

Pandurang Gramin Vikas Pratisthan Sanchalit,
Dilip Valase Patil College ,Nimgaon Sawa 410504.

DEPARTMENT OF BOTANY

Course Outcomes - Under graduate

F. Y. B. Sc Botany (Choice Based Credit System -CBCS Pattern)	BO111: Plant lifeand utilization I	CO1. Students will be made aware of plant life and itsclassification CO2. Students will know lower cryptogams, highercryptogams and phanerogams
Semester I		CO3. The student will understand the role of lower andhigher cryptotogams with detailed understanding of their life cycles, and applications.
		CO4. To provide thorough knowledge about variousprimitive plant groups and their utilization.
	BO112: Plant morphology andAnatomy	CO1. The learners will be made aware of definition, descriptive and interpretative morphology so as to distinguish the plant forms.
		CO2. Students will acquire knowledge on different morphological features like, fruit, flower, inflorescences their types and distinguishing features.
		CO3. The learner will also have a deep understanding ofanatomical features, types of tissues
		and its organization in the plant body with specialempphasis on its role and functions.
		CO4. These learning points will help the student in further applied aspects of the subjects during their higherstudies.
		CO5. The course will also develop their thinking ability to identify and let know the knowhow and importance of the plants to wider societal reach.

	BO113: Practical, Practical based on BO 111 & BO 112	To get acquainted with the subject in live form and visits to natural habitats.
F. Y. B. Sc Botany (Choice Based Credit System - CBCS Pattern) Semester II	BO 121 : Plant life and utilization II	CO1. Students will be made aware of plant diversity in Pteridophytes, Gymnosperms and Angiosperms with reference to vascular plants CO2. The student will understand the role of these groups with detailed understanding of their life cycles, and applications.
		CO3. The learners will be acquainted with understanding of application and uses of such plants in utilization
		CO4. Gain knowledge about various primitive plant groups and their utilization.
	BO 122: Principles of plant science	CO1. The learner will understand the physiological processes in the plants.
		CO2. The students will get acquainted with different cellular functions and processes of cell division
		CO3. The learners will get knowledge of the subatomic molecules and their role and functions in the cell.
		CO4. The course will create an applied interest of the students in the subject and will provoke to consider research as one of the potential field as career.
	BO 123: Practical based on BO 121 & BO 122	To create foundation for further studies in Botany. To get acquainted with the subject in live form and visits to natural habitats.
S. Y. B. Sc Botany (Choice Based Credit System - CBCS)	BO 231: Taxonomy of Angiosperms and Plant Ecology	CO1. The students will be able know the objectives, importance and scope of plant systematics. CO2. The learners will get acquainted with sources of data on systematics, botanical nomenclature.

Pattern)		
Semester I		CO3. The learner will have a deep knowledge on different plant families and its characterization features.
		CO4. The students will be made aware of environmental awareness, ecological grouping and community dynamics.
		CO5. The course will be made aware of his/her role in environment and will make them a responsible citizen it

		will also force to think students about sustainable ecology.
	BO 232: Plant Physiology	CO1. Learners will have an in deep knowledge about importance of plant physiology and its application
		CO2. Students will acquire understanding about biophysical phenomenon and various process in plants like plasmolysis, osmosis, diffusion, permeability
		CO3. The learner will have an understanding about water absorption, various cells involved in the process and their functioning.
		CO4. The course also emphasizes on understanding of various processes such as mineral and salt absorption with references to growth.
		CO5. The students will understand the role of plant growth regulators its types and also the process of flowering.
		CO6. The course will help students to take up research as career and will also those provoke understanding of growth and flowering to make them successful entrepreneurs.
	BO 233: Practical based on BO 231 &BO 232	To get acquainted with the subject in live form and visitsto ecological belts.
S. Y. B. Sc Botany (Choice Based Credit System - CBCS Pattern) Semester II	BO 241: Plant Anatomy and Embryolog y	CO1. The students will have an in deep knowledge about different types of tissues with understanding of their role in plant system CO2. The learner of the course will also understand the process of tissues systems in plants and will be able to know the growth types happening in the plant body.
		CO3. The student will understand the process of embryo formation, types of embryos and process of fertilization in plants. Which will help them to know about its application in horticulture and agricultural practices.

		help them select the stream as one of the potential careers.
	BO 242: Plant Biotechnology	CO1. The student will be introduced and made acquainted with the applied field of biotechnology with special reference to the plants.
		CO2. The learner of the course will have a detailed knowledge on plant genome, genetic engineering and bioprocesses.
		CO3. The student will have an understanding about the different applied industries in the stream and its applications in food, medicine etc.
		CO4. The learner will not only be acquainted with production processes but also will be made aware about scale ups in upstream and downstream processes.
		CO5. The course will ensure enhanced the level of understanding of students in the subject area and provoke them to consider it as a potential career.
	BO 243 : Practical based on BO 241 & BO 242	To equipped the students with skills related to laboratory as well as field based studies.

