

| LS103A | | Plant Biology | 2 Credits |
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| Name of the Faculty: Prof. Ashis K Nandi*, Prof. Supriya Chakraborty | | | |
| S. No. | Topic | Faculty Name/ Contact Hours | |
| 1 | Origin of life | AN/1 | |
| 2 | Formation of Angiosperm, gametes, self-pollination vs out crossing, mechanisms of pollen dispersal, adaptive traits, fertilization (double fertilization, triple fusion), seed and fruit formation, embryogenesis, seed dormancy, dispersal of Seed, seed germination. | AN/10 | |
| 3 | Basics of Plant Development, shoot, leaf, root and floral meristems, transition from vegetative to reproductive stages, growth regulation of plants. | AN/5 | |
| 4 | Plant Kingdom-classification, respiration-the role of energy in living system, transport systems in plants-water, food substances. | SC/4 | |
| 5 | Maintaining life, food chain, producers and consumers, pyramid of energy, food webs, decomposers, food chains and human, the fuel of life, how plants feed, photosynthesis, chloroplasts, site of photosynthesis, the reaction behind. | SC/6 | |
| 6 | Exploration of plant life and diversity with field classes | SC/2 | |

Further Reading:

1. Raven Biology of Plants; By Ray F. Evert and Susan E. Eichhorn
2. Plant Physiology; By Taiz and Zeiger
3. Introduction to Botany By Alex Shipunov
4. College Botany Vol 1 and Vol 2 By Hirrendra Chandra Gangulee, Kumud Shankar Das, Chittatosh Dutta