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Roll No: CE002

Id: 20CEUOS029

Subject: SDP

Lab: 7

Tutorial-1

```dart
import 'package:flutter/material.dart';

void main () => runApp(MaterialApp(
  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      //An app bar consists of a toolbar and potentially other widgets, such as
a TabBar and a FlexibleSpaceBar.
      // App bars typically expose one or more common actions with IconButtons
      // which are optionally followed by a PopupMenuButton for less
      // common operations (sometimes called the "overflow menu").
      appBar: AppBar(
        //A run of text with a single style.
        // The Text widget displays a string of text with single style.
        // The string might break across multiple lines or might all be
        // displayed on the same line depending on the layout constraints.
        title: Text(
          'Hello From Megha And Princy'),
        centerTitle: true,
        backgroundColor: Colors.purple,
      ),
      body: Center(
        child: Image(
          //Fetches an image from an AssetBundle, having determined the exact
image to use based on the context.
          // Given a main asset and a set of variants, AssetImage chooses the most
appropriate asset for the current context,
          // based on the device pixel ratio and size given in the configuration
passed to resolve.
          image: AssetImage('assets/sub_assets/f1.jpg'),
        ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.purple,
      ),
    );
  }
}
```

11:52
DEBUG
Hello From Megha And Princy
Click

```dart
import 'package:flutter/material.dart';

void main () => runApp(MaterialApp(
  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      appBar: AppBar(
        title: Text(
            'ICON WIDGET APP'),
        centerTitle: true,
        backgroundColor: Colors.purple,
      ),
      body: Center(
        //A graphical icon widget drawn with a glyph from a font described in an
        // IconData such as material's predefined IconDatas in Icons.
        // Icons are not interactive. For an interactive icon, consider material's
IconButton.
        // There must be an ambient Directionality widget when using Icon.
        // Typically this is introduced automatically by the WidgetsApp or
MaterialApp.
        child: Icon(
          Icons.account_balance_wallet_rounded,
          color: Colors.purple,
          size: 80.0,
        ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.purple,
      ),
    );
  }
}
```

ICON WIDGET APP
DEBUG
Click

```dart
import 'package:flutter/material.dart';

void main () => runApp(MaterialApp(
  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      appBar: AppBar(
        title: Text(
            'BUTTONS WIDGET APP'),
        centerTitle: true,
        backgroundColor: Colors.green,
      ),
      body: Center(
        child: ElevatedButton(
          child: Text('Button'),
          onPressed: () { },
          //ElevatedButton.styleFrom, which converts simple values into a
          //ButtonStyle that's consistent with ElevatedButton's defaults.
          style: ElevatedButton.styleFrom(
            primary: Colors.greenAccent,
            //Creates insets with symmetrical vertical and horizontal offsets.
            padding: EdgeInsets.symmetric(horizontal: 50,vertical: 50),
            textStyle: TextStyle(
              fontSize: 40,
              fontWeight: FontWeight.bold
            )),
        ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.green,
      ),
    );
  }
}
```

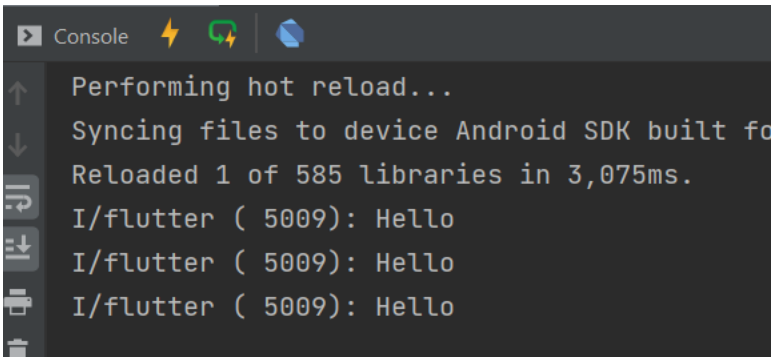
BUTTONS WIDGET APP
Button
Click

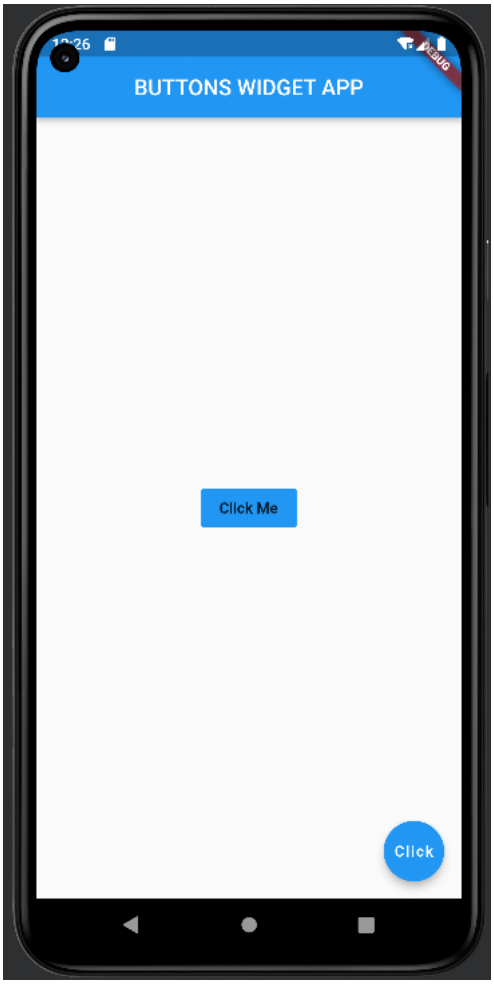
```dart
import 'package:flutter/material.dart';

void main () => runApp(MaterialApp(
  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      appBar: AppBar(
        title: Text(
            'BUTTONS WIDGET APP'),
        centerTitle: true,
        backgroundColor: Colors.blue,
      ),
      body: Center(
        child: FlatButton(
          onPressed: () { print('Hello'); },
          child: Text('Click Me'),
          color:Colors.blue,
        ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.blue,
      ),
    );
  }
}
```


