

**2019**

**MSc**

**2<sup>nd</sup> Semester Examination**

**HUMAN PHYSIOLOGY**

**PAPER – PHY - 202**

**Full Marks: 40**

**Time: 2 Hours**

The figures in the right-hand margin indicate full marks.

Candidates are required to give their answers in their  
Own words as far as practicable.

Illustrate the answers wherever necessary.

## Unit – 202.1

1. Answer any **TWO** questions from the following : 2×2
- Define 'eustress' and 'distress'.
  - What do you mean by ABC strategy?
  - What do you mean by general and individual ergonomics?
  - Write briefly on Fastlek training?
2. Answer any **TWO** questions from the following: 2×4
- Discuss the physiological principles of physical training. 4
  - Write a brief note on high altitude pulmonary oedema. 4
  - State the physiological response to exercise in hot environment.  
What is heat cramp? 3+1
  - What are the types of asbestos fibers?  
Classify silicosis according to the severity of the disease? 2+2
3. Answer any **ONE** question of the following: 1×8
- What is COPD?
    - Write symptoms of chronic bronchitis.
    - State the general recommendation for exercise prescription for pulmonary diseases. 1+2+5
  - Explain five levels of body composition.
    - Write bioelectric impedance method for determining body composition.
    - What is range of motion? 3+4+1

## Unit – 202.2

1. Answer any *TWO* questions from the following: (2×2)
- a) Mention briefly the genetic and non – genetic etiology of obesity. (1+1)
  - b) State the etiology of protein energy malnutrition (2)
  - c) Mention the objectives and beneficiaries of mid – day meal. (1+1)
  - d) Name the antioxidants that are required for elderly. (2)
2. Answer any *TWO* questions from the following: (2×4)
- a) Discuss briefly the management of obesity.  
What are adipocyte factors? State the advantages and disadvantages of Bariatric surgery. (2+1+2)
  - b) What is PEM? Describe the signs and symptoms of marasmus. (2+2)
  - c) Discuss the causes and management of anemia in elderly. ( 2+2)  
What is meant by pathological aging?
  - d) Mention two significant changes brought in Vitamin A prophylaxis program introduced in 1970.

3. Answer any *ONE* question from the following:

- a) "The basal metabolic rate in old people is significantly reduced"—justify.  
State the changes in muscular strength with aging. (2+2+2+2)  
Discuss the endocrinological changes in post – menopausal women that may lead to osteoporosis. What are the impacts of Special Nutrition Programme?
- b) Discuss dietary management of kwashiorkor. Write briefly on the medicinal therapeutic management of marasmus. ( 3 + 5 )