



the AQUALIZER™



*Float away tension, muscle pain and headaches.*



**Klausz** Dental  
Laboratories Ltd.

# ***The AQUALIZER Hydrostatic Splint***

***Water perfectly balances and equalizes occlusal force input, freeing muscles.***



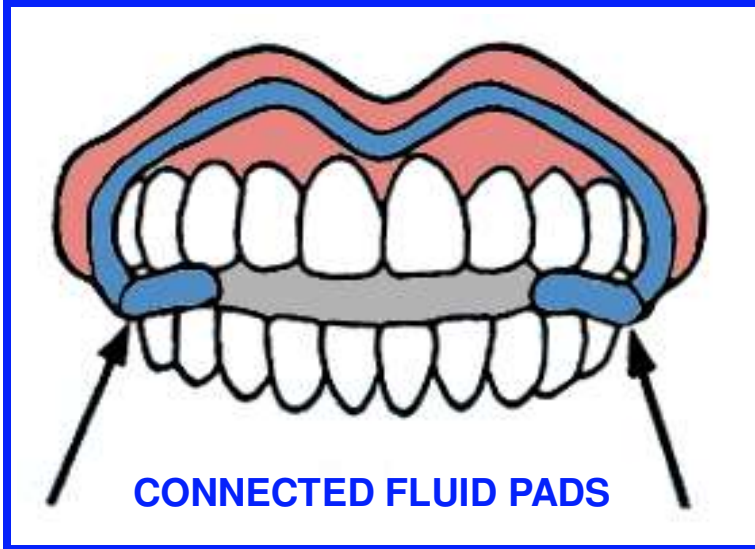
The Aqualizer is a pre-made, temporary, and emergency, self adjusting TMD/ occlusion splint, used for acute pain relief, differential diagnoses and bite registration.

The Aqualizer's new approach uses the body's own physiologic mechanisms to give us the most natural mandibular placement for centric occlusion. The clinician makes no decisions regarding the horizontal, sagittal, and AP positions, but is responsible for determining the best open vertical dimension with the aid of the Aqualizer.



## ***PRE-MADE, EMERGENCY AND TEMPORARY SPLINT***

***PAIN RELIEF , DEPROGRAMMING, OCCLUSAL  
CORRECTION AND DIFFERENTIAL DIAGNOSES***



**WATER BALANCE FLOATS THE JAW RELAXING MUSCLES**

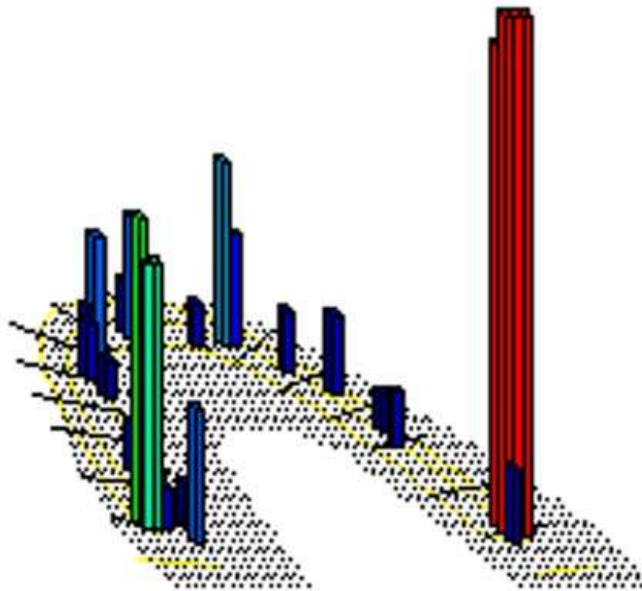


# **INSTANT BALANCING OF OCCLUSAL FORCES**

**NEW PROOF!** TEKSCAN II CLENCH FORCE TEST

## **BEFORE**

**UNBALANCED NATURAL OCCLUSION**

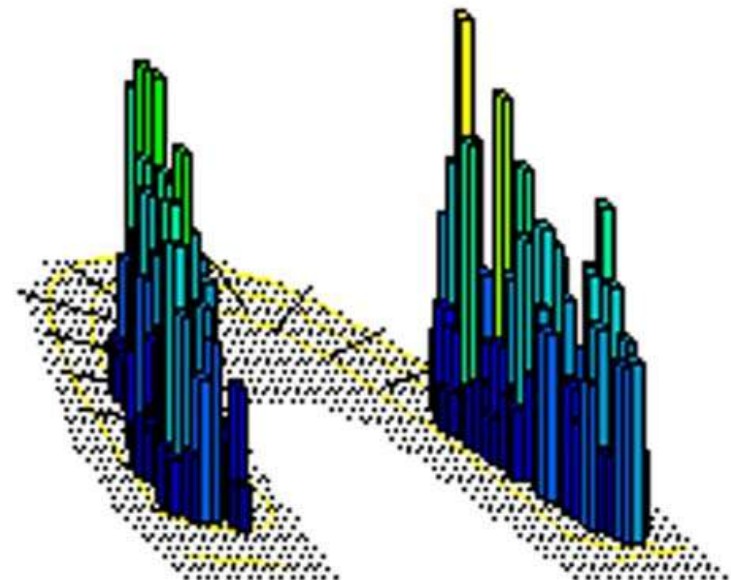


### **BEFORE AQUALIZER**

- SEVERE OCCLUSAL IMBALANCE
- MANDIBULAR DISPLACEMENT
- SEVERE MUSCLE ACCOMODATION

## **AFTER**

**PATIENT WEARING AQUALIZER  
BALANCED OCCLUSION**



### **AQUALIZER'S INSTANT BENEFITS**

- OCCLUSAL BALANCE RESTORED
- MANDIBULAR DISPLACEMENT ELIMINATED
- MUSCLE STRAIN ELIMINATED



# INSTANT IMPROVEMENT IN MUSCLE ACTION

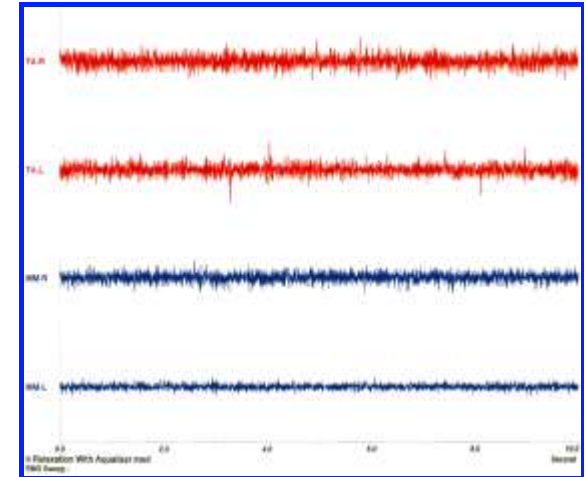
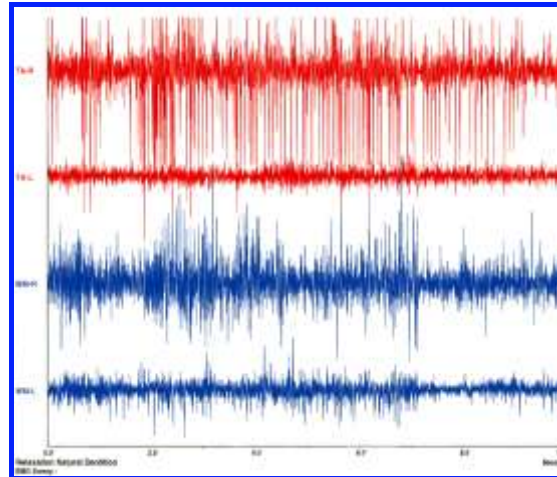
BEFORE: NATURAL DENTITION

AFTER: WEARING **AQUALIZER**

## EMG RELAXATION TEST

- HYPERACTIVITY
- INABILITY TO RELAX
- BILATERAL IMBALANCE

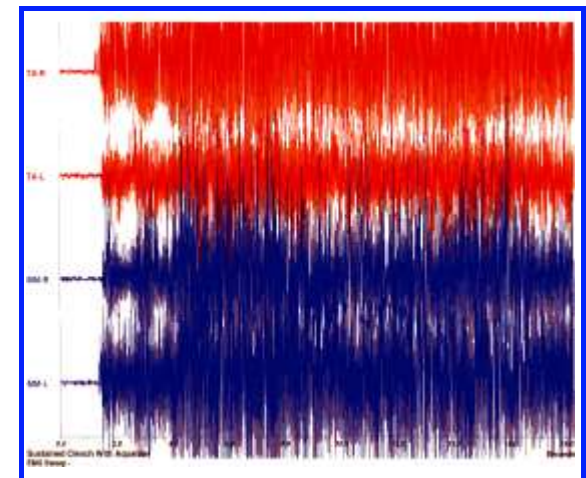
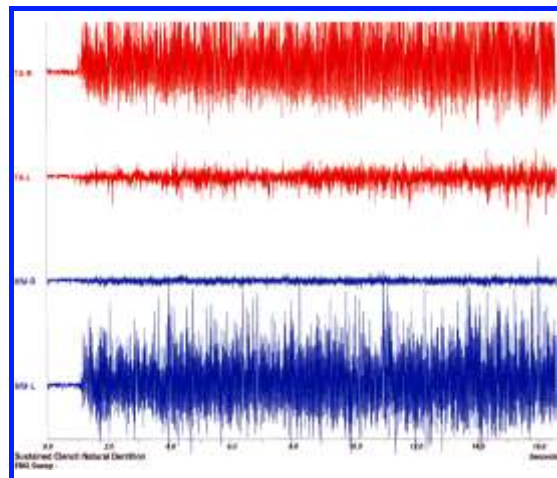
IMPROVES IN MINUTES



