

॥ संहती कार्य साधिका, शिलं परम भूषणं ॥

**Shetkari Shikshan Prasarak Mandal's
KRISHNA MAHAVIDYALYA RETHARE BK.**

Department of Zoology
PROGRAM SPECIFIC OUTCOMES
AND
COURSE OUTCOMES
FOR OUTCOME-BASED EDUCATION

Shetkari Shikshan Prasarak Mandal's
KRISHNA MAHAVIDYALAYA, RETHARE BK
DEPARTMENT OF ZOOLOGY

PROGRAMME OUTCOMES

Academic Year 2020-2021

After completion of the B. Sc programme, the students will develop ability:

- A. The B.Sc Programme develops an insight of scientific inquisitiveness among students.
- B. It increases **scientific** temperament and attitude among science graduates.
- C. It creates a systematic method of study ie. Observation, Experiment, and Conclusion which is a basic principle of scientific research.
- D. The qualities of a science – observation, precision, analytical mind, logical thinking, clarity of thought and expression, systematic approach, qualitative and quantitative decision making are enlarged.
- E. The program also empowers the graduates to appear for various competitive examinations or choose the post graduate programme of their choice.
- F. It trains the learners to extract information, formulate a scientific method of study and solve problems in a systematic and logical manner
- G. This programme enables the learners to perform jobs in diverse fields such as agriculture, industries, engineering, survey, education, banking, development-planning, business, public service, self-business etc., efficiently.
- H. The programme also helps the students to perform their carrier in the field of basic and applied research.
- I. Understood the basic concepts, fundamental principles, and scientific theories related to various scientific phenomena and their relevancies in the to-day life.

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Academic Year 2020-2021

After completion of the programme, the students will develop ability:

- A. To understand the core knowledge of Zoology and the basic concepts which help them in understanding the basics of Zoology.
- B. It identify their area of interest and further specialization in the subject and also develops skills and competence to conduct scientific study of Flora and Fauna.
- C. Students will demonstrate broad understanding of major current and past theories research findings and methodologies and techniques in their area of concentration both orally and writing.
- D. To understand the nature and basic Concepts of Cell Biology and the basic Concepts of Chordates and Non-Chordates along with the Concepts of Goaterly and Lac Culture.
- E. To understand the various Applications of Biotechnology, the Lamarkism, Neo-Lamarkism and Darwinism and the terms ELISA technique, DNA finger printing and the process of evolution.
- F. It helps to retrieve, evaluate, and interpret professional scientific literature and use this information to develop theoretical framework, testable hypothesis and prediction for their own research project.
- G. It provides advanced knowledge and skills for technical work in research and formulation of theories, concept, principals along with their knowledge and skills in carrying out independent work.

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CO 4. Study of Mutations.

CO 5. Understanding evolutionary history of certain animals, study their sericulture which is one of the longest agro industries & silk is used in the manufacture of woven materials.

B.Sc. II

Paper V: Animal Diversity II

By the end of this Course students should be able to know about:

CO 1. Understanding the arrangement of organism or groups of organism in distinct categories in accordance with particular & well established plan.

CO 2. Understanding General features and Classification up to orders; Venomous and non-venomous snakes, Biting mechanism in snakes.

CO 3. Study General features and Classification up to orders; Osmoregulation in Fishes.

Paper VI: Biological Chemistry

By the end of this Course students should be able to know about:

CO 1. Study of chemistry within living organisms.

CO 2. Perceiving the chemical components & chemical structure in organisms.

CO 3. Study how body functioning with the help of chemical molecules elements.

Paper VII: Reproductive Biology

By the end of this Course students should be able to know about:

CO 1. Study outline and histology of female and male reproductive system

CO 2. Functional anatomy of female and male reproduction.

CO 3. Understand infertility in male and female: causes, diagnosis and management; Assisted

CO 4. Reproductive Technology: sex selection, sperm banks, frozen embryos, in vitro fertilization, ET, EFT.

Paper VIII: APPLIED ZOOLOGY

By the end of this Course students should be able to know about:

CO 1. Improving proper knowledge about Transmission, Prevention and control of diseases Tuberculosis, typhoid.

CO 2. Understanding Insects of Economic Importance.

CO 3. Study the principles of poultry breeding, Management of breeding stock and

broilers, Processing and preservation of eggs.

B.Sc. III

Zoology Paper- IX DSE-E29 (COMPARATIVE ANATOMY OF VERTEBRATES)

By the end of this Course students should be able to know about:

- CO 1. Comparative study of Integumentary System, Skeletal System
- CO 2. Comparative study of Digestive System, Respiratory system
- CO 3. Comparative study of Circulatory system, Kidney
- CO 4. Comparative study of Nervous system, Sense organs

Zoology Paper- X DSE-F29 (Molecular Cell Biology and Animal Biotechnology)

By the end of this Course students should be able to know about:

- CO 1. Study of Molecular biology
- CO 2. Study of Protein synthesis
- CO 3. Study of Molecular techniques in gene manipulation

Zoology Paper- XI DSE-F30 (Biotechniques and Biostatistics)

By the end of this Course students should be able to know about:

- CO 1. Study of Genetically Modified organisms
- CO 2. Study of Culture techniques and applications
- CO 3. Study of Biostatistics

Zoology Paper- XII DSE-F31 (AQUATIC BIOLOGY)

By the end of this Course students should be able to know about:

- CO 1. Study of Aquatic Biomes
- CO 2. Study of Freshwater Biology
- CO 3. Study of Endocrinology

Zoology Paper- XIII DSE-E30 (DEVELOPMENTAL BIOLOGY OF VERTEBRATES)

By the end of this Course students should be able to know about:

- CO 1. Study of Gametogenesis
- CO 2. Study of Early Development of Frog
- CO 3. Study of Chick Embryology
- CO 4. Study of Late Embryonic Development

Zoology Paper- XIV DSE-E32 (IMMUNOLOGY)

By the end of this Course students should be able to know about:

CO 1. Study of Cells and Organs of the immune system

CO 2. Study of Antigens

CO 3. Study of Immunoglobulin / Antibodies

Zoology Paper- XV DSE-E31 (Applied Zoology - II)

By the end of this Course students should be able to know about:

CO 1. Study of Apiculture, Animal Husbandary

CO 2. Study of Pearl culture, Freshwater prawn culture

CO 3 Study of Fish Technology, Goat Farming-

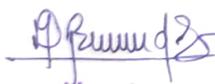
Zoology Paper- XVI DSE-F32 (Insect Vectors and Histology)

By the end of this Course students should be able to know about:

CO 1. Study of Dipteran as Disease Vectors

CO 2. Study of Siphonoptera as Disease Vectors

CO 3. Study of Histology of mammalian organs

for 
Head
Department of Zoology
K. M. Rethare (Bk.)




Principal
Krishna Mahavidyalaya, Rethare Bk
Tal. Karad : 415 108 (MS)