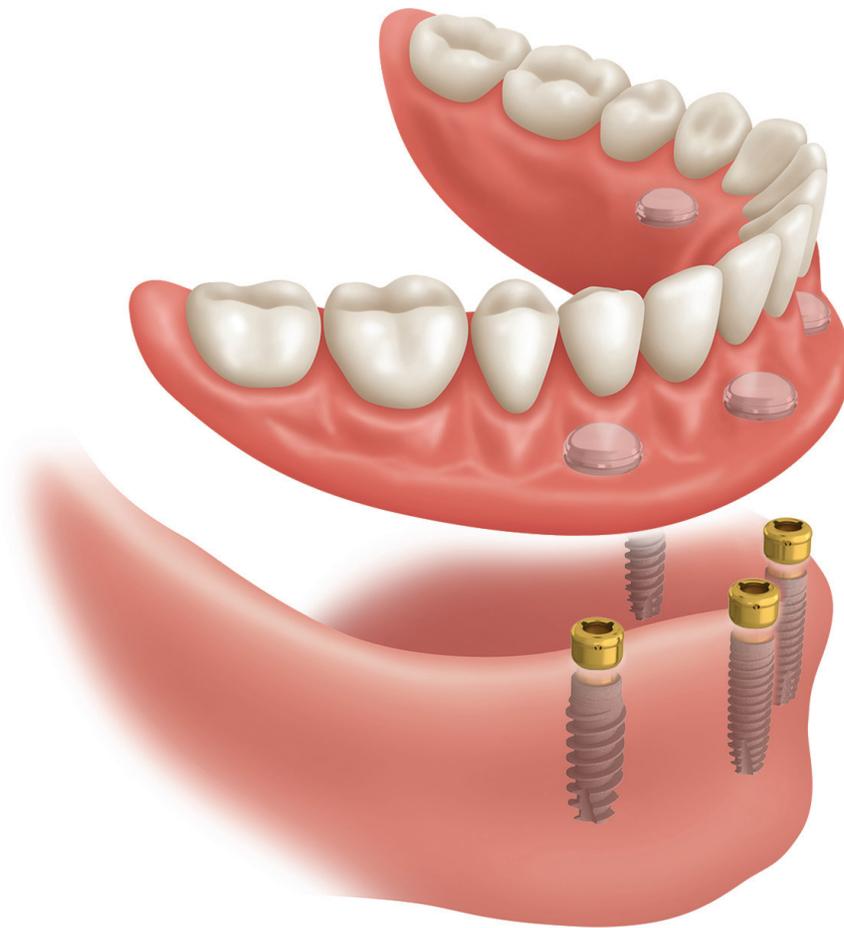


# A CLINICIAN'S GUIDE TO **ENCOMPASS**

LOCATOR® Secured Overdentures  
*Guided by NavaGation™*



**ZD ZEST DENTAL SOLUTIONS®**



forever  
**de<sup>denture</sup>**  
your FOREVER smile

Dear Doctor,

The ENCOMPASS solution is the result of extensive collaboration between three exceptional companies who, as of 2020, have been serving clinicians with a focus on high quality service and world class prosthetics for a combined 82 years.

ZEST® Dental Solutions, Absolute Dental Laboratory, and the NavaGation Precision Guidance® Surgical Solutions teams have combined forces to offer a pre-planned, fully digital, 21st century over-denture workflow.

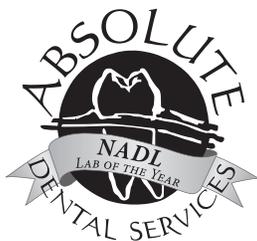
The ENCOMPASS solution includes surgical planning and drill reports with a NavaGation™ custom surgical guide. It also includes all pre-planned ZEST® LOCATOR implants, required LOCATOR® restorative components and chair-side processing acrylic. The final prosthesis is a high strength, digitally processed smart polymer, Absolute Forever Denture™. All the required components are pre-planned, which limits the chance of ordering incorrect components. Bundling all the components in the ENCOMPASS solution also significantly reduces the overall cost.

