



## **STUDY PLAN**

				Mea	surement and instrumentation	
	Ashish SIR : Control system			Date	Topic	Timing
				Monday, October 20, 2025	Methods of measurements, type of instruments	2:00PM 3:30PM
Date	Topic	Timing		Tuesday, October 21, 2025	Basic Characteristics of an Instrument & Error Analysis	2:00PM 3:30PM
Monday, September 15, 2025	Basic of Control System	5:00 PM - 6:00 PM		Wednesday, October 22, 2025	Types of Deflection, Damping and Controlling Torque	2:00PM 3:30PM
Tuesday, September 16, 2025	Transfer Function Analysis of AC and DC servomotor	5:00 PM - 6:00 PM		Thursday, October 23, 2025	classification of analog instruments, mcq	2:00PM 3:30PM
Wednesday, September 17, 2025	Control system Representation	5:00 PM - 6:00 PM		Friday, October 24, 2025	Basic Galvanometer, PMMC & MI instruments	2:00PM 3:30PM
Thursday, September 18, 2025	Time Response Analysis Part-1	5:00 PM - 6:00 PM		Monday, October 27, 2025	Electrodyanamometer instruments	2:00PM 3:30PM
Friday, September 19, 2025	Time Response Analysis Part-2	5:00 PM - 6:00 PM		Tuesday, October 28, 2025	Thermal instruments electrostatic instruments rectifier type	2:00PM 3:30PM
Monday, September 22, 2025	Routh Hurwitz Criterion, Root Locus	5:00 PM - 6:00 PM		Wednesday, October 29, 2025	Requirement of Range Extension and Basic DC Ammeter & Voltmeter	2:00PM 3:30PM
Tuesday, September 23, 2025	Bode Plotting using semi log graph paper	5:00 PM - 6:00 PM		Thursday, October 30, 2025	Loading Effect Due to Voltmeter Resistance	2:00PM 3:30PM
Wednesday, September 24, 2025	Compensator	5:00 PM - 6:00 PM		Friday, October 31, 2025	Property , materials, measurments of low resistance	2:00PM 3:30PM
Thursday, September 25, 2025	Controller	5:00 PM - 6:00 PM		Monday, November 3, 2025	Measurments of medium resistance	2:00PM 3:30PM
			/	Tuesday, November 4, 2025	Measurments of high resistance	2:00PM 3:30PM
I	Ashish SIR : Estimation & Coasting			Wednesday, November 5, 2025	Measurments of inductance-1	2:00PM 3:30PM
				Thursday, November 6, 2025	Measurments of inductance-2	2:00PM 3:30PM
Date	Topic	Timing		Friday, November 7, 2025	Capacitance and special bridges	2:00PM 3:30PM
Wednesday, October 1, 2025	Class -1	5:00 PM - 6:00 PM		Monday, November 10, 2025	DC and AC power,introduction to wattmeter	2:00PM 3:30PM
Thursday, October 2, 2025	Class -2	5:00 PM - 6:00 PM		Tuesday, November 11, 2025	Blondel theorem , two WM method, Single WM method	2:00PM 3:30PM
Friday, October 3, 2025	Class -3	5:00 PM - 6:00 PM		Wednesday, November 12, 2025	Errors in Wattmeter	2:00PM 3:30PM
Monday, October 6, 2025	Class -4	5:00 PM - 6:00 PM		Thursday, November 13, 2025	Induction Type Energy Meter	2:00PM 3:30PM
Tuesday, October 7, 2025	Class -5	5:00 PM - 6:00 PM		Friday, November 14, 2025	Measurement of Frequency	2:00PM 3:30PM
				Monday, November 17, 2025	Measurement of Power Factor	2:00PM 3:30PM
	Ashish SIR : UEE			Tuesday, November 18, 2025	Basics and construction of CRO	2:00PM 3:30PM
				Wednesday, November 19, 2025	Measurement of phase and frequency	2:00PM 3:30PM
Date	Topic	Timing		Thursday, November 20, 2025	Operation modes of CRO and Special CRO	2:00PM 3:30PM
Wednesday, October 8, 2025	Type of Motor and Characterstics	5:00 PM - 6:00 PM		Friday, November 21, 2025	AC Potentiometers	2:00PM 3:30PM
Thursday, October 9, 2025	Type of loads	5:00 PM - 6:00 PM		Monday, November 24, 2025	Basic Potentiometer Circuit &Crompton's Potentiometer Circuit	2:00PM 3:30PM





