Sub :Computer Graphics   07/3/20   **Total Marks:75 Class:SYBSCIT(SEM IV)**

Duration: 2hr and 30min   **Note: All the questions are compulsory.**

(1) Answer any three of the following: **(15)**

1.Explain Bresenhams Line Drawing Algorithm.
2.Applications of Computer Graphics.
3.Explain the working of CRT.
4. What is the effect of Aliasing .
5. Explain Cohen Sutherland Algorithm
6. Explain DDA Alogorithm.

(2) Answer any three of the following: **(15)**

1.Explain the steps of 3D Rotation Transformation at an arbitrary point.
2.Explain Mirroring and Shearing.
3.Explain Rigid body transformation.
4.Explain the 2D reflections.
5.What is the concept of window to view port transformation? Explain.
6.Write a short note on 3D Transformation .

(3) Answer any three of the following: **(15)**

1.Explain the term Colorimetry.
2.What are the stages of 3D -Viewing?
3.Define:Radiometry And Radiant Energy.
4.Explain the term: Color Spaces, Chromatic Adaption
5.Write a short on RGB model.
6. Write a short on Camera model.

(4) Answer any three of the following: **(15)**

1.What is the concept of ScanLine Explain?
2. Write a short on Area Sub Division.
3. What are the properties of Bezier Curve? Explain?
4.What is Curve And its types?
5.Explain Z-buffer Alogorithm.
6.Differentiate between Ray Casting and Ray Tracing .

(5) Answer any three of the following: **(15)**

1.Explain the concept of contrast stretching and histogram.
2.List and explain the various types of digital image formats.
3.What is averaging and median filtering explain?
4.Explain the concept of image processing.
5.What are the steps of JPEG Image compression? Explain.
6.Explain the Following Principles of animation.