

Who Should Read This?

We have compiled this article for new students from India who are coming to the University of Utah for their graduate degree. The compilation is mostly from an engineering degree point of view; however it can be applied to other fields as well. The article is compiled from inputs of the staff at the University as well as current students. Hence, the issues raised here can be understood by everyone. Some issues might be relevant and some might not be. Consider this article as a general guideline for your tenure at the University of Utah.

Choose your advisor carefully

The advisor has the final say on everything – whether you are fully funded, what kind of work you do, whether your work is complete enough for a thesis, and whether your classes count toward graduation. Use the first semester to get to know as many professors as you can – talk to them before thesis/dissertation defenses and after seminars. Talk to current students in a professor's lab as well and choose what is applicable and relevant in the direction you want your career to proceed. Always remember a Ph.D. dissertation is different from a Master's thesis. Doing a Ph.D requires around 4-5 years while a Master's requires at least 2 years. These years are important for your professional as well as personal life.

Lab mates/ Team mates/ Group mates

Your research group will be most accessible as you will share your office space, lab space, and meet them on a daily basis. It is best to be honest with them and always give a constructive feedback *instead of beating around the bush*. Lab mates can give you useful guidance, tips and the tricks required to get through a difficult situation. Always ask questions, as it is the best way to learn new things. There is no point in hiding your lack of knowledge, the less self-conscious you feel around your group mates, the more helpful everyone will be towards each other. Also interacting within your team makes work more fun. As a graduate student you are going to face a lot of obstacles, and so will your group mates, try to be there to assist them, so that you can also expect the same.

Funding, Housing and Expenses:

Graduate school is expensive; however, you need to find a way to get through it. University of Utah is one of the few schools with a large number of opportunities for funding. Try to get through with minimum financial debt. Funding can be in different forms like: teaching assistantships, research assistantships and fellowships. Departments could help you gather information about the same. Unfortunately, if you do not receive any funding, try and search for an on-campus job. Remember as an international student you can work for maximum 20 hours/week during your full semester (9 or more credit hours). For more funding information, consult your graduate advisor.

Data collection:

This is an important part of your research and dissertation/thesis. As a research student you will handle a lot of data. Be particular about the form in which you collect the data and the software you use to record it. Excel, Matlab, SPSS are few of statistical analysis tools that help you organize data. You would have difficulty managing unorganized data especially when you use them for publishing a paper or your thesis. It will also look unprofessional from your advisor's

perspective. Plotting the gathered data is an important task. If your plots are self illustrative they convey your results more significantly. Displaying your results pictorially helps your audience a lot. You will always experience this situation when your advisor/ peer asks you for the data, at this time showing raw numbers is not useful, plots and graphs are the way to go.

Writing:

Most of you (Ph.D. candidates) will need to write technical papers and give technical presentations. This is one aspect of grad school feared by most; however, it is one of the most important aspects. There are many sources that can help you with your paper. However, do not wait till last minute for help. Your advisor and lab mates would be the first to correct and approve your work. They will mainly correct the technicalities of the paper. Secondly, you can ask someone from a different field to review it. They will generally provide a fresh aspect from a layman's point of view. Thirdly, The University of Utah has a separate writing department just for this purpose. They will help you with your grammar and structure of the paper. For more information, visit: <http://www.writingcenter.utah.edu/>

References:

The publications, homework, assignments which you submit must have relevant citations and references. This is one of the most important aspects of your work. Not citing relevant references is considered a serious offense and can lead to your removal from the program. Organizing these references can be a pain and an overwhelming task. Tools like EndNote, ProCite and Reference Manager can be useful. Learn to use them before you start writing your publication/papers. For more information, visit: <http://www.lib.utah.edu/research/index.php>

Plagiarism:

Plagiarism is considered a serious offense and can lead to serious consequences and even legal ramifications. For more information check the link "American Classroom Practices" on ISA website.

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Last but not the least, there are a few thumb rules which you need to keep in mind:

Plan ahead

Plan contingencies or back-up plans - Ask what-if? Think of the worst case scenario and plan for that to happen

Be proactive/take initiative: Rather than wait for someone to tell you something is due, use the websites and turn it in on your volition. Lab corollary: once you have been trained in the lab, don't wait for someone to hand you work. Instead, find a problem that needs attention and attack it.

Do what you say you will – Americans are very serious about promises and assurances, even if they are only made while talking (There is a legal term for it – an oral contract). So if you tell a professor you'll have an experiment done by next week, it has to be done then. If you don't do what you say, the professors can get disappointed quickly.

Don't be afraid to talk to the professors – But also, don't make promises you can't keep. If

you don't think you'll be able to finish an experiment on time, speak up sooner rather than later. It is better to be upfront at the beginning than to have to make excuses or miss the deadline later. The faculty can be intimidating sometimes, but they do want to help and to teach you. If you're having a problem and you don't talk to the professors about it, they can't help.

Same goes for the staff. They are happy to help you plan (and to help fix problems) but it is easier when you talk to them about a problem early on, when it is small, rather than waiting until it is an emergency.

Give advanced notice of needs – It is customary in America to give someone at least 2 weeks' notice if you need something from them. For example, if a student needs a letter of recommendation from a professor, he should ask the professor to write the letter at least 2 weeks prior to the deadline. Two weeks is typically the bare minimum, though. The more you respect someone, the longer notice you'll give them. For example, if you plan to leave a job on good terms with your boss (or professor), you might give as much as a month or 2 months advance notice that you are leaving. So it can also be a sign of disrespect if you ask someone for something at the last minute or the day before it is due.

References:

http://me.stanford.edu/documents/ME_SSO/Advice_Paper_web.pdf.

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