

## Abstract

An application developed using Dart and Flutter. The purpose of P2P is to connect those who do not own pets with people who do own pets. By connecting these users, P2P hopes enrich both their lives and the pets' lives through novel experiences.

## Introduction

Studies have shown that animal companionship has positive psychological effects on humans. Many people are unable to have their own pets for a variety of reasons such as: financial cost, housing restrictions, and time cost. There are not many options for people without pets to go interact with animals. Additionally, there are many stressed people who could benefit from interacting with animals. These people are all potential users for P2P, an app which would help them connect with nearby animals.

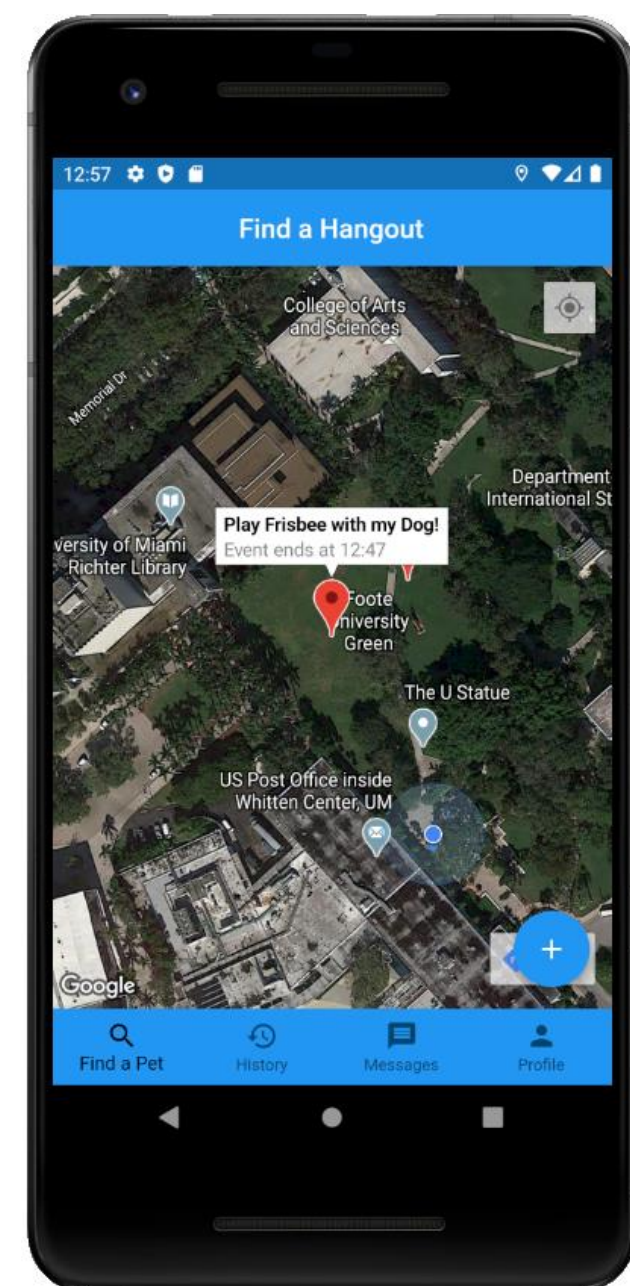


Figure 1 Finding a Pet

## Methods | Design | Analysis

Person to Pet is written in Dart code and uses the Flutter development kit. P2P was written in separate modules that were joined to create the complete product. The application uses Firebase for database services and file storage. The application also leverages the Google Maps API to perform accurate location services. The design emphasizes simplicity and ease of use to maximize user comfortability and enjoyment. The application runs in real time to find pet hangouts within 10km of the user.

