# CS 399: Mobile Application Development Summer 2020

# Homework-07

Due Wednesday June 24 30 Points Total

# Hanyue Wang CS-399(1204-2860) SPECIAL TOPICS 002 - MOBILE APPLICATION DEVELOPMENT

#### **Deliverables:**

- 1) Complete Android project files in a zip folder. Name your folder using the naming convention like: lastname\_firstname\_CS399\_hw7\_Dice.ZIP. Use Android Studio File menu and select Export to Zip File. Do not zip the project file directly from the project directory.
- 2) Include snapshots of the following artifacts as displayed in the Android Studio. Paste the snapshots in PDF file named *lastname firstname CS399 hw7 Snapshots.PDF*.
  - a. The Dart file under the *lib* directory. Expand all the code to show the complete Dart code including the *import* instructions.

```
dicee-flutter [~/AndroidStudioProjects/flutter_app/dicee-flutter] - .../lib/main.dart

⟨ dicee-flutter ⟩ ■ lib ⟩ ⟨ main.dart
                                                 □ AOSP on IA Emulator (mobile) ▼ | 🦿 main.dart ▼ | 🛌 🎂 🖫 👍 📮 👸
                                                                              pubspec.yaml × 🗂 dice1.png × 🗂 dice6.png
   ■ Project ▼
                            ⊕ ÷ 
                                             README.md × main.dart ×
Resource Manager
                                              1
                                                    import 'dart:math';
    dicee-flutter ~/AndroidStudioProjed
                                                     import 'package:flutter/material.dart';
     ▶ iii .dart_tool
     ▶ Is .idea
                                                    void main() {
                                              4
     android
                                              5
                                                       return runApp(
     ▶ 🗽 build
                                              6
                                                         MaterialApp(
     images
                                                         - home: Scaffold(
1: Project
     ios 🗎
                                              8
                                                             backgroundColor: Colors.pink[100],
     ▼ 📄 lib
                                             9
                                                             appBar: AppBar(
                                                             -title: Text('Pink Dicee'),
          main.dart
                                             11
                                                             backgroundColor: Colors.pink[200],
        agitignore.
                                                             ), // AppBar
                                            12
        .metadata
                                            13
                                                           body: DicePage(),
        .packages
                                             14
                                                           ), // Scaffold
        pubspec.lock
                                             15
                                                         ), // MaterialApp
        m pubspec.yaml
                                            16
        README.md
                                            17
     III External Libraries
                                            18
     Scratches and Consoles
                                             19
                                                   class DicePage extends StatefulWidget {
                                             20
                                                       @override
                                             21 👏
                                                       _DicePageState createState() => _DicePageState();
                                             22
                                            23
                                                     class _DicePageState extends State<DicePage> {
                                            24
                                            25
                                                       int DN1 = 1;
Z: Structure ★ 2: Favorites
                                            26
                                                       int DN2 = 1;
                                            27
                                                       int DN3 = 1;
                                            28
                                                       int DN4 = 1:
                                                       int DN5 = 1;
                                             29
                                             30
                                            31
                                                       void changeDN(){
                                                         setState(() {
                                            32
                                            33
                                                           DN1 = Random().nextInt(6) + 1;
                                             34
                                                           DN2 = Random().nextInt(6) + 1;
                                                           DN3 = Random().nextInt(6) + 1;
                                             35
                                                           DN4 = Random().nextInt(6) + 1;
                                             36
```

**b.** The Android Studio Project Pane showing any directories and components that you have added/changed for your application. Expand android, images, ios and lib directories to show all application components.

#### Android:



## **Images:**

- images
  - 🛃 dice1.png
  - dice2.png
  - dice3.png
  - dice4.png
  - dice5.png
  - dice6.png

