

Lecture #24 – Avian Reptiles: Birds

I. Aves

- A. Evolutionary Diversity
- B. Characteristics
 - 1. **Powered Flight**
 - 2. **Beak**
 - 3. **Endothermic** (warm-blooded)
 - 4. Internal Fertilization
 - 5. Parental Care, Vocalization, Nest Building

II. Flight

- A. Increased Abilities
- B. Morphological Adaptations
 - 1. Wings & **Keel** **Sternum**
 - 2. **Feathers**
 - 3. Adaptations to Decrease Weight
 - a. **Hollow bones**
 - b. **Loss of teeth**
 - c. **Loss of tail**
 - d. **Fused vertebrae**
 - e. Lungs have **air sacs**

III. Reproduction

- A. Courtship
- B. Internal Fertilization
 - 1. no copulatory organ
- C. **Nest Building**
- D. Incubation of eggs (**brooding**)
- E. Parental Care

Reading: Chapter 19 - pages 375-398.

Questions: Page 397 - 2, 3, 4, 5, 6, 7, 8, 9, and 10.

