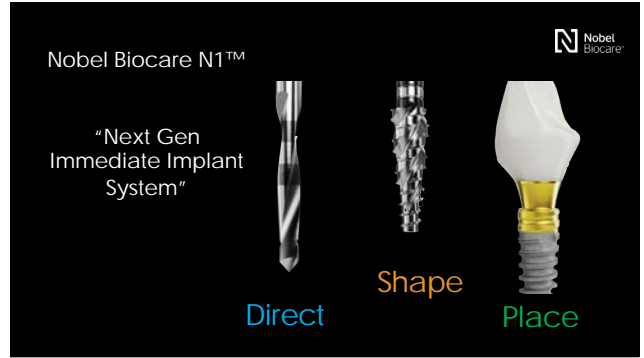




1



2



3



4



5



6



7

What does it take to make the site preparation protocol more biology-friendly?

- Minimize zone of death & increase number of viable cells
- Reduce heat so that irrigation is no longer needed
- Reduce irrigation in order to keep the bone chips within the site

8

OsseoShaper™

- Threads control precise insertion and estimation of bone quality
- Cutting flute designed for high efficiency at low speeds (<50 rpm)
- Tapered body gently shapes osteotomy to match the implant profile
- Non-cutting tip for added safety and guidance

50
40

9

Underneath conventional site preparation

Zone of death

Courtesy of J&J Helms

10

Faster healing in preclinical studies

| | Day 0 Cell death ¹ | Day 3 Bone resorption ² | Day 7 Bone formation ³ |
|-------------|----------------------------------|---------------------------------------|--------------------------------------|
| High-speed | | | |
| OsseoShaper | | | |

200 μm

References in appendix

11

Increase patient comfort

The **OsseoShaper** produces significantly less noise than conventional high-speed drills, contributing to improving patient comfort.


Zemp J, Velkov S, Weißbrodt S, et al. New Low-speed Site Preparation Protocol Significantly Reduces Noise. J Dent Res. 2020;99 (Spec Iss A):3053. (1-3)

12

Simplified site preparation with maximized control and predictability

Preclinical studies* show that the **OsseoShaper** concept

- reduces the zone-of-death
- retains vital bone chips
- enables faster bone formation and shorter healing
- assists in the estimation of bone quality
- provides predictable implant insertion torques during site preparation



13

OsseoShaper™ 1

No irrigation

50 RPM

40 RPM

Full depth



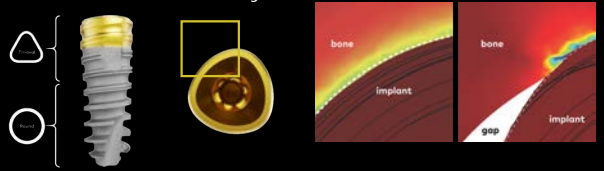
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Place



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Less strain, more stability



16

Designed for stability and fast osseointegration

Compared to round implants, the **tri-oval** implants have:

- better lateral stability both immediately and over time in rat models (n=6)
- a smaller zone-of-death
- higher cell viability
- less bone resorption
- faster osseointegration



Yeo X, Li J, Hoffmann W, Casper A, Burnell JB, Henry JA. Mechanical and Biological Advantages of a Tri-Oval Implant Design. J Clin Med. 2019;8(4):1-13.

17

Nobel Biocare N1™ Implant

25 RPM

70 RPM

Tri-oval conical connection (TCC) directs abutments for specific fit

Microthreads create a high stability zone

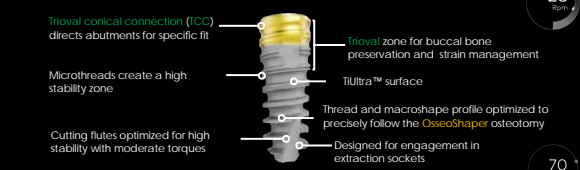
Cutting flutes optimized for high stability with moderate torques