This fully comprehensive ENCOMPASS solution is designed to greatly increase the predictability and efficiency with which a clinician can restore a LOCATOR® supported over-denture.

This digital workflow merges the restorative teams into a very synergetic partnership that minimizes risk, greatly reduces required chair-time and produces a pre-operatively planned, well executed case.

Our team is ready to assist you with your next case!

Conrad J. Rensburg



Absolute Dental Lab  
Peer Recognized  
NADL Lab of the Year



Conrad J. Rensburg  
N.D. & N.H.D. Tech Pret.  
Owner, Absolute Dental Lab

# ABSOLUTE FOREVER DENTURE™

The ENCOMPASS solution includes a digitally processed Absolute Forever Denture™. This final denture is Carbon® printed with Lucitone Digital Print in a high strength, extremely esthetic smart polymer.

This revolutionary material has been documented with a Work of Fracture resistance of more than 3000 J/m<sup>2</sup>. This equates to three times the strength of traditional high impact Lucitone and double the minimum strength required by the ISO impact standard.



forever  
**denture**  
your FOREVER smile



*"I choose digital dentures for my patients because the predictability, repeatability, and flexibility of workflow is unparalleled. Absolute Dental Lab and their Absolute Forever Denture™ provide me the communication, service, quality and esthetics that my patients and I deserve."*

—Wendy Clark, DDS, MS. UNC Adams School of Dentistry at Chapel Hill

# EQUIPMENT NEEDED TO PROCESS

Intra-oral, digital scanner for 360 denture scan

CBCT scanner producing raw DICOM data

Digital camera or cell phone to acquire smile pictures

## CHOOSING THE RIGHT PATIENT

### 1. Edentulous patients with a well-fitting denture

This is the ideal patient for the ENCOMPASS solution. The clinical team can start the data gathering process without the need to adjust any of the prosthetic components.

### 2. Edentulous patient with ill-fitting denture

To fabricate an accurate tissue-borne surgical guide, the guide design team utilizes the captured denture fitting surface. It is therefore crucial to PVS refresh (or acrylic hard reline) the intaglio surface of the existing denture before digitally capturing it. The accuracy of the denture fit will ultimately determine the accuracy of the surgical guide fit.

### 3. Edentulous patient without an existing denture

An ENCOMPASS case cannot be processed without a well-fitting denture. Start the process by fabricating a new digital (or traditional) denture before starting the process.

### 4. Dentate or partially edentulous patients

The ENCOMPASS system is designed specifically for fully edentulous patients with an existing denture. It is important to not only edentulate the patient but also plan for possible bone reduction to create adequate restorative clearance. The NavaGation™ team has a custom solution available through their NavaGation Synergy Zero® and Synergy Guided Workflow® solutions.

