Service Discovery

Case Study - Q1 2019

Introduction

Handy was founded in 2012 as an online marketplace where customers can directly book and pay upfront for simple tasks around the home, such as home cleaning and basic handyman services.

With the acquisition in Fall 2018 by HomeAdvisor (Angie's List), Handy was able to expand its service offering to customers. This unlocked a wider and more complex range of services and professionals to customers, such as home remodeling and HVAC. And a new way of paying for a service, through quotes.

While this was exciting from a business standpoint, the product needed a lot of work so that Handy can accommodate all of these new services and deliver seamless experiences new and existing users.
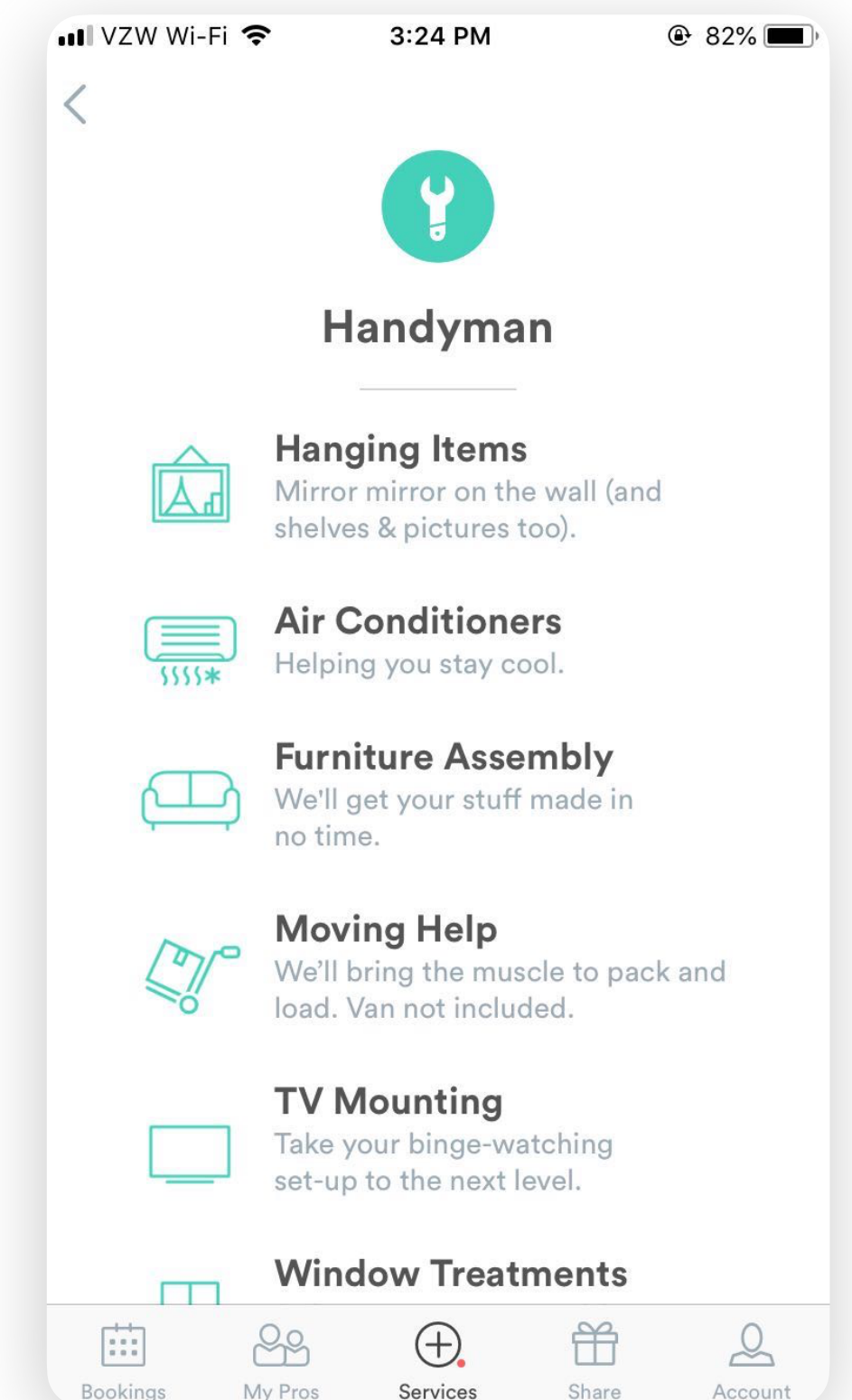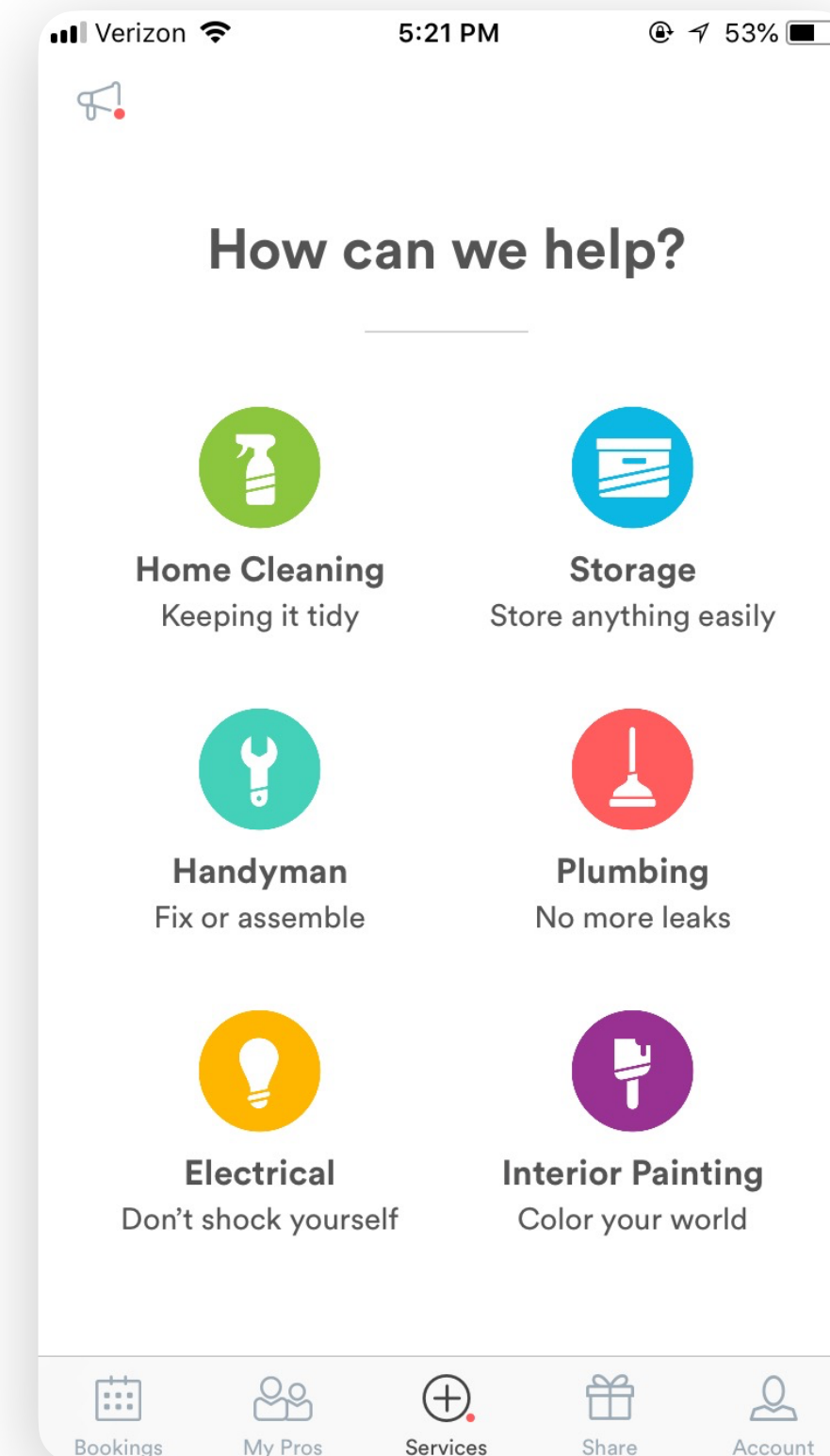
Service Discovery

How we created a search and discovery experience for home services.

The Problem

The Handy native apps were quite behind web and could only support a small fraction of the services we offered (even pre-acquisition!). Handy had many existing and new customers using our native apps; exclusively, who were unaware of the wide range of services (new and old) that Handy offers[1].

Not only was the current Services Page **unscalable** and **out-of-date,** it also:

- Inhibited our ability to maximize cross-selling opportunities amongst existing users.

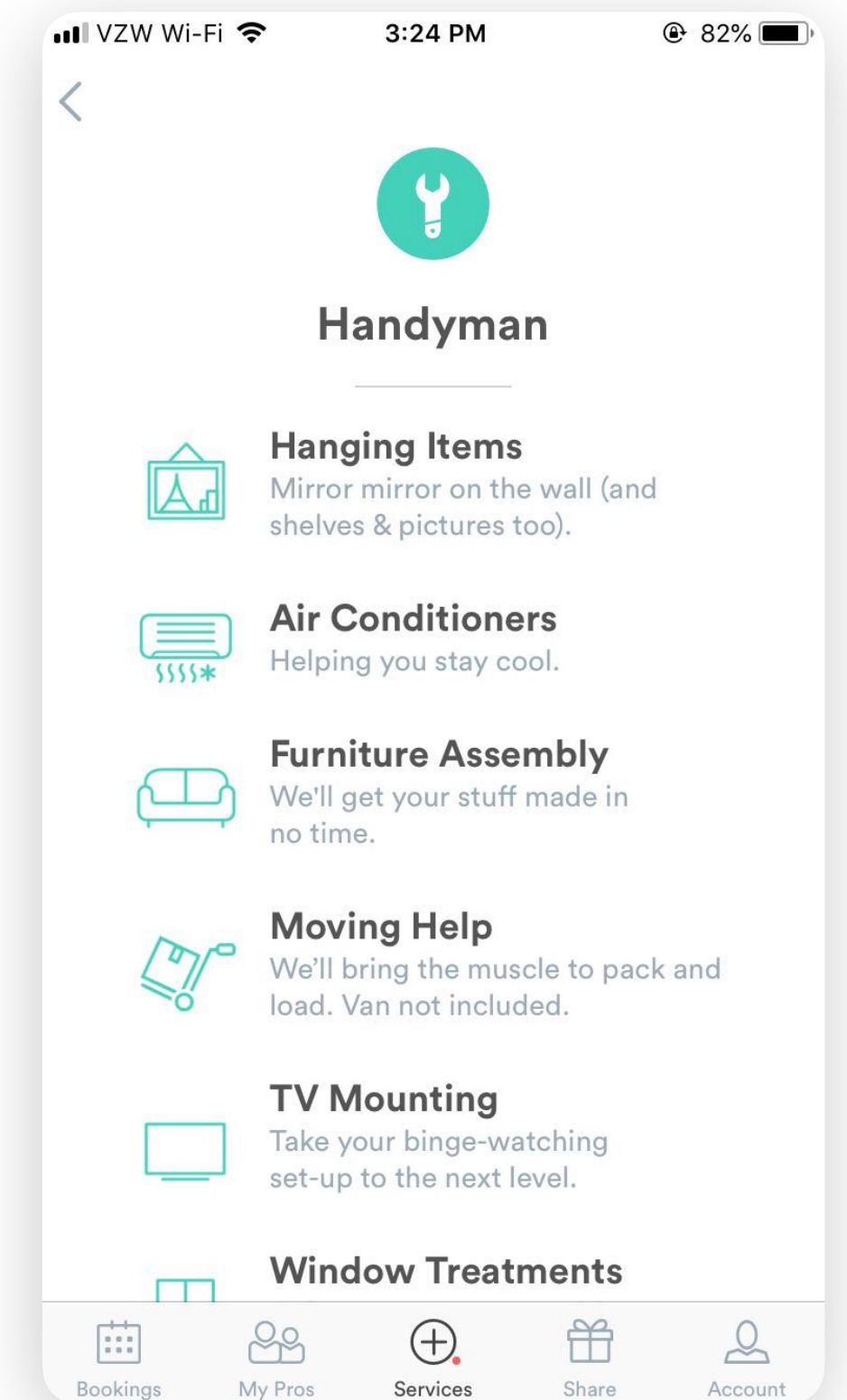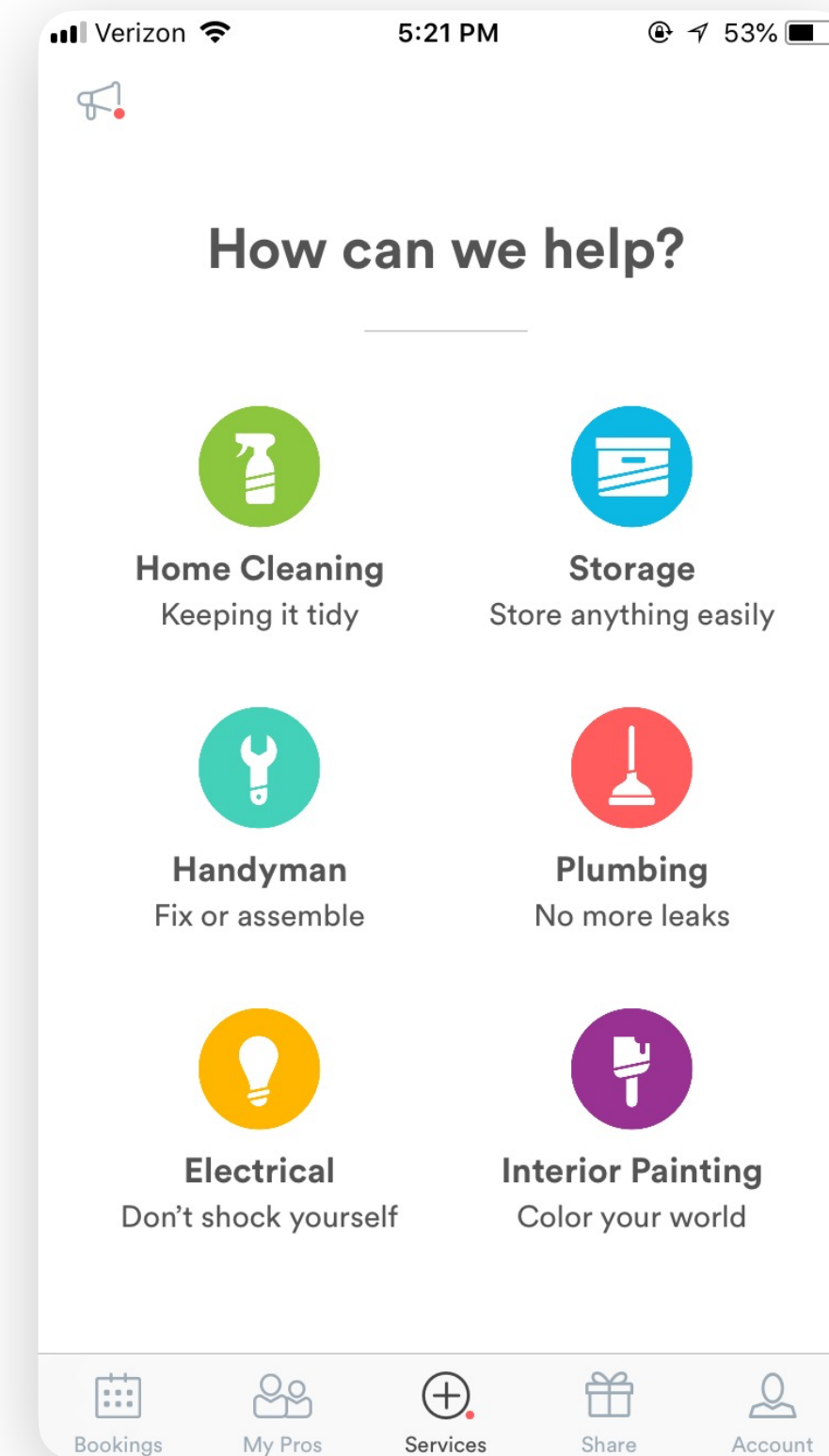- Prevented us from realizing extra revenue from those customers via these new services.

[1] In a routine survey sent out to customers, 38% of customers did not know that Handy offered Home Remodeling as a service.
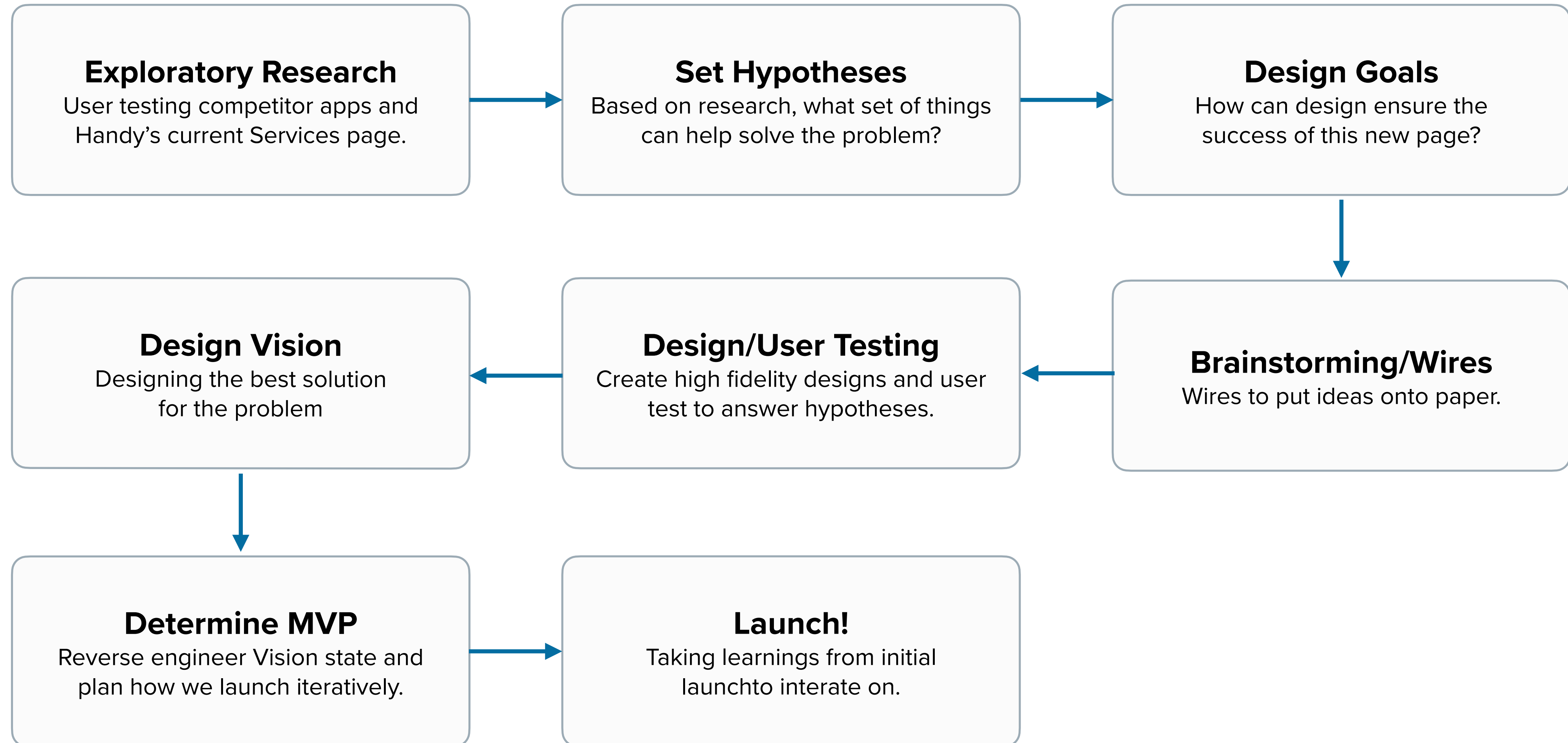
The Ask - Search & Discovery Experience

Because of the limitation of the current design, there was a need to redesign the page and create a **search and discovery _experience_** so that users can _search_ for services they need and _discover_ services that they didn't realize were available on Handy.

