Care and Feeding of Advisors

SEAS Professional Development Seminar

22nd Oct 2009
Stephen Chong
What this talk is and is not

- Discuss issues about
  - Selecting an advisor
  - Maintaining healthy relationship with advisor

- Raise awareness
  - Prevent advisor/advisee conflicts
  - Resources for resolving advisor/advisee conflicts

- Not a gripe session
  - Not right forum for solving specific problems
  - See available resources later in talk...
What is an advisor?

- Role of an advisor
  - Guiding research
  - Involved in community/networking
  - Financial
  - After graduation

- Help set and achieve realistic long- and short-term goals
- Advice for personal/family/other issues?

**Guiding research**: helping you do novel/significant research

**Involved in community**: getting you involved in research community, e.g., sending you to conferences, introducing you, internships, etc.

**Financial**: research assistantships, teaching fellowships, informing you of scholarships/fellowships.

**After graduation**: preparing you for academic life after grad school, helping you with job search, information about How Things Work (e.g., funding, conferences, etc)

Your relationship with your advisor will probably be long term, continuing after grad school.

Your advisor may or may not be able or willing to give advice on other issues (e.g., personal, family).
Relationship with advisor

- Relationship with advisor will change
  - with transition from undergrad to grad
  - less a student, more a junior colleague

- You can have additional mentors!
  - Other students, ex-students, ...
  - Other faculty
    - e.g., more senior, same or complimentary research area
    - may be on research committee
  - Can advise on research, navigating grad school, life...
  - Your advisor may or may not be a mentor
Advisees selecting advisors

- Issues to think about when choosing advisor
  - Academic
    - Research area
    - Career maturity/tenure/fame
    - How long do students take? What have they done since?
  - Style
    - Close supervision vs. hands-off?
    - “Authoritarian” vs. “coach” vs. “laissez-faire”? *
    - Large/active research group vs. just two of you?
    - How busy are they?
  - Personal
    - 4 year+ relationship. Will you get along?

*Prof Joanne Martin, Stanford

These are issues that are worthwhile thinking about. There are pros and cons to every side of each issue, and this slide is oversimplifying a lot of the issues, so think about them for yourself.

**Research area:** is advisor working on stuff that you are interested? will they be interested in the stuff you want to work on? (You may also want to think about where that research area will lead you career-wise, e.g., how hot, how crowded/competitive, industry applications, etc.)

**Career maturity/tenure:** A more junior professor, being "young and hungry" they may have more time to spend working with you, and may expect more from you. An untenured professor may not gain tenure, and may leave during your time at grad school. A more senior professor will be better connected, may have a broader view of the field, what’s hot, etc., but may have less time to spend directly with you, but will have more experience doing research in the field, in getting students through grad school, etc.

**Previous students:** What have previous students of the professor gone on to do? What was their first job? How famous are they now? How long did they take to graduate? Do the previous (or current) students have any advice for you?

**Style:** There are many different approaches, none necessarily right or wrong, but some more or less appropriate for you.

**Close supervision vs. hands-off:** Is the advisor closely involved in doing research with you, meeting regularly, working together to solve problems, or more hands-off, letting you work independently/without close guidance. Which do you think would suit you better?

**Authoritarian vs Coach vs. Laissez-faire:** Categories devised by Joanne Martin, professor of organizational behavior in the Graduate School of Business at Stanford University: (taken from "Getting What You Came For", by Robert L. Peters, Harper Collins 1992).

- The authoritarian adviser is likely to set the goals and lay out tasks for the research, usually in some detail. Such advisers welcome conflict, expect you to speak up, and are active throughout the research process.
- The coach, on the other hand, will seek to set goals jointly with the student. There may be a lot of guidance in the beginning or planning phase, but not much during the research itself. “Active in the planning stage, passive during the process, and active in the evaluation stage,” is how Martin puts it.
- Laissez-faire advisers are friendly and constantly supportive but it’s not certain you will learn much from them. They will be relatively inactive on the research task unless you take the initiative but supportive throughout and generally available. Attractive as they may first appear, working with a laissez-faire adviser is a high-risk strategy and is only likely to work if you have strong research skills, are independent, and know what you want.

**Research group vs. Just two:** Large research group may mean your piece of work is contributing to a much bigger whole, less to distinguish your work from the group’s; large research group may mean more collaboration, senior grad students to act as mentors, more opportunities to learn.
“Shop around” means actively talking to/working with professors. Make sure that the professors you are working with are aware that you are also working with others.