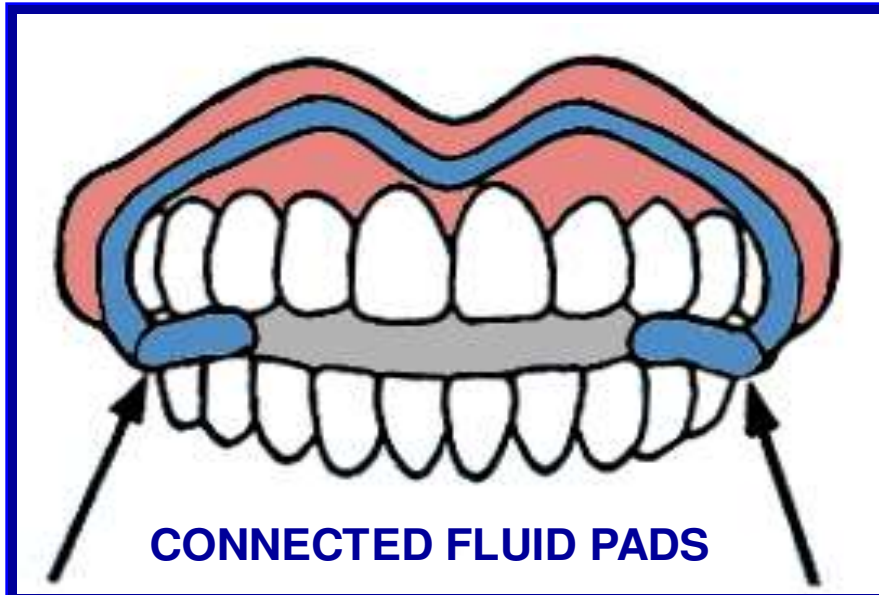
## EMG CLENCH TEST

- GREAT INCREASE IN STRENGTH
- BILATERAL BALANCE RESTORED
- MUSCLES RESTORED TO NORMAL

INSTANT IMPROVEMENT!



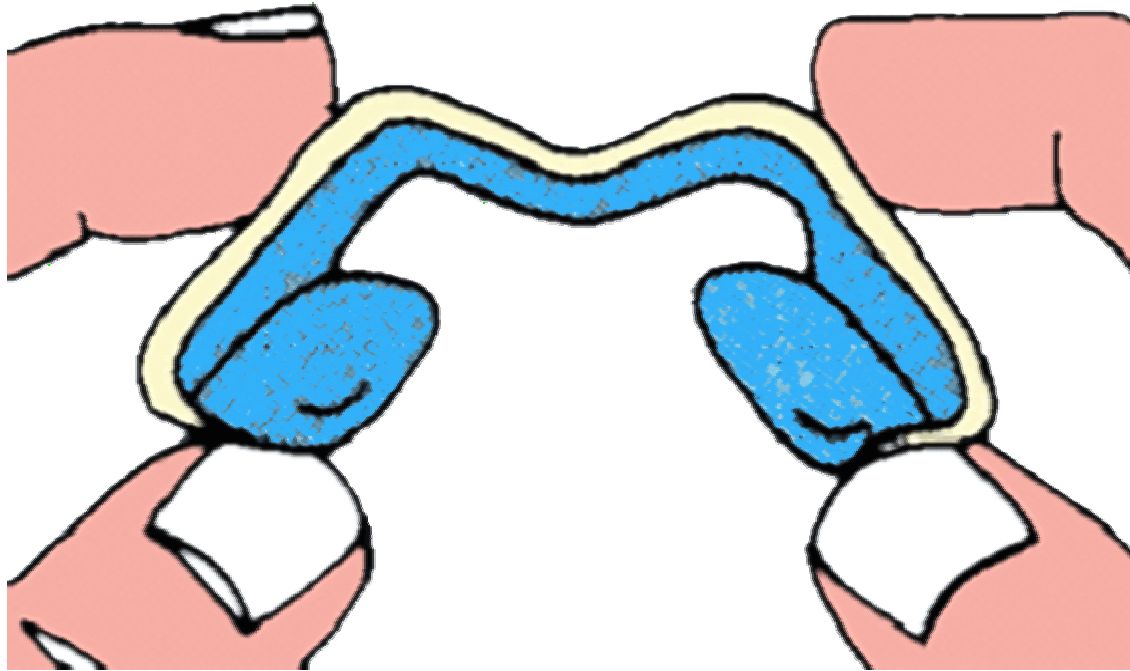
# ***The Aqualizer Easily and Comfortably Fits into Place***







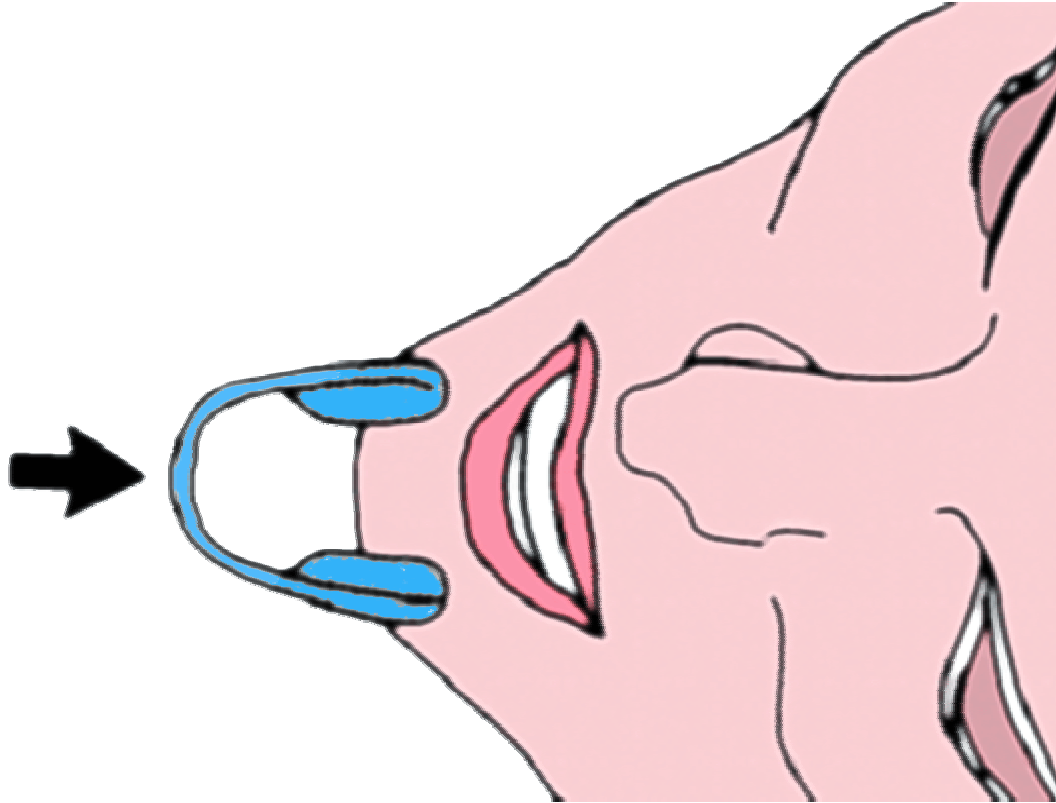
## ***Insertion Step #1***



***Remove the Aqualizer from its card. Hold the Aqualizer padded side up, bending it into a horseshoe shape as shown above***



## ***Insertion Step #2***



***Insert the Aqualizer into the mouth, pads first, tucking the “V” shaped curve under the upper lip, centered left to right.***