The ask wasn't to merely add a search bar and add hundreds of services to the page (which was also part of the goal). It was important for the team to create an experience that conveyed **breadth** and **expertise** to our users but also didn't cannabalize existing services.

My Process for This Project

Exploratory Research
User testing competitor apps and Handy's current Services page.

Set Hypotheses
Based on research, what set of things can help solve the problem?

Design Goals
How can design ensure the success of this new page?

Design Vision
Designing the best solution for the problem

Design/User Testing
Create high fidelity designs and user test to answer hypotheses.

Brainstorming/Wires
Wires to put ideas onto paper.

Determine MVP
Reverse engineer Vision state and plan how we launch iteratively.

Launch!
Taking learnings from initial launchto interate on.

Exploratory Research

Research Overview

Since this is an overhaul of a highly trafficked page[1] and search and discovery is a relatively new experience for Handy, it was important to do some exploratory research before designing. Various research tools were utilized to gain a better understanding of the problem:

- **Current State Audit**
  - User Testing current design.
  - Data Snapshot of page.

- **Competitive Analysis**
  - User Testing apps with search experiences.

[1] 25-30% of all traffic touches the Services Page
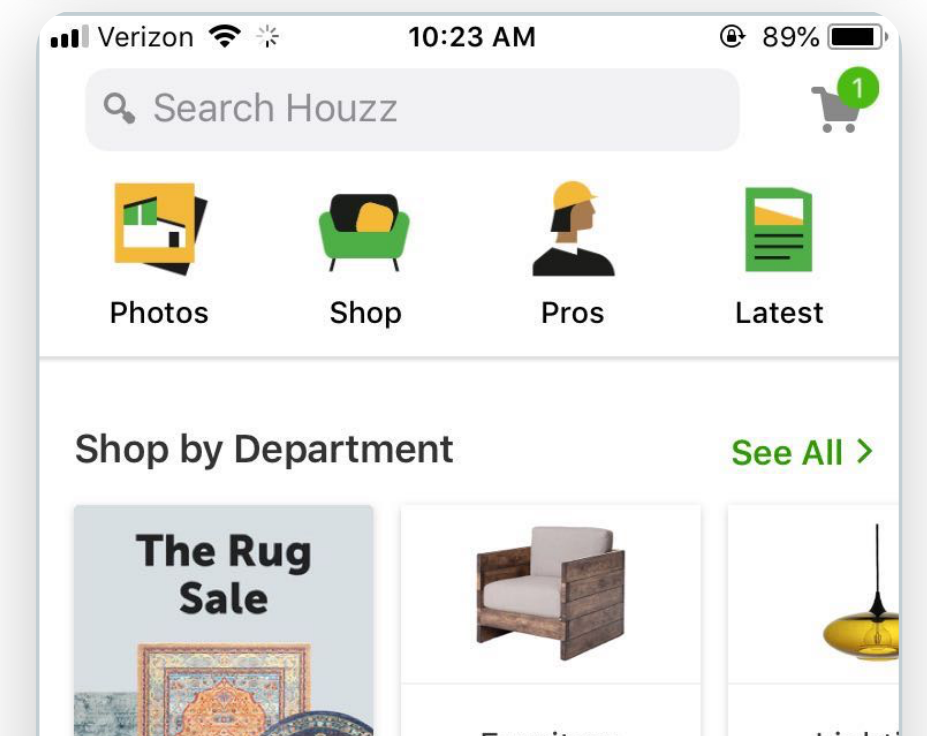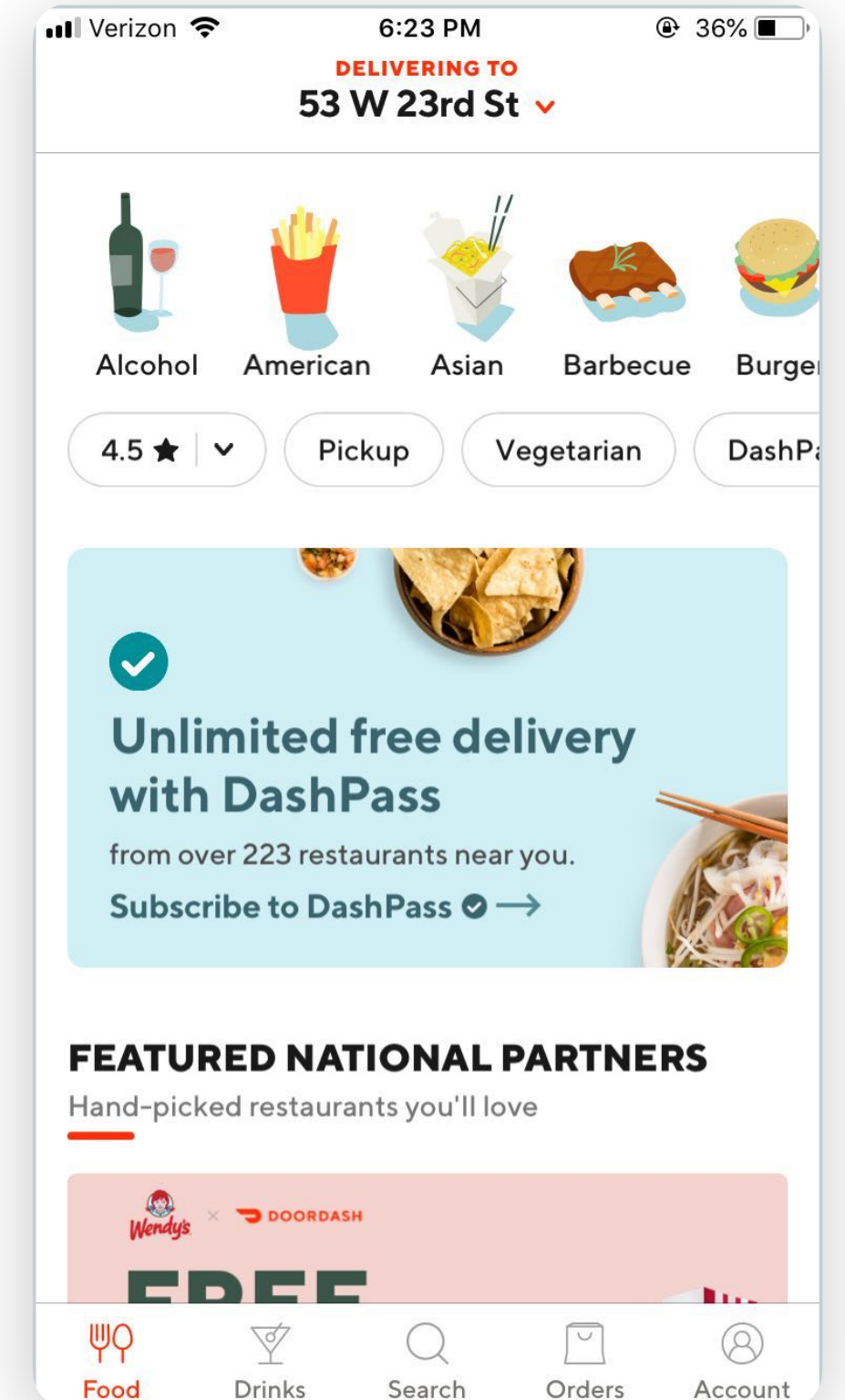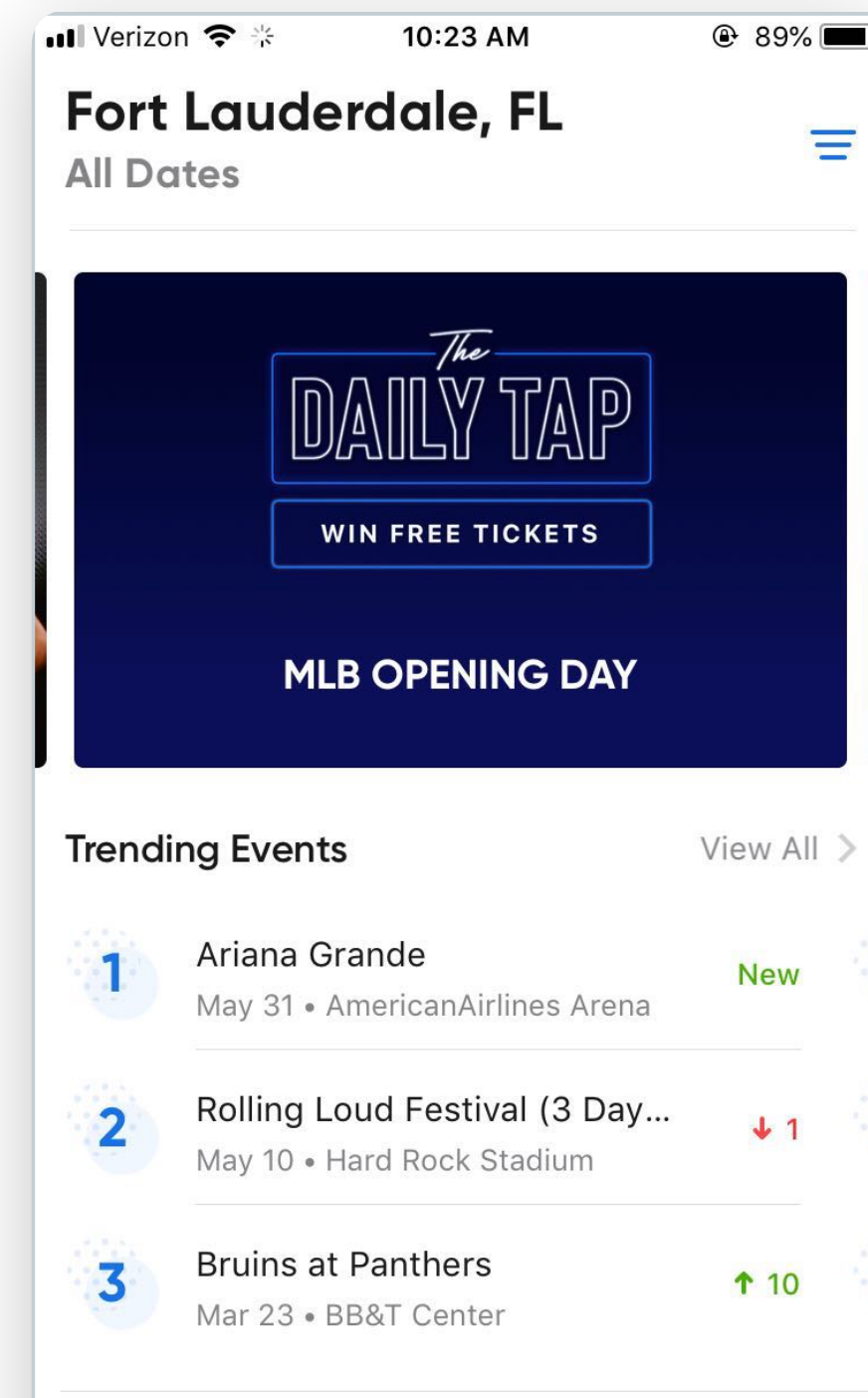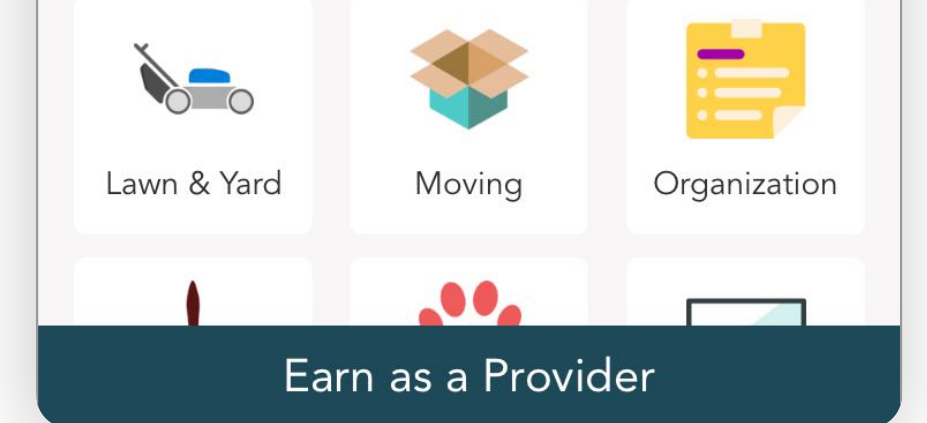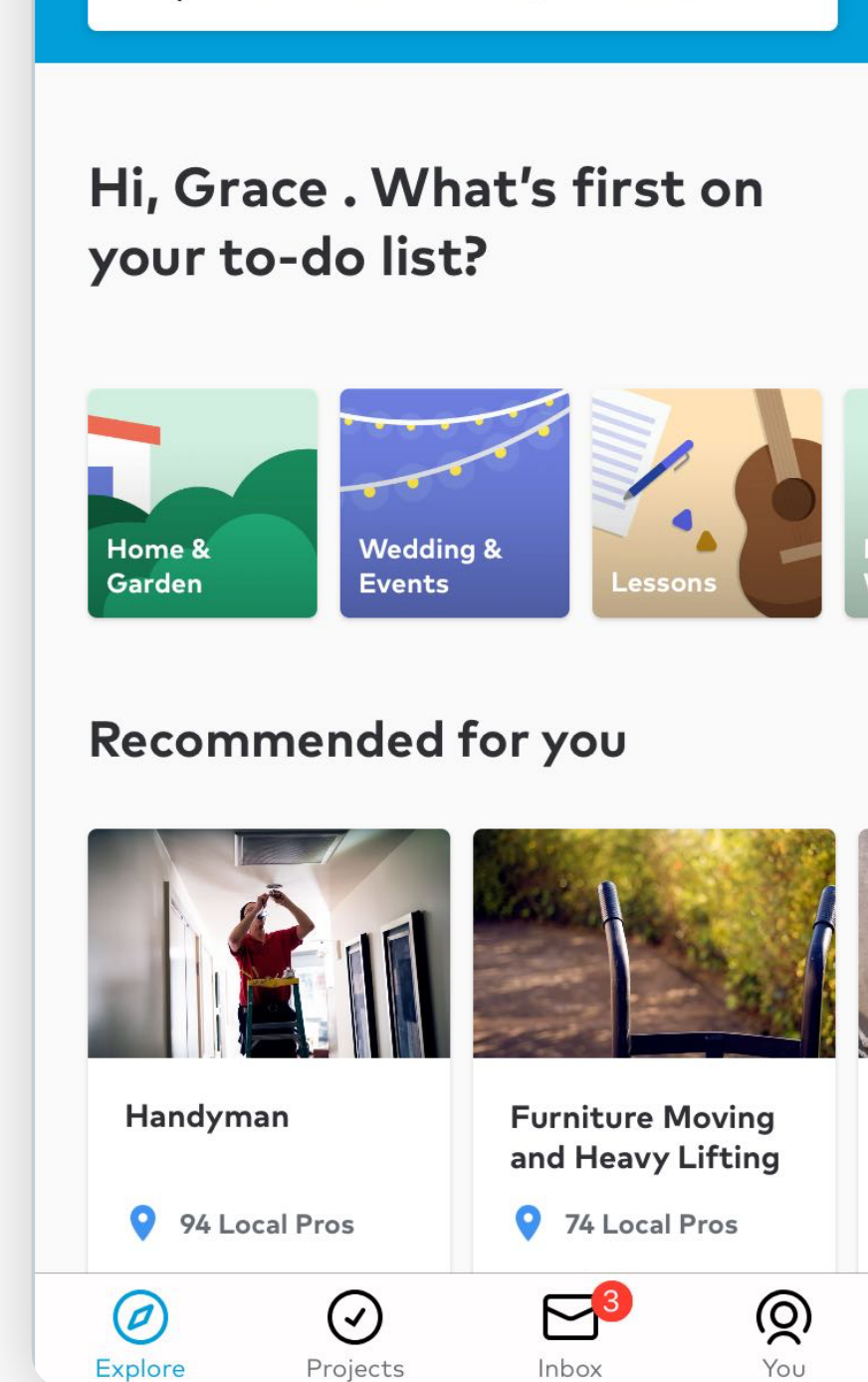
Current State Audit Takeaways

By performing this audit, I wanted to understand how users interacted with the current design and see if there are quick iterative improvements the team can make while we figure out the final solution.
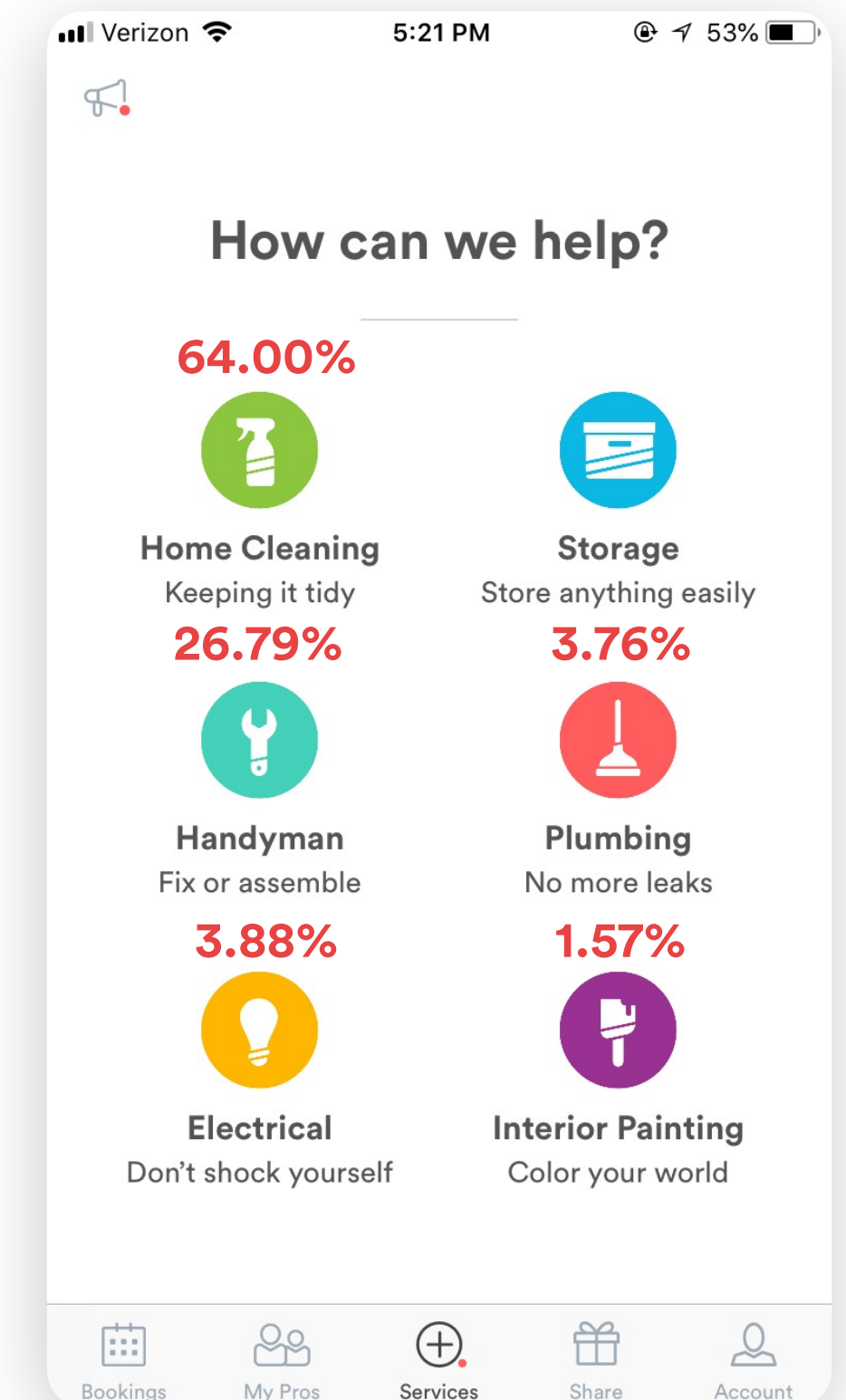
Data Snapshot Learnings:

- Cleaning and Handyman get the most clicks and see highest level of conversion.

