

40 HORAS

## INTRODUCTION

In this course, students will learn essential programming skills and techniques that are required to develop Windows Store apps. This includes a combination of both design and development skills, as well as ensuring that students are comfortable using and making the most of the Microsoft Visual Studio and Expression Blend tools.

## AUDIENCE

This course is intended for professional developers who have one or more years of experience creating applications and who are comfortable programming in HTML5, JavaScript, and CSS3

## AT COURSE COMPLETION

After completing this course, students will be able to:

- Describe the Windows 8 platform and features, and explore the basics of a Windows app interface.
- Create the User Interface layout and structure.
- Apply the MVVM pattern to application design.
- Implement the AppBar and layout controls.
- Use templates to create the UI.
- Use data binding to present data in the UI.
- Handle files and streams.
- Design and implement Process Lifetime Management (PLM).
- Handle navigation scenarios in a Windows Store app.
- Implement Semantic Zoom.
- Design and implement contracts such as Search, Share and Settings.
- Implement tiles and toast notifications in a Windows Store app.
- Respond to mouse, keyboard and touch events, including gestures.
- Deploy a Windows Store app to the Windows Store or an enterprise store.

## PREREQUISITES

Before attending this course, students must have:

- 1 or more years of experience creating applications
- 1 to 3 months experience creating Windows client applications
- 1 to 3 months experience using Visual Studio 2010 or 2012
- Attended Course 20480B: Programming in HTML5 with JavaScript and CSS3, or equivalent knowledge

## COURSE OUTLINE

### Module 1: Overview of the Windows 8.1 Platform and Windows Store Apps

- Introduction to the Windows 8.1 Platform
- Windows 8 UI Principles
- WinRT and Language Projections

### Module 2: Single-Page Apps and the MVVM Design Pattern

- Single-Page Applications
- The MVVM Design Pattern

### Module 3: Using WinJS

- The WinJS Library
- WinJS APIs

### Module 4: Implementing Layout Using Windows 8.1 Controls

- Windows 8.1 Layout Controls
- Implementing WinJS Controls and Templates
- The AppBar Control
- Windowing Modes

### Module 5: Presenting Data

- Working with Data Presentation Controls
- The ListView Control

### Module 6: Implementing Tiles and User Notifications

- Implementing Tiles, Live Tiles, Secondary Tiles, and Badge Notifications
- Implementing Toast Notifications

### Module 7: Handling Files in Windows Store Apps

- Handling Files and Streams in Windows Store Apps
- Working with File User Interface Components

### Module 8: Windows Store App Process Lifetime Management

- Process Lifetime Management
- Windows Store App Activation and Background Tasks
- Implementing a State Management Strategy

### Module 9: Designing and Implementing Navigation in a Windows Store App

- Handling Navigation in Windows Store Apps
- Semantic Zoom

## Module 10: Implementing Windows 8.1 Contracts

- Designing for Charms and Contracts
- The Search Contract
- The Share Contract
- Managing App Settings and Preferences

## Module 11: Designing and Implementing a Data Access Strategy

- uating Data Access Strategies
- Working with Remote Data

## Module 12: Responding to Mouse and Touch

- Working with Mouse Events
- Working with Gesture Events

## Module 13: Planning for Windows Store App Deployment

- The Windows Store App Manifest
- Windows Store App Certification