# Flutter vs React Native

Rossukhon

Growth Session #7 - September 21-22 2017

### Goals

- Learn how to make an app with Flutter
- Flutter and React Native comparison

### Flutter



- SDK to make iOS and Android Apps
- Reactive framework
  - Dart
- Dart language

### Achievements and progress











2017-09-24

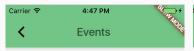
① 13:00:00



Details

Print-at-Home/Mobile printing restrictions apply (72 hours prior to event) Everyone regardless of age required to have ticket NFL bag policy Rain or shine event No refunds or exchanges No audio or video cameras allowed Visa only accepted method of payment 4 ticket limit per person Visit www.gillettestadium.com for prohibited items list Bags of any kind will not be permitted except gallon sized clear freezer bags or authorized clear bags measuring 12" x 12" x 6" and women's clutches not to exceed 7" x 4" x 2" (approximately the size of a hand). Visit www.gillettestadium.com/bagpolicy for more info.













Print-at-Home/Mobile printing restrictions apply (72 hours prior to event) Everyone regardless of age required to have ticket NFL bag policy Rain or shine event No



### Tools

- Flutter SDK
- Any IDE

#### Welcome to Flutter! - https://flutter.io

The Flutter tool anonymously reports feature usage statistics and crash reports to Google in order to help Google contribute improvements to Flutter over time.

Read about data we send with crash reports: https://github.com/flutter/flutter/wiki/Flutter-CLI-crash-reporting

See Google's privacy policy: https://www.google.com/intl/en/policies/privacy/

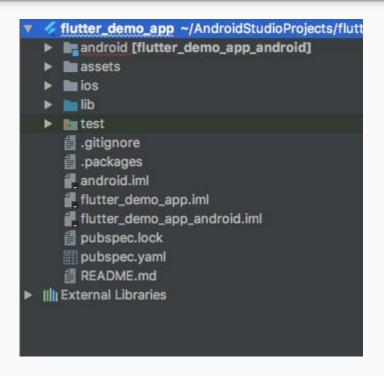
Use "flutter config --no-analytics" to disable analytics and crash reporting.

```
Downloading Material fonts...
                                                      2.45
Downloading package sky engine...
                                                      1.8s
Downloading common tools...
                                                      5.0s
Downloading darwin-x64 tools...
                                                     20.2s
Downloading darwin-x64 tools...
                                                      31.6s
Downloading android-arm-profile/darwin-x64 tools...
Downloading android-arm-release/darwin-x64 tools...
Downloading android-x86 tools...
                                                     13.85
Downloading android-x64 tools...
                                                     17.4s
Downloading android-arm tools...
                                                      7.6s
Downloading android-arm-profile tools...
                                                      6.2s
Downloading android-arm-release tools...
                                                      6.55
Downloading ios tools...
                                                     21.45
Downloading ios-profile tools...
                                                     17.5s
Downloading ios-release tools...
                                                     23.7s
                                                      0.65
Downloading Gradle Wrapper...
[ ] Flutter (on Mac OS X 10.12.6 16G29, locale en-TH, channel master)

    Flutter at /Users/rossukhon/AndroidStudioProjects/flutter
```

Framework revision 2958d7d0fc (25 minutes ago), 2017-09-21 09:33:01 +0200

### Project structure and files



```
flutter_demo_app ~/AndroidStudioProjects/flutt
android [flutter_demo_app_android]
  assets
▶ lios
    lib
  ▶ ■ api
     component
     model
     screen.
     const.dart
     main.dart
▶ test
  gitignore
  a.packages
  android.iml
  flutter_demo_app.iml
  # flutter_demo_app_android.iml
  pubspec.lock
  pubspec.yaml
  信 README.md
|| External Libraries
```

### Project structure and files - pubspec.yaml

```
name: flutter_demo_app
description: A new Flutter project.
dependencies:
  flutter:
    sdk: flutter
  http: '0.11.3+14'
dev_dependencies:
  flutter_test:
    sdk: flutter
# For information on the generic Dart part of this file, see the
# following page: https://www.dartlang.org/tools/pub/pubspec
# The following section is specific to Flutter.
flutter:
  # The following line ensures that the Material Icons font is
  # included with your application, so that you can use the icons in
  # the Icons class.
  uses-material-design: true
  # To add assets to your application, add an assets section, like this:
  assets:
    - assets/calendar.png
    - assets/clock.png
```

### Widgets

#### **Basic Widgets**

Widgets you absolutely need to know before building your first Flutter app. See more widgets in the Flutter widget catalog.



