**MSc Botany & Biotechnology Credit Structure**

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| **SEMESTER 1** |  |
| **Paper** | **Credits** |
| **Plant physiology and phytohormones** | **3** |
| **Cell Biology and Biochemistry** | **3** |
| **Molecular Biology and Genomics** | **3** |
| **Environmental Biotechnology** | **2** |
| **Plant Molecular Taxonomy** | **2** |
| **Advanced Plant Tissue culture** | **3** |
| **Cell Biology, Biochemistry, Molecular Biology, Genomics and Environmental Biotechnology Laboratory** | **3** |
| **Plant Physiology, Molecular Taxonomy and Tissue culture Laboratory** | **3** |
| **Total** | **22** |
|  |  |
| **SEMESTER 2** |  |
| **Paper** | **Credits** |
| **Plant Stress and Defense mechanisms** | **3** |
| **Genetics** | **3** |
| **Bioinformatics** | **2+1** |
| **Biophysics and Biostatistics** | **2** |
| **Agriculture Biotechnology- I (Specialization)**  **Phytomedicine and Therapeutics –I (Specialization) (Any One)** | **3** |
| **Genetics , Biophysics and Biostatistics Laboratory** | **2** |
| **Plant Stress and Defense mechanisms Laboratory** | **2** |
| **Agriculture Biotechnology laboratory I**  **Phytomedicine and Therapeutics laboratory I (Any One)** | **3** |
| **Total credits** | **21** |
|  |  |
| **SEMESTER 3** |  |
| **Paper** | **Credits** |
| **Advances in Plant Breeding** | **3** |
| **Phytotoxicity and Bioremediation** | **2** |
| **Genetic Engineering** | **3** |
| **Research Methodology** | **2** |
| **Advances in Plant Breeding, Phytotoxicity, Remediation and Genetic Engineering Laboratory** | **2** |
| **Agriculture Biotechnology- II(Specialization)**  **Phytomedicine and Therapeutics – II (Specialization) (Any One)** | **3** |
| **Reproductive Biotechnology laboratory II**  **Disease Biology and Therapeutics laboratory II** | **3** |
| **Seminar Presentation (Summer Internship)** | **1** |
| **Total credits** | **19** |
|  |  |
| **SEMESTER 4** |  |
| **Paper** | **Credits** |
| **Dissertation** | **25** |
| **Total** | **25** |