

- b) State the functions of the following enzyme classes
- Oxidoreductases (1 mark)
 - Transferases (1 mark)
 - Hydrolases (1 mark)
 - Lyases (1 mark)
 - Isomerases (1 mark)
 - Ligases (1 mark)
5. a) Glycolysis occurs in two phases. Explain. (4 marks)
- b) Differentiate between glycolysis and gluconeogenesis (4 marks)
- c) Outline the various starting materials for the gluconeogenesis pathway (3 marks)
6. a) Differentiate between water soluble and fat soluble vitamins and give examples (4 marks)
- b) List 6 causes of vitamin D deficiency (3 marks)
7. a) Explain the relationship between urea excretion and high protein intake (4 marks)
- b) Describe ketosis and how it occurs (6 marks)