

Electronics

Manual for Master Students

Prof. E. Nordlander Sept. 2004

(Rev. Aug. 2007, Ass. Prof. M. Isaksson) (Rev. Aug. 2010, Prof. E. Nordlander) (Rev. Aug. 2014, Prof. D. Rönnow)

General Information

How to behave towards Electronics staff and other University staff

In Sweden, men and women are treated equally. Regardless of gender, all staff must be respected and treated in a polite way. Further on, information and instructions given by University staff is independent of gender.

Respect opening hours in the faculty office. The opening hours are given on the office door.

It is not accepted to sneak into the faculty office on closing hours, even if somebody is opening the door for you. If so, you will be dismissed from the faculty office.

Treat the faculty secretaries with respect and be polite – they are doing all they can to help the students. Don't try to command and bluster the faculty secretaries – they will not accept such behavior. The result will be that you won't get the service you need!

Also respect other students as equals. Nobody is in more hurry or need for help or service than another. Line up for your turn, and wait patiently for service.

Information given by the faculty secretaries

By Swedish law, all information about students may be requested by anybody. This is the Principle of Public Access to Official Documents. This means that all information about study achievements and exam results, personal address, telephone numbers (also confidential phone numbers if given), civic registration number ("personnummer") - practically speaking: everything we know about the student is in the public domain, except explicitly Confidential material. A thesis, for instance, is a public document after being approved, unless the Head of Education has granted confidentiality after application.

What are you entitled to request from the faculty office

A student is entitled to request exam results and other academic achievements from the faculty office. A student is entitled to request previous exam tests if not available electronically. Old exam test may be available at specific Blackboard sites of individual courses.

The individual exam tests are stored in the faculty office for some time, and your personal test may be claimed after being marked by the examiner. Results from examination are registered as soon as possible by the faculty secretaries in the university record system LADOK.

What a student has to respect from staff

Instructions from academic staff as well as from the faculty secretaries must be respected by the student. Always keep in mind that the university staff is trying the best to help and be of service within reasonable limits.

A faculty secretary is entitled to dismiss a student from the faculty office if behaving threatening, annoying, or otherwise inappropriately. The University does not hold armed

guards for security. Hence, in case of grave incidents the faculty secretaries will call for police assistance.

Extramural Communication

Common sense

When approaching another university or company, *e.g.*, when applying for a thesis assignment, it is essential not to be pushy and annoy people. Spamming with e-mails or telephone calls will strike back on yourself, or, even worse, on UG, the faculty, and staff. There are several examples of how UG staff had to apologize for students spamming the world for thesis assignments. This behavior is unacceptable! One mail is enough, then wait for the answer. Don't try to wear people out – it won't work! Respect a decision!

UG staff as reference

It is not OK to give UG staff as reference when you apply for a thesis assignment or otherwise. You always have to ask for permission by the staff in mind before giving his/her name as reference.

As a rule, there is no point in using UG staff as reference, since we are not supposed to give other opinions about students except professional statements. Such professional statements are e.g. results from courses taken at UG. However, those results are available as transcripts from the university records of study results (LADOK). So, there is really no reason for giving UG staff as reference if you order a LADOK transcript when needed.

Conditions of Use of the Electronics Laboratories

General information

The Master's Programs in Electronics/Telecommunications and Electronics/Automation make extensive use of laboratory exercises and project assessments to provide practical skills alongside with theoretical. Being a Master's student, you will be granted access to the Electronics laboratories. After gaining basic knowledge, these laboratories will be available for you 24 hours a day except when reserved for scheduled teaching. However, the instructors will be available on scheduled hours only.

The free access to top-standard laboratories is a unique privilege given to you as an Electronics Master's student. To maintain this privilege there are a number of simple and reasonable rules to be followed.

Any student may be excluded from any laboratory session if deemed to be insufficiently prepared or to have infringed any of the following rules. A student refusing to obey a reasonable instruction given by an instructor, regarding safety aspects or caused by disrespect to any of the following rules, shall be reported to the Dean of the faculty for possible disciplinary action.

Laboratory Rules

The laboratories are educational facilities. This means that at various times they will be reserved specifically for scheduled education. During such circumstances, the laboratory will be non-available to other students than scheduled. Notices of lab reservations *may* be posted outside the laboratory or on the whiteboard in the lab showing the hours of reservation. Make sure to check these notices before entering the laboratory.