Tri-oval zone for buccal bone preservation and strain management

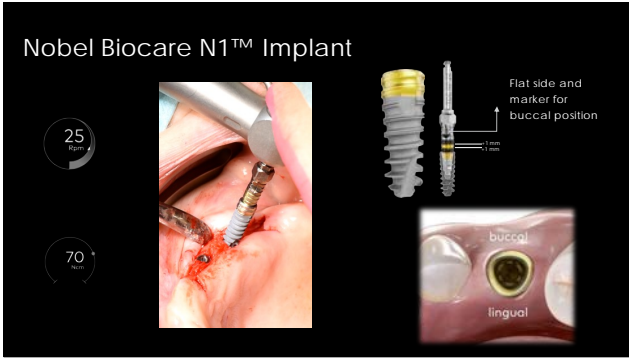
TiUltra™ surface

Thread and macroshape profile optimized to precisely follow the **OsseoShaper** osteotomy

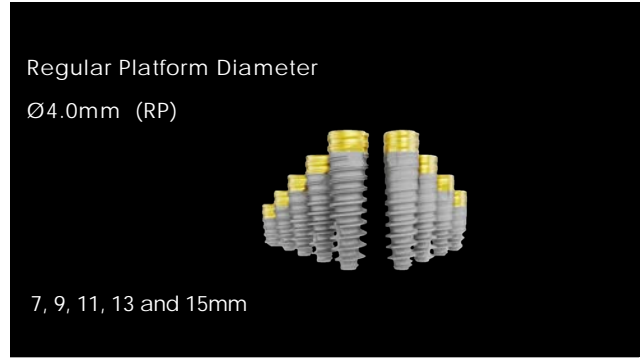
Designed for engagement in extraction sockets