User Testing Learnings:

- Users don't think the tiles are clickable.

- Users have their own categorizations when thinking of home services.
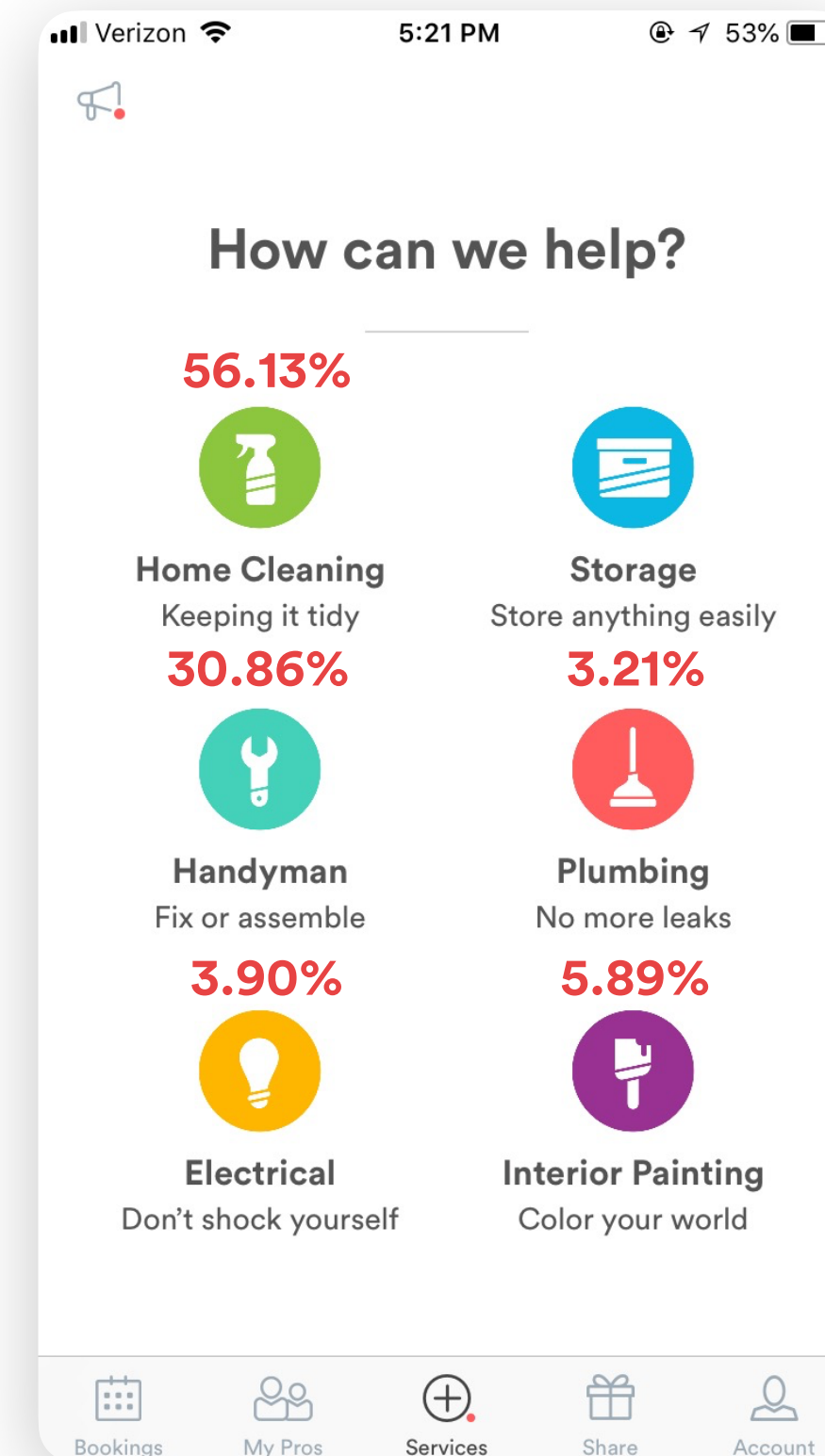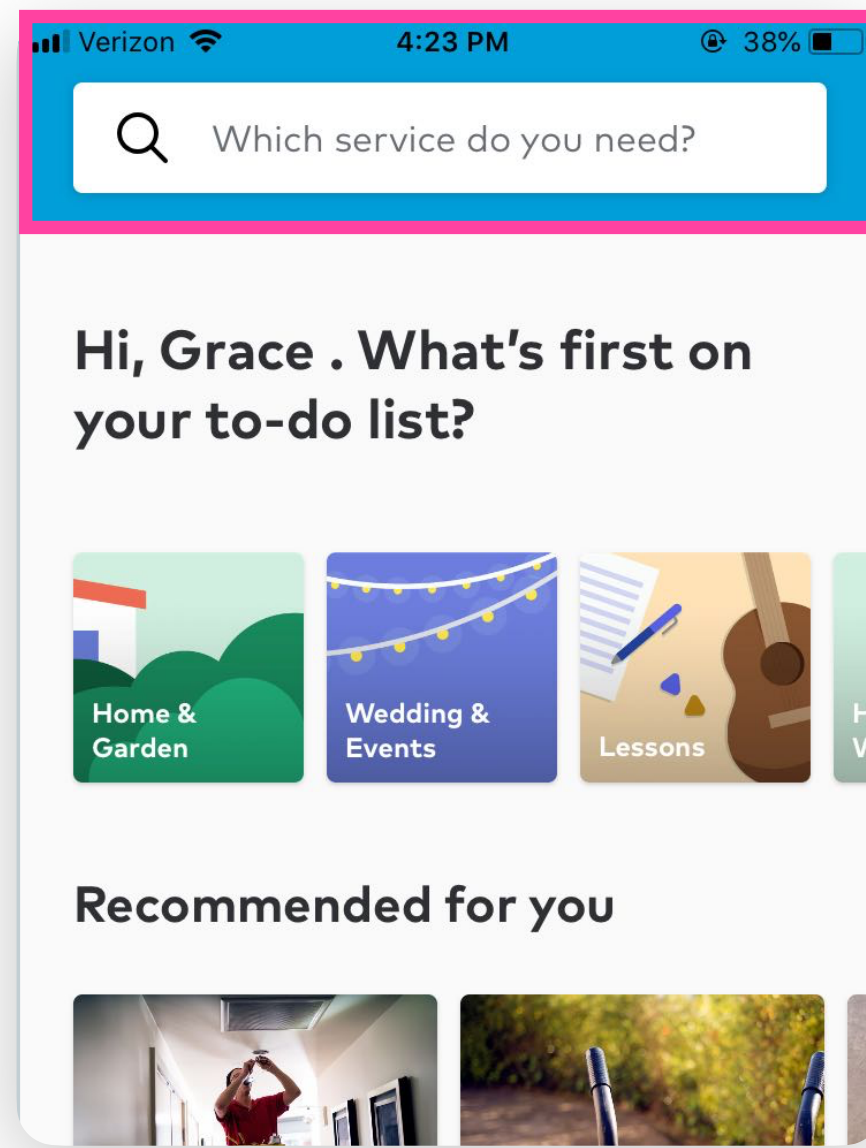

Click Data Average

Bookings Done Average
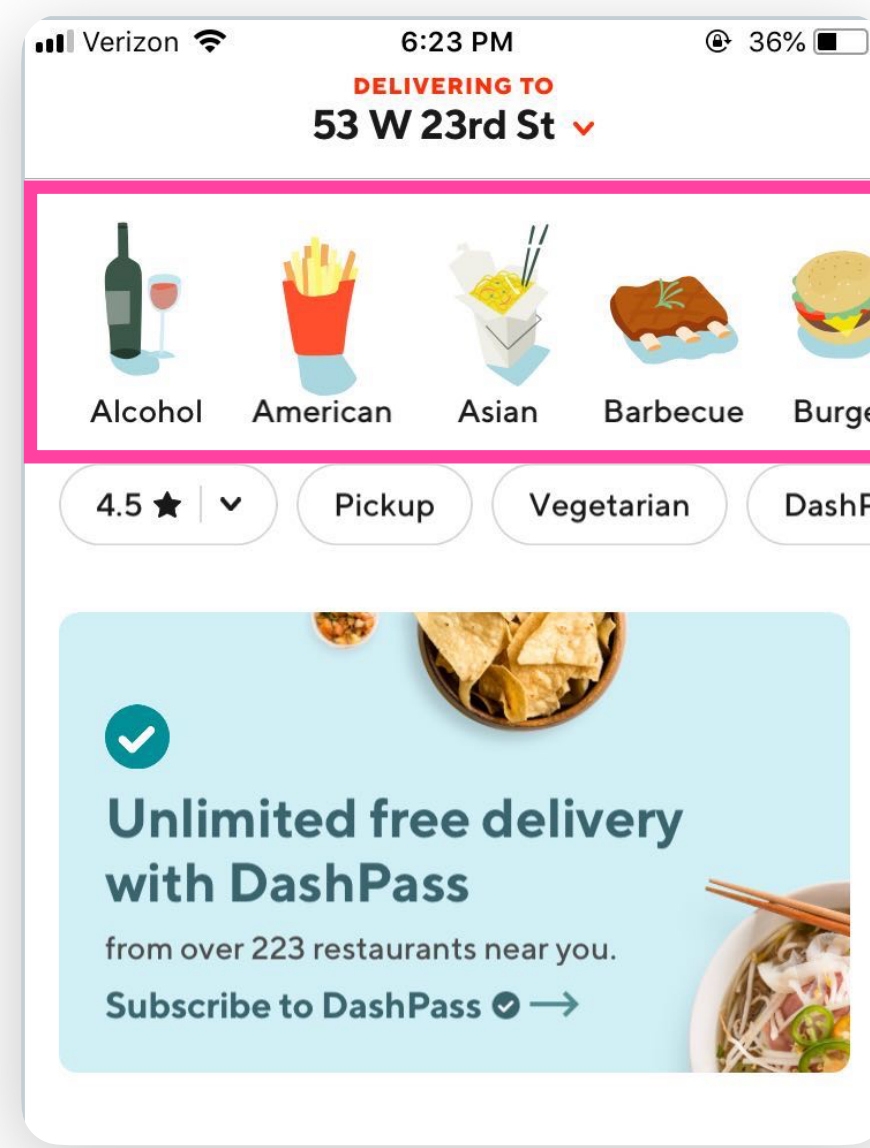
Competitive Analysis Takeaways

By conducting usability tests on competitor apps, I wanted to learn how other apps facilitated search and discovery.

User Testing Learnings:

- The search components that performed the best were Search Bars and Category Filters.
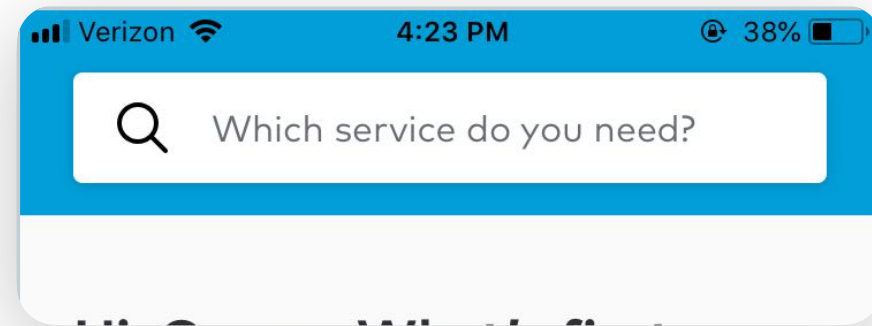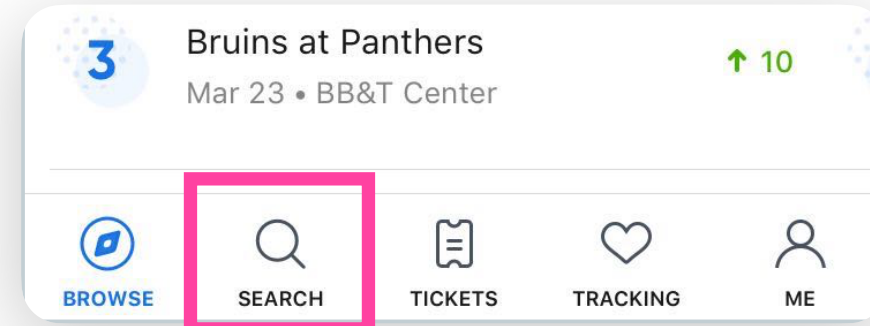

Search bar on Thumbtack

Category Filters on DoorDash

Competitive Analysis Takeaways

- UI and placement of search components determined success.
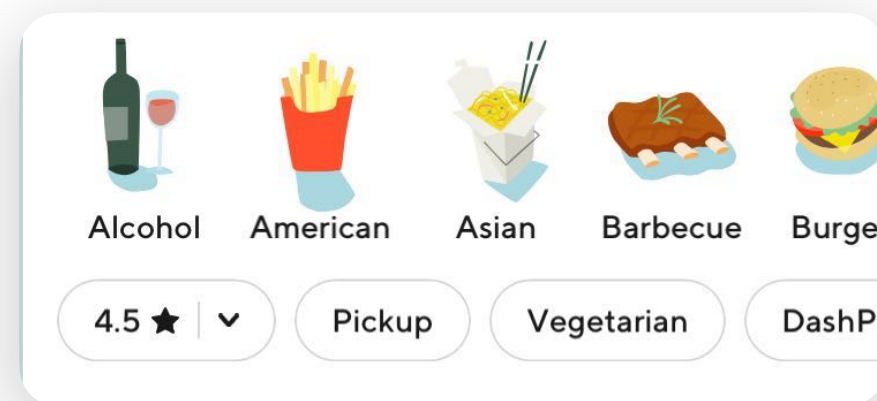 - More people used Thumbtack's search bar over SeatGeek's - which is on other page
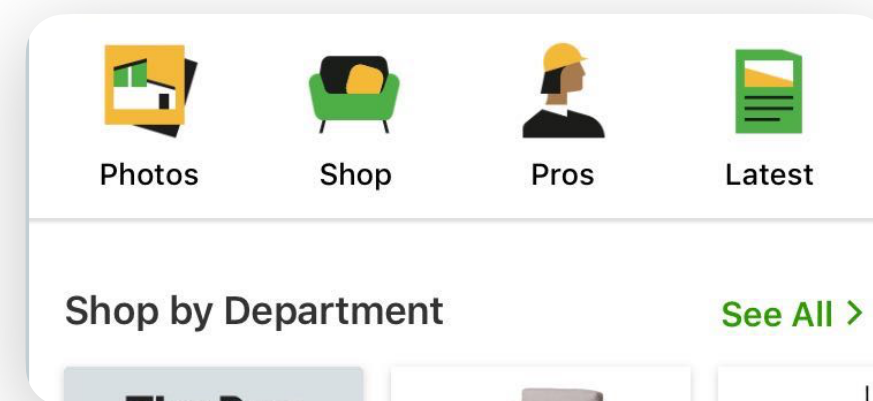

Search bar on Thumbtack

Search Page on SeatGeek

- Categorization and organization of information was determined success.
  - DoorDash's categorization made more sense to their customers, more so than Houzz's where users skipped over

DoorDash

Houzz

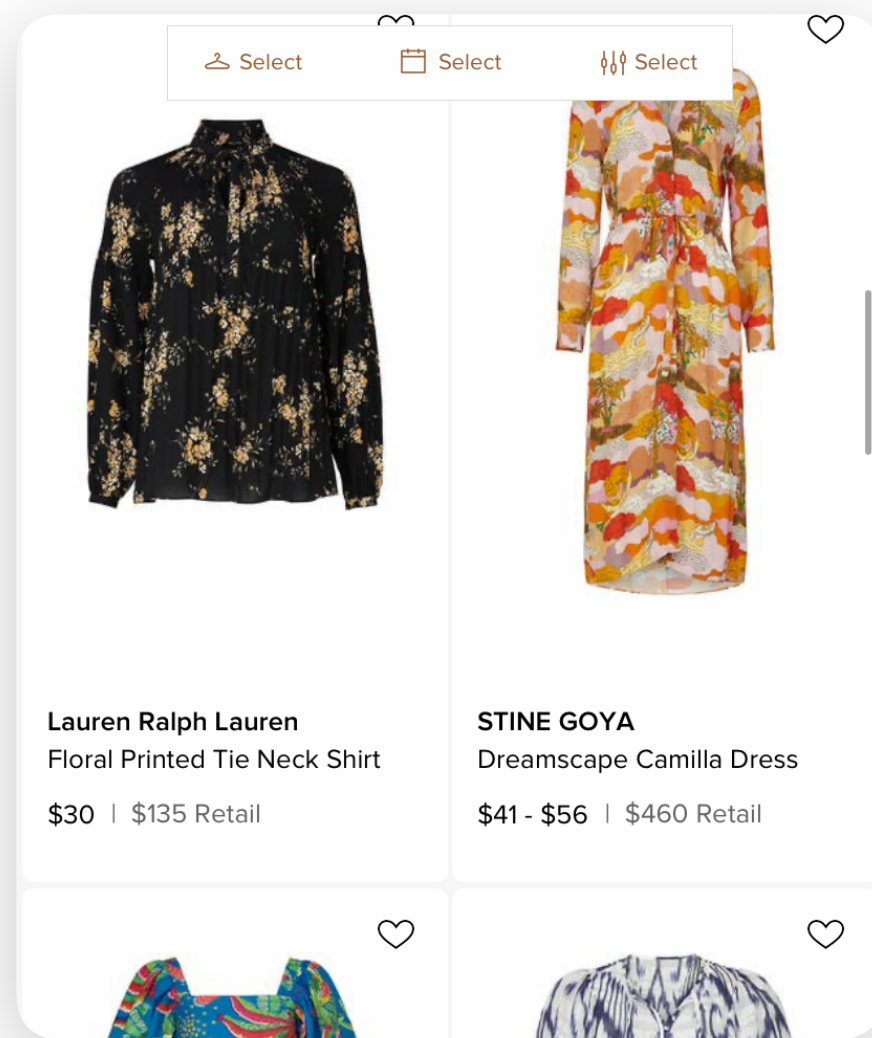# Competitive Analysis Takeaways

- On apps with a lot of content, users preferred to scroll.
  - Apps like Rent the Runway surfaced a lot of content upfront and let the user decide how they want to filter results.
  - Apps also scrollable lists of links to convey breadth.

