## **CURRICULUM PLAN (ODD SEMESTER 2024-25)**

Teacher Name: Dr. Anjali Sehrawat

Course: BSc. (H) Chemistry, II year (Semester III)

Paper Name: (DSC) Carbonyls, Carboxylic acid, amines, nitro compounds, isonitriles and

diazonium salts (NEP) (1 period per week)

UPC: 2172012302

Contents	Allocation of lectures	Month wise schedule to be followed	Tutorial/Assignments/ Presentations etc.
UNIT 2: Nitro compounds, amines, Diazonium salts, Nitriles and Isonitriles Amines: Preparation, pyramidal inversion, Basicity of amines	2	1 <sup>st</sup> week of August – 2 <sup>nd</sup> week of august	<ul> <li>Syllabus Overview</li> <li>References Books</li> <li>Lectures</li> <li>Doubt Session</li> </ul>
Amines: Hinsberg test, Reaction with nitrous acid, Gabriel phthalimide synthesis, Carbylamine test, Mannich reaction, Exhaustive methylation	2	3 <sup>rd</sup> week of August – 4 <sup>th</sup> week of August	<ul><li>Lectures</li><li>Class discussion</li></ul>
Amines: Hoffmann elimination, Cope elimination Diazonium salts: Synthetic applications of diazonium salts	2	1 <sup>st</sup> week of September - 2 <sup>nd</sup> week of September	<ul><li>Lectures</li><li>Problem solving</li><li>Class discussion</li></ul>
<b>Diazonium salts</b> : Synthetic applications of diazonium salts continued	2	3 <sup>rd</sup> week of September – 4 <sup>th</sup> week of September	<ul><li>Lectures</li><li>Problem solving</li></ul>
Nitro compounds — Preparation, Haenry reaction, NEF reaction, Reduction, reaction with nitrous acid	2	1 <sup>st</sup> week of October- 2 <sup>nd</sup> week of October	<ul><li>Lectures</li><li>Class test</li></ul>

Nitriles: preparation	2	3 <sup>rd</sup> week of October- 4 <sup>th</sup> week of October	<ul> <li>Lectures</li> <li>Problem solving</li> <li>Class discussion</li> </ul>
Nitriles: Properties, Addition reactions, reduction reactions, hydrolysis, reaction with Grignard reagent	3	1 <sup>st</sup> week of November- 3 <sup>rd</sup> week of November	<ul><li>Lectures</li><li>Problem solving</li><li>Class discussion</li></ul>

Dr. Anjali Sehrawat Department of Chemistry