

Low-fi Prototype & Evaluation

mömo

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Team



Sara O.



Julea C.



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Problem & Solution Overview



Problem: People currently feel less connected to nature, and personal initiative to take environmentally-friendly actions is lacking



Solution: Mobile app to encourage users to make environmental commitments in a rewarding, reflective, and goal-oriented manner





Mission Statement & Value Proposition

Mission Statement:

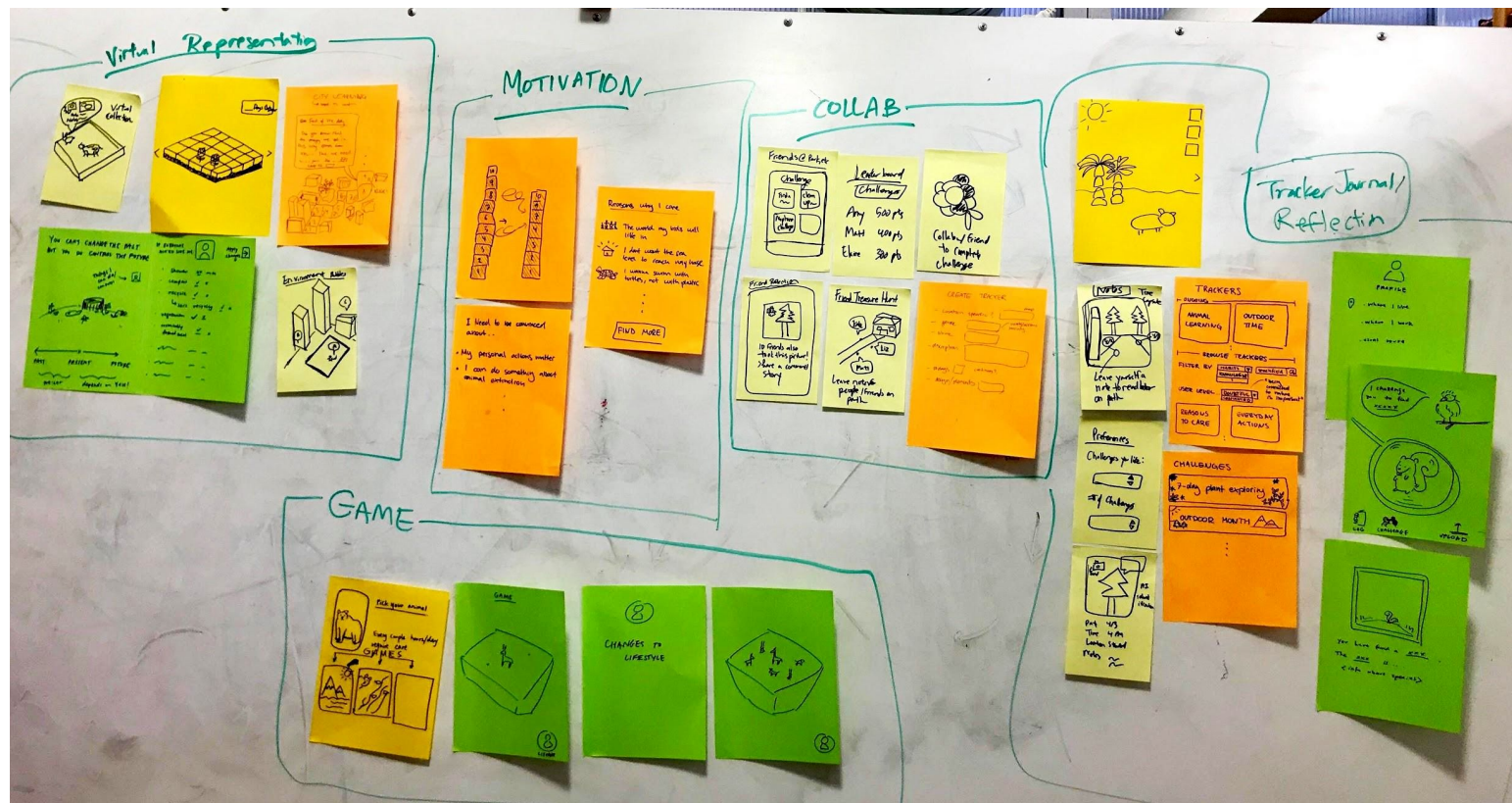
To make individuals feel rewarded as they incorporate eco-friendly actions into their everyday lives.

Value Proposition:

