

# LESSON PLAN

Name of the Faculty : Atul Kumar  
 Discipline : Electronics & Communication Engineering  
 Semester : 6<sup>th</sup>  
 Subject : Consumer Electronics  
 Lesson Plan Duration : from 20.01.2025 to 02.05.2025  
 Work Load (Lecture/ Practical) per week (in hours): Lectures-04, Practicals-04

Week	Theory		Practical	
	Lecture	Topics	Practical	Topic
1	Unit 1	Audio Systems	1	To plot the frequency response of microphone
	2	Carbon moving coil cordless microphones		
	3	Direct radiating loudspeaker		
	4	Horn loudspeaker		
2	5	Multi speaker system	2	To plot the frequency response of loudspeaker
	6	Public address system		
	7	Optical sound recording on CD system		
	8	Optical sound recording on DVD		
3	9	Revision of covered syllabus		Viva- voce
	Unit 2	Monochrome TV: elements of tv communication system		
	11	Scanning & its need		
	12	Need of synchronizing pulses		
4	13	Need of blanking pulses	3	To study and use a Public address system and its components.
	14	VSB Vestigial Side Band		
	15	Composite Video Signal		
	16	TV Receiver: Definition		
5	17	Block diagram	4	To observe the waveforms and measure voltages of colour TV Receiver at different points
	18	Function of each block		
	19	Waveform at input of each block		
	20	Waveform at output of each block		
6	21	Revision of covered syllabus	5	Fault finding of colour TV

	22	Sessional-1		
	Unit 3	Color TV: elements of tv communication system		
	24	Primary Colors		
7	25	Secondary Colors		Viva- voce
	26	Concept of mixing of colors		
	27	Additive & Subtractive mixing of colors		
	28	Color triangle		
8	29	Camera Tubes	6	Fault Finding of LED TV.
	30	Vidicon & Plumbicon		
	31	PAL TV Receiver		
	32	Function of each block		
9	33	Concept of Compatibility b/w monochrome & color tv		Viva- voce
	34	NTSC TV System		
	35	PAL TV System		
	36	CCIR		
10	37	SECAM TV System	7	To use a Colour Pattern Generator with a colour TV.
	38	Brief comparison of all three tv systems		
	39	Luminance, Hue & Saturation		
	40	Revision of covered syllabus		
11	Unit-4	LCD TV		Viva- voce
	42	Basic principle of lcd tv		
	43	Working of lcd tv		
	44	LED TV		
12	45	Basic principle of led tv	8	Demonstration and operation of DTH System
	46	Working of led tv		
	47	Comparison of lcd & led tv		

	48	Pros & cons of lcd & led tv		
13	49	Liquid Crystal LCD Technology		Viva- voce
	50	Concept of LED as pixels in LED Tv		
	51	Better among lcd & led tv		
	52	Future of lcd & led tv's		
14	53	Revision of covered syllabus	9	
	54	Sessional-2		
	Unit-5	Basic idea of compression techniques		
	56	Digital audio compression techniques		
15	57	MPEG 3, AAC	10	To visit the control room of a Cable TV station and identify its different components.
	58	Digital video compression techniques		
	59	MPEG 1, MPEG 2, MPEG 4, H.264		
	60	Working of Cable TV		
16	61	Working of DTH		Viva- voce
	62	Working of CCTV		
	63	Revision of covered syllabus		
	64	Sessional-3		