

KANYA MAHA VIDYALAYA, JALANDHAR (AUTONOMOUS)
SCHEME AND CURRICULUM OF AND EXAMINATION OF THREE YEAR DEGREE
PROGRAMME
(Session 2023-2024)

B. Sc. (Home Science) Semester VI							
Course Code	Course Name	Course Type	Marks				Examination time (in Hours)
			Total	Ext.		CA	
				L	P		
BHSM-6487	Applied Zoology and Food Microbiology	C	100	60	20	20	3+3

B.Sc. Home Science (Semester–VI) (Session 2023-24)
APPLIED ZOOLOGY AND FOOD MICROBIOLOGY
Course Code: BHSM-6487
(THEORY)

Course Outcomes

- CO1. To study useful and harmful insects.
- CO2. Learn about sources of food contamination and control of stored food pest.
- CO3. Knowledge about Beneficial effects of microorganisms.
- CO4. Understand the microbiology of food spoilage, Contamination and control of different food products

B. Sc. Home Science (Semester–VI) (Session 2023-24)
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Course Code: BHSM-6487
(THEORY)

Max. Time: 3 Hrs.

Max Marks: 100

Theory: 60

Practical: 20

CA: 20

Instruction for the Paper Setter.

Eight questions of equal marks (12 marks each) are to be set, two in each of the four Sections (A-D). Questions may be subdivided into parts (not exceeding four). Candidates are required to attempt five questions, selecting at least one question from each Section. The fifth question may be attempted from any Section.

UNIT-I

Elementary study of the following harmful insects Mosquito (Culex, anopheles, beg bugs and louse).

Elementary study of economically important insects – honeybee, silk moth, lac and earthworm.

UNIT-II

Sources of food contamination, food poisoning Symptoms & control.

Control of pest cereals pulses and stored products such as rice weevil lesser grain and borer.

UNIT-III

Introduction to microbiology and its relevance to food standards & safety. General morphology and Characteristics of micro-organism-bacteria Virus protozoa.

Beneficial effects of micro-organism.

- ☐ Role of bacteria in milk and milk products industry.
- ☐ Soil fertility (Nitrogen Cycle)
- ☐ Economic Importance of moulds, Aspergillus Penicillium and yeast.

UNIT-IV

Microbiology of different food spoilage & Contamination & control of cereals and their products sugar and its products, vegetable and fruits, Meat and its products fish and other sea foods egg and poultry, milk and its products & canned foods.

Reference Books:

- 1) Text Book of Zoology P.S. Dhami, Pardeep Publication.
- 2) Food Microbiology Frazier, William C and West off Dannis C. Tata McGraw will Publish Company Ltd.

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Course Code: BHSM-6487
(Practical)

Course Outcomes

CO1. To make the students aware about economically important specimens (preserved).

CO2. Familiarize about the basic microflora.

B.Sc. Home Science (Semester–VI) (Session 2023-24)
APPLIED ZOOLOGY AND FOOD MICROBIOLOGY
Course Code: BHSM-6487
(Practical)

Time: 3 Hrs.

Marks:20

Instructions for the Practical Examiners: Question paper is to set on the spot jointly by the Internal and External Examiners. Two copies of the same should be submitted for the record to COE Office, Kanya Maha Vidyalaya, Jalandhar

1. Identification of insects (same as theory).
2. Identification and economic importance of Honey bee, silk moth, lac and earthworm.
3. Identification of pest with their morphological note (same as theory).
4. Identification of slides of following microbes-bacteria, Virus, protozoa.

