

COSP230 – Final Project Assignment

After learning how to implement different features for an Android app, you will now get to create your own app! It is totally up to you what you want your app to do, but keep in mind you only have two weeks to do it...and you have to follow the rules given in this document.

The final project is worth 100 points. There are a set of required features and points that must be completed in all final projects. After that, you may choose any combination of optional features up to the maximum amount of points. **There will be no extra credit given on the final project.**

- Required Features are worth 50 points
- Optional Features are worth 50 points
- Each optional feature can only be used once.
- You must state clearly in your documents what you want considered for your optional features.
- You cannot use all the optional features listed to get extra points.

Required Features – 50 points

10 points – Splash screen with either animation or music (Chapter 6)

15 points – At least 3 “screens”/”major features”

Basic “one screen” apps and “trivial” screens with text only will not be accepted. **Each screen must have a minimum of two items or activities on it (such as a picture, music, animation, action button, etc).** Screens should incorporate a variety of backgrounds, text, colors, and fonts as appropriate. **Each of the three screens will be worth 5 points.** Grade scale: 5 (Excellent), 3 (Good), or 1 (Poor).

10 points – Design and Presentation

Your app needs to be well designed and polished. This includes everything from following interface guidelines to good layout to good fonts and colors. Your app should also be able to handle rotation and appear professional.

Grade scale: 10 (Great); 8 (Good); 6 (Reasonable); 4 (Okay); 2 (Poor); 0 (Unusable)

10 points - Final Project Documentation

Use Final Project Documentation form and submit by due date

- 1) Major Features/Screen – Include short descriptions of each (at least 3 of these)
- 2) Optional Features – Include specific directions on how to test/demo each feature.
- 3) Screen shots show each result of each option on each screen
- 4) Testing Methodologies – What did you do to test the app?
- 5) Usage – Include any special information needed to run the app (passwords, etc).
- 6) Lessons Learning – What did you learn about mobile development during this process?

5 points – Either Screen Shot of all screens or APK package (see Chapter 12)

Optional Features – 50 points maximum

NOTE: You cannot select options that would be worth more than 50 points. You can only use an optional feature once. You cannot use the same feature on multiple screens. You can have more than 3 screens, but any “extra” screen will be graded only as part of the former screen that launched it.

5 points – Custom icon launcher (Chapter 4) that also appears on each screen of the app. Grade scale: 5 (Excellent), 3 (Good), 1 (Poor)

5 points – Use of Timer feature (can only be used once; use in Splash screen does not count). Grade scale: 5 (Excellent), 3 (Good), 1 (Poor)

10 points – Use of Pause/Play feature (Chapter 6 – can only be used once)

10 points – Radio Button feature (Chapter 4) with **at least 3 buttons**. After item is selected, the action must include either a calculation, a picture change, a web site launch, music, animation, or progression to another screen.

10 points – List selection feature (Chapter 5) with **at least 4 items**. After item is selected, the action must include either a calculation, a picture change, a web site launch, music, animation, or progression to another screen.

10 points – Gridview feature (Chapter 6) with **at least 6 items**. After item is selected, the action must include either a calculation, a picture change, a web site launch, music, animation, or progression to another screen.

10 points – Use of DatePicker feature (Chapter 8). After item is selected, the action must include either a calculation, a picture change, a web site launch, music, animation, or progression to another screen.

5 points – Use of TimePicker feature (Chapter 8) used with above DatePicker feature and both results appear at the same time

The following optional features are worth more because they were not covered in class:

Grading scale: 15 (Excellent), 12 (Good), 9 (Reasonable), 6 (Has issues), 3 (Poor), 0 (Does not work)

15 points – Use of Persistent data (Chapter 11)

15 points – GPS/Location awareness (Google Maps or Waze). Your app uses the location of the user in some meaningful way. Simply displaying a Google map with your location and no modification is not acceptable.

15 points – Camera use. Your app uses the camera to take a picture and then uses it directly in the app. The image must be saved, either locally or remotely.

15 points – Microphone/Audio management. Your app uses the microphone to record audio and has playback capability. Simply playing sounds when a button is pressed does not count.

15 points – Open shared activity/features. Your app interacts with another activity or feature of the device (not previously learned, like the calendar, timer, or web browser) by passing data in a reasonable way (create an email to send, share a text message, etc.).