

A better approach to off-campus housing

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OUTLINE

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- Design System
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PROBLEM STATEMENT

The process of finding suitable university housing for students, teachers, and staff can be time-consuming and stressful. Often, available options are limited and information is scattered across various platforms, leading to confusion and frustration.

Users looking for new apartments run against a number of roadblocks and inefficiencies while trying to find the perfect place that fits their wants and preferences. These challenges primarily consist of:

- Limited and scattered information
- No easy tools for filtering and comparing properties
- Difficulty communicating with landlords and agents, and understanding the leasing process
- Hidden fees and lack of transparency

OUR SOLUTION

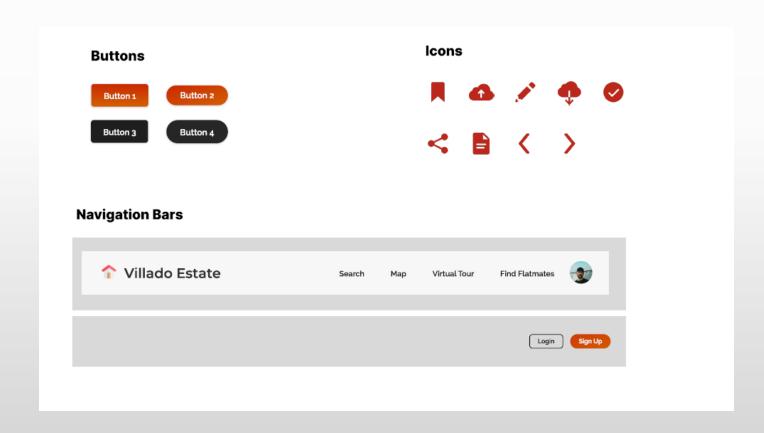
One possible solution to the problem statement would be to develop an online apartment hunting platform that offers a user-friendly interface, advanced search and filter options, and

helpful resources for renters

- Intuitive search and filter tools
- An interactive map feature
- Virtual tours
- A messaging system
- A secure and transparent payment system



DESIGN SYSTEM



https://m2.material.io/
components?platform
=web

PRODUCT OBJECTIVES

Enhance User Experience: This includes making the website easier to navigate, presenting information clearly, and allowing users to easily filter and compare properties based on their specific criteria

Increase Efficiency: The website should aim to increase efficiency by automating tasks such as property viewing scheduling, providing online applications, and integrating online payment systems

Provide Accurate and Up-to-Date Information: The website should make certain that all information about available properties is accurate and up-to-date, reducing the possibility of users wasting time and effort on properties that are no longer available

Improve Communication: The website should make it easier for users to communicate with landlords/agents by including features like chat, email, and scheduling tools.

Foster Trust: By including features such as reviews, ratings, and background checks, the website should aim to foster trust between users and landlords/agents.

Ensure Security and Privacy: The website's security and privacy of users' personal and financial information should be prioritized.

TARGET AUDIENCE

College Students

Undergraduate

Graduate Students

International Students

Staff members

Seasonal Workers

Remote Workers

Contract Workers

Faculty Members

New Hires

Experienced Faculty

Families

PERSONAS

We created 5 personas:

- 23yr International Student
- 45 yr Literature Professor
- 67yr University Dean
- 28 yr Research Assistant
- 22 yr Undergraduate Student



ABOUT

Thomas is an international student from Europe who has come to the US to pursue his Master's degree in Computer Science. He is seager the learn about different cultures and is looking to find a roommate to split the rent and live in a culturally diverse area near his university.

Thomas is tech-savvy and is looking for an apartment rental service that is easy to use and can help him find a suitable place quickly. He values transparency and wants to be able to see clear, accurate information about potential apartments, as well as reviews from other students and professionals.

