

# GP3 - Prototyping

## Title

Pathfinder

## Team Info

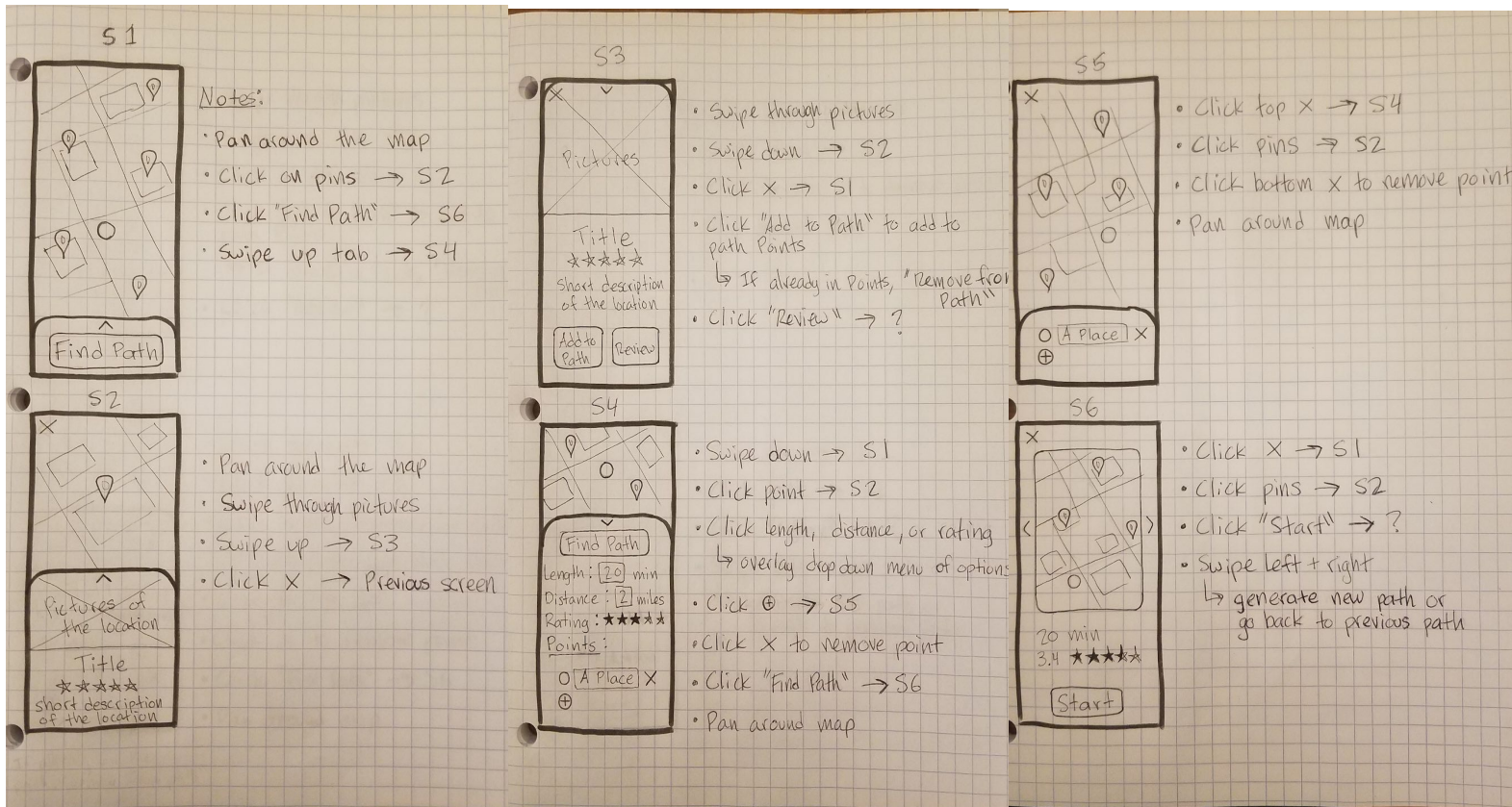
Fen Cullen, [cullen.c@northeastern.edu](mailto:cullen.c@northeastern.edu)