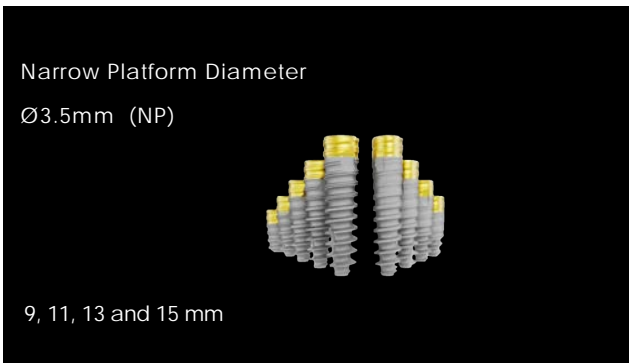
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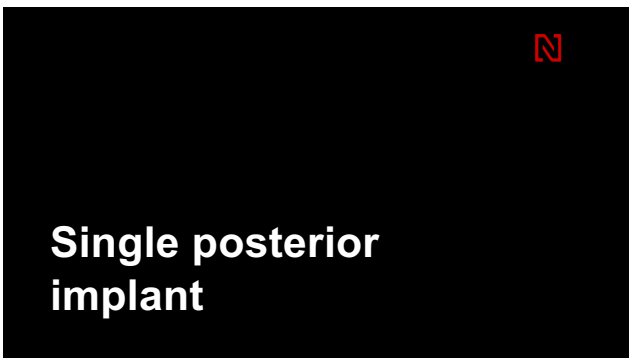
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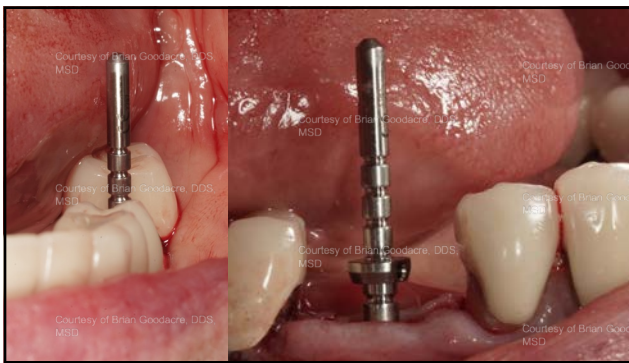
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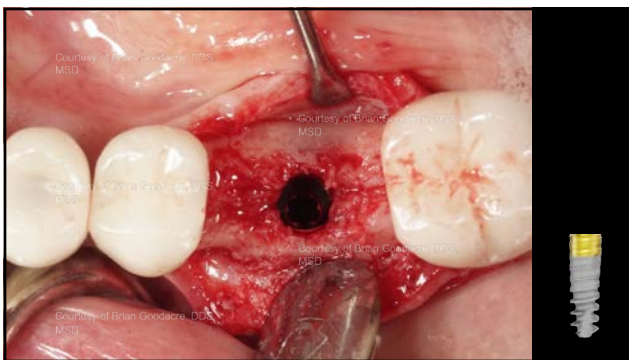
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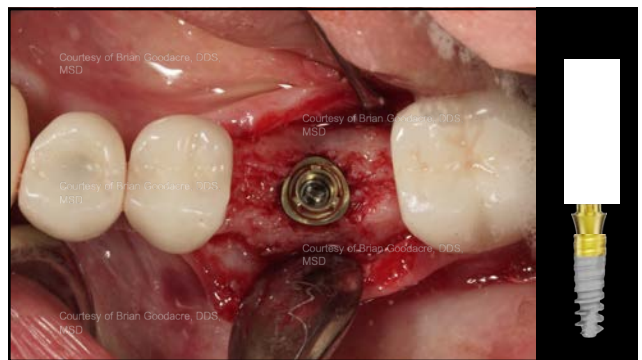
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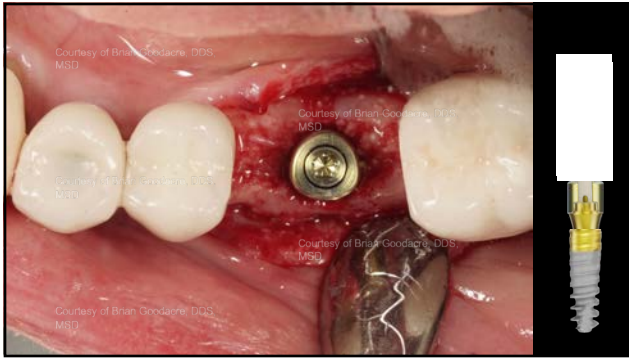
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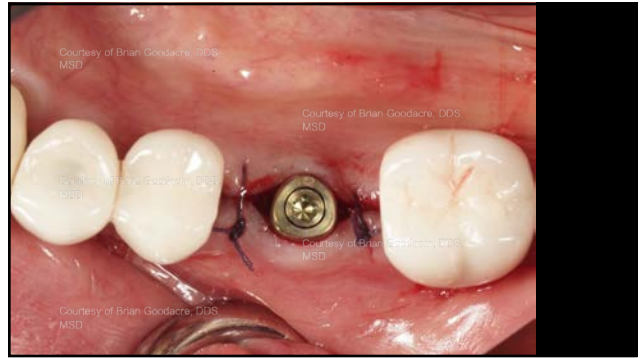
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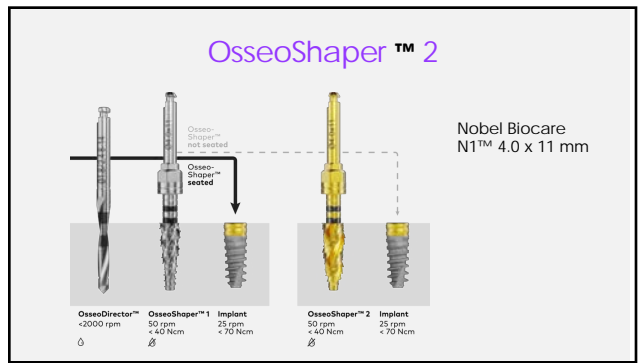
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32

What if the OsseoShaper™ 1 can't be fully seated?

