

2020

**BIOCHEMISTRY — GENERAL**

**Paper : DSE-A-1**

**(Nutritional Biochemistry)**

**Full Marks : 50**

*The figures in the margin indicate full marks.*

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

**Day 3**

1. Answer **any five** questions : 2×5
- (a) Write full form of MUFA.
  - (b) What is the role of Vit-C?
  - (c) What is BMR?
  - (d) What is EFA? Name one.
  - (e) What is the role of dietary fibre?
  - (f) What is role of Vit-D in bone formation?
  - (g) What is the role of Calcium?
  - (h) What is the role of Manganese in human?
  - (i) What is the toxicity of Fluoride?
  - (j) What is GTT?
2. Answer **any two** questions :
- (a) Briefly write about protein digestion in human body. 5
  - (b) What are essential and non-essential amino acids? Cite any two deficiency symptoms of essential amino acids. 3+2
  - (c) Draw a structural formula of triglyceride. What is its clinical significance? 2+3
  - (d) Briefly write digestion of lipid in human. 5
3. Answer **any three** questions :
- (a) (i) Briefly describe the role of calorimetry in energy metabolism.
  - (ii) What is the roles of Cu and Mg in human? 5+5

**Please Turn Over**

- (b) (i) What is meant by ADME of drugs? How is it affected by nutrients?  
(ii) Briefly describe iron metabolism in human body. (2+3)+5
- (c) (i) What is the role of Vit-A as antioxidant?  
(ii) What is the role of pyridoxal phosphate in metabolism? 5+5
- (d) (i) Name one each of antidepressant and psychoactive drugs.  
(ii) Explain their side effects.  
(iii) What is anaemia? How is it caused? (1+1)+5+3
- (e) (i) What is glycosylated Hb? What is its clinical significance?  
(ii) Write briefly on the absorption of calcium. Write an account on the toxicity of two metal ions. (2+3)+(3+2)
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