Your Student ID card also serves as your card-key to the laboratories. Use of the laboratories is restricted to those with valid card-keys. If you suspect that someone is using a laboratory without a being a card-key holder, please report this to the University Security, the Lab Manager, or to the faculty secretary. Information on how to contact University Security is given in each Electronics lab.

Be prepared to show your card-key (and a valid Photo ID, passport or similar) if requested by University Security staff or Electronics staff. If you cannot show the requested card-key and ID you will promptly be dismissed from the lab premises.

All entries to the laboratories are logged. For this reason each student using the lab must use his/her own card-key in the card-key reader. Card-keys used by someone else than the owner will be confiscated by University Security or Electronics staff. Do not block laboratory doors open. If you have lost your card-key please turn to University Security for further instructions.

No unauthorized person is allowed in the laboratory premises. There is no excuse for any student to enter without a card-key. All visitors to the laboratories must be cleared by Electronics staff and escorted while being in the laboratory.

The Electronics laboratories and equipment are intended for University education and research purposes only. Any other use of the facilities will be subject to disciplinary actions or submitted to the police.

Smoking is not allowed in the Electronics laboratories or any other indoor area at UG. Students affected by alcohol or drugs are not allowed in the laboratories.

Laboratory Etiquette

Students are expected to conduct in a professional and well-behaved way in the laboratory.

Keep mobile phones SILENT. Please leave the lab if you have to make or receive phone calls!

All students are responsible for maintaining laboratories clean and properly dispose of trash. Disrespect will be subject to disciplinary actions. Any member of Electronics staff is entitled to request cleaning assistance from any student present in the laboratory if required by circumstances.

Before leaving the laboratory, used equipment (components etc.) should be returned to proper storage, all cables removed and returned to their racks, and all work areas be clean and tidy.

Close the windows after finishing laboratory work for the day. Turn off electrical equipment, if not marked differently (e.g. long-term experiments).

When the laboratory is reserved for scheduled education, access to computers may be granted if approved by the instructor.

Do not leave computers online unattended for any reason, except if ordered to do so by the instructor (e.g. for a longer simulation).

Food and beverage is not allowed in the laboratories. Damage of instruments or computers due to careless behavior may be subject to economic prosecution.

Damage of instruments and other equipment

Students are not allowed to attempt any repair or modification of equipment in the laboratory. If repair or modification is needed, turn to the Lab Instructor of the specific course who will initiate action for repair or modification.

Students may not move equipment - including furniture - from one laboratory area to another without permission of the instructor.

Careless behavior of a student may cause damage to instruments and other equipment. In such cases the student may face economic persecution decided by the Head of Department.

All devices made out of material supplied by the instructor remains property of UG.

Laboratory Reports

Written reports are mandatory for each laboratory exercise of the Master's program. The report must be typewritten in English (MSWord format: .doc, .docx) and sent to the instructor by e-mail *not later than 14 days (i.e. 2 weeks) from the scheduled exercise*. Late reports are normally treated next time the course is given (*i.e.*, next academic year).

If needed, the instructor will comment the lab report and send it back to you in a return mail when the report has been reviewed. If revisions are suggested by the instructor, those have to be respected before getting the lab assessment approved.

Lab reports must include:

Names of all students in the lab group

Abstract - This is a brief summary of the experiments to be performed. Explain what data you need, the procedure for data acquisition, and the reason for this. This part should be written in advance of the experiments. The abstract is very specific.

For each experiment, report:

Data

The data recorded during the experiment, with units, should be supplied and discussed.

Analysis

In this section, you will identify and analyze the answers to questions posed in the instruction sheets. If collected data and the subsequent analysis do not support the physical theory you will try to analyze the reasons behind.

Conclusion

This is a brief answer to the following question: "What did I learn from the experiment, from my data, and from my analysis?" You will not be required to prove the theory. The conclusion is very general.

Soldering Components

In some courses containing student projects soldering is required. When handling and soldering components onto circuit boards you must use the ESD (Electro Static Discharge) straps provided, and keep in mind that the soldering iron is extremely hot and should be treated with due care and attention at all times.

If you feel uncomfortable your instructor will give soldering instructions if asked.

Soldering is not permitted at the general workbenches. It is restricted to a workbench specifically designated for soldering purposes. The soldering iron is connected to mains power through a timer for safety reasons. You are never allowed to disconnect or bypass the timer function in any way!

The Examination Process

General information

All students have to register to all examination occasions through the web-based registration system. This goes both for the regular exam as for reexams.