33



34

OsseoShaper™ 2

No irrigation

50 rpm

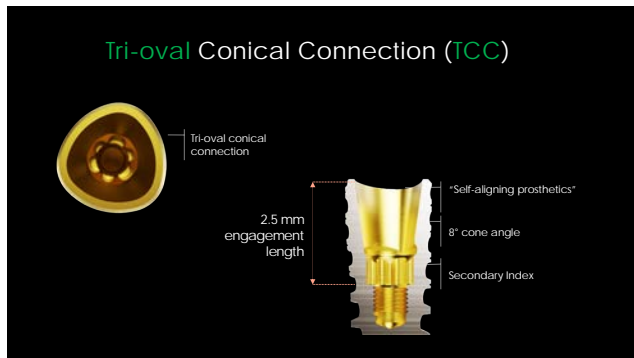
40 Ncm

Used only if the OsseoShaper 1 achieves 40 Ncm torque before reaching the planned implant position.

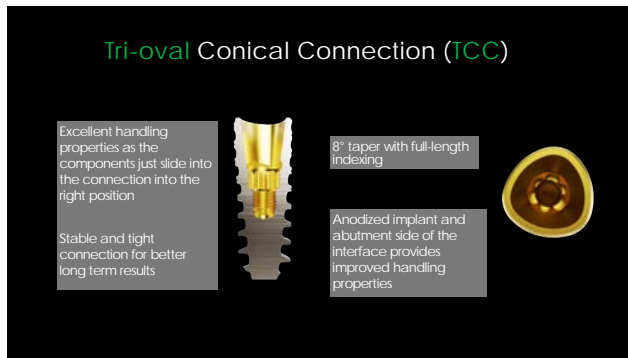
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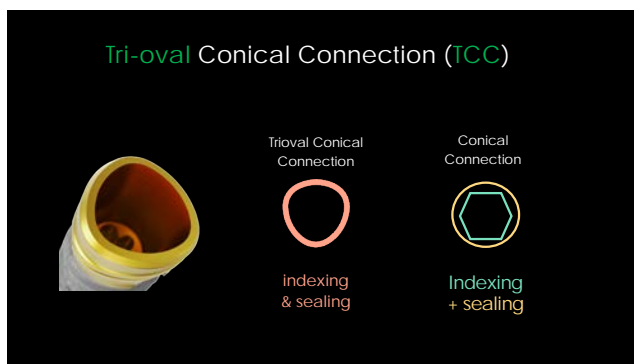
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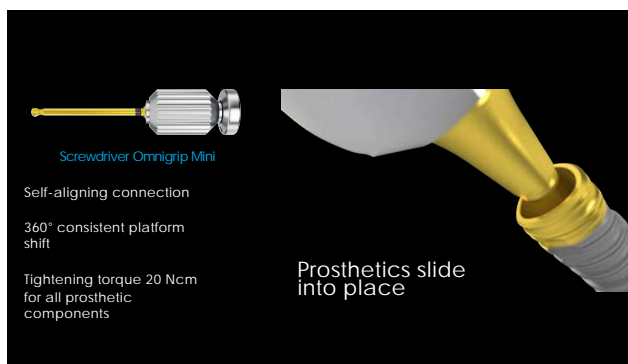
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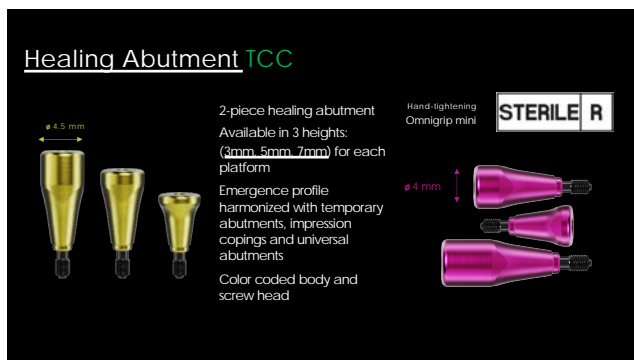
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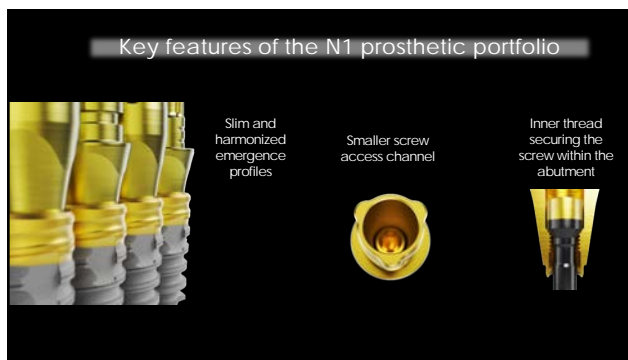
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42