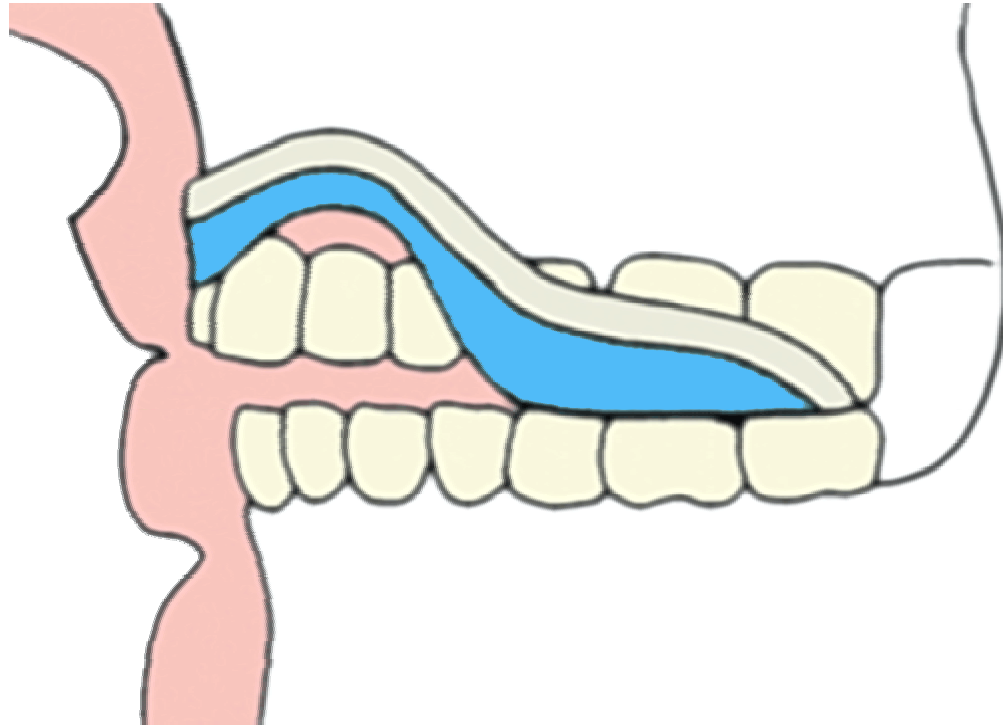
## ***Insertion Step #3***



***Front view showing fluid pads  
between upper and lower arches***



## ***Insertion Step #4***



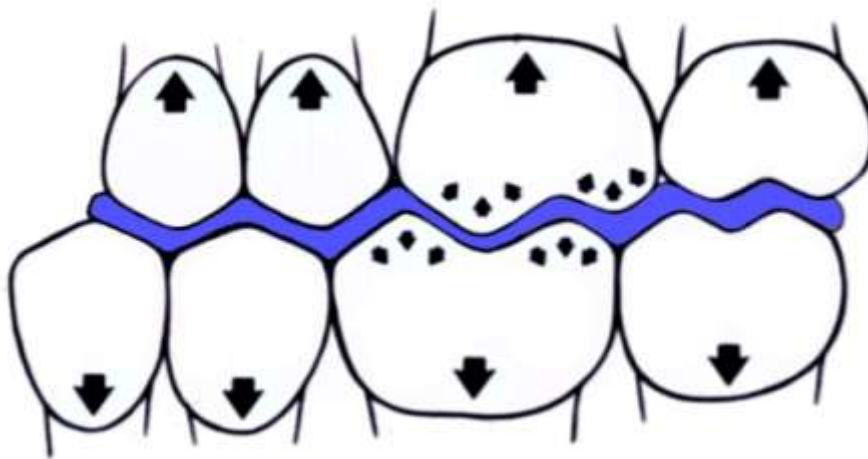
***Side view showing fluid pads between  
posterior upper and lower arches***





Bilateral flow of water in an Aqualizer balances the bite

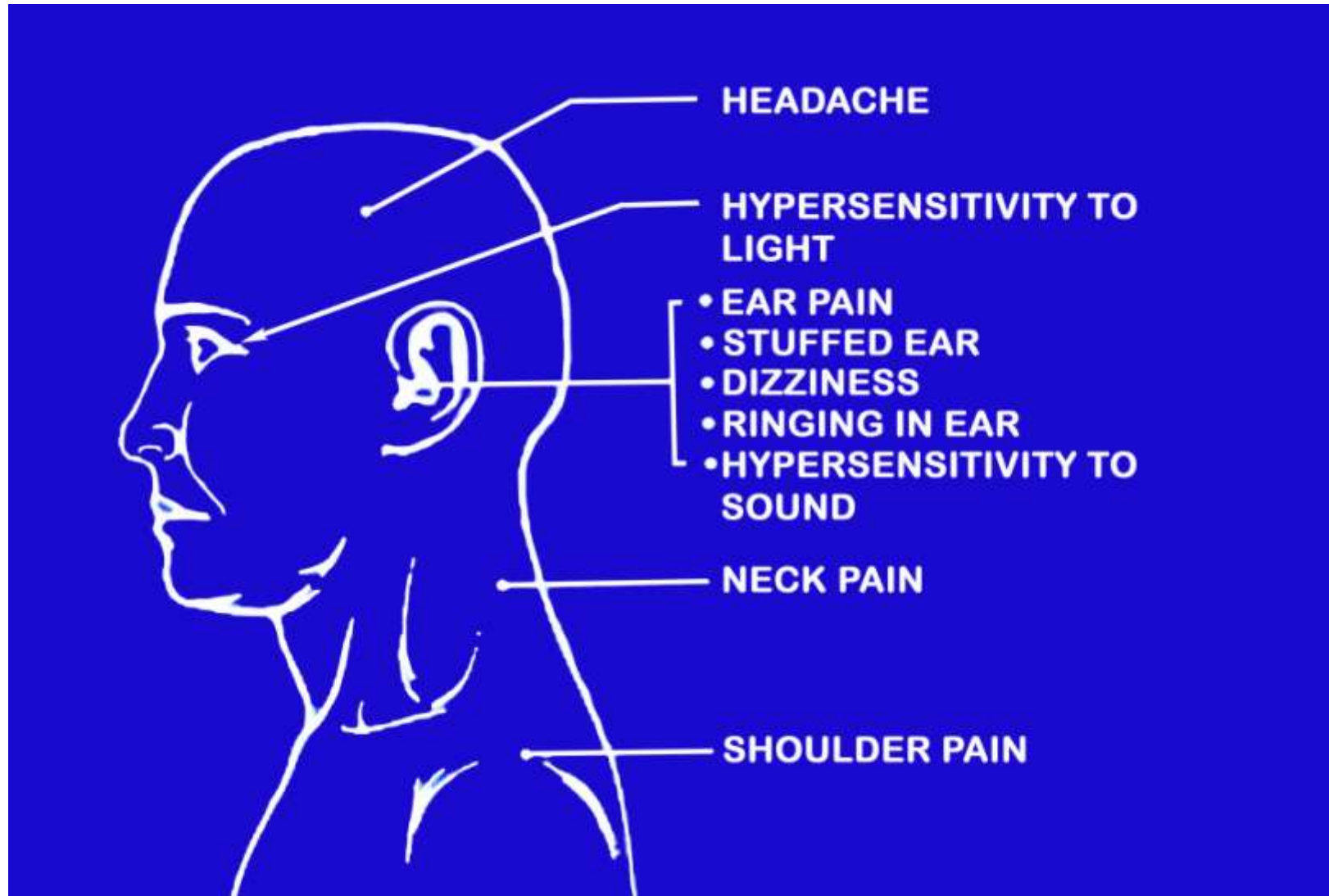
No prematurities, no bilateral imbalances, no cuspal restriction, combined with unrestricted mandibular migration lets the muscles de-accommodate completely.



Hydrodynamic equalization and axialization of occlusal forces in an Aqualizer.



# ***Up to 80% of These Symptoms are Occlusally Triggered***



## ***With the Aqualizer in Place Muscles Relax, Relieving Pain and Spasm***

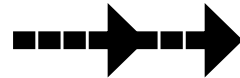
**The muscles re-organize in seconds to move into the most relaxed and comfortable position. The fluid system frees the muscles from the need to respond to other forces. Muscle pain diminishes rapidly and muscle spasm is eliminated, only if the cause is the occlusion (the way the patient's teeth "fit" together.)**



The Aqualizer is highly valuable when utilized as a diagnostic device to determine if the patient's head and neck pain have dental origins. This appliance eliminates proprioceptive, accommodative responses from the muscles and periodontal ligament connection. Also, it permits freedom of the muscles to find the most functionally generated, comfortable position while providing posterior occlusal support to maintain healthy joint loading. It is not a clinician-directed positioning of the mandible but a musculoskeletal dictated position. This allows the patient to find his or her most comfortable position or posture of the mandible, and the occlusion is designed to match this position.

