

**CHUKA**



**UNIVERSITY**

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**UNIVERSITY EXAMINATIONS**

**FIRST YEAR EXAMINATION FOR THE AWARD OF DEGREE OF BACHELOR OF  
SCIENCE IN NURSING**

**NURU 116: HUMAN ANATOMY III**

**STREAMS: BSC NURSING Y1T3**

**TIME: 2 HOURS**

**DAY/DATE: FRIDAY 06/12/2019**

**8.30 A.M. – 10.30 A.M.**

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**INSTRUCTIONS:**

- **Do not write anything on the question paper.**
- **Mobile phones and any other reference materials are NOT allowed in the examination room**
- **The paper has three (3) sections. ALL the questions are compulsory**
- **Your answer for section A (MCQs) should be on the first page of the answer booklet.**
- **Number ALL your answers and indicate the order of appearance in the space provided in the cover page of the examination answer booklet.**

**SECTION A: MULTIPLE CHOICE QUESTIONS (20 MARKS)**

1. The afferent arteriole arises from which artery:
  - (a) Arcuate
  - (b) Interlobar
  - (c) Interlobular
  - (d) Segmental
  
2. The organs associated with the anterior border of the right kidney is:
  - (a) Spleen
  - (b) Adrenal gland
  - (c) Stomach
  - (d) Duodenum

3. Part of the peritoneum that wraps and suspends the small intestines is:
  - (a) Greater omentum
  - (b) Lesser omentum
  - (c) Mesentry
  - (d) Mesocolon
  
4. Salivary gland containing serous acini only include:
  - (a) Submandibular
  - (b) Parotid
  - (c) Lingual
  - (d) Sublingual
  
5. Examples of elastic arteries include:
  - (a) Subclavian
  - (b) Femoral
  - (c) Suprarenal
  - (d) Vertebral
  
6. The blood vessel that supplies the left ventricle of the heart is:
  - (a) Marginal
  - (b) Circumflex
  - (c) Anterior interventricular
  - (d) Posterior interventricular
  
7. A leucocyte that has shoe shaped nucleus and is normally transformed into a macrophage is:
  - (a) Eosinophil
  - (b) Monocyte
  - (c) Neutrophil
  - (d) Lymphocyte
  
8. Concerning plasma proteins:
  - (a) Globulins are mainly synthesized in the liver
  - (b) Fibrinogen are synthesized only during bleeding episodes
  - (c) Globulins are the main carriers of substances in the blood
  - (d) Albumin has the longest half life
  
9. Lymphatic capillaries are found in all of the following organs EXCEPT:
  - (a) Liver
  - (b) Heart
  - (c) Brain

- (d) Skin
10. Secondary lymphatic organs include:
- (a) Lymph nodes, thymus
  - (b) Lymph nodes, spleen
  - (c) Thymus, bone marrow
  - (d) Spleen, bone marrow
11. Which of the following joint is synovial:
- (a) Hip, shoulder
  - (b) Dentoalveolar, suture
  - (c) Hip, suture
  - (d) Symphysis pubis, elbow
12. Muscles that assist with forced expiration include:
- (a) Internal intercostal, sternocleidomastoid
  - (b) External intercostal, sternocleidomastoid
  - (c) Internal intercostal, rectus abdominis
  - (d) External intercostal, rectus abdominis
13. The blood vessel that supplies the lungs with oxygenated blood is:
- (a) Bronchial vein
  - (b) Bronchial artery
  - (c) Pulmonary artery
  - (d) Pulmonary vein
14. Mixed cranial nerve associated with the eye is:
- (a) Optic
  - (b) Oculomotor
  - (c) Trigeminal
  - (d) Abducens
15. Cerebral tracts that connect different parts of the same hemisphere are called:
- (a) Commissures
  - (b) Corpus callosum
  - (c) Association fibres
  - (d) Projection fibres
16. The papillae containing most of the taste buds is:
- (a) Circumvallate
  - (b) Foliate
  - (c) Fungiform
  - (d) Filiform

17. Purely endocrine organs include:
  - (a) Pituitary, pancreas
  - (b) Hypothalamus, thyroid
  - (c) Thyroid, pancreas
  - (d) Adrenal, pituitary
  
18. Zona reticularis secretes:
  - (a) Aldosterone
  - (b) Cortisol
  - (c) Androgens
  - (d) Epinephrine
  
19. The male homolog of labia minora is:
  - (a) Spongy urethra
  - (b) Glans
  - (c) Penis
  - (d) Scrotum
  
20. After spermatozoa is formed in the seminiferous tubules, it passes into the:
  - (a) Rete testis
  - (b) Ductus deferens
  - (c) Straight tubules
  - (d) Afferent ducts of the testis

**SECTION B: SHORT ANSWER QUESTIONS (35 MARKS)**

1. Explain three (3) types of capillaries indicating where each is found. (6 marks)
2. Compare and contrast right and left lungs. (6 marks)
3. State five (5) lymphatic trunks that drain the right side of the body. (5 marks)
4. State four (4) cells found in the gastric glands. (4 marks)
5. Describe the structural organization of the fallopian tube wall. (5 marks)
6. The wall of the eyeball consists of fibrous, vascular and sensory tunics. Explain two components of the vascular tunic/uvea. (4 marks)
7. Describe the structural organization of the anterior pituitary as an endocrine organ. (5 marks)

**SECTION C: LONG ANSWER QUESTIONS (15 MARKS)**

- Utilizing a well labelled diagram, describe the parts of a nephron. (15 marks)