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Friday, October 10, 2025	System of electric traction and track electrification	5:00 PM - 6:00 PM	Tuesday, November 25, 2025	Strain gauges, LVDT, RTD. thermistor and pyrometer	2:00PM 3:30PM
Monday, October 13, 2025	Speed-time curves for different services	5:00 PM - 6:00 PM	Wednesday, November 26, 2025	Construction , principle, application of Q- meter	2:00PM 3:30PM
Tuesday, October 14, 2025	Calculation of various quantities of Electrical Traction	5:00 PM - 6:00 PM	Thursday, November 27, 2025	CT & PT and Burden of Instrument Transformer	2:00PM 3:30PM
Wednesday, October 15, 2025	Methods of Electrical Heating	5:00 PM - 6:00 PM	Friday, November 28, 2025	basic of DVM and its Extension, Type of DVM	2:00PM 3:30PM
Thursday, October 16, 2025	Methods of Electrical Welding	5:00 PM - 6:00 PM	Monday, December 1, 2025	basic of Electronic AC Voltmeter and its principle operation	2:00PM 3:30PM
Friday, October 17, 2025	Introduction and terms used in Illumination	5:00 PM - 6:00 PM	Tuesday, December 2, 2025	Type of Electronic AC Voltmeters	2:00PM 3:30PM
Monday, October 20, 2025	Discharge Lamps, MV and SV Lamps	5:00 PM - 6:00 PM	Wednesday, December 3, 2025	Live doubt and miscellaneous-1	2:00PM 3:30PM
Tuesday, October 21, 2025	Basic Principle of Light Control , Types and design of lightning and flood lighting	5:00 PM - 6:00 PM	Thursday, December 4, 2025	Live doubt and miscellaneous-2	2:00PM 3:30PM
	END OF SUBJECT		Friday, December 5, 2025	Live doubt and miscellaneous-3	2:00PM 3:30PM
				Basic Electronics	
	Electronics Devices		Date	Topic	Timing
			Tuesday, October 21, 2025	Orientation	5:00PM - 6:00PM
Date	Topic	Timing	Wednesday, October 22, 2025	Introduction to Number systems	5:00PM - 6:00PM
Recorded	Energy Band Diagram	Recorded	Thursday, October 23, 2025	Addition in different base	5:00PM - 6:00PM
Recorded	Types of Semiconductor	Recorded	Friday, October 24, 2025	Subtraction in Different Base	5:00PM - 6:00PM
Recorded	Resistivity and Conductivity of Semiconductor	Recorded	Monday, October 27, 2025	Complements	5:00PM - 6:00PM
Recorded	Hall Effect	Recorded	Tuesday, October 28, 2025	Interconversions part-1	5:00PM - 6:00PM
Recorded	Practice Questions	Recorded	Wednesday, October 29, 2025	Interconversions part-2	5:00PM - 6:00PM
Recorded	PN Junction Diodes	Recorded	Thursday, October 30, 2025	Binary Codes,BCD	5:00PM - 6:00PM
Recorded	Characteristics of PN Junction Diodes	Recorded	Friday, October 31, 2025	Excess-3 and Gray Codes	5:00PM - 6:00PM
Recorded	Trans <mark>istio</mark> n and Diffusion Capacacitance	Recorded	Monday, November 3, 2025	Practice Questions	5:00PM - 6:00PM
Recorded	Zener Diode	Recorded	Tuesday, November 4, 2025	Axioms and Operations	5:00PM - 6:00PM
Recorded	Avalanche and Zener Breakdown	Recorded	Wednesday, November 5, 2025	Laws of Boolean Algebra	5:00PM - 6:00PM
Recorded	Rectifiers-1	Recorded	Thursday, November 6, 2025	SOP and POS representation part-1	5:00PM - 6:00PM
Recorded	Rectifiers-2	Recorded	Friday, November 7, 2025	SOP and POS representation part-2	5:00PM - 6:00PM
Recorded	Clippers	Recorded	Monday, November 10, 2025	Basic Gates	5:00PM - 6:00PM
Recorded	Clampers	Recorded	Tuesday, November 11, 2025	Special Gates	5:00PM - 6:00PM
