Course Code	IT424P			
Course Name	**Computer Security**			
Core/Elective	Core			
Credits	Theory: 2	Project: 0	Lab: 3	TOT: 3
Course Description	This course is intended as a basic introduction to computer security and cryptography. It is an introductory course to concepts in information security and management.			
Course Syllabus	• Principles of computer security. • Basic cryptography. • Authentication. • Secure network protocols (Kerberos, SSL). • Program security (Bug exploits, Malicious code: viruses, worms, trojan horses). • Attacks and defenses on computer systems (Firewalls, Intrusion detection, Countermeasures) . • Trusted operating systems. • Ethical and legal issues in computer security. • Developing security plans for a system.			

Course Topics and calendar:

Week Number	Topic
1	Course Card
2	Introduction to computer security 1
3	Introduction to computer security 2
4	**Cryptography 1**
5	**Cryptography 2**
6	**Keys Distribution**
7	**MIDTERM**
8	**Program Security 1**
9	**Program Security 2**
10	**Operating system Security**
11	**Authentication 1**
12	**Authentication 2**
13	**Network Security 1**
14	**Network Security 2**
15	**Lab. & Oral exam**

Grading:

Midterm   -------------------------------------   10
Oral exam -------------------------------------   10
Lab exam & activity during semester -------   10+10
Final exam   -------------------------------------   60

Course Material:
- Textbook: Security in Computing, 5th Edition , 2015 by Charles P. Pfleeger.
- Lecture notes.
- Internet resources.

Lab:
The lab will focus on cryptography algorithms and network security softwares