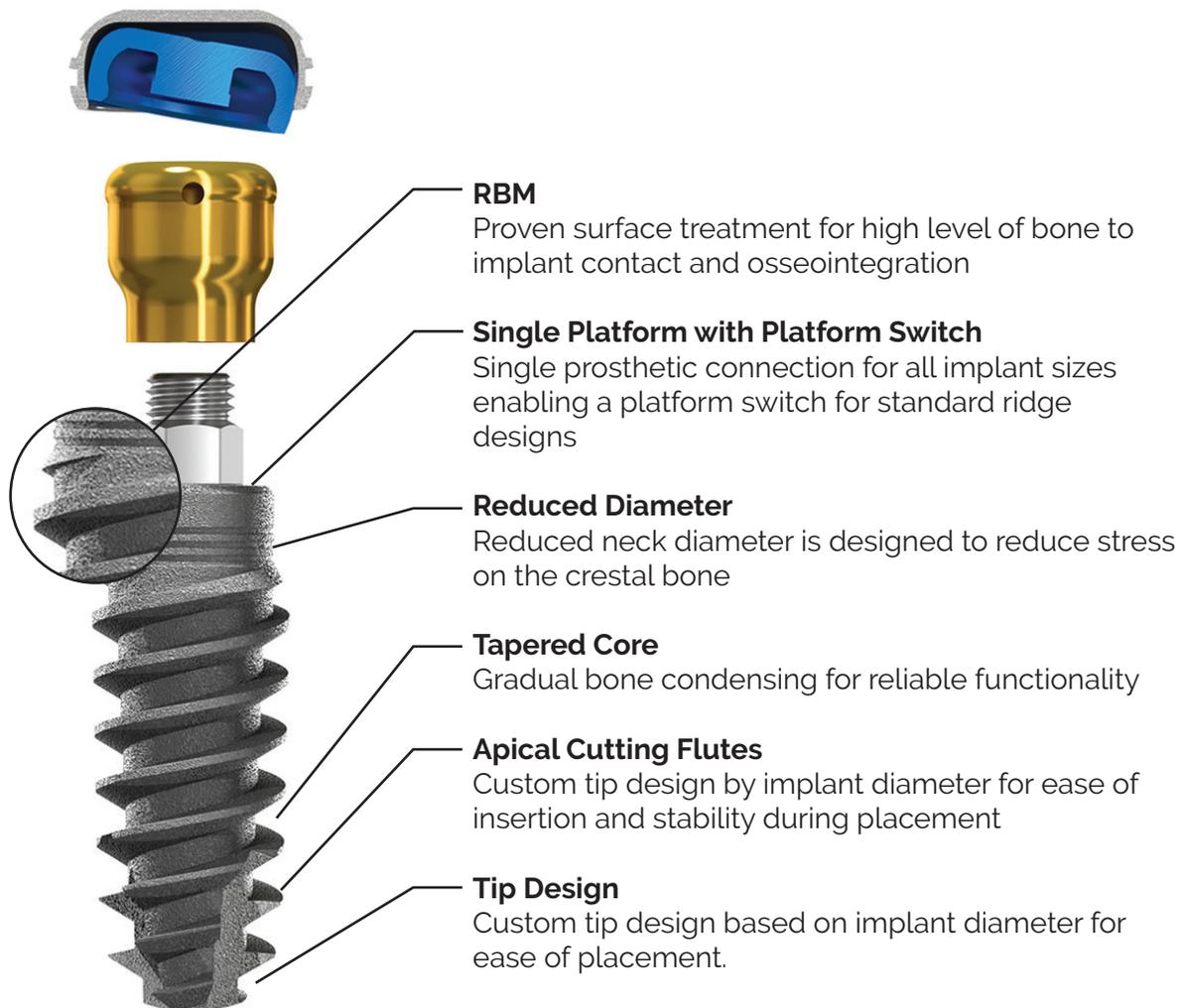
For more information, call 1 844 NAVAGAT (628 2428) or visit [navagation.net](http://navagation.net)



*"We integrated technology for efficient workflows to give our patients experience our highest level of care. Everyone wins—the patient, the doctor, and the lab technicians. The Zest solution is the total package."*

—Shea Tolbert, DMD, FAGD

Building on the globally-trusted LOCATOR® platform, the newly expanded LOCATOR® Implant system offers all diameters for both standard and narrow ridges, and are ideal for immediate extraction and implant sites. By reducing the cost of implant and LOCATOR pairings by 50% or more, LOCATOR implants exponentially increase the universe of treatable cases, empowering you to provide overdentures to a range of underserved patients, all while delivering the performance you expect and reliability you deserve.



*"After over 5 years of using the LOCATOR Overdenture Implant System successfully in my practice, I have treated many patients who are thrilled with their overdentures. The implant system, combined with the popular LOCATOR attachment, is predictable, simple, and efficient for implant and general practices!"*

—Michael Scherer, DMD, MS, FACP

# DATA CAPTURE

## 1. Digitizing the denture

After confirming a passive fit of the existing denture (defined as a full integration between tissue and acrylic) place fiduciary markers (Suremark®, CT-SPOT® etc.) on the external surfaces of the existing denture – not on the intaglio (fitting) surfaces. These markers will be used to model match the denture scan to the DICOM data. This process is crucial for an accurate surgery. Clean and thoroughly dry the denture before securing the scan markers.

