

D. Program Teknologi Informasi *Cyber Security* (TI CS)

Overview

In the development of increasingly sophisticated technology where the internet can be accessed anywhere and anytime, human activity seamlessly integrates the internet. It makes so important to secure data to avoid data being lost or leaked. Security awareness become very important nowadays, since every aspect of daily activity are managed or use the information technology by means of computer, laptops, or smartphones. User credential and confidential data are exchanged through the internet which ease to be leaked. Thus, security measure will playing important role due to the increasing amount of data delivered over the internet.

Exit Profile of Cyber Security Curriculum

After completing all modules, the students should be able to:

- Define how the security measure should be implemented so the data is not damaged and leaked.
- Implement a system design which enable security measures
- Implement a system design which enable security measures

Curriculum Contents

Semester 1	
Modules	Credits
Introduction to Information Technology	3
Introduction to Information Technology Project	1
Algorithm and Programming	2
Algorithm and Programming Project	1
Relational Database Design	2
Implementing Database Design on MS SQL Server	3
Implementing Database Design on MS SQL Server Project	1
Tools and Technique for Analyzing Data	3
Tools and Technique for Analyzing Data Project	1
Operating System	2
Total Credits	19

Semester 2	
Modules	Credits
Computer network	2
Computer network Project	1
Administering Network Operating System	3
Linux Server Configuration	3
Linux Server Configuration Project	1
Installing and Configuring Windows Server	
Installing and Configuring Windows Server Project	3
Administering Windows Server	3
Administering Windows Server Project	1
Algorithm and Data Structure	2
Total Credits	19

Semester 3	
Modules	Credits
Object Oriented Programming	2
Object Oriented Programming Project	1
Introducing Security	1
Introducing Security Project	4
Cyber Operations	4
Cyber Operations Project	4
Information Systems Architecture and Technology	2
Total Credits	15
Semester 4	
Modules	Credits
Penetration Test	4
Penetration Test Project	1
Cyber Analyst	4
Cyber Analyst Project	1
Internship	14
Total Credits	24