

## Lesson Plan

**Mehr Chand Mahajan DAV College for Women, Sector – 36A, Chandigarh**

**Monthly Teaching Plans- Odd Semester (Semester-III)**

**Session – 2023-24**

**Department- Zoology**

**Name of the Teacher- Dr. Divya Sharma**

**Class- B.Sc. II (Medical)**

**Single section**

**Subject- Zoology**

**PAPER II: BIOCHEMISTRY AND PHYSIOLOGY-I (ZOO 302)**

Month	Date		Topics to be Covered	Academic Activity to be Undertaken
	From	To		
July	21.07.2023	31.07.2023	<b>Biochemistry and its scope</b> <b>Carbohydrates, proteins:</b> classifications and functions	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 03.08.2023 to review the progress of syllabus as per lesson plans</b>				
August	01.08.2023	31.08.2023	<b>Lipids and nucleic acids:</b> their classifications and functions. <b>Carbohydrate metabolism:</b> The Embden Meyerhoff, Parnas pathway (Glycolysis), the tricarboxylic acid cycle	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 02.09.2023 to review the progress of syllabus as per lesson plans</b>				
September	01.09.2023	30.09.2023	The hexose monophosphate shunt, glycogenesis and glycogenolysis. <b>Enzymes:</b> Nature, nomenclature, mode of action, their classification, coenzymes and cofactors.	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 03.10.2023 to review the progress of syllabus as per lesson plans</b>				
October	01.10.2023	31.10.2023	<b>Digestion:</b> Digestion of dietary constituents, regulation of digestive processes and absorption. extra and intra cellular digestion, enzymatic digestion and symbiotic digestion. <b>Respiration:</b> Exchange and transport of respiratory gases, Oxygen dissociation curve of haemoglobin, Bohr effect, chloride shift, Haldane effect and control of breathing.  <b>MST</b>	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 02.11.2023 to review the progress of syllabus as per lesson plans</b>				
November	01.11.2023	18.11.2023	<b>Heart:</b> Origin and regulation of heart beat, cardiac cycle, electrocardiogram, cardiac output, blood pressure and micro-circulation. <b>Blood:</b> Composition and functions of blood and lymph. Function of hemoglobin, blood clotting. Blood groups including Rh. Factor.  <b>Revision and Class test</b>	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 20.11.2023 to review the completion of syllabus as per lesson plans</b>				
<b>End semester Examination 27.11.2023 to 30.12.2023</b>				

## Lesson Plan

**Mehr Chand Mahajan DAV College for Women, Sector – 36A, Chandigarh**

**Monthly Teaching Plans- Even Semester (Semester-IV)**

**Session – 2023-24**

**Department- Zoology**

**Name of the Teacher- Dr. Divya Sharma**

**Class- B.Sc. II (Medical)**

**Single section**

**Subject- Zoology**

**PAPER II: BIOCHEMISTRY AND PHYSIOLOGY-II (ZOO- 402)**

Month	Date		Topics to be Covered	Academic Activity to be Undertaken
	From	To		
January	09.01.2024	31.01.2024	<b>Lipid metabolism:</b> B-oxidation of fatty acids, fate of glycerol and gluconeogenesis, interaction of carbohydrates and lipids, lipogenesis in tissues, ketosis. <b>Protein metabolism:</b> Metabolism of amino acids (Oxidative deamination, transamination and decarboxylation), hydrolysis of proteins and Ornithine cycle).	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 02.02.2024 to review the progress of syllabus as per lesson plans</b>				
February	01.02.2024	29.02.2024	<b>Excretion:</b> Structure and types of nephron, urine formation, osmoregulation and counter current mechanism, composition of urine. <b>Endocrine System:</b> Structure, hormones and functions of thyroid, parathyroid, pineal, thymus, hormones of alimentary canal and kidney, adrenal, hypothalamus, pituitary, pancreas and gonads.	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 02.03.2024 to review the progress of syllabus as per lesson plans</b>				
March	01.03.2024	31.03.2024	<b>Neural Integration:</b> Structure of neuron, resting membrane potential, origin and propagation of impulse along the axon, synapse and myoneural junction.  <b>MST</b>	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 02.04.2024 to review the progress of syllabus as per lesson plans</b>				
April	01.04.2024	22.04.2024	<b>Muscles:</b> Ultrastructure, chemical and physiological basis of skeletal muscle contraction.  <b>Revision and Class test</b>	Power point presentation, group discussion, assignments, Flipped classroom method
<b>Departmental Meeting on 24.04.2024 to review the completion of syllabus as per lesson plans</b>				
<b>End semester Examination 02.05.2024 to 05.06.2024</b>				