### Upper denture:

Place two markers on each posterior quadrant, one under the first bi-cuspid and another under the molar positions. Also place one marker in the #'s 7 to 10 area. Place three markers in the palatal area.

### Lower denture:

Place four markers on the posterior buccal areas and one in the anterior labial area. Apply three markers to the lingual area.

Digitize the denture, with fiduciary markers, using an IO or benchtop scanner.

## 2. Scanning the patient (DICOM data)

Deliver the denture (with scan markers intact) and place the patient in the CBCT scanner. Have the patient bite on cotton rolls and scan the patient out of occlusion with the denture in place.

To avoid the scan markers shifting, it is crucial to digitize the denture before scanning the patient with the denture. The scan markers must remain on the denture without shifting to allow for a digital model to data match.

## 3. Capture smile pictures and diagnostic notes

Smile pictures are one of the most valuable diagnostic communication tools available to the restorative and technical teams and should accompany every case. These smile pictures, combined with diagnostic design requests, will be used to digitally design the patient's final prosthesis.

To ensure design accuracy, it is important to take smile pictures (high and low smile, with the reline material still intact after scanning) before taking the denture out of the mouth.

These pictures can be taken with any modern-day digital capture device (cell phone, SLR camera etc.). It is important that the patient stands with their back and head flat against a wall with eyes parallel. Hold the camera level to the patient's face and take the picture straight on. Focus on the nose and upper lip area and be sure to capture both eyes and ears. Pictures with a patient turned to a side or slanting up or down cannot be used for digital diagnostic purposes.

# SUBMITTING DATA FOR PROCESSING

The ENCOMPASS system is designed to keep cost down and clinical efficiency up. The system is designed around a digital submission and processing platform, therefore all data for processing must be submitted digitally.

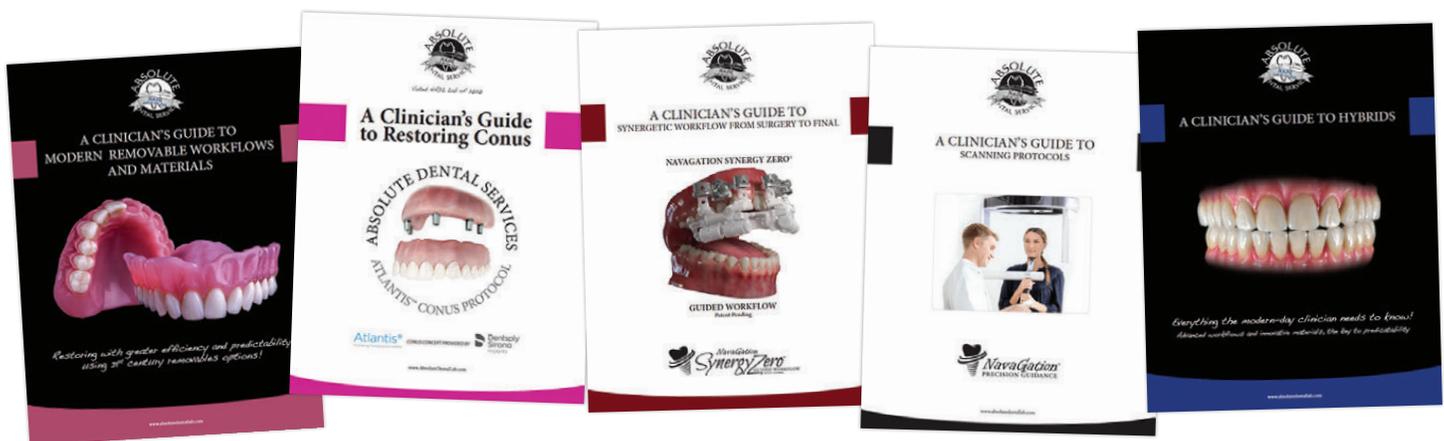
Go to [www.navigaton.net](http://www.navigaton.net) click the SUBMIT ENCOMPASS button.



