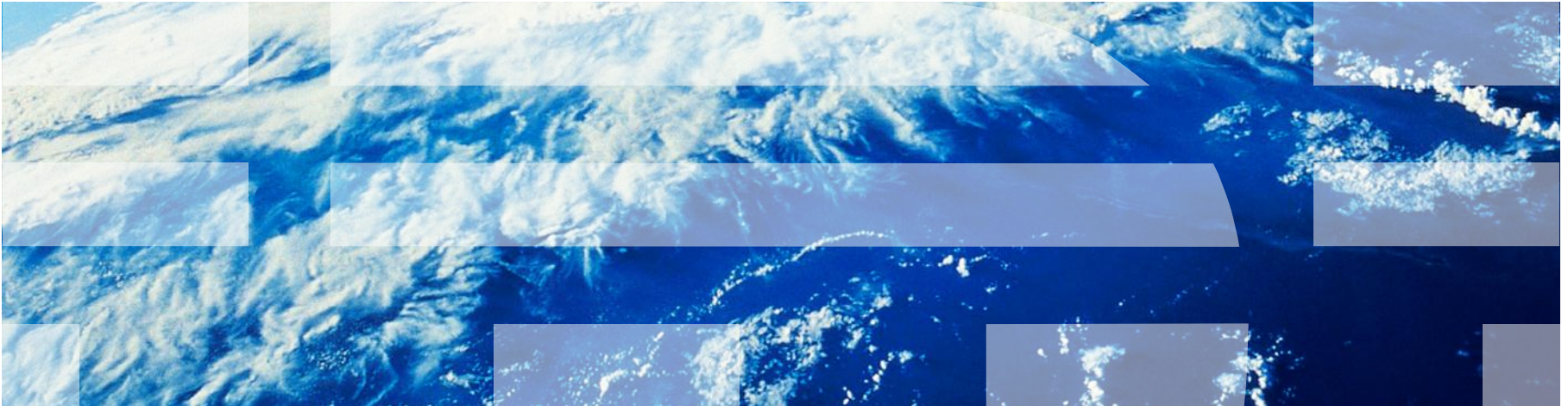


# ***IBM Worklight Foundation V6.2.0 Getting Started***

## **General information when developing for Windows Phone 8**



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# Agenda

- Installation
- Windows Phone 8 development
  - Environment-specific APIs
  - Environment-specific images
  - Apache Cordova
- Debugging the application
- Deployment

## Installation

See the ***Setting up your Windows Phone 8 Development Environment*** training module for a detailed explanation



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## Windows Phone 8 development – 1/2

- An Windows Phone 8 app that is developed by using IBM Worklight® Foundation comprises the following components:
  - A CS™ main class that is provided by IBM Worklight Foundation, and that hosts an instance of the WebView component.
  - A set of CS and JavaScript™ libraries that provide access to various device features and capabilities.
  - Web application code that is provided by the developer, that is written in HTML, CSS, and JavaScript, and that runs in one or more instances of the browser, hosted within the Main class.
  - All application components, including the web code that the developer provides, packaged into a single Windows Phone 8 project.
- IBM Worklight Foundation supports Android devices that run Windows Phone 8.
- If you use a source control management system (such as Rational Team Concert™, Git, or Subversion), see the IBM Worklight Foundation user documentation topic “*Integrating with source control system*”.

## ***Windows Phone 8 development – 2/2***

- It is useful to always consult with the Microsoft Design and Develop websites when you develop applications.
  - Design: <http://dev.windowsphone.com/en-us/design>
  - Develop: <http://dev.windowsphone.com/en-us/develop>

# Agenda

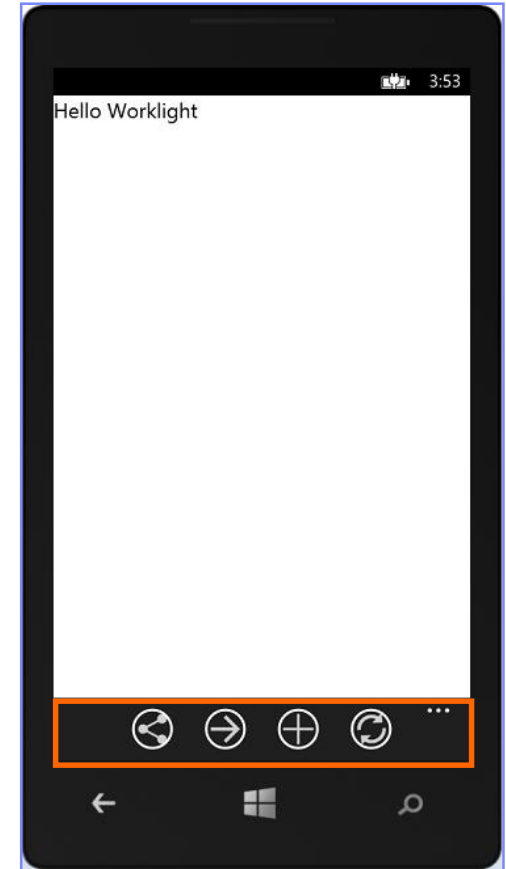
- Installation
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## ***Environment-specific APIs***

### ***Application Bar***

- In Windows Phone 8, the menu bar is named “Application Bar”. However, it uses the same Worklight API methods as the Options Menu feature in Android.
- When the menu is displayed, it holds up to four menu items.
- For more information about Options Menu development, see the *Common UI Controls* training module.



