AQUARIUM FISH KEEPING

Semester	Subject	Category	Lecture		Theory		Practical	Credits
	Code		Hrs/ week	Total Hours/ Semester	Hrs/ week	Total Hours/ Semester		
V	21SZO5A	Skill Based Subject - III	2	30	2	30	Nil	2

COURSE OBJECTIVES:

- To impart hands on training on setting up of aquaria and maintenance.
- To promote employment and entrepreneurship in the ornamental fish sector.
- To generate export oriented employment in rural and urban households through aquarium fish production

COURSE OUTCOMES (CO)

On the successful completion of the course, students will be able to:

CO Number	CO Statement	Knowledge Level (K1-K4)
CO1	students will enable to set aquarium and manage at home as well as for commercialization.	K2, K3
CO2	students will be able to distinguish fresh water and marine aquarium fishes.	K2, K3
CO3	Students can apply their knowledge in formulating and preparing fish feed.	K2,K3,
CO4	students will gain knowledge about the importance of safe handling and transportation of fish	K3, K4
CO5	Students will apply their knowledge in setting up the aquarium and develop their entrepreneurial skills.	K3,K4

Knowledge Level: K1- Remember; K2 – Understand; K3 – Apply; K4 – Analyze.

MAPPING WITH PROGRAMME OUTCOMES

COS	PO1	PO2	PO3	PO4	PO5
CO1	S	S	S	S	S
CO2	S	S	S	S	M
CO3	M	S	S	S	S
CO4	S	S	S	S	S
CO5	S	M	S	S	S

S- Strong; M – Medium; L- Low

Distribution of Marks: Theory 100% and Problems Nil %

UNIT-I

BASICS OF AQUACULTURE

(6 Hours)

Definition and scope. History of aquaculture- Present global and national scenario. Exotic and Endemic Species of Aquarium Fishes. Introduction to aquarium and aquarium accessories. Maintenance of Aquarium.

UNIT-II

AQUARIUM FISHES

(6 Hours)

Common characteristics, sexual dimorphism of Freshwater aquarium fishes - guppy, Molly, Sword tail, and Gold fish and Marine aquarium fishes - Anemone Fish, Angel Fish, and Butterfly Fish.

UNIT-III

FISH FEED (6 Hours)

Feed and Feeding Managements, Types of feed, Culture of fish feed-infusoria. Preparation and Composition of Formulated Fish Feeds.

UNIT-IV

LIVE FISH TRANSPORTATION

(6 Hours)

Live Fish Transportation, Fish Handling, Packing and Forwarding Techniques. Marketing of aquarium fishes. Budget for setting up aquarium. Fish Farm as Cottage Industry.

UNIT-V

PRACTICALS/TRAINING

(6 Hours)

Identification of common aquarium fishes, Preparation of fish feed/ Fabrication of aquarium tank, setting up and maintenance of aquarium accessories and equipment/Visit to fish farm.

TEXT BOOK AN D REFERENCES BOOKS:

S.				Year of
No.	Authors	Title of the Book	Publishers	Publication
1	Jingran, V.G	Fish Fisheries in	Hindustan Publ. Co.	1991
		India	New Delhi- India	
2	Shanmugam, K	Fishery Biology	Leo Pathipagam,	1992
		and Aquaculture	Chennai- India	
3	Mill Dic	Aquarium Fish	DK Publ. Co. Inc. New	1993
			York- USA	

4	Yadav	Fish and Fisheries	Daya Publ. Co. New	1995
			Delhi- India	
5	Hall C.B	Ponds and Fish	Agrobios- Jodhpur- India	2005
		Culture		
6	Day, F	Fishes of India Vol.	William Danison and	1978
		I and II	Sons, India	

WEB SOURCES:

www.sciencedirect.co.

www.pebmed.com

www.khansacademy.com

www.epatsala.com

www.swayam.com

TEACHING METHODOLOGY

- Class room teaching
- Charts/ Models
- Power point Presentations
- Discussions
- Assignments
- Home test

SYLLABUS DESIGNERS

- Dr. D. Sasikala, Assistant Professor and HOD
- Dr. V. Kiruthiga, Assistant Professor
- Dr. V. Rekha, Assistant Professor
- Dr. A. Vinodhini, Assistant Professor
- Dr. G. Vidhya, Assistant Professor