

Experiment - 5

Aim: To apply navigation, routing and gestures in Flutter App

Theory:

Navigation and routing are some of the core concepts of all mobile application, which allows the user to move between different pages. We know that every mobile application contains several screens for displaying different types of information. For example, an app can have a screen that contains various products. When the user taps on that product, immediately it will display detailed information about that product.

In Flutter, the screens and pages are known as routes, and these routes are just a widget. In Android, a route is similar to an Activity, whereas, in iOS, it is equivalent to a ViewController.

In any mobile app, navigating to different pages defines the workflow of the application, and the way to handle the navigation is known as routing. Flutter provides a basic routing class `MaterialPageRoute` and two methods `Navigator.push()` and `Navigator.pop()` that shows how to navigate between two routes. The following steps are required to start navigation in your application.

Step 1: First, you need to create two routes.

Step 2: Then, navigate to one route from another route by using the `Navigator.push()` method.

Step 3: Finally, navigate to the first route by using the `Navigator.pop()` method.

Code:

main.dart

```
class MyHomePage extends StatelessWidget {  
  @override  
  Widget build(BuildContext context) {  
    return Scaffold(  
      appBar: AppBar(  
        backgroundColor: Colors.white,  
        elevation: 0,  
        title: Row(  
          children: [  
            Expanded(  
              child: Container(  
                height: 40,              ),  
            ),  
          ],  
        ),  
      ),  
    );  
  }  
}
```

[illegible]

```

        Icons.favorite_border,
        color: Colors.black,
      ),
      SizedBox(width: 16),
      Icon(
        Icons.shopping_cart,
        color: Colors.black,
      ),
    ],
  ),
),
body: Column(
  crossAxisAlignment: CrossAxisAlignment.start,
  children: [
    SizedBox(height: 8),
    Container(
      height: 50,
      child: ListView(
        scrollDirection: Axis.horizontal,
        children: [
          CategoryItem(image: 'assets/men_categories.jpg', name: 'Men'), // Replace with
category image
          CategoryItem(image: 'assets/women_categories.png', name: 'Women'), // Replace with
category image
          CategoryItem(image: 'assets/kids_categories.png', name: 'Kids'), // Replace with
category image
          CategoryItem(image: 'assets/bags.png', name: 'Accessories'),
          CategoryItem(image: 'assets/foots.png', name: 'Footwear'),
        ],
      ),
    ),
    SizedBox(height: 16),
    Container(
      width: double.infinity,
      padding: EdgeInsets.symmetric(horizontal: 16, vertical: 8),
      decoration: BoxDecoration(
        gradient: LinearGradient(
          begin: Alignment.topLeft,
          end: Alignment.bottomRight,
          colors: [Color(0xFFFFCDB1), Color(0xFFE99A6B)],

```

```
,  
    borderRadius: BorderRadius.circular(12),  
  ),  
  child: Text(  
    'Hurry up! Sale is live!',  
    style: TextStyle(  
      fontSize: 24,  
      fontWeight: FontWeight.bold,  
      color: Colors.white,  
    ),  
  ),  
),  
SizedBox(height: 16),  
ClipRRect(  
  borderRadius: BorderRadius.circular(16),  
  child: Image.asset(  
    'assets/sale_image.jpg', // Replace with your sale image asset  
    fit: BoxFit.cover,  
    height: MediaQuery.of(context).size.height * 0.5, // Adjust the height as needed  
    width: double.infinity,  
  ),  
),  
SizedBox(height: 16),  
Container(  
  height: MediaQuery.of(context).size.height * 0.1, // Set to the same height as the "Hurry  
up!" container  
  margin: EdgeInsets.symmetric(horizontal: 16),  
  child: ListView(  
    scrollDirection: Axis.horizontal,  
    children: [  
      PaymentBox(  
        logo: 'assets/paytm.png', // Replace with Paytm logo asset  
        message: 'Pay with Paytm\nfor exciting discounts!',  
      ),  
      PaymentBox(  
        logo: 'assets/sbi.png', // Replace with UPI logo asset  
        message: 'Get discounts on\nUPI payments!',  
      ),  
      // Add more payment options as needed  
    ],
```

```

    ),
  ),
],
),
bottomNavigationBar: BottomNavigationBar(
  items: [
    BottomNavigationBarItem(
      icon: Icon(Icons.store),
      label: 'Switch Stores',
    ),
    BottomNavigationBarItem(
      icon: Icon(Icons.home),
      label: 'Explore',
    ),
    BottomNavigationBarItem(
      icon: Icon(Icons.trending_up),
      label: 'TRENDin',
    ),
    BottomNavigationBarItem(
      icon: Icon(Icons.category),
      label: 'Categories',
    ),
    BottomNavigationBarItem(
      icon: Icon(Icons.account_circle),
      label: 'Account',
    ),
  ],
  selectedItemColor: Colors.black,
  unselectedItemColor: Colors.black,
  showUnselectedLabels: true,
  type: BottomNavigationBarType.fixed,
  onTap: (int index) {
    // Handle bottom navigation item clicks
    switch (index) {
      case 0:
        // Handle 'Switch Stores' action
        break;
      case 1:
        // Handle 'Explore' action
        Navigator.push(

```

```
        context,
        MaterialPageRoute(builder: (context) => Explore()),
    );
    break;
case 2:
    // Handle 'TRENDin' action
    break;
case 3:
    // Navigate to the category section page
    Navigator.push(
        context,
        MaterialPageRoute(builder: (context) => CategorySection()),
    );
    break;
case 4:
    // Handle 'Account' action
    Navigator.push(
        context,
        MaterialPageRoute(builder: (context) => AccountPage()),
    );
    break;
default:
    }
    },
    ),
    );
}
```



