Eastern University, Sri Lanka,

<u>First Year, Second Semester Examination In Agriculture – 2011/2012</u> <u>AC 1201 - Biochemistry (3:30/30)</u>

Answer all Questions

Time allowed: 02 hours

- 1. a) "Aerobic oxidation of Glucose yields more energy than anaerobic oxidation"- Explain.
 - b) Briefly discuss the Regulatory mechanism of the Glycolytic pathway in cells.
- 2. a) Outline the catabolic pathway whereby the Palmitic acid (C_{15} H_{31} COOH) is converted to acetyl coenzyme A.
 - b) Write an account on Gluconeogenesis starting from pyruvate.
- 3. Explain the following:
 - a) Role of Pentose Phosphate Pathway in supplying Ribose-5-Phosphate for RNA synthesis.
 - b) Formation of urea in Ureotelic animals.
- 4. Write **Short notes** on the following:
 - a) Secondary structures of Protein
 - b) Tri Carboxylic Acid (TCA) Cycle
 - c) Polysaccharides in plants
