Android Dev, Part 1 of 3: Using Eclipse

Meet the expert: Robert McHale has over 17 years of experience developing online systems and consulting in the computer, financial, and non-profit industries. He enjoys simplifying complex features of mobile platforms. He has developed training courses for both Android and iOS and has participated in Connections conferences since April 2000.

Prerequisites: Must have a basic understanding of how to use Eclipse and write Java code.

Runtime: 07:07:19

Course description: The Android platform has entered the market a big way with phones and tablets. As more users adopt this mobile technology many companies are looking at ways to use the Android platform as a way for their employees to access data and for their customers to see what the company has to offer. This course covers the basics of developing applications for the Android platform. You will be introduced to the Android developer tool kit using Eclipse and programming in Java. Then you will build your first simple application. As the course progresses it will cover how to access GPS information, use the Status Bar Notification and move into SQLite, a mobile version of a SQL database. From there the course continues with SMS test messaging, Web Views, Web services and using a SD card.

Course outline:

Android Developer Toolkit
• Introduction
• Downloading FREE Tools
• Platform Requirements
• Sample Application
• Demo: Sample App
• Code Review
• Android Project Folders
• Android Run Configurations
• Demo: Developer Toolkit
• Demo: User Interface
• Demo: Run Configurations
• Summary

Building a Sample Application
• Introduction
• Building the Example
• Demo: Setting Up Application
• Demo: Run Configuration
• Demo: Testing Application
• Demo: Changing Code
• Summary

onClick Event Handling
• Introduction
• onClick Event Handling
• Android Markup XML
• Button
• Demo: Adding a Button
• Demo: Modify User Interface
• Summary

GPS Overview
• Introduction
• Android GPS, GPX, KML
• GPX for Garmin Hikers
• KML for Google Earth
• GPS Update Requests
• GPS Accuracy
• Demo: GPS
• Summary

GPS Application Demo
• Introduction
• Demo: GPS App Intro
• Demo: Strings.xml
• Demo: R.Java
• Demo: Sending Content
• Demo: Testing and Debugging
• Summary

Notifications Overview
• Introduction
• Demo: Notifications Overview
• Demo: Eclipse Overview
• Demo: Code for Notifications
• Status Bar Notifications
• Summary

Status Bar Notifications
• Introduction
• Demo: Status Bar Intro
• Demo: Run Configuration
• Demo: main.xml
• Demo: Text Width
• Demo: TickerText
• Demo: R.Java
• Demo: Running the App
• Summary

SQLite Overview
• Introduction
• Demo: SQLite Overview
• SQLite
• Summary

SQLite Demo
• Introduction
• Demo: SQLite Intro
• Demo: SQLite Manager
• Demo: Eclipse Intro
• Demo: SQLite OpenHelper
• Demo: Database Objects
• Demo: Content in Database
• Summary

SMS Overview
• Introduction
• Demo: SMS Overview
• SMS Text Messaging
• Summary

SMS Text Messages
• Introduction
• Demo: SMS Intro
• Demo: Building an App
• Demo: SMS Text Message
• Demo: Debugging
• Summary

Web View Intro
• Introduction
• WebView and AJAX
• Demo: Example Application
• Demo: Code Overview
• Demo: main.xml
• Demo: Java
• Summary

Web View Demo
• Introduction
• WebView and AJAX
• Demo: WebView Intro
• Demo: Adding a Button
• Demo: WebView
• Demo: AJAX
• Demo: Another Button
• Demo: JavaScript
• Summary

SD Card
• Introduction
• SD Card
• Demo: SD Card
• Summary

Web Services
• Introduction
• Demo: Web Services Overview
• Android Web Services
• Demo: Application Intro
• Demo: strings.xml
• Demo: main.xml
• Demo: onClick Event
• Demo: Call Web Service
• Cross Site Scripting
• Demo: HTML5 Application
• Summary