

“It was not as hard as I expected”

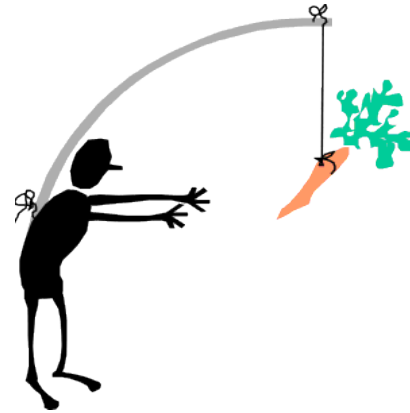
~~–Adolf Hitler~~
~~Optic Science~~

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Motivation



- Background
 - Computer Science is male-dominated in Sweden and in China
 - Chinese Education System policies
- Interesting to know:
 - How the female Chinese students like the subject
 - How they “survive” from the study if the subject is not their interest
 - What problems they have encountered

Investigation – students

Group One

- 12 female Chinese students who are from different universities in China and now studying CS at IT department, Uppsala University

Group Two

- Eight female Chinese students who are studying at the School of Software Engineering of Tongji University in Shanghai, China

Investigation – forms

Group One

- Questionnaire via e-mails, in English
- Chatting through online instant messages, in Chinese

Group Two

- Face-to-face interviews, in Mandarin Chinese



Results

- Attitudes to Computer Science



- CS not being the first choice of most of the interviewees
- Before going to university, no strong interests in computers as some male students
- Initially regarded CS more suitable for male students

Results (cont.)

- Barriers in the Study
 - Social climate
 - Cooperating with “genius” male students
 - Female students not good at programming as male students?
 - Not willing to ask for help too often
 - Confidence level
 - Little pre-knowledge of CS → nervous when encounter problems in labs



Results (cont.)

- Studying Habits

- Traditional studying habits in high school in China reading books thoroughly & doing homework
- To study CS well: reading books far from enough → working with computers is a must!

- Studying Experiences

- Well-designed assignments guiding students to learn the courses step-by-step
- Flexible deadlines making them feel easier



Results (cont.)

- Changed Attitudes to CS
 - Interests in CS increased after a tough study period
 - Getting used to the teaching & studying approaches in CS
 - Able to solve more problems independently
 - Better confidence in working in CS field



Open questions for CS educators

- What do female Chinese students think most helpful to assist them overcome the difficulties in their studies?
- What can be done to provide female students with an equal beginning, which does not demand pre-knowledge of computers?
- What can be done to provide female students with a more relaxed studying environment?
- How to design courses in order to combine the knowledge from books and the operation of computers together, and thus meet most Chinese female students' habits of “studying by reading”?

Thank you 😊