Please submit:

- Raw DICOM data slices
- 360 IO scan of existing denture (with refreshed intaglio)
- Smile pictures with diagnostic notes

## Additional Clinical Protocol Manuals Available



[AbsoluteDentalLab.com](http://AbsoluteDentalLab.com)

# GUIDE PLANNING AND DESIGN

The NavaGation™ surgical team will evaluate, import and clean-up the data. After model matching the DICOM data with the denture STL scan and smile pics, the team will start the pre-planning process. The first step is a digital diagnostic wax-up based off of the pre-operative models, smile pics and diagnostic notes submitted with the case. This proposed digital diagnostic design becomes the final digitally processed denture and guides the surgical team in the pre-planning stage.

Once a suggested surgical plan is ready, the team contacts the surgeon to set up a remote surgical review. At this meeting, the surgeon will evaluate the surgical pre-plan and can make changes as required. Once review approval is received, the case is imported into guide design software and a NavaGation Precision Guidance® surgical guide is prepared. The surgical guide is tissue supported and is shipped with a standard fixation sleeve to guide a 2.0 mm fixation pin.

# FINAL DENTURE

Using advanced digital denture design software, the Absolute Dental Laboratory team will use the approved digital diagnostic design to fabricate the final Absolute Forever Denture™ printing file. Once the file is prepared, the case is sent to a Carbon® printer for base printing with a Lucitone 3D smart polymer. All Absolute Forever Dentures™ are archived for future retrieval. This service facilitates future remakes, in just two appointments. In the case of a lost denture, replacement deliveries are completed in one appointment.

The denture is printed with Locator® receptacle areas to expedite the chair-side pick-up of the processing housings.

## ENCOMPASS COMPONENTS

Final Absolute Forever Denture™  
All pre-planned LODI implants  
ZEST® finishing burrs  
Denture removal tool

NavaGation™ Precision surgical guide  
Site specific LOCATOR® abutments  
Chair-side pick-up material  
Drill report and surgical plan



**Denture ID TAG Included**





NavaGation Precision Guidance®, the surgical division of Absolute Dental Laboratory, was established in 2014 with the goal to create synergy between the surgical, restorative, and technical teams. The team offers unique solutions ranging from single guides to complex full arch hybrid cases with latched conversions.



Today, with thousands of successful surgeries behind them, Absolute is proud to offer their expertise in diagnostic work-up, pre-planning, guide design, processing, and chair-side support to clinicians from across the United States.

By offering a true, diagnostically driven planning approach, the NavaGation™ and Absolute teams have become a trusted partner for surgical and restorative teams focused on high quality final prosthetics supported by predictable surgeries.



