

BOARD OF INTERMEDIATE EDUCATION::A.P::NAMPALLY::HYDERABAD::
SYLLABUS IN BOTANY FOR II YEAR
WITH EFFECT FROM THE ACADEMIC YEAR 2008-09

| Sl. No. | Topic and Sub / Topics | Periods | Remarks |
|---------|--|-----------------------|---|
| 1 | 2 | 3 | 4 |
| | UNIT – 1 * | | |
| | <u>Plant Kingdom:</u> | | |
| 1.1 | Introduction in brief | 01 | |
| 1.2 | Spirogyra – distribution and habitat, thallus structure, cell structure, reproduction – vegetative, asexual, sexual, life cycle | 03 | Parthenogenesis to be excluded |
| 1.3 | Rhizopus – distribution and habitat, structure of mycelium and hypha, reproduction – vegetative, asexual, sexual, life cycle, sexuality in Rhizopus. | 03 | |
| 1.4 | Funaria : distribution and habitat, external morphology of the gametophore, anatomy of the stem, reproduction – vegetative and sexual, sporophyte, protonema, life cycle. | 05 | Apospory to be excluded |
| 1.5 | Pteris: distribution and habitat, Morphology of the sporophyte, anatomy of the Rhizome, vegetative, asexual and sexual reproduction, life cycle. | 06 | Apospory and apogamy to be excluded |
| 1.6 | Cycas: distribution and habitat, Morphology of the sporophyte, anatomy of the coralloid root and leaflet, reproduction, life cycle. | 08 | |
| | TOTAL | <hr/> 26 <hr/> | |
| | UNIT – 2 * | | |
| | <u>Microbiology:</u> | | |
| 2.1 | Introduction and Importance: | 02 | |
| 2.2 | Bacteria – discovery, distribution, sizes, shapes, Grams stain (in brief), structure of cell, nutrition, reproduction – asexual (binary fission), sexual – conjugation (F + and F - only), transformation and transduction (only definition, discoverer and example for transformation and transduction), economic importance – beneficial (Agriculture, Industry, Medicine, Biotechnology), harmful (spoilage of food, plants, human and animal diseases) | 06 | Cell wall structure is to be given in brief |
| 2.3 | Viruses: - historical account, types, structure (TMV & T4 details), general account of sizes, shapes, replication, plant diseases caused by viruses, transmission of viruses and control measures | 06 | |
| | TOTAL | <hr/> 14 <hr/> | |

