Chapter 15, Quiz 1

1. The transformation of energy of a stimulus into electrical energy is called
   1. transformation
   2. transduction
   3. transgeneration
   4. stimulation
   5. reengergization
2. The circuit level of neural integration in the somatosensory system involves
   1. neuronal circuits in the cerebral cortex
   2. perceptual processing
   3. descending pathways
   4. sensory receptors
   5. ascending pathways
3. The specific ascending pathways of the somatosensory system is also called the
   1. indirect system
   2. multineuronal systems
   3. anterolateral system
   4. lemniscal system
   5. direct system
4. The lowest level of motor integration is the
   1. segmental level
   2. instruction level
   3. projection level
   4. circuit level
   5. program level
5. The projection level of motor control directly controls
   1. the spinal cord
   2. the hypothalamus
   3. pattern recognition
   4. sensory receptor pathways
   5. the white matter of the cerebrum
6. Lesions of the pyramidal tracts result in
   1. Parkinson’s disease
   2. a negative Babinski reflex
   3. hypotonia
   4. Huntington’s disease
   5. senile dementia
7. An EEG dominated by alpha waves indicates that the individual
   1. is in REM
   2. awake and mentally alert
   3. is, if an adult, brain damage
   4. is in a state of relaxed wakefulness
   5. is asleep
8. Stage 4 sleep is characterized by
   1. decreased digestive activity
   2. EEG dominated by theta waves
   3. rapid eye movement
   4. EEG dominated by delta waves
   5. EEG that displays sleep spindles
9. Narcolepsy is
   1. the inability to sleep
   2. involuntary lapses into sleep
   3. the processing of dreams during REM
   4. addiction to narcotics
   5. characteristic of Stage 1 sleep
10. The portion of the limbic system essential to memory is the
    1. basal nuclei
    2. tectum
    3. hippocampus
    4. prefrontal cortex
    5. pons
11. The loss of memories formed in the past is called
    1. Tay-Sachs disease
    2. LTM
    3. dyskinesia
    4. anterograde amnesia
    5. retrograde amnesia
12. The segmental level of motor integration includes
    1. ALSs
    2. ACHs
    3. NEs
    4. STMs
    5. CPGs
13. Disease of the basal nuclei are characterized by
    1. dyskinesia
    2. retrograde amnesia
    3. anterograde amnesia
    4. neuromuscular degeneration
    5. senile dementia
14. Alcohol
    1. increase ADH secretion
    2. enhances Stage 4 sleep
    3. suppresses Stage 4 sleep
    4. suppresses REM sleep
    5. works in much the same way as antidepressants
15. Retrograde transmission may be essential for memory formation the neurotransmitter most likely to play the role of retrograde messenger is
    1. CO
    2. ACH
    3. DA
    4. NO
    5. ATP

Answer Key:

1. 2. 3. 4. 5. 6. 7.

8. 9. 10. 11 12. 13. 14.

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