Recorded	Practice Questions	Recorded	Wednesday, November 12, 2025	Universal Gates	5:00PM - 6:00PM
Recorded	Transistors and Its working	Recorded	Thursday, November 13, 2025	Circuits of Gates	5:00PM - 6:00PM
Recorded	Confuguration and Characteristics of Transistors	Recorded	Friday, November 14, 2025	Adders	5:00PM - 6:00PM





Recorded	Current Components in BJT	Recorded	Monday, November 17, 2025	Subtractors	5:00PM - 6:00PM
Recorded	Early Effect	Recorded	Tuesday, November 18, 2025	Multiplexers part-1	5:00PM - 6:00PM
Recorded	Mode of Operation	Recorded	Wednesday, November 19, 2025	Multiplexers part-2	5:00PM - 6:00PM
Recorded	Applications of Transistor	Recorded	Thursday, November 20, 2025	Demultiplexers and Decoders	5:00PM - 6:00PM
Recorded	BJT amplifiers - 1	Recorded	Friday, November 21, 2025	Practice Questions	5:00PM - 6:00PM
Recorded	BJT amplifiers - 2	Recorded	Monday, November 24, 2025	Introduction to flip flops	5:00PM - 6:00PM
Recorded	Power amplifiers	Recorded	Tuesday, November 25, 2025	Different types of Flip flops	5:00PM - 6:00PM
Recorded	Sinusoidal Osciilator & Phase shift Oscillator	Recorded	Wednesday, November 26, 2025	Counters Basics	5:00PM - 6:00PM
Recorded	Wien Bridge Oscillator	Recorded	Thursday, November 27, 2025	Counters Basics	5:00PM - 6:00PM
Recorded	Colpitts and Hartley Oscillators	Recorded	Friday, November 28, 2025	Practice Questions	5:00PM - 6:00PM
Recorded	Multivibrator - 1	Recorded	Monday, December 1, 2025	A/D Convertors	5:00PM - 6:00PM
Recorded	Multivibrator - 2	Recorded	Tuesday, December 2, 2025	D/A Convertors	5:00PM - 6:00PM
Recorded	Practice Questions	Recorded	Wednesday, December 3, 2025	Practice Questions	5:00PM - 6:00PM
Recorded	Inverter and UPS	Recorded	Thursday, December 4, 2025	Memories	5:00PM - 6:00PM
Recorded	Working of Triode	Recorded	Power Electronics		
Recorded	Triode Circuits	Recorded	Date	Title	Time
	END OF SUBJECT		Recorded	Power Electronics -1	Recorded
	Ashish SIR : Electrical Machine			Power Electronics -2	Recorded
Date	Topic	Timing	Recorded	Power Electronics -3	Recorded
Monday, November 10, 2025					
	Orienntation	2:00PM 3:30PM	Recorded	Power Electronics -4	Recorded
Tuesday, November 11, 2025	Orienntation Fundamentals of machine, Basics of transformer	2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded		Recorded Recorded
Tuesday, November 11, 2025  Wednesday, November 12, 2025				Power Electronics -4	
•	Fundamentals of machine, Basics of transformer	2:00PM 3:30PM	Recorded	Power Electronics -4 Power Electronics -5	Recorded
Wednesday, November 12, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type	2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded	Power Electronics -4 Power Electronics -5 Power Electronics -6	Recorded Recorded
Wednesday, November 12, 2025 Thursday, November 13, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type  Principle, ideal transformers, EMF equation	2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded	Power Electronics -4  Power Electronics -5  Power Electronics -6  Power Electronics -7	Recorded Recorded Recorded
Wednesday, November 12, 2025  Thursday, November 13, 2025  Friday, November 14, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type  Principle, ideal transformers, EMF equation  Phasor diagram, Impedance transformer, rating of transformer	2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded Recorded Recorded	Power Electronics -4 Power Electronics -5 Power Electronics -6 Power Electronics -7 Power Electronics -8	Recorded Recorded Recorded