Endless scroll on RTR
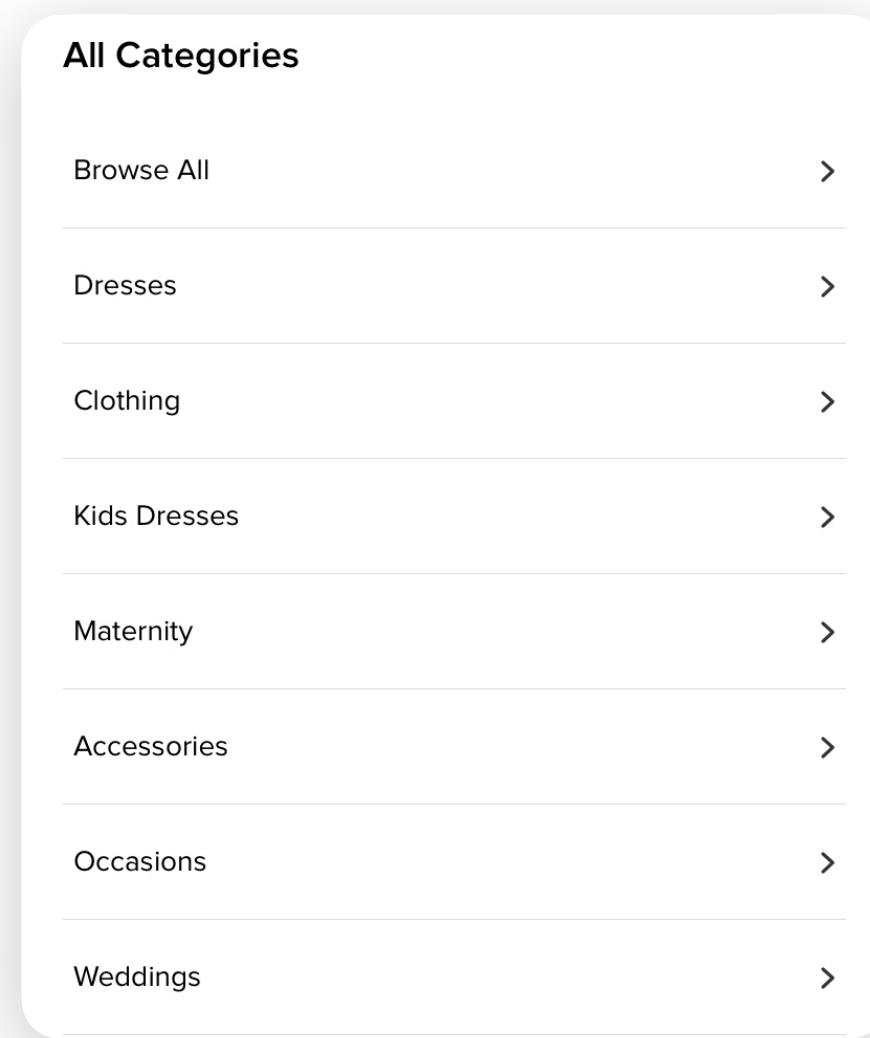
Scrollable List on RTR
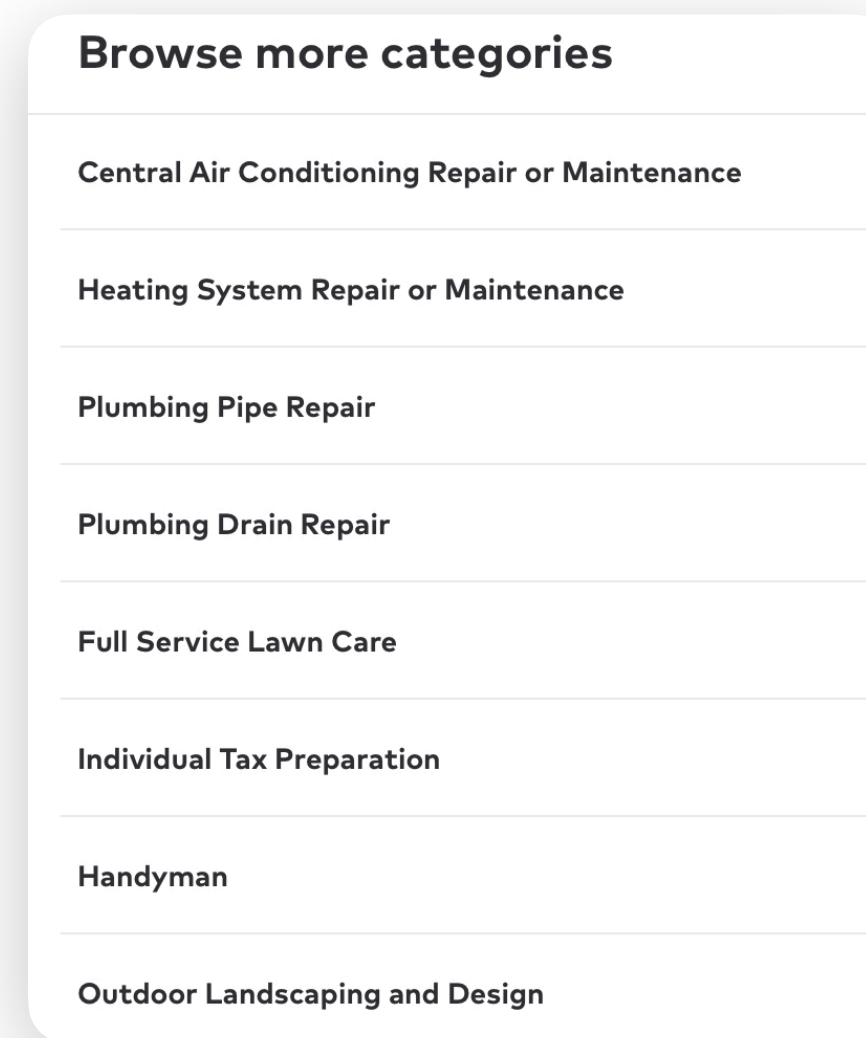
Scrollable List on Thumbtack
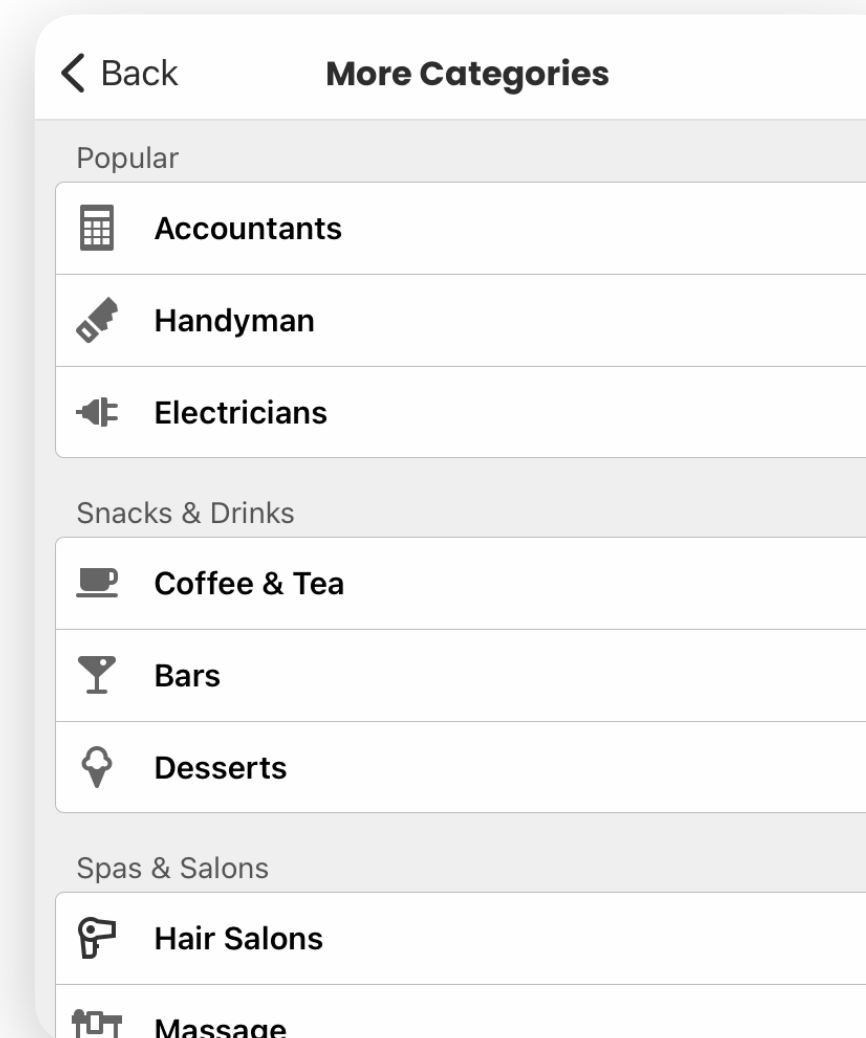
Scrollable List on Yelp

Hypotheses & Design Goals

Hypotheses

Based on my observations, I was able to come up with a few hypotheses I wanted to test with design:

Hypothesis 1: Search Bar is obvious choice.

Hypothesis 2: Categorization is important.

Hypothesis 3: People like scrolling. Scrolling will also help convey breadth.
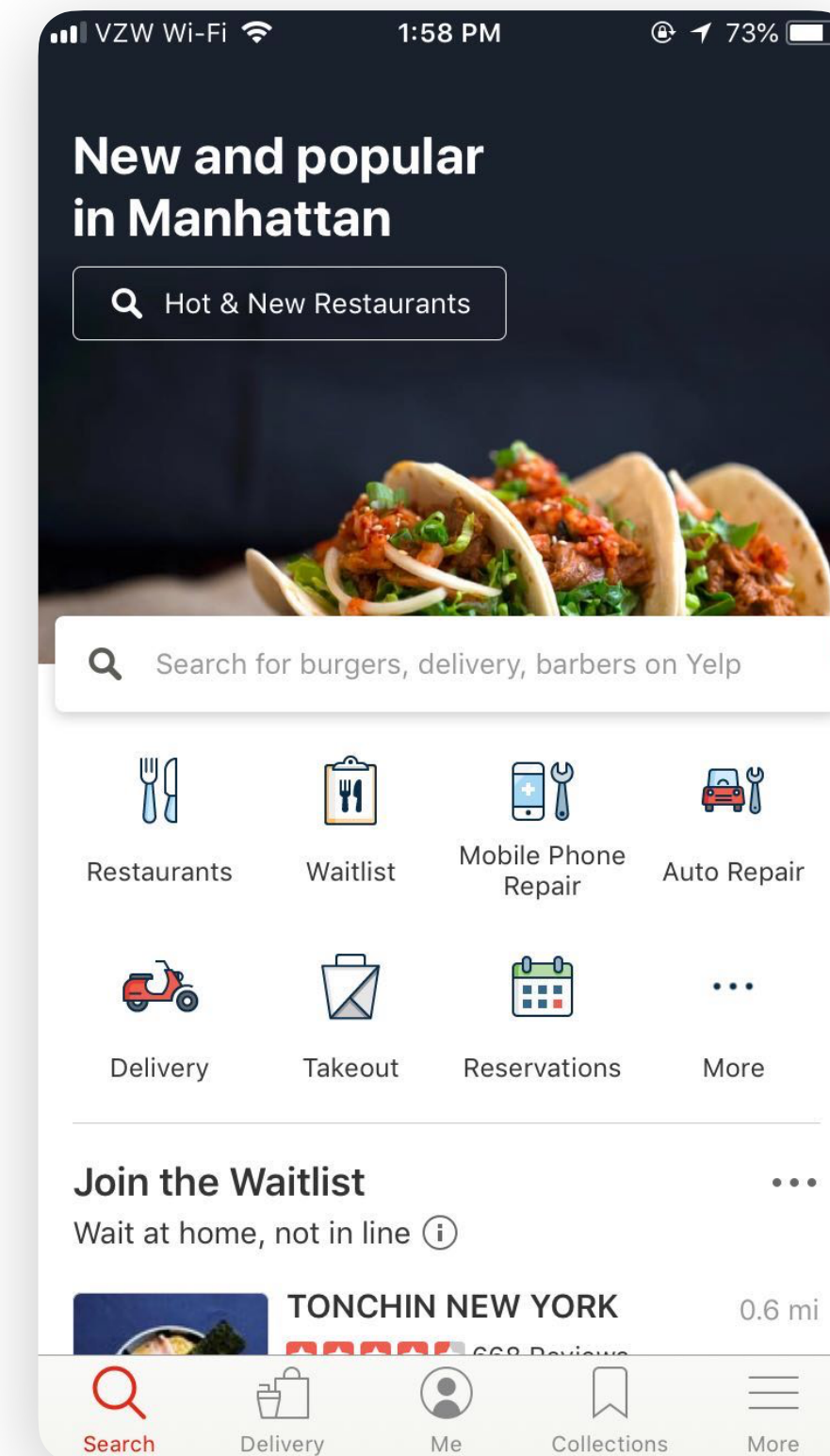
Yelp
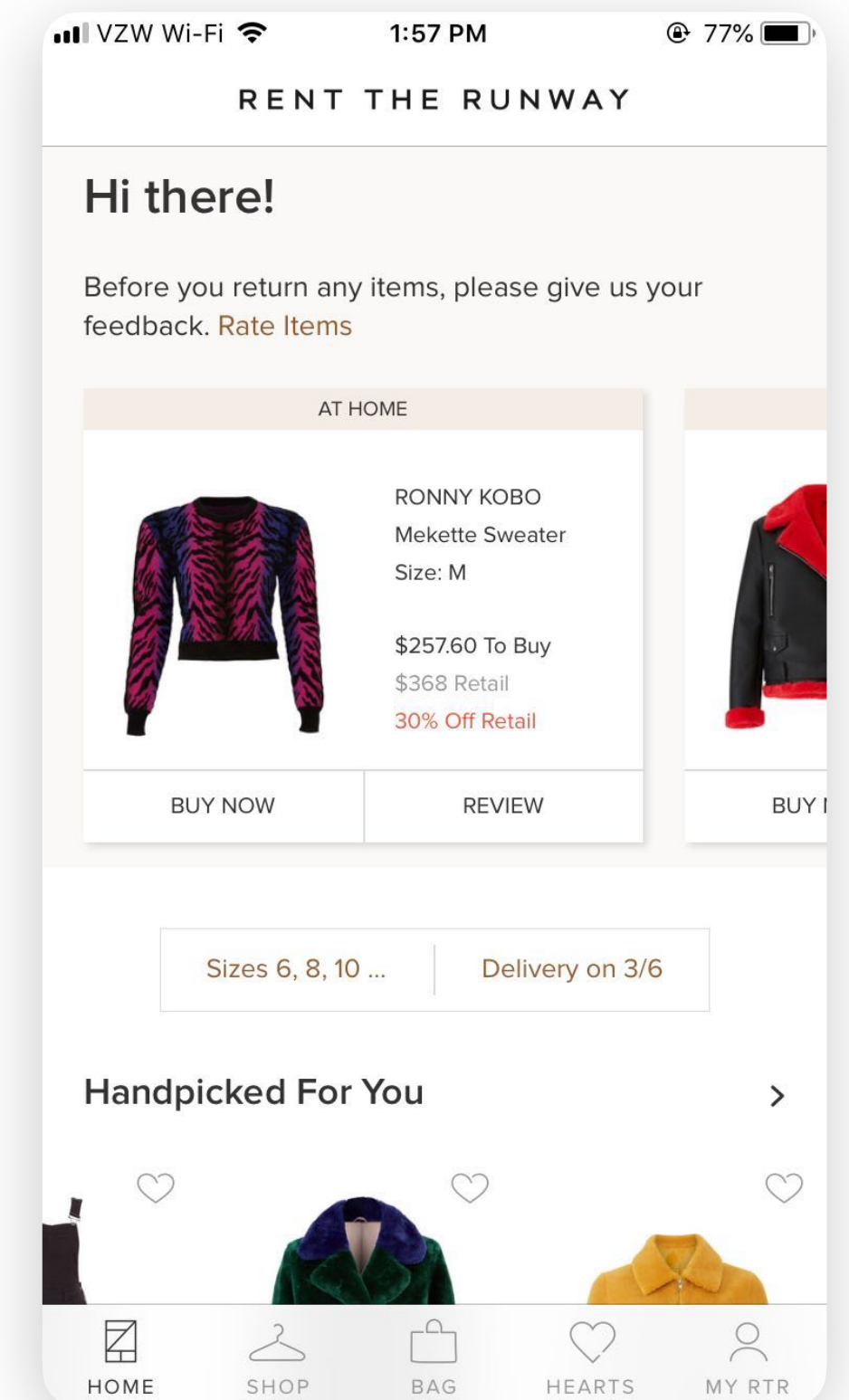
Rent the Runway

Design Goals

Breakdown our main objective into tangible and specific design goals:

- Scalable Design.

- Convey Breadth.

- Prevent cannibalization.

Brainstorming & Wireframing

Brainstorming

I started wireframing and brainstorming with these design questions in mind:

Handy Services vs Home Advisor Services:
- Should they be differentiated? And how?

Filters:
- The app will have lot of new content. How will users filter content so that it's digestible?

Organization:
- How should the content be organized?
  - By service group? Area of home? Profession?
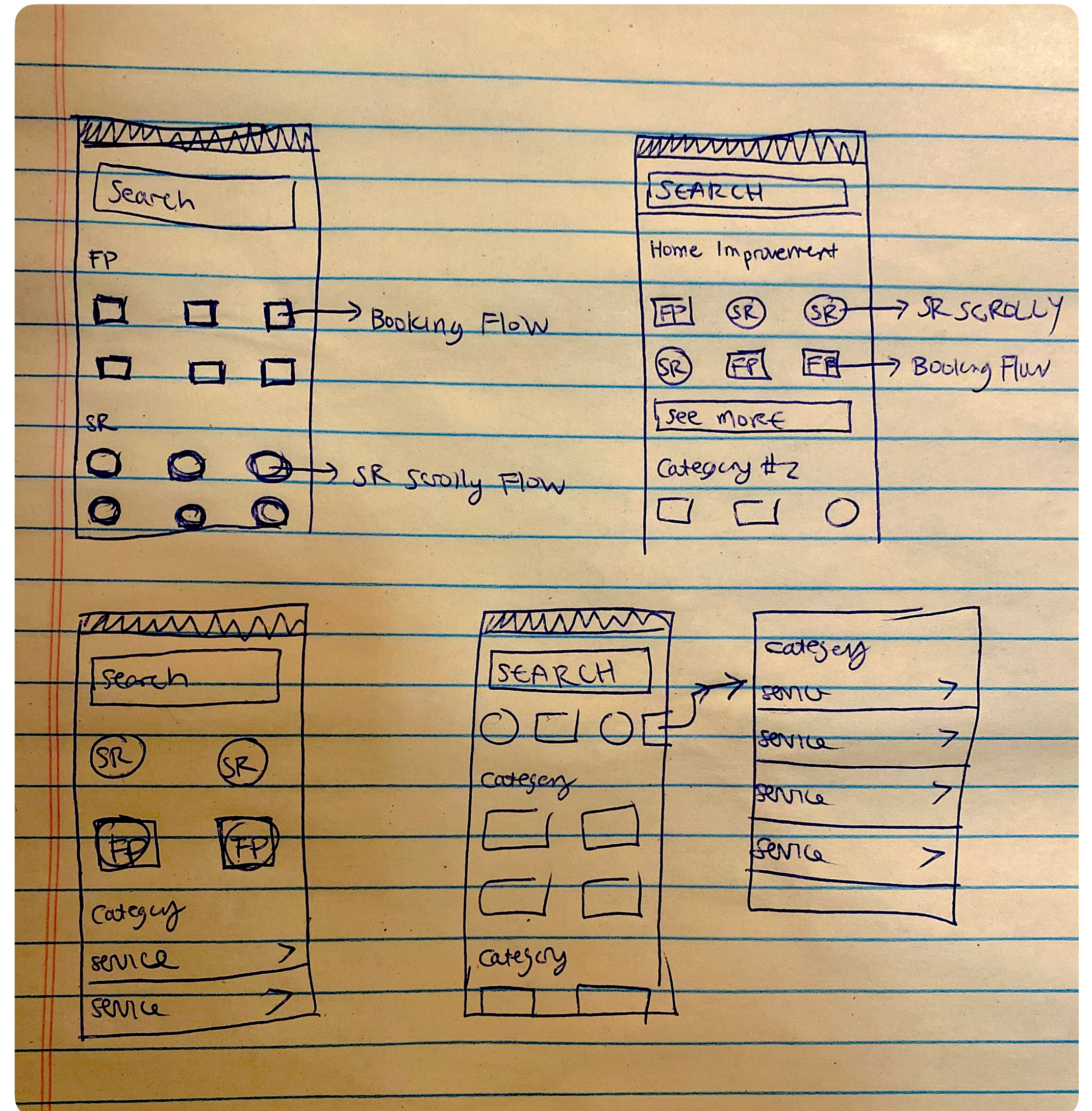
Wireframes

Differentiate FP vs SR

H1 Placeholder

Search for home services or tasks

Fixed Price Services

Copy Placeholder   #3

See All

Service Request Services

Copy Placeholder

See All

Same UI for FP vs SR

Popular Services

Copy Placeholder

Home Cleaning	FP 2
SR 1	SR 2

See More

Home Improvement Projects

Copy Placeholder

SR1	FP 1
FP2	SR 2

See More

Quick Links

Quick Links

Copy Placeholder

Home Cleaning	Furniture Assembly	TV Mounting
Interior Painting	Picture Hanging	Major Home Renovations