To register for examination

Registration to exam tests (or reexam tests) has to be done no later than 10 days before the date of examination.

Login at – http://tentareg.hig.se/. Use your "HiG student password". Did you lose the password, contact the university IT support.

When online, you will see a list of the courses that you are registered to and the exams/reexams are available for those courses. Please choose an appropriate occasion for examination and book a seat.

Late registration

When it is less than 10 days left to the examination date, it is too late to book a seat. You can no longer register in this system to an exam/reexam, and, thus, the course will not be visible in the list.

For late registrations:

- Contact the Schedule Department in order to book a seat if available.
- If there is no place available for you, you can go to the examination hall, wait for 30 minutes and, if seats are available, you may do your exam/reexam.

How to decline your seat after registration

You can decline your seat yourself at http://tentareg.hig.se/ up to 10 days before the examination day. After that date please turn to the Schedule Department and they will help you.

Important – Please decline your seat if you know in beforehand that you won't be able to do the exam. Somebody else may need your seat.

Off-campus examination

Examination in other places than the place allocated by UG is possible if there is enough reason for this. If, for instance, examination on campus will imply excessive costs for hotel or other accommodation or unplanned travel to high cost, examination can be arranged off-campus. An application form is available for this purpose.

Applications for off-campus examination have to be filed at least 2 weeks before the examination is due, and such applications are sent to the faculty secretary.

It is the responsibility of the student to make the arrangements and pay extra costs that may occur. An off-campus contact person who will assume full responsibility for a correct handling of the procedure has to be assigned. Normally the off-campus examination is done in another university, embassy, consulate, police station or similar authority.

Rules of examination

During examination proctors are on duty to supervise the examination process. The proctors are not uniformed, nonetheless in charge of the order during the examination process.

During the examination, the student has to follow any instruction given by the proctors. This includes placement of students in the examination hall as well as placement of bags, clothes, and similar items. Reluctance of following given instructions will immediately be reported to the examiner, who, in turn, has to decide whether or not the student may continue the examination.

The student must be present on location at least 15 minutes before the announced start of the examination. If not so, your seat is no longer reserved and may be given to another student. No student is allowed to leave the examination hall within 40 minutes after the announced start of the examination.

For off-campus examination all dates and time is associated with the time in Sweden, *i.e.*, GMT +1.

You are only allowed to use tools and other facilities which are explicitly prescribed in the exam instruction. It is the obligation of the proctors to check that no illegitimate aid is used during the examination. Tables, handbooks, and similar aid, must not contain any notes other than the name of the owner. Calculators must be totally cleared. The proctors are allowed to remove batteries to reset calculators without responsibility for loss of any data or programs.

Furthermore, only writing paper offered by the proctors may be used. Single-sided use only of the writing paper. At most examinations, new papers should be used for each new examination task. Every written page in the examination process must be marked with the student's name and civic registration number ("personnummer") to be valid. The written test should be wrapped in a special cover handed out by the proctors. These covers must be marked according to the instruction of the proctors.

It is not allowed to use another student's tools during the examination without consulting the proctors first.

No communication between students is allowed during the examination. Mobile phones or other communication media are not allowed for use in the examination hall, except by the proctors.

Any attempt of misleading, i.e. cheating, in the examination process is a case which unconditionally is submitted to the Vice-Chancellor (Rector). It is Rector's decision whether or not the case has to be further submitted to the Discipline Board for penalty. The penalty for cheating ranges from a warning to suspension up to 6 months. For detailed regulation of penalty, see the Higher Education Ordinance (HEO).

Students are allowed short breaks to visit the lavatory, in accordance with the instructions of the proctors. Proctors are responsible for reasonable security measures in this respect.

A valid photo-ID card must be shown on request of the proctors.

Results of examination

The results of the examination are normally given at a special occasion by the examiner. Exam papers not collected by the student at this occasion are filed by the faculty office during one year after the examination date. An examiner has maximum 14 weekdays to correct the exam papers and make a decision of the result.

Questions

Contact the Schedule Department schema@hig.se or the faculty secretaries ATM-KANSLI@hig.se.



CONTRACT

I confirm this statement with my signature:

I have read the Manual for Master Students about rules and behavior at the University, in extramural contacts, and in the examination process. I accept to conform to the rules given here to my best ability, and to keep my honor and own reputation as well as the University reputation high and immaculate.

Place Date

Name in print Signature

Civic Reg. Number ("personnummer")