An Overview of Aquatic Therapy

Review Quiz

1. The ability to decrease stress on weight bearing joints is aided by which of the following properties of water?

1. Viscosity
2. Thermodynamic properties
3. Buoyancy
4. Drag
5. Which of the following techniques would be considered the MOST appropriate progression to increase exercise difficulty during aquatic physical therapy?
6. A patient who was previously ambulating in 5 ft. of water begins to ambulate in 3 ft. of water.
7. A patient who was previously performing aquatic exercise in a t-shirt and shorts begins exercising in a bathing suit.
8. A patient who was previously ambulating in 3 ft of water begins ambulating in 5 ft of water
9. A patient who was previously exercising in 85 degree water begins exercising in 92 degrees of water.

 3) Which of the following characteristics of water help to decrease peripheral edema?

1. Symmetrical graded increase in the pressure gradient of water from deeper to shallower.
2. The conductivity of cooler water temperatures.
3. The ability of water to surround entire joints, such as the ankle or wrist, with increased surface area contact as compared to the application of ice.
4. All of the above
5. Which of the following patients would NOT be appropriate for aquatic physical therapy intervention?

1. A patient with COPD, receiving outpatient PT for improved cardiovascular endurance.
2. A patient with MS who complains of heat intolerance but does not have spasticity.
3. A morbidly obese patient who is experiencing difficulty with ambulation secondary to a current infection with a purulent wound on her right foot.
4. A patient with fibromyalgia who complains of constant pain and high levels of fatigue.
5. Which of the following interventions would be appropriate to improve peri-scapular strength and posture by decreasing forward head and rounded shoulders?

1. Patient floating (with assistive floatation devices) in prone, wearing a snorkel, and receiving tactile stimulation to the rhomboids and anterior cervical musculature.
2. Patient holding kickboard horizontally in front of body, one hand on each side of the board with the board 50% immersed in water, slowly retracting the shoulders and then performing passive protraction with the help of the therapist.
3. Patient sitting on stairs in pool with both hands on stair, using shoulder depressors and retractors to lift his or her bottom off of stair and walk sideways on his or her hands across the width of the staircase.
4. All of the Above.
5. While many of the below techniques may be applicable for a patient with Parkinson’s Disease, which technique do you think would be the MOST appropriate to help the patient improve balance and decrease falls risk?
6. The Bad Ragaz Ring Method
7. Ai Chi
8. Watsu
9. None of the above
10. Which of the following elements of an aquatic physical therapy program would be considered absolutely necessary in order to treat a 12 year-old boy with spastic quadriplegic CP?

1. The patient must own a bathing suit in order to decrease drag.
2. The water temperatures must be warm in order to reduce the effects of spasticity.
3. The patient must know how to swim in order to ensure safety.
4. The pt. must have full cognitive functioning to ensure safety.
5. Which of the following patients would NOT be appropriate for aquatic physical therapy?
6. A patient who is 3 weeks status post ACL reconstruction and is unable to fully weight bear on land secondary to pain.
7. A patient with COPD who is receiving outpatient PT for back pain but is unable to tolerate lying in the prone position.
8. A patient 2 days s/p lateral ankle sprain who is also experiencing symptoms from a mild concussion secondary to the fall.
9. An 8 year old boy with muscular atrophy who ambulates independently and is attending physical therapy to increase his endurance and strength.
10. Which of the following requires a special certification in order to DOCUMENT that you performed the specific technique by name?
11. The Bad Ragaz Ring Method
12. Watsu
13. Ai Chi
14. The Halliwick Method
15. For a recreational basketball player who is 6 feet tall and experiencing symptoms of sciatica due to narrowing of the intervertebral disk between L4 and L5, which of the following aquatic physical therapy interventions would be MOST appropriate to help decrease the patient’s symptoms?

1. Lumbar traction performed in 3 ft. of water.
2. Lumbar traction performed in 10 ft. of water with floatation devices around the patient’s ankles.
3. Lumbar traction performed in 10 ft. of water with weights around the patient’s ankles.
4. Ambulation in 3 feet of water while carrying a heavy object.

Answer Key: 1) C 2) A 3) D 4) C 5) D 6) B 7) B 8) C 9) B 10) C