Course Number and Name

BCE7L1 - COMPUTER AIDED DESIGN OF STRUCTURES LAB

Credits and Contact Hours

2 & 45

Course Coordinator's Name

Mr.K.Sathishkumar

Text Books and References

Course Description

To introduce the students to analyze and design different structures like trusses, beams, frames etc.

Prerequisites
Co-requisites

Prerequisites	Co-requisites
Computer Aided Building Drawing	NIL
required, elective, or selecte	d elective (as per Table 5-1)

ourse Outcon	nes (C	Os)										
CO1	To Study about Microsoft office											
CO2	To Study about drawing of buildings using Autocad in 2D											
CO3	To Study about drawing of buildings using Autocad in 3D											
CO4	To Study about Modeling											
CO5	To Study about 3D objects											
CO6	To Study about Solid Editing											
CO7	To Study about drawings of plans and layouts											
CO8	To Study about various mode of drawing in Autocad											
CO9	To Study about file management											
CO10	To Study about analysis of trusses and frame											
CO11	To Study about analysis of different component in staad pro											
CO12 To Study about analysis and design of different component in staad pro												
ident Outco	mes (S	Os) fro	m Crite	rion 3 d	covered	by this	Course	e				
COs/SOs	a	b	с	d	e	f	g	h	i	j	k	
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CO2					М							
CO3					М							
CO4					М							
CO5			<u> </u>		М							
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CO7			М				
CO8			М				
CO9			М				
CO10			М				
CO11			М				
CO12			М				

List of Topics Covered

LIST OF EXPERIMENTS

- 1. Preparation of Script and Slide presentation
- 2. Creating 2D drawings plan, elevation, section of residential buildings
- 3. Creating 3D drawings, preparation of elevation for multi storeyed buildings.
- 4. Surface modeling and solid modeling
- 5. 3D objects construction and enhanced viewing
- 6. Solid Editing and real time 3D rotations
- 7. Working with layouts.
- 8. Modifying AUTOCAD environment and plotting
- 9. File management
- Analysis of Plane truss space truss plane frame space frame and other elements such as plate elements and shell elements.
- 11. Analysis of different structural components by using STAAD.PRO STRAP.
- 12. Analysis and design of different structural components by using STRAP STAAD.PRO
 - STAAD etc.