

**MAULANA AZAD NATIONAL INSTITUTE OF TECHNOLOGY
BHOPAL**

DEPARTMENT OF CHEMISTRY

MID TERM EXAMINATION (NOV 2024)

B.Tech. (First Year)

Course Code: CHY24110		Course: Environmental Science	
Semester: First			
Time: 1 hour		Max. Marks: 20	
Note: All questions are compulsory, missing data (if any) may be assumed suitably.			
SECTION A (Memory Based Questions) [Max 6 Marks]			
S. N.		Marks	CO
Q A1	How shifting cultivation and overgrazing are associated with deforestation?	[3]	CO2
Q A2	Write short notes (50-75 words) on any one of the following incidents/compounds? (a) Cauvery Water Dispute (b) Destruction of Sariska Tiger Reserve (c) Organic Particulate Matter	[3]	CO1
SECTION B (Concept Based Questions – Understand and Apply) [Max 6 Marks]			
Q B1	Nuclear fission can be used as a practical energy source or nuclear fusion? Justify your statement.	[1+2]	CO1
Q B2	Does O ₃ serve as a rescuer of biosphere or act as a potent pollutant? Explain with appropriate chemical reactions.	[1+2]	CO3
SECTION C (Analytical/Concept Based Questions – Explicate) [Max 8 Marks]			
Q C1	How is PAN formed from aldehyde (RCHO) in atmosphere? Validate your answer by showing its reaction chemistry.	[4]	CO3
Q C2	In the stratospheric level, what are the reactions involved to generate HNO ₂ and HNO ₃ from the N ₂ O gases?	[4]	CO1