

First Professional MBBS Degree Supplementary Examinations

February 2017

PHYSIOLOGY – Paper II

Time: 3 Hours

Total Marks: 50

- *Answer all questions*
- *Draw Diagrams wherever necessary*

Long essay

(10)

1. An elderly man was admitted to the hospital with complaints of intense central chest pain with radiation to left arm. Answer the following questions based on your knowledge in physiology:
- What is the cause of the pain in the left arm and explain its mechanism.
 - Describe the pain pathway in detail.
 - Mention gate control theory of pain sensation
- (3+5+2=10)

Short essays

(2x5 =10)

2. Effects of hypo secretion of growth hormone
3. Events during neuromuscular transmission of impulse in skeletal muscle

Answer briefly

(5x3=15)

4. Reciprocal innervation.
5. Paradoxical sleep.
6. Milk ejection reflex.
7. Dark adaptation
8. Cerebellum in voluntary activity

Draw and label

(2x2½=5)

9. Taste pathway
10. Feedback regulation of thyroid hormone secretion

Explain the physiological basis of the following

(5x2=10)

11. Renshaw cell inhibition
12. Safe period
13. Sterility in undescended testis
14. Neuromuscular hyper excitability in tetany
15. Masking in audition