NEEDS

- · To find a suitable roommate who he can get along with
- · To find affordable housing in a culturally diverse area near his university
- · To have a comfortable living experience and make new friends

FRUSTRATIONS

- · Finding affordable housing options near his university
- Finding a roommate who is reliable, trustworthy and shares similar interests.
- · Adjusting to a new environment and culture

EXPECTATIONS

I am looking for an apartment rental service application that can make the process of finding housing and accommodation near my university campus as seamless and convenient as possible. I am hoping that the app will have a wide range of options to choose from and additionally be reliable and trustworthy, so I feel confident in my housing decision

TRAIT 1: Outgoing and Friendly

Open-minded and Curious

TRAIT 3: Trusting and reliable

TECHNOLOGY

TRAIT 2:

Mobile apps

Social media

INTERESTS

Books Movies Music

Volunteering Hiking Cooking

Use-Cases

- Searching for housing options near his university based on his budget and preferred location
- Filtering his housing options based on preferred amenities, such as shared spaces, parking, etc.
- Connecting with potential roommates and exchanging messages through the application to determine if they are a good fit for each other
- Booking a viewing for a housing option with a potential roommate
- Renting an apartment and splitting the rent with a roommate through the application

UX RESEARCH METHODS

We followed these user research methods to gain a deep understanding of our target users' pain points, needs, and behaviors, as well as to identify industry best practices and areas of opportunity for our real estate application:

User surveys

User interviews

Competitive analysis

COMPETITIVE ANALYSIS

全 Zillow

Zillow Rental Manager is the best rental listing site overall due to its sheer breadth of data and services. It has the largest inventory, the most site traffic, and offers services that take the landlord from marketing to rent collection.

Pros:-

- Very large database of properties
- Built-in tenant screening tools
- Easy to create an informative and attractive listing

Cons:-

- No option to categorize the property in a specific neighborhood
- · Only the first listing is free



Trulia.com is a subsidiary of Zillow and is an online real estate marketplace.it helps renters and buyers find homes acrossthe country.

Pros:-

- It is free to list your home on Trulia and the listing includes unlimited photos and videos.
- As a listing agent or landlord, the site is also freeto use.

Cons:-

- Since the platform is free to use, there are many false listings that are placed on Trulia's site.
- If someone is selling their home using For Sale By Owner, there's no way for a potential buyer to verify that it's a verified source, leading to people getting scammed.



Apartments.com is best for attracting qualified applicants because it charges applicants to apply on its mobile app. This is a benefit to landlords because it makes an applicant look closely at a listing to make sure the property's price, size, and rules are a good match before submitting their application.

Pros:-

- Not just apartments; houses, condos, and townhouses, too
- Large library of easy-todigest articles for every phase of the renting experience

Cons:-

- No option to categorize the property in a specific neighborhood
- Only the first listing is free



Realtor.com is affiliated with the National.
Association of Realtors and uses MLS listings which are sourced from around 580 regional databases and considered the gold standard for quality listings.

Pros:-

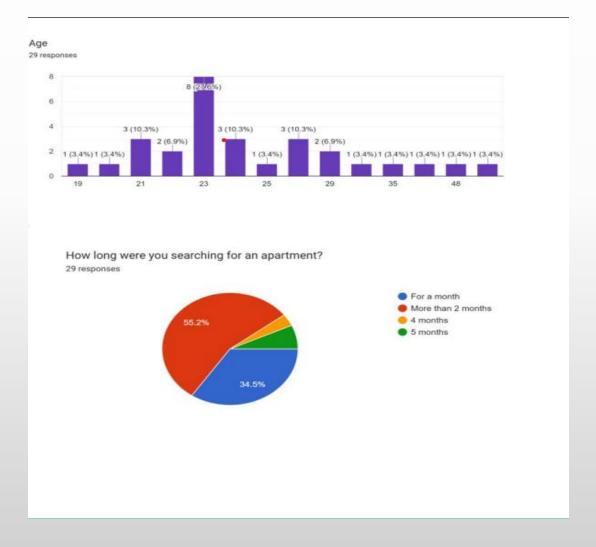
- Easy to search all listed homes in a school district
- Links to pre-qualified financing and financial calculators for buyers

Cons:-

- No option to search "for sale by owner" listings
- No option for home sellers to list their property for sale by owner