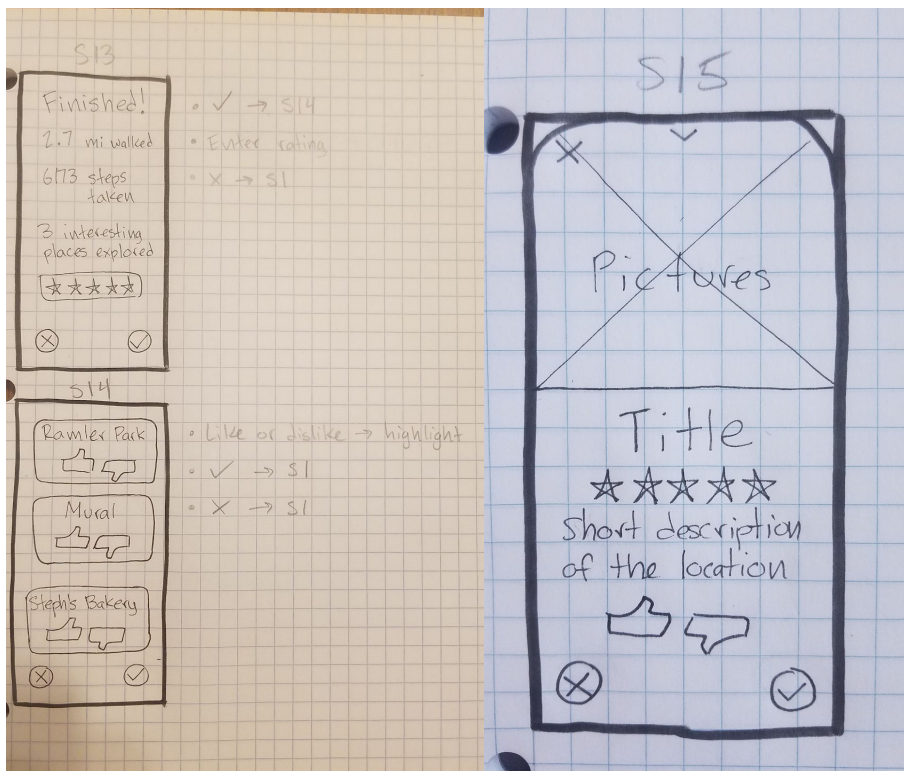
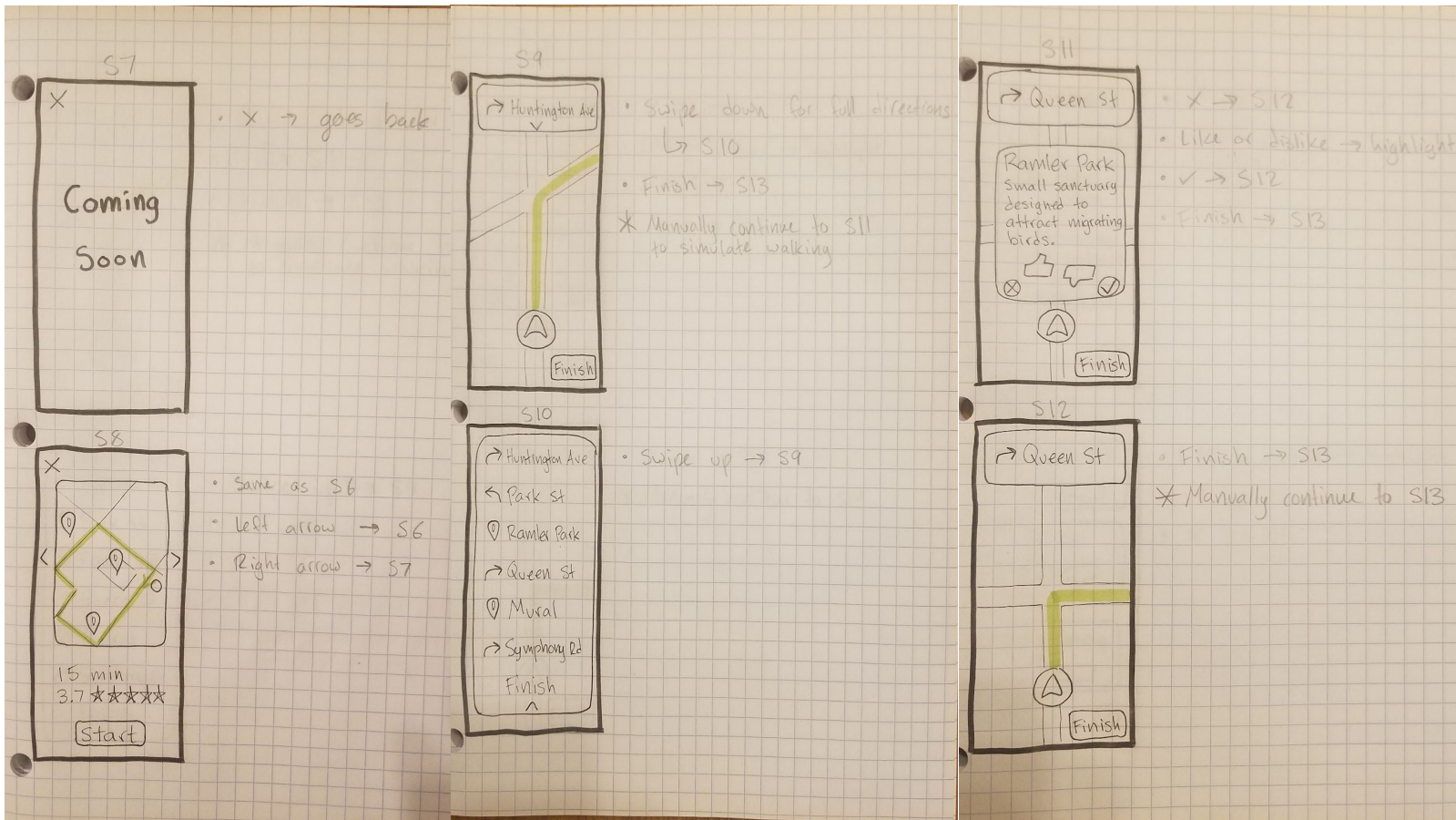
Andrew Knollmeyer, [knollmeyer.a@northeastern.edu](mailto:knollmeyer.a@northeastern.edu)