*"No occlusal adjustment was done! Pretty amazing system!"*

—Dr Jeffery Ganeles

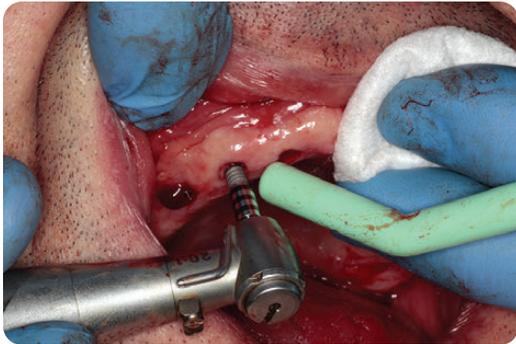
# CLINICAL CASE PROCESSING



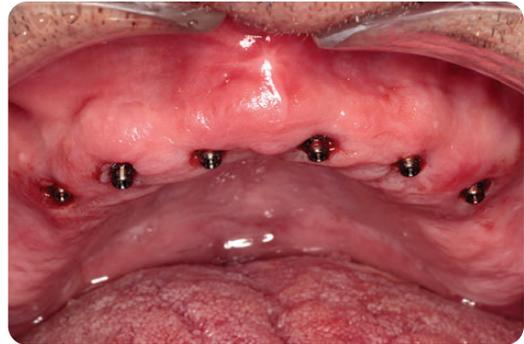
1. SEAT THE SURGICAL GUIDE AND SECURE WITH FIXATION PINS



2. DRILL OSTEOATOMY ACCORDING TO NAVIGATION DRILL REPORT



3. PLACE THE SUPPLIED, PRE-PLANNED LODI IMPLANTS



4. IMPLANTS READY TO RECEIVE LOCATOR® ABUTMENTS



5. DELIVER THE SUPPLIED, PRE-PLANNED LOCATOR® ABUTMENTS



6. DIGITALLY DESIGNED ABSOLUTE FOREVER DENTURE™ WITH ID CHIP



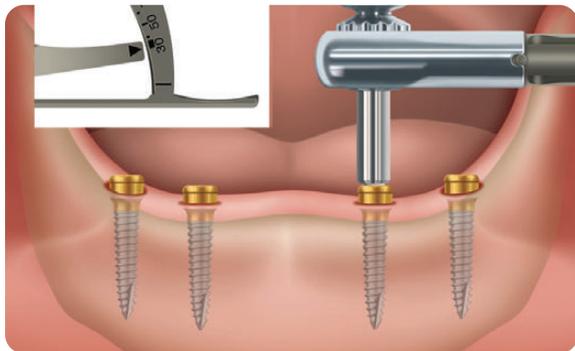
7. PRE-PLANNED, PRINTED RECEPTACLE AREAS FOR LOCATOR® PICK-UP



8. FINAL DENTURE READY FOR DELIVERY AFTER LOCATOR® PICK-UP

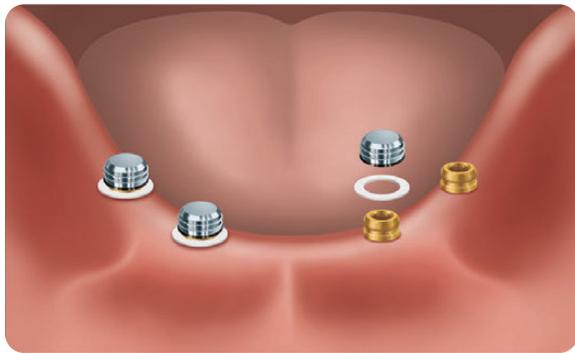
\*Case courtesy Dr. Shae Talbert,  
Family Dental Health, SC

# PROCESSING LOCATOR® DENTURE HOUSING & INSERTS

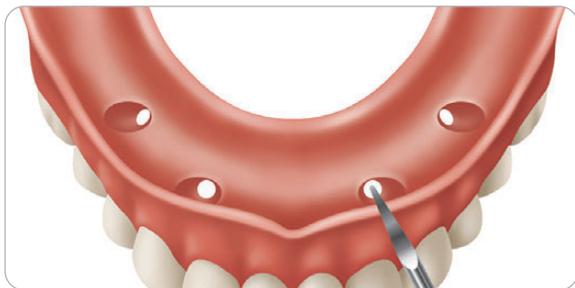


DIRECT TECHNIQUE: CHAIRSIDE PROCESSING (NEW OR EXISTING OVERDENTURE)

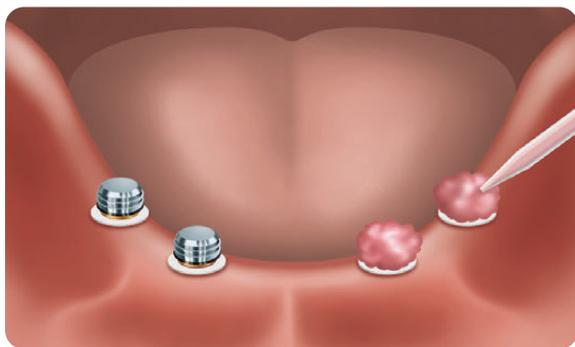
Torque the LOCATOR Abutments to 30Ncm using an assembled Torque Indicating Ratchet Wrench and Insert.



Place a White Block-Out Spacer Ring around each Abutment and press it down to the tissue. Place a Denture Housing/Black Processing Insert assembly onto each Abutment, pressing down firmly.

