

(70)



04112 A

**First B.H.M.S. (2015) Examination, Winter 2016  
PHYSIOLOGY INCLUDING BIOCHEMISTRY – I**

Total Duration : 3 Hours

Total Marks : 100

- Instructions :**
- 1) Use **blue/black** ball point pen **only**.
  - 2) **Do not** write anything on the **blank portion of the question paper**. If written anything, such type of act will be considered as an attempt to resort to unfair means.
  - 3) **All** questions are **compulsory**.
  - 4) The number to the **right** indicates **full** marks.
  - 5) Draw diagrams **wherever** necessary.
  - 6) Distribution of syllabus in Question Paper is only meant to cover entire syllabus within the stipulated frame. The Question paper pattern is a mere guideline. Questions can be asked from any paper's syllabus into any question paper. Students cannot claim that the Question is out of syllabus. As it is only for the placement sake, the distribution has been done.

1. Write short answer (**any ten** out of fifteen) : (10×2=20)
- a) What is blood volume ? Write normal blood volume.
  - b) Give normal value of clotting time. What is haemophilia ?
  - c) What is purpura ?
  - d) Define cardiac cycle.
  - e) What are junctional tissues of the heart ?
  - f) Define ECG.
  - g) Define respiration.
  - h) What is dysbarism ?
  - i) What is GFR ? Write its normal value.
  - j) What are the hormones secreted by kidney ?
  - k) What is hyperthermia ?
  - l) What are layers of epidermis ?
  - m) What are melanocytes ?
  - n) What is simple diffusion ?
  - o) What is surface tension ?

04112 A



2. Write short answer (**any four** out of six) : (4×5=20)
- a) Functions of leucocytes
  - b) ESR and its significance
  - c) Heart rate
  - d) Heart sounds
  - e) Composition of lymph
  - f) RE system.

3. Write short answer (**any four** out of six) : (4×5=20)
- a) Abnormal constituents of urine
  - b) Nephron
  - c) Neuromuscular junction
  - d) Hypoxia
  - e) Lung Volumes
  - f) Functions of skin.

4. Long answer question (**any two** out of four) : (2×10=20)
- a) Write composition and functions of blood.
  - b) What is cardiac output ? What are factors affecting cardiac output ?
  - c) Explain nervous regulation of respiration.
  - d) What is normal body temperature ? Explain regulation of body temperature:

Long answer question (**any one** from Q. No. 5, 6 and 7)

5. Long answer question : (1×20=20)  
Describe ABO blood group system and Rh factor. Add a answer on mismatched blood transfusion.
6. Long answer question : (1×20=20)  
Explain the mechanics of breathing. Add a answer on lung compliance.
7. Long answer question : (1×20=20)  
Discuss renal function tests in detail.
-



04112 B

First B.H.M.S. (2015) Examination, Winter 2016  
PHYSIOLOGY INCLUDING BIOCHEMISTRY – II

Total Duration : 3 Hours

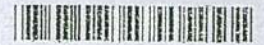
Total Marks : 100

- Instructions:**
- 1) Use blue/black ball point pen only.
  - 2) Do not write anything on the **blank portion of the question paper**. If written anything, such type of act will be considered as an attempt to resort to unfair means.
  - 3) **All questions are compulsory.**
  - 4) The number to the **right** indicates **full** marks.
  - 5) Draw diagrams **wherever** necessary.
  - 6) Distribution of syllabus in Question Paper is only meant to cover entire syllabus within the stipulated frame. The Question paper pattern is a mere guideline. Questions can be asked from any paper's syllabus into any question paper. Students cannot claim that the Question is out of syllabus. As it is only for the placement sake, the distribution has been done.

1. Write short answer (any ten out of fifteen) :

(10×2=20)

- a) Write two Hormones of adrenal medulla.
- b) Name two target organs of oxytocin.
- c) Name the hormones of adrenal cortex.
- d) What is deglutition.
- e) Name the movements of small intestine.
- f) Name three hormones of gastrointestinal tract.
- g) Functions of small intestine.
- h) Name the stages of spermatogenesis.
- i) Name the phases of (uterine cycle) menstruation.
- j) Write two signs of pellagra.
- k) What is beriberi.
- l) What are the sources of Vitamin D.
- m) What is coenzyme.
- n) Define menstrual cycle.
- o) Name the fat soluble vitamins.



2. Write short answer (**any four** out of six) : (4×5=20)
- a) Write short note on growth hormone.
  - b) Write in short about hypothyroidism.
  - c) Functions of saliva.
  - d) Movements of large intestine.
  - e) Digestion of carbohydrate.
  - f) Glycolysis.
3. Write short answer (**any four** out of six) : (4×5=20)
- a) Vitamin A.
  - b) Vitamin C.
  - c) Explain urine pregnancy test.
  - d) Classification of enzymes.
  - e) Balanced diet in pregnancy and lactation.
  - f) Obesity.
4. Long Answer Question (**any two** out of four) : (2×10=20)
- a) Explain the functions and regulation of parathormone.
  - b) Composition & functions of pancreatic juice.
  - c) Give an account on puberty changes in male and female.
  - d) What is neurone? Describe the structure of neurone.
- Long Answer Question (**any one** from Q. No. 5, 6 and 7) (1×20=20)
- Long Answer Question :
5. Describe synthesis, storage, release, transport & functions of thyroid hormones. (1×20=20)
- Long Answer Question :
6. Define menstrual cycle, explain ovarian and uterine changes during menstruation. (1×20=20)
- Long Answer Question :
7. Explain taste bud and gustatory pathway with neat diagram. (1×20=20)
-