

Roll No.

Total No. of Pages : 02

Total No. of Questions : 11

B.Sc. (Cardiac Care Technology) (Sem.-3)

NON-INVASIVE DIAGNOSIS CARDIOVASCULAR SYSTEM

Subject Code : BCCT-311-21

M.Code : 92697

Date of Examination : 23-12-22

Time : 3 Hrs.

Max. Marks : 60

INSTRUCTIONS TO CANDIDATES :

1. **SECTION-A** is **COMPULSORY** consisting of **EIGHT** questions carrying **TWO** marks each.
2. **SECTION-B** contains **EIGHT** questions carrying **FOUR** marks each and students have to attempt any **SIX** questions.
3. **SECTION-C** will comprise of two compulsory questions with internal choice in both these questions. Each question carries **TEN** marks.

SECTION-A

1. **Answer briefly:**
 - a) What is Osborn wave?
 - b) What is delta wave?
 - c) Define PR interval.
 - d) What is color mapping?
 - e) Define QT interval.
 - f) Define ECG paper.
 - g) Define Myocardial speckle.
 - h) How to Calculate PA pressure from TR & PR?

SECTION-B

2. Elaborate electrode position in ECG measurement.
3. Write down 2-D imaging and Doppler assessment of prosthetic valves.

4. Write down different methods of calculation of ejection fraction by Echo with their limitations.
5. Elaborate synchronization in defibrillator.
6. Explain the calculation of heart rate in sinus rhythm and atrial fibrillation.
7. **Define the following terms:**
 - Right Atrial Enlargement (RAE)
 - Right Ventricular Hypertrophy (RVH)
8. Write down in detail about the lead system and its maintenance.
9. Write short note on color B mode scanning?

SECTION-C

10. Describe in detail about the Colour Doppler examination.

OR

What are Precordial Chest leads? Describe Electrical Axis of Heart.

11. Give brief note on different types of defibrillators.

OR

Write down the calculation of QP & QS by Echo in congenital heart disease.

NOTE : Disclosure of Identity by writing Mobile No. or Marking of passing request on any paper of Answer Sheet will lead to UMC against the Student.