What were the primary issues you faced while looking for housing? 29 responses Afraid of scams -15 (51.7%) Having to check multiple websit. -12 (41.4%) Not able to find many brokers -19 (65.5%) -12 (41.4%) Not able to connect with seniors Not sure of public transports ne.. Being overcharged for rent 13 (44.8%) Safe neighbourhood -1 (3.4%) 10 15 20 What programme level are you (were you) enrolled on? 29 responses Masters Undergraduate Professor

USER SURVEYS



USER INTERVIEWS

Primary goals identified

- Nearer to university
- Having all the amenities checked
- Secured neighborhood
- Friendly roommates
- Hygienic overall

Pain Points identified

- Misleading information
- Out of range housing
- Glitches with filter
- Hidden prices, utilities pricing not mentioned









USER NEEDS

Through our user surveys, interviews, and competitive analysis, we were able to gain valuable insights into the pain points and needs of our target users. By listening to their feedback and analyzing the competition, we were able to identify key areas where we could improve:

- Easy Navigation
- Accurate and Updated Information
- Advanced Search and Filter Options
- Detailed Property Information
- Contact and Support
- Privacy and Security

CARD SORTING

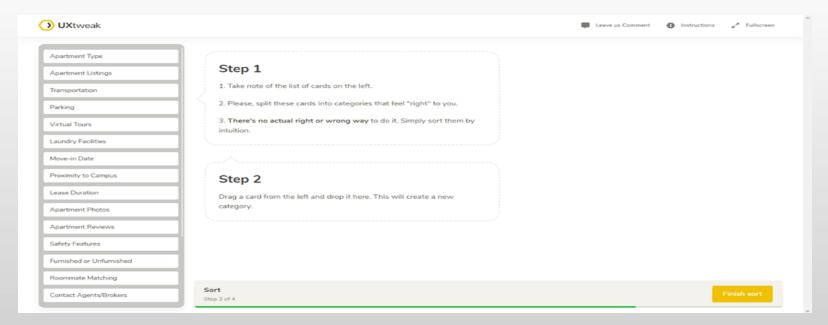
Open Card Sorting and Closed Card Sorting are two user research techniques used to evaluate and improve the organization and structure of information in a product, typically a website or an app. These methods help identify how users perceive and categorize information, which helps create an intuitive information architecture and ultimately improves the overall user experience (UX).

For this project we used UXtweak



OPEN CARD SORTING

In an open card sorting session, participants are given a set of cards, each containing a piece of information or a concept related to the product. They are then asked to organize these cards into groups or categories based on their understanding and create labels for each group. There are no predefined categories in open card sorting, so participants have the freedom to create and label their categories.



ANALYSIS OF OPEN CARD SORTING

Preparation: We started by identifying the key information and features of our product that we wanted the participants to categorize. We created cards representing these pieces of information and features. And allowed the users to self-construct the categories

Participant Selection: We selected a diverse group of participants representing our target user base to ensure a variety of perspectives.

Instructions: We provided clear instructions to the participants, explaining the open card sorting method and the process of creating their categories and sorting the cards into those categories. We encouraged participants to sort the cards based on their understanding and to feel free to create and label categories as they saw fit.

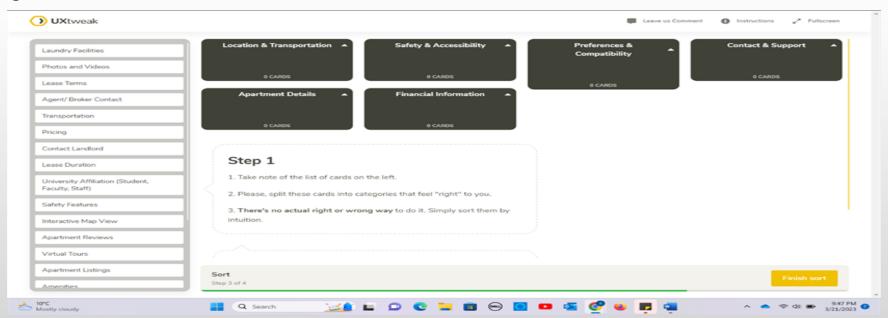
Conducting the Card Sorting: Participants were presented with a list of cards on UXTweak. They reviewed the cards and started creating categories that made sense to them. Once they had created their categories, they began sorting the cards into these categories by dragging and dropping. They had the flexibility to move cards between categories, create new categories, or modify category labels if they changed their opinion.