Console
Performing hot reload...
Syncing files to device Android SDK built fo
Reloaded 1 of 585 libraries in 3,075ms.
I/flutter (5009): Hello
I/flutter (5009): Hello
I/flutter (5009): Hello


BUTTONS WIDGET APP
Click Me
Click

```dart
import 'package:flutter/material.dart';

void main () => runApp(MaterialApp(
  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      appBar: AppBar(
        title: Text(
            'BUTTONS WIDGET APP'),
        centerTitle: true,
        backgroundColor: Colors.blue,
      ),
      body: Center(
        //A Material Design icon button
        // An icon button is a picture printed on a
        // Material widget that reacts to touches by filling with color (ink).
        // Icon buttons are commonly used in the AppBar.actions field,
        // but they can be used in many other places as well
        // If the onPressed callback is null, then the button will be
        // disabled and will not react to touch.
        // Requires one of its ancestors to be a Material widget.
        // The hit region of an icon button will, if possible,
        // be at least kMinInteractiveDimension pixels in size,
        // regardless of the actual iconSize, to satisfy the touch target size
        // requirements in the Material Design specification.
        // The alignment controls how the icon itself is positioned within the
hit region.
        child: IconButton(
          icon:Icon(
            Icons.mail_outline_sharp,
            size : 40.0,
          ),
         tooltip: 'Send Mail Me',
         onPressed:(){
            print('IconButton');
          }
       ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.blue,
      ),
    );
  }
}
```

BUTTONS WIDGET APP
DEBUG
Send Mail Me
Click

```dart
import 'package:flutter/material.dart';

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  home: HomeScreen(),
));

class HomeScreen extends StatelessWidget {
  //const HomeScreen({Key? key}) : super(key: key);

  @override
  Widget build(BuildContext context) {
    return Scaffold(
      appBar: AppBar(
        title: Text(
            'BUTTONS WIDGET APP'),
        centerTitle: true,
        backgroundColor: Colors.blue,
      ),
      body: Center(
        //A widget that determines the ambient directionality of text
        // and text-direction-sensitive render objects.
        // For example, Padding depends on the Directionality to
        // resolve EdgeInsetsDirectional objects into absolute EdgeInsets
objects.
        child: Directionality(
          //Represents directionality of text.
          // In most cases, it is preferable to use bidi_formatter.dart, which
provides
          // bidi functionality in the given directional context, instead of using
bidi_utils.dart directly.
          textDirection: TextDirection.rtl,
        child: TextButton.icon(
          icon: Icon(
            Icons.photo_camera,
            color:Colors.greenAccent,
            size: 50.0,
          ),
          label: Text(
            "Gallery",
            style: TextStyle(
              color: Colors.black,
              fontSize: 40.0,
              letterSpacing: 2.0,
              backgroundColor: Colors.redAccent,
            ),
            textAlign: TextAlign.start,
         ),
        onPressed: () {},
       ),
      ),
      ),
      floatingActionButton: FloatingActionButton(
        onPressed: () { },
        child: Text('Click'),
        backgroundColor: Colors.blue,
      ),
```
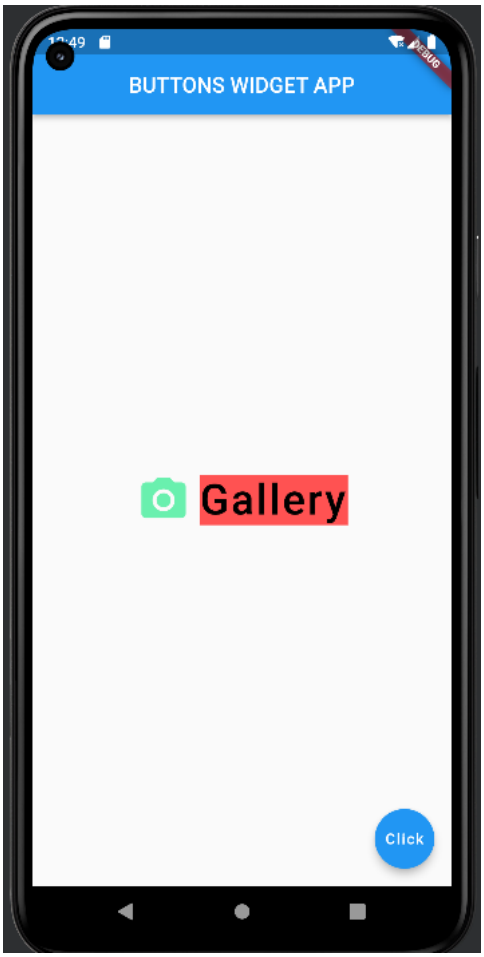

```
    );
  }
}
```


BUTTONS WIDGET APP
Gallery
Click