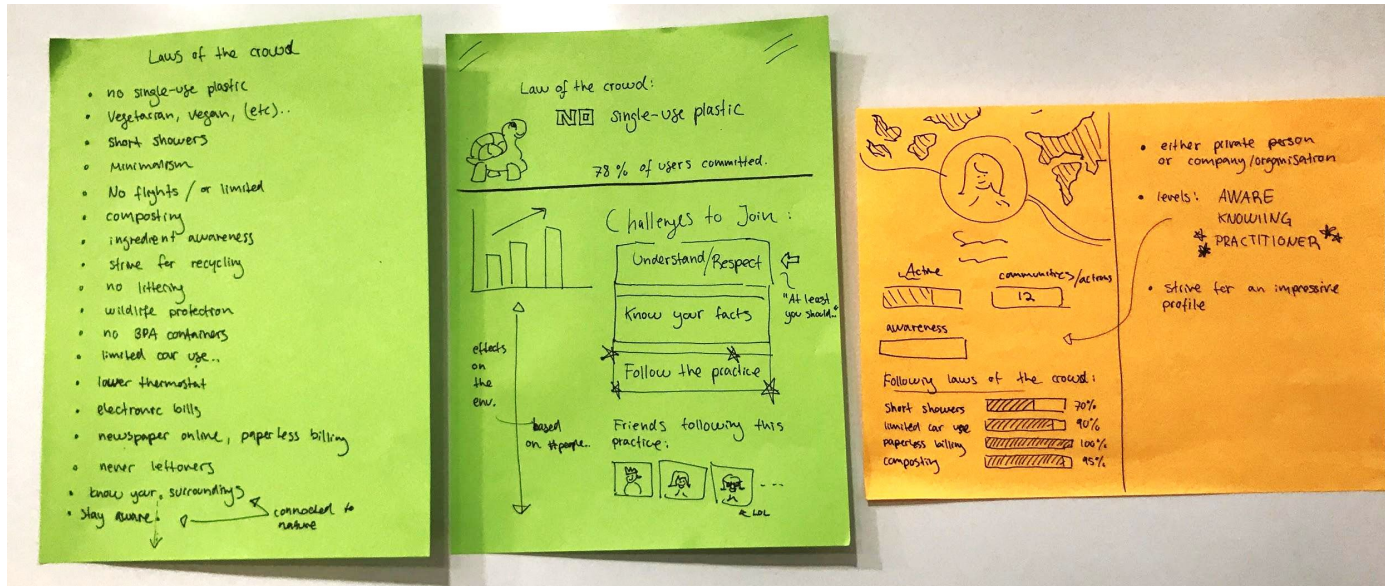
Let your virtual planet reflect your real life habits and knowledge, while receiving rewards for personal growth.



Sketches



Top Designs #1: Collab Ideas



Let the crowd of users incentivize others to follow their commitments

#1: Collab Ideas



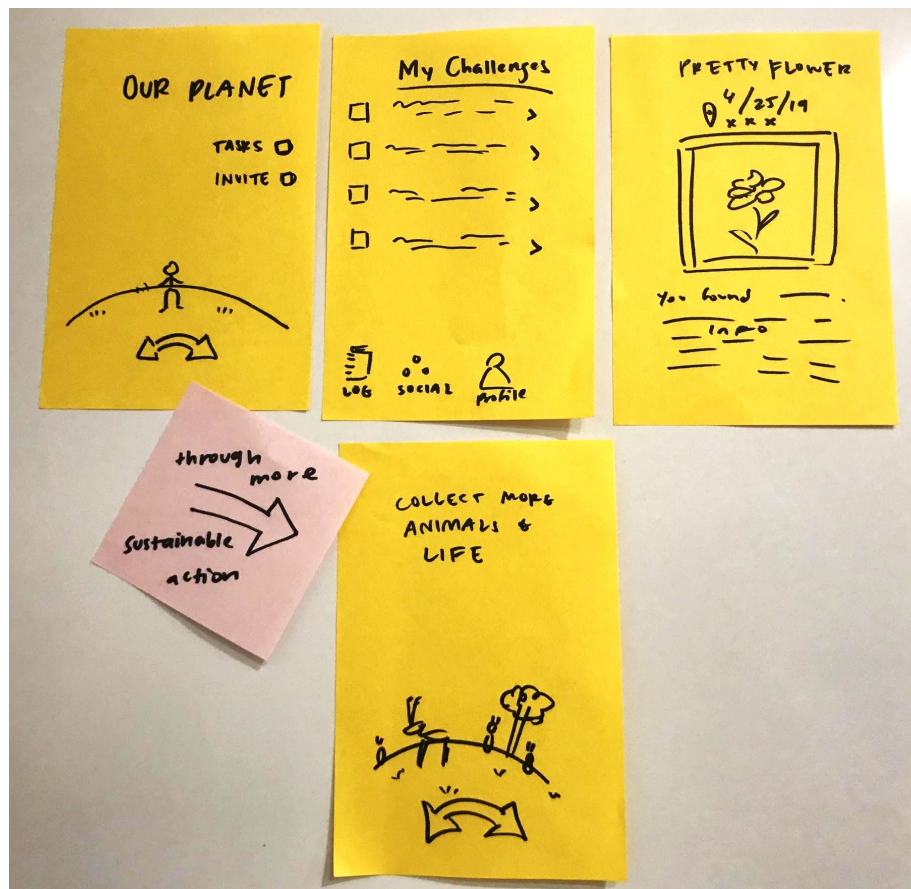
- Stats may feel penalizing
- Public stats may feel embarrassing
- Recording actions very often is a big ask



- Allows diverse interests
- Scalable
- Incentive to work harder due to public stats

Top Designs #2: Tracker Journal

- Complete challenges
- Option to reflect and receive rewards for your virtual planet



#2: Tracker Journal



- Small audience that enjoys journaling
- Personal use → less social/global impact
- Risk of feeling childish



