Preparing to Join a Lab: A Question Guide

Produced by the Student Advisory Committee

So you’re about ready to join a lab. Great! But maybe you’re still deciding. Also great! Here are some questions SAC has generated that you should feel comfortable asking when considering joining a lab.
Questions to ask a PI before joining the lab

- What do you expect from a graduate student in your lab?
- What do you see as your role as a thesis advisor?
- Tell me about the students who have graduated from your lab: what did they work on, how long ago did they graduate, what degree did they receive (MD/Ph.D., Ph.D., or MS), and what they are doing now?
- Will you tell me if I do something or behave in a way that is inappropriate? Will you tell me if I am failing to progress? When will you tell me (threshold)?
- Explain the role a student plays in choosing and developing their project.
- I know students take 5.5 years or longer to complete their projects. Do you see yourself being at Washington University for that time period? How do you see funding, etc. for that time period?
- I know that I am year(s) away from it now, but how do you handle journal article writing—do graduate students actually do the writing or do you prefer to do it some other way?
- What journal clubs/seminars/local, regional, national, and international meetings do students attend?
- I’m interested in “X” aspect of the research in the lab. Do you think that could make a good thesis project? Is that project available i.e. not already part of someone else’s project or not promised to someone else?

Of course this is not an exhaustive list of questions to ask. The first questions help you understand what the PI sees as their role and what they expect from their graduate students. If your views on topics differ greatly from what the PI expresses, then you should be very careful about choosing that lab as a thesis lab. Your relationship with your PI is very important for the next steps in your career, and if you and the PI disagree fundamentally on your expectations, it is unlikely that you and the PI will have a good working relationship while you are in the lab.

“A good advisor will serve as a mentor as well as a source of technical assistance. A mentor should provide, or help you to find, the resources you need (financial, equipment, and psychological support); introduce you and promote your work to important people in your field; encourage your own interests, rather than promoting their own; be available to give you advice on the direction of your thesis and your career; and help you to find a job when you finish. They should help you to set and achieve long-term and short-term goals.”
Questions to Ask Other Students/Postdocs in the Lab or Down the Hall

Sometimes the best people to ask about a lab are the ones down the hall in another lab (they are less worried about repercussions if they say something negative).

- Are you happy with your project? The PI? The lab equipment? The department?
- Would you recommend this lab as a thesis lab? Why? What advice would you give to a student entering the lab?
- Does the PI keep your best interests in mind? Do you feel that you are developing into a good scientist in the lab? Do they encourage your own interests, rather than promoting only their own?
- How do you think that the PI is thought of in their field? In the university?
- How does the PI handle it when the project has setbacks or isn’t working?
- Does the PI react well to your suggestions for experiments or directions for your project?
- What level of your participation for deciding directions for your project is expected/allowed?
- Do you feel that the PI pays enough attention to your project? Do they have enough time to give everyone’s project sufficient attention? Or are they too busy?
- What do you think about the scientific ideas that the PI has? Are they well thought out? Practical? Innovative? Are they of interest to other scientists?
- Does the PI help students find post-docs, etc after graduating from the lab?
- Is the PI hands-on or hands-off, moody or even-tempered, have favorites or treat everyone the same etc. (see if these answers match what the PI has said, others in the lab have said, and your experience in the lab.)
- What do you think is the best thing about the PI? The worst?
- Does the PI have any quirks? Or is there anything that you do that will make the PI really upset?
- What do you think about “X” as a thesis project?
- What participation levels in journal clubs, seminars are expected?
- What participation level in writing journal articles is expected?
- Is attendance at journal clubs/seminars/local, regional, national, international meetings encouraged?
- Is it acceptable to have interest/activities/children outside of lab?
- What is “work?” (some PIs measure work only by what experiments get done, not other activities such as reading articles, thinking about your project, attending seminars/journal club, or TAing.)
- What are the weekend and vacation policies?
- How have graduate students in the lab done?
- Does the PI give good advice? Does the PI treat lab members well?
- Are they good at managing the lab? Does the lab run smoothly?
- How does the PI handle disagreements between lab members?
- If you were able to start your project over again is there anything that you would do differently? (sometimes this helps identify flaws a PI might have—for example, if a student says that they might have focused their direction better, it might indicate that that is an area in which the PI is weak.)
- Is there anything you wish you had known before you joined the lab?
Questions to Ask Other PIs in the Department or Program

- I am working on choosing my thesis lab. How have graduate students in the PI’s lab done?
- How do you think that the PI is thought of in their field of research?
- What do you think about the scientific ideas that “X” has? Are they well thought out? Practical? Innovative? Are they of interest to other scientists?
- What advice would you have for someone joining “X’s” lab as a thesis lab?

Questions to Ask Yourself Before Joining a Lab

- Will I be happy coming in the required number of days for the next 5-6 years?
- If I have to be every day to feed cells, will I start to hate it?
- Am I passionate about the research/question at hand?
- Do I fit in the lab environment or do I stick out?
- If I mess something up in the lab, would I be comfortable telling my PI?
- Will my PI support me doing extra-curricular activities that are important to me?

Joining a lab is an important decision, but remember— you’re at WashU, so it’s hard to go wrong!