Home Improvement Projects

Copy Placeholder

SR1	FP 1
FP2	SR 2

See More

Category Filters

Search for home services or tasks

#1   #2   #3   #4

Category Feature

FP1	FP 2
SR 1	SR 2

Wireframes

Service Links
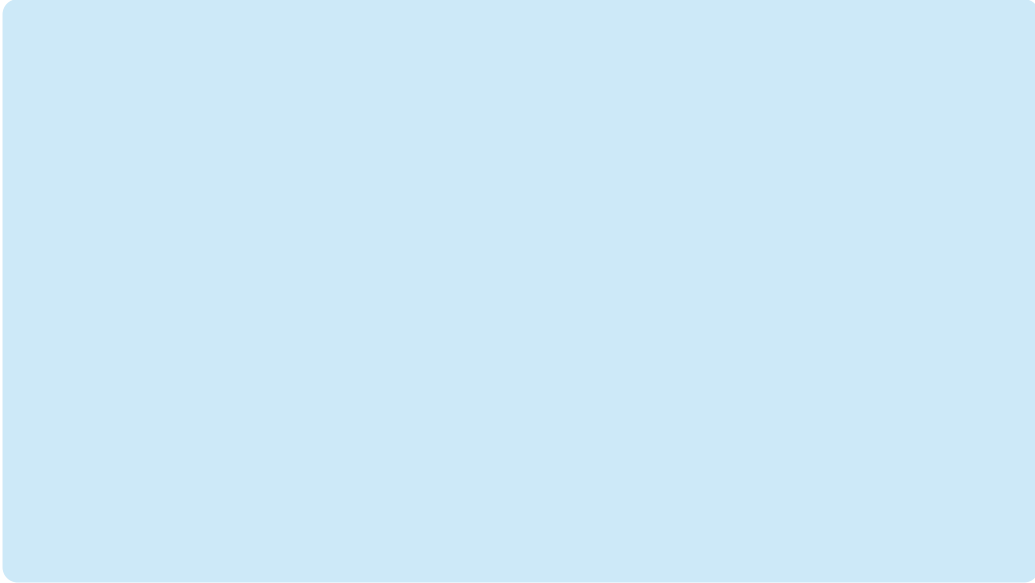
Browse Services

🧴	Home Cleaning	›
🛠️	Service #1	›
	Service #2	›
	Service #3	›
🛋️	Service #4	›
🛏️	Service #5	›
🌲	Service #6	›
💡	Service #8	›
	Service #9	›

Aspirational - Instagram

Improve your bathroom
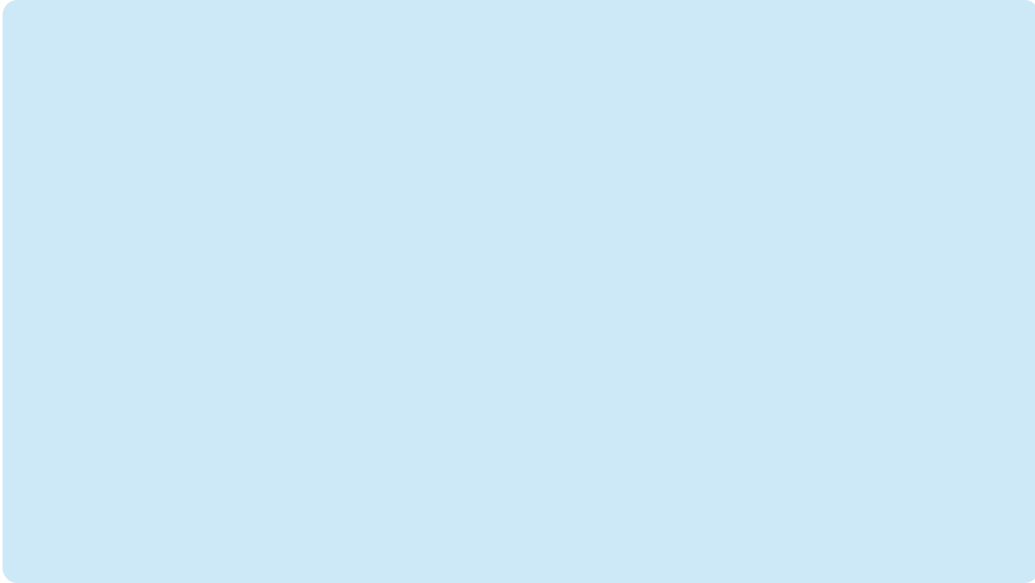
Copy Placeholder

Get a Quote

Improve your kitchen

Copy Placeholder

Get a Quote

Designs & User Testing

User Testing High Fidelity Designs

To test our hypotheses and answer our design questions, I designed high fidelity screens by combining components from my research and wireframes and started testing them by asking users to find a professional to fix a broken outlet in their home.

Each round of designs, I cross-tested competitor apps that had the same yet functional components since we were limited to simple prototypes. I wanted to ensure clean results.
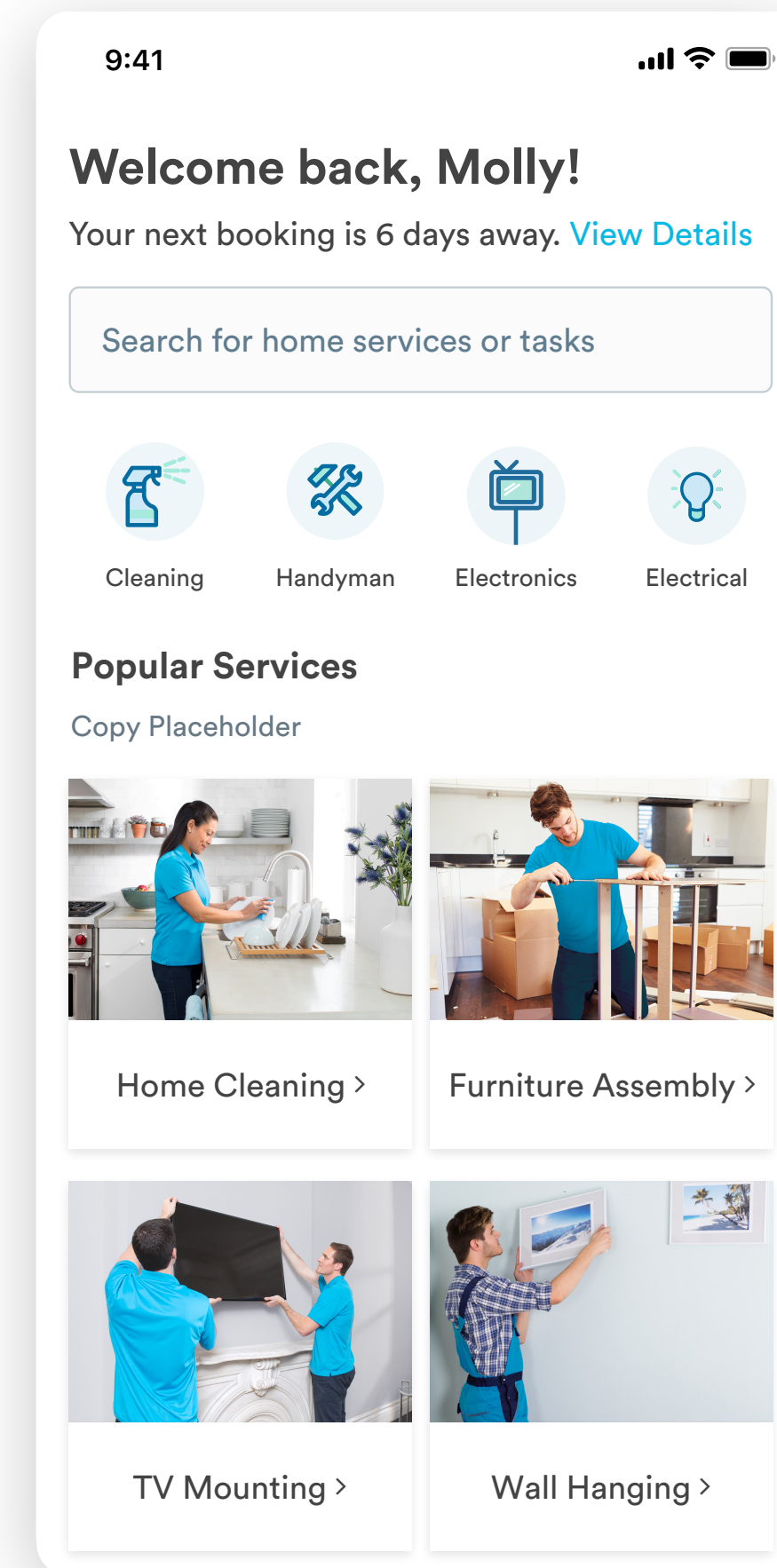
Design #3
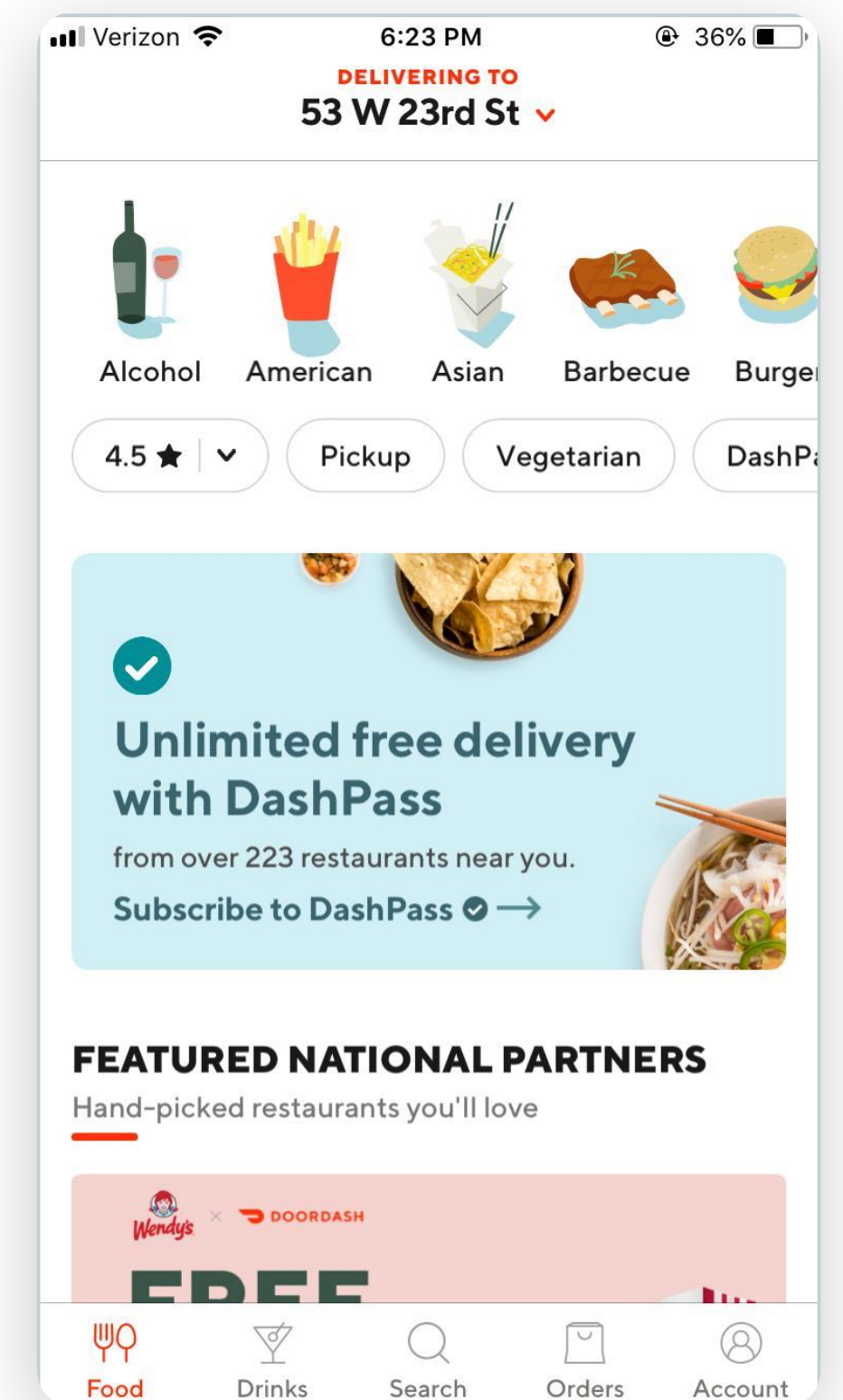
DoorDash

Examples of Tested High Fidelity Designs

Screen 1

9:41

Welcome back, Molly!

Your next booking is 6 days away. View Details

Search for home services or tasks

Book Today
Copy Placeholder

Home Cleaning
Furniture Assembly
TV Mounting

Interior Painting
Picture Hanging
See All

Find Companies in Manhattan
Copy Placeholder

Home Cleaning
Furniture Assembly
TV Mounting

Interior Painting
Picture Hanging
See All

Browse Other Services

A

Additions & Remodeling

Screen 2

9:41

Search for home services or tasks

Welcome back, Molly!

Your next booking is 6 days away. View Details

Cleaning
Handyman
Electronics
Electrical
H

Book a Home Cleaning

Instantly book highly rated cleaning pros.

Book Now

Browse Services

Most Popular Services

Furniture Assembly

General Handyman

Hanging Pictures & Shelves

Home Cleaning

TV Mounting

See All Services

Home Improvement

Air Conditioning

Appliance

Bathroom Remodel

Screen 3

9:41

Welcome back, Molly!

Your next booking is 6 days away. View Details

Search for home services or tasks

Cleaning
Handyman
Electronics
Electrical
H

Popular Services
Copy Placeholder

Home Cleaning >
Furniture Assembly >

TV Mounting >
Wall Hanging >

Interior Painting >
Moving Help >

More Popular Services

Key Learnings from Usability Testing #1

Breaking News:

Users rather scroll than type into a search bar!

~65-70% of users across all usability tests chose to scroll over typing into a search bar or clicking into a category.

Designs with an alphabetical list performed the best. Users were able to find what they were looking for the quickest.

A

Additions & Remodeling

Air Conditioning

Appliance

Appraisal

Architects

Awnings

B

Bathroom Remodel

Basement Remodel

Brick and Stone

Boilers and Radiators

Build a Deck or Patio

C

Cabinets

Carpenters

Carpet & Upholstery Cleaning

Ceilings

Central Vacuum

Cleaning & Maid Services

A B C D E F G H I J K L M N O P Q R S T U V W X Y Z

Most Popular Services

Furniture Assembly >

General Handyman >

Hanging Pictures & Shelves >

Home Cleaning >

TV Mounting >

See All Services >

Home Improvement

Air Conditioning >

Appliance >

Bathroom Remodel >

Countertops >

Kitchen Remodel >

Major Home Renovations >

See All Services >

Handyman Services

Doors >

Furniture Assembly >

General Handyman >

Hanging Pictures & Shelves >

Home Repairs >

Locks >

See All Services >

Electrical Services

Ceiling & Bath Fan >

Electrical Service >

Key Learnings from Usability Testing #2

Breaking News:

Users confused by differentiation.

Differentiating services based on business model - Booking Instantly with Handy vs Getting Quote with HomeAdvisor - proved to be very confusing for customers. It made them hesitate when clicking through the test.

It turned out customers don't care how they will pay for the service, as long as they were able to get it done. This distinction was only important to us!

Handy Services

Book Today
Instantly book highly rated pros at an upfront price.

Home Cleaning | Furniture Assembly | TV Mounting
Interior Painting | Picture Hanging | See All

Instantly book highly rated pros at an upfront price.

HomeAdvisor Services

Find Companies in Manhattan
Get free quotes from local pros and companies.

Home Cleaning | Furniture Assembly | TV Mounting
Interior Painting | Picture Hanging | See All

Get free quotes from local pros and companies.

Key Learnings from Usability Testing #3

Breaking News:

Users filter by Service Group.

The most effective organizing principle was by service group because this is how users think about home services and not by area of the home or by profession as I hypothesized.
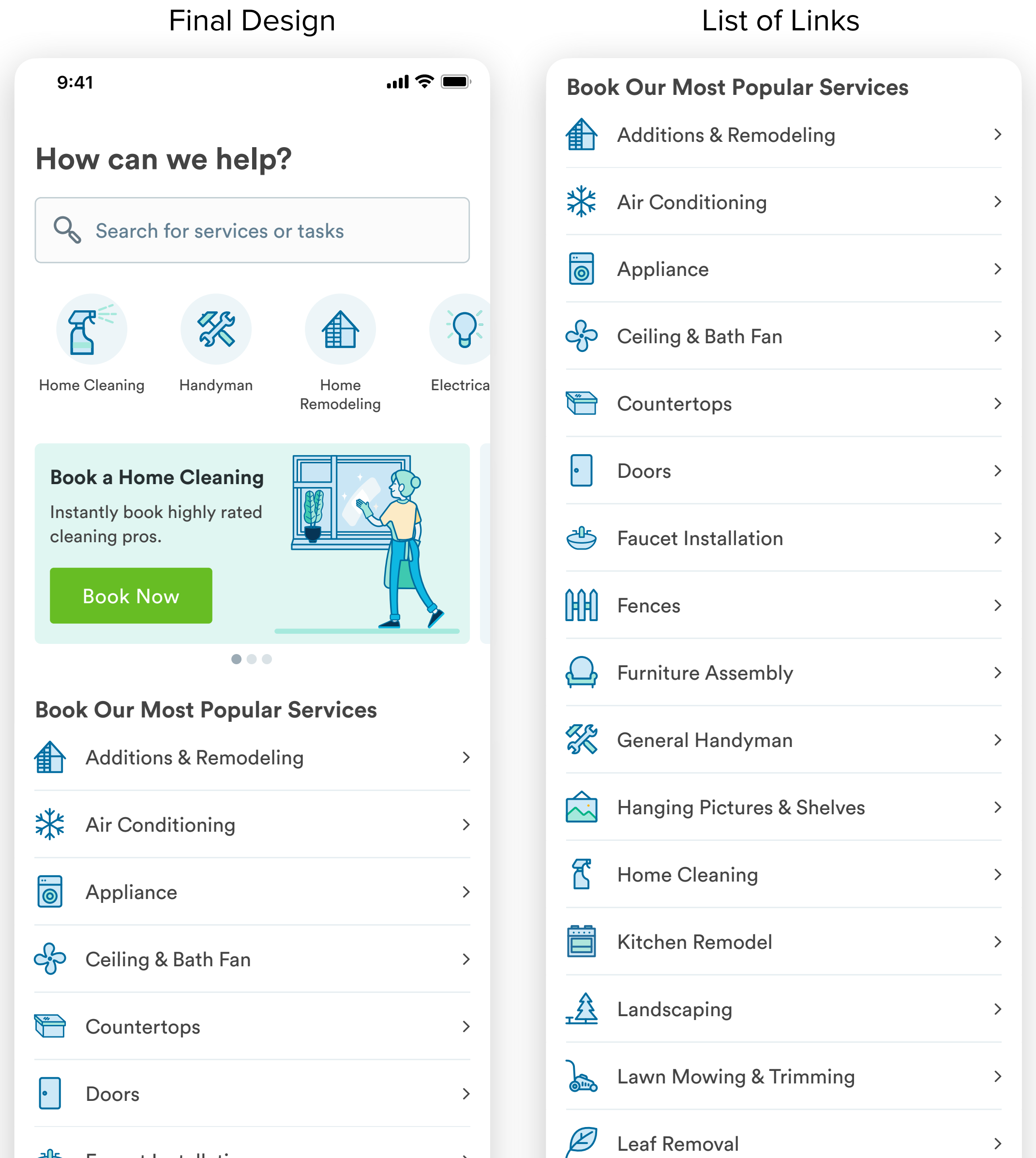
The best UI for this was Category Filters (borrowed from DoorDash). This component was second most used, behind scrolling through a list!
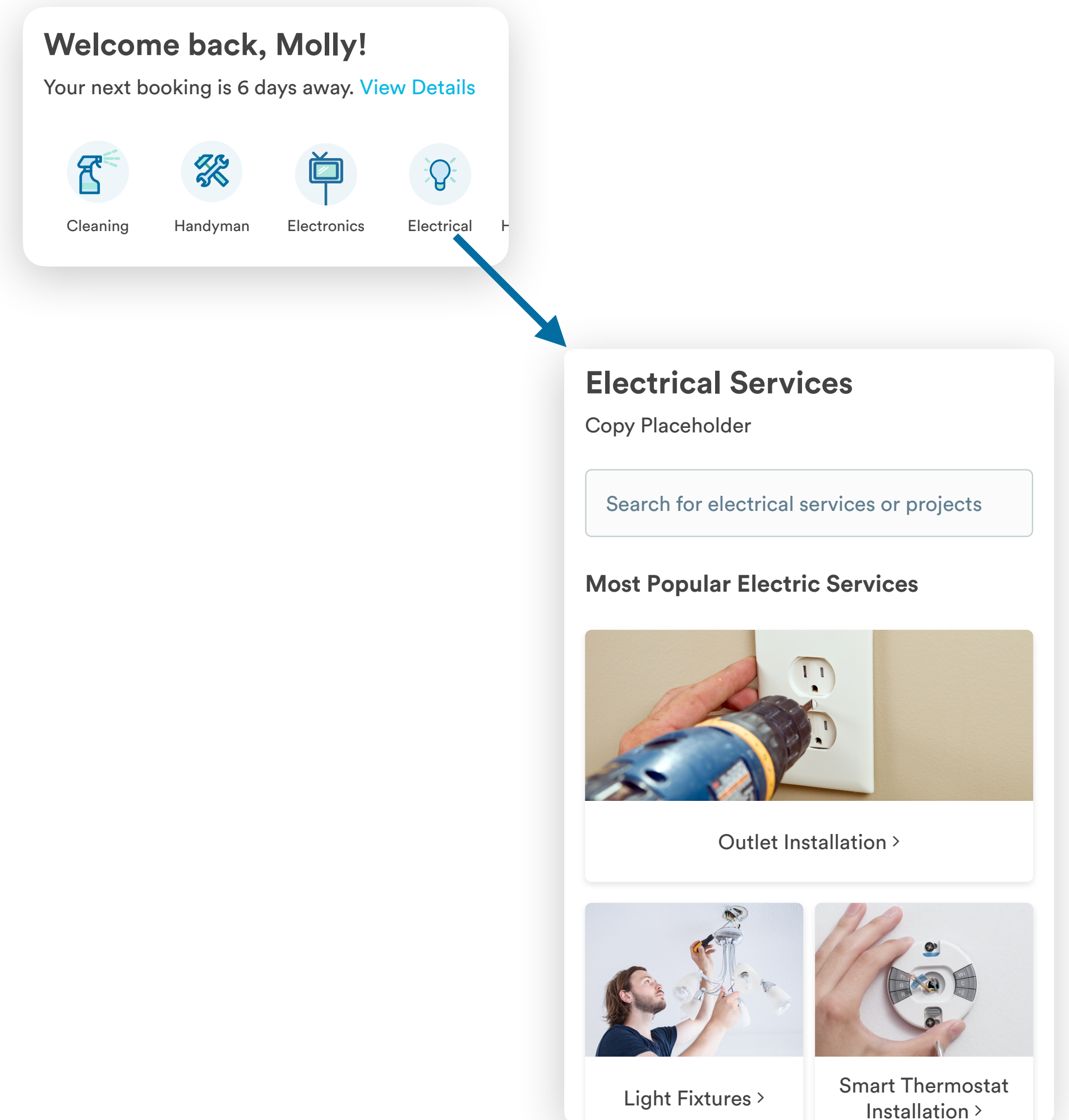
Design Vision