Nobel Biocare N1™ Base

A 2-piece abutment, placed at the time of implant surgery, remains in situ throughout the entire prosthetic procedure to preserve the connective tissue structure.

The base is trioval and features Xeal™ surface, embracing the Mucointegration™ concept.



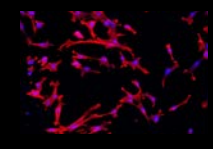
43

Xeal™ surface

The pioneering Mucointegration™ surface for soft tissue integration.

It is a smooth, non-porous anodized surface featuring a protective layer which preserves the pristine surface chemistry and hydrophilicity for optimized soft tissue integration.

Dense soft tissue contact with an abutment can act as a barrier that protects the underlying bone. This is a basis for long-term tissue health and stability.

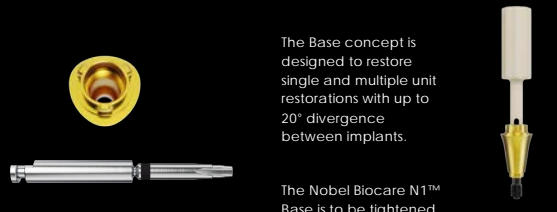


44

Nobel Biocare N1™ Base

The Base concept is designed to restore single and multiple unit restorations with up to 20° divergence between implants.

The Nobel Biocare N1™ Base is to be tightened to **20 Ncm** using the **N1™ Base driver**.



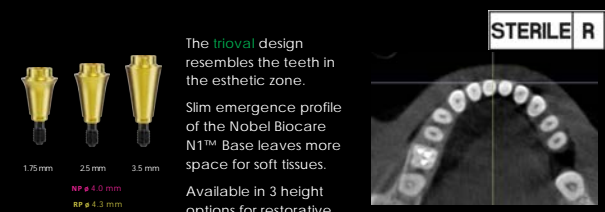
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Nobel Biocare N1™ Base

The **trioval** design resembles the teeth in the esthetic zone.

Slim emergence profile of the Nobel Biocare N1™ Base leaves more space for soft tissues.

Available in 3 height options for restorative flexibility.



1.75mm 25mm 3.5mm
 NP ø 4.0 mm
 RP ø 4.3 mm

STERILE R

46

Healing Abutment Base

Omnigrip mini 20 Ncm

Healing Abutment for the Nobel Biocare N1™ Base.

Color coded body for easy platform identification.



STERILE R

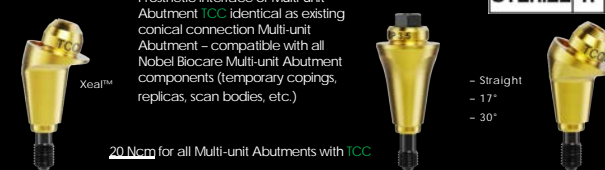
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Multi-unit Abutment TCC

Prosthetic interface of Multi-unit Abutment **TCC** identical as existing conical connection Multi-unit Abutment – compatible with all Nobel Biocare Multi-unit Abutment components (temporary copings, replicas, scan bodies, etc.)