Max Fortna, [fortna.m@northeastern.edu](mailto:fortna.m@northeastern.edu)

Website: <https://pathfinder-hci.github.io/>

## Prototype Photos





# Brief

This mobile app helps you explore new interesting parts of your area by suggesting paths for you to walk. You're going to help us out by trying to perform a few tasks for us using the interface.

Your participation in this test is entirely voluntary and you can stop anytime and ask that your data not be used. Can we get your permission to record this test?

Great. This our initial prototype, so please be as critical as possible so we can make improvements. It was originally drawn on graph paper and was uploaded to a website to make it possible to use remotely. Remember, we're testing the interface - not you. If you run into problems, it's not your fault, it means we need to change something.

Your cursor acts as your finger and you can click to "tap" or "swipe". Some actions aren't currently implemented, we'll try to tell you when you encounter them. Let us know when you're ready to begin.

## Scenario Tasks

1. Leave a rating on a point of interest.
2. Customize a path by adding a point along the way.
3. Go on a 15-minute walk.

## Interview Questions

1. What made you feel the most frustrated/confused?
2. What aspects do you feel are the most useful?
3. How often do you feel you would use this app?
4. If you could instantly change or add one thing, what would it be?

## Test Scenario Descriptions

1. Test 1
  - a. Time: 5:30 PM EST 11/10/20
  - b. Place: Max's room
  - c. Equipment: InVision, Zoom
2. Test 2
  - a. Time: 7:15 PM EST 11/10/20
  - b. Place: Andrew's room
  - c. Equipment: InVision, Zoom
3. Test 3
  - a. Time: 11:00 AM EST 11/11/20
  - b. Place: Over Zoom
  - c. Equipment: InVision, Zoom

# Demographics

1. Test 1
  - a. Age: 20
  - b. Occupation: Part-time QA tester, Student
  - c. Gender: Female
  - d. Misc
    - i. Is experienced with HCI concepts
2. Test 2
  - a. Age: 21
  - b. Occupation: Cybersecurity Consultant, Student
  - c. Gender: Female
  - d. Misc
    - i. Has a dog
3. Test 3
  - a. Age: 61
  - b. Occupation: Graphic Designer
  - c. Gender: Female
  - d. Misc
    - i. Quite active, walks daily