Based on all the user feedback, we were able to pinpoint the final solution:

- **Search Bar**
  - Although it was rarely used, it would be jarring and strange not to have it. It would also isolate the subset of users that do use search bars.

- **Marketing Card**
  - For visual interest and space on our app for promotions.

- **List of Links**
  - Based on data, a list of ~30 services were alphabetized into clickable links. These services met the needs of most of customers.

Final Design

List of Links

9:41

How can we help?

🔍 Search for services or tasks

| Home Cleaning | Handyman | Home Remodeling | Electrical |

Book a Home Cleaning
Instantly book highly rated cleaning pros.

Book Now

● ● ●

Book Our Most Popular Services

Additions & Remodeling >

Air Conditioning >

Appliance >

Ceiling & Bath Fan >

Countertops >

Doors >

Book Our Most Popular Services

Additions & Remodeling >

Air Conditioning >

Appliance >

Ceiling & Bath Fan >

Countertops >

Doors >

Faucet Installation >

Fences >

Furniture Assembly >

General Handyman >

Hanging Pictures & Shelves >

Home Cleaning >

Kitchen Remodel >

Landscaping >

Lawn Mowing & Trimming >

Leaf Removal

Design Vision

- **Hybrid Category Carousel**
  - Instead of each filter acting as a way to open category pages, the team decided on an hybrid approach with category pages and direct links to book to prevent cannibalization the Home Cleaning service.

Category Carousel

Category SubPage
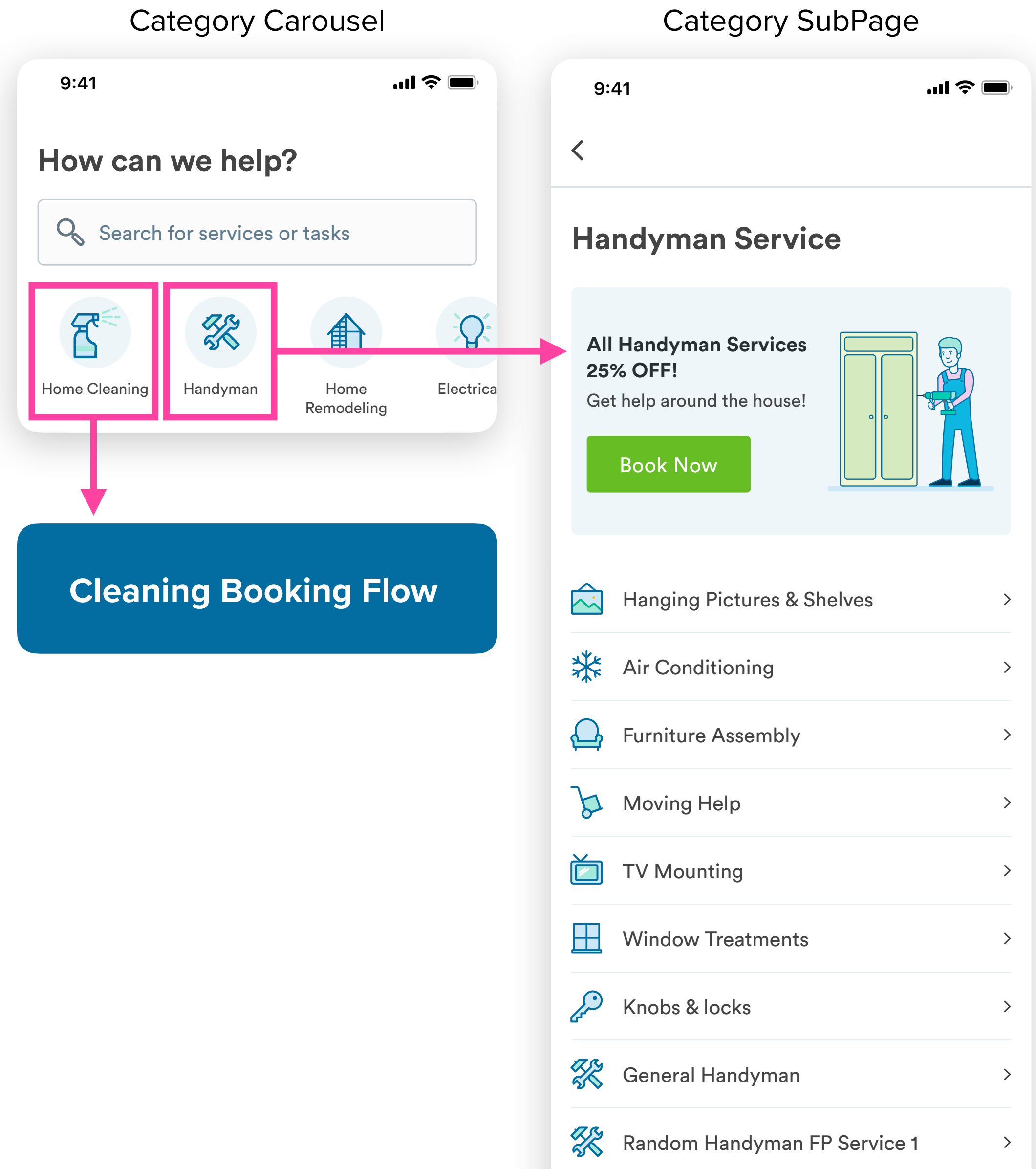
Determining MVP and Launching

The MVP

Our MVP were quick frontend optimizations to our current state. We added:

- **Dummy Search Bar**
  - Opened a web browser in-app of our All Services page that already had a search bar experience. We wanted to collect data on how often people will click on a search bar in app.

- **Arrows**
  - Usability improvement (based on our audit) to increase usability, clicks, and conversions.

- **Add Home Remodeling Service**
  - Validate that our app users are interested in new services and to start collecting revenue on new services.
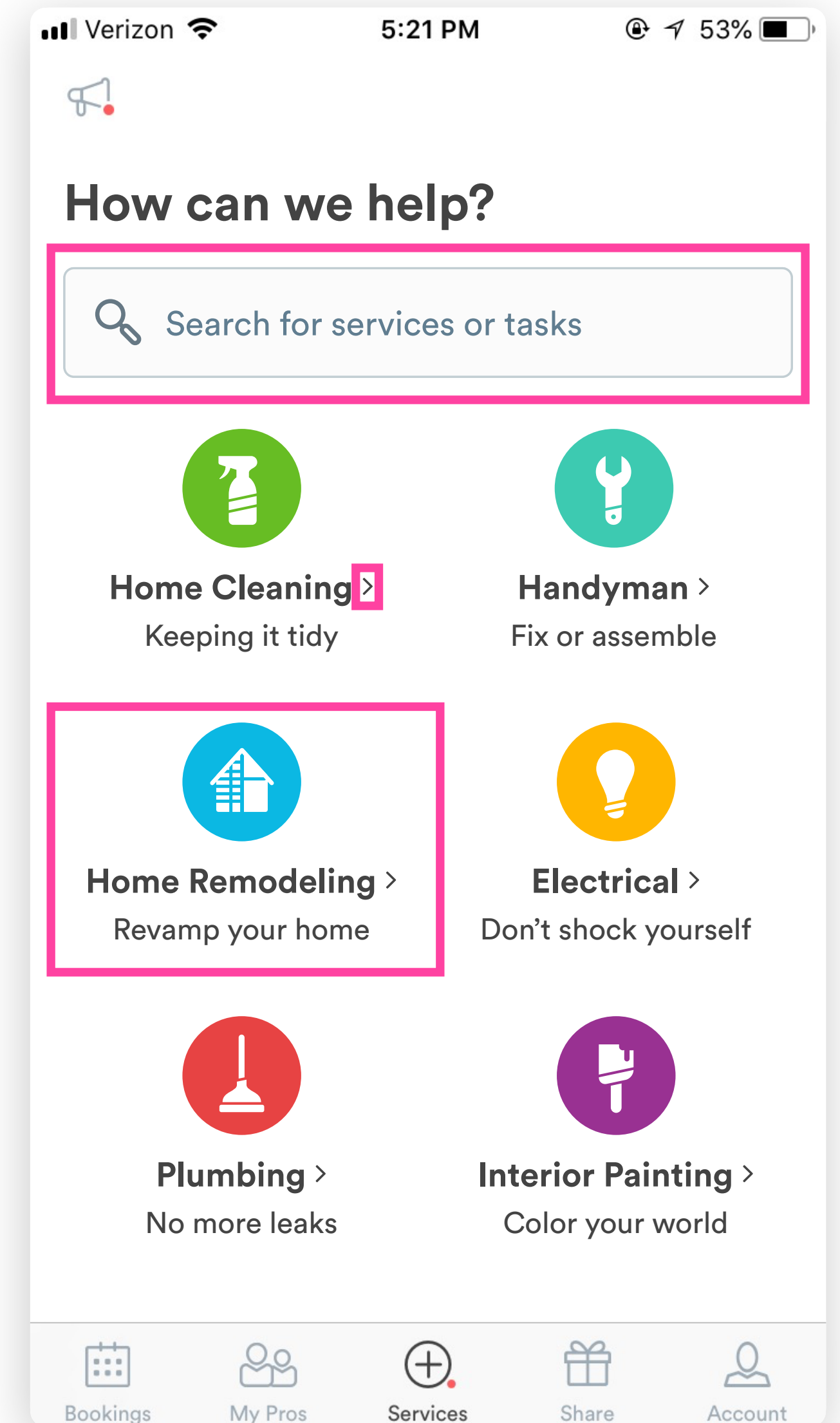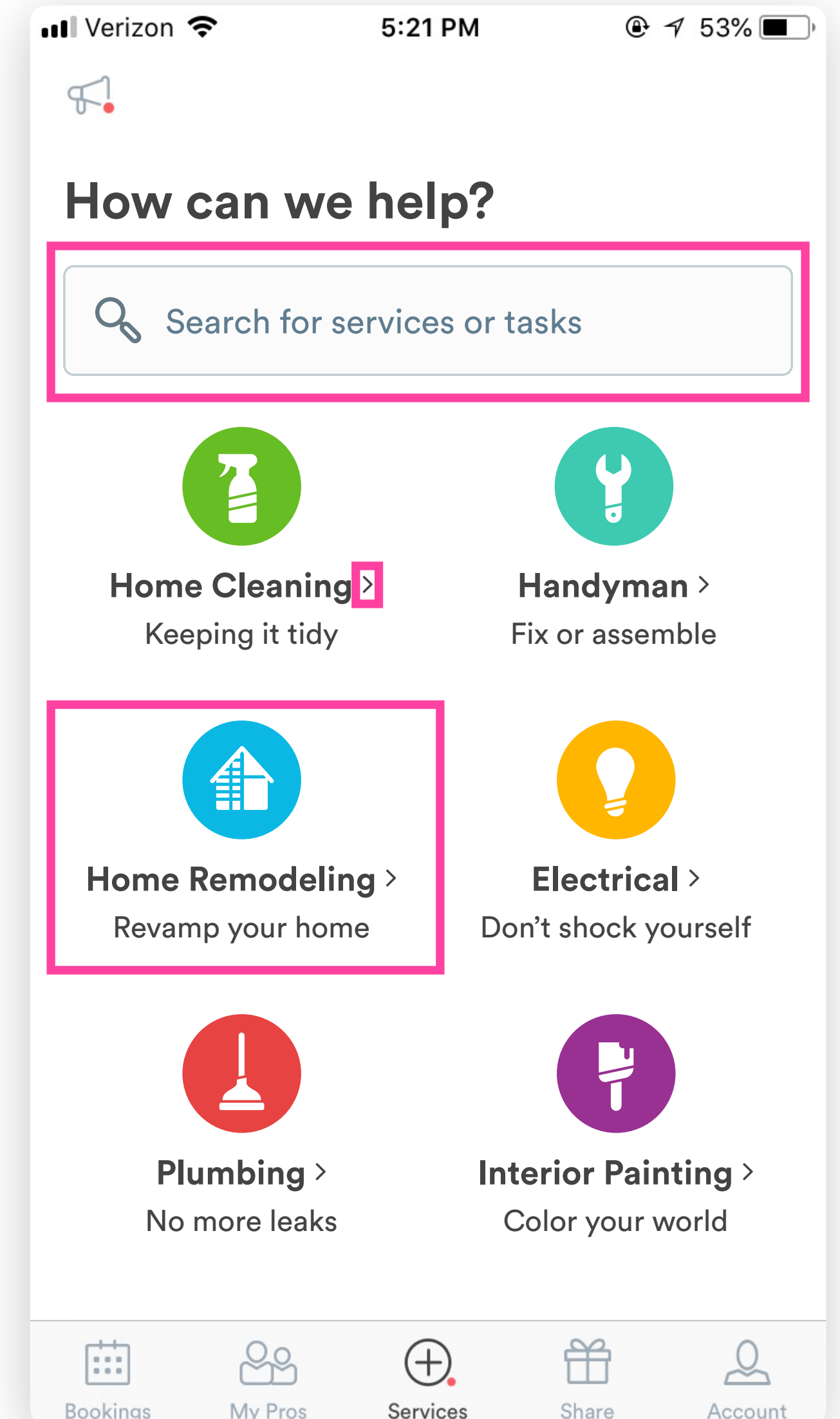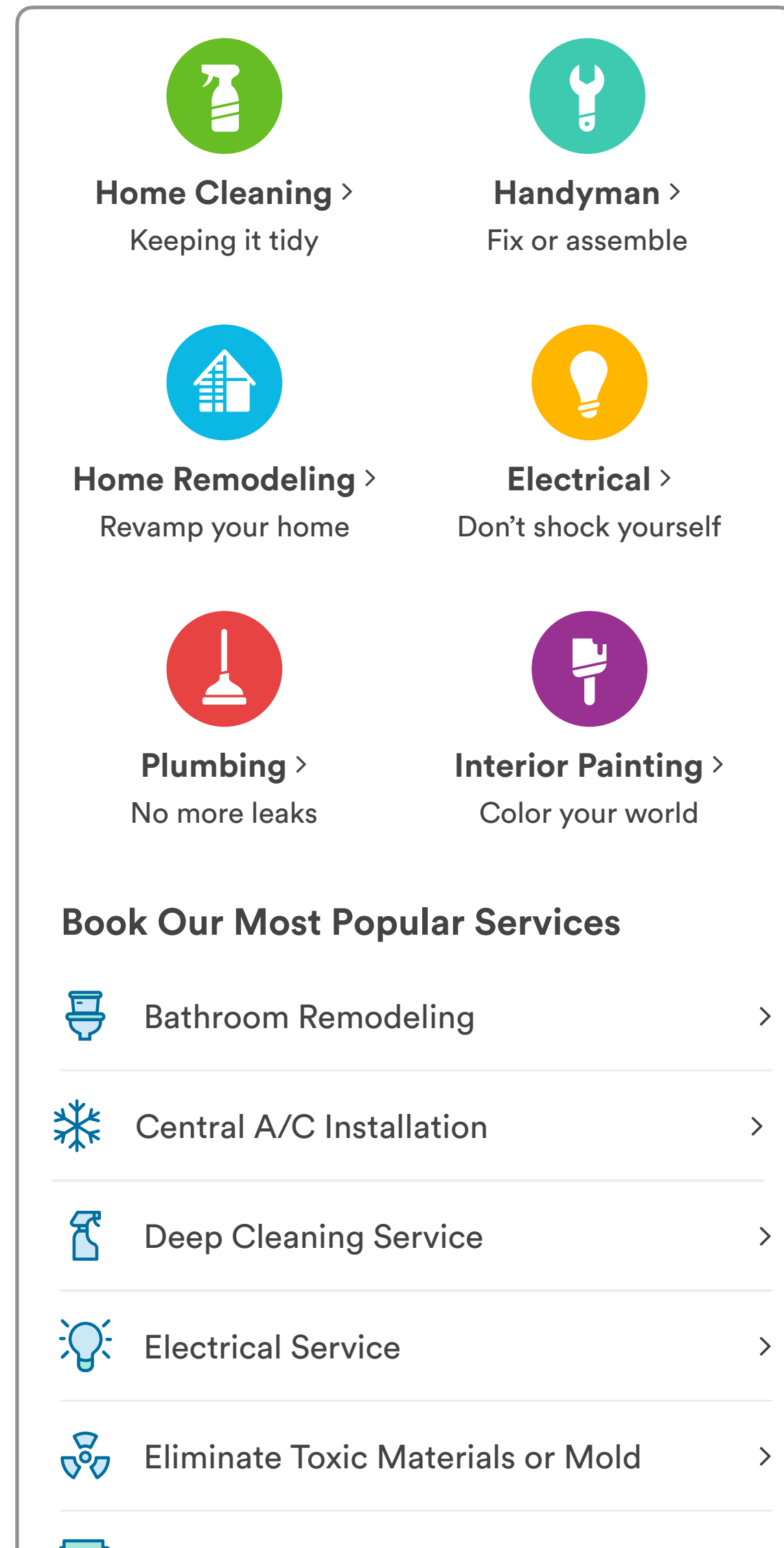
MVP Results

Our MVP results were very positive:

- Search Bar was clicked on ~55% of visits.

