



Project Report

Plant Palace Web Portal

Contents

Case Study.....	3
1. Definition of the Problem.....	3
2. Requirement Analysis.....	4
3. Design Phase	5
4. Architecture of Website	6
5. Evaluation/Testing	7
6. Project Tracking and Monitoring Activities	7
7. Documentation Section.....	7
8. Source Code	7
9. User Guide	7

Case Study

Plant Palace was founded according to their simple premise—plants make us happier and healthier humans. They have changed the way people think about buying plants since 2019. They were one of the love-environment online plant shop and they have delivered over 2 million plants to 500,000 happy customers.

Due to recent demands of online shopping, they supply free delivery for every order over £50 of any customer within the country. As a team of professionals, they understand what clients want and deliver the best results to clients.

Plant Palace delivers a new concept of gardening to young people that plants are not only helped in creating the green environment, but also relieving stresses and designing aesthetic appeal. Their aims are to engage in gardening as a hobby or lifestyle and bring diverse plant options to their customers.

Proposed Solution

Design a marketing Web portal to display the products and services to the customers is one of the solutions to the plant nursery.

The Plant Palace Website serves as an e-commerce as well as informational platform where users can browse and purchase various plants. The Website will also provide categories for different types of plants, allow users to search for specific plants, and offer sorting and filtering options. Moreover, the information about each plant species will be displayed in detail, including origin country, scientific name, watering cycle and humidity.

When a potential customer visits the plant nursery website, he or she will be able to view the showcase of their extensive collection and detailed information. This type of informational Website as well as an e-commerce Website provides a user interface of browsing and purchasing various plants for the customers.

Definition of the Problem

In the case of Plant Palace as well as plant nursery and e-commerce website, queries of products and services can be one or all of the following:

- i. How to design a marketing website to bring the plant nursery message to the customer?
- ii. What information should be displayed about each type of plants?
- iii. Will the green message increase in the marketplace?
- iv. Will the users be able to contact Plant Palace whose order via the website?
- v. Will any customers be able to contact Plant Palace after deciding to buy wholesale plants?

After consulting several IT companies and considering of the budget constraints, the management of **Plant Palace** has decided to launch the marketing website as a Single Page Responsive Web application. Hence, the project will use HTML5, CSS3, JavaScript, Figma Toolkit, Geolocation API, Web Storage, AngularJS, and Bootstrap 5 libraries from getbootstrap.com, and JSON or other HTML editors to build the User Interface. Moreover, this Web portal will be a responsive and visually appealing Website to be used by individuals.

Requirement Analysis

This phase consists of following:

- **List of inputs to the system**
- **List of outputs expected from the system**
- **Overview of processes involved in the system**
- **Hardware and software required for implementing the project**
- **Customer's acceptance criteria for the project**

For example, in the **Plant Palace** portal project, the objective would be to:

- Provide a fast-loading page smoothly redirects.
- Enable customers to look up for the plant species and detailed information about them.

Inputs provided by the client:

- Inputs to the existing system
- Outputs from the existing system
- Process involved in the application
- Expected delivery dates
- List of deliverables

Hardware Requirements:

- Intel Core i3 Processor or higher
- 8 GB RAM or higher
- Color SVGA
- 500 GB Hard Disk space
- Mouse
- Keyboard

Software Requirements:

- Frontend: HTML5, CSS3, Bootstrap (optional), JavaScript, Figma Toolkit, jQuery, AngularJS/Angular 9/ReactJS, and XML
- Data Store: JSON/TXT

Scope of the work:

Depending on the decision taken by the management regarding the **Plant Palace** portal, following are the requirements based on which the Single Page Application (SPA) needs to be developed:

- A home page for **Plant Palace** website portal that will further display menu options for Login/Register, Plants also known as Products, Feedback, About Us, and Contact Us.
- Register/Login will lead to the appropriate page where users can register themselves or log in if already registered.
- The Plants menu when clicked will display a Web page with various species of plants. Moreover, there are a sorting menu which allows customers to sort the plant catalog based on various criteria, such as price, popularity, or alphabetical order and a filter menu that enables the customer to filter the products by types, light, or humidity.
- Feedback menu will display the feedback form that allows the user to share their opinions about the website as well as their products and services.
- About Us page will display the story of Plant Palace and some relevant information.
- Contact Us will show the telephone number, email, address, and a mini map which enables customers to find the best route to visit their store.
- The user can also view Plant Palace blogs of several tips to take care of their plants or sign up to get more information about the plant nursery.

Design Phase

➤ Designing the GUI Standards

Designed multiple screens must be created and linked to each other for the **Plant Palace** website portal. Each of these screens should have clear and legible fonts, user-interface elements, navigation elements, a consistent look with respect to appearance, and theme used. The Website should not result in any malicious downloads or unnecessary file downloads as well as it is safe to use. The Website should be easy to navigate with clear items and other elements and easy to understand. The Website should operate in a reliably efficient manner. The Website should demonstrate high value of performance through speed and throughput; in simple terms, the Website should be fast to load and page redirection should be smooth. The Website should support large number of users. The Website should be available 24/7 with minimum downtime and should be compatible with latest browsers.

In the case of **Plant Palace** website portal, the modules could be for:

- Registration
- Login
- Feedback

Architecture of Website

Figure 1.1 displays the application architecture.

