

Stress & Anxiety Self Management Application



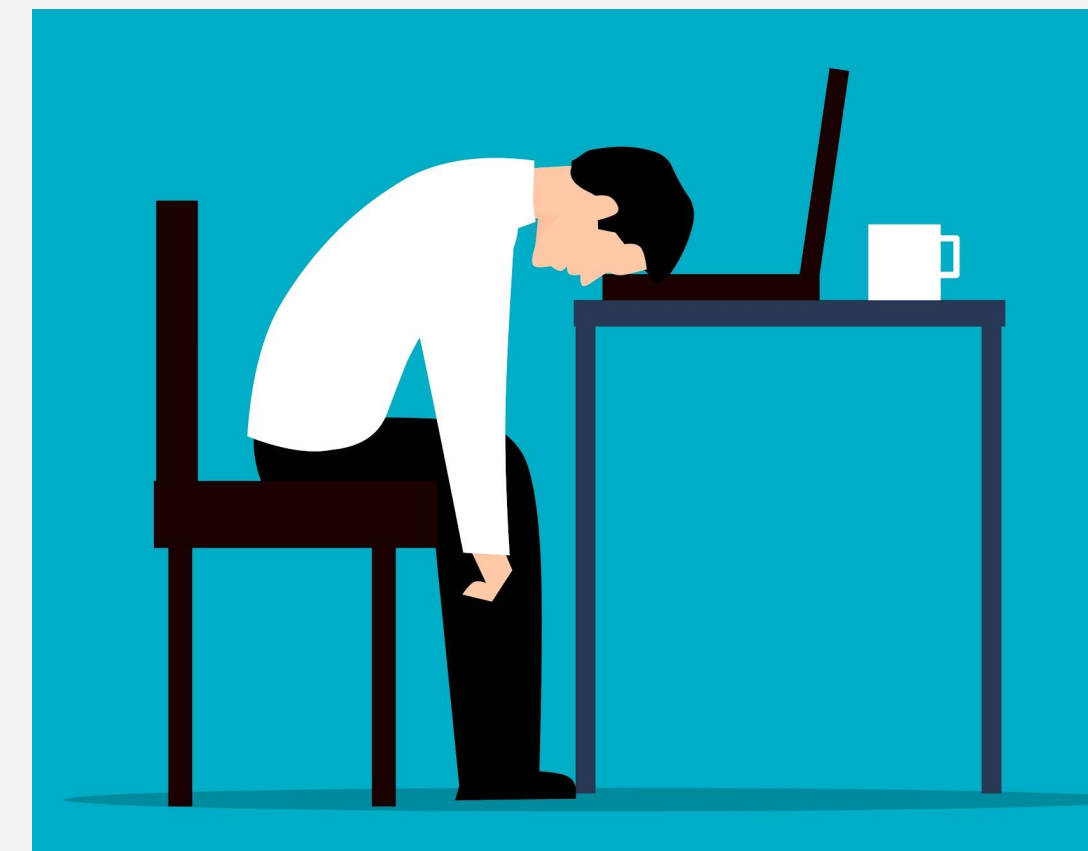
