

Real Estate Management System- A Online Platform

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ABSTRACT:

The Online Real Estate Management System is a user-friendly, transparent and secure platform and practical solution that help to people to explore the properties in efficient way [5]. The proposed study offer maximum exposure, reliable service, and a hassle-free experience. You are buying or selling properties have access to essential tools and information. This study explores the development of a real estate management system built with PHP. PHP is a popular choice for web development due to its ease of use and scalability. The system leverages familiar technologies: HTML, CSS, and JavaScript for the user interface, and PHP for the server-side logic.[3] This proposed Real Estate Management System is a one-stop shop for residential and commercial listings. Our system provides a secure login area where sellers can add new properties and edit or remove existing ones. This simplifies property management and keeps information up-to- date.

Keywords- real estate management system, database, admin, PHP, CSS.

I. INTRODUCTION

This project aims to develop an online real estate search platform, targeting both real estate agents and potential buyers. This web-based application, called "Real Estate Management System" will allow users to store and search property listings, making the process more efficient for all parties involved. Our user-friendly platform allows anyone to post property listings for free. We offer maximum exposure, reliable service, and a hassle-free experience, whether you're buying, selling, or managing properties. Available 24/7, our system equips you with essential tools and information for a smooth experience. Search for your perfect property or manage your listings with ease - it's all in one place [4]. The output of this study clearly show the number of listings that match criteria, along with key details about each one. To unlock more features, simply register for a free account. Registered users can search by city and property type, view detailed property information, inquire about rentals, and even purchase properties directly through our platform. In this project, the primary emphasis was on:

- Creating a real estate website dedicated to the global buying and selling of homes, land, and commercial properties.
- Providing accurate location information for each listed property.
- Designing a user-friendly system to streamline the process of purchasing and selling homes.
- Allowing vendors to easily upload their properties along with detailed information.

II. LITERATURE SERVEY

In the past, when purchasing a house, direct communication with owners was not possible. We were

required to engage intermediaries, incurring significant costs and enduring a time-consuming process. Property transactions typically involved multiple stages, including finding an agent, scheduling meetings, and addressing various logistical aspects. Until today, the online real estate management system lacked security measures. However, the introduction of the registration form has significantly bolstered security by restricting user access.

These platforms offer useful features like property search, property addition, and various user-friendly offers. However, despite these capabilities, certain limitations exist within some sites, including:

1. Inaccuracies in providing essential information about nearby services, such as the distance to the nearest bus stop, train station, hospital, etc.
2. Limited flexibility in retrieving information, such as listing houses within a 2 km radius of a specified location.

Hsieh, Y.C is introducing an innovative feature that allows users to save selected property listings using a drag-and-drop tool, setting it apart from similar websites. Typically, real estate platforms require users to log in as buyers to save selected listings for future access. In contrast, this site offers a unique toolbox that enables users to drag and drop their chosen listings, saving them throughout the entire session without the need for a formal login process[10].

Cherif, E. has written an article highlighting the significance of constructing an AJAX-enabled real estate website [3]. This development not only minimizes bother some post backs and control focus losses but also enhances the user experience with a faster and more interactive interface. To further enrich the website's features, additions such as a customized grid, drag-and-drop tool, accordion panels, and sliding bars have been incorporated [1].

Developer can design a real estate management system software application to assist property managers and real estate agents in overseeing their properties, tenants, and listings. These systems play an important role to increase the land value and commonly incorporate features to transform the land functions and for other related works such as property listing management, tenant management, accounting, building management and finance tools, and maintenance tracking capabilities [2].

As outlined in a research article by V. Subramaniyamswamy and K. R. Chitra, the significance of real estate management systems is on the rise, especially with the growing trend of individuals utilizing the internet for property searches. The authors emphasize that these systems play a pivotal role in streamlining property and listing management, thereby reducing the time and effort invested. Additionally, real estate management systems contribute to enhanced communication among property managers, agents, and tenants[3]

III. METHODOLOGY

The envisioned real estate management system is set to be crafted through a blend of HTML, CSS, and JavaScript for the front-end, complemented by PHP for the back-end. This comprehensive system will integrate a robust database to store crucial information about properties. This includes details such as their location, price, size, and amenities. Additionally, the database will encompass relevant information about property owners, encompassing their names, contact details, and potential tenants.

The system is designed to offer a range of features, including property search, property editing, online payments, maintenance services, and lease management, among others. Additionally, property owners have the capability to register on the platform and share relevant property details such as address, number of bedrooms, bathrooms, rental or leasing information, and documents registration number. Registered users will have the ability to conduct property searches based on various parameters such as location, price, size, and more.[3].

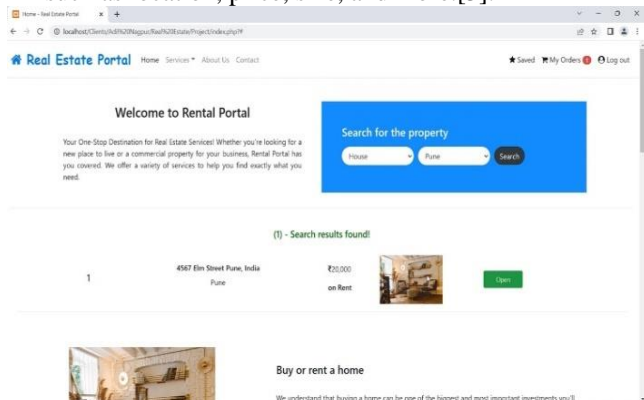


Fig 2: Home Page

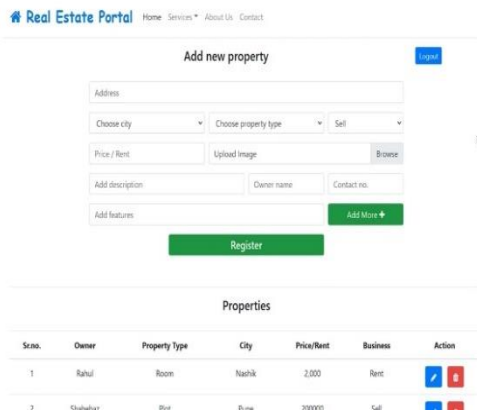


Fig 3: Admin Dashboard

IV. PROPOSED SYSTEM

The envisioned plan encompasses all essential elements of the current system and specifically addresses non-spatial databases. The system emphasizes the following key aspects: Search Criteria-Based Exploration. This functionality provides users with pertinent information aligned with the criteria they input on the website. For instance, if a user is searching for a 1BHK house in Thane within a specified budget, only properties meeting those criteria will be presented to the user [10].

This design flow illustrates that this method is employed when the customer searches for properties. Firstly, the user logs into the website, and then various options become visible. The user can search for a property by using the search system; they only need to fill in the state and type. After processing, all available properties meeting the specified criteria are displayed to the user. The overall process involves the user logging in, entering search details, conducting the search based on filtered results, and finally presenting all details to the customer.

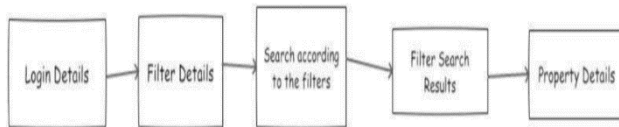


Fig 4: Design Procedure

The overall system, which is designed based on the provided E-R Diagram, connects all features and relevant elements to the specific user. Users can either log in or sign up, depending on whether they are already registered. If the user is new to the site, they must register, which is a simple process involving the addition of details such as name, email, phone number, and password. Once the user logs in using either their number or email, they are redirected to the website's home page. Here, users can search, view information about properties, details about the owner, and key features of the property. If the user has signed up, they can add the interested property to the cart, making it easily searchable later. Additionally, there is a second module known as the admin part, accessible by logging into the admin page. The admin can post properties, edit property details, display all available

properties in the database, and easily remove them with just one click.[10]

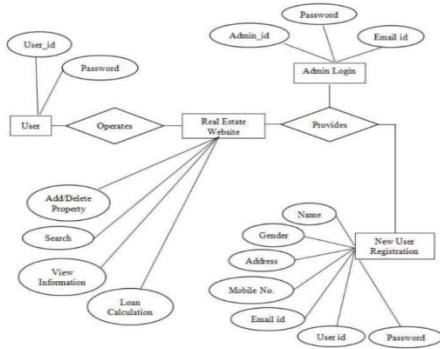


Fig 5: E-R Diagram

V. ARCHITECTURE DESIGN

Web applications deliver content from a server to client computers via the internet, with users engaging through a web browser. This project employs a client/server architecture, residing on a web server and accommodating requests from other clients[10].

1. User Interface (UI) Design: To craft the UI for the web application, we'll utilize HTML, CSS, and JavaScript. Incorporating front-end frameworks such as Bootstrap or Materialize CSS can streamline the design process.
2. MySQL Database : For our database needs, MySQL will serve as the platform for storing user and property-related data. This includes information such as property details, tenant specifics, property types, and more[3].
3. Cart Module: Responsible for enabling users to store properties of interest in a cart, this module facilitates users in reviewing their selections and proceeding with purchases or reservations.
4. Search View: Our aim is to develop a search interface enabling tenants to discover properties within their preferred areas of interest. This feature will empower users to refine their property searches according to diverse criteria such as location and property type.
5. User Registration and Authentication: Our objective is to develop a user registration and authentication system enabling tenants to both sign up for and log into the web application.

In summary, our plan involves crafting a real estate management system, utilizing HTML, CSS, and JavaScript for the front-end, and PHP for the back-end. MySQL will serve as the database. Key features will include an admin dashboard, user registration and authentication, a search view, and the ability to add and edit properties within the admin page.

VI. FUTURE SCOPE

According to the specified requirements, entire project has been meticulously designed. We have the flexibility to incorporate additional constraints into our project. This includes the option to offer leasing arrangements for properties, extending property listings to cover all metropolitan areas, and facilitating the upload of 3D views

for each property [2].

The project has immense potential for future development. We can enhance the project by adding more features, like integrating it with maps to locate properties, allowing users to post property requirements, and integrating it with social media platforms for better reach. We can also add machine learning algorithms to provide personalized property recommendations based on user preferences.

VII. CONCLUSION

In conclusion, the real estate management was successfully designed and implemented using HTML, CSS, JavaScript, AJAX, Bootstrap, PHP, and MySQL. The project's main aim was to provide an online platform for property buyers and sellers to buy and sell properties easily. The project includes features like property listings, property details, property search, property cart, and payment options, making it convenient for users to find and purchase properties. The admin can add new properties, edit or delete existing ones, and manage users' details.

We have presented a solution to overhaul an outdated, cumbersome, and insecure property search system via a web application. Through the adoption of contemporary techniques and tools, we effectively address issues such as forgery and intermediaries, streamlining the process for enhanced efficiency and security. Save time and effort with our powerful search engine that lets you narrow down properties for buying, renting, or investing.[5].

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