## M.Sc. Biotechnology

**Total Credits: 98** 

### Semester I

COURSE	PAPER	CREDITS
CODE		
PSBTTC101	Cell Biology	4
PSBTTC102	General & Applied Microbiology	4
PSBTTC103	Biochemistry & Metabolism	4
PSBTTC104	Molecular Biology	4
PSBTPC105	Laboratory course in General & Applied Microbiology and Cell Biology	4
PSBTPC106	Laboratory course in Biochemistry & Metabolism and	4
	Molecular Biology	
TOTAL		24

# STUDENTS WILL REGISTER FOR A MINIMUM OF 2 CREDIT COURSE FROM SWAYAM

### Semester II

COURSE	PAPER	CREDITS
CODE		
PSBTTC201	Genetic Engineering	4
PSBTTC202	Enzymology	4
PSBTTC203	Genetics	2
PSBTTC204	Molecular Virology	2
PSBTTC205	Immunology	4
PSBTTC208	Term paper	1
PSBTPC206	Laboratory course in Genetic Engineering and	4
	Enzymology	
PSBTPC207	Laboratory course in Genetics and Immunology	4
TOTAL		25

#### **Semester III**

COURSE	PAPER	CREDITS
CODE		
PSBTTC301	Plant Biotechnology	4
PSBTTC302	Bioprocess Engineering	4
PSBTTC308	Bioinformatics & Biostatistics	2
PSBTTC304	IPR	2
PSBTTE310	Nanotechnology in Biology	2
PSBTTC309	Review Paper writing	1
PSBTPC312	Laboratory course in Plant Biotechnology	2
PSBTPC311	Laboratory course in Bioinformatics	2
PSBTPC313	Laboratory course in Bioprocess Engineering	2
TOTAL		21

Students will register for a minimum of 4 credits of course from other Departments of the University

#### **Semester IV**

COURSE	PAPER	CREDITS
CODE		
PSBTDC406	Research Project+Project presentation+Viva-	8
	Voce+Dissertation	
PSBTDC402	Journal Club	2
PSBTTC403	Animal Biotechnology	4
PSBTTC404	Environmental Biotechnology	4
TOTAL		18

Students will register for a minimum of 4 credits of course from other Departments of the University

Open courses offered by the School:-

1. Techniques in Biotechnology 4 Credits (To 3<sup>rd</sup> Sem students)

2. Essentials in Microbiology and Biochemistry 4 Credits (To 4<sup>th</sup> Sem students)