Essay topics

1. "Definition for Usable security". Whitten and Tygar aimed at a definition for usable security in their paper Why Johnny Can't Encrypt. Make a literature survey on more recent related work to compare, abandon or extend their original definition.
2. "Why is privacy management so hard?" With Facebook and Google Buzz, just to name two examples, we have seen that maintaining one's privacy online can indeed be tricky. On basis of recent work in this area, discuss these challenges and the current aims to tackle them.
3. "Better privacy management" – on basis of related work and your own analysis, redesign the privacy management for an online service you know well. First present the service and issues related to its current privacy management, then proceed with the redesign.
4. "Trust principles today". In the course, two sets of design principles to create trust online were presented. These works came out already around 2000. On basis of new work since then, discuss how relevant these works are today and what kind of new design principles have been proposed since.
5. "Usable security and social networking". Users are involved more and more intensely in interactions online through social networking tools. Discuss the challenges and novel demands to creating usable security due to the emergence of social networking tools.
6. "Usable security – a case study". Select a service or product that somehow involves security and analyse its usability against course material and other related work as you see fit. You can also make a case study on a security product/service.
7. "Identity online". Identity theft has become a major problem in the Intenet. Discuss the different issues related and present an overview of interesting work in this area.
8. "Why we fall for Phishing". Users are susceptible to online scams where they end up losing private information and/or money. Why do users fall for these scams? Discuss the issue on basis of relevant work in the area.
9. "New ways to authenticate". Users tend to do badly when it comes to remembering good passwords. Why? Here you can either 1) discuss the human side, why users are bad at passwords and cite relevant work in the area or b) present work that aims at developing new ways to authenticate users that go beyond traditional passwords (e.g. graphical passmeans).
10. "How to study usable security?". Present how usable security has been studied since the classics through a selection of papers that you consider good (or bad). What is missing? What could be improved?
11. = your own topic

Essays

- …need not be written in a rigid scientific manner – they can be more free-form, thus name "essay"
  - You can also express opinions as part of the essay
  - You need not back up every claim in the scientific manner as in scientific papers
- Can take the form of a literature survey, case study or design exercise – or a research paper. It's up to you!
- The templates are taken from CHI2011 conference work-in-progress category and may include some directions on the length – ignore these, the length is 8-10 pages.
- The idea of the template is to have equivalent length for the papers (and to learn to use such templates).
- I'll add some 3-4 references for each lecture topic in Noppa to get you started. These can be used for getting started with the topics (but you do not have to use them).

Practicalities

- Select your topic by sending email to me (kristiina.karvonen@hiit.fi) by 8.2.2011
- If you select your own topic, wait for confirmation from me
- 8-10 pages (templates available on Noppa)
- Returned by 30.4.2011
- Represents 50% of your course grade.