Container A convenier

A convenience widget that combines common painting, positioning, and sizing...

Documentation



Row Layout a list of child

widgets in the horizontal direction.



Column
Layout a list of child widgets in the vertical direction.

Documentation



Image
A widget that displays

an image.

Documentation

Documentation



A run of text with a single style.

Documentation



Icon

A material design icon.

Documentation

BUTTON

#### RaisedButton

A material design raised button. A raised button consists of a rectangular piece of... Documentation



#### Scaffold A

Implements the basic material design visual blayout structure. This class provides APIs fo... a

Documentation, Samples



#### Appbar

Samples

A material design app bar. An app bar consists of a toolbar and potentially other... Documentation,

### Two types of widget

- 1. Stateless widget
- 2. Stateful widget

### Widgets

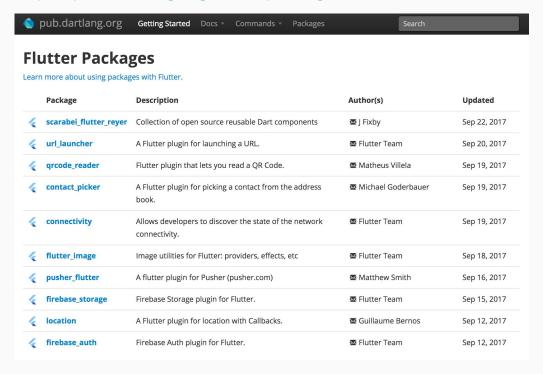
```
@override
void initState() {
  super.initState();
 _getEvents();
@override
Widget build(BuildContext context) {
 if (_events == null) {
    return new Scaffold(
      appBar: widget.appBar,
     body: new Center(
        child: new CircularProgressIndicator(),
  } else {
    return new Scaffold(
      appBar: widget.appBar,
      body: new ListView.builder(
        itemCount: _events.length,
        itemBuilder: (BuildContext context, int index) {
          return new EventFeedItem(event: _events[index]);
        },
```

### main.dart

```
import 'package:flutter/material.dart';
import 'const.dart';
import 'screen/home.dart';
import 'screen/event_feed.dart';
void main() {
 FlutterDemoApp app = new FlutterDemoApp();
 runApp(app);
final ThemeData _flutterDemoAppTheme = new ThemeData(
 brightness: Brightness.light,
 primaryColor: appColors['green'],
 accentColor: appColors['green'],
 accentColorBrightness: Brightness.dark
class FlutterDemoApp extends StatelessWidget {
 @override
 Widget build(BuildContext context) {
   return new MaterialApp(
     title: 'Flutter Demo',
     theme: _flutterDemoAppTheme,
     home: new HomeScreen(title: 'Flutter Demo Home Page'),
     routes: <String, WidgetBuilder> {
        '/feed': (BuildContext context) => new EventFeedScreen(title: 'Events')
```

### Dependencies

### https://pub.dartlang.org/flutter/packages/



```
name: flutter_demo_app
description: A new Flutter project.

dependencies:
   flutter:
    sdk: flutter
   http: '0.11.3+14'

dev_dependencies:
   flutter_test:
    sdk: flutter
```

flutter packages get

## Thanks!

**Contact Nimbl3** 

hello@nimbl3.com

399 Sukhumvit Road, Interchange 21 Klongtoey nua, Wattana Bangkok 10110

20th Floor, Central Tower 28 Queen's Road Central, Hong Kong

nimbl3.com