- Incremental ~$4k of revenue made on Home Remodeling category.

- .5-1.2% increase on clicks on each category.

Based on this data, we learned that our native users do have an appetite for our new services. The team was able to continue building out our vision design.

Phasing our Launch
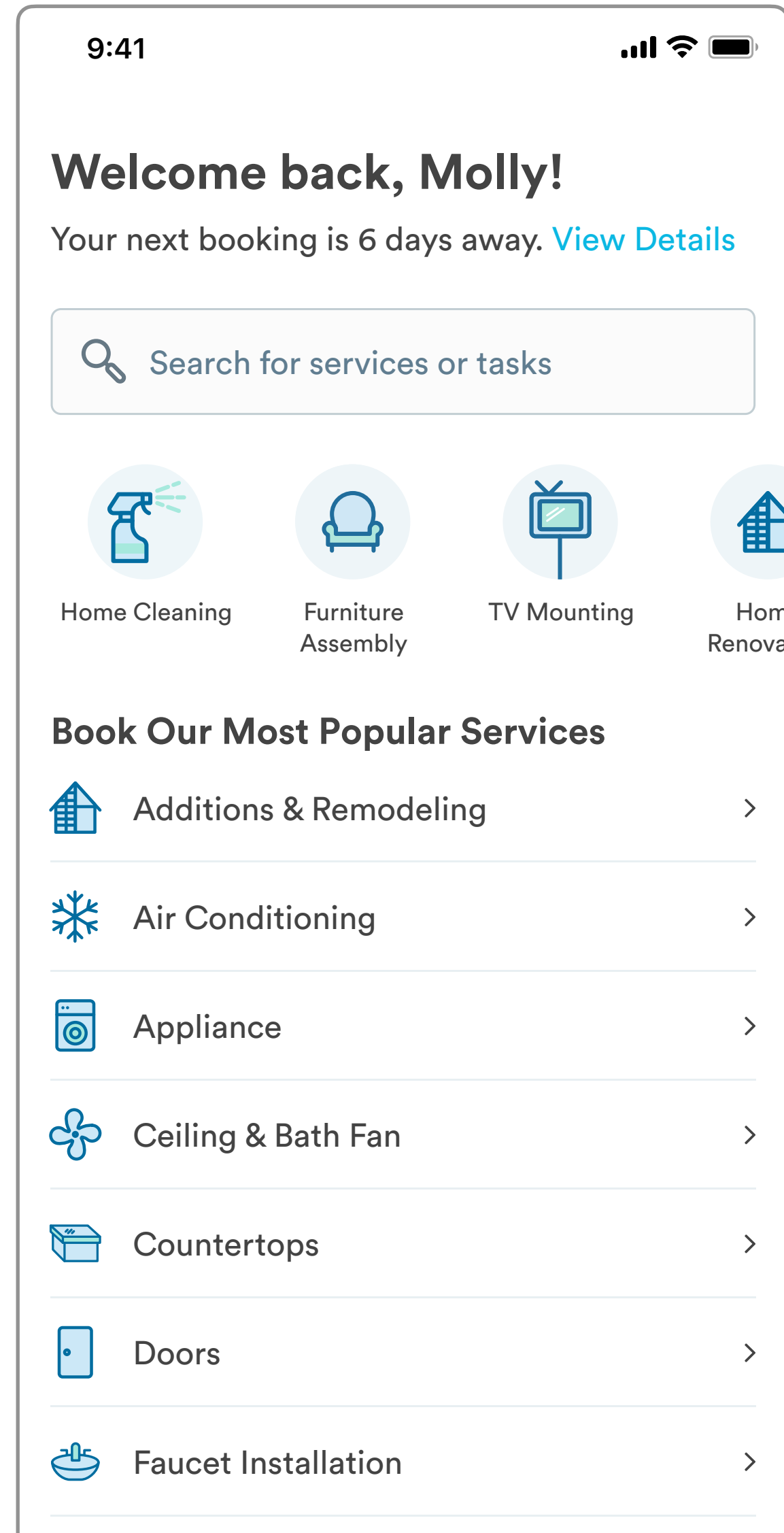
Phase 1: Add Service Links

Home Cleaning ›
Keeping it tidy

Handyman ›
Fix or assemble

Home Remodeling ›
Revamp your home

Electrical ›
Don't shock yourself

Plumbing ›
No more leaks

Interior Painting ›
Color your world

Book Our Most Popular Services

🚽 Bathroom Remodeling ›

❄️ Central A/C Installation ›

🧴 Deep Cleaning Service ›

💡 Electrical Service ›

☢️ Eliminate Toxic Materials or Mold ›

Phase 2: Add Category Carousel

9:41

Welcome back, Molly!
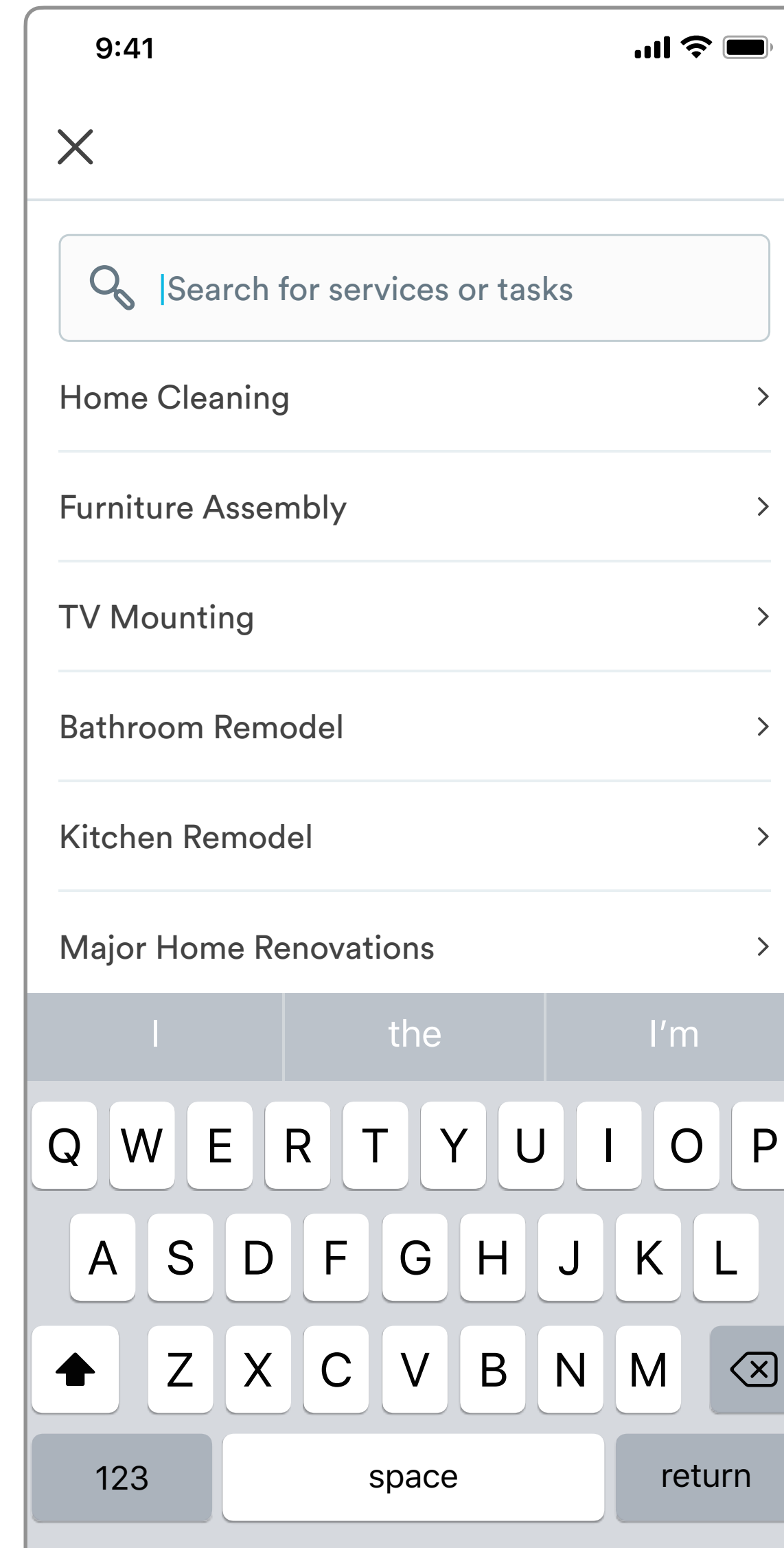
Your next booking is 6 days away. View Details

🔍 Search for services or tasks

Home Cleaning   Furniture Assembly   TV Mounting   Home Renova

Book Our Most Popular Services

🏢 Additions & Remodeling ›

❄️ Air Conditioning ›

🧺 Appliance ›

🌀 Ceiling & Bath Fan ›

📦 Countertops ›

🚪 Doors ›

🚰 Faucet Installation ›

Phase 3: Search Experience

9:41

✕

🔍 |Search for services or tasks

Home Cleaning ›

Furniture Assembly ›

TV Mounting ›

Bathroom Remodel ›

Kitchen Remodel ›

Major Home Renovations ›

| I | the | I'm |
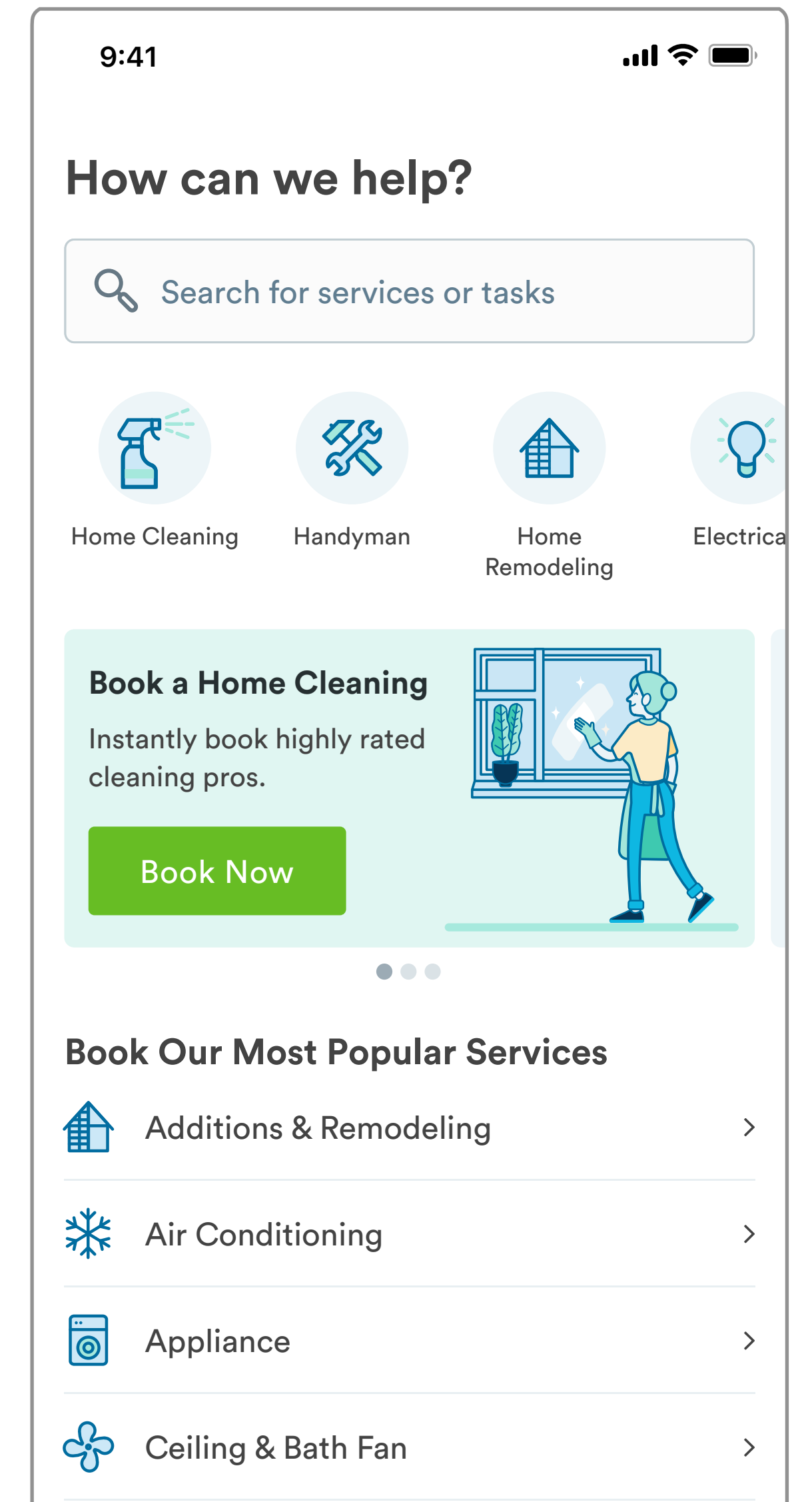
Q W E R T Y U I O P
A S D F G H J K L
⇧ Z X C V B N M ⌫
123   space   return

Phase 4: Marketing Cards

9:41

How can we help?

🔍 Search for services or tasks

Home Cleaning   Handyman   Home Remodeling   Electrica

Book a Home Cleaning
Instantly book highly rated cleaning pros.

Book Now

Book Our Most Popular Services

🏢 Additions & Remodeling ›

❄️ Air Conditioning ›

🧺 Appliance ›

🌀 Ceiling & Bath Fan ›

Next Steps

To make this experience consistent, we need to continue to build out our Category Pages and way down the line, in-app booking flows for all of our services:
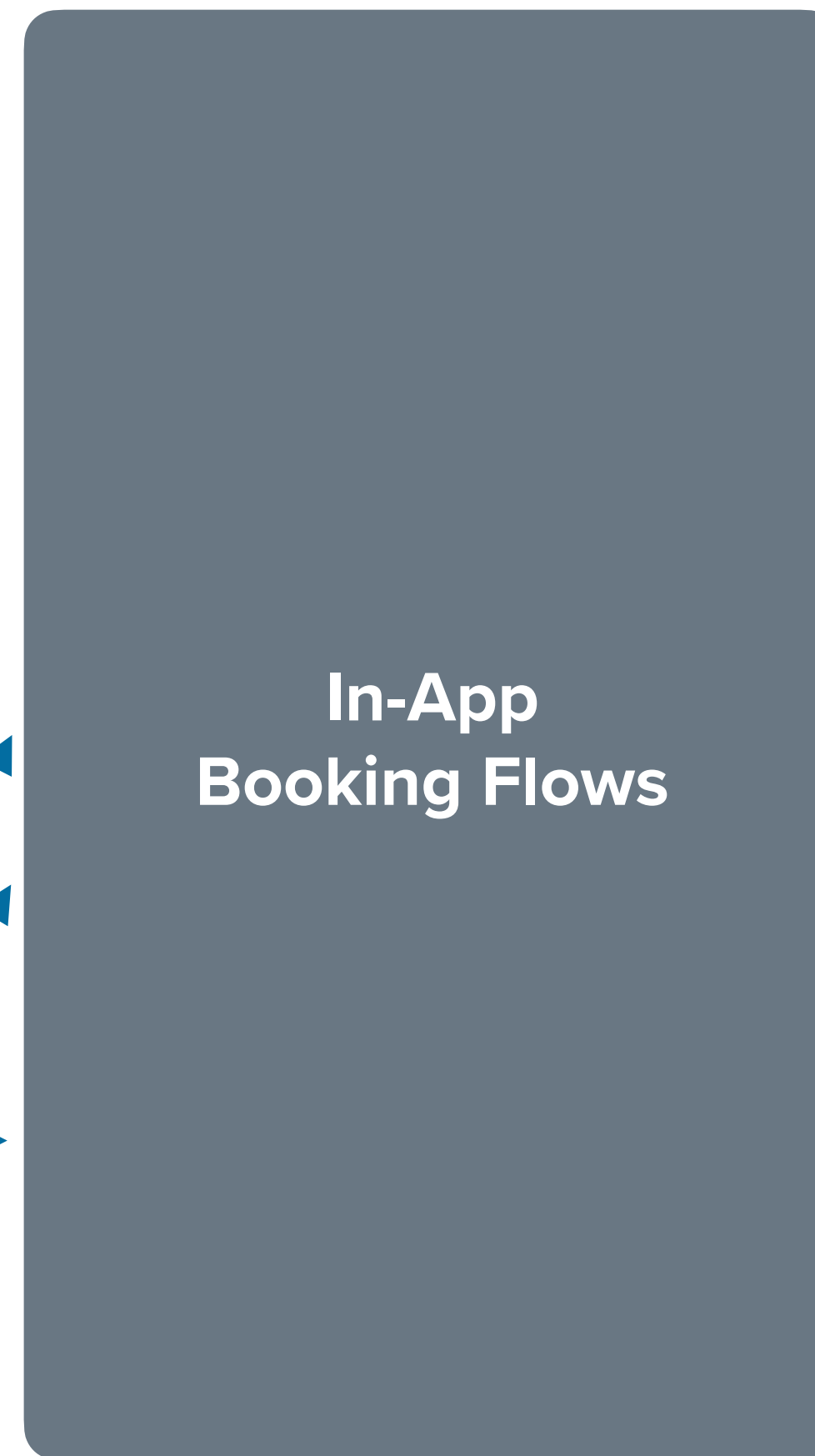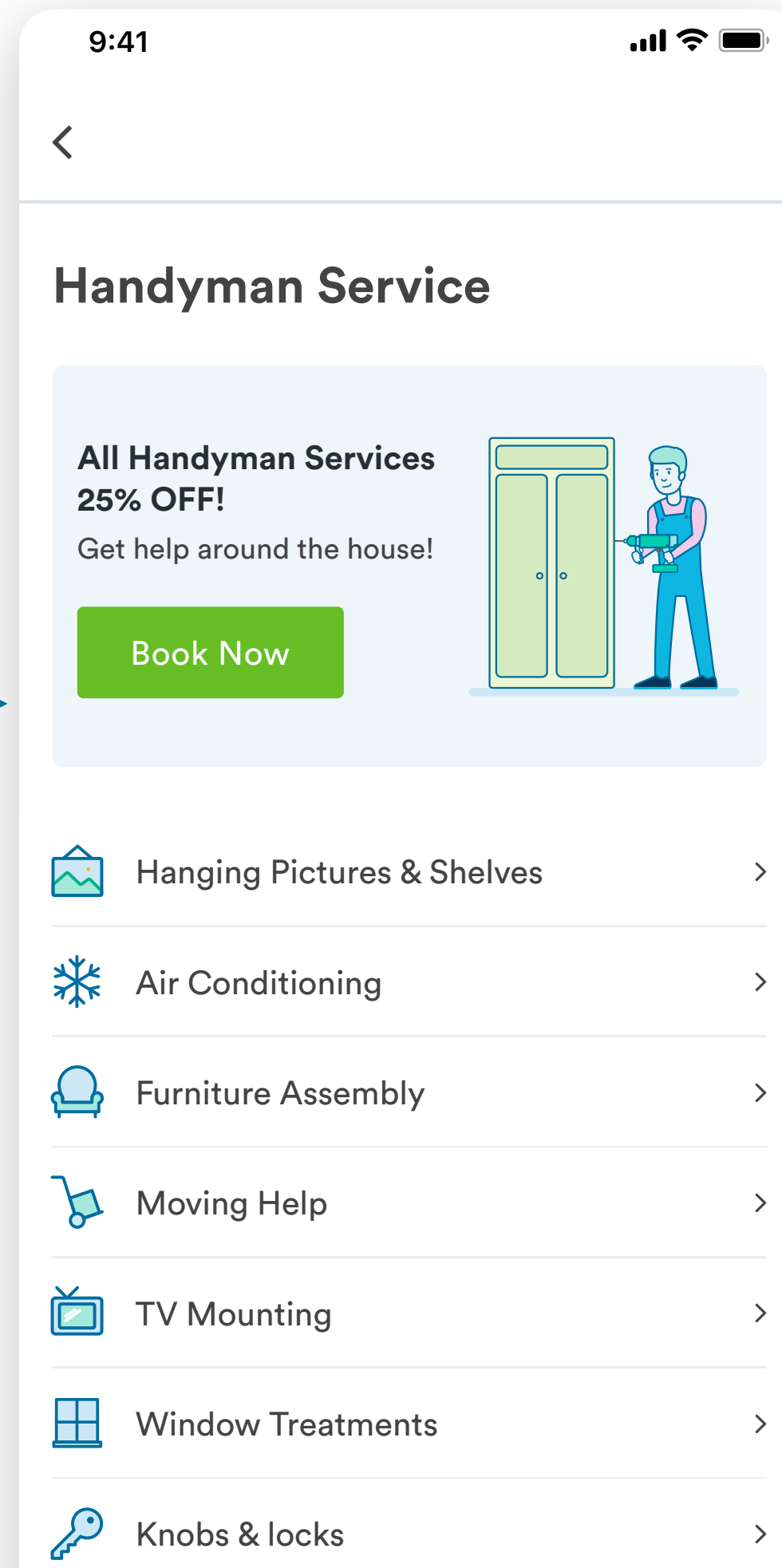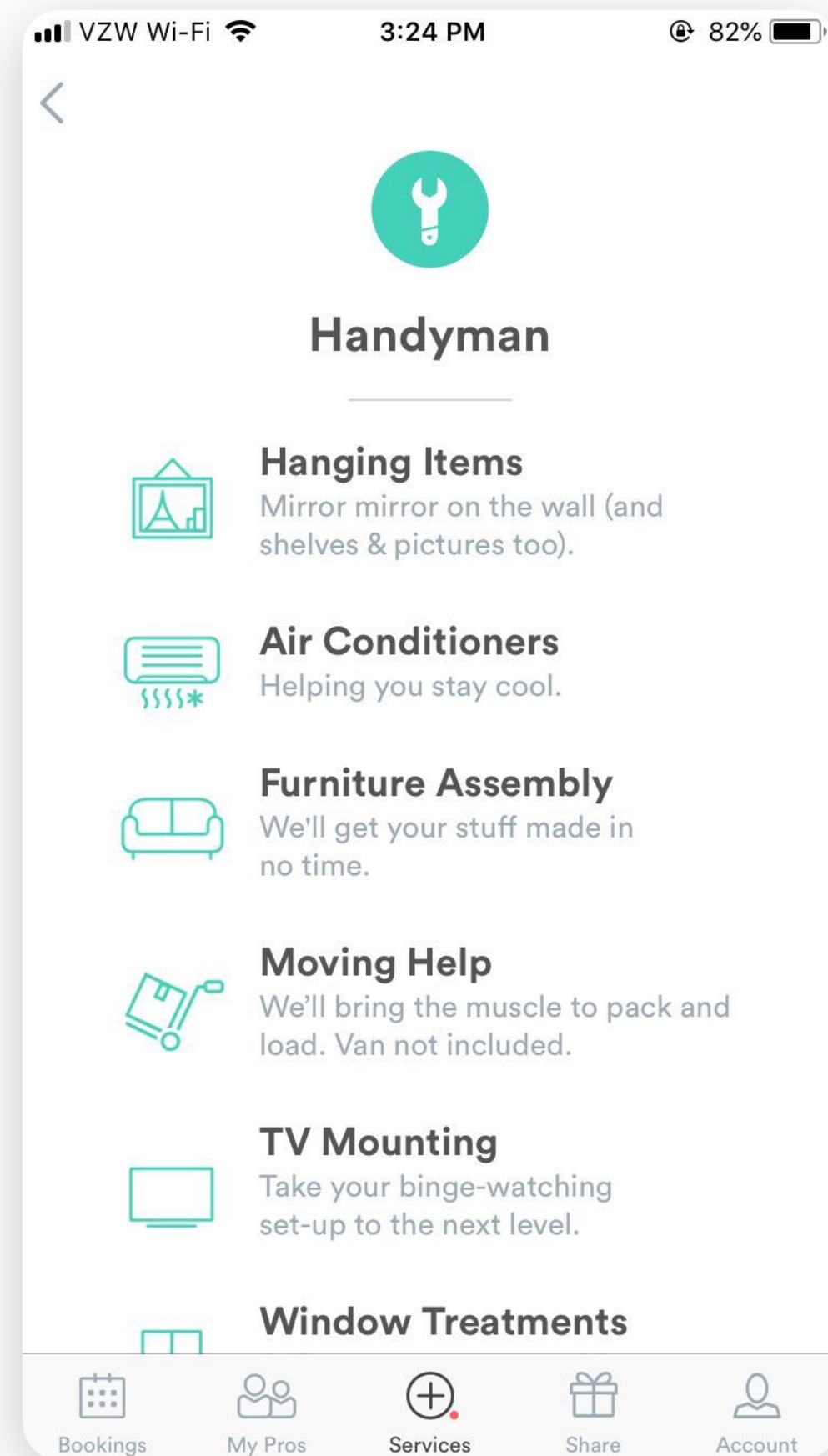
Final Thoughts on Service Discovery