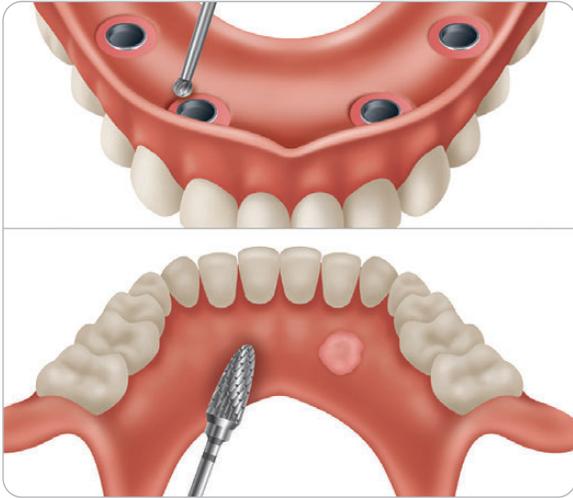


Cut lingual/palatal vent windows in the denture with the CHAIRSIDE Vent Bur to visualize full seating and for excess material to vent.



Dry the Denture Housings. Apply a small amount of CHAIRSIDE® Attachment Processing Material around the circumference of each Housing. Place CHAIRSIDE Material into the relief areas of the overdenture and seat it over the Housings and onto the tissue. Ensuring the denture is fully adapted to the tissues, lightly hold the denture with your fingers until fully polymerized. Excessive occlusal pressure during the setting time may cause tissue recoil against the overdenture base and could contribute to dislodging and wear of the Inserts.

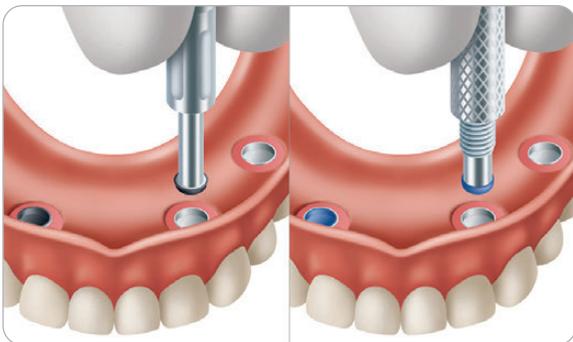
# PROCESSING LOCATOR® DENTURE HOUSING & INSERTS (cont.)



Disengage the overdenture from the Abutments and remove from the mouth. Verify that the Denture Housings have been securely processed into the overdenture. Fill any voids with CHAIRSIDE Attachment Processing Material and light cure. The material will bond to itself and will cure within 30 seconds with light application. Use the CHAIRSIDE Trim and Grind Burs to remove any excess acrylic material remaining in the overdenture.



Use the CHAIRSIDE® Polish Bur to create a smooth finish in and around the overdenture.



Remove the Black Processing Insert using the Removal Tool. Place the selected final Insert into each Denture Housing using the Insertion Tool. Insert the lowest retentive option during try-in.



Seat the overdenture and press down to engage the Insert on the LOCATOR Abutments and verify the occlusion. Instruct the patient on how to remove and insert the overdenture. If the retention is not satisfactory, remove the Inserts and replace with the next level of retention. Instruct the patient on proper home care maintenance and required recall visits.



Absolute Forever Denture™  
Dr. Barry Goldenberg

**FOR MORE INFORMATION SCAN THE QR CODE  
WITH YOUR PHONE**

1. Patient selection
2. What we need to start
3. How to scan your patient
4. What is in the ENCOMPASS box



**[encompasbox.com](http://encompasbox.com)**

**HAVE QUESTIONS FOR THE TEAM?**

Patient set-up, DICOM scanning, case submitting and surgical solutions

- **NAVAGATION PRECISION GUIDANCE®**  
1-844-NAVAGAT (628-2428) or [navigation.net](http://navigation.net)

Prosthetic solutions, case flow and material options

- **ABSOLUTE DENTAL LABORATORY**  
1-844-293-ADS1 (2371) or [absolutedentallab.com](http://absolutedentallab.com)

Implant options and restorative components

- **ZEST DENTAL SOLUTIONS**  
1-800-262-2310 or [zestdent.com](http://zestdent.com)