SEAS is fairly small, may only be one or two profs in the area you are interested in. But you may end up interested in other areas…

If you talk to many professors, you’ll probably need to “break up” with some, i.e., stop working with them. Again, make sure this is done openly, clearly, and amicably.
Advisors selecting advisees

- Things an advisor may be considering
  - Worthwhile investment?
    - Interests coincide, work well together, bright student
  - Time/energy/funding for another student?
Expectations a student may have

- **Time**
  - Balancing research, courses, teaching, vacation, life, ...
- **Working style**
  - Frequency of interaction
  - Independence
  - Front loading vs. back loading
- **Research questions**
  - yours or theirs?
- ... and probably many more

**Time:** How much time are you expecting to spend on research? How many courses are you planning on taking? How much time are your teaching responsibilities taking? Are you planning on disappearing back to your home country for a month in the middle of the semester? Over the winter break? Don’t forget to have a life outside of work too!

**Working style:**
- Frequency of interaction: do you expect to meet daily with your advisor? Weekly? Monthly? On a regular basis, or just when you have stuff you need to talk about?
- Independence: do you expect to be working closely with your advisor, solving problems together, or do you expect to work very independently, reporting back on progress?
- Front loading vs back loading: given a deadline, are you expecting/planning to do the work as late as possible, as early as possible, or something in between?

**Research questions:** Do you expect on your advisor giving questions/problems to pursue? do you expect to come up with your own questions/problems, and if so, how closely related will these be to your advisors research?

**Many more… e.g.,**
- delegation of work in writing papers,
- what kind of feedback you get from your advisor,
  - detailed technical, positive vs. negative
- amount of work needed for Quals
- Do you need to write a thesis proposal?

Be aware of the expectations you have.
Expectations an advisor may have

- Time, working style, research questions, ...
  - Same things you may have expectations about...
  - Vacations/conference deadlines
  - Courses vs. research balance
Constraints an advisor may have

- Funding
  - boom and bust cycles
  - fungibility/restrictions
    - summer funding, students, equipment, travel
- Advisors are people too
  - Other things in their life, other pressures
Examples of mismatched expectations:

Author order on paper
- You may have expectations about the author order.
- Advisor probably has system/protocol for author order. (Typically, sub-communities have custom for author order: who did the work, alphabetical, or students first.)
- You can ask advisor what their system is. Can be non-confrontational, not specific to a particular paper.
- If you disagree with it (in context of particular paper), can discuss it.
- Key point: Communicate! Talk about it! You don’t need to let your and their unspoken expectations lead to conflict.

Who gives a conference talk, who attends conference
- Again, sub-communities may have customs: student gives the talk, or giving talk is an honor
- Advisor probably has some system for who gives talk/conference attendance. (Remember, advisor may be financially constrained!)
- What if you want to attend a conference for a paper on which your advisor is not a co-author? Do you expect them to pay for the travel and conference attendance?
- Key point: Communicate! Ask about it. Request support for attending a conference where advisor not a co-author BEFORE submitting to the conference.
- (Note: the Grad School has some funding for students to attend conferences, and some conferences can give travel grants to students.)
It's as much the student's responsibility to cultivate a good relationship as it is the advisor's.

Specific piece of proactive advice:
Ask for what you need, be it advice, equipment, ergonomic furniture, conference trip.
Advisors may not offer these things for several reasons, including (1) don’t know you need it; (2) resources are scarce
What if it doesn’t work?

- E.g.,
  - Advisor/advisee relationship not working
  - Advisor leaves
- Sensitive subject...
- Depends where in grad school career
  - Work with another advisor here?
    - On new project
    - On existing project
  - Follow advisor/work with another advisor in another institute?
  - Leave grad school?
Resources @ Harvard

More info, and where to go if you’re having problems

- Other students/faculty/mentors
- SEAS Academic Office
- In Common (Peer counseling)
  - www.digitals.harvard.edu/~incommon
- Bureau of Study Counsel
  - Academic issues and personal concerns
  - http://bsc.harvard.edu
- GSC/GASA
  - Student Services
    - Any academic or personal concerns
    - http://www.hcs.harvard.edu/~gsc/guide/academics/advising.html
- Bok Center for Teaching and Learning
Thanks to Vicky Weissman, Eric Breck, Joe Halpern, Daisy Fan, Éva Tardos, Fred Schneider, Andrew Myers, Victoria Blodgett, Jan Talbot, Greg Morrisett, Margot Seltzer, and Ellen Holloway.

More resources

- Many books, articles, and resources
- e.g.,
  - “How to be a Good Graduate Student” by Marie desJardins
  - “Getting What You Came For” by Robert Peters
  - “So Long and Thanks for the Ph.D.!” by Ronald T. Azuma
  - http://www.cs.cornell.edu/People/czars/mentor/
  - http://www.phds.org/graduate-school-success
  - ...
  - www.google.com/search?q=graduate+student+advice