This was a really fun project because of how many moving pieces there were! This presentation barely scratches the surface on the research I conducted to understand user behavior and motivation.

While the final design is not as sleek looking as I hoped it to be, it's so functional and helps our users our the best. The team was able to accomplish all of their goals and give app infrastructure it needs to handle more services.

Since launching we've been able to generate incremental revenue on both Handy and HomeAdvisor services.

Appendix

Users Personas

From all of our tests, this is how users would think before interacting with the designs:

"I have no idea how to look for this."	"I would hire an electrician for this task."	"I need to get new outlets installed in my bedroom."

What can we do to facilitate search for these users?

Can we categorized via navigation or organized services?

Search bar would be the best for these users.

However, could our list meet 90% of user expectations?

Hi-Fi Design Deep Dive #1

Components:

Service Links

Search Bar

What am I trying to learn?

How can I show a lot of services?

Would a list be too long and cumbersome for users?

Home Page

9:41

Welcome back, Molly!

Your next booking is 6 days away. View Details

Search for home services or tasks

Book a Home Cleaning

Instantly book highly rated cleaning pros.

Book Now

Most Popular Services

	Additions & Remodeling	>
	Air Conditioning	>
	Appliance	>
	Countertops	>
	Doors	>
	Faucet Installation	>
	Fences	>
	Furniture Assembly	>
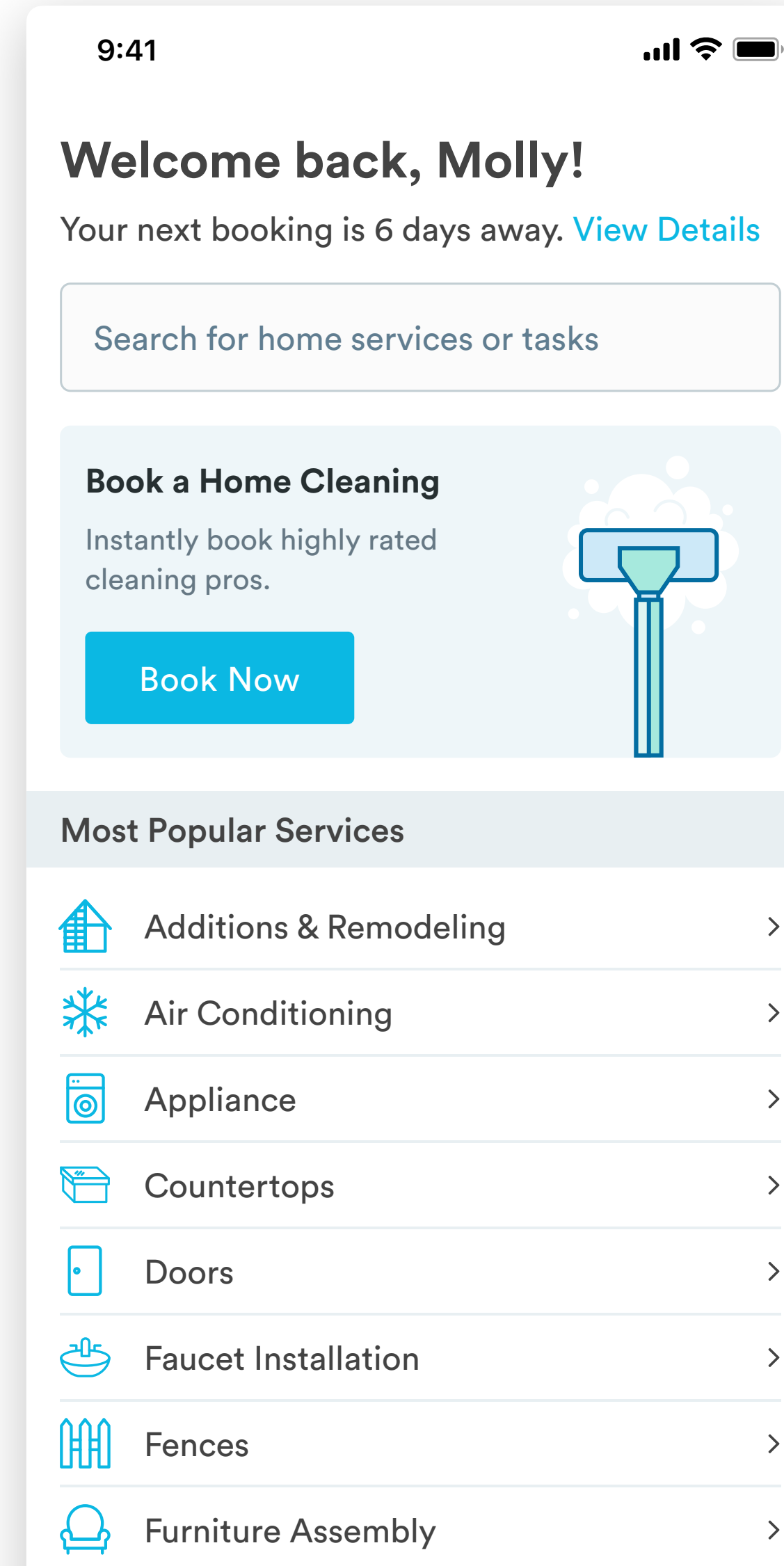
Alphabetized List below links

A

Additions & Remodeling

Air Conditioning

Appliance

Appraisal

Architects

Awnings

B

Bathroom Remodel

Basement Remodel

Brick and Stone

Boilers and Radiators

Build a Deck or Patio

C

Cabinets

Carpenters

Carpet & Upholstery Cleaning

Ceilings

A B C D E F G H I J K L M N O P Q R S T U V W X Y Z

Hi-Fi Design Deep Dive #2

Components:
Quick Links
Search Bar

What am I trying to learn?
How does differentiated FPs and SRs perform?
Do users like icon-based UI?

Home Page - Fixed Price

9:41

Welcome back, Molly!

Your next booking is 6 days away. View Details

Search for home services or tasks

Book Today
Copy Placeholder

Home Cleaning

Furniture Assembly

TV Mounting

Interior Painting

Picture Hanging

See All

Find Companies in Manhattan
Copy Placeholder

Home Cleaning

Furniture Assembly

TV Mounting
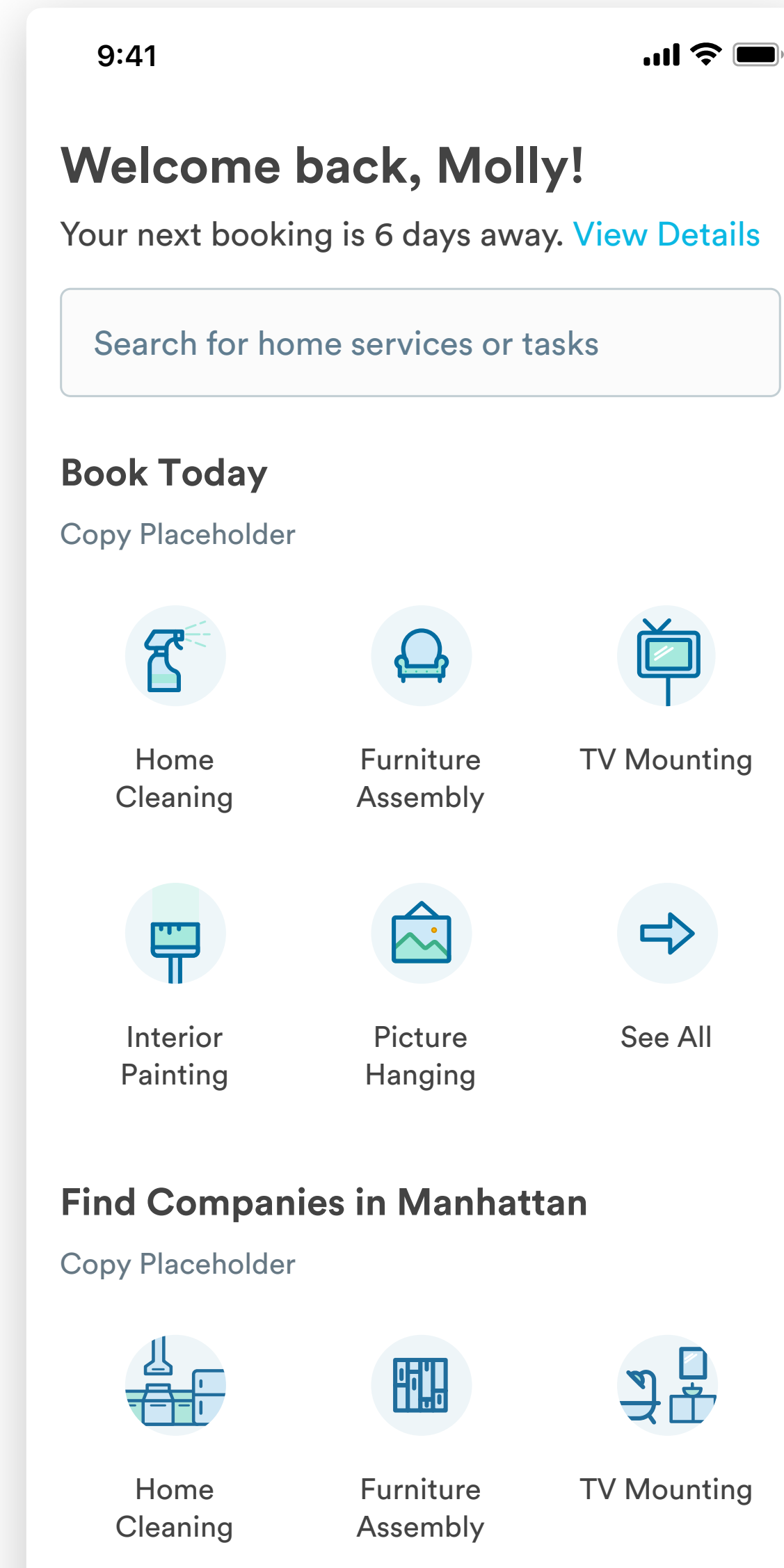
Home Page - Service Requests

Find Companies in Manhattan
Copy Placeholder

Home Cleaning

Furniture Assembly

TV Mounting

Interior Painting

Picture Hanging

See All

Hi-Fi Design Deep Dive #3

Components:
Category Filter
Search Bar

What am I trying to learn?
What do users expect when they use the category filter?
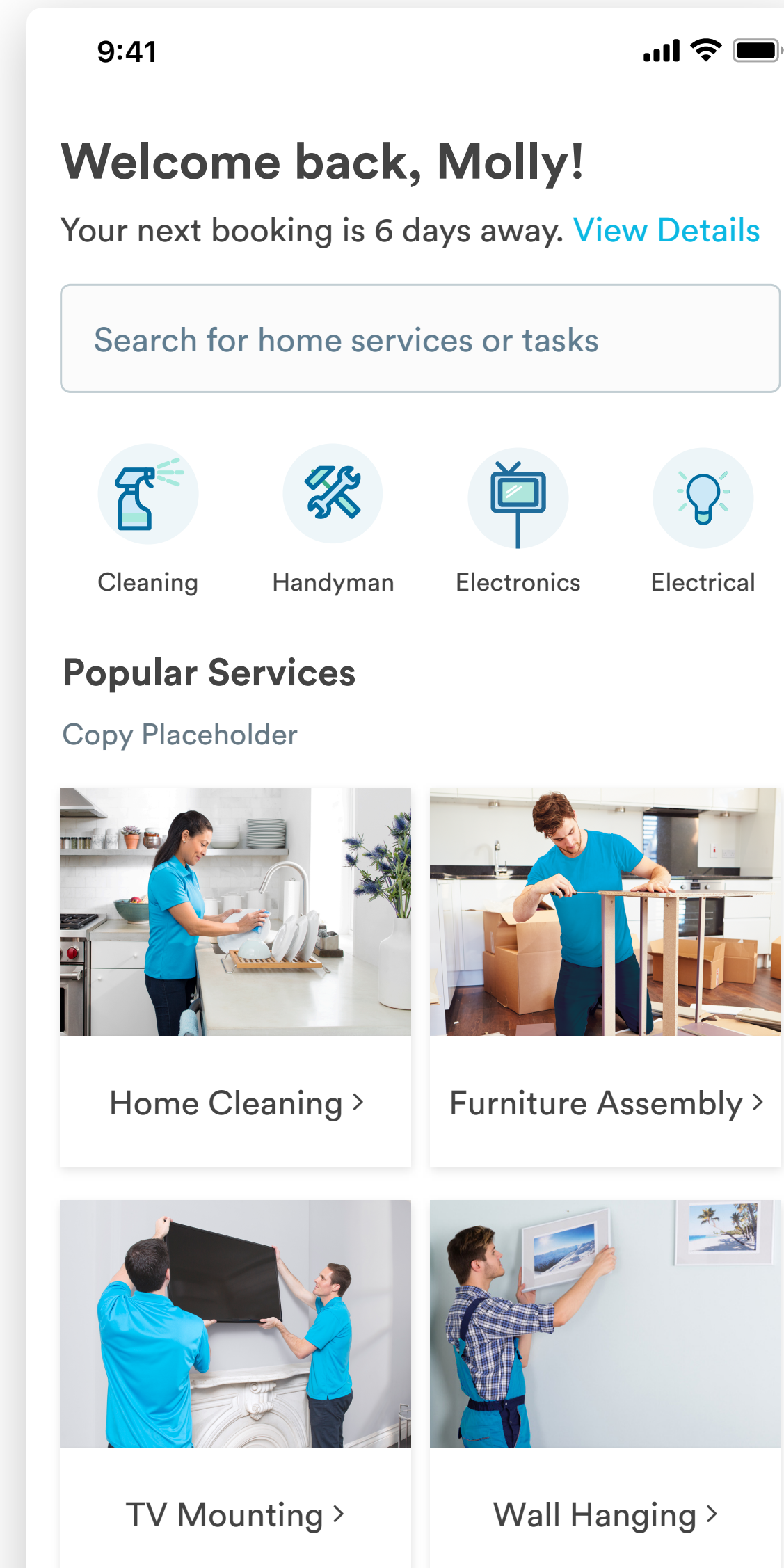Would not differentiating FPs and SRs be confusing for users?
Do users like image-based UI

Home Page

Category Page

9:41

Welcome back, Molly!
Your next booking is 6 days away. View Details

Search for home services or tasks

Cleaning   Handyman   Electronics   Electrical

Popular Services
Copy Placeholder

Home Cleaning >   Furniture Assembly >

TV Mounting >   Wall Hanging >

9:41

<

Electrical Services
Copy Placeholder

Search for electrical services or projects

Most Popular Electric Services

Outlet Installation >

Light Fixtures >   Smart Thermostat Installation >