

Academic Lesson Plan of Summer 2025

Department: E&TC	Semester:4th	Name of the Teaching Faculty: JASHASWINI SATAPATHY
Subject:DCCN	No. of days/per week class allotted. 4p/week	Semester from:04/02/2025
		No. of weeks:15
		Topics to be covered:
WEEK	DAY	TOPIC
1st week	1st	Introduction to data communication, what is data, network communication channel
	2nd	Networks (LAN,MAN,WAN), concept of all
	3rd	protocol, architecture
	4th	Standard concepts, network standards
2nd week	1st	OSI layer
	2nd	Different layers of OSI ,advantages,disadvantages
	3rd	TCP/IP
	4th	Difference between OSI &TCP/IP
3rd week	1st	Concept of data transmission
	2nd	Terminology of data transmission
	3rd	Analog and digital data transmission
	4th	Transmission impairment
4th week	1st	Channel capacity
	2nd	Introduction of transmission media
	3rd	Guided,unguided
	4th	Wireless transmission
5th week	1st	Data encoding
	2nd	Digital data, Digital signals
	3rd	Digital signals
	4th	Digital data,Analog signals
6th week	1st	Analog data ,Digita signals
	2nd	Analog signal,Digital signals
	3rd	Analog data,Analog signals
	4th	Analog signals, Conversion
7th week	1st	Transmission,Synconus,Asynconus
	2nd	Flow control
	3rd	Error detection methods
	4th	line configuration
8th week	1st	Error control
	2nd	Multiplexing, Types of multiplexing
	3rd	Concept of EDM,TDM,WDM
	4th	Statistical TDM
9th week	1st	Introduce to switching
	2nd	CKT Switching
	3rd	PKT switching
	4th	X. 25
10th week	1st	Routing in PKT switching
	2nd	Congestion
	3rd	Effect of congestion
	4th	Congestion control

11th week	1st	Traffic management
	2nd	Congestion in pkt switching network
	3rd	Concept of topology
	4th	Types of topology
12th week	1st	Transmission media
	2nd	LAN protocol, architecture
	3rd	Media access control
	4th	Bridges, HUB, switches
13th week	1st	Ethernet (CSMA/CD, CSMA/CA)
	2nd	CSMA/CD
	3rd	Fiber
	4th	WLAN technology
14th week	1st	TCP/IP concepts, TCP/IP suits
	2nd	Basic protocol function
	3rd	Protocol function
	4th	Principle of inter network
15th week	1st	Internet protocol operations
	2nd	Internet protocol
	3rd	Doubt clearing class
	4th	Question answer discussion of previous year

Jashwin Satapathy

Signature of faculty


HOD, E&TC