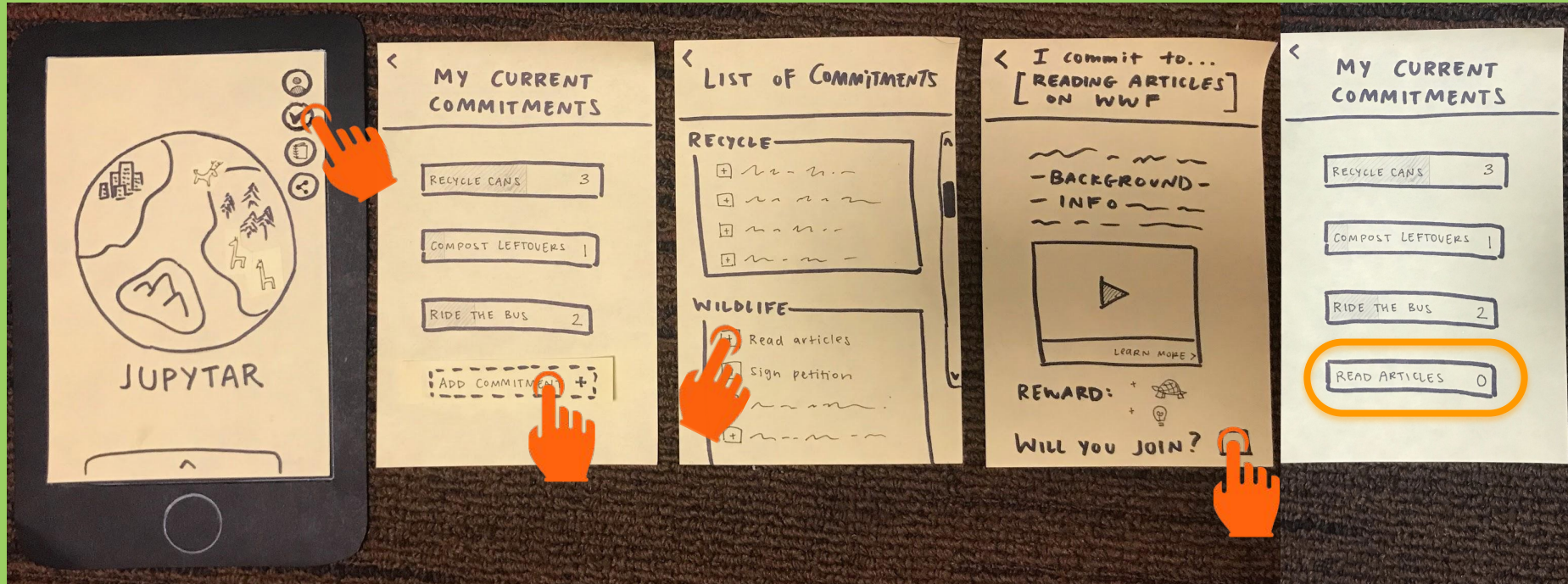
- Visual elements → fun
- Motivated to show off your planet to others
- Ability to save memories of an eco-challenge

A decorative graphic on the left side of the slide. It features three green leaves of different sizes and orientations, and three light grey circles of different sizes. The leaves have a detailed vein pattern, while the circles are solid. The overall arrangement is abstract and modern.

Best components of the Top 2 ideas

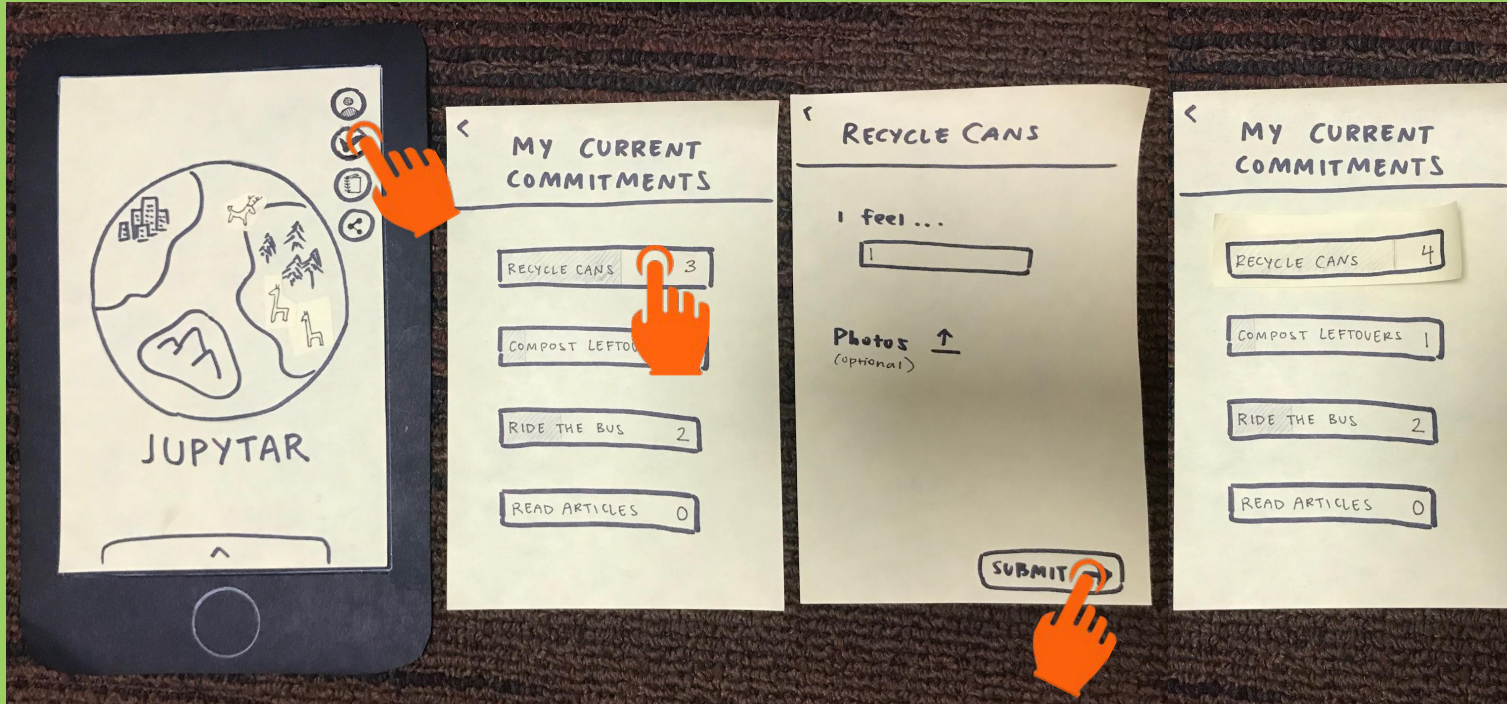
- The virtual planet and its elements
- Global stats and public profiles
- Challenges and rewards
- Not demanding daily logging of a singular task continuously

