

**MAY 2007**

**CS-309**

# **COMPUTER GRAPHICS**

**(B.Tech Semester - 5th)**

**Time: 03 Hours**

**Maximum Marks : 60**

**Note:-** Section - A is **compulsory**. Attempt any **Four** questions from Section - B. Attempt any **two** questions from Section-C.

## **SECTION - A**

**Marks : 2 Each**

- Q1 a) What is scan conversion?  
b) List the different types of clippings.  
c) What do you understand by surface rendering?  
d) What are Bezier curves?  
e) Why are transformations required?  
f) What is translation of an object?  
g) What is a Perspective view?  
h) Define the term rotation in three Dimension.  
i) What are the various components of LCD?  
j) What is Z-buffer?

## **SECTION - B**

**Marks : 5 Each**

- Q2. What do you mean by B-Spline Curves? Discuss their application in computer Graphics.  
Q3. Describe in detail Bresenham's Line drawing Algorithm.  
Q4. List all the applications of Computer Graphics?  
Q5. What do you mean by Raster Scan System? Explain the working of color CRT monitor.  
Q6. Explain the scan line method for visible detection

## **SECTION - C**

**Marks : 10 Each**

- Q7. What are windowing and clipping? Explain Sutherland-Hodgman algorithms for clipping a polygon.  
Q8. Explain in detail the phong shading technique.  
Q9. What are projections? Explain different types of projections.