


# CorpJS Meetup Budapest



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# Deep Dive into React Native

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Accedo

Corp JS Meetup, March 22 2017

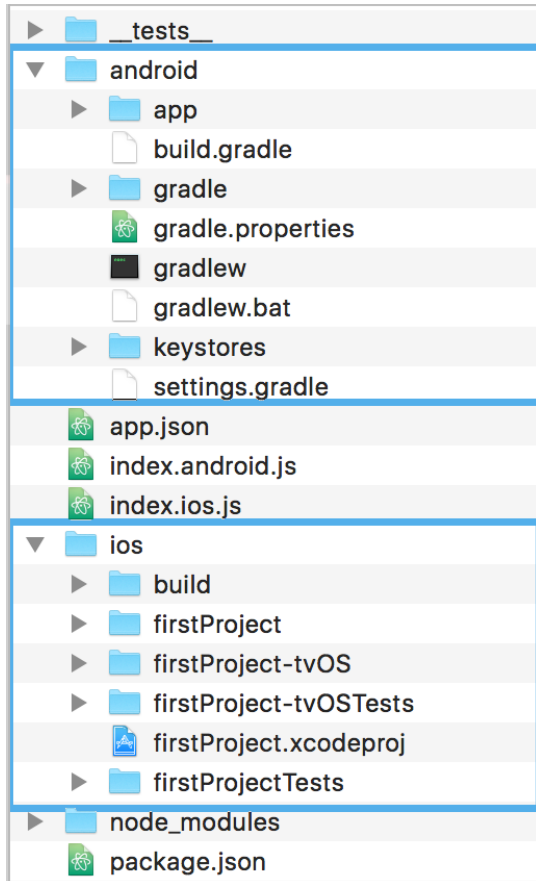
# Agenda

1. Setting Up Dev Environment
2. React Native default project structure
3. Checking sample app code
4. How does React Native work ?
5. Adding a new screen (Promotion)
6. Demo
7. Building a release app for Android
8. Q&A

# Setting Up Dev Environment

- React Native [Home Page](#) is a good starting point for setting up the dev environment
- Steps for installing dev environment on Mac OS:
  1. Make sure you have [homebrew](#) installed
  2. brew install node
  3. brew install watchman
  4. npm install -g react-native-cli
  5. Xcode for iOS development / Android SDK for Android Development
- Creating a new project with CLI:  
`$> react-native init firstProject`

# React Native default project structure



## Two Project Folders:

- Android (Android Studio project)
- iOS (Xcode projects)
  - iPhone/iPad
  - Apple TV (tvOS)

## Two App Entry Points:

- `index.android.js`
- `index.ios.js`

# Checking Sample App Code

What are the differences between React Native and React web code ?

```
import React, { Component } from 'react';
import {
  AppRegistry,
  StyleSheet,
  Text,
  View
} from 'react-native';

export default class firstProject extends Component {
  render() {
    return (
      <View style={styles.container}>
        <Text style={styles.welcome}>
          Welcome to React Native!
        </Text>
        <Text style={styles.instructions}>
          To get started, edit index.ios.js
        </Text>
        <Text style={styles.instructions}>
          Press Cmd+R to reload,{'\n'}
          Cmd+D or shake for dev menu
        </Text>
      </View>
    );
  }
}
```

Major Differences:

1. ?
2. ?

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Major Differences:

1. render() method - because it returns components which are an abstraction over iOS and Android UI controls.
2. ?