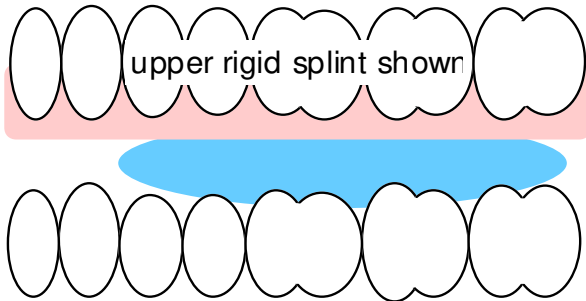
# AQUALIZER GUIDED EQUILIBRATION OF RIGID SPLINTS

## FIRST APPOINTMENT

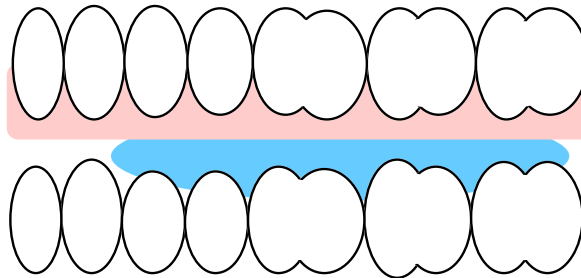


## FOLLOWED BY ONE WEEK OF WEAR

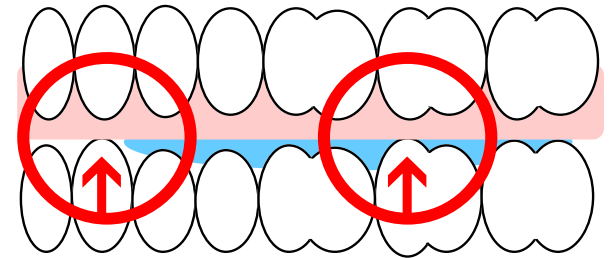
### INSERT RIGID SPINT AND AQUALIZE



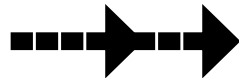
### FLUID LAYER BECOMES THINNER



### AQUALIZER DISCLOSES INTERFERENCES

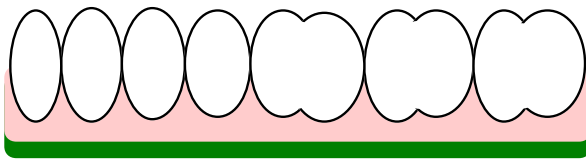


## SECOND APPOINTMENT

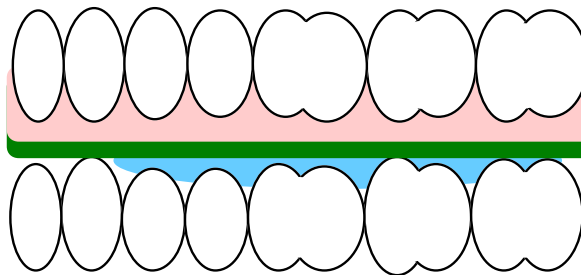


## IN-OFFICE ADJUSTMENT OF RIGID SPLINT

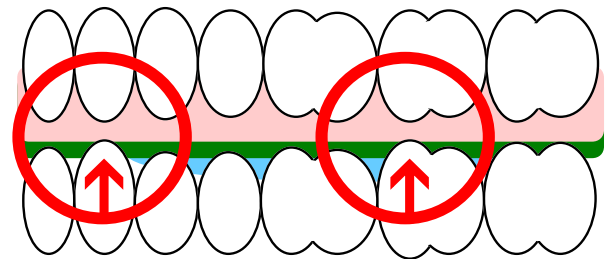
### PLACE WAX ON SPLINT



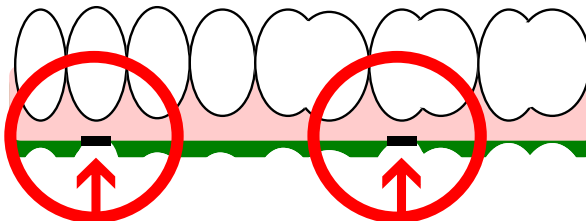