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## ***Environment-specific images – 1/2***

### ***Application Bar***

- If you implement the Application Bar feature in an app, you must put the various icons in the appropriate folder, in `your-project-name\apps\your-app-name\windowsphone8\nativeResources\applicationBar`.
- Worklight builder then copies these images to the native folder of the generated project.

## ***Environment-specific images – 2/2***

### ***Application Bar***

- The icons of the Application Bar must be 100x100 pixels and have a white foreground on a transparent background by using an alpha channel.
  - The Application Bar colorizes the icon according to the current style settings. Using colored icons can result in an unpredictable display.
- Images that are not in the acceptable dimensions are scaled to fit, which can potentially lower the overall image quality of the Application Bar icon.
- The circle that is displayed on each icon button is drawn by the Application Bar. Do not include it in the source image.

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# ***Apache Cordova***

- You can use the Apache Cordova framework in Windows Phone 8 applications to access the native elements of the device, such as contacts, geo-location services, media services, and accelerometer.
- For more information about Apache Cordova development, see the *Apache Cordova overview* training module.

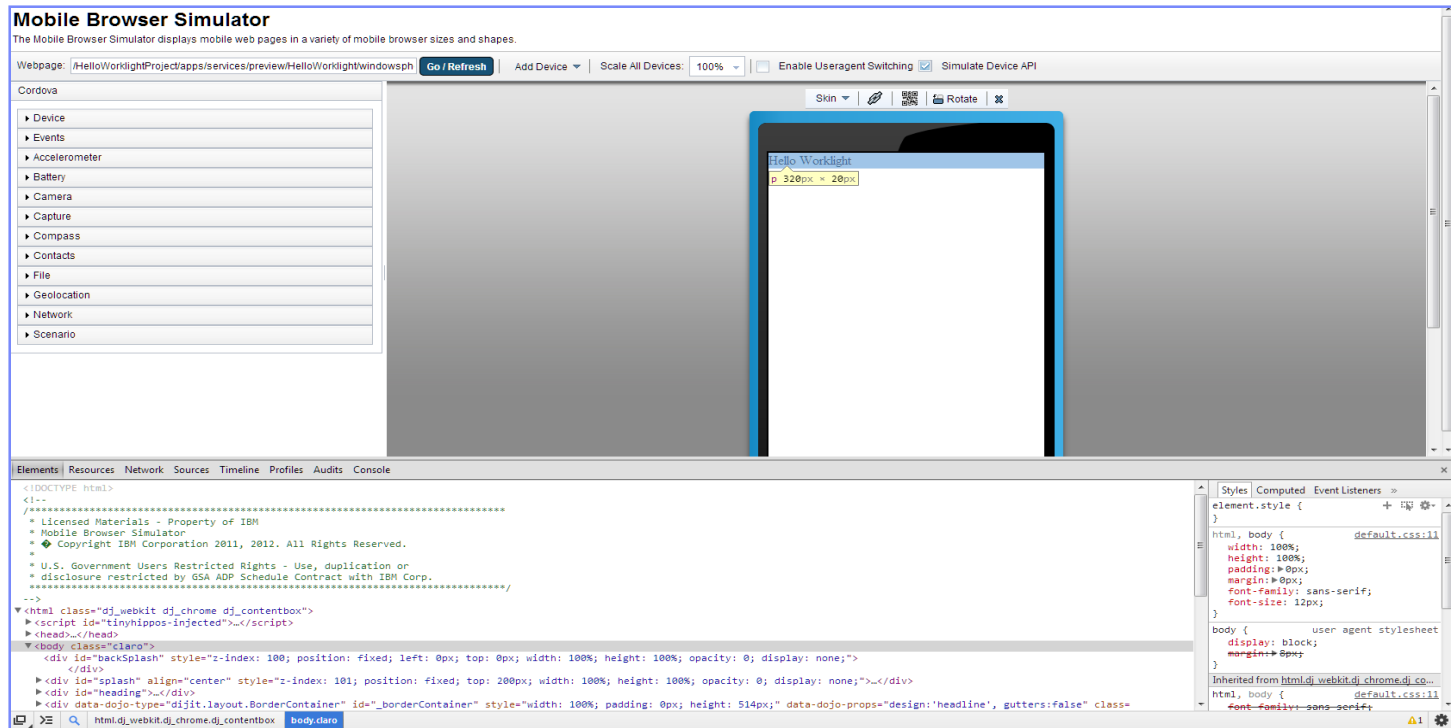
# Agenda

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# Debugging the application – 1/3

## Phase 1: Testing in your browser

- Your Windows Phone 8 app resources are previewed in the Mobile Browser Simulator, so you can debug it by using the facilities of the browser, such as Firebug or Developer toolbar.