Simple Task: Make a New Commitment



Moderate Task:

Log and Notice Progress on your Commitment

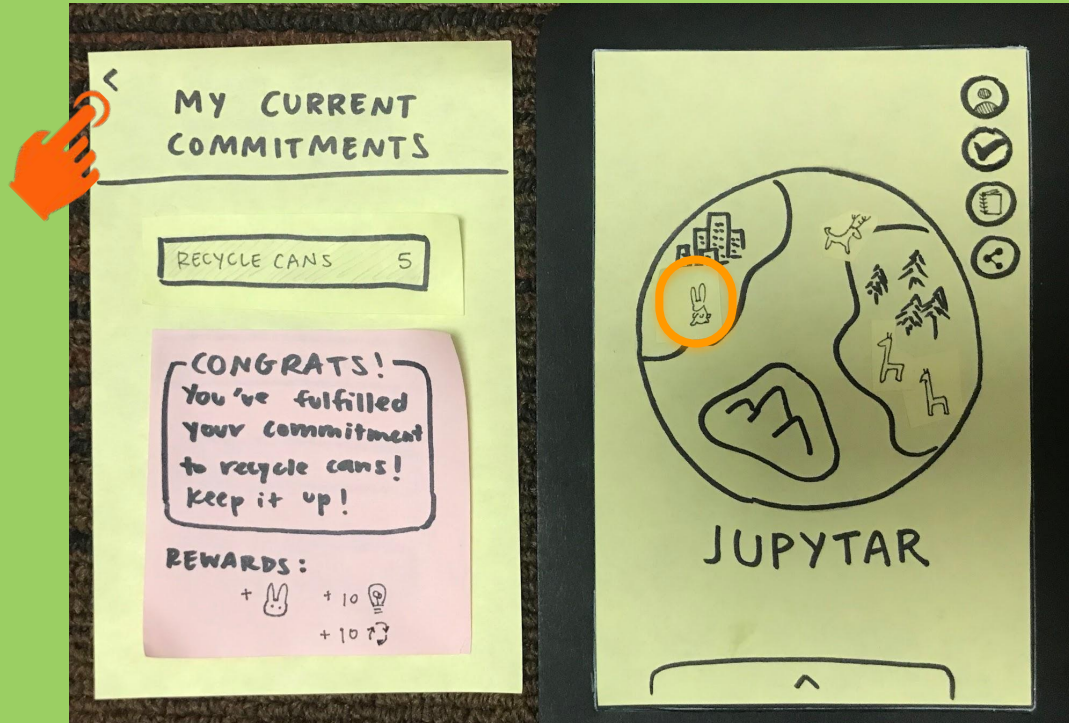


RECYCLE CANS task increases from '3' to '4'

Moderate Task:

Log and Notice Progress on your Commitment

- Alternative result if increasing from '4' to '5'
- Pop up with rewards appears

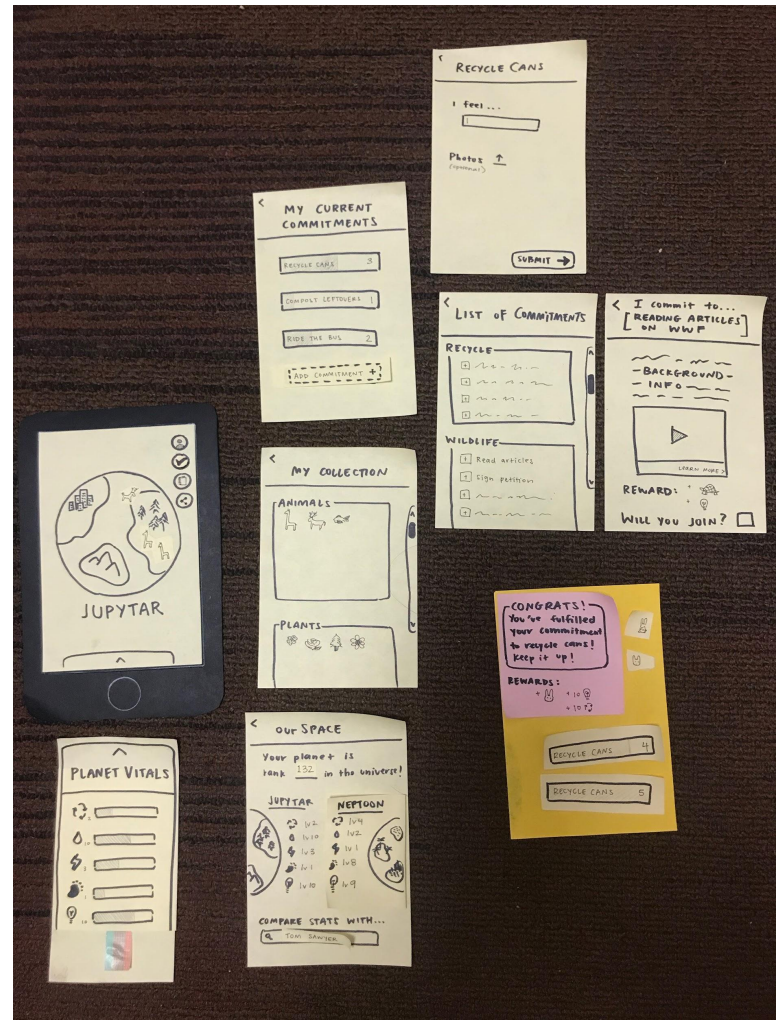


Complex Task:

Compare your planet's progress with others



All Screens





Testing Procedure:



Computer



Greeter + Facilitator

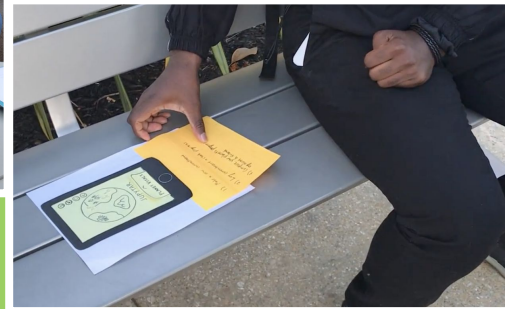
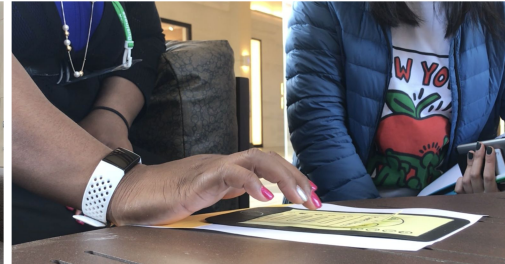
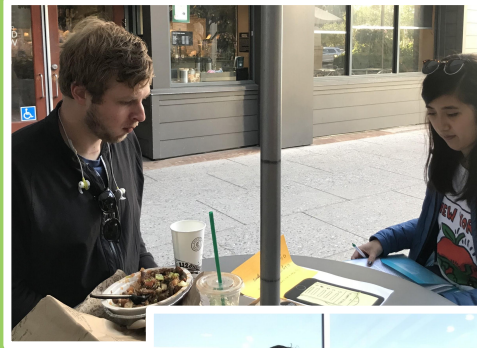


Observer



5 Participants

- Stanford Shopping Center
- Target user group: 20s-30s
- 5-8 min session +
2-3 min Q+A





Testing Results:



- People kept clicking on the planet/animals initially
- Initial confusion by terminology (i.e. "commitment")



- Overall positive to concept
- All participants realized what the app was about after finishing first 2 tasks
- Some recognition of button symbols





Insights for further development

- Redesign so that globe is **clickable**
(action items on globe)
- Make the Commitments page easier to access
- Push for **personal benefits**
(e.g. fitness, saving money, etc.) - not just
water/energy usage



