L**EMERALD ROYAL INTERNATIONAL SCHOOL, MPAPE ABUJA**

**LESSON PLAN AND NOTE FOR WEEK 1 ENDING FRIDAY, 13th JANUARY, 2023**

**TERM:** SECOND TERM

**WEEK:** WEEK 1

**DATE** : 9th - 13th January 2023

**SUBJECT:** Biology

**CLASS : SS 1**

**TOPIC:**  Tissue and Supporting System

**SUB - TOPIC: 1**. Definition

1. Types of skeleton
2. Functions of supporting tissues in plant and animals

**PERIOD : 7th**

**TIME :** 12: 30 - 1:00

**DURATION** : 40 minutes

**AVERAGE AGE** : 14 years

**SEX:** mixed

**LEARNING OBJECTIVES:** by the end of the lesson,the students, should be able to;

1. Definition of what?
2. State types of skeleton
3. State the functions of skeleton

**RATIONALE:** the students should understand the types and and functions of the skeleton. (To enable the students understand the types and functions of the skeleton)

**PREVIOUS KNOWLEDGE:** The students can identify a mammalian skeleton.

**INSTRUCTIONAL MATERIALS:** mammalian skeleton

**Reference Material:** Essential Biology foe Senior Secondary School by M.C. Michael.

**LESSON DEVELOPMENT**

|  |  |  |  |
| --- | --- | --- | --- |
| **STAGES** | **TEACHER’S ACTIVITIES** | **PUPILS’ ACTIVITIES** | **LEARNING POINT** |
| **INTRODUCTION** | The teacher introduces the lesson by displaying the mammalian skeleton and asks the students to identify some parts of the skeleton. | The students identify some parts of the mammalian skeleton. | To arouse the students interest. |
| **PRESENTATION**  **STEP 1** | The teacher defines skeletal system and supporting tissue in living things. | The students pay attention. | To keep them focus. |
| **STEP 2** | The teacher asks the students to state types of skeleton. | The students state types of skeleton. | To encourage critical thinking |
| **STEP 3** | The teacher states the functions of mammalian skeleton. | The students were active and participate. | To encourage retention ability. |
| **BOARD SUMMARY** | (The teacher summarizes the lesson thus:)  TISSUE AND SUPPORTING SYSTEM.  SUPPORTING SYSTEM - These are various tissues that support the body of plants and animals which enable them to maintain their shapes and carry out life activities such as movement, respiration e.t.c.  DEFINITION OF SKELETON - This the bony frame work the body which provides support, shape,and protection to the soft tissue and organs in animals. The skeleton of animals enable them to move from place to place.  TYPES OF SKELETON   1. HYDROSTATIC ( FLUID ) SKELETON - This the type of skeleton possessed by soft bodied animal. They have fluid pressure to provide support. Fluid is secreted to fill the space in the body.The fluid presses against the muscular body wall causing the muscle to contract, exerting pressure against the fluid. Examples are found in Earthworm, Anemones e.t.c. 2. EXOSKELETON - This type of skeleton are found outside or external part of the body of some animals Most invertebrate posses cuticle which is composed of chitin. Such external skeletal tissues encloses, supports, gives shape, protects and enable the animals to move. Examples of organisms with exoskeleton are invertebrates like Euglena,   Paramecium, hydra, tapeworms, snails, insects, prawn, crabs, crayfish e.t.c.  Organisms like this type of skeleton only grow by process called moulting or ecdysis. In this process the organism sheds off its old skeleton, grow and later is later is covered with a new one.   1. ENDOSKELETON - This type of skeleton is found inside the body of animals. It exist in bony or cartilage-nous skeleton of fishes, toads, lizards, birds, and mammals. Endoskeleton in vertebrates are made of cartilages and bones. Endoskeleton in mammals are the skull, vertebral column or backbones, ribs and the bones of the fore and hind limbs.   FUNCTIONS OF SKELETON   1. Support - The rigid frame work of the skeleton gives support to the body. The vertebral column or back bone forms the pillar like structure to which the girdle and ribs are attached. 2. Shape - Skeleton also provide shape to the body. It enables organisms to be easily recognised by the shape given by the skeleton. 3. Protection - The skeleton provide protection to important and delicate organs of the body. It houses the complicated structures of the of the inner ear and the eyeball. 4. Movement - The whole skeleton is made up of several piece of bones which are joined and brings about movement. 5. Storage of mineral salts - The skeleton stores important mineral salts such as calcium and phosphate hence bones are sources of food and minerals.   skeleton | The students ask questions for further clarification | To create room for slow learners. |
| **Evaluation** | The teacher evaluates the students with the following questions:   1. Define the following: 2. Supporting tissue 3. Skeleton 4. State the types of skeleton and give 2 examples of organisms that possess them. 5. State at least 5 functions of skeleton. | The students attempt the questions. | To ascertain their level of understanding. |
| **Conclusion** | The teacher concludes by coping the note on the board. She checks and marks the note. | The students copy the note on the board. | For future use. |
| **Assignment** | 1. Draw a well labelled mammalian skeleton. 2. Write 3 differences between bone and cartilage. | The students did and submit their assignment for marking and correction. | To encourage the students to study at home. |



22/2/2023

Head Instructor

NOTE: Take note of the highlighted items. Red shows omission while yellow shows mistake or a better way to constructor the sentence. Make the necessary corrections before uploading your lesson note.