

POST BASIC BACHELOR OF SCIENCE IN NURSING DEGREE EXAMINATION

FIRST YEAR – NON SEMESTER PAPER III – BIOCHEMISTRY AND BIOPHYSICS

O.P. Code: 684884

Time: Three Hours Maximum: 75 Marks

Answer Section A and B in a SEPARATE answer book.

<u>SECTION - A</u> (BIOCHEMISTRY)

I. Elaborate on: $(1 \times 15 = 15)$

1. Describe the β -oxidation of fatty acids. Mention the Energetics and its deficiency.

II. Write notes on: $(3 \times 5 = 15)$

- 1. Transamination and Deamination.
- 2. Glycogen storage diseases.
- 3. Cardiac related enzymes.

III. Short answers on: $(5 \times 2 = 10)$

- 1. Translation.
- 2. Cytosol and cytoskeleton.
- 3. Normal levels of AST and ALT.
- 4. Homo-polysaccharides.
- 5. Normal cholesterol levels in blood.

<u>SECTION - B</u> (BIOPHYSICS)

I. Elaborate on: $(1 \times 15 = 15)$

1. Describe the various types of pulleys and explain the lever mechanism in the human body.

II. Write notes on: $(2 \times 5 = 10)$

- 1. Explain different theories to explain the nature of light.
- 2. Pace-maker.

III. Short answers on: $(5 \times 2 = 10)$

- 1. What are the differences between mass and weight?
- 2. Relative density.
- 3. Astigmatism.
- 4. State Fleming left hand rule.
- 5. What is Echo?