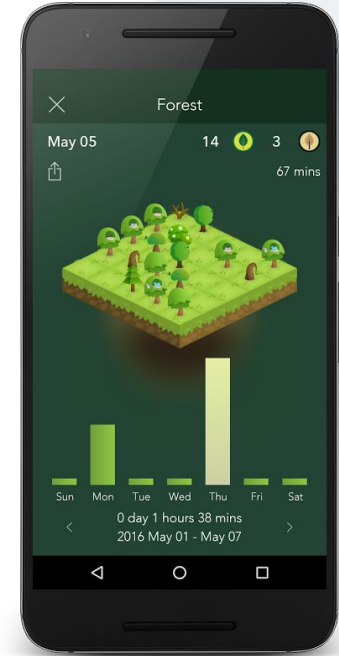
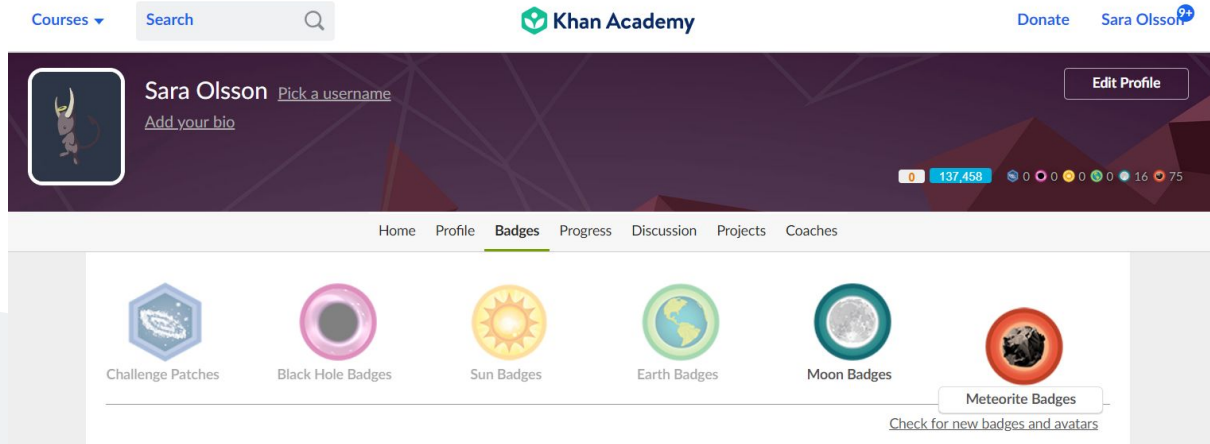
The background is a solid light green color. On the left side, there are several decorative elements: a large, detailed green leaf with visible veins, a smaller solid green leaf, and several overlapping circles in various shades of green (light, medium, and dark).

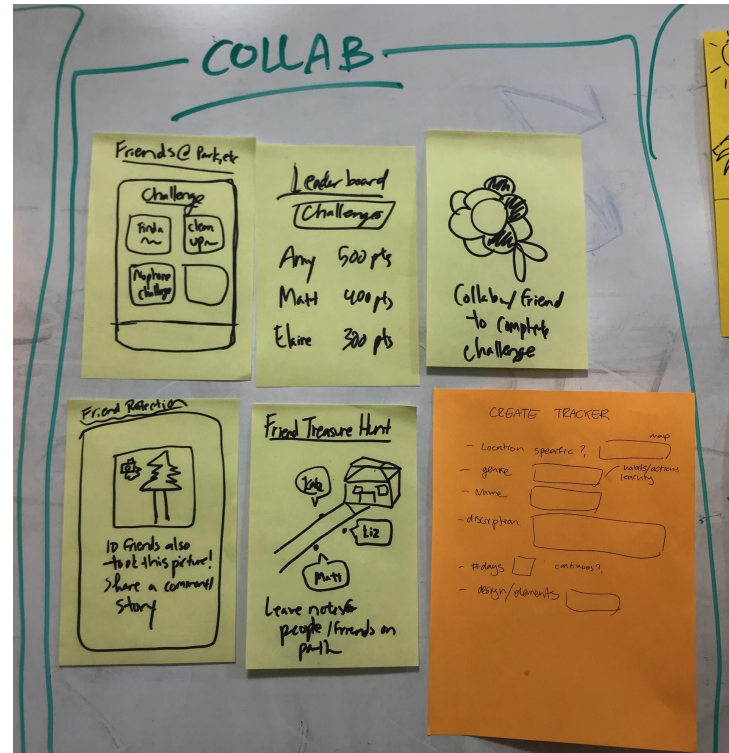
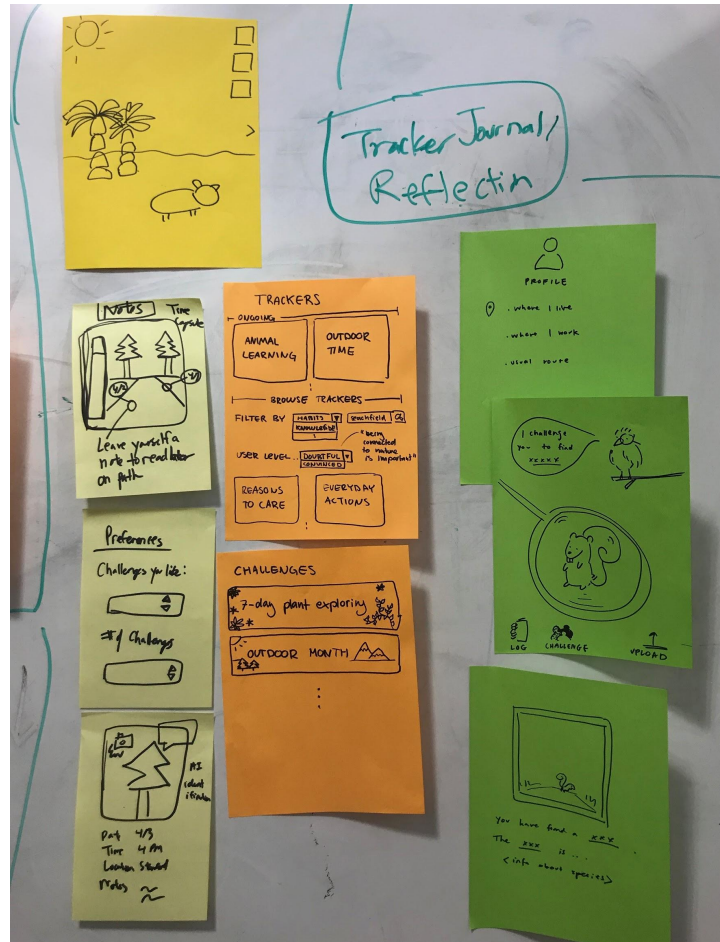
Appendix