### INSERT SPLINT AND WORN AQUALIZER



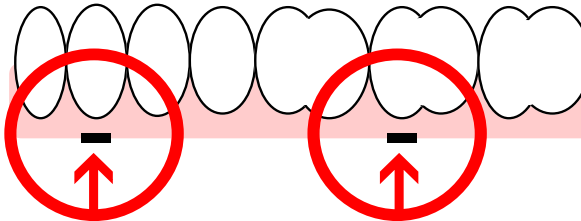
### RUB TEETH TOGETHER ON AQUALIZER INTERFERENCES SHOW ON SPLINT



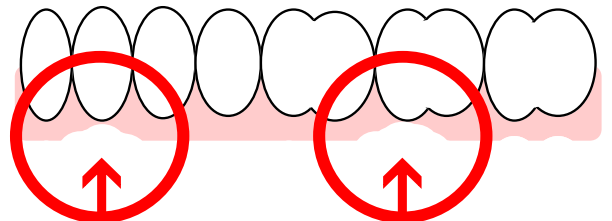
### MARK INTERFERENCE



### REMOVE WAX



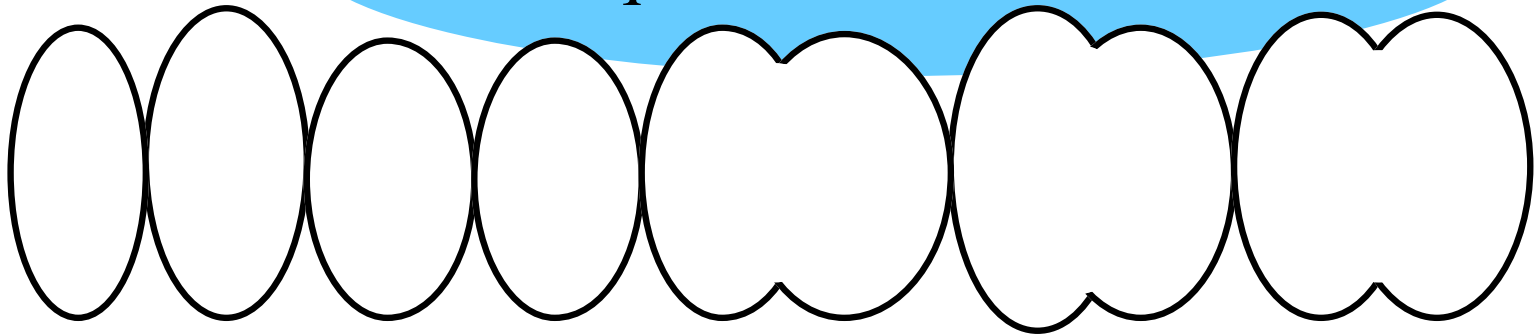
### SPLINT ADJUSTED



# ***Equilibrating a Splint Using the Aqualizer***

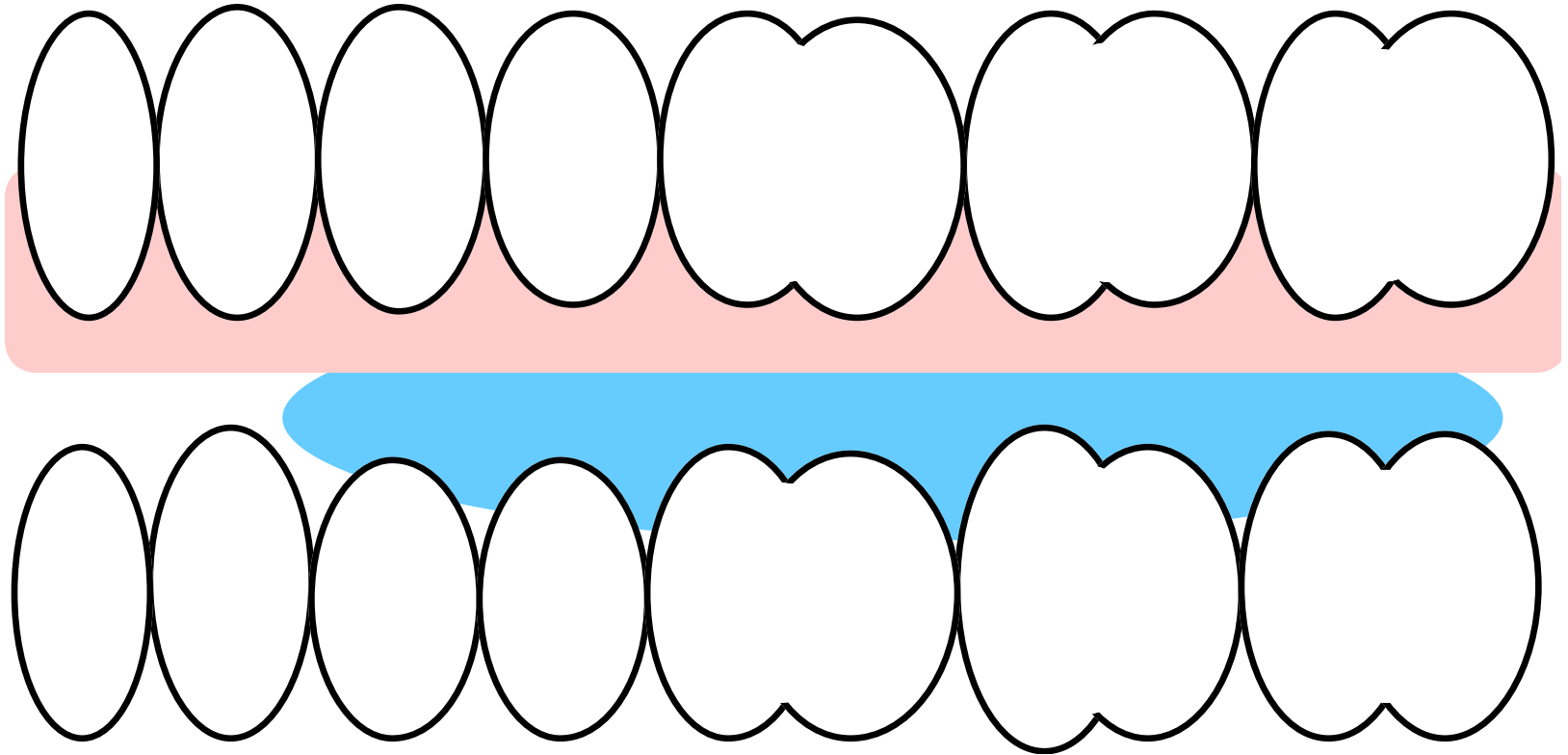


The Aqualizer Fluid Filled Pad

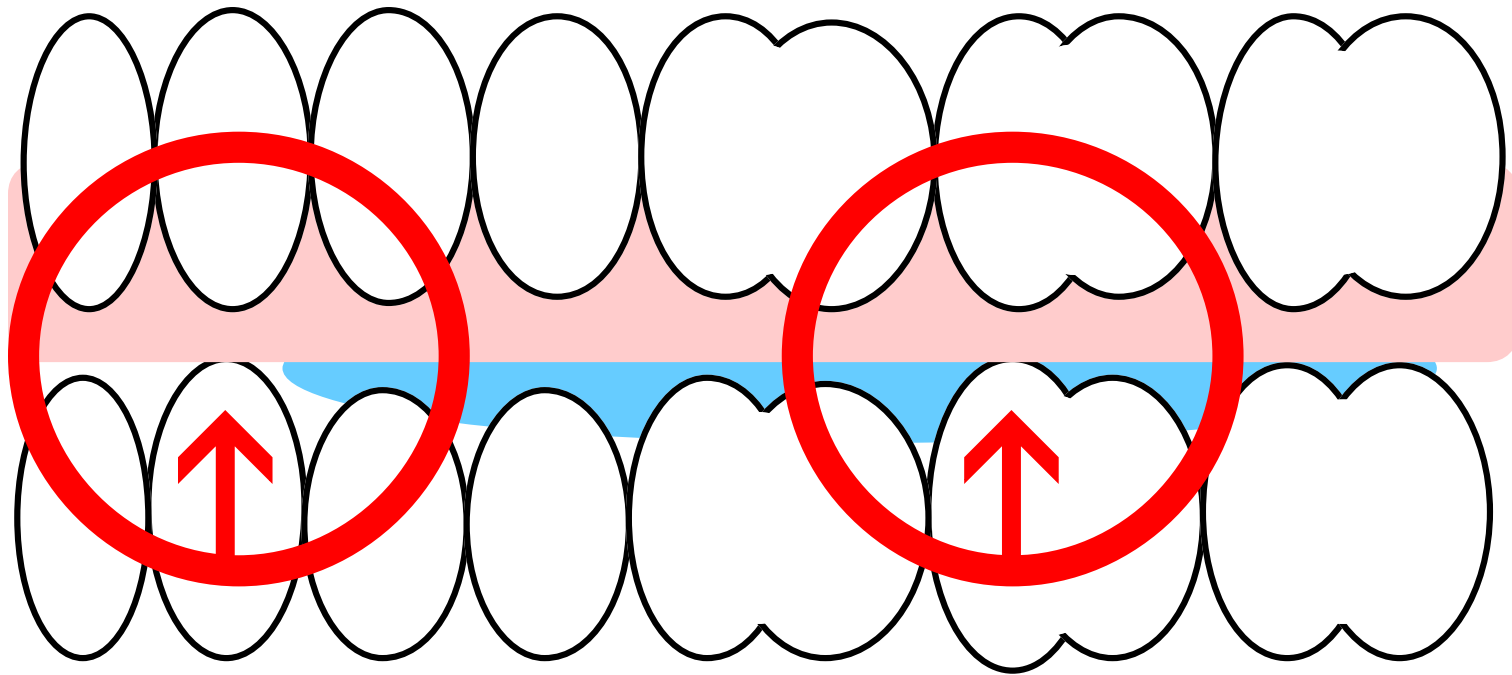




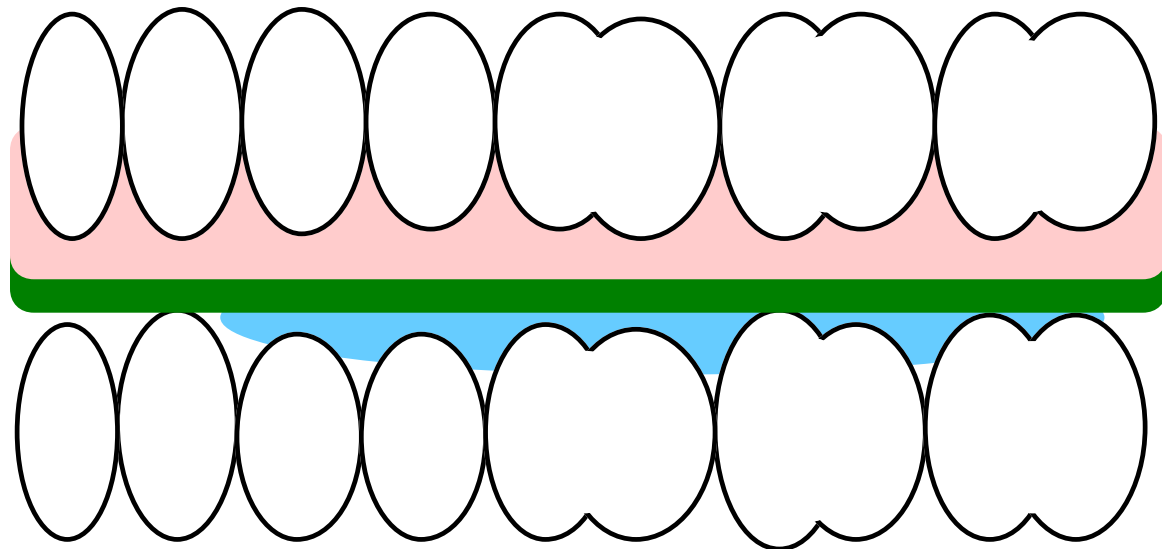
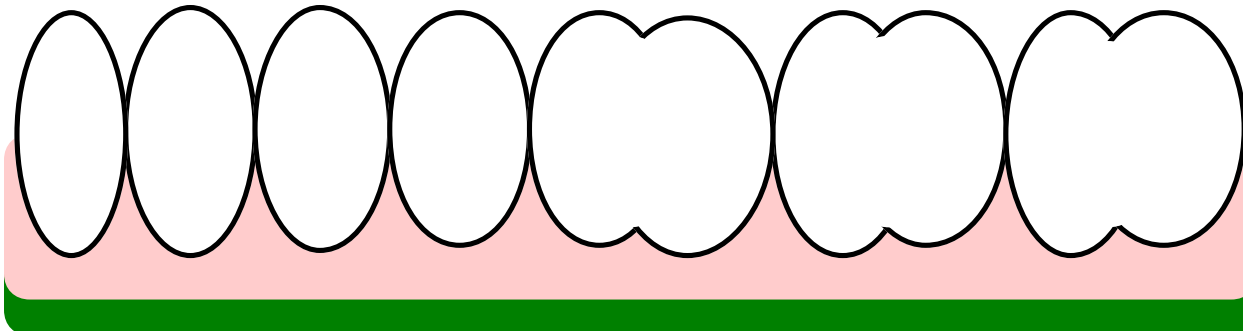
## ***Teeth Hold the Aqualizer in Place***



