



**Course Outcomes & CO-PO-PSO Mapping and Justification**

<b>Subject</b>	<b>Computer Graphics and Visualization laboratory with mini project</b>	<b>17CSL68</b>
<b>COURSE OUTCOMES:</b>		
<b>CO No.</b>	<b>On completion of this course, students will be able to:</b>	<b>Cognitive Level</b>
17CSL68.1	Demonstrate simple algorithms using OpenGL Graphics Primitives and attributes.	L2 Understand
17CSL68.2	Demonstrate line drawing and clipping algorithms using OpenGL functions and interactive devices.	L2 Understand
17CSL68.3	Design and implementation of algorithms Geometric transformations on both 2D and 3D objects.	L6 Design
17CSL68.4	Design and implementation of illumination and shading models.	L6 Design

**CO-PO-PSO MAPPING**

CO No.	PO1	PO2	PO3	PO4	PO5	PO6	PO7	PO8	PO9	PO10	PO11	PO12	PSO1	PSO2	PSO3
17CSL68.1	2	1	1	-	1	-	-	-	-	-	-	1	2	-	-
17CSL68.2	2	1	1	-	1	-	-	-	-	-	-	1	2	-	-
17CSL68.3	2	2	1	-	1	-	-	-	-	-	-	1	2	-	-
17CSL68.4	2	2	1	-	1	-	-	-	-	-	-	1	2	-	-
<b>17CSL68</b>	<b>2.0</b>	<b>1.5</b>	<b>1.0</b>	<b>-</b>	<b>1.0</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>-</b>	<b>1.0</b>	<b>2.0</b>	<b>-</b>	<b>-</b>

**CO-PO-PSO JUSTIFICATION**

CO No.	PO/PSO	CL	Justification
17CSL68.1	PO1	2	Moderately mapped as students learn basic concepts of OpenGL to draw simple graphics primitives.

	PO2	1	Slightly mapped as students will use mathematical knowledge to solve problems.
	PO3	1	Slightly mapped as students able to apply different alternatives for the given problem.
	PO5	1	Slightly mapped as students uses Microsoft visual studio (IDE) to solve problems.
	PO12	1	Slightly mapped as students identify changing trends and apply interactive graphics.
	PSO1	2	Moderately mapped as students develop their own application software's.
17CSL68.2	PO1	2	Moderately mapped as students learn various line drawing and clipping algorithms.
	PO2	1	Slightly mapped as students will use mathematical knowledge to solve problems.
	PO3	1	Slightly mapped as students able to apply different alternatives for the given problem.
	PO5	1	Slightly mapped as students uses Microsoft visual studio (IDE) to solve problems.
	PO12	1	Slightly mapped as students identify changing trends and apply interactive graphics.
	PSO1	2	Moderately mapped as students develop their own application software's.
17CSL68.3	PO1	2	Moderately mapped as students learn Geometric transformations on both 2D and 3D objects
	PO2	2	Moderately mapped as students will use mathematical knowledge to solve problems.
	PO3	1	Slightly mapped as students able to apply different geometric transformations for the given problem.
	PO5	1	Slightly mapped as students uses Microsoft visual studio (IDE) to solve problems.
	PO12	1	Slightly mapped as students identify changing trends and apply interactive graphics.
	PSO1	2	Moderately mapped as students develop their own application software's.
17CSL68.4	PO1	2	Moderately mapped as students learn shading and illumination models.
	PO2	2	Moderately mapped as students will use mathematical knowledge to solve problems.
	PO3	1	Slightly mapped as students design and develop various geometric objects.
	PO5	1	Slightly mapped as students uses Microsoft visual studio (IDE) to solve problems.

	PO12	1	Slightly mapped as students identify changing trends and apply interactive graphics.
	PSO1	2	Moderately mapped as students develop their own application software's.

Prepared by

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