

QUIZ #4 -- PHYSIOLOGY

1. What is the most common cause of a lung overexpansion injury?
 - a. Skip breathing
 - b. Rapid ascent while holding your breath
 - c. A rapid ascent while exhaling
 - d. Taking very deep breaths at very shallow depths

2. What is the most serious result from lung overexpansions?
 - a. Tissue emphysema
 - b. Pneumothorax
 - c. Air embolism or arterial gas embolism

3. Vertigo can be caused by
 - a. Pressure inside an airspace is greater than the pressure surrounding the airspace
 - b. A ruptured eardrum
 - c. Ending a dive because you cannot successfully clear your ears
 - d. Blocking of the Eustachian tube causing the diver to become disoriented and anxious

4. Hyperbaric Treatment is?
 - a. An underwater treatment involving deep breathing to relax a diver who is starting to panic
 - b. A treatment to lessen the effects of severe vertigo on certain divers
 - c. A treatment involving a series of injections that will lessen the effects of a minor air embolism on a diver
 - d. A treatment designed to reduce bubble size and restore circulation in an embolized diver

5. What is nitrogen narcosis?
 - a. The Nitrogen in the air we breathe becomes toxic at depths in excess of 130 feet
 - b. When alcohol mixes with nitrogen bubbles in the bloodstream at depths deeper than 50 feet causing a diver to appear drunk by impairing judgment
 - c. The effect of narcotics mixing with nitrogen in the bloodstream of a diver
 - d. The effects of nitrogen becoming toxic on dives exceeding one hour

6. What is the best technique for maintaining normal lung volume?
 - a. Holding your breath for about 2 seconds longer than when normally breathing on an ascent to the surface
 - b. Breathe deeper than normal while ascending
 - c. Breathe quicker than normal while ascending
 - d. Breathe normally while ascending

7. Where is the Eustachian Tube located?
 - a. In between the ears allowing for equal pressure to transfer easily
 - b. The back of the throat to the sinuses allowing for relief from sinus squeeze
 - c. Back of the throat to the middle ear allowing for easy clearing of the ear
 - d. The chest in between the lungs allowing for the pressure between both lungs to equalize

8. Divers should equalize?
 - a. When they feel a lot of pressure
 - b. When they can't take the pain anymore
 - c. Often at first then only when the pressure begins
 - d. Early and often throughout the dive

9. For maximum efficiency your breathing should be?
 - a. Slightly slower than normal and deeper than usual
 - b. Slightly faster than normal and deeper than usual
 - c. Slightly faster than normal and not as deep as usual
 - d. Rapid and shallow to minimize the amount of oxygen in the lungs

10. Nitrogen is a metabolically inert gas, this means that the body?
 - a. Does not absorb the nitrogen
 - b. Absorbs the nitrogen to dilute the oxygen mixture in the bloodstream to avoid oxygen toxicity
 - c. Absorbs the nitrogen for use of energy
 - d. Does not use the nitrogen