# fuse by team yeezy

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Github: https://github.com/CS130-W20/team-A10

## **Motivation and Novelty**

When we think back on our lives, it's fairly easy to pick out a number of awesome ideas, activities and events that went unaddressed and unaccomplished. These low urgency, yet highly important ideas are opportunities to share unforgettable memories with friends, family, and community. One of the biggest motivating forces in our lives is a sense of community — doing things with friends lowers the barrier to accomplishing so many more of your dreams, but often times your friends don't even know half the ideas you want to accomplish!

Our mobile application, fuse, will fulfil this unmet need. Fuse will create a platform for users to propose, plan, and complete the events and activities in their life which hold this "high importance, low urgency" quality. Users have the ability to craft posts describing an event or activity they would like to accomplish with a group in the future. This post can be shared with all of their friends within the fuse application or with only a subset of friends. The user's friends will have the opportunity to join in and accept the post as an event they too want to take on. Now the user can move into the planning stage. Fuse will offer scheduling functionality so that all users subscribed to the post can plug in their availability. Once a date and time is set, fuse users are now ready to go out and complete the event. Users gain and lose points based on whether they participated or failed to participate in the event creating incentive for them to follow through on the plans they have crafted.

Fuse lights the fuse to place urgency on plans which naturally have no deadline, offering you the opportunity to find joy and satisfaction in tackling and completing ideas which hold importance to you.

## **Related Applications**

#### MeetUp (iOS/Android)

Meetup is a social medium that helps you connect with like minded strangers through events. Users search for events by location and interest. As an individual you can sign up for events, but event coordination is only for organizations. This platform is not conducive to one-off events and does not take into account the user's social circle. It is not for proposing events and does not help with scheduling among multiple groups.

#### https://www.bucketlist.net/

There is a web application related to out idea called bucket list. From our research it appears that the application is designed as a space for you to record events you want to go to or activities you want to experience, share your list with friends, and post your progress on list completion. The web application is different from our proposed application because it focuses on the user completing tasks on their list on their own. In contrast, our application will focus on helping users record events/activities they want to complete with a group of people. We will then have the functionality to share that proposed event/activities with friend circles to facilitate the planning and completion of that task as a group. Further, bucket list seems to be targeting large scale events such as sky diving or going to Europe, while fuse will focus on small scale events such as having dinner at a new, local restaurant.

#### Bucket List Maker (iOS)

Bucket list maker is a mobile application where you can list as many things as you want to do, manage the ones you've done and memorize your experience. You can even publish your list

as a web page and share it with you friends. The difference from our proposed application is that our application is more of a social media type bucket list where people are encouraged to do similar types of activities with each other. You can see other peoples' bucket list and have the option to "follow" an activity to see whether or not your own friends are interested, or "commit" to an activity, where you commit to doing that activity with another user. We support any type of event no matter what the sizes is-- you can choose to make a bucket list task to invite friends and followers to a restaurant or make a task to invite them to go sky diving.

# **Feasibility**

#### **Mobile Application for iOS**

Frontend: React Native

 React Native lets you create platform-specific versions of components so a single codebase can share code across platforms. With React Native, one team can maintain two platforms and share a common technology—React.

Backend: GraphQL + Prisma + Node.js

- GraphQL: GraphQL is a query language that lets you write queries using an object structure rather than a text string — essentially the query structure is easier and cleaner to use.
- Prisma: Prisma is the perfect tool for building GraphQL servers. The Prisma client is compatible with the Apollo ecosystem, has default support for GraphQL subscriptions and Relay-style pagination, provides end-to-end type safety and comes with a built-in dataloader to solve the N+1 problem. It adds a layer of abstraction to the GraphQL server such that it is easier to use.
- Node.js: Node.js is a platform built on Chrome's JavaScript runtime for easily building
  fast and scalable network applications. Node.js uses an event-driven, non-blocking I/O
  model that makes it lightweight and efficient, perfect for data-intensive real-time
  applications that run across distributed devices. Some of the tools needed to develop
  React Native apps run on Node.js and the apps will not work flawlessly without Node.js.

# **Capability**

## **Aaron Berdy**

I worked at Amazon building a full-stack web application this past summer, using a GraphQL/Apollo/React/Node/Java/AWS stack. I have also set up a complex architecture involving databases and front-end web pages with embedded graphics using a GraphQL/Prisma/AWS/Node stack. I have experience with AI/ML through working at several companies on research-focused teams and teaching a class at UCLA on AI (E96A).

#### **Darica Louie**

I have experience working on the UI of a few websites and currently am doing research in UCLA REMAP for the UI/UX of an augmented reality iOS app to be incorporated into an immersive

theater piece. This past summer, I participated in a research institute that used Python and several AWS tools such as their databases and lambda functions to create a reactive art exhibit on culture. With this project I look forward to working on the front-end of the app as well as using my databases knowledge from previous classes.

#### **Chiara Mooney**

I have had prior experience working on mobile applications in React-Native through a personal project which focussed of contact and social media handle sharing through QR codes. Through this project, I also gained exposure to Google Firebase. Last summer, my internship project primarily focussed on apply facial recognition to video streaming. With this, I gained exposure to machine learning fundamentals, video processing libraries and tools, and collaborative coding methods.

Further, I also have some previous experience in graphic design which can be used to generate logos and page layout designs for the app.

#### **Christian Rodriguez**

I've had some experience developing a mobile app from start to finish using React-Native with a Google Firebase backend. Note, I do not want to be a software engineer, I am more interested in the product side of a business but I do love to code. I've also interned at Microsoft this past summer on the Your Phone team as a Program Manager. I've been fortunate enough to experience the shipment of a feature in the mobile world. In addition, I've joined a couple of hackathons where our team was able to build a full pledged product from scratch. I will try my best to add value to our team through extensive product research, implementation and design.

### **Ryan Tsang**

I've had prior experience developing and shipping a mobile app in React-Native. My project with Microsoft Azure last summer involved building full stack solutions using Typescript and Knockout JS. Developing projects as a team on a tight timeline is not new to me as I have participated in multiple hackathons where our team has been able to demo our project. I hope to add value to the team through both engineering and product design.