Monitoring and Support: During the card sorting process, our team monitored the participants' progress and was available to address any questions or concerns they might have had.

Completion: Once the participants were satisfied with their card sorting, they submitted their results.

CLOSED CARD SORTING

In a closed card sorting session, participants are given a set of cards and a set of predefined categories. They are asked to organize the cards into the provided categories. In this method, the focus is on understanding how users perceive the relationship between the cards and the given categories.



ANALYSIS OF CLOSED CARD SORTING

Preparation: We started by identifying the key information and features of our product that we wanted the participants to categorize. We created cards representing these pieces of information and features. We also established predetermined categories that the participants would use to sort the cards.

Participant Selection: We selected a diverse group of participants representing our target user base to ensure a variety of perspectives. We decided to conduct this with 3 users

Instructions: We provided clear instructions to the participants, explaining the closed card sorting method, the predetermined categories, and the process of sorting the cards into those categories. We encouraged participants to sort the cards based on their understanding and to feel free to rearrange the cards as they saw fit.

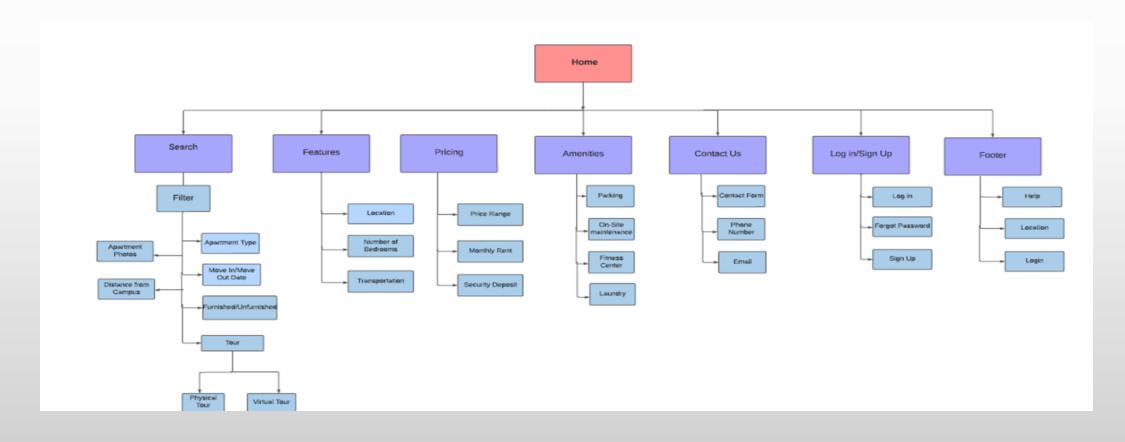
Conducting the Card Sorting: Participants were presented with a list of cards on the UXtweak platform. They reviewed the cards and started sorting them into the predetermined categories by dragging and dropping. They had the flexibility to move cards between categories if they changed their opinion.

Monitoring and Support: During the card sorting process, our team monitored the participants' progress and was available to address any questions or concerns they might have had.

Completion: Once the participants were satisfied with their card sorting, they clicked "Finish" to complete the exercise.

