

# Web Security Components (CS107)

40 Hours

## Outline

This course including the top 10 web application attacks (OWASP ranking) and understood drill-down the attacks, including codes examples, lab and exercises. In the end of the course the students understand how to attack, and how to defense own code. And get best practice of web attacks and defense.

## Prerequisites

- Experienced web developers.
- Experienced in Jscript programming
- Experienced basic SQL queries and database structure.

## Contents

### Introduction of web application hacking

In this section we talk about biggest attacks scenarios in the world, and explain the attack vectors, and how is work.

### Client side restrictions and parameter tempering

In this section we talk about Burp suite program, and another proxies to intercept band width. We talk about the concept and how is help us to penetrate applications (Mobile and Web)

## **Types of Injection Flaws attacks and prevention**

OS Injection - explanation, wrong code example, secured code and labs

SQL Injection - explanation, wrong code example, secured code and lab

## **Offline and online password attacks**

In this section we talk about brute-force attacks, online and offline, and do labs and exercise

## **Cross-site scripting - attacks and prevention**

In this section we talk about HTML attacks vector in real life, do a labs and exercises

## **Cross-Site Request Forgery attacks**

We talk about CSRF attacks in real life, and demonstrate banking attack(via labs)

File inclusion attacks

File inclusion attacks

Unrestricted File Upload

Client side attacks and Java applets

Real-life hacking attack scenario