

Chem 100W

Spring 2013

Dr. Brooke Lustig

Assignment: Review Paper (i.e. review article and, if any doubt on a date or time due, refer to Greensheet).

1. This is the major writing assignment of the semester. You will write a review article covering a particular area of molecular science, one that involves the study of atoms and/or molecules. The area that you choose should be broad enough having a number of references (with different authors, i.e. work done in several independent research laboratories), yet sufficiently narrow or specific so that you can effectively review this area of research in your paper. The article should be pedagogical, keeping in mind that the purpose of the article is to review the recent scientific literature. (Note: if you are presently doing independent research, the review article topic is not specifically to be your research project.)
2. Initial consultation: you should select a topic for your Review Paper/Poster Presentation, and come prepared to discuss it **by the beginning of class on Feb. 7** (see corresponding HW assignment in lecture outline/notes). This should include a preliminary outline of your paper completed for the purposes of discussion **and two** review articles.
3. The Review Paper should be written consistent with the ACS Guidelines (see the ACS Style Guide and other relevant handouts). The Review Paper should contain (**in order** and note bold-italics indicates its main body of text): title page, table of contents, ***abstract, introduction, selected sub-topics, conclusion (can include future studies section)***, references, figure legends and figures (and any tables with annotations). Also note you are going to write a review article, not a “term paper”.
4. You must have read through eight research articles for the in-class Abstract assignment **on Mar. 7** (see corresponding assignment sheet). That day you will also submit two copies of the Oral Presentation title slide (see corresponding lecture outline for context).
5. One research article to be used in the Review Paper can also be utilized as the basis for the Oral Presentation (see corresponding assignment sheet). Other references can be used in support of this reference in the Oral Presentation.
6. The subject matter of the Review Paper will also be used for your Poster Presentation (see corresponding assignment sheet) and is the context for the Minor Paper (see corresponding assignment sheet).
7. You must submit the relevant Figure Legends and/or Table Annotations (includes annotations title/lead sentence(s)) **on Apr. 11** (due at 0830 and also see Figures and Tables lecture outline for context). Note that the figures with legends and/or tables with annotations are initially for use in your poster presentation. The first draft of your

Review Paper is due **April 30**. This and all drafts, including final ones, must be in format noted in point 3 and should include at least 11 pages of double-spaced actual main body text (also defined in point 3 by bold text). All Review Papers submitted for comments should have the main body of text printed as double-spaced.

8. Length requirement: the Review Paper must be a minimum length equivalent to 20 full, double-spaced (regular 12-point type or equivalent and with default MSWord margins and other settings) pages; and a maximum of 30 double-spaced pages in length. Note that this **just includes** abstract, introduction, selected sub-topics, conclusion, figure legends and table annotations (where the maximum counted page number for figure legends and table annotations is one and for the abstract is one-half a page). The **conclusion is analysis** (not simply a summary) that can include future studies (not simply Future Studies section of Minor Paper) and must be at least four and one-half pages. Also note that Figure Legends and Table Annotations must be reasonably complete and descriptive, with a maximum of seven total such Figures and Tables.

9. A second draft of your Review Paper will be edited and refereed by a total of two classmates. For this assignment, you must submit **in the first half-hour of class May 7** two copies of the second draft of your paper. Failure to do so can result in your inability to participate in the editor and reviewer assignments and having your article similarly treated. Peer Editor Corrections will be due by 0830 **on May 9** and Peer Reviewer Comments are due **on May 9** as an in-class assignment (see corresponding assignment sheet for both).

10. You are to turn in to the instructor the electronic final version of your Review Paper (due by 0730 i.e. 7:30AM, if any problems w/ D2L please have ready on a flash drive that is previously security-scanned) at the in-class final **on May 15**. Also bring with you a printed-out copy of just the **references** section (due at 0715). The Hard Copy version of manuscript is due (if instructor not in their office then a “drop-box” will be provided) **on May 21 by 4:00PM**. Any text added or modified (this assumes Tables are also text, even given they are at end of manuscript) must be annotated in italics (Figures added or otherwise changed can be noted by italicized Figure Legend text). And the Review Paper **must be complete** to be acceptable even to grade.

11. The Review Paper needs to be thoroughly and appropriately referenced (including complete titles in the listing of references), with imbedded citations referring to the articles, books, papers and other sources (e.g. databases) required to inform the reader. The Electronic Copy will be available for online and any other inspection of the instructor's choosing. You should refer to the ACS Style Guide and other relevant handouts for guidelines on using the literature. Referencing will be discussed in detail during class time. Note: the purpose of a review article is to review the literature, so **at least twenty references** are to be cited, with **at least fourteen research articles**. And all listings of references for research articles (for all relevant assignments) should be annotated by a space followed by a bold lower-case **r** (i.e. 1-21. **r**) AFTER the reference listings final period (i.e. .).