

## Project Design Phase-II

### Technology Stack (Architecture & Stack)

Date	16-06-2025
Team ID	LTVIP2025TMID24689
Project Name	House Hunt : Finding Your Perfect Rental Home
Maximum Marks	4 Marks

#### Technical Architecture:

**House Hunt** is designed using a scalable **3-tier architecture**, ensuring a robust, maintainable, and scalable system:

- Presentation Layer (Frontend):**  
A responsive and user-friendly interface for tenants and landlords to browse listings, book visits, and manage profiles.
  - Business Logic Layer (Backend):**  
Handles core functionalities such as user authentication, property listings, booking management, payments, and messaging.
  - Data Storage Layer:**  
Stores all essential data including user profiles, property details, bookings, chat records, and payment transactions.
- ☐ Integration with third-party APIs is included for real-time notifications (SMS/email), map-based search, and digital payments.

**Table-1 : Components & Technologies:**

S.No	Component	Description	Technology
1.	User Interface	Web/mobile-friendly interface for tenants & landlords	HTML, CSS, JavaScript / React Js etc.
2.	Application Logic-1	Booking, calendar, chat, and visit scheduling.	Node.js, Express.js
3.	Application Logic-2	Admin panel, user management, reporting	React js, Node js
4.	Database	User data, listings, visits, messages, payments	MongoDB

**Table-2: Application Characteristics:**

S.No	Characteristics	Description	Technology
5.	Open-Source Frameworks	Frontend frameworks	React.js, Node.js, BootStrap, Tailwind CSS
6.	Scalable Architecture	3-tier architecture with RESTful APIs	Microservices

**References:**

[React.js Documentation](#)

[Node js Best Practice](#)

[JSON Web Server Reference](#)

<https://medium.com/the-internal-startup/how-to-draw-useful-technical-architecture-diagrams-2d20c9fda90d>