## Assignment Summary—Spring 2022 PHYS 598 PEN

- Writing Workshop Assignments (150 pts). The purpose of the Writing Workshop (WW) assignments which can be completed during Writing Workshop or after class as a homework assignment is to help you improve your critical reading and rhetorical skills. These assignments will not be graded, but 10 points will be given for a completed WW assignment. Each Writing Workshop assignment should take no more than 30-45 minutes to complete. Suggested solutions to the Writing Workshop assignments will be posted on the course website roughly a week after a particular assignment is due.
- **Assignment 1: Research Topic** (50 pts). Write a ~ 1 page paper describing your selected research topic, emphasizing the goals of and motivation for the research.
- Assignment 2: Journal Club Presentation + Referee Report (200 pts). Give a ~15-minute oral presentation (150 pts) discussing a short scientific paper in your field, but not written by you or someone in your group. It is preferred that you select a short unpublished paper from the arXiv (<a href="http://arxiv.org/">http://arxiv.org/</a>), but a recent paper published in Physical Review Letters, Science, or Nature may also be used. You will also write a referee report on this paper (50 pts).
- Assignment 3: Research Topic Abstract and Introduction w/ references (150 pts). Write an abstract and introduction for your research topic, including references to the relevant literature.
- **Assignment 4: Research Topic Methods and Results w/ Figures** (150 pts). Write methods and results sections for your research topic. Include at least two figures with figure captions.
- **Assignment 5: Research Topic Presentation** (Optional). Give a ~25-minute oral presentation describing your research topic.
- **Assignment 6: Research Proposal** (300 pts). Using material from your selected research topic, write a proposal to request funds for your research. You will also review 2-3 proposals that others in the class have written, and you will evaluate these proposals as part of an NSF-style panel review.