

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

Lesson Plan & Work-done Diary for AY: 2026-27 (ODD Semester)

Course with Code: Theory of Computation(BCS503)				Faculty: Ashwini P			Sem & Section: 5A
Class No.	Date planned (DD/MM)	Topics to be covered	TLP Planned	Class No.	Date of Conduction (DD/MM)	Topics	Remarks if any deviation
1.		Introduction to Finite Automata,	PPT Chalk& Talk				
2.		Structural Representations	PPT Chalk& Talk				
3.		Automata and Complexity	PPT Chalk& Talk				
4.		The Central Concepts of Automata Theory.	PPT Chalk& Talk				
5.		Deterministic Finite Automata,	PPT Chalk& Talk				
6.		Nondeterministic Finite Automata	PPT Chalk& Talk				
7.		An Application of finite Automata:	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

8.		Text Search	PPT Chalk& Talk				
9.		Finite Automata with Epsilon-Transitions.	PPT Chalk& Talk				
10.		Finite Automata with Epsilon-Transitions and Applications	PPT Chalk& Talk				
11.		Regular Expressions	PPT Chalk& Talk				
12.		Finite Automata and Regular Expressions	PPT Chalk& Talk				
13.		Problems on RE	PPT Chalk& Talk				
14.		Proving Languages not to be Regular	PPT Chalk& Talk				
15.		Problems on RE and FA	PPT Chalk& Talk				
16.		Closure Properties of Regular Languages	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

17.		Problems on closure Properties	PPT Chalk& Talk				
18.		Equivalence and Minimization of Automata	PPT Chalk& Talk				
19.		Problems on Minimization of automata	PPT Chalk& Talk				
20.		Applications of Regular Expressions	PPT Chalk& Talk				
21.		Context-Free Grammars,	PPT Chalk& Talk				
22.		Parse Trees,	PPT Chalk& Talk				
23.		Ambiguity in Grammars and Languages	PPT Chalk& Talk				
24.		Ambiguity in Grammars and Languages problems	PPT Chalk& Talk				
25		Definition of the Pushdown Automaton	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

26		Problems on Pushdown Automaton	PPT Chalk& Talk				
27		The Languages of a PDA	PPT Chalk& Talk				
28		Equivalence of PDA's and CFG's	PPT Chalk& Talk				
29		Deterministic Pushdown Automata	PPT Chalk& Talk				
30		Deterministic Pushdown Automata problems	PPT Chalk& Talk				
31		Normal Forms for Context-Free Grammars,	PPT Chalk& Talk				
32		Types of Normal Forms for Context-Free Grammars,	PPT Chalk& Talk				
33		Types Normal Forms for Context-Free Grammars,	PPT Chalk& Talk				
34		The Pumping Lemma for Context-Free Languages	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

35		The Pumping Lemma for Context-Free Languages	PPT Chalk& Talk				
36		Problems of Pumping lemma	PPT Chalk& Talk				
37		Problems of Pumping lemma	PPT Chalk& Talk				
38		Closure Properties of Context-Free Languages.	PPT Chalk& Talk				
39		Closure Properties of Context-Free Languages.	PPT Chalk& Talk				
40		Closure Properties of Context-Free Languages.					
41		Introduction to Turing Machines:	PPT Chalk& Talk				
42		Problems That Computers Cannot Solve	PPT Chalk& Talk				
43		The Turing Machine	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

44		The Turing Machine problems	PPT Chalk& Talk				
45		The Turing Machine problems	PPT Chalk& Talk				
46		Programming Techniques for Turing Machines	PPT Chalk& Talk				
47		Extensions to the Basic Turing Machine	PPT Chalk& Talk				
48		Undecidability	PPT Chalk& Talk				
49		Problem on Undecidability	PPT Chalk& Talk				
50		A Language That Is Not Recursively Enumerable.	PPT Chalk& Talk				

DEPARTMENT OF COMPUTER SCIENCE & ENGINEERING

	Activity	Planned	Actual	Remarks
1	Theory Classes	50		
3	Tutorials/ Extra classes	-		
4	Internal Assessments			
5	ICT based Teaching (% of usage in Curriculum)	100		
Planning			Execution	
Faculty Signature:			Faculty Signature:	
HoD Signature:			HoD Signature:	