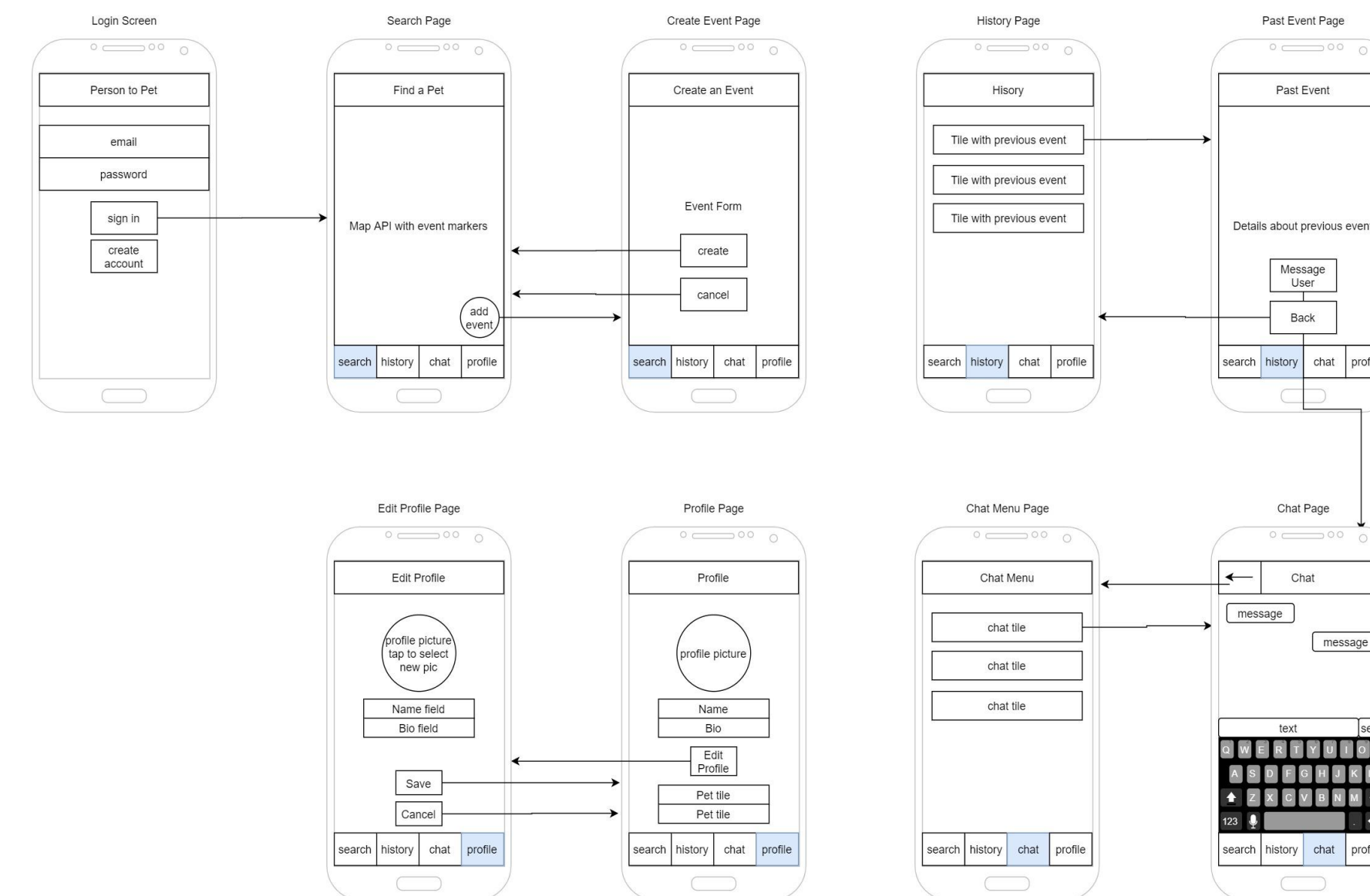


Figure 2 Original Project Wireframes

## Results

We performed user acceptance tests with some volunteers ranging in age from 18 years old to 57 years old. All volunteers gave good feedback for the application's user experience and user interface.

## Conclusion

Our goal was to create an application with a clean, simple user interface that could provide an enjoyable user experience while connecting people. Based on our user acceptance tests, our app meets our requirements. We hope that our application will be able to help some people ease their stress and manage any negativity.

## Acknowledgments

We would like to thank our professors, Dr. Lokesh Ramamoorthi and Dr. Michael Scordilis, for their guidance while we designed, implemented, and tested our application. We would especially like to thank Dr. Lokesh Ramamoorthi for continuing to meet with us on Zoom and giving us guidance even during the pandemic.

## References

Chen, X., Zou, Q., Fan, B., Zheng, Z., & Luo, X. (2019). Recommending software features for mobile applications based on user interface comparison. *Requirements Engineering, 24*(4), 545–559.