Wednesday, November 12, 2025  Thursday, November 13, 2025  Friday, November 14, 2025  Monday, November 17, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type  Principle, ideal transformers, EMF equation  Phasor diagram, Impedance transformer, rating of transformer  Equivalent cricuit	2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded Recorded Recorded Recorded	Power Electronics -4  Power Electronics -5  Power Electronics -6  Power Electronics -7  Power Electronics -8  Power Electronics -9	Recorded Recorded Recorded Recorded Recorded
Wednesday, November 12, 2025  Thursday, November 13, 2025  Friday, November 14, 2025  Monday, November 17, 2025  Tuesday, November 18, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type  Principle, ideal transformers, EMF equation  Phasor diagram, Impedance transformer, rating of transformer  Equivalent cricuit  OC test and SC test and Sumpner Test	2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM 2:00PM 3:30PM	Recorded Recorded Recorded Recorded Recorded Recorded	Power Electronics -4 Power Electronics -5 Power Electronics -6 Power Electronics -7 Power Electronics -8 Power Electronics -9 Power Electronics -10	Recorded Recorded Recorded Recorded Recorded Recorded
Wednesday, November 12, 2025  Thursday, November 13, 2025  Friday, November 14, 2025  Monday, November 17, 2025  Tuesday, November 18, 2025  Wednesday, November 19, 2025	Fundamentals of machine, Basics of transformer  Shell type and core type  Principle, ideal transformers, EMF equation  Phasor diagram, Impedance transformer, rating of transformer  Equivalent cricuit  OC test and SC test and Sumpner Test  Voltage regulation	2:00PM 3:30PM	Recorded Recorded Recorded Recorded Recorded Recorded Recorded Recorded	Power Electronics -4  Power Electronics -5  Power Electronics -6  Power Electronics -7  Power Electronics -8  Power Electronics -9  Power Electronics -10  Power Electronics -11	Recorded Recorded Recorded Recorded Recorded Recorded Recorded Recorded





Tuesday, November 25, 2025	Auto transformer	2:00PM 3:30PM		Recorded	Power Electronics -15	Recorded
Wednesday, November 26, 2025	3 phase transformer-1	2:00PM 3:30PM		Recorded	Power Electronics -16	Recorded
Thursday, November 27, 2025	3 phase transformer-2	2:00PM 3:30PM		Recorded	Power Electronics -17	Recorded
Friday, November 28, 2025	DC generator introduction	2:00PM 3:30PM		Recorded	Power Electronics -18	Recorded
Monday, December 1, 2025	Construction of DC machine	2:00PM 3:30PM				
Tuesday, December 2, 2025	Classification of windings and its analysis	2:00PM 3:30PM			Ashish Sir : Power Systems	
Wednesday, December 3, 2025	EMF equation & Classification of generators	2:00PM 3:30PM				
Thursday, December 4, 2025	Armature Reaction	2:00PM 3:30PM		Date	Topic	Timing
Friday, December 5, 2025	Commutation & interpolar winding	2:00PM 3:30PM		Monday, December 8, 2025	Introduction to Power Systems	5:00PM - 6:00PM
Monday, December 8, 2025	DC Generator Characteristics	2:00PM 3:30PM		Tuesday, December 9, 2025	Generation (Thermal Power plant, Hydro Power Plant)	5:00PM - 6:00PM
Tuesday, December 9, 2025	Voltage buildup condition and Critical Condition	2:00PM 3:30PM		Wednesday, December 10, 2025	Generation (Nuclear Power Plant), Renewable & Non renewable power plant	5:00PM - 6:00PM
