



Cardiac Care Technology Clinical

Q.P Code: J5791

Your answers should be specific to the questions asked.

Draw neat labelled diagrams wherever necessary.

I. Long Essay (no choice)

2×10=20 Marks

1. Briefly explain ECG, X-ray and echocardiographic findings of mitral stenosis and write a note on Wilkin's score and Cormier grade system.
2. Briefly explain the grading of LV diastolic dysfunction by echocardiography

II. Short Essay (Answer any 10)

10×5=50 Marks

3. Explain the management of mitral stenosis in detail
4. Clinical presentation, physical findings, ECG and X-ray of aortic regurgitation
5. What is the role of TEE and DSE in aortic stenosis and write a note on Hemodynamic calculations of aortic stenosis
6. Explain echocardiographic assessment of RV systolic function
7. Classification, clinical presentation and physical findings of infective endocarditis
8. Explain doppler findings in LV systolic dysfunction and write a note on speckle tracking echocardiography in assessment of LV systolic function
9. Explain Duke score in infective endocarditis
10. Causes and clinical presentation of mitral regurgitation
11. What are the advantage and disadvantage of bioprosthetic and mechanical prosthetic valve
12. Explain Jones criteria of RHD
13. Explain the severity assessment, Cath findings and management of mitral regurgitation
14. Explain normal and abnormal doppler findings of prosthetic valve

III. Short answer (Answer any 10)

10×3=30 Marks

15. List causes of acute and chronic aortic regurgitation
16. Pathophysiology of aortic stenosis
17. Clinical presentation of aortic stenosis
18. Two-dimensional echocardiographic assessment of LV systolic function
19. Write a short note on ventricular septal motion in RV pressure and volume overload
20. Management of RHD
21. Etiology of tricuspid regurgitation
22. Patient-prosthesis mismatch
23. Echocardiographic findings in mitral valve prolapse
24. Pathophysiology of chronic mitral regurgitation
25. Clinical presentation of mitral stenosis
26. List the differences between Thrombus v/s Pannus in prosthetic valve.

SRI DEVARAJ URS ACADEMY OF HIGHER EDUCATION & RESEARCH



(A DEEMED TO BE UNIVERSITY)

B.Sc. Allied Health Sciences Third Year (Semester-V)

September 2023 Examination

B.Sc. Cardiac Care Technology (CCT)

Time : 3 Hrs.

[Max. Marks : 100]

Cardiac Care Technology Applied

Q.P Code : J5792

Your answers should be specific to the questions asked.

Draw neat labelled diagrams wherever necessary.

I. Long Essay (No choice)

2 X 10= 20 Marks

1. Briefly explain the risk factors, classification, clinical manifestation and echocardiographic findings of PDA
2. Briefly explain classification, clinical presentation, physical examination, ECG, X-ray and echocardiographic findings of VSD

II. Short Essay (Answer any 10)

10 X 5= 50 Marks

3. Classification of ASD
4. Management of ASD
5. Echocardiographic findings of HCM
6. Classification of PDA
7. Explain the classification of aortic dissection
8. Explain the echocardiographic findings of TOF
9. Role of TTE and TEE in patients with cardiac tamponade
10. Difference between Constrictive pericarditis and restrictive cardiomyopathy
11. Diagnosis of pulmonary hypertension
12. Causes and clinical presentation of pericardial effusion
13. Explain the two anatomical types, associated defects and pathology of CoA
14. Management of TOF

III. Short Answers (Answer any 10)

10 X 3= 30 Marks

15. What are the risk factors of aortic dissection?
16. Surgical management of aortic dissection
17. Cardiac amyloidosis
18. Pathophysiology of constrictive pericarditis
19. Pericardiocentesis
20. Echocardiographic findings of CoA
21. ECG and X-ray findings in pericardial effusion
22. Signs and symptoms of pericardial tamponade
23. ECG findings in acute pericarditis
24. What is the mechanism of acute regurgitation in aortic dissection
25. What are the complications of DCM
26. Alcohol septal ablation

SRI DEVARAJ URS ACADEMY OF HIGHER EDUCATION & RESEARCH

(A DEEMED TO BE UNIVERSITY)



B.Sc. Allied Health Sciences Third Year (Semester-V)

September 2023 Examination

B.Sc. Cardiac Care Technology (CCT)

Time : 3 Hrs.

[Max. Marks : 100]

Cardiac Care Technology Advanced

Q.P Code : J5793

Your answers should be specific to the questions asked.

Draw neat labelled diagrams wherever necessary.

I. Long Essay (No choice)

2 X 10= 20 Marks

1. Briefly explain the equipment's, Angiographic Technique (Procedure), Indication and Contraindications for Coronary Angiography
2. Briefly explain indications, contraindications, equipment's used and complications in PTCA

II. Short Essay (Answer any 10)

10 X 5= 50 Marks

3. Indications of TEE
4. Trans gastric views of TEE with neat labelled diagram
5. Explain ventricular aneurysm
6. What are the types, testing and steps to use the defibrillator
7. Explain Ventricular septal rupture
8. Cardiogenic shock
9. Management in patients with acute MI
10. What are the ECG changes and evolution during STEMI?
11. Explain acute MR as a complication of acute MI
12. Clinical presentation, physical examination and diagnosis of cardiac tumor
13. Cardiac myxoma
14. Explain ventricular free wall rupture

III. Short Answers (Answer any 10)

10 X 3= 30 Marks

15. TIMI flow
16. ECG criteria of digitalis drug effect
17. Define AV dissociation, capture beat and fusion beat in VT
18. Complications of PTCA
19. Role of echocardiography in patients with atrial fibrillation
20. Seldinger access site technique used in coronary angiography
21. Define and write ECG criteria of Hypothermia
22. Complications of TEE
23. Thrombolysis in STEMI
24. MI and LBBB
25. Ventricular premature complex
26. Indication and contraindications of PTCA