

Microbiology, Genetics & Chemistry (Mi.G.C)

- The course is combination of microbiology, genetics and chemistry and enhances the understanding of the intricate relationship between these distant fields
- The course provides a cohesive illustration of the prominence from the context of academics and research
- It opens up the options for the students from the view point of higher education in biological sciences

Subjects

Semester 1	Semester2	Semester 3
1. English	1 English	1 English
2 Telugu/san/Hindi /French	2 Telugu/san/Hindi /French	2 Telugu/san/Hindi /French
3 Ability Enhancement Compulsory Course -AECC-I / II (Mandatory Discipline) Basic Computer Skills	3 Ability Enhancement Compulsory Course -AECC-I / II (Mandatory Discipline) Environmental Studies	3 Skill Enhancement Course- SEC 1 Communication Skills (or) Professional skills / SEC 2 Food Adulteration/Basic Statistics and Genetic Analysis/Safety Rules in Chemistry laboratory and Reagents/Remedial methods for pollution, Drinking water and Soil fertility.
4 General Microbiology	4 Microbial Diversity	4 Food and Environmental Microbiology
5 Transmission Genetics	5 Molecular genetics and Genetic engineering	5 Biostatistics and Bioinformatics
6 Chemistry (Paper I)	6 Chemistry (Paper II)	6 Chemistry (Paper III)

Semester 4	Semester 5	Semester 6
1. English	1 English	1 English
2 Telugu/san/Hindi /French	2 Telugu/san/Hindi /French	2 Telugu/san/Hindi /French
3 SEC 1 Leadership & Management skills (or) Universal human values . SEC 2 Mushroom cultivation/ Analytical Techniques in Molecular Genetics/ i) Materials and their Applications/ ii) Chemistry of Cosmetics and Food Processing.	3 Generic Elective- GE Microbiology & Human health/Basic & Applied genetics	3.Hospital Waste Management.
4 Medical microbiology & Immunology	4 1A- Molecular biology & Microbial genetics 1B Microbial OMICS	4 2A- Industrial Microbiology 2B- Pharmaceutical Microbiology
5 Population genetics & Evolution	5 1A- Plant Genetics & Biotechnology/ 1B- Animal Genetics &	5 1A- Human Genome & Human Genetics/ 1B- Cellular & Molecular

	Biotechnology	Immunology
6 Chemistry (Paper IV)	6 III A- Spectroscopy & Chromatography/ III B- Metallurgy, Dyes & Catalysis	6 III A- Medicinal Chemistry/ III B- Agriculture & Fuel Chemistry