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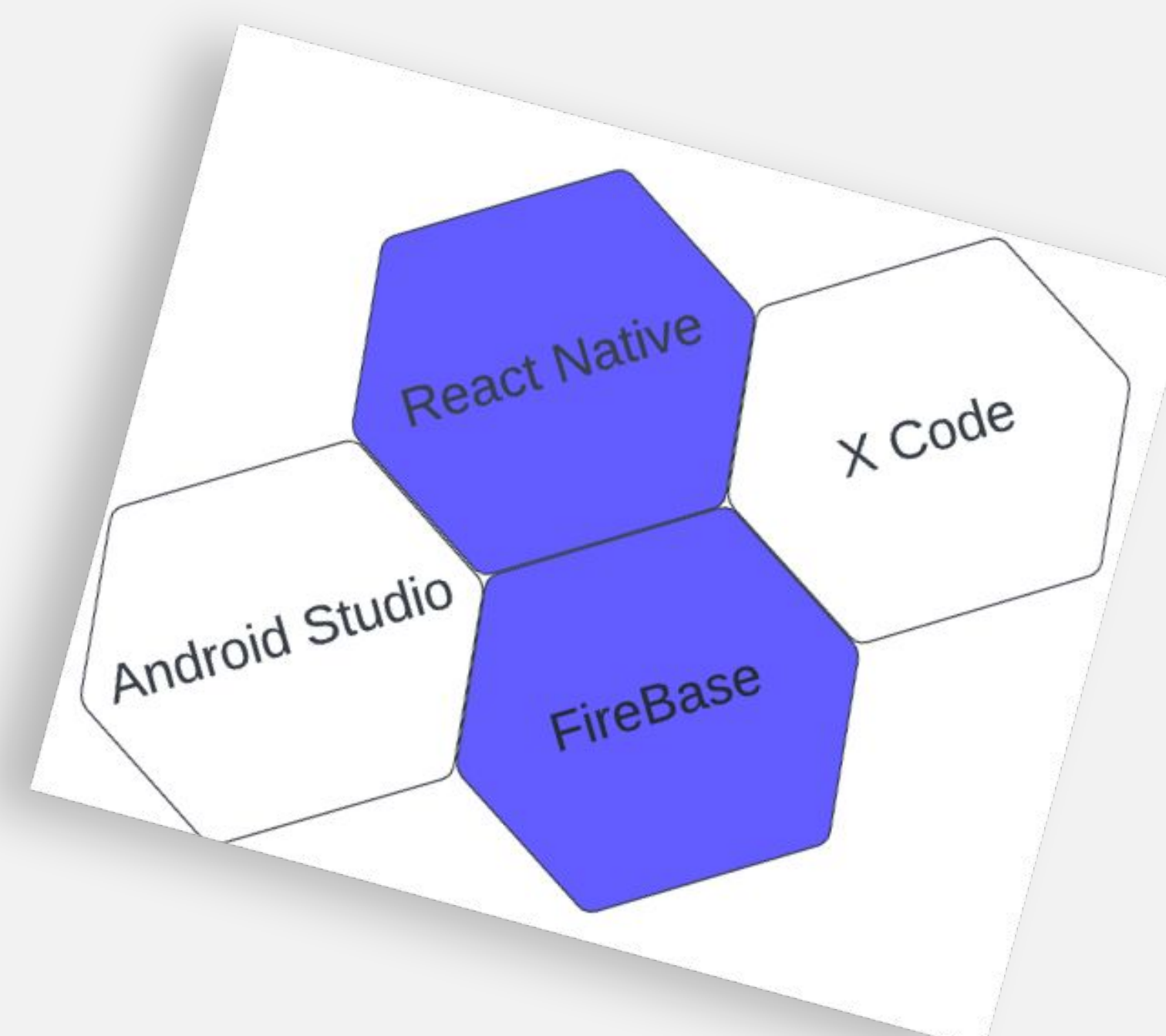
INTRODUCTION

