

### EAR BAROTRAUMA



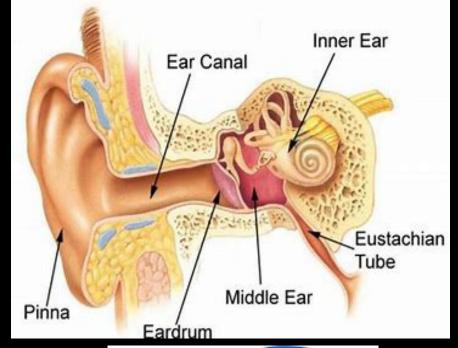
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Building the Nation's Leading Wound Care Team

## BAROTRAUMA

BAROTRAUMA TO THE EAR IS THE MOST COMMON COMPLICATION OF HYPERBARIC THERAPY. IT IS MORE DIFFICULT TO INFLATE THE MIDDLE EAR BECAUSE THE INNER ENDS OF THE EUSTACHIAN TUBES HAVE SLIT LIKE OPENINGS. THESE OPENINGS TEND TO CLOSE TIGHTER IF NOT OPENED ACTIVELY BY SWALLOWING, YAWNING, OR DOING THE VALSALVA MANEUVER.





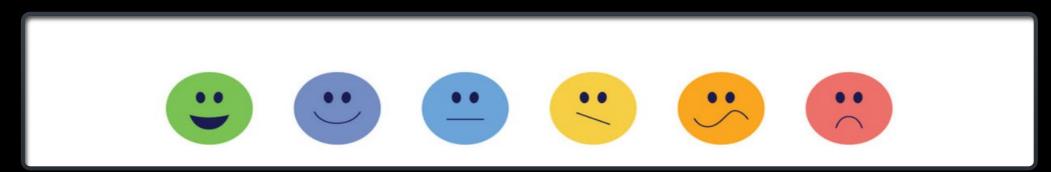


#### EXPERIENCING BAROTRAUMA

IF THE PATIENT EXPERIENCES MILD TO MODERATE PAIN, STOP THE PRESSURIZATION AND DECREASE TO THE POINT OF NO PAIN. MAKE SURE THE PATIENT DOES NOT TRY TO CLEAR WHILE THE CHAMBER IS DECOMPRESSING. REINFORCE EQUALIZATION TECHNIQUES AND CONTINUE TO PRESSURIZE WHEN PATIENT STATES THEY HAVE NO MORE DISCOMFORT. IF PATIENT EXPERIENCES SEVERE PAIN, AND IT IS NOT RELIEVED BY STOPPING THE PRESSURIZATION OR DECOMPRESSING, REMOVE PATIENT FROM THE CHAMBER AND NOTIFY THE HYPERBARIC PHYSICIAN.

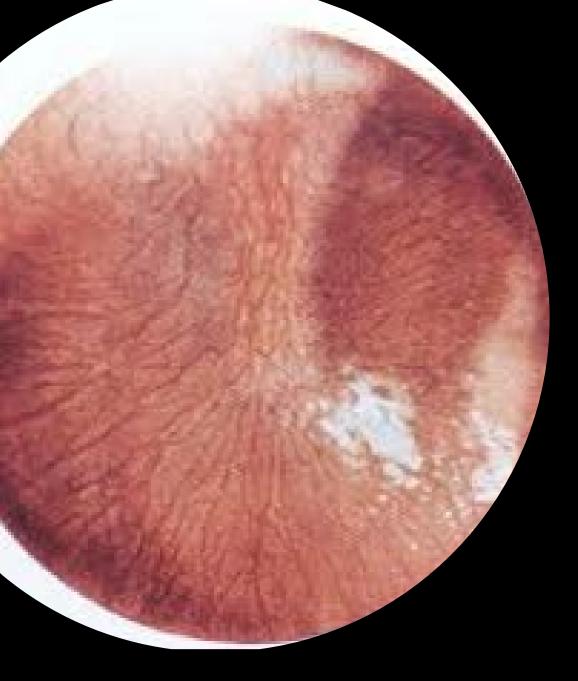
## CLASSIFICATION

CLASSIFICATION SYSTEM FOR THE DEGREE OF EAR SQUEEZE IS BASED ON THE APPEARANCE OF THE EAR DRUM. IT WAS DEVISED BY WALLACE TEED, A UNITED STATES NAVY SUBMARINE MEDICAL OFFICER DURING WORLD WAR II.



THE TEED SCALE IS THE METHOD OF CLASSIFICATION FOR THE DEGREE OF DAMAGE DONE TO THE TYMPANIC MEMBRANES AND MIDDLE EAR FROM BAROTRAUMA.

#### SYMPTOMS WITH NO PHYSICAL FINDINGS.

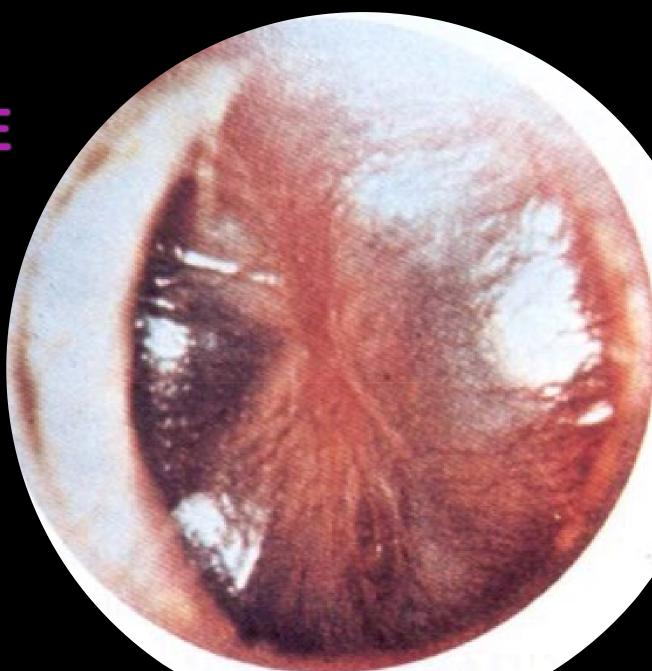


#### ERYTHEMA OR INJECTION AROUND THE HANDLE OF THE MALLEUS.

#### ERYTHEMA OR INJECTION OF THE ENTIRE TYMPANIC MEMBRANE.



Hemorrhage into the tympanic membrane appearing as bright red patches.





DEEP BLUE/BLACK APPEARANCE OF THE TYMPANIC MEMBRANE, DUE TO BLOOD FILLING THE MIDDLE EAR WITH THE POSSIBILITY OF RUPTURE PRESENT.

#### Perforated ear drum.





# TEST TIME!

# What is the most common complication of Hyperbaric Therapy?



## **BAROTRAUMA.**

# The TEED Scale was developed to assess patients for potential oxygen seizures?





#### PATIENTS SHOULD BE INSTRUCTED NOT TO TRY TO EQUALIZE DURING ?



# DECOMPRESSION.



#### **EQUALIZING TECHNIQUES INCLUDE ALL OF THE FOLLOWING**

#### **EXCEPT: VALSALVA, YAWNING, BLINKING, OR SWALLOWING ?**

# Blinking.



# Hemorrhage in the tympanic membrane is classified as a TEED 1?





