COSC 302

Professor Emrich

2/27/2020

Member names: Tyler Lovett and Braxton Haynie

Project idea:

For our project, we have an interest in iOS development so we wanted to make an app for our iPhones. Many to-do list apps either do not have all of the desired features or cost money in the form of a monthly subscription, which isn't a good option as broke college students. Our idea is to make a to-do list app for iOS that not only has the basic features that every to-do app should have, as well as some features that would make it more useful to us personally, and maybe add some of the features that other companies are charging for.

Tentative feature list:

We are going to start by implementing the basics and later add other features. The must-have features that we are going to add include: multiple lists, due dates, recurring tasks, reminders, push notifications, sub-tasks for projects, attach objects (ex. Contacts, files, photos) to tasks or projects, daily list. Other features that are more of stretch goals include a dark mode, a widget, priorities on each of the tasks, snoozing tasks.

Planned approach:

Neither of us has any experience in swift, so the first thing that will need to be done is getting our footing in using swift. After that, we will create an object for tasks and lists. To store all of the lists, we plan on using a set to ensure that each set only occurs once and because they are very quick on accessing. Each list will have an array of the tasks that are sorted by the date that they want to be reminded by, or the due date if the remind date is not specified. Using apple's Xcode, we can use SwiftUI which makes user interfaces much easier to make, and also the program runs live on an iPhone emulator and you can see the changes as you make them and you don't have to port it to your phone every time.

Concerns:

As of right now, the only concerns are learning Swift and making a GUI. Some of our concerns are relieved by the fact that it does not seem too hard to make a GUI in Swift, but making a pretty GUI is another concern by itself.