

# Angular 2 (FT203)

32 Hours

## Outline

Angular 2 is the next version of Google's massively popular MV\* framework for building complex applications in the browser (and beyond).

Angular 2 comes with almost everything you need to build a complicated frontend web or mobile apps, from powerful templates to fast rendering, data management, HTTP services, form handling, and so much more.

## Target audience

Front-end developers with basic knowledge in HTML & java script.

## Contents

### Module 1 - Introduction to Angular 2

- MVC , MVVM , SPA With Angular
- Why Angular 2
- AngularJS Vs. Angular 2
- Development Environment

### Module 2 – Type Script & ECMA Script 6

- Interfaces
- Import/Export
- Classes & Objects
- Promises

- Arrow functions
- Maps Filter & Reduce
- Decorators

### Module 3 – Basic Architecture

- Angular 2 architecture
- How angular 2 works
- The model
- The components
- Components Definition & Composition

### Module 4 – Components

- Shadow DOM
- Components Definition
- Components Composition
- Templates & Styles
- Core Directives

### Module 5 - Components Internals

- Nested Components
- Components Definition
- Data Projection
- Component Inputs by Properties
- Component Output by Events

### Module 6 – Forms

- Model driven
- Template driven
- Form Builder
- Adding some validation

- Errors and submission
- Creating a custom validator
- Grouping fields
- Reacting on change

### Module 7 – Providers

- Dependency Injection
- The role of provider
- Built in providers
- Custom providers

### Module 8 – Communicating the Server

- Modern Web System Architecture
- The http provider
- RESTfull service basics
- Custom providers
- promises
- data Observables
- Constructing your Models
- Understanding the RxJS

### Module 9 – Routing & SPA (Single Page Application)

- What is Routing
- The need for routing
- Routing options
- Path Location
- Passing parameters
- Nested routes