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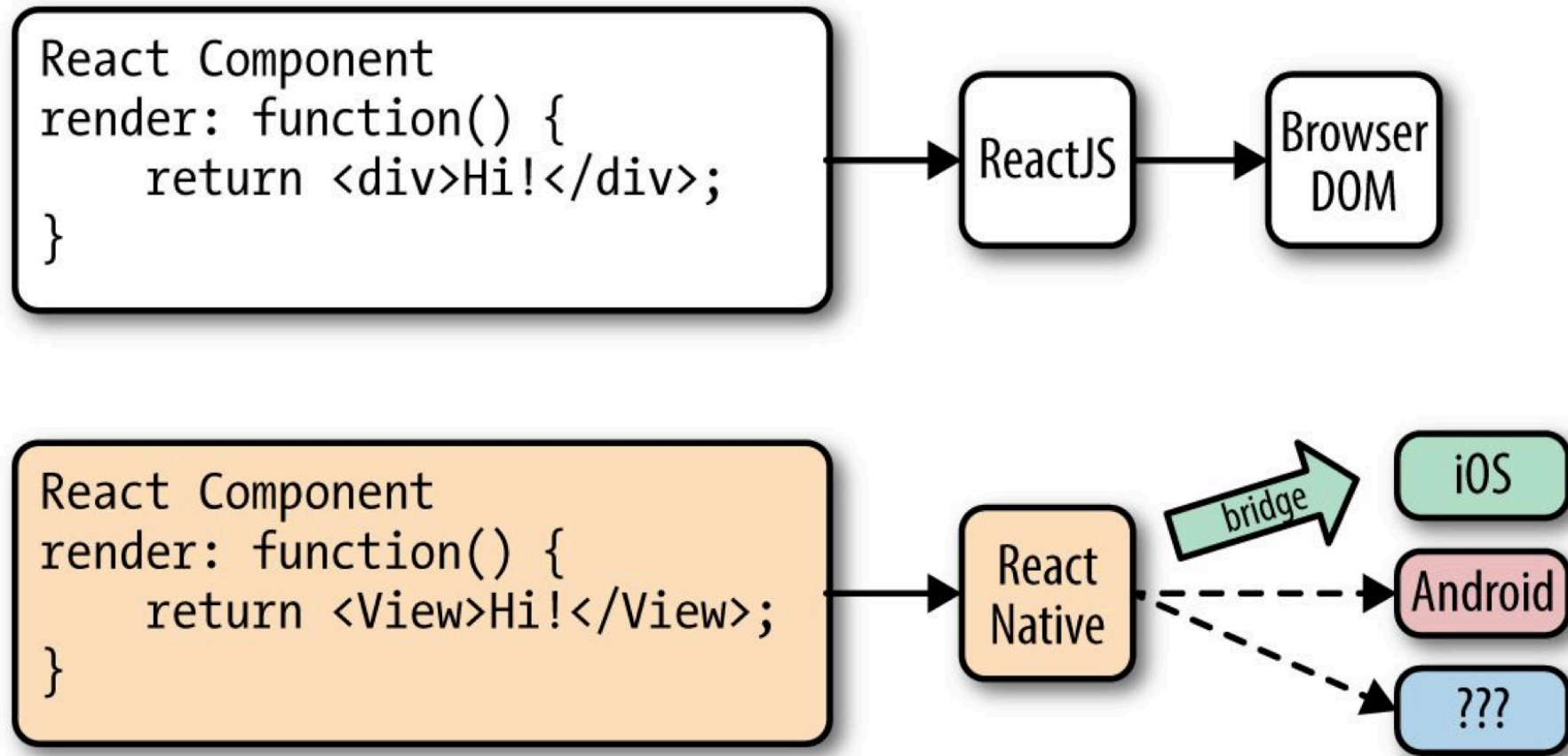
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Major Differences:

1. render() method - because it returns components which are an abstraction over iOS and Android UI controls.
2. Styling – is much like CSS, but with limitations, the abstraction for UI components had to be considered here too.



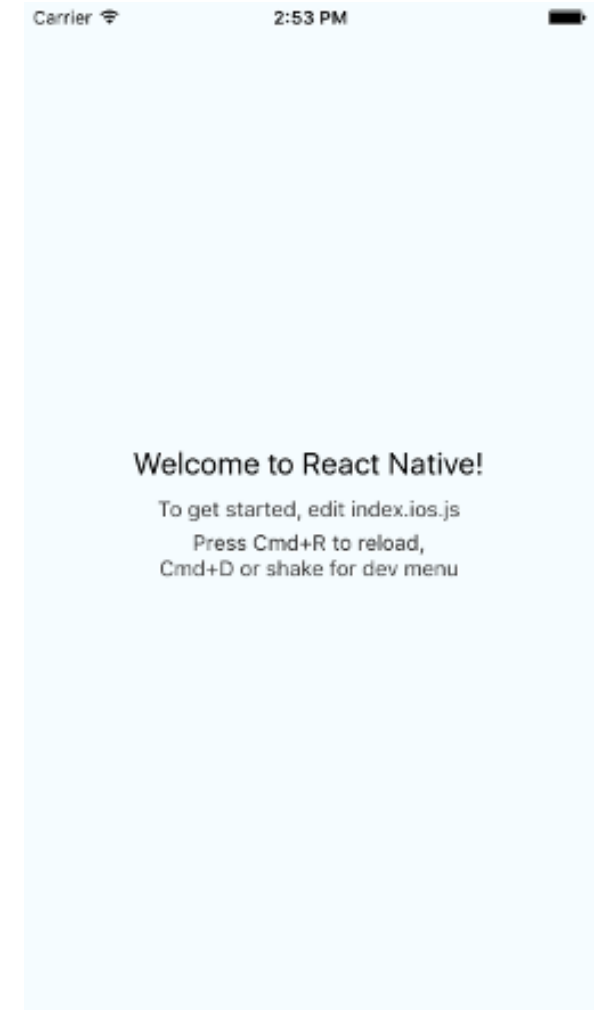
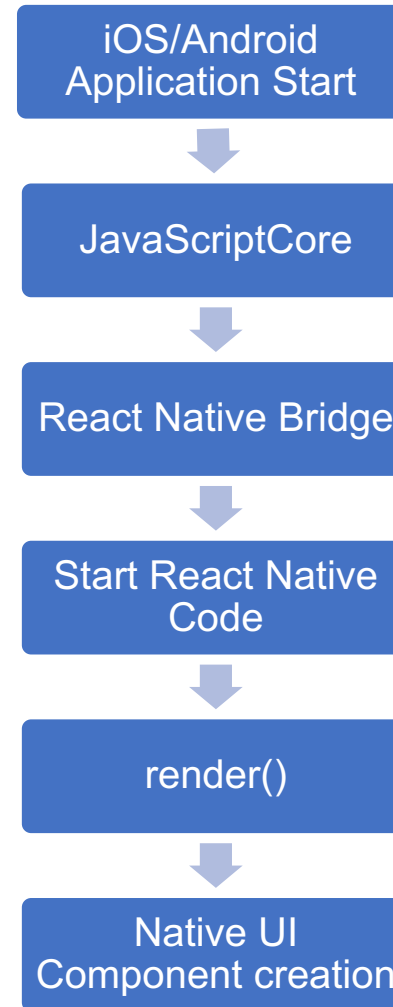
# How does React Native work ?



