

Novak's Research Group

Nuclear Engineering, UIUC

2023–2024 academic year

We have useful resources at:

- GitHub: <https://github.com/Novak-Lab>
- Slack channel: <https://novak-lab.slack.com>
- Book time with Prof. Novak: <https://ajnovak2.youcanbook.me>

Expectations for Graduate Students

Research

Students are expected to pursue graduate study with passion and independent thought. The pursuit of an advanced degree in engineering requires enthusiasm, persistence, and hard work. The goal is for PhD students to complete their degrees within five years and MS students within two years. To meet this goal, it is expected that students who study with Prof. Novak:

- Will work at least **20 productive hours** per week conducting research while taking a full load of graduate courses.
- Will work at least **40 productive hours** per week conducting research while not completing courses.
- May take up to 3 weeks of vacation (15 weekdays), including Winter and Spring Breaks; they must notify Prof. Novak when they plan to take vacation.
- PhD students are expected to publish at least **2** high-quality, peer-reviewed journal articles and at least **2** conference papers (for which they must present the work in oral or poster format at the conference).
- MS students are expected to publish at least **1** high-quality, peer-reviewed manuscript (journal article or conference paper).

Coursework

Students are expected to

- Remain in good standing with the graduate school and the student's home department.
- Students are expected to consult with Dr. Novak each semester about their course plans to complete their degree requirements.
- It is desirable that PhD students complete coursework after three years of full-time enrollment.

Interactions

Students are expected to meet with Prof. Novak on a regular basis (typically weekly) to discuss research progress, course work, and graduate student life in general. Students are also expected to attend all research group meetings. To facilitate efficient interaction, students should:

- Host notes for one-on-one meetings on GoogleDocs. Each student should have a personalized document for all one-on-one meetings with Prof. Novak (please ask Prof. Novak if you did not receive one). The student should populate this document prior to all meetings.
- Include deadlines in the subject lines of emails to Prof. Novak when she needs to do something by a specific date.

Extraneous

- Students are expected to do their best to follow reproducible practices.
- Students are expected to be effective communicators. This will be accomplished through formal and informal oral presentations and by writing manuscripts involving their research. Students will share their research findings with their advisor and the rest of the research group on a regular basis, including group meetings.
- Effective communication also means seeking help when one encounters difficulties! Running into snags is a normal, functional part of doing research. However, if after a reasonable effort you can not find a solution to a problem that you face, please do not continue in isolation hoping that you can work the problem through. Advisors and other students are a tremendous resource, and you are expected to seek them out if you need help.
- Students are expected to be informed members of the scientific community. This includes successfully completing course work, attending seminars and external scientific meetings (with my approval), and staying current in publications relevant to your research topic.

- Students are expected to be collaborative members of the scientific community. Students are expected to be supportive and helpful to others working at UIUC. In addition, students should seek to collaborate with colleagues and others as appropriate.
- Students are expected to be proactive members of the scientific community. This includes proactively seeking additional or new directions for their research that enhances the quality and/or significance of the overall program and proactively seeking supplemental fellowships (such as DOE, CSGF, Rickover, NSF, and Hertz Fellowships, etc.) as well as other award opportunities (many can be found here: <http://bit.ly/29gunLD>.)
- Students are expected to be positive contributors to the UIUC community by exhibiting exemplary character. We want to facilitate a positive environment for our academic pursuits, and to accomplish this we would like to promote students being helpful, respectful, courteous, honest, and trustworthy.

Expectations for Professor Novak

- Students will receive training and experiences that will prepare them for successful careers in industry, government, or academia.
- Students can expect a supportive environment that rewards creativity, passion, collaboration, and hard work.
- Students can expect and ask for discussions on performance, research plans for the year ahead, opportunities for publications and presentations at scientific meetings, and career interests.
- Students can expect their advisor to make the best possible effort to provide continued funding based on research productivity, seniority, and available grant funds.
- Students can expect assistance in establishing a network of scientific contacts and mentors.