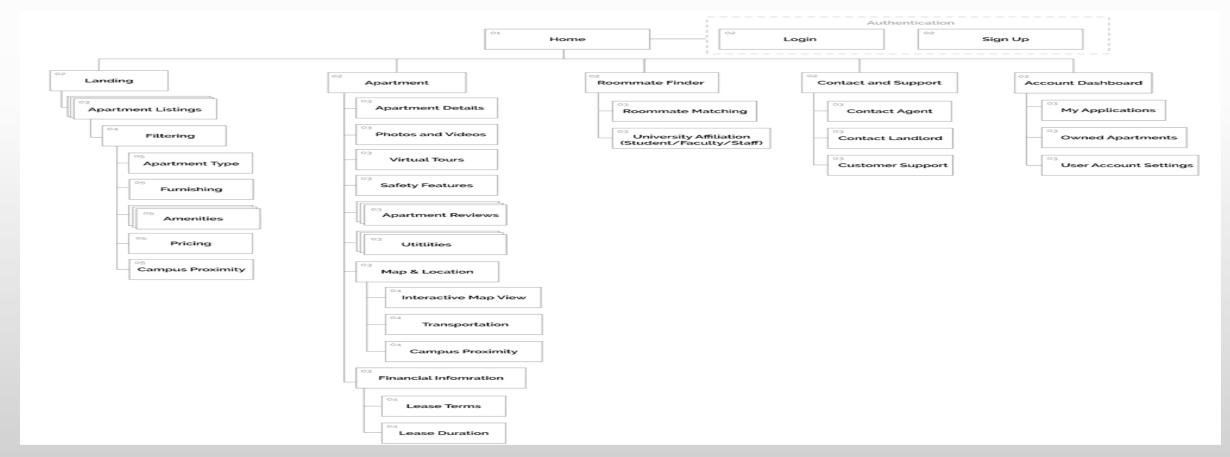
USER WORKFLOW / INFORMATION ARCHITECTURE

1. OPEN CARD SORTING:



USER WORKFLOW / INFORMATION ARCHITECTURE

1. CLOSED CARD SORTING:



SURFACE PLANE

Consistency:

- The website has consistent background and text colors across all pages.
- The surface plane design can include various elements, such as a map showing the location
 of the apartments, high-quality images of the apartments, filters for refining search results,
 and the ability to sort and compare apartments based on different criteria.
- By designing a surface plane that is intuitive and user-friendly, apartment hunting becomes more efficient and enjoyable for users, leading to increased engagement and satisfaction with the platform.

SKELETON PLANE

- Here we define how exactly our UI will look like and what colors, fonts, font sizes are used.
- How many pages are there in the application and how many navigations are required for each action.
- Lets look into the Brand identity (logo and color theme)
- Brand Identity:

Action Based Colours:

Primary Color : Red



Used in Used to denote important actions. (Example: Close button, Sign-out button)

• Primary Color : White



Used in the background of throughout the application.

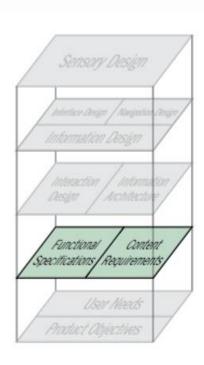
STRUCTURE PLANE

Interaction design:

- All the information is easy understandable, and the app is self explanatory.
- The animations are smooth across the website/app
- The right amount of information is presented to the users. (neither too much not too less)
- Usage of popups for common actions such as filter and sort makes the app easy to use and enables fewer page navigations.

SCOPE PLANE

- The structure defines the way in which the various features and functions of the site fit together.
- The features and functions are those which constitutes the scope of the site. For example, here in our site offers a feature that enables users to save previously used card details so they can be used again.



THE STRATEGY PLANE

- The scope is fundamentally determined by the strategy of the site.
- This strategy incorporates not only what the people running the site want to get out of it but what the users want to get out of the site as well.
- In the case of our website example, some of the strategic objectives are obvious: Users want to rent apartments, and we want to help to rent out them. Other objectives—such as the role that advertising or content produced by our users plays in our business model.

USABILITY TESTING

OBJECTIVES:-

- Identify the usability issues in Villado website.
- •Assess the ease of use of the search function.
- •Evaluate the application submission process.

