

Hello and Welcome to the Fisheries and Wildlife Undergraduate Mentorship Program!

Below are a few questions and suggestions to help launch a successful mentorship between you and your mentee. Use these questions to help develop the most appropriate mentorship based on your mentees goals and needs. Remember these are tools for you, but this mentorship is flexible and personal. The goal of the program is not to prescribe cookie cutter guidelines, but to encourage positive and collaborative relationships in science.

That being said, structure is probably your friend; it allows you to set your expectation for the relationship, and allows your mentee to prepare for the time commitment of being in the program. So consider (thoughtfully and thoroughly before for first official meeting)

1. What is your mentee going to do (tangibly... like more than just sipping coffee and chatting)?
2. When are they going to do it (how many hours per week? Per term?)?
3. Where are they going to do it (do you know of a desk they can use? Will you meet in a conference room? In your lab?)?
4. What are they going to get out of it (Are you meeting their goals and expectations? Are you helping?)?

What we recommend every mentor team talks about

- CV
 - By looking at or developing a CV with your mentee you get a chance to (1) see what their level of experience is, and (2) provide them with a tangible benefit to being in the program. This is a good first step to goal development.
 - You should make your CV (assuming it's in good working order) available to your mentee as a reference; let them know what jobs/experiences on that CV helped you to get where you are.
- Brainstorming
 - Consider asking your mentee to think through the following questions. Or find a way to go through them together
 - What are my objectives in doing this mentorship?
 - What type of training do I want and/or need?
 - What are my strengths?
 - What are my weaknesses?
 - What skills do I need to develop?
 - What kinds of research or creative projects do I want to explore?
 - What type of career do I want to pursue?
- Goals

- Make a list of **concrete** goals.
- An example list that is appropriate for this level of experience is a follows:
 1. Develop three concrete research skills that will increase my ability to do research in the future. These skills include:
 - a. Field bird identification, comprehensive online literature review and database querying
 2. Develop a professional and accurate C.V.
 3. Find and apply for a summer internship
- Bear in mind that as a mentor you will need to help them sort through what they *don't* know to help them find and build these goals. Some of them may be as simple as read an article from three different aspects of wildlife science (you could provide your mentee with these) and decide which seems most appealing to pursue.
- Timelines
 - Create a timeline of how you will achieve these goals, include tangible steps (i.e. begin fieldwork on February 2nd; complete preliminary literature review on March 3rd, etc)
 - Agree on a regularly scheduled meeting time and place
- Lab Notebook/Journal
 - If your student is going to be conducting research with you have them start a lab/field notebook. Be explicit that this lab notebook is property of the lab, and not their personal property. Begin instructing them on what data they will collect/process and what your research expectations of them will be.
 - If you are working primarily on professional development have your student begin a journal to track their progress, and have a place to complete small assignments, free writes, and to write down tips and contacts that you may have for them.

If you are headed toward a research heavy mentorship consider the following

(adapted from "How to Mentor Undergraduate Researchers" by Carolyn Merkel and Shenda M. Baker, published by the Council on Undergraduate Research)

- Identify ways to socialize the student into the culture of your discipline, lab, project, etc. What is proper lab etiquette? What are the roles and responsibilities of the various members of your research group? Who can answer what questions? How does one keep track of information/data collection?
- Provide the student with background reading to help them understand how their piece of the project relates to the larger project.
- Make clear to the student who can answer what questions in your absence and make sure the members of your research group understand their roles and responsibilities for mentee (if any)
- Set-up regularly scheduled meetings if not weekly, then biweekly. Take a few minutes during each meeting to ask how the student is doing outside of your project.
- Make your expectations clear from the beginning, this includes deadlines, best methods to communicate with you, hours of work, the level of detail you require in reports, field notebooks, timelines, etc.
- Let the student know when you want them to check in and how much freedom they have to problem solve on their own and be independent.
- Provide opportunities for the student to take on increasing responsibility and more difficult tasks and responsibilities when they have demonstrated competence.
- Make time to discuss with the student the ethical issues they may encounter from the fabrication of data to who owns the research, intellectual property, confidentiality, etc.
- Let students know there will be ups and downs in the research process and that there are many tedious moments in research, failures, etc. as well as the exciting moments.
- Make some time on occasion to talk to the student about life outside the research project, how things are going in their classes, personal goals, adjustment to campus, etc. This means a great deal to a student when you take an interest in them as a person.

Advice on mentoring undergraduates
Selina Heppell (10/1/15)

Here is the advice that I would give to mentors:

1. When you interview, try to ask the person questions that will reveal their interest in what you are working on and/or the experience you hope to give them. Enthusiasm goes a long way.
2. When you are assigning tasks, take a little time to explain WHY you are asking the intern to do things a certain way. Not an hour lecture, just a bit of information that will help the intern understand the importance of paying attention and following your directions.
3. Encourage the intern to ask questions about the project and tasks you have assigned. If you have done #2 well, the intern is more likely to ask for needed clarifications.
4. Work with the intern on a task for a bit when you first assign it. Compare results. Be a partner, not an overlord. The purpose of this is, again, to foster good communication and make sure your intern is comfortable talking to you when problems arise.
5. Schedule regular check-ins, and stick to them even if there is a week when nothing gets done. These meetings do not need to be formal but they do need to happen.
6. Have a quality control plan and follow it. This could be spot checks on data entry, working with the intern once every few weeks so you can monitor how they are doing the task, etc. If there are problems, explain why and help the intern re-do the incorrect work.
7. Invite your intern to lab meetings if your advisor is OK with that.
8. Be encouraging and thankful.
9. Have a chat about authorship earlier rather than later. In most cases, a helper who is doing work that you assigned should be thanked in the acknowledgements of your paper (and thesis).
10. If problems do occur, seek advice from other mentors and your advisor.

Most unhappy mentoring experiences occur due to poor or lost communication. A common cycle is that the intern gets busy with other things in life, slows or stops working, feels guilty about it, stops communicating, and the work doesn't get done. You come on the scene expecting a finished product and end up exasperated. This is the fault of the intern but also the mentor for not keeping tabs on the intern's progress and making sure that regular communication is occurring. Regular check-ins are not "micro-managing" – they are a way to keep the relationship going and productive. If you aren't checking in regularly, you may be giving the impression that you don't really care about the project (so why should they?)