Inspiration

- Khan Academy (online learning)
- Forest (App for staying focused)





Top 2 Design Ideas
(not fleshed out)

Pros

- can show off your planet to others
- more visual & cute & fun
- ability to see details of challenge
↳ like a memory

Cons

- small audience
- not independent on friends playing for motivation
- seems singular
- might seem childish??

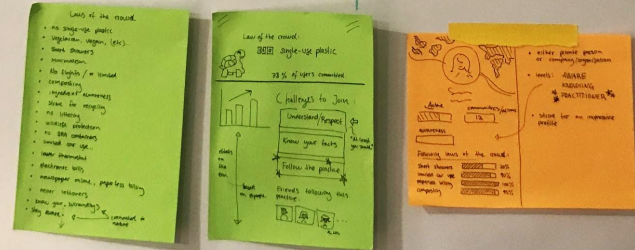


Pros

- personal stats
↳ good motivator
- organizes all activity in one place
- can see what other users are doing
- Scalable for many people
- diverse seen environmental interests

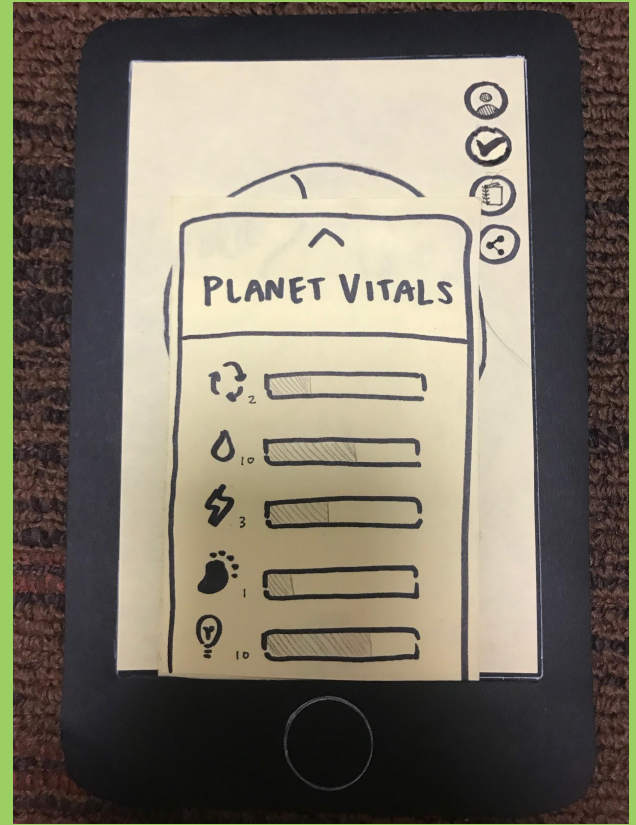
Cons

- Starts feel penalizing
- people might not like public profile
↳ possibly embarrassing
- repeatedly entering actions is a big ask
- more "traditional" feeling



Top 2 Designs
(fleshed out, pros + cons)

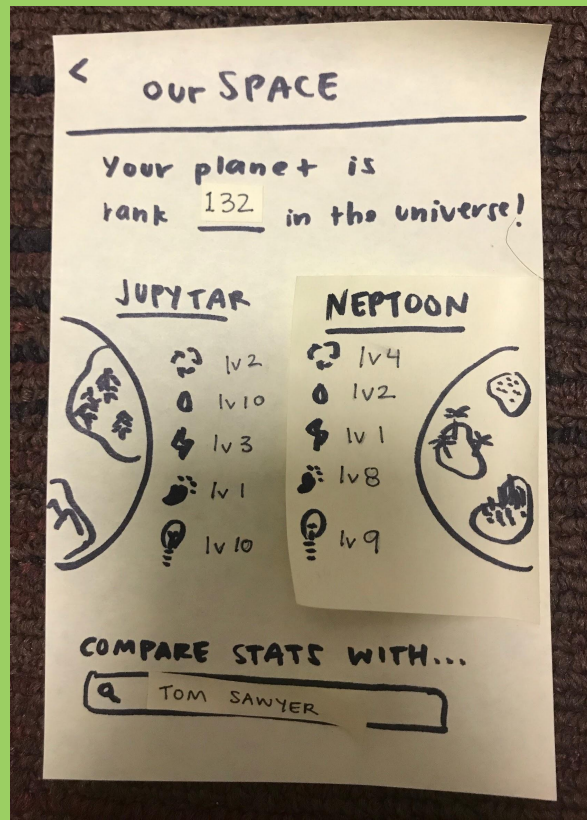
Home Screen





< Collection

Social >



Related to commitments

< MY CURRENT COMMITMENTS

RECYCLE CANS 3

COMPOST LEFTOVERS 1

RIDE THE BUS 2

! ADD COMMITMENT + !