*"For our patients the digital dentures are working very well and it's a peace of mind to know that you can re-print the denture at any time if the patient ends up misplacing or breaking it."*



-Luiz H Gonzaga  
DDS, MS,  
University of  
Florida

# HIGH END PRINTED DENTURES... NO LONGER AN OXYMORON!



forever  
**denture**  
your FOREVER smile

## **SIMPLIFIED CLINICAL WORKFLOW**

By utilizing the existing denture as a prototype starting point, the clinician can eliminate the unpredictable results a wax bite-rim can produce. This very predictable workflow allows for the fabrication and delivery of a new denture in as little as two clinical appointments. If an existing denture is not available, a traditional wax bite-rim workflow can be used to set the initial VDO.

## **DIGITAL SMILE ARCHIVING**

Every Forever Denture is digitally archived for future retrieval. Absolute Smile Archiving services allows for effortless, future, new denture processing. A lost denture can be replaced with an exact copy in as little as 24 hours without further clinical appointments required. An emergency "copy" denture can be ordered with the final denture at a greatly reduced cost.



## **EXTREME STRENGTH**

Forever Dentures are fabricated using Lucitone® Digital Print material printed in a Carbon® M2 printer. This material is classified as a smart polymer, doubling its strength at body temperature. Lucitone® Print material offers fracture resistance of 3000J/m<sup>2</sup> compared to hand processed Lucitone® high impact acrylic at 1380J/m<sup>2</sup> and the ISO minimum impact standard at 900J/m<sup>2</sup>. All Absolute Forever Dentures are delivered with a one time, 12-month "Full Replacement/No Repair" warranty.

## **DENTURE ARCHIVING FOR LIMITED MOBILITY PATIENTS**

Archiving of patients' existing dentures allows for a replacement copy of a lost denture without requiring further clinical appointments.

## **PREDICTABLE IMMEDIATE TO FINAL DENTURE WORKFLOW**

Immediate denture design is digitally guided by the patient's pre-op tooth position, bite, and clinicians' diagnostic requests. After healing, this archived data is used as a prototype starting point for the final denture. This process digitally indexes all the data from pre-op to final for a very predictable workflow.

## **REMOTE DIAGNOSTIC COMMUNICATION**

Forever Dentures processed from existing prototype data is diagnostically designed and can be super-imposed over patient smile pictures. This allows for diagnostic remote review and fine-tuning by the clinician and the Absolute digital design team.

# ABSOLUTE DENTAL LAB

Established in 1994, Absolute Dental Services started as a small fixed prosthetics lab in the Triangle area of North Carolina. More than two decades later, Absolute's restorative focus is much broader but their attention to product detail and exceptional customer service has not changed. In 2019, Absolute Dental was voted NADL Laboratory of the Year by their peers.



Absolute is a true full-service partner, with a team nationally and internationally renowned for their expertise in creating world-class esthetics. Their use of cutting-edge technology in CAD and milling as well as their extraordinary dental implant, guided surgery and high-end removables teams, enables them to deliver lifelike and functional dental prosthetics in even the most complex cases.

Serving their customers with Absolute Excellence has always been the primary focus of the Absolute team. Their vision and dedication is reflected in the company motto:

*Perfection Is Not Optional!*

They welcome clinicians from all over the country to become part of the Absolute family!

ABSOLUTE  
*Signature*  
A.R.T TEAM



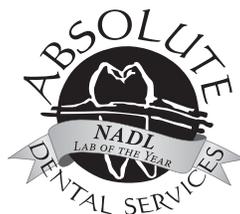
The Advanced Restorative Team (ART) was founded by Jack Marrano, Absolute Dental Laboratory's Director of Signature Prosthetics. Jack was voted one of America's top 40 technicians by LMT and was published with Dr. Carl Misch, with whom he worked closely for many years. This specialized team of artists boasts a combined 230+ years of restorative experience and is tasked with digital integration, implementation of advanced workflows and restoring complex restorations.



# Carbon<sup>®</sup>



*Artistry Driven By Technology!*



1-844-293-ADS1 (2371)  
ABSOLUTEDENTALLAB.COM