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 B.Sc Part II (Hons)
 Practical paper III & IV

Bones - Skull.

Identification -

Tetrapod Skull

Monocondylic
 Occipital Condyle Single

Dicondyle
 Occipital Condyle double

Reptilia
 1. Teeth Present in most cases

Aves
 (1) Secondary plate Present (Pigeon)

2. Secondary plate Absent

(2) Teeth absent.

Amphibia

1. Absence of tympanic bulla
2. Dentition Ab (Toad, frog)

Mammalia

1. Presence of tympanic bulla
2. Dentition - heterodont

Guinea Pig, Lemur

Skull bones of frog - The frog skull includes three regions i.e. Cranium (brainbox), sense capsules and Jaws. The skull is divided into auditory, olfactory and occipital regions.

1. Bones Smooth
2. Nacals and front Parietals Marrow
3. Presence of teeth on Vomer, Premaxilla and maxilla.

Skull bones of ~~Reptiles~~ Reptiles -

The skull bone in most reptiles, the quadrate bone connects to the quadratojugal and squamosal bones in the skull and forms upper part of the jaw.

Reptiles are ectothermic animals. Body covered by epidermal scales. They possess monocondylic skull that rests on a long neck made of atlas, axis and other cervical vertebrae. A basioccipital bone is present in the skull which articulates with the vertebral column by a single condyle with a scaly skin.

Skull Bones of Birds -

The skull of birds consists of five major bones the frontal (top of head) parietal (back of head) premaxillary and nasal (top beak) and the mandibles (bottom beak). The skull of a normal bird usually weighs about 1% of the bird's total body weight.

Skull bones of birds are light, pneumatic and smooth. Most of the bones fused intimately and sutures lacking. orbit large. Bases of the skull strengthened by the union of parasphenoids. olfactory capsule cartilaginous.

Skull Bones of Mammals -

Mammals (cat, rat, dog, camels, humans) are highly advanced vertebrates and have complex skeletons. The mammalian skeleton is split into the axial and appendicular skeletons. The axial skeleton consists of the skull, spinal column and ribcage and the appendicular includes the bones of the arms, legs, hands, feet, pelvis and shoulder.