Birla Institute of Technology & Science, Pilani
Hyderabad Campus

FIRST SEMESTER 2020-2021
Course Handout (Part II)

Dated: 17.08.2020

In addition to part I (general handout for all courses appended to the timetable) this portion gives further specific details regarding the course.

Course No : **BIO G570**
Course Title : **RECENT DEVELOPMENTS IN BIOLOGY**
Instructor-In-Charge :**SRIDEV MOHAPTRA**

1. Course Description:
Recent developments in the field of biological sciences/life sciences encompassing the areas of medical biology, plant/agricultural biotechnology, biochemistry, microbial technology, environmental biotechnology and inter-disciplinary areas.

2. Scope & Objective:
The students will be exposed to recent advances / research in the area including but not restricted to animal, plants or microbial systems. There will be emphasis placed on understanding the applications and research approaches to the selected topics.

3. Text Book and Reference Book:
This course will be taught entirely from journal articles (review articles and research papers) and relevant book chapters (wherever applicable).

4. Course plan:

Lect. No.	Learning objective	Topics to be covered	Course material
1	Getting introduced to the subject and course	Orientation to the course, expectations from the course, general discussions on recent developments in biology	Review/research articles/book chapters. All material will be provided
2-5	Recent advances in biomedical sciences	Recent advances in cancer biology, infectious diseases, metabolic diseases, neurological disorders etc.	Review/research articles/book chapters. All material will be provided
6-8	Recent developments in agriculture biotechnology	Transgenic technology in crops, genetically modified foods, use of plants for manufacturing biomolecules.	Review/research articles/book chapters. All material will be provided
9-11	Recent advances in	Recent research on	Review/research

	environmental and microbial technology	environmental impact on health and agriculture, industrial microbiology and downstream processing	articles/book chapters. All material will be provided
12-14	Interface of biology with other sciences/technology	Recent advances in nano-biotechnology and computational biology	Review/research articles/book chapters. All material will be provided

5. Evaluation scheme:

Component	Duration	Weightage %	Date & Time	Nature of the Component
Test-1	30 min	10		OB
Test-2	30 min	10		OB
Test-3	30 min	15		OB
Assignments (2-3)	Variable	30		OB
Comprehensive	120 min	35	09/12 AN	OB

6. Grading Policy:
Award of grades would be guided by the histogram of marks. Decision for cases on borderline of two grades will be based on the student's promptness and participation in classroom activities as well as satisfactory attendance in lecture and tutorial classes. If a student misses even a single component entirely or does not give sufficient opportunity for being assessed, he/she may be awarded 'NC' report regardless of his/her final total score in the course (see Clause 4.19 of *BITS Academic Regulations*).

7. Office Consultation:
Will be announced in class.

8. Make-up Policy:
Only medical emergencies with evidence will be considered for make-up for Tests and Comprehensive examination. For regulations about the make-up flexibility, students are advised to refer to Clause 4.07 of *BITS Academic Regulations*

9. Course Announcements and Notices:
Announcements pertaining to the course will be made in the lecture/tutorial class and/or on CMS.

10. Academic Honesty and Integrity Policy: Academic honesty and integrity are to be maintained by all the students throughout the semester and no type of academic dishonesty is acceptable.

INSTRUCTOR-IN-CHARGE
BIO G570