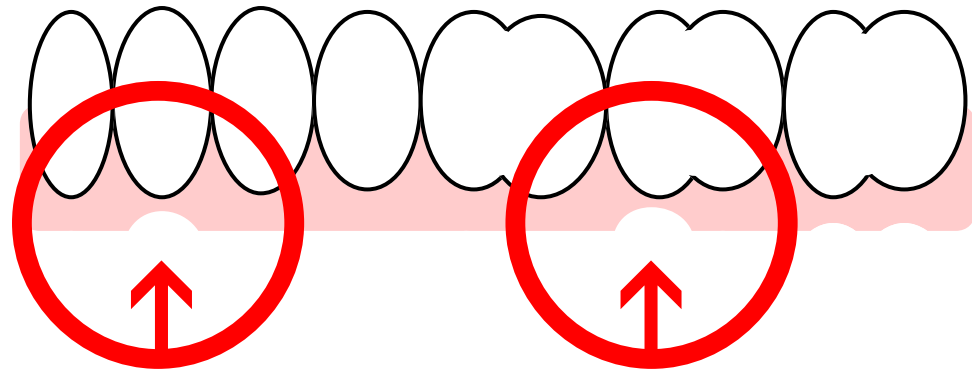
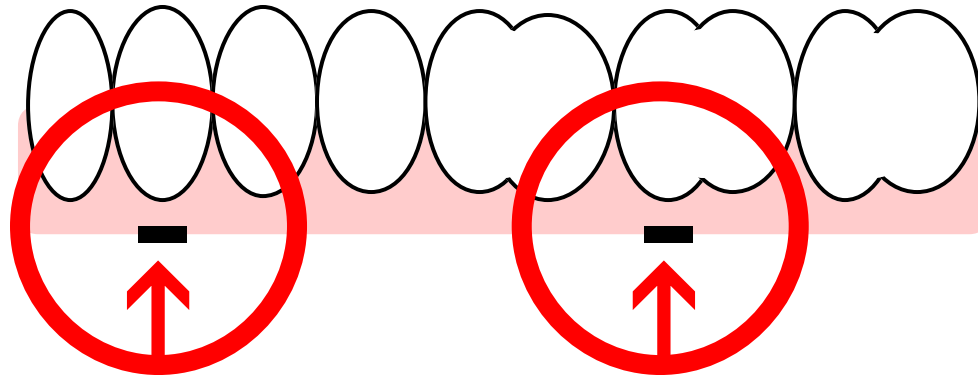
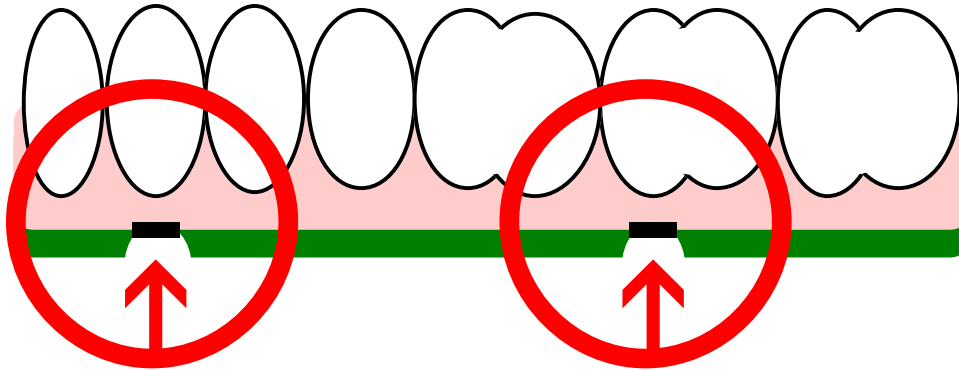
# ***Teeth Occlude into the Splint Showing Premature Contacts***



# ***Marking Premature Contacts Using Kerr's Occlusal Indicator Wax***

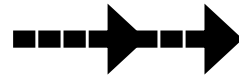


# ***Indents in the Wax Show Where Adjustments Need to be Made***



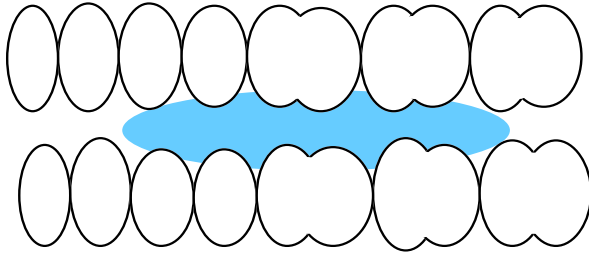
# AQUALIZER GUIDED EQUILIBRATION OF THE TEETH

## FIRST APPOINTMENT

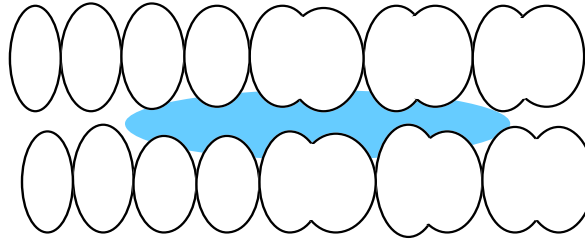


## FOLLOWED BY ONE WEEK OF WEAR

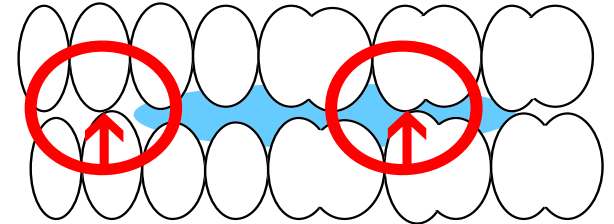
INSERT AQUALIZER



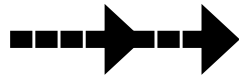
FLUID LAYER BECOMES THINNER



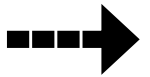
AQUALIZER DISCLOSES INTERFERENCES



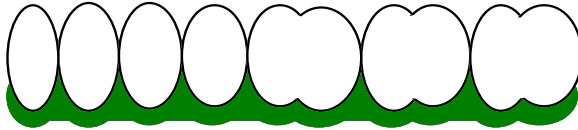
## SECOND APPOINTMENT



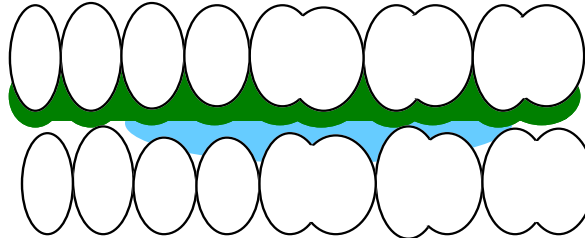
## IN-OFFICE OCCLUSAL CORRECTION



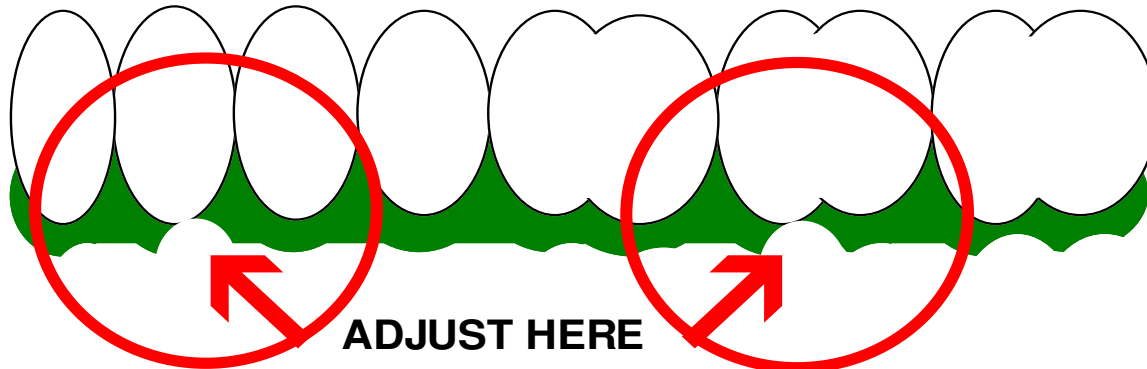
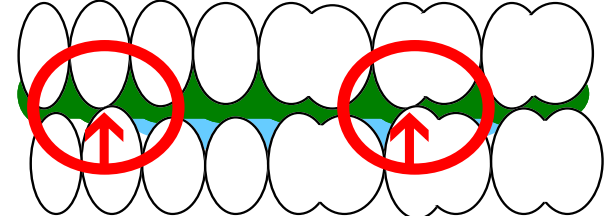
COVER ARCH WITH WAX



