

Mid-Term Assignment (Spring 2020) (DPT 2nd Semester- sec B)

Course Title: Human Anatomy II
Time Allowed: 48 hours
30

Instructor: Dr. Maria Feroze
Max marks:

Note:

- This assignment has two sections (section 1: MCQs and section 2: Q/Ans). Solve both.

SECTION 1: Multiple Choice Questions Max Marks: 15

Name: Muhammad Zavyar Khan
ID: 16121

1. Fibular shaft has

1. Four borders
2. Two borders two surfaces
3. Four borders four surfaces
4. Four surfaces
5. Two borders four surfaces

Which of the following is true?

- A. 1 and 4
- B. 2, 3 and 4
- C. 1, 3 and 4**
- D. 1, 3, 4 and 5

2. Neck of the femur connects the head of the femur with the shaft. It is cylindrical, projecting in a superior and medial direction. It is set at an angle of _____ degrees to the shaft.

- A. 156
- B. 170
- C. 135**
- D. 101

3. The proximal area of the femur forms the hip joint with the acetabulum of the pelvis. It consists of a head and neck, and two bony processes the greater and lesser trochanters. There are also two bony ridges connecting the two trochanters; the intertrochanteric line anteriorly and the trochanteric crest posteriorly. Out of all these proximal bony landmarks which one is the most lateral palpable bony landmark?

- A. Greater trochanter**
- B. Lesser trochanter
- C. The intertrochanteric line
- D. Trochanteric crest.

4. Patella is the bone of _____

- A. Leg**
- B. Foot
- C. Only distal end of leg
- D. Both a and c

5. Metatarsal bones form the _____

- A. Hind foot
 - B. Mid foot**
 - C. Fore foot
 - D. Both b and c
6. Which of the following metatarsals usually has its growth plates situated proximally
- A. First metatarsal**
 - B. First and second metatarsals
 - C. Second and third metatarsals
 - D. Third metatarsal
7. The shaft of the femur descends in slight _____ for stability.
- A. Lateral direction
 - B. Medial direction**
 - C. Posterior direction
 - D. Diagonal direction
8. Which structure/s connects the apex of patella to the tibial tuberosity?
- A. Patellar Ligament**
 - B. Patellar Tendon
 - C. Distal portion of the common tendon of the quadriceps femoris
 - D. Both A and B
 - E. All of the above
9. Below , the tibia articulates with _____
- A. Distal end of fibula only
 - B. Distal end of fibula and talus bone**
 - C. Distal end of fibula, talus bone and a small portion of calcaneus
 - D. All are true
10. Which of the following is the medial bone of lower leg?
- A. Tibia**
 - B. Fibula
 - C. Medial cuboid
 - D. Both a and c
11. Which of the following ligaments is fully covered by synovial membrane?
- A. Iliofemoral ligament
 - B. Pubofemoral ligament
 - C. Ischiofemoral ligament
 - D. Transverse Acetabular ligament
 - E. Ligament of the head of femur**
12. The calcaneus is often fractured as a result of _____
- A. Distraction
 - B. Axial loading**
 - C. Twisting
 - D. Walking
 - E. Sitting
13. The depth of the acetabulum is raised by the _____
- A. Acetabular fat pad
 - B. Capsule of hip joint
 - C. Acetabular labrum**
 - D. Ischial Bursa
 - E. Both b and c
14. The most powerful ligament of hip joint is?
- A. Iliofemoral ligament**
 - B. Pubofemoral ligament.

- C. Ischiofemoral ligament.
 - D. Transverse acetabular ligament
 - E. All are powerful as they are ligaments of hip joint
15. Sartorius muscle helps in the movement of _____
- A. Flexion
 - B. Flexion and abduction
 - C. Flexion, abduction and lateral rotation
 - D. All are true**

(DPT 2nd Semester- sec B)

Course Title: Human Anatomy II
 Time Allowed: 48 hours
 30

Instructor: Dr. Maria Feroze
 Max marks:

Note:

- This assignment has two sections (section 1: MCQs and section 2: Q/Ans). Solve both.
- You can use Google as a source of help but refrain from copy pasting the data directly from these sources.
- More than 25% plagiarism (similarity) in your answer will not be acceptable.
- Attempt all questions from this section, all questions carry equal marks.

SECTION NO 2: Q/Ans

Max Marks: 15

Q:1 Describe ankle mortise in your own words.

- **Ans:Ankle Mortise:**When the foot is in planter flexed position and it allows allows other movements ie abduction adduction etc the bony arc formed between the two malleoli and the tibial plafond is called ankle mortise.
 The ankle mortise view can be seen when the leg is rotated internally from 15-20 degree.

Q:2 A patient comes to your clinic with gait imbalance. You ask him to stand upright from a sitting position and then rotate his left leg towards his left side. Which of the hip joint muscles of the left side become active during this whole movement?

Ans: The lateral rotator group is a group of six small muscles of the hip which all externally (laterally) rotate the femur in the hip joint. It consists of the following muscles: Piriformis, gemellus superior, obturator internus, gemellus inferior, quadratus femoris and the obturator externus.

Q:3 Write down a note on:

a)Articulations of calcaneus:

The calcaneus forms the bony part of the heel. It forms a joint with the talus bone, the subtalar joint

On superior side the calcaneus articulates with the talus forming talocalcaneal joint which makes contact with the posterior middle and anterior facets and anteriorly the calcaneus articulates with the cuboid.

b) Difference in the size and shape of femoral condyles:

Medial Femoral Condyle:

Larger and more C shape
More firmly attached to tibia
Has attachments to MCL

Lateral Femoral Condyle:

Smaller and more round or O shape
Not firmly attached to tibia or LCL

c) Weight bearing status of fibula:

Fibula is a non weight bearing bone which is below the lateral tibial plateau and it extends distally to form the malleolus which is a portion of fibula on the distal end and the superior articulating surface of the talus bone. Fibula bone plays a very minor role on weight bearing. It approximately bears one sixth of the body weight.