HOW RU.life is a self-management application that aids in handling the feelings of stress and anxiety that many people experience in their lives. The stress we feel is shaped by dispositional factors, such as genetics and personality, and it is also heavily influenced by several contextual factors such as environmental variables, societal context, physical fitness, and work and leisure time. [1]



This application provides its users an outlet and several tools to combat their stress and anxiety. Its goal is to first evaluate how the user is feeling and then offer healthy practices that help eliminate these feelings. HOW RU provides assistance in managing ones mental health on the spot, which in turn guides and helps the user develop constructive coping mechanisms.

CURRENT SYSTEM

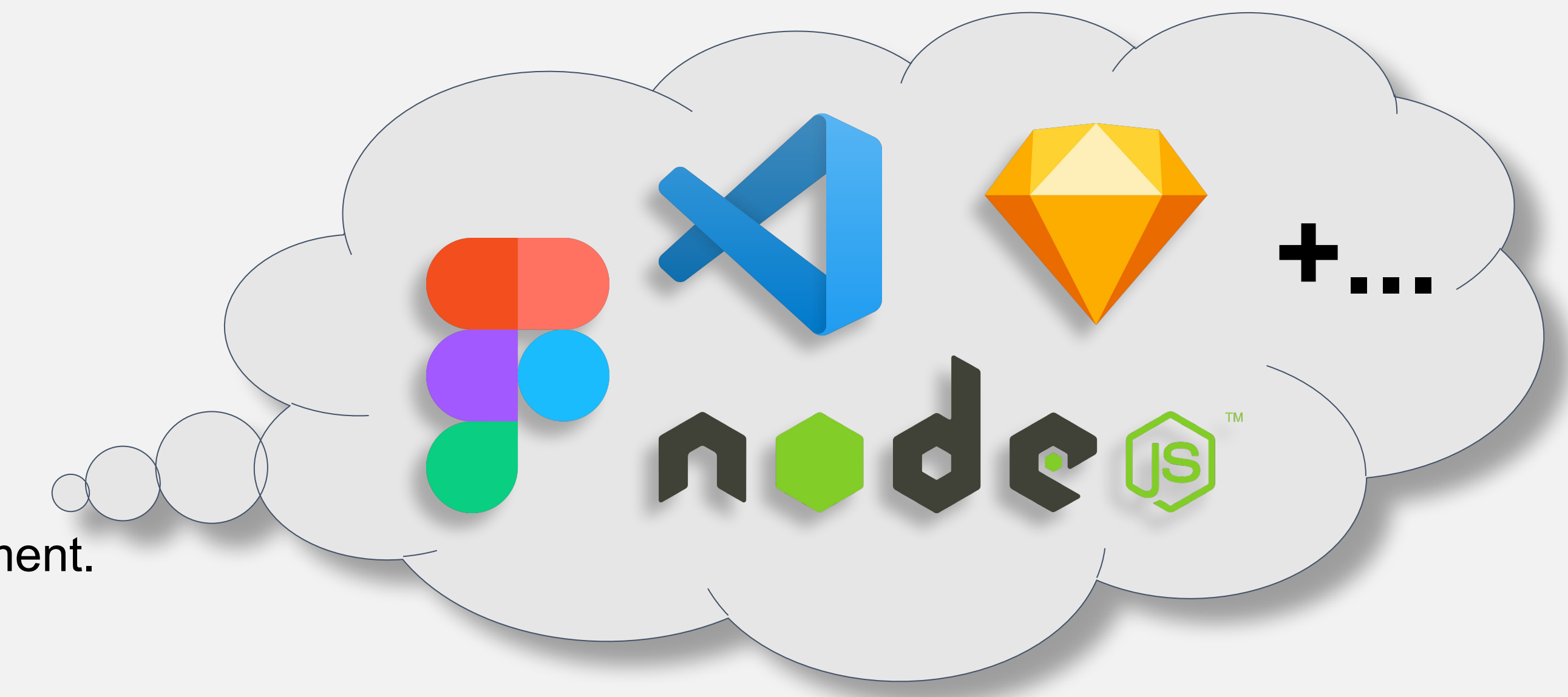


Currently the app runs with React-Native and the React-Native-CLI; this allows for both the IOS and Android development of the application. The app then uses Firebase as the current database, though the future plan is to fully convert to MongoDB.

SYSTEM DESIGN

The interface design for the application was created using Figma. Our application also uses Visual Studio, GitHub, Java and Javascript as well to support the front-end development.

For backend development, the web application framework Express was used for building RESTful API's. Node.JS was our backend JavaScript Run time environment. While Firebase is currently storing user information, a transition to MongoDB is necessary due to unforeseen circumstances involving FIU.