INSERT WORN AQUALIZER



RUB TEETH TOGETHER

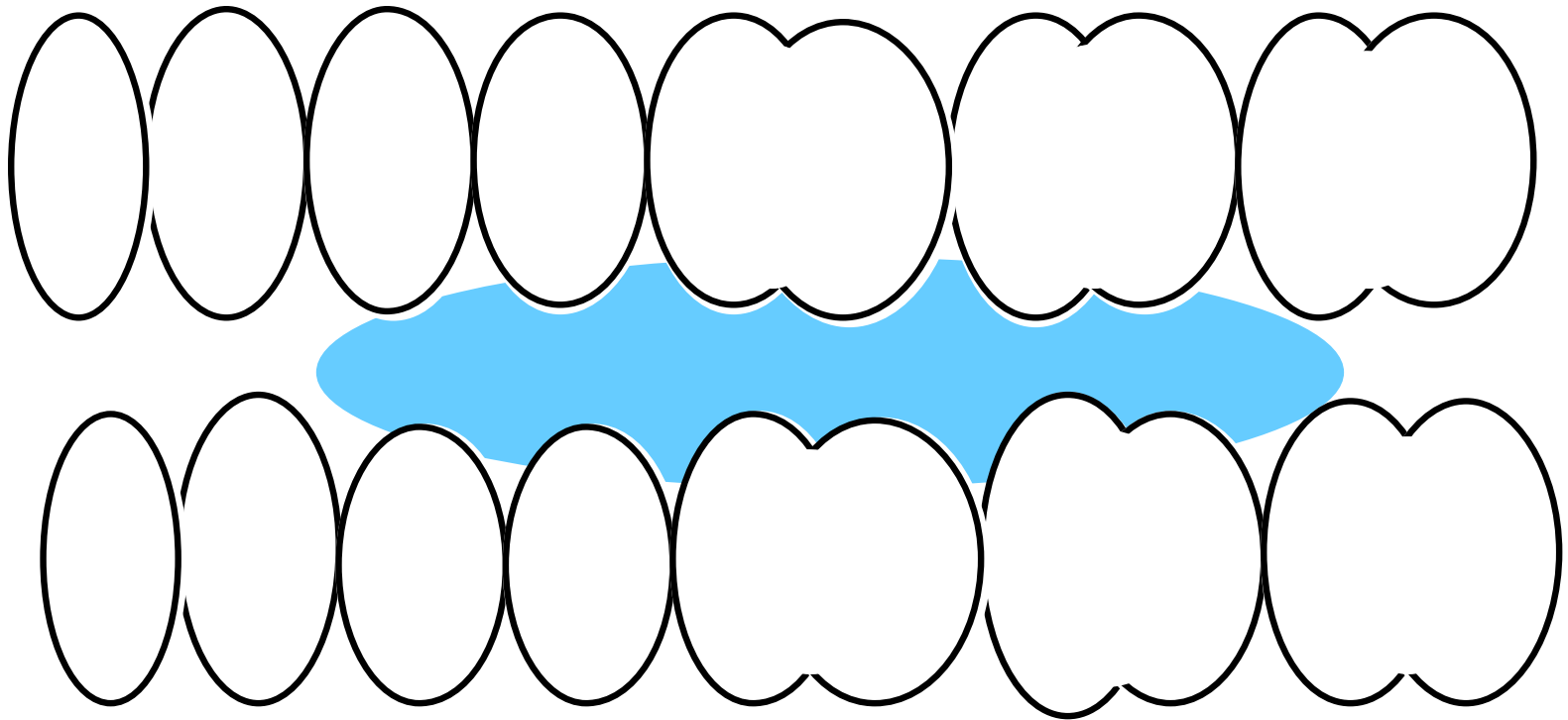


ADJUST HERE

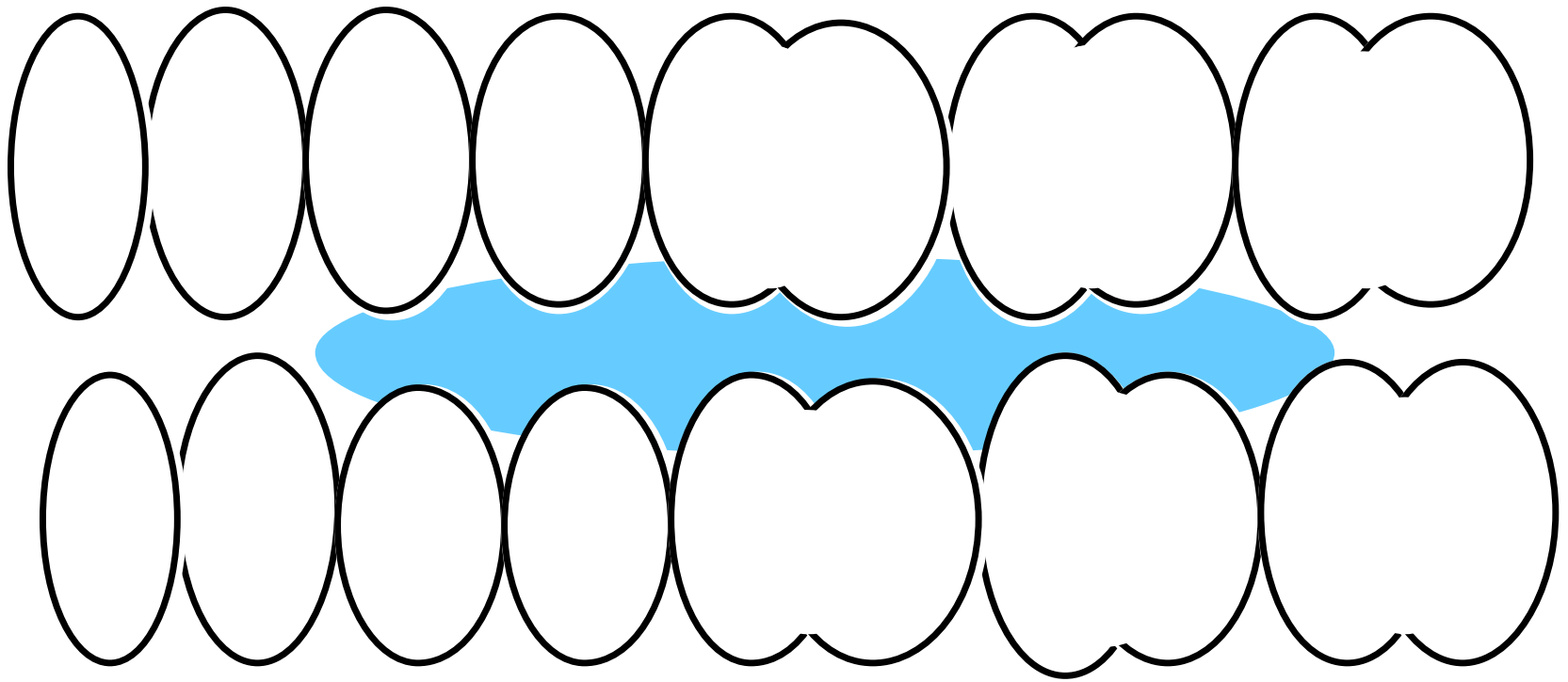




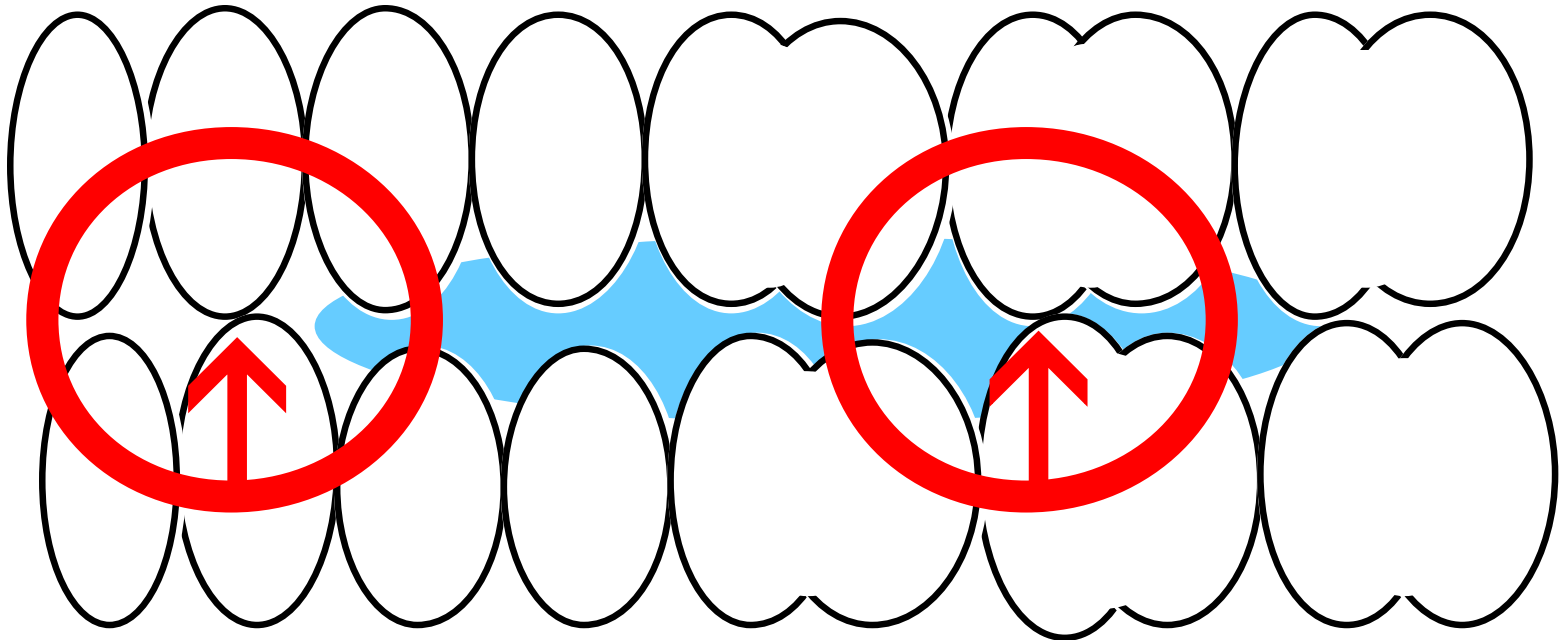
# ***Equilibrating Natural Teeth Using the Aqualizer***



