

Name _____ Date _____

1. Following a motor vehicle accident, your patient presents with a whiplash type injury. You palpate the right sternocleidomastoideus and the right upper trapezius muscle. The patient withdraws from the palpation of the SCM due to pain and then grimaces and flinches when the upper trapezius is palpated. Respectively grade the tenderness of each.
 - a. Grade IV and II
 - b. Grade II and III
 - c. Grade III and II
 - d. Grade II and IV

2. While examining this same patient, she withdraws and complains of severe pain with light palpation of the posterior occipital muscles. How would you grade the reaction with the tenderness grading scale?
 - a. Grade III
 - b. Grade I
 - c. Grade IV
 - d. Grade II

3. Which arteries supply the brain?
 - a. Carotid
 - b. Internal carotid
 - c. External carotid
 - d. All of the above

4. What finding with physical examination would indicate the need to auscultate the carotid arteries and rule out arterial stenosis or compression?
 - a. Reduced pulse amplitude in the radial artery
 - b. Symmetrical reduction of the carotid pulse
 - c. Asymmetrical reduction of the carotid pulse
 - d. Trigeminal neuralgia

5. If your patient presents with very severe headaches, numbness on the right side of the body, diplopia, nystagmus, dysarthria, and dizziness, which protocol would you implement?
 - a. History, auscultation of the carotid arteries, George's test, and Underburg's test
 - b. History, George's test, auscultation of the carotid arteries, and Underburg's test
 - c. History, palpation and auscultation of the carotid arteries, Maigne's test
 - d. History, vital signs, auscultation of the carotid arteries, and cervical range of motion tests
 - e. None of the above

6. What condition would most concern you with the patient described in question #5?
 - a. Absence of a carotid artery
 - b. Migraine headaches
 - c. Active cerebral vascular accident in process
 - d. Cervical subluxation syndrome

7. A patient presents in your office with torticollis. Initially, what should be the most significant piece of clinical data, which will determine your examination protocol?
 - a. Degree of head tilt
 - b. Severity of pain
 - c. History of torticollis
 - d. Level of spinal subluxation

8. When palpating the upper trapezius muscles bilaterally, you notice taut and tender bands with a reactive twitch. What would you consider as a diagnosis with these findings?
 - a. Muscular spasm
 - b. Muscular strain
 - c. Myofascial pain condition
 - d. Myofascial trigger point

9. Upon making your diagnosis with this patient, what causes would you consider?
 - a. Psychological stress
 - b. Exposure to cold weather
 - c. Dehydration
 - d. All of the above

10. Upon palpating the cervical spine of a patient with a history of several motor vehicle accidents, you reveal pain with palpation of the ligamentum nuchae and the zygapophyseal joints plus crepitation. What diagnosis is most likely?
 - a. Cervical joint dysfunction
 - b. Spinal subluxation
 - c. Post-traumatic cervicgia and degenerative joint disease
 - d. Myofascial Pain Syndrome

11. Why should a history precede the cervical range of motion examination?
 - a. Avoid harming the patient
 - b. Rule out vascular compromise
 - c. Rule out fracture dislocation
 - d. All of the above

12. Which cervical flexion muscle is innervated by a cranial nerve?
- Longus colli
 - Scalenus anterior
 - Scalenus medius
 - None of the above
13. Name the cervical extension muscle that is innervated by a single spinal nerve level?
- Rectus capitis posterior major
 - Multifidus
 - Upper trapezius
 - Splenius cervicis
14. Name the nerve supply for the cervical extensor muscle that is frequently irritated and taut with an acute stiff neck?
- C 3-4
 - C 1-8
 - C6 and C8
 - C 6-8
15. Name the two lateral flexion muscles that are not innervated by more than one spinal nerve supply.
- Obliquus capitis inferior and SCM
 - SCM and longus colli
 - SCM and multifidus
 - None of the above
16. A patient presents with occipital headaches on the right. Resisted cervical range of motion revealed painless, weakness of the SCM with left rotation. Identify the nerve involved.
- C 2 right
 - C1 left
 - C 2 left
 - C 1 right
17. Upon resisted cervical rotation to the right, you reveal a grade 4/5 motor deficit with pain. Identify the involved muscle.
- Left SCM
 - Right multifidus
 - Left levator scapulae
 - All of the above

18. The inability to rotate the head to one side would involve which of the following muscles?
- Contralateral multifidus
 - Ipsilateral Obliquus capitis inferior
 - Contralateral SCM
 - All of the above
19. If the above patient presented in your office for treatment of a neuromusculoskeletal condition, which Chief Complaint would you suspect?
- Headaches
 - Cervicogenic cephalgia
 - Cervicobrachial neuralgia
 - Arm pain
20. While your patient performs right cervical rotation, which vertebral artery would be compressed and which artery would experience a reduction of blood flow?
- Left vertebral and left basilar
 - Left vertebral and basilar
 - Left basilar and right vertebral
 - Right vertebral and common carotid
21. Name a predisposition to cerebrovascular accident, which involves a necessary convenience.
- BCP
 - Cigarette smoking
 - Obesity
 - Diabetes
22. Name a predisposition to cerebrovascular accident, which may be eliminated 5% of the time upon physician request.
- Cigarette smoking
 - Oral contraceptives
 - Alcohol consumption
 - Obesity
23. Reduction of blood supply to the upper cervical spine with neurological symptoms is considered to be an absolute contraindication to spinal manipulation. How might this patient present in a chiropractic office?
- Holding head in hands
 - Wearing a hard cervical collar
 - Demonstrating a Rust's sign
 - All of the above

24. When the patient rotates his head to the left and experiences dizziness and diplopia, which artery is suspected of occlusion?
- Left vertebral
 - Right vertebral
 - Right common carotid
 - Right internal carotid
25. Rotation and extension of the head, places a motion-induced compression on the contralateral vertebral artery, which blood vessels if stenotic might produce vertigo and nausea?
- Vertebral
 - Basilar
 - Carotid
 - All of the above
26. Please describe the rationale for Hautant's test.
27. Name the maneuver utilized to differentiate a sprain from a strain. Describe in detail the procedure and the rationale.
28. When would the Soto-Hall test be contraindicated? Is it a specific test? Describe the procedure and rationale.

29. Describe the Rust Sign and its rationale.
30. Describe the Sharp-Purser test. When is performance of the test indicated? When is performance of the test contraindicated? Explain the rationale.
31. Explain the procedure and rationale for the Valsalva maneuver. Why might you discover a Dejerine's sign while observing the Valsalva maneuver?
32. How would you differentiate an anterior disc lesion from a posterior disc lesion with cervical compression testing?

33. Describe the procedure for eliciting an Lhermitte's sign. What is the rationale?

34. Describe an orthopedic test that is usually not provocative. Explain the rationale for this test.

35. Explain why a patient with severe arm pain may present with a Bakody's sign.

36. How may I better teach this course?