# Observations

1. Test 1
  - Task 1
    - Find the point of interest – taps on a pin
    - Immediately saw star ratings at bottom and tapped on a star to give rating (but stars were not interactable)
    - Once she saw that stars weren't interactable, swiped up to reveal more and was able to leave a rating
  - Task 2
    - Swiped up to display more path info
    - Got lost for a bit trying to tap on the first stop on the path
    - Confusing that hitting X on the point info screen takes you back to the main screen and not back to where you just were – limitation of prototype method
    - Accidentally hit "Find Path" instead of the arrow one time – again, limitation of prototype method (real app would support swiping up)
    - After hitting + button, hit a point on the map instead of hitting + button again
  - Task 3
    - Understood mid-walk rating prompt
    - Left rating at end of walk

- Q&A
  - What made you most frustrated/confused?
    - Adding the point of interest to the path was confusing because the point already on the path looked like a blank slot
  - What aspects do you think are the most useful?
    - Really liked the interface for mid-walk and post-walk
  - How often do you feel you would use this?
    - Maybe once a month
  - If you could change 1 thing, what would it be?
    - It might not make sense to be able to rate a place without having visited on a walk

## 2. Test 2

- Task 1
  - Immediately clicks on pins
  - Stares at the screen for awhile
  - Tries to click on stars
  - Is confused about the placeholders
  - After telling her to act like we aren't there, swipes up
  - Clicks review
  - Repeatedly clicks thumbs and stars bc they don't respond
  - Clicks checkmark, then down arrow, then x
- Task 2
  - Doesn't swipe up on find path
  - Clicks through location screen until she finds add to path
  - Loops through point screen, add to path, custom path screen, and home screen several times -- maybe would be fixed by responsiveness
  - Maybe the x on the point screen should always go back to the last screen instead of home?
  - Clicks find path, start, finish, x -- she doesn't realize she completed the task
- Task 3
  - Doesn't click find path or swipe up
  - Clicks on point, add to path, then find path and start
  - Clicks around randomly until they land on direction list, then swipes up
  - We give direction to wait
  - On the pop up, clicks like and checkmark
  - On finish screen, clicks stars then checkmark
  - Clicks like, dislike, dislike, checkmark
- Q&A
  - What made you the most frustrated/confused?
    - "I have no idea what I'm looking at." We need a better description of the product and how a prototype differs from a real app. A more realistic looking prototype would help also
  - What aspects do you think are the most useful?



- Liked that it pops up info about the points while on a walk
- How often do you feel you would use this?
  - N/A -- she doesn't understand the purpose/function of the app
- If you could change one thing, what would it be?
  - N/A

### 3. Test 3

- Task 1
  - Immediately tapped on pin
  - Didn't try dragging up for more info
  - Tapped on rating preview stars
- Task 2
  - Tapped on empty spot on map to try to add pin
  - Taps on a existing pin on the map to try to add it
  - Still hasn't dragged up bottom
  - Finally dragged it up, sees "Add to Path"
  - Isn't clear whether "A Place" was already on the path or was added by user
- Task 3
  - Would double-click and drag person icon to go on walk
  - Found "Find Path" menu
  - Would adjust the length of the walk first
  - After adjusting path settings, swiped the path menu back down
  - Used to fitness apps where it would just follow you wherever you go
  - Only hit "Find Path" button when told to
  - Likes the pop-up info about places along the walk
  - Rating for mid-walk was unclear; hit the checkmark to give approval without actually giving thumbs up
- Q&A
  - What made you feel the most frustrated/confused?
    - Just starting an actual walk
  - What aspects of this app do you feel are the most useful?
    - Swiping up was the most useful
  - How often do you think you would use this app?
    - Would use it often, likes taking walks and finding things out as she goes
  - If you could instantly change or add 1 thing, what would it be?
    - Design to make it more intuitive on how to start, maybe a tutorial or something
  - What do you think could make the buttons appear more interactable?
    - If they changed color to indicate some sort of activity

## Session Videos

[https://drive.google.com/drive/folders/1rYv2Wm2KqyS7RhUOgbSd5l1Aps\\_bUX\\_y?usp=sharing](https://drive.google.com/drive/folders/1rYv2Wm2KqyS7RhUOgbSd5l1Aps_bUX_y?usp=sharing)

# Revised Design

We've started moving our prototype over to our final platform, Unity. The current build is a little rough around the edges, but is a little more responsive and helps distinguish different elements with more color.

<https://pathfinder-hci.github.io/app/index.html/>