## Debugging the application – 2/3

### Phase 2: Testing in the Windows Phone 8 Simulator

- You can test in the Windows Phone 8 Simulator only on a computer that runs on Windows 8 OS.
- Open your application by using Visual Studio 2012 for Windows Phone.
- Select an emulator and the **Debug** mode.



- Preview your application in the emulator.
- While you browse, debug the information in the Visual Studio **Output** view.

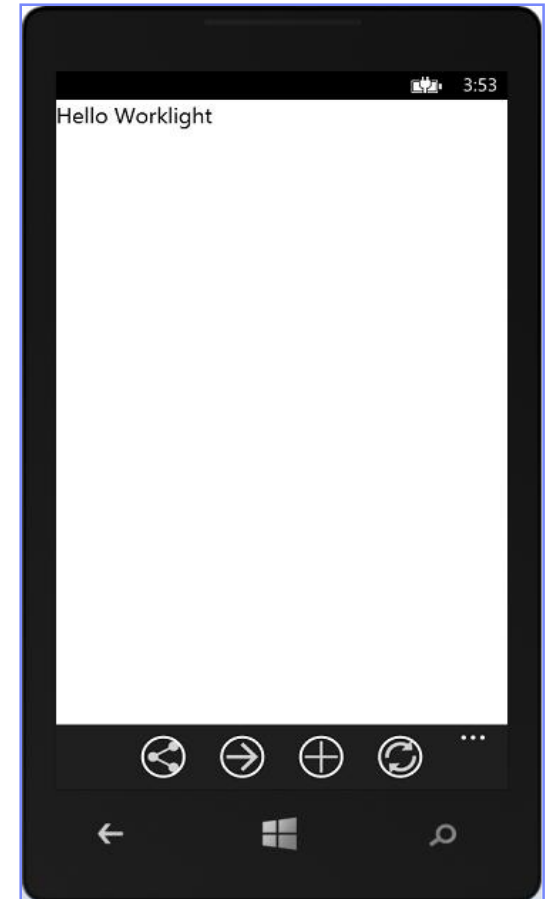
```

Output
Show output from: Debug
'taskhost.exe' (Managed): Loaded 'Microsoft.Devices.Sensors.dll'
INFO: wlclient init started
INFO: CookieMgr read cookies: {"WL_PERSISTENT_COOKIE": "735b1299-8fae-4fbb-9917-73e593d7dbd6"}
INFO: Request [http://192.168.1.34:8080/apps/services/api/EncryptedCacheDemo/windowsphone/0/authentication]
INFO: Storing cookies: ({"WL_PERSISTENT_COOKIE": "735b1299-8fae-4fbb-9917-73e593d7dbd6"})
INFO: Storing cookies: ({"WL_PERSISTENT_COOKIE": "735b1299-8fae-4fbb-9917-73e593d7dbd6"})
INFO: response [http://192.168.1.34:8080/apps/services/api/EncryptedCacheDemo/windowsphone/0/authentication]
{"success": "success"}*/
INFO: Request [http://192.168.1.34:8080/apps/services/api/EncryptedCacheDemo/windowsphone/0/init]
INFO: response [http://192.168.1.34:8080/apps/services/api/EncryptedCacheDemo/windowsphone/0/init] success:
{"userPrefs": {}, "gadgetProps": {"WLCIENT_TIMEOUT_IN_MILLIS": 30000, "LANGUAGE": null, "DOWNLOAD_APP_LINK": "http:
INFO: before: app init onSuccess
INFO: >> EncryptedCacheDemo >> initialize
  
```

## Debugging the application – 3/3

### Phase 3: Testing in a Windows Phone 8 device

- To run the application on a Windows Phone 8 device, connect your device and run the application by using Visual Studio Express 2012 for Windows Phone.
- Select the **Device** mode to run on the device.



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## ***Deployment***

- You must be a registered Windows Phone Developer to submit your applications to the Windows Phone Store.
- You can register at Microsoft App Hub.
  - See <http://create.msdn.com>
- After you register, you must assemble the prerequisites for your application certification by Microsoft and submit your application for review.
- For more information about the Windows Phone Store application deployment, see the Microsoft MSDN Library website (search for “Windows Phone Store development”).

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