Source: Bonnie Eisenman – Learning React Native

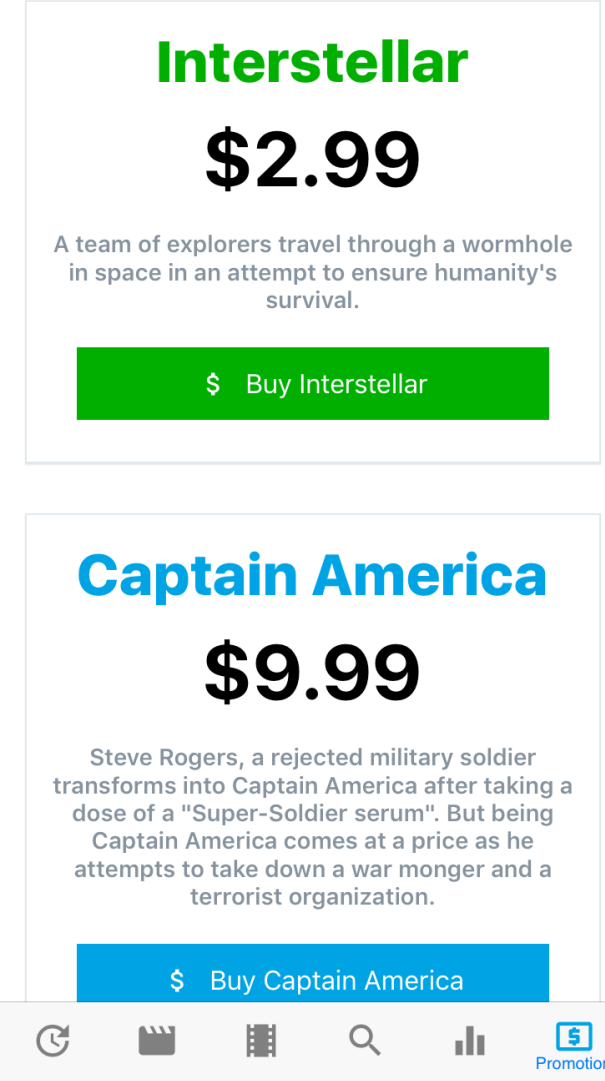
## How does React Native work ? (II.)

```
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  render() {  
    return (  
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      </View>  
    );  
  }  
}
```



# Adding a new screen (Promotion)

- Features
  - New menu item should be named Promotion
  - List all the promotional items (a.k.a which are in sale)
  - Depending on the price of the item assign colors (item cheaper than 4\$ should be marked with green, other should use the default blue color of the application)
  - Screen should have integrated analytics
- Resources
  - API endpoint: /api/promotion
  - Green color code: #00AF00
  - Blue color code: #00A4E4



Source: Bonnie Eisenman – Learning React Native



ReactNative – Deep Dive-2017Mar22-GB-BUD

LET'S CODE

# Building a release app for Android

- Generate a signing key
- Update user's gradle profile to use generated signing key  
\$> vim ~/.gradle/gradle.properties
- Add signing config to generated Android App to  
\$> vim android/app/build.gradle

```
signingConfigs {
  release {
    if (project.hasProperty('MYAPP_RELEASE_STORE_FILE')) {
      storeFile file(MYAPP_RELEASE_STORE_FILE)
      storePassword MYAPP_RELEASE_STORE_PASSWORD
      keyAlias MYAPP_RELEASE_KEY_ALIAS
      keyPassword MYAPP_RELEASE_KEY_PASSWORD
    }
  }
}
```

- Generate the APK  
\$> cd android && ./gradlew assembleRelease
- Test on emulator/device  
\$> react-native run-android --configuration=release

# References

1. [React Native Homepage](#)
2. [React Native GitHub Page](#)
3. [Nuclide IDE](#)
4. [Essential Libraries to use in your React Native App](#)
5. [Dive Into React Native Performance](#)
6. [React Native at Instagram](#)
7. [React Native Custom iOS Components](#)
8. [Writing an Android Component for React Native](#)
9. [Wix Engineering – Building a React Native App for 80 million users](#)
10. [Wix Engineering – Introduction to React Native performance](#)
11. [Frontend Masters – React Native Training](#)
12. [Awesome React Native](#) – USEFUL LIST OF RN RESOURCES

## GitHub Code Repos

1. [ReNT](#) (Proof of Concept) – branch promotions
2. [SimpleOVPApi](#) (backend component)

Thank you!  
Q&A