20 Ncm for all Multi-unit Abutments with **TCC**

– Straight
 – 17°
 – 30°



STERILE R

48

Nobel Biocare N1™ portfolio overview by indications

| | | | | | | | |
|--|--|--|--|--|--|--|--|
| | | | | | | | |
| Nobel Biocare N1 Implant level | | | | | | | |
| Nobel Biocare N1 Base level | | | | | | | |
| Nobel Biocare N1 Multi-unit Abutment level | | | | | | | |

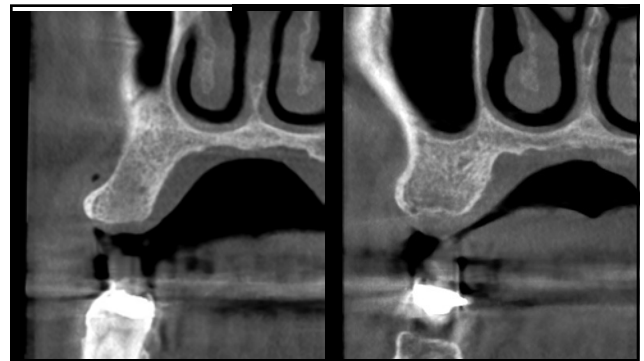
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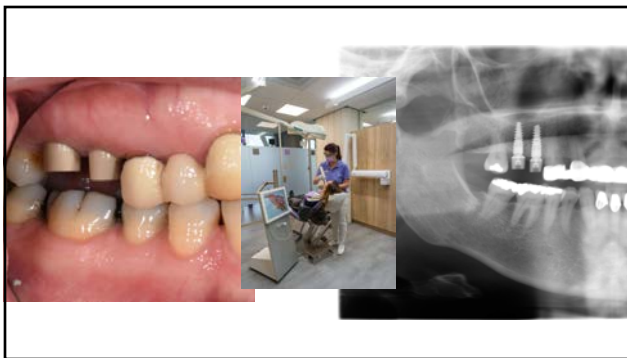
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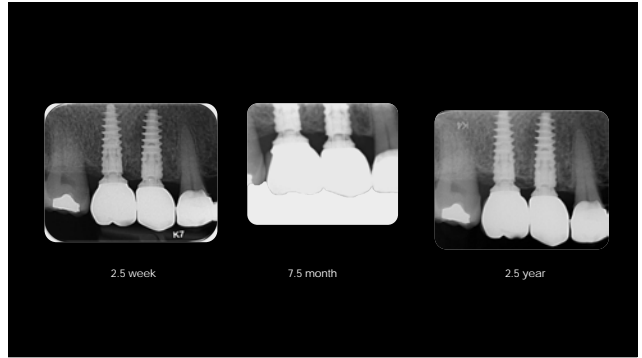
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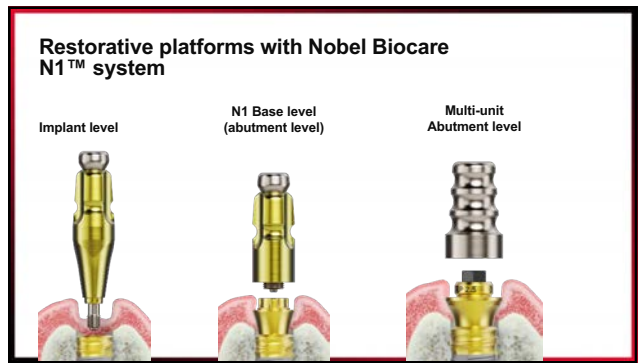
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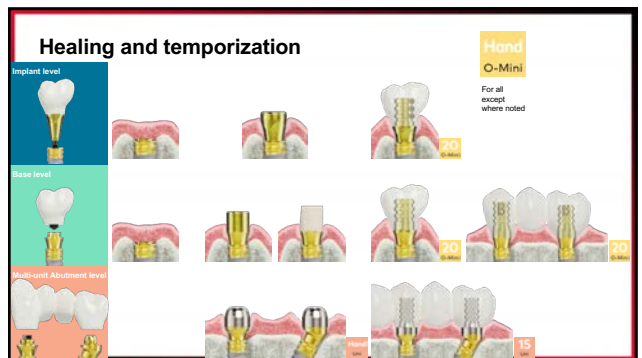
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58



59



60

Temporary Abutment TCC

Round shape of the platform

1.5 mm

3.0 mm

Temporary Abutment

Universal Abutment

Slide into place

Slim emergence profile consistent with healing abutments, impression copings and universal abutments

Tightening torque 20 Ncm for all prosthetic components

- Available with 2 margin heights: **1.5 & 3.0 mm**
- Featuring inner thread securing the screw
- Fully anodized with color-coded screw

61

Temporary Abutment Base

10 mm post height

Omnigrip mini 20 Ncm

Screw retained temporary solution for the Nobel Biocare N1™ Base level restorations.

