

Name of the Faculty	:	Mr. Ankit Sharma
Discipline	:	Civil Engineering
Semester	:	6 TH
Subject	:	ANPC, PEC-CEEL-304-G
Lesson Plan Duration	:	15 Weeks (From May 2021 to Aug 2021)
Work load (Lectures/Practical)		
Per week (in hours)	:	Lectures-02

LECTURE PLAN

WEEK	LECTURE	TOPIC
1 st	1 st	Composition and Structure of Atmosphere, Air Pollution and Global Climate
	2 nd	Air Quality Criteria, Emission Standards
2 nd	1 st	National Ambient Air Quality Standards, Air Quality Management in India
	2 nd	Sources and Classification of Air Pollutants, Type of Air Pollutants, Pollution due to Automobiles
3 rd	1 st	Analysis of Air Pollutants – Chemical, Instrumental and Biological Methods
	2 nd	Analysis of Air Pollutants – Chemical, Instrumental and Biological Methods
4 th	1 st	Air Pollution and its Effects on Human health plants, animals and microbes
	2 nd	Air Pollution and its Effects on archaeological monuments and aesthetics
5 th	1 st	Concept of Atmospheric Stability, Adiabatic and Environmental Lapse Rate
	2 nd	Plume Behaviour, Terrain and Structure on Pollutant Dispersion
6 th	1 st	factors affecting Pollutant Dispersion, Concept of Maximum Mixing Depth and Ventilation Coefficient
	2 nd	Plume Rise and Effective Stack Height, Objectives, Time and Space Variability in Air Quality
7 th	1 st	Air Sampling Design, Analysis and Interpretation of Air Pollution Data

	2 nd	Introduction to Air Quality Index and Comprehensive Environmental Pollution Index and its Application
8 th	1 st	Sampling and Measurement of Air Pollutants Guidelines of Network Design in Urban areas & Rural areas
	2 nd	Stack Monitoring
9 th	1 st	Dispersion modelling, it's Applications and Limitations
	2 nd	Gaussian Plume Model and GLC Determination
10 th	1 st	Global Environmental Issues: Acid Rain, Global Warming, Smog, Ozone layer depletion
	2 nd	Combustion of Fuel, Indoor Air Pollution, Various Treaties and Protocols: Kyoto Protocol and Montreal Protocol
11 th	1 st	Introduction to Control Methods and Equipment for Particulate Matter and Gases
	2 nd	Design and Working of Scrubbers, Electrostatic Precipitator, Gravity Settlers, Cyclone Separator, Filter Bags
12 th	1 st	Adsorption by Liquids, Adsorption by Solids, Combustion Odours and their Control
	2 nd	Sound and Noise, Sources of Noise Pollution – Environmental and Industrial, Characteristics of Sound and its Measurement
13 th	1 st	Levels of Noise, Noise Rating Systems, Noise Level Standards, Outdoor and Indoor Noise Propagation
	2 nd	Psychoacoustics and Noise Criteria Curves
14 th	1 st	Effects on Human and Environment, Infra-Sound, Ultrasound
	2 nd	Impulsive Sound and Sonic Boom; Noise Standards and Permissible Values
15 th	1 st	Instrumentation and Monitoring Procedure, Noise Indices and Control Methods
	2 nd	Revision & Doubts