

As Per NEP 2020

University of Mumbai



Syllabus for Basket of OE	
Board of Studies in Biochemistry	
UG First Year Programme	
Semester: Second	
Title of Paper	Credits 2/ 4
I) Blood and Blood disorders	2
From the Academic Year	2024-2025

Course Name: Blood and Blood disorders

Sr. No.	Heading	Particulars
1	Description the course : Including but Not limited to :	This course introduces students with very basic understanding of the blood and its related disorders and the treatment options available. This is an attempt to generate awareness about the health of an individual
2	Vertical :	Major/Minor/(Open Elective √) /Skill Enhancement / Ability Enhancement/Indian Knowledge System (Choose By √)
3	Type :	Theory
4	Credit:	2 credits / 4 credits (1 credit = 15 Hours for Theory)
5	Hours Allotted :	30 Hours
6	Marks Allotted:	50 Marks
7	Course Objectives: 1. This course aims to introduce learners to the basic knowledge of the role of human circulatory system focusing on the blood. 2. This course also aims to introduce the basic understanding of the blood disorders	

8	Course Outcomes: 1. The learner will be able to understand and describe the functions and role of blood in the circulatory system of human body. 2. The learner will be able to understand and explain the types of blood disorders and the basic treatment modalities
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9	Title of OE course: Blood and Blood disorders Modules:- 2, Credits: 2
	Module 1: Blood
	• Composition and functions of Blood. • Functions of the blood cells • Basic knowledge of Blood clotting • Blood groups and their types. • Blood transfusion and Blood banking • Routine Biochemical blood tests
	Module 2: Understanding the Diseases and Disorders of Blood. Causes, Symptoms and treatment options for: • Different types of Anemia • Blood cancers • Hemophilia • Sickle cell disease • Thalassemia
10	Text Books: 1. Principles of Biochemistry by Lehninger, Albert L., Nelson David and Cox, Michael M.; CBS publishers. 2. Harpers illustrated biochemistry by Murray, Robert K. <i>etal.</i>; Mc Graw Hill.

11	Reference Books: 1. Text book of medical physiology by Guyton, Arthur C. and Hall, John E.; Harcourt Brace & Company Asia Pvt Ltd. 2. Tortora's Principles of Anatomy and Physiology, 16th Edition, John Wiley & Sons, 2018
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12	Internal Continuous Assessment: 40%	External, Semester End Examination: 60% Individual Passing in Internal and External Examination																				
13	Continuous Evaluation through: Quizzes, Class Tests, presentation, project, role play, creative writing, assignment etc.(at least 3)																					
14	Format of Question Paper: for the final examination Evaluation for <u>Open Elective Course</u>: 50 Marks each Course 1 – 50 marks The evaluation of these courses would include continuous evaluation (internal assessment) and Semester end examinations (External assessment). The evaluation pattern would be as follows: Internal assessment of each course: 20 marks. a. Class test 1: 10 marks b. Quizzes, presentation, project, role play, creative writing, assignment etc. 5 marks c. Attendance and active participation in academic and co-curricular activities: 5 marks. External assessment of each course: – 30 Marks. ▪ Duration: 1 Hour per course ▪ Theory question paper pattern: <table><tr><td>Question</td><td>Based on</td><td>Options</td><td>Marks</td></tr><tr><td>Q.1</td><td>Unit I</td><td>Any 5 out of 7 / Any 2 out of 3</td><td>10</td></tr><tr><td>Q.2</td><td>Unit II</td><td>Any 5 out of 7 / Any 2 out of 3</td><td>10</td></tr><tr><td>Q3.</td><td>Unit I and II</td><td>Any 5 out of 7 / Any 2 out of 3</td><td>10</td></tr><tr><td></td><td></td><td>Total</td><td>30</td></tr></table>		Question	Based on	Options	Marks	Q.1	Unit I	Any 5 out of 7 / Any 2 out of 3	10	Q.2	Unit II	Any 5 out of 7 / Any 2 out of 3	10	Q3.	Unit I and II	Any 5 out of 7 / Any 2 out of 3	10			Total	30
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		Total	30																			

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