Course Outcomes

B.Sc Zoology

SEMESTER 1. ZY1CRT0I. CORE COURSE 1.

GENERAL PERSPECTIVES IN SCIENCE & PROTISTAN DIVERSITY

Objectives & outcomes:

- To create an awareness on the basic philosophy of science, concepts and scope
- To understand different levels of biological diversity through the systematic classification
- To familiarize taxa level identification of animals
- To make interest in Protistan diversity
- To impart knowledge on parasitic forms of lower invertebrates.

SEMESTER 11. ZY2CRT02, CORE COURSE 11

ANIMAL DIVERSITY - NON CHORDATA

Objectives & outcomes:

:

- To create appreciation on diversity of life on earth
- To understand different levels of biological diversity through the systematic classification of invertebrate fauna
- To familiarize taxa level identification of animals
- To understand the evolutionary significance of invertebrate fauna

SEMESTER 111. ZY3CRT03, CORE COURSE 111:

ANIMAL DIVERSITY – CHORDATA

- To acquire in depth knowledge on the diversity of chordates and their systematic position.
- To make them aware of the economic importance of some classes.
- To understand the evolutionary importance of selected chordate groups

SEMESTER IV. ZY4CRT04 CORE COURSE IV

RESEARCH METHODOLOGY, BIOPHYSICS AND BIOSTATISTICS

Objectives & outcomes:

- To familiarise the learner the basic concept of scientific method in research process.
- To have a knowledge on various research designs.
- To develop skill in research communication and scientific documentation.
- To create awareness about the laws and ethical values in biology.
- To equip the students with the basic techniques of animal rearing collection and preservation
- To help the student to apply statistical methods in biological studies.

SEMESTER V. ZY5CRT05 CORE COURSE V

ENVIRONMENTAL BIOLOGY AND HUMAN RIGHTS

- To instill the basic concepts of Environmental Sciences, Ecosystems, Natural Resources,
- Population, Environment and Society
- To make the students aware of natural resources, their protection, conservation, the factors
- polluting the environment, their impacts and control measures.

- To teach the basic concepts of toxicology, their impact on human health and remedial measures
- To create a consciousness regarding Biodiversity, environmental issues & conservation strategies
- To develop the real sense of Human rights its concepts & manifestations

SEMESTER V. ZY5CRT06 CORE COURSE VI

CELL BIOLOGY AND GENETICS

Objectives & outcomes:

- To understand the structure and function of the cell as the fundamentals for understanding the functioning of all living organisms.
- To make aware of different cell organelles, their structure and role in living organisms.
- To develop critical thinking, skill and research aptitudes in basic and applied biology
- To emphasize the central role of genes and their inheritance in the life of all organisms.

SEMESTER V. ZY5CRT07 CORE COURSE - V11:

EVOLUTION, ETHOLOGY & ZOOGEOGRAPHY

Objectives & outcomes:

- □ To acquire knowledge about the evolutionary history of earth living and nonliving.
- □ To acquire basic understanding about evolutionary concepts and theories.
- □ To study the distribution of animals on earth, its pattern, evolution and causative factors.
- $\hfill\square$ To impart basic knowledge on animal behavioural patterns and their role.

SEMESTER V. ZY5CRT08 CORE COURSE VIII

HUMAN PHYSIOLOGY, BIOCHEMISTRY, AND ENDOCRINOLOGY

- This course will provide students with a deep knowledge in biochemistry, physiology and
- endocrinology.
- Defining and explaining the basic principles of biochemistry useful for biological studies
- for illustrating different kinds of food, their structure, function and metabolism.
- Explaining various aspects of physiological activities of animals with special reference to humans.
- Students will acquire a broad understanding of the hormonal regulation of physiological
- processes in invertebrates and vertebrates.
- By the end of the course, students should be familiar with hormonal regulation of
- physiological systems in several invertebrate and vertebrate systems.
- This also will provide a basic understanding of the experimental methods and designs that
- can be used for further study and research.

SEMESTER VI. ZY6CRT09 CORE COURSE IX

DEVELOPMENTAL BIOLOGY

Objectives & outcomes:

- To achieve a basic understanding of the experimental methods and designs that can be used for future studies and research.
- To provide the students with the periodic class discussions of current events in science which will benefit them in their future studies in the biological/physiological sciences and health-related fields
- To contribute to critical societal goal of a scientifically literate citizenry

SEMESTER VI. ZY6CRT10 CORE COURSE X.

MICROBIOLOGY AND IMMUNOLOGY

- To inculcate a general awareness regarding the role of micro-organisms in maintaining health.
- This also will provide a basic understanding of the experimental methods and designs used in microbiology.

SEMESTER VI. ZY6CRT11 CORE COURSE XI.

BIOTECHNOLOGY, BIOINFORMATICS AND MOLECULAR BIOLOGY

Objectives & outcomes:

- To provide an understanding about the latest techniques in molecular biology and bioinformatics
- To emphasize the role of computers in the study of modern biology.

SEMESTER VI. ZY6CRT12 CORE COURSE XII

OCCUPATIONAL ZOOLOGY (APICULTURE, VERMICULTURE, QUAIL FARMING & AQUACULTURE)

Objectives & outcomes:

- 1. To equip the students with self employment capabilities.
- 2. To provide scientific knowledge of profitable farming.
- 3. To make the students aware of cottage industries

OPEN COURSE (FOR OTHER STREAMS) ZY5OPT02

PUBLIC HEALTH AND NUTRITION

- To inculcate a general awareness among the students regarding the real sense of health.
- To understand the role of balanced diet in maintaining health.
- To motivate them to practice yoga and meditation in day-to-day life.