KURUKSHETRA UNIVERSITY KURUKSHETRA

[Established by the State Legislature Act XII of 1956]

('A+' Grade, NAAC Accredited)

AQAR-2020-21

1.2.2 : Scheme of Examination for the programmes in the Department/Institute of

Botany

KURUKSHETRA UNIVERSITY KURUKSHETRA

BOTANY DEPARTMENT

M.Sc. BOTANY Scheme of Examination (CBCS) w.e.f. 2020-21in Phased Manner

Semester I

Paper code	Title of paper	Type of paper	Hours /week	Credits	Marks + Internal Assessment	Total	Duration of Exam
BOT-101	Algae & Fungi	Core	4	4	80 + 20	100	3 hrs
BOT-102	Bryophytes & Pteridophytes	Core	4	4	80 + 20	100	3 hrs
BOT-103	Cytogenetics & plant breeding	Core	4	4	80 + 20	100	3hrs
BOT-104	Ecology	Core	4	4	80 + 20	100	3 hrs
BOT-105	Practical based on 101 + 102	Core	8	4	80 + 20	100	6 hrs
BOT-106	Practical based on 103 + 104	Core	8	4	80 + 20	100	6 hrs
Total				24		600	

Semester-II

Paper code	Title of paper	Type of paper	Hours/ week	Credits	Marks + Internal Assessment	Total	Duration of Exam
BOT-201	Microbiology and Biostatistics	Core	4	4	80 + 20	100	3 hrs
BOT-202	Natural Resources & Biodiversity	Core	4	4	80 + 20	100	3 hrs
BOT-203	Gymnosperms & Ethnobotany	Core	4	4	80 + 20	100	3 hrs
BOT-204	Molecular genetics	Core	4	4	80 + 20	100	3 hrs
BOT-205	Seminar	Core	1	1	25	25	1 hr
BOT-206	*Plants for human welfare	Open Elective	2	2	40 + 10	50	3 hrs
BOT-207	Practical based on 201 + 202	Core	8	4	80 + 20	100	6 hrs
BOT-208	Practical based on 203 + 204	Core	8	4	80 + 20	100	6 hrs
Total				27		675	

Semester III

Paper code	Title of paper	Type of paper	Hours/ week	Credits	Marks + Internal Assessment	Total	Duration of Exam
BOT-301	Plant physiology & Plant biochemistry	Core	4	4	80 + 20	100	3 hrs
BOT-302	Plant Taxonomy & Economic botany	Core	4	4	80 + 20	100	3 hrs
BOT-303	Plant Biotechnology & Genetic engineering	Core	4	4	80 + 20	100	3 hrs
BOT-304	a) Advanced Phycology-I (elective) b) Applied Mycology (elective) c) Restoration Ecology (elective) d) Advanced Plant Physiology (elective) e) Biophysical & biochemical techniques (elective)	Elective	4	4	80 + 20	100	3 hrs
BOT-305	Seminar	Core	1	1	25	25	1 hr
BOT-306	*Biodiversity and its conservation	Open Elective	2	2	40 + 10	50	3 hrs
BOT-307	Practical based on 301	Core	6	3	60 + 15	75	6 hrs
BOT-308	Practical based on 302 + 303	Core	6	3	60 + 15	75	6 hrs
BOT-309	Practical based on 304	Core	4	2	40 + 10	50	6 hrs
Total				27		675	

Semester IV

Paper code	Title of paper	Type of paper	Hours/ week	Credits	Marks + Internal Assessment	Total	Duration of Exam
BOT-401	Physiology of Plant growth & development	Core	4	4	80 + 20	100	3 hrs
BOT-402	Biology of Reproduction and Anatomy	Core	4	4	80 + 20	100	3 hrs
BOT-403	Plant Tissue Culture	Core	4	4	80 + 20	100	3 hrs
BOT-404	a) Advanced Phycology-II (elective) b) Principles of Plant Pathology (elective) c) Conservation Biology (elective) d)Plant Growth Regulators (elective) } e) Genomics (elective)	Elective	4	4	80 + 20	100	3 hrs
BOT-405	Practical based on 401	Core	6	3	60 + 15	75	6 hrs
BOT-406	Practical based on 402 + 403	Core	6	3	60 + 15	75	6 hrs
BOT-407	Practical based on 404	Core	4	2	40 + 10	50	6 hrs
BOT-408	**Project Work/Field Training Report	Core	4	4	100	100	
Total				28		700	

*** Students can choose two open elective courses from the courses available in any department of Kurukshetra University Kurukshetra/Mooc courses available on Swayam portal- Two credits each**

****Candidates shall be allotted to teachers at the beginning of II semester to facilitate the students to carry project work during semester break in house or in other institutes. Project report would be prepared and submitted under guidance of the concerned teacher.**

Total Credits = 106 **Total Marks = 2650**

Programme Outcomes for PG courses of Faculty of Life Sciences:

1. To acquaint students with recent knowledge and techniques in basic and applied biological sciences.
2. To develop understanding of organismal, cellular, biochemical and environmental basis of life
3. To provide insight into ethical implications of biological research for environmental protection and good laboratory practices and biosafety.
4. To develop problem solving innovative thinking with robust communication and writing skills in youth with reference to biological, environmental and nutritional sciences.
5. To understand the applications of biotic material in health, medicine and food security for human well being and sustainable development.
6. To impart practical and project based vocational training for preparing youth for a career in research and entrepreneurship in fields of life sciences for self reliance.