**Pg. 431 #3, 4, 9**

**#3) List the stages of recovery of arm function after a CVA, as described by Brunnstrom**

* Stages of recovery of arm function after a CVA, as described by Brunnstrom, are…
  + Stage 1: Flaccidity
  + Stage 2: Spasticity develops: minimal voluntary movements
  + Stage 3: Spasticity peaks: flexion and extension synergy patterns present; hip-knee flexion in sitting and standing
  + Stage 4: Knee flexion past 90 degrees in sitting, with foot sliding backward on floor; dorsiflexion with heel on floor and knee flexed to 90 degrees
  + Stage 5: Knee flexion with hip extended in standing; ankle dorsiflexion with hip and knee extended
  + Stage 6: Hip abduction in sitting or standing; reciprocal internal and external rotation of hip combined with inversion and eversion of ankle in sitting

**#4) Describe the UE flexor and extensor synergy patterns**

* Flexor synergy consists of scapular adduction and elevation, shoulder abduction and eternal rotation, elbow flexion, forearm supination, wrist flexion, and finger flexion.
* Extensor synergy pattern consists of scapular abduction and depression, shoulder addiction and internal rotation, elbow extension, forearm pronation, and wrist and finger flexion or extension

**#9) Describe how the NDT techniques can be incorporated into a basic daily living task**

* NDT techniques focus on relearning normal movement on the effected side by encouraging using both sides of the body to relearn. These techniques can be incorporated into daily living tasks by weight bearing activities that involve UE during functional activities, bilateral activities, and guided use if needed. For example, a patient could start with reaching for objects with each hand then they could eventually use a rag to wash off the counter crossing midline and alternative between affected and non-affected UE.

**Pg. 448 #4, 9, & 10**

**#4) Explain how the OTA would treat a client who has sensory changes on the left side of the body and poor self-awareness of deficit areas. How would the OTA instruct the clients significant others?**

* In this case the OTA would emphasize overall safety for the patient and their significant other. The OTA would incorporate interventions that allow the client to recognize their affected side and work on finding ways to adapt to the sensory changes. The OTA can instruct the clients significant others on ways to prevent additional harm. For example, protecting affected body parts while a person is performing specific tasks that could be dangerous like cooking with a hot oven.

**#9) What happens to the eye that lack oculomotor control? What happens to vision as a consequence?**

* The eye that lacks oculomotor control tends to eventually lack visual acuity and has issues with double vision or inability to focus. Oculomotor control affects the ability to control the movement of the eyes and can cause additional issues because it wears down the eye and nerve associated.

**#10) Contrast the effects of a visual field loss with the effects of true hemi-inattention**

* Visual field loss is when the person is completely unaware of any absence of vision, so they may be unaware of what they can see and cannot see. They perceive their environment differently because they have a reduced space to see due to loss of complete visual field. They may have trouble with awareness of objects in every direction or scanning in big environments. Visual hemi-inattention is where the patient simply doesn’t pay attention to one side of their body or one of their eyes. For example, they may not visually scan to the left side of their body if they have recently experienced a stroke on the right side of their brain. This can cause them to be unsafe when ambulating or off centered because they don’t look to one side or the other.

**pg. 463 #7 & 9**

**#7) Explain what is meant by categorization, and describe ways you use this skill when you learn something new**

* Categorization is a way that a person chunks information or places it in groups which in turn shows they understand what is going on. We may use categorization in everyday activities without even thinking about it but when we learn something new it could potentially be challenging for people. A way to use this skill when we learn something new could be processing the information or scenario by verbalizing the steps, precaution, or overall information out loud with another person. This shows overall understanding and that the person is aware of tall factors involved with situation.

**#9) Describe how you might work with a client with ideation or ideomotor apraxia in relearning to brush his or her teeth**

* Ideomotor apraxia is when an individual has aphasia or comprehension difficulties that cause issues with general ADL’s. An OT practitioner should use clear and simple steps when working with a patient with ideomotor apraxia or ideation. When relearning how to brush his or her teeth the OT practitioner should communicate in a slow, concrete, and easy to understand way. They should break down each step of the task and provide verbal and demonstrated instructions for the patient. This would give the patient many ways to learn because they have tactile, verbal, and demonstration.