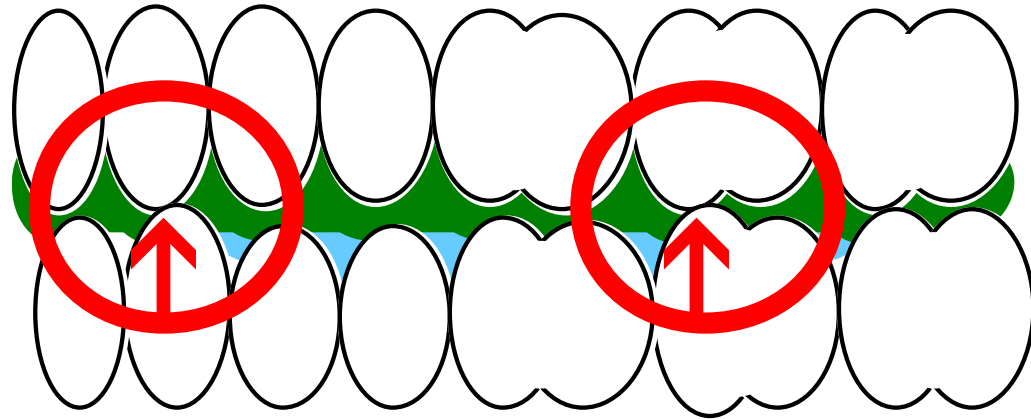
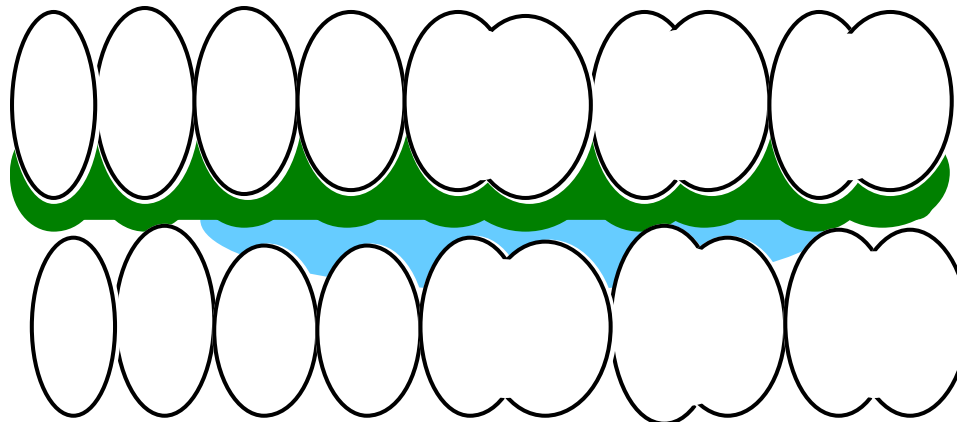
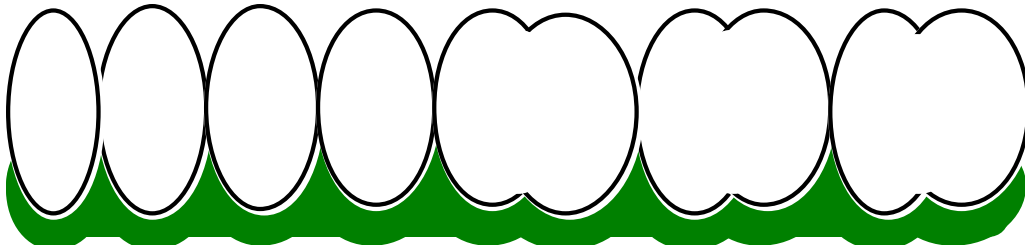
## ***Teeth Hold the Aqualizer in Place***



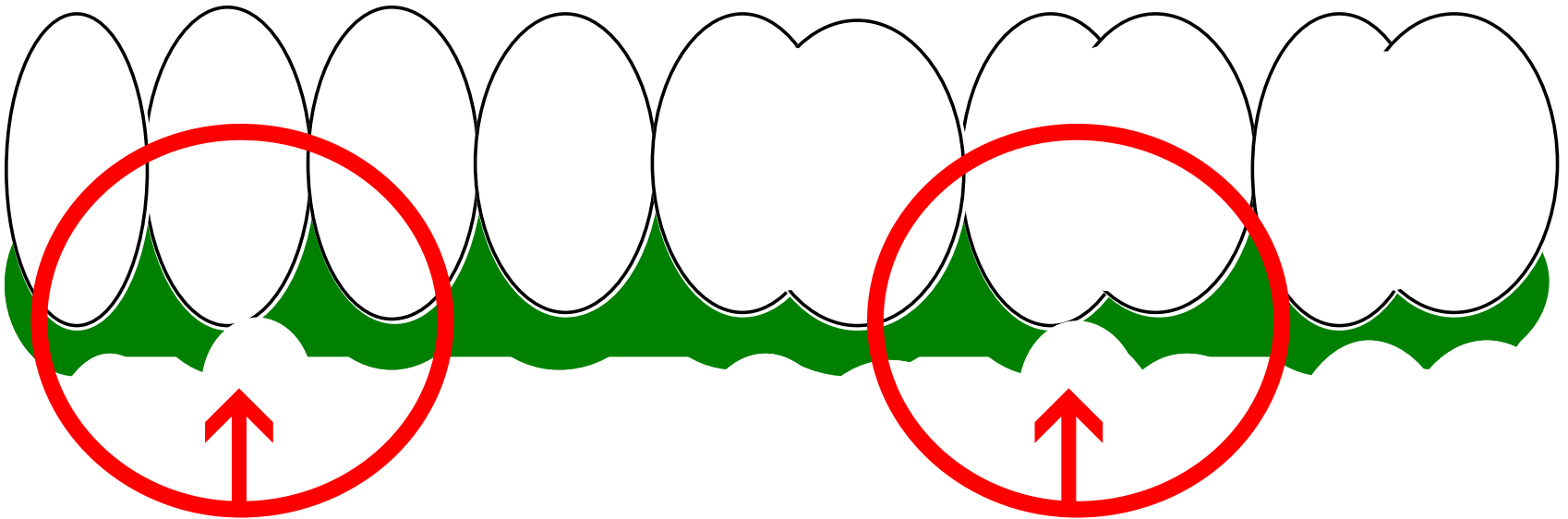
## ***Teeth Occlude Showing Premature Contacts***



# ***Marking Premature Contacts Using Kerr's Occlusal Indicator Wax***



***Indents in the Wax Show Where  
Adjustments Need to be Made***





# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

A Simple Step-by-Step Procedure to Capture the Open Bite for Splints and Nightguards

1



2



3



4



5



6



# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 1: – Insert an Aqualizer™ into the mouth allowing the muscles to bring the mandible to its natural, most comfortable 3-D position, (great in combination with T.E.N.S. and jaw tracking). Add base plate wax under pads for small increases of less than 2mm, if there is no spasm in the muscles, step two can be performed 10 minutes after insertion.



# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 2: – Instruct the patient to bite down naturally with the Aqualizer™ still in place, while injecting silicone from cuspid to cuspid.



# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 3: – Remove the Aqualizer™ with the anterior bite still in place. Inject registration material between the occlusal surfaces of the left and right posterior teeth. Instruct the patient to close carefully into the previously established anterior bite. Allow the silicone to set.



# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 4: – Remove the one-piece full arch bite registration from the mouth.



# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 5: – Assemble the patient's dental casts accurately into the bite registration. Send this assembly to the lab, or mount the combined casts/registration assembly on your articulator.





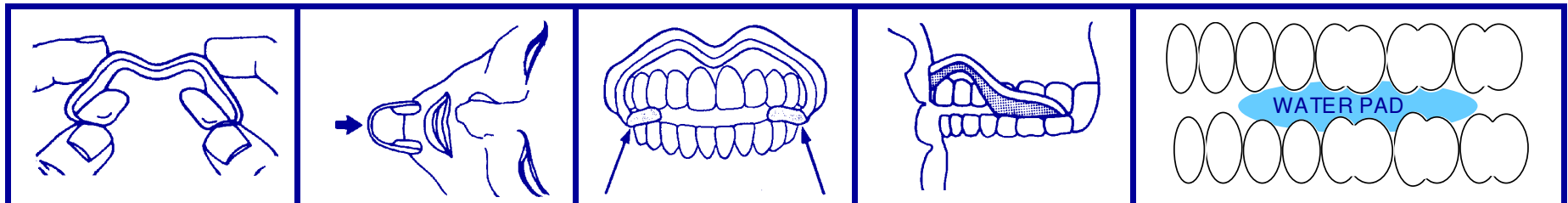
# AQUALIZER MUSCLE DIRECTED BITE REGISTRATION

*a perfect bite the first try*

Step 6: – Remove the silicone bite registration. The Aqualizer™ allows you to preview, then accurately reproduce for splints, the most functional cranio-mandibular occlusal relationships.







## JAW REPOSITIONING

The water pads instantly float the jaw. The way the teeth “fit” together no longer controls the position of the jaw. A closed fluid system equalizes force perfectly, so the pressure is the same on every tooth surface.

The muscles are in complete control and do not have to accommodate for the “fit” of the teeth or the proprioceptive system’s force-sensing mechanism.



# the AQUALIZER™



*Float away tension, muscle pain and headaches.*



- PRE-MADE, READY TO INSERT ORAL SPLINT  
Fast, No Waiting, Boiling or Fitting
- INCREASE YOUR SUCCESS TREATING:  
Headache, TMJ, Tinnitus, Neck and Shoulder Pain

The Aqualizer's water system perfectly balances and cushions the bite. Muscles relax, moving the jaw into the most comfortable position stopping the occlusal trigger of spasm and referred pain throughout the head, neck and shoulders.

For your additional convenience, our laboratory now stocks the Low, Medium, and High Volume Ultra Aqualizer



*Proven effective, over a million used to date*  
**Order Today**

**416-630-6262 1-800-410-4392**