Tasks:

- Find a specific product on Villado's website using the search function
- Select an apartment and then remove it.
- Attempt to submit an application and abandon the process before completing the transaction.
- Complete a purchase, paying particular attention to the checkout process and payment options.
- Attempt to request a refund for a submitted application and initiate the return process.
- Search for the agent page and try to connect with the particular agent.
- Sign up for a Villado account and modify account settings

DESIGN PROCESS

Designing a user interface/user experience (UI/UX) for apartment hunting can be a complex process, but here are some general steps we followed:

RESEARCH: Start by researching your target audience to understand their needs and preferences. We conducted user surveys and interviews to gain insights into what users expect from an apartment hunting platform. Additionally, you can look at competitor websites and applications to understand the current trends in the market and learn from their successes and failures.

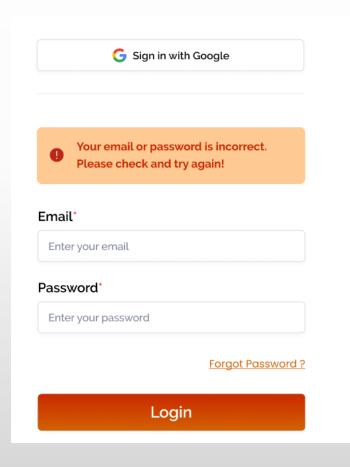
EMPATHIZE: Based on the research findings, we created user personas to represent different types of users. These personas helped us in the design decisions and ensured us that the platform meets the needs of all user types.

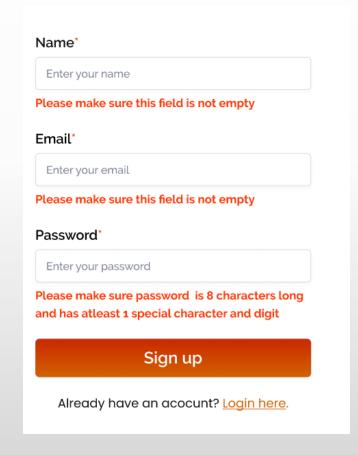
Define User Journey and Information Architecture: Based on the user personas and their needs, we maped out the user journey and created an information architecture that organizes the content in a logical and user-friendly way. This will ensure that users can easily find what they are looking for and move seamlessly through the platform.

Test and Iterate: We conducted user testing on the prototypes to identify any issues or areas for improvement. And we used the feedback to make iterative design changes and refine the platform until it met the requirements of theusers.

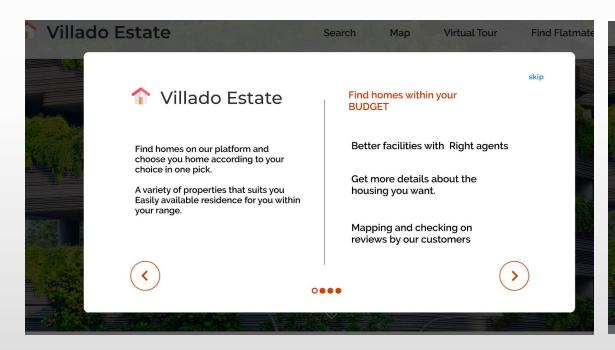
So, the design process is not a linear one, and we may need to go back and revisit certain steps as we uncovernew insights and information.

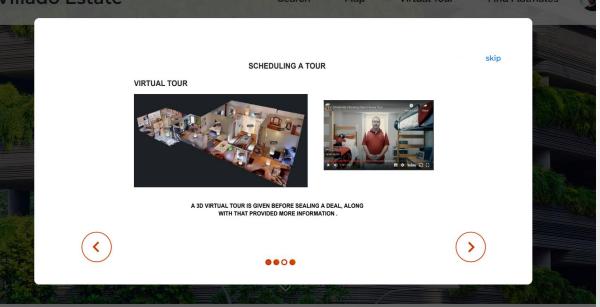






ONBOARDING SCREENS





PROTOTYPES AND WIREFRAMES

https://www.figma.co m/file/MD924kQCOyLZ eTc3DvbyE3/Real-Estate-NU-Web?nodeid=0%3A1&t=qNUdj95 APBEqhkVO-1





THANK YOU