OBJECT DESIGN

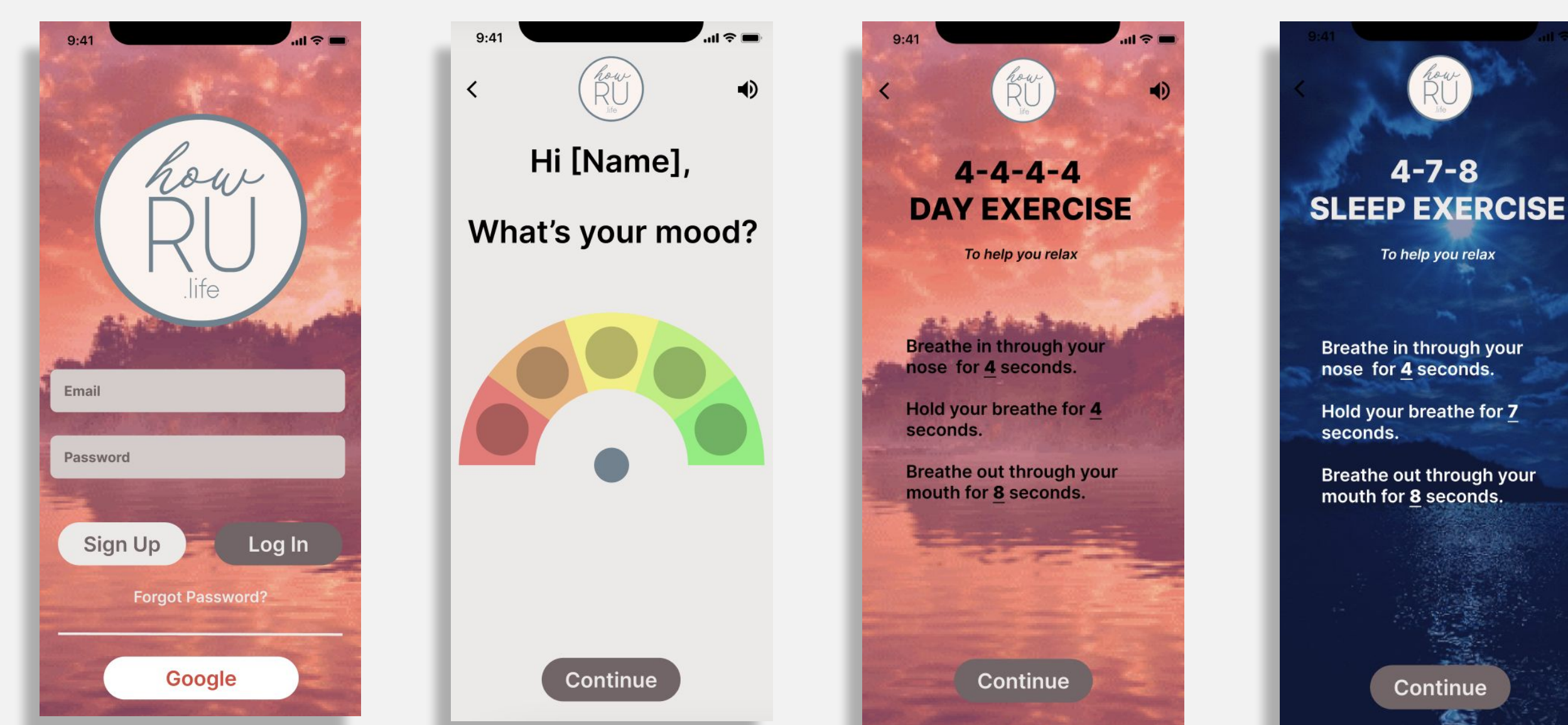
The Visual Studio Center allows us to develop and manually implement to IOS, Android and web applications where necessary.

The Application is currently programmed with FireBase due to technical difficulties with accessibility to the MongoDB database. However, this is still a work in progress and future students will need to complete the transition.

Figma was our collaborative web application for interface design of the application. Here we created Use Case UML Diagrams in order to graphical depiction of a user's possible interactions with a system.

IMPLEMENTATION

The Stress & Anxiety Application allows its users to create an account. Once an account is created, the application gives its users the ability to create and update their mood status on a daily basis. Additionally, the application gives its users the option to participate in activities, such as breathing exercises, to help them before bed.



SUMMARY

The Stress & Anxiety application is geared towards those who struggle with stress and/or anxiety. Its purpose is to create a peaceful environment and guide the user in lowering their stress and anxiety levels. Some new changes done to the app include a full cosmetic redesign with the collaboration between Capstone 1 and 2 students. Overtime users of this app can experience lower stress and anxiety levels along with an improved mental state.



VERIFICATION

The tools used to verify our app were Android Studio and XCode (for IOS). Throughout the semester both versions of the app functioned as expected when running them through these virtual simulations.

REFERENCES

[1] Nater, U.M. Recent developments in stress and anxiety research. J Neural Transm 128, 1265–1267 (2021). <https://doi.org/10.1007/s00702-021-02410-3>

ACKNOWLEDGEMENT

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