

(AG507) Design and Maintenance of Greenhouse

L	T	P	To	C
3	1	-	4	4

Unit 1

History and types of greenhouses; importance, function and features of green house; scope and development of green house technology.

Unit II

Location, Planning and various component of greenhouse; design criteria and calculation; constructional material and methods of construction; covering materials and its characteristics,

Unit III

Solar heat transfer, solar fraction for green house, steady state analysis of green house, Greenhouse heating, cooling, shedding and ventilation systems;

Unit IV

Carbon Dioxide generation and monitoring and lighting systems, instrumentation & computerized environmental Control Systems. Watering, fertilization, root substrata and its pasteurization, containers and benches, plant nutrition.

Unit V

Alternative cropping systems; plant tissue culture, chemical growth regulation; disease control; integrated pest management;
Postproduction quality and handling Cost analysis of greenhouse production; Applications of green house & its repair & maintenance.

TEXT BOOKS:

1. Manohar, K.R. and Iga Thinathane. C. *Green House Technology and Management*. B.S.Publications, Hyderabad.