Wednesday, December 10, 2025	Voltage Regulation and Parallel Operation of DC Generator	2:00PM 3:30PM		Thursday, December 11, 2025	Economic Load factors (Load factor, capacity factor etc.)	5:00PM - 6:00PM
Thursday, December 11, 2025	DC motor introduction	2:00PM 3:30PM		Friday, December 12, 2025	Per unit method Part-1	5:00PM - 6:00PM
Friday, December 12, 2025	Classification of DC motor	2:00PM 3:30PM	\	Monday, December 15, 2025	Per unit method Part-2	5:00PM - 6:00PM
Monday, December 15, 2025	Significance of back emf and torque analysis	2:00PM 3:30PM		Tuesday, December 16, 2025	Question practice Session	5:00PM - 6:00PM
Tuesday, December 16, 2025	DC Motor Characterstic	2:00PM 3:30PM		Wednesday, December 17, 2025	Power factor improvement Part-1	5:00PM - 6:00PM
Wednesday, December 17, 2025	DC Motor Losses and Efficiency	2:00PM 3:30PM		Thursday, December 18, 2025	Power factor improvement Part-2	5:00PM - 6:00PM
Thursday, December 18, 2025	Speed control of motor	2:00PM 3:30PM		Friday, December 19, 2025	Power factor improvement Part-3	5:00PM - 6:00PM
Friday, December 19, 2025	DC Motor Starter	2:00PM 3:30PM		Monday, December 22, 2025	Power factor improvement Part - 4	5:00PM - 6:00PM
Monday, December 22, 2025	Breaking and testing	2:00PM 3:30PM		Tuesday, December 23, 2025	Question practice Session	5:00PM - 6:00PM
Tuesday, December 23, 2025	3 phase IM introduction and construction	2:00PM 3:30PM		Wednesday, December 24, 2025	Transmission line parameters Part-1	5:00PM - 6:00PM
Wednesday, December 24, 2025	Slip and rotor circuit parameters	2:00PM 3:30PM		Thursday, December 25, 2025	Transmission line parameters Part-2	5:00PM - 6:00PM
Thursday, December 25, 2025	Torque Slip characteristics	2:00PM 3:30PM		Friday, December 26, 2025	Transmission line parameters Part-3	5:00PM - 6:00PM
Friday, December 26, 2025	Starting methods	2:00PM 3:30PM		Monday, December 29, 2025	Short circuit of fault analysis Part -1	5:00PM - 6:00PM
Monday, December 29, 2025	Speed control of Induction Motor	2:00PM 3:30PM		Tuesday, December 30, 2025	Short circuit of fault analysis Part -2	5:00PM - 6:00PM
Tuesday, December 30, 2025	Testing of Indction motor	2:00PM 3:30PM		Wednesday, December 31, 2025	Question practice Session	5:00PM - 6:00PM
				Thursday, January 1, 2026	Short circuit of fault analysis Part -3	5:00PM - 6:00PM
				Friday, January 2, 2026	Power system stability Part - 1	5:00PM - 6:00PM
				Monday, January 5, 2026	Power system stability Part - 2	5:00PM - 6:00PM
				Tuesday, January 6, 2026	Switchgear and protection Part-1	5:00PM - 6:00PM





		Wednesday, January 7, 2026	Switchgear and protection Part-2	5:00PM - 6:00PM
		Thursday, January 8, 2026	Switchgear and protection Part-3	5:00PM - 6:00PM
		Friday, January 9, 2026	Switchgear and protection Part-4	5:00PM - 6:00PM
		Monday, January 12, 2026	Switchgear and protection Part-5	5:00PM - 6:00PM
		Tuesday, January 13, 2026	Question practice Session	5:00PM - 6:00PM
		Wednesday, January 14, 2026	Cables, insulators Part -1	5:00PM - 6:00PM
		Thursday, January 15, 2026	Cables, insulators Part -2	5:00PM - 6:00PM
		Friday, January 16, 2026	Circuit Breakers Part -1	5:00PM - 6:00PM
		Monday, January 19, 2026	Circuit Breakers Part -2	5:00PM - 6:00PM
		Tuesday, January 20, 2026	Question practice Session	5:00PM - 6:00PM