## IOS:

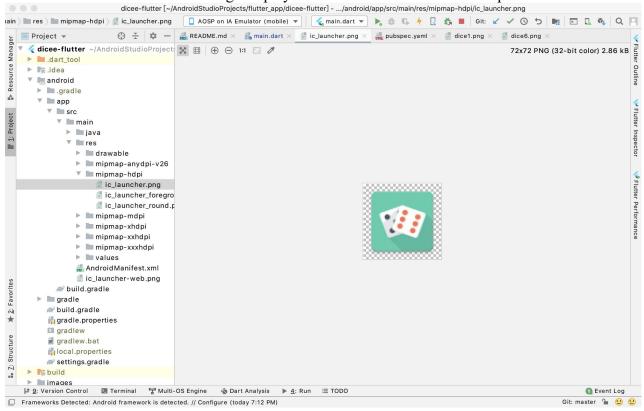
- ▼ 🗎 ios
  - ▼ Flutter
    - AppFrameworkInfo.plist
    - Debug.xcconfig
    - flutter\_export\_environment.sh
    - Generated.xcconfig
    - a Release.xcconfig
  - ▼ Runner
    - Assets.xcassets
      - Applcon.appiconset
      - Launchlmage.imageset
    - ▼ Base.lproj
      - LaunchScreen.storyboard
      - Main.storyboard
      - a AppDelegate.h
      - a. AppDelegate.m
      - GeneratedPluginRegistrant.h
      - 🚛 Generated Plugin Registrant.m
      - Info.plist
      - 🚛 main.m
  - ▼ Runner.xcodeproj
    - project.xcworkspace
    - xcshareddata
      - project.pbxproj
  - Runner.xcworkspace
    - xcshareddata
      - description of the contents.xcworkspacedata

## Lib:

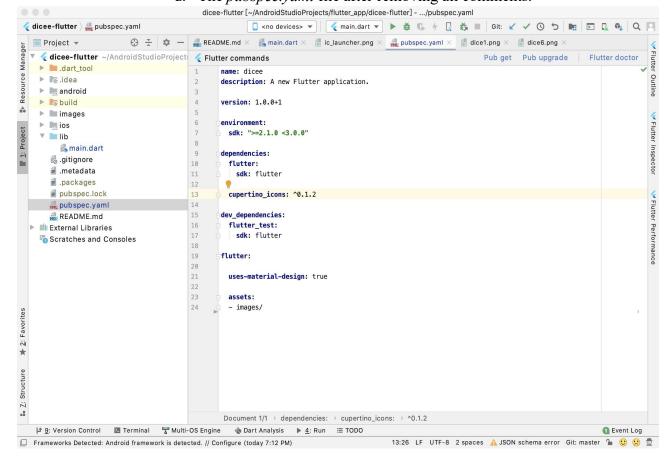
```
dicee-flutter [~/AndroidStudioProjects/flutter_app/dicee-flutter] - .../lib/main.dart

⟨ dicee-flutter ⟩ ■ lib ⟩ 
⟨ main.dart
                                            ☐ AOSP on IA Emulator (mobile) ▼
                                                                           ⊕ <u>÷</u> ¢ −
                                          README.md × main.dart × pubspec.yaml × dice1.png × dice6.png
                                                                                                                                                           Flutter Outline
   🔻 🧹 dicee-flutter ~/AndroidStudioProject:
                                                import 'dart:math';
                                                 import 'package:flutter/material.dart';
    ▶ ■ .dart_tool
    ▶ 💽 .idea
                                           4
                                                 void main() {
    android 🗎
                                                   return runApp(
    ▶ 🗽 build
                                                     MaterialApp(
₩.
    ▶ images
                                                                                                                                                           Flutter Inspector
                                                     -home: Scaffold(
    ios 🗎
                                          8
                                                         backgroundColor: Colors.pink[100],
    ▼ lib
                                           9
                                                         appBar: AppBar(
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       .metadata
                                          13
                                                       body: DicePage(),
       packages .
                                          14
                                                       ), // Scaffold
       pubspec.lock
                                                                                                                                                           Flutter Performance
                                          15
                                                     ), // MaterialApp
       nubspec.yaml
                                          16
                                                   ):
       README.md
                                          17
    III External Libraries
                                          18
     Scratches and Consoles
                                          19
                                                 class DicePage extends StatefulWidget {
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                                          21 👏
                                                   _DicePageState createState() => _DicePageState();
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                                                   int DN1 = 1;
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                                                   int DN3 = 1;
                                                   int DN4 = 1;
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                                          34
                                          35
                                                       DN3 = Random().nextInt(6) + 1;
                                                       DN4 = Random().nextInt(6) + 1;
                                          36
                                                    🔰 9: Version Control 🔼 Terminal 📅 Multi-OS Engine
                                                                                                                                                Event Log
Frameworks Detected: Android framework is detected. // Configure (today 7:12 PM)
                                                                                                               1:20 LF UTF-8 2 spaces Git: master 🦫 🙂 🙁 👨
```

c. Show at least one android *mipmap* image and one iOS *icon-App* image displayed in the Android Studio Editor pane.



d. The pubspec.yaml file after removing all comments.



e. View of your application when it is run on the *Pixel 2* or *Nexus 6* virtual device.



3) View of Android Pixel 2 or Nexus 6 home page including display of your app icon.