< RECYCLE CANS

I feel ...

1

Photos ↑
(optional)

SUBMIT →

Related to
commitments

< LIST OF COMMITMENTS

RECYCLE

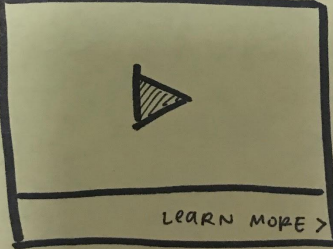
☐ ~ ~ - ~ ~
☐ ~ ~ ~ ~ ~
☐ ~ ~ ~ ~ ~
☐ ~ ~ - ~ ~

WILDLIFE



☐ Read articles
☐ Sign petition
☐ ~ ~ ~ ~ ~
☐ ~ ~ - ~ ~

< I commit to...
[READING ARTICLES]
ON WWF

~ ~ ~ ~ ~
- BACKGROUND -
- INFO ~ ~ ~
~ ~ ~ ~ ~



LEARN MORE >

REWARD: + 
+ 

Will you JOIN? ☐

Blue = positive
Red = negative

Critical Incidents: Participant 1

Incident	Severity Rating
“What’s a commitment?”	3
Tapped globe immediately	4
Didn’t recognize the share icon	3
“I get it, that’s cute!! [referencing bunny]”	0
Looked overwhelmed by commitment list	2
“I like that it’s motivational like a fitness app”	0
Clicked play video before joining challenge	0
Uploaded photo (even though it’s optional)	0
“What does rewards mean?”	1

Blue = positive
Red = negative

Critical Incidents: Participant 2

Incident	Severity Rating
Tapped globe immediately	4
“ The “!” button looks like a warning signal”	3
Clicked on other buttons before ! button	3
Stuck in Planet Vitals list	3
Clicks on all icons in planet vitals list	3
Difficulty picking a commitment to add	3
Clicked play video before joining challenge	0
Didn't want to join challenge in general	2
Actually compared stats with other player	0

Blue = positive
Red = negative

Critical Incidents: Participant 3

Incident	Severity Rating
Tapped globe immediately	4
Didn't recognize the share icon	3
Tried tapping turtle icon on rewards section	2
"Planet vital icons were really confusing"	3
Clicked play video before joining challenge	0
Actually compared stats with other player	0
Really fast overall completing tasks	0
"I would move the 3 buttons to under the planet"	1

Blue = positive
Red = negative

Critical Incidents: Participant 4

Incident	Severity Rating
Tapped globe immediately	4
“ The “!” button looks like an alarm”	3
“I collected a bunny!”	0
Tried to move animals around	2
Uploaded photo (even though it’s optional)	0
Actually compared stats with other player	0
“ I didn’t realize animals were rewards at first”	1
Thought planet vitals was the first thing he should’ve swiped on	2

Blue = positive
Red = negative

Critical Incidents: Participant 5

Incident	Severity Rating
Tapped globe immediately	4
"I think a hamburger menu would be better"	2
Uploaded photo (even though it's optional)	0
Clicked play video before joining challenge	0
"I thought this book icon would be my log"	3
"Is a reward an icon I get?"	1
Exited commitment screen to try to log a commitment	3
Recognized share button	0

Consent Form

The Team m6mo application is being produced as part of the coursework for Computer Science course CS 377E at Stanford University. Participants in experimental evaluation of the application provide data that is used to evaluate and modify the interface of Team m6mo. Data will be collected by interview, observation and questionnaire.

Participation in this experiment is voluntary. Participants may withdraw themselves and their data at any time without fear of consequences. Concerns about the experiment may be discussed with the researchers Chloe Thai, Jules Chin, Cathy Wang, Sara Olsson, or with Professor James Landay, the instructor of CS 377E.

James A. Landay
CS Department
Stanford University
650-498-8215
landay at cs.stanford.edu

Participant anonymity will be provided by the separate storage of names from data. Data will only be identified by participant number. No identifying information about the participants will be available to anyone except the student researchers and their supervisors/teaching staff.

I hereby acknowledge that I have been given an opportunity to ask questions about the nature of the experiment and my participation in it. I give my consent to have data collected on my behavior and opinions in relation to the Team m6mo experiment. I also give permission for images/video of me using the application to be used in presentations or publications as long as I am not personally identifiable in the images/video. I understand I may withdraw my permission at any time

Name Nicole Duff
Participant Number 1650 922 6240
Date 4/29/19
Signature [Signature]
Witness name Chloe Thai
Witness signature Chloe Thai

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Name Katie Qui
Participant Number 2
Date 4/29
Signature [Signature]
Witness name Chloe Thai
Witness signature Chloe Thai

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Name Hec Kren
Participant Number 3
Date 4/29
Signature [Signature]
Witness name Chloe Thai
Witness signature Chloe Thai

29 y.o

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Name _____

Participant Number 4

Date 4/29/19

Signature [Signature]

Witness name Chloe Thai

Witness signature [Signature]

22 y.o

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Name Adam Bealfe

Participant Number 5

Date 4/29/19

Signature [Signature]

Witness name Chloe Thai

Witness signature [Signature]