SECURITY (COMP0141): INTRODUCTION AND WELCOME!



MODULE GOALS

The security mindset

- How to (abstractly) think about security?
- Vulnerabilities vs. threats vs. capabilities
- Social, economic and political incentives

Technical aspects

- Purpose and limitations of security mechanisms
- Vulnerabilities, attacks, and defenses

OVERVIEW

Week 1: Security policies

Week 2: Security principles

Week 3: Confidentiality

Week 4: Integrity

Week 5: Availability

Week 6: Human-centred security

Week 7: Authentication

Week 8: Access control

Week 9: Network security

Week 10: Web security

MODULE OVERVIEW

Lectures: Videos and slides will be posted online on Tuesdays

Tutorials: Led by TAs and conducted Wednesdays 11-13 (recorded)

- Exercises available Mondays and solutions on Fridays
- There is no tutorial this week!

Website: https://moodle.ucl.ac.uk/course/view.php?id=9307

Assessment: 100% exam in Term 3

Quizzes: Weekly (unmarked!) 3-6 question quiz to confirm your understanding of the lecture material

OTHER RESOURCES

The Internet is vast! Information is not always trustworthy, but still good to read lots of news articles, Wikipedia, etc.

Will link to (free) chapters from Ross Anderson's textbook "Security Engineering" when appropriate Security

http://www.cl.cam.ac.uk/~rja14/book.html



Slides and Moodle page will also have links to papers and articles

"HACKING"

We will learn about attacks in this module

It is good to study and experiment with attacks to understand how

they work, but only IN THE LAB!

It is not acceptable/ethical/legal to attack live systems

The Information Security research group runs a hacking seminar and the link to participate will be posted on Moodle