Trioval platform matching the shape of the N1™ Base

Available in 2 versions for each platform: for single units and for bridges (B).

Features a color-coded screw for platform identification

62

Universal Abutment N1™ Base

4mm post height

Omnigrip mini 20 Ncm

Milling geometry optimized for inlab milling units – fairly easy to mill, keeping the minimal cement gap for limited rotational play and better fatigue performance

Implemented into DTX Studio Lab and 3Shape lab libraries

NON STERILE

63

Impressions

Implant level

Base level

Multi-unit Abutment level

Hand O-Mini

For all except where noted

Elos Accurate IO Driver Hand-tighten

64

IOS Healing Abutment Nobel Biocare N1™ Base

STERILE R

Scannable Healing Abutment for the Nobel Biocare N1™ Base.

Distinct shapes of NP and RP IOS Healing Abutment

Made of PEEK and featuring a color coded screw for platform identification.

Available in one height option (4.5 mm)

Note: not compatible with the N1™ Base replica

65

Final restorations

Implant level

Base level

Multi-unit Abutment level

Universal Abutment (local production)

Esthetic Abutment (preparable)

Titanium Abutment Blank

NobelProcera zirconia crown for N1 Base

Universal Base Multi-Unit (local production)

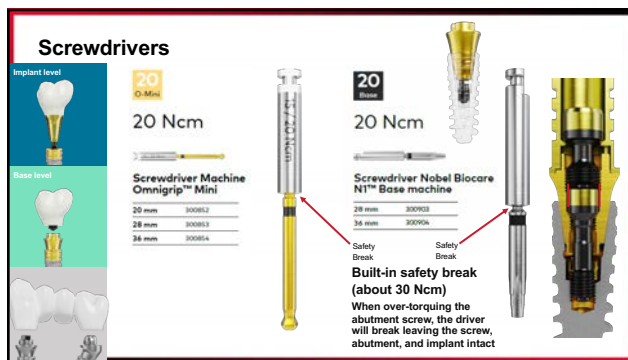
NobelProcera Zirconia Implant Bridge

NobelProcera Titanium bar

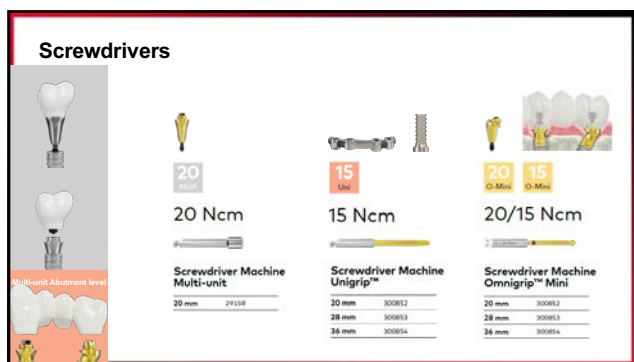
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68



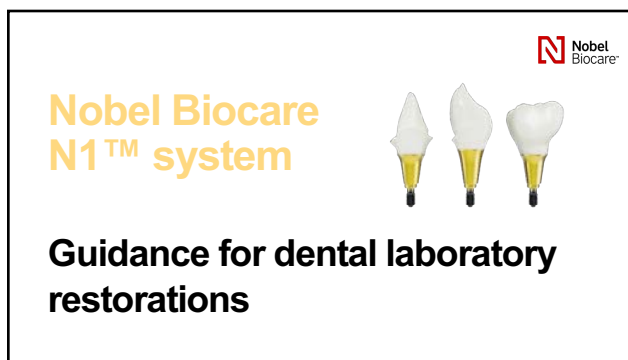
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70



71



72

Step 1 – Determine if Nobel Biocare N1™ restoration is base level or implant level using components

Base level

A Nobel Biocare N1™ Base was placed at the time of surgery on top of the implant.

- Base fits directly on top of the implant.
- Abutments and prosthetics fit on top of the base.
- Base comes in 3 different margin heights (1.75 mm, 2.5 mm and 3.5 mm).

Implant level

The implant was placed with no other definitive component on top during surgery.

- Abutments and prosthetics fit on top of the implant.

73

Step 1 – continued

Component types – Base level vs. Implant level

| | Implant replicas | Position locators | Impression copings | IOS healing abutment |
|----------------------|-------------------------------|---------------------------------|--------------------|----------------------|
| Base level | Existing fingers on top | Screw access hole on top | Closed tray | Open tray |
| Implant level | No guiding fingers on top | No screw access hole on top | Closed tray | Open tray |

*Screw access hole will appear in the STL file

74

Step 2 – Set up case using design software

Compatible design software

Download 3Shape® & exocad™ libraries within the software download centers

Below:

- United States**
nobelbiocare.com/en-us/nobelprocera-openaccess
- Canada**
nobelbiocare.com/en-int/nobelprocera-openaccess

Libraries already included in DTX Studio Lab 1.12.3 and later. Update to the latest version at go.dbxstudio.com

75

Step 3 – Choose milling option

Nobel Biocare N1™ restoration options

| | Base level | Implant level | Multi-unit Abutment level |
|--|---|--|--|
| Option 1 Mill in-house | Universal Abutment screw-retained crown | Esthetic Abutment screw-retained crown | Esthetic Abutment screw-retained crown |
| Option 2 Order NobelProcera® restoration | Universal Abutment screw-retained crown | Esthetic Abutment screw-retained crown | Esthetic Abutment screw-retained crown |

*Up to 6 units in Canada

76

Step 4 – Receive NobelProcera® restoration

NobelProcera® Zirconia Implant Crown with ASC – base level

- NobelProcera® Zirconia Implant Crown
 - Crown to be placed directly on Nobel Biocare N1™ Base (base already in patient's mouth).
 - Angulated screw channel with up to 25° angulation in a 360° radius.
 - Customizable design and VITA shade of your choice.
 - Includes a 10-year warranty.
- Prosthetic screw
 - Torque to 20 Ncm using a Screwdriver Omnigrip™ Mini.

77

Step 4 – continued

NobelProcera® Zirconia Implant Bridge

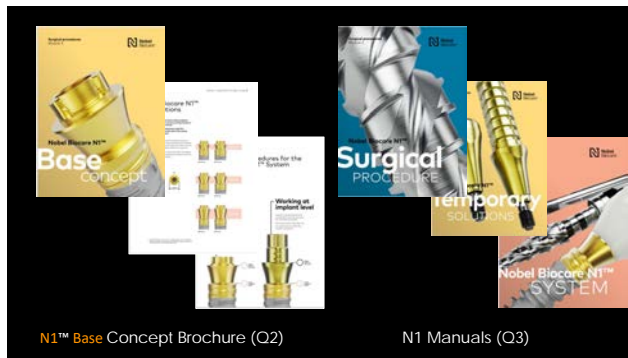
- NobelProcera® Zirconia Implant Bridge
 - One zirconia implant bridge option for all Nobel Biocare Multi-unit Abutments.
 - Angulated screw channel with up to 25° angulation in a 360° radius.
 - Customizable design and VITA shade of your choice.
 - Includes a 10-year warranty.
- Prosthetic screw
 - Torque to 15 Ncm using a Screwdriver Omnigrip™ Mini.
 - Nobel Biocare N1™ Multi-unit Abutment interface mimics all other Nobel Biocare Multi-unit Abutments.
 - Number of prosthetic screws included will equal to the number of implants placed.

(Available in 2-14 units in US; 2-6 units in Canada)

78



79



80



81