#### **BLDE UNIVERSITY**

#### **MBBS PHASE - I EXAMINATION**

[Time: 3 Hours]

# (REVISED SCHEME)

BIOCHEMISTRY PAPER - I

**QP CODE: 1005** 

Your answer should be specific to the questions asked. Draw neat labeled diagrams wherever necessary. Each answer should be written on new page only. Write Question No. in left side of margin.

Use separate answer books for Paper – I and Paper II

#### Long Essay: (Answers to be started on fresh page only)

1x10=10 marks

[Max.Marks: 100]

1. Define glycolysis, write the steps with enzymes and coenzymes of glycolysis. Explain the energetic and regulation of the pathway.

## Short Essay: (Answers to be started on fresh page only)

5x5=25 marks

- 2. What is active methionine? How is it formed? Write its two functions.
- 3. What is oxidative phosphorylation? Explain chemiosmotic theory.
- 4. Write in detail the regulation of enzyme activity.
- 5. Visual cycle
- 6. Active transport

# Short Answers: (Leave three lines gap between the answers)

5x3=15 marks

- 7. Mention six clinical applications of radioactive isotopes.
- 8. Define buffers. Mention blood buffers.
- 9. What are heteropolysaccharides? Give four examples.
- 10.Scurvy
- 11. Six functions of zinc

# QP CODE: 1006 PAPER - II Use separate answer book

### Long Essay: (Answers to be started on fresh page only)

1x10=10 marks

1. Write the sources, daily requirement, factors affecting absorption and biochemical functions of Iron in the body. Add a note Bronz Diabetes.

# Short Essay: (Answers to be started on fresh page only)

5x5=25 marks

- 2. Transcription.
- 3. Electron transport chain
- 4. Biochemical changes during starvation.
- 5. Function of Vitamin A
- 6. BMR

#### Short Answers: (Leave three lines gap between the answers)

5x3=15 marks

- 7. Define respiratory quotient. Write RQ values of lipids and carbohydrates.
- 8. Metabolic water.
- 9. Lesch-Nyhan syndrome.
- 10. What is atherosclerosis? Mention two biochemical markers of MI
- 11. Normal serum albumin level, two causes of hypoalbuminemia