

## EEB 4260

### Avian Ordinal Summary Assignment

#### THE GOAL:

To gather, organize, and summarize in a single document of *no more than 2 pages* all the available information about a single Order of birds. The final document should be sufficiently clear, complete and well-organized that it demonstrates your ability to 1) locate and gather relevant information from reliable sources; 2) organize what you know; 3) make connections among different kinds of information (evaluate evidence about a hypothesis, in this case a hypothesis about relationships); and 4) communicate it clearly, accurately, and succinctly.

#### THE PROCESS:

Each student will choose an Order from the list defined as Table 1.1 “Birds of the World” on the textbook website ([whfreeman.com/Gill3e](http://whfreeman.com/Gill3e)) to summarize. There will be no duplication; only one student per Order. These documents produced by the class as a whole will be the resource used to answer questions on the final exam; we will collect, and provide copies at the final, for everyone, of all the summaries. At the final, we will pick a single Order at random as the basis to answer the questions on the final. Since there are fewer students than there are Orders, the final will exclude Orders not summarized.

According to the *SCHEDULE* defined below, you will produce a complete draft of the summary by the midterm. GRADING will reflect (see below) the completeness, clarity/organization, and accuracy of your summary document. Since we will not know until the final which Order you’ll be answering questions on, your classmates are depending on you to produce a document that will allow them to succeed. Since this is true, *your classmates will have a chance at the midterm to contribute to the assessment and grading of your summary.* After the midterm you will have a chance to revise your document in response to feedback from us, and from your classmates.

#### REQUIRED CONTENT:

The contents of your summaries will vary by Order, but MUST contain the following:

1. The name of your group (both common and scientific)
2. The number of families and species in the Order
3. The geographic distribution of birds in the Order
4. Major characteristics of the Order (e.g., defining anatomical and/or behavioral characteristics; social/mating systems; evolutionary principles exemplified in the group).
5. How both the name and membership of the group has differed over time and expert analysis (for example, the Struthioniformes = Ostriches, or, according to some authorities, the Struthioniformes = Ostriches, Rheas, Emus, Cassowaries, Kiwis, and Tinamous)
6. The sister Order to your Order – which Order contains their nearest relatives?

7. A statement about how stable you expect this Order, as named, to be – given what you’ve found out, do you expect the name, membership or phylogenetic position to change over the next 10 years?
8. The sources of your information. Your textbook, and the textbook website are acceptable *starting points*; we expect you to seek out and use other sources of information. Acceptable sources include: papers from the primary literature (e.g., the December 2014 Jarvis et al. paper in *Science* on whole-genome analysis; link is on the class web page under “Optional Reading” for January 28), published books and online resources produced by national and international taxonomy committees (e.g., the list produced by the International Ornithological Congress at <http://www.worldbirdnames.org/>) and experts (e.g. the pages, and references within, the Tree of Life project at <http://tolweb.org/tree/>). Wikipedia is **NOT** an acceptable source, but may point you to acceptable primary sources. If you aren’t sure if a source is acceptable, check with us. You may also include details, examples, or information you glean from my lectures by citing them as “EEB 4260 lecture”.

FORMATTING RULES:

Your summary must be no longer than 2 pages (both sides of a single sheet of paper), in 12 pt font, with margins of at least 0.5 inches on all sides. Line spacing can be no less than single-spaced (=12 pt). You may include pictures, graphs, maps or diagrams, but their source must be acknowledged and fully attributed in your source list, and they must be discernable/understandable in black and white.

GRADING:

This assignment is worth a total of 100 points; 60 points for work on your summary up until the midterm (including your work as a peer reviewer), and an additional 40 points available in revision. At each due date defined below, you LOSE a POINT/DAY for late turn-in.

*THE SCHEDULE:*

By February 9            Choose and sign up for an Order, by checking on the class web page which Orders are already taken, and emailing Kevin with your request (5 points)

February 16            Starting draft due; contains at least items 1-3 of the Required Content list, above, plus a list of at least three information sources (your textbook + textbook website counts as ONE) you’ll be using. Submit as a Word document via email. (5 points)

March 2                 Skeleton draft due: outline of the organizational structure of your summary, with            at least a single sentence of information in each of the Required Content information items listed above, plus a list of at least four information sources you’ll be using. Submit as a Word document via email. (10 points)

March 11                MIDTERM: Complete summary due in class; you must bring FOUR complete hard copies of your summary on paper. Print (or copy) them double-sided, so

that each copy of your summary consists of a single sheet of paper, printed on both sides. (30 points) + an additional grade (5 points) determined by the comments of your peers on your summary, which will be the test of whether you are well organized, clear, and providing enough detail.

AT THE MIDTERM: Provide constructive peer review to 3 of your classmates on their Ordinal Summaries. We will be assessing your ability to contribute to your peers' ability to improve their Summaries. (5 points)

March 25                      We will hand back grade sheets and peer reviews of your summary. Begin revisions in response to feedback.

April 29                      Final, revised draft of your Ordinal Summary due. If we do not receive a revised draft of your summary by this date, the version of your summary we received at the midterm will be used in the packet handed out to the class for use at the final exam.

April 29                      .

May 6                          Final exam. We will handout at the final packets containing all Ordinal Summaries, along with the final exam itself. We will choose (via random draw) the Order which will serve as the basis for your answers to the final exam questions; you will use the relevant summary from your packet to obtain details to support your answers(60 pts).

#### RULES OF ENGAGEMENT/ACADEMIC HONESTY:

Forms of class-wide collaboration allowed for this assignment include: sharing information about useful resources, discussing formatting or summary structure to increase clarity and ease of use of the final product, discussion of the information and level of detail in the summary that will make it most useful for taking the final with, discussions with the authors of summaries for orders that are the sister orders of yours, in order to better understand relationships.

Forms of collaboration that are PROHIBITED: writing any part of a summary for any other student. If we detect this, all students involved will receive a zero on the whole assignment. Refusal to discuss or share with another student any information you have discussed or shared with any other student (i.e., if you do something for one other student, you must be willing to do it for all other students). Any form of academic misconduct: as defined in the Student Code, "Academic misconduct is dishonest or unethical academic behavior that includes, but is not limited, to misrepresenting mastery in an academic area (e.g., cheating), failing to properly credit information, research or ideas to their rightful originators or representing such information, research or ideas as your own (e.g., plagiarism)." Anything that involves copying word for word, or cutting and pasting text into your document from elsewhere, is plagiarism. If we detect plagiarism, you will receive a zero for the whole assignment.