System Requirements Planning

The researchers have agreed on the following program and languages to build the system. For the program, they will use an Integrated Development Environment (IDE) called Visual Studio Code as the primary code editor. For the languages, HTML (Hypertext Markup Language) will be used to structure the web pages and their content, CSS will enhance their appearance, and JavaScript will make them interactive. Additionally, the Bootstrap framework to ensure the system's layout is responsive and accessible across different device.

Table 3.0 Software Requirements:

• **XAMPP: MySQL, phpMyAdmin, PHP**
• **Visual Studio Code: HTML, CSS, and JavaScript**

Table 3.1 Hardware Requirements:

Computer System (Laptop or Desktop and Mobile):
• **Processor: Intel Xeon E3-1230 or higher**
• **Memory: 8GB DDR4 RAM or higher**
• **Android 5.0 or higher**

DEPLOYMENT DIAGRAM

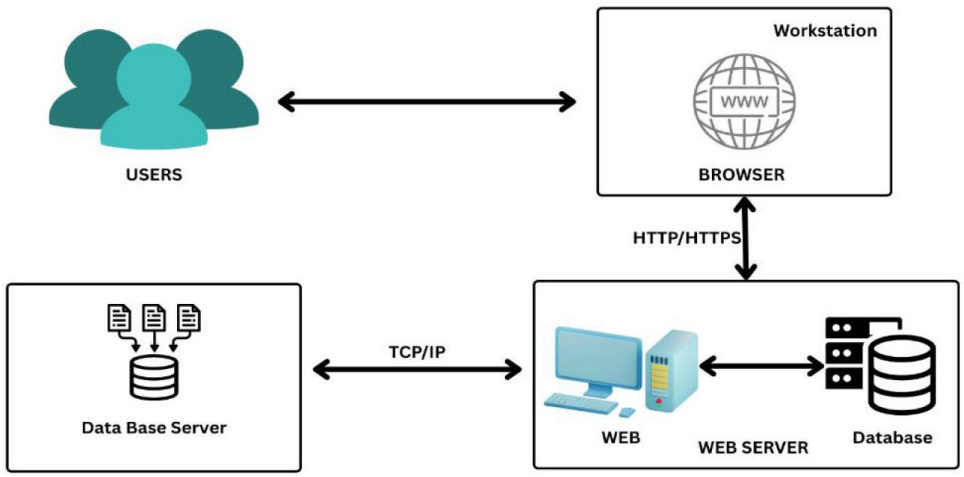


Figure 3.1: Deployment diagram of the study

Figure 3.1 shows the deployment diagram of the DajawonTa system at Cantilan. Users can access the website through a web browser that sends an HTTPS request to the web server, which encrypts the communication; otherwise, it reverts to HTTP if HTTPS isn't available. The server processes the request and sends back a response, which the browser then processes to display the web page. The database server stores all the information that users enter into the system, while the web server displays the database on an interface for easier retrieval of information. TCP/IP (Transmission Control Protocol and Internet Protocol) provides remote access to a server host's file system, enabling users to access and manage files stored on the server from a remote location.

USE CASE DIAGRAM

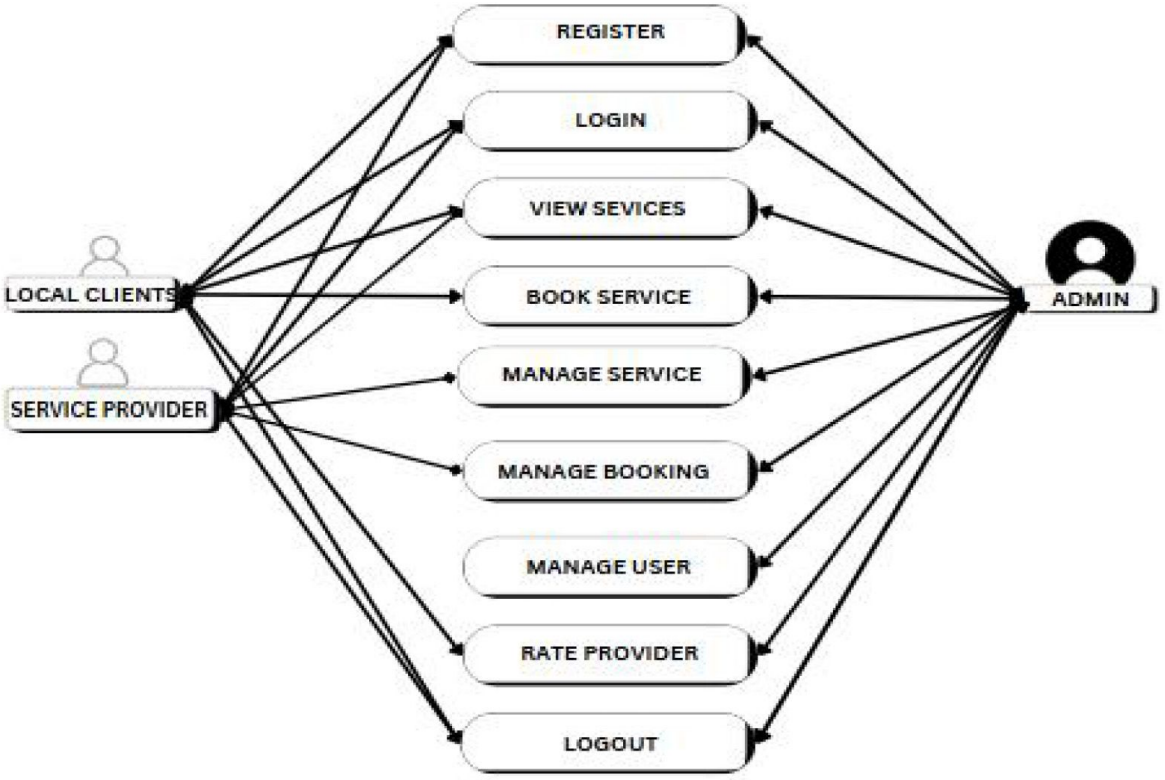


Figure 3.2: Use case diagram of the study

Clients can register, log in, browse services, book appointments, and give feedback. Skilled workers can create and manage their service listings, view bookings, and receive feedback. The administrator oversees the entire platform by managing users, reviewing system analytics, and ensuring the quality of service interactions.

Requirement Analysis

During this phase, research is conducted to ideate the program, including its appearance and functionality. The next stage involves documenting the software's fundamental design once the initial phase is successfully completed and a comprehensive development plan is established. After the basic design is approved, a more detailed technical design can be planned. Here are the functions the researchers have decided to include in the system.

Table 3.0: Use Case Description in Registration

This feature allows users to sign up as a local client or service provider by submitting their basic information.

Process	Registration
Description	• The Local Clients will fill in the required information for registration. • They must choose whether they are Local Clients or Service Providers.
Desired Outcome	User will be successfully registered into the system
Actors	Local Clients, Service Providers

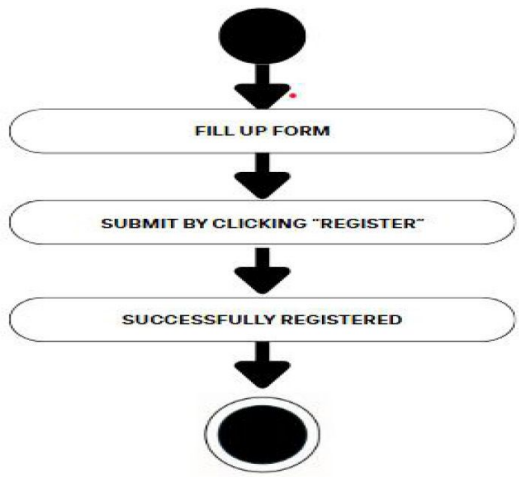
Pre-condition	Registrants must have a stable internet connection
Scenarios	• Fill up Form • Submit by clicking “register”
Workflow	
Local Clients  	
Post-condition	Local Clients/Service Providers successfully register.
Business rule	Users must provide a unique and valid email; duplicate accounts are not allowed.

Table 3.1: Use Case Description in Login

This feature lets users securely log in to access their personalized dashboard.

Process	Login
Description	• Users, Service Providers, and Admin must input their credentials. • System verifies email/username and password.
Desired Outcome	User is successfully logged in and redirected to their respective dashboard.
Actors	Local Clients, Service Providers, Admin
Pre-condition	Registrants must have a stable internet connection
Scenarios	• Enter email/username and password • Click on “Login” button
Workflow	

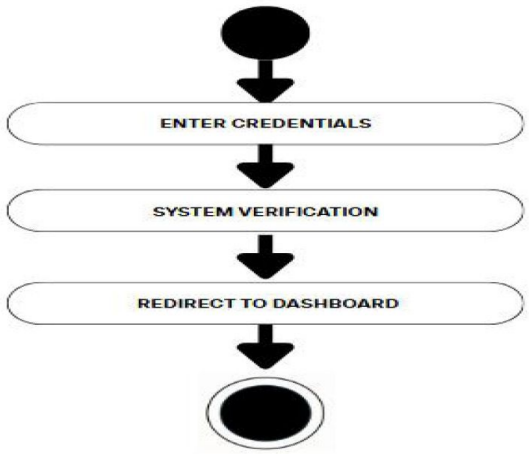
User 	
Post-condition	User gains access to their dashboard based on their role.
Business rule	Incorrect login attempts are limited; passwords must be securely hashed.

Table 3.2: Use Case Description in View Services

Clients can browse categorized services offered by available service providers.

Process	View Services
Description	• Local Clients can browse a list of

	available services. • Services are categorized for easier navigation.
Desired Outcome	Clients can view and explore available services according to their needs.
Actors	Local Clients
Pre-condition	Must be logged in as a Local Client.
Scenarios	• Click "View Services" on the dashboard • Browse through categories and service cards
Workflow	
Local Client	

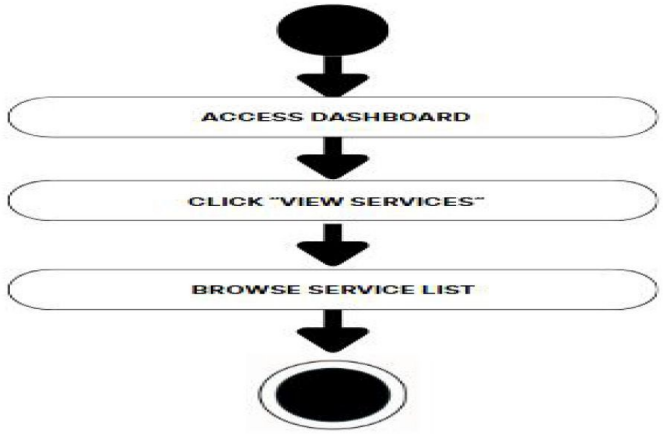
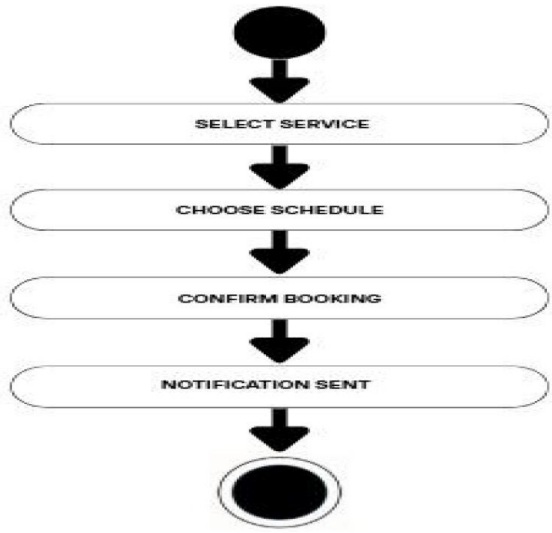
	
Post-condition	Client has access to view service details and proceed to booking.
Business rule	Only verified services are shown; listings update based on provider status.

Table 3.3: Use Case Description in Book a Service

This allows clients to schedule and confirm services from their chosen provider.

Process	Book a service
Description	• Clients can book a specific service by selecting a provider and schedule..
Desired Outcome	Service is successfully booked and

	recorded in the system.
Actors	Local Clients, Service Providers
Pre-condition	Client must be logged in and have selected a service.
Scenarios	• Click “Book” on chosen service • Select schedule and confirm booking
Workflow	
Local Client  	
Post-condition	Both client and provider receive booking confirmation.
Business rule	Double bookings are prevented;

	cancellations within 1 hour are not allowed.

Table 3.4: Use Case Description in Manage Service Listings

Service providers can add, update, or remove their listed services.

Process	Manage Service Listing
Description	• Service Providers can add, edit, or remove the services they offer.
Desired Outcome	Service providers manage their listings efficiently.
Actors	Service Providers
Pre-condition	Must be logged in as a Service Provider..
Scenarios	• Click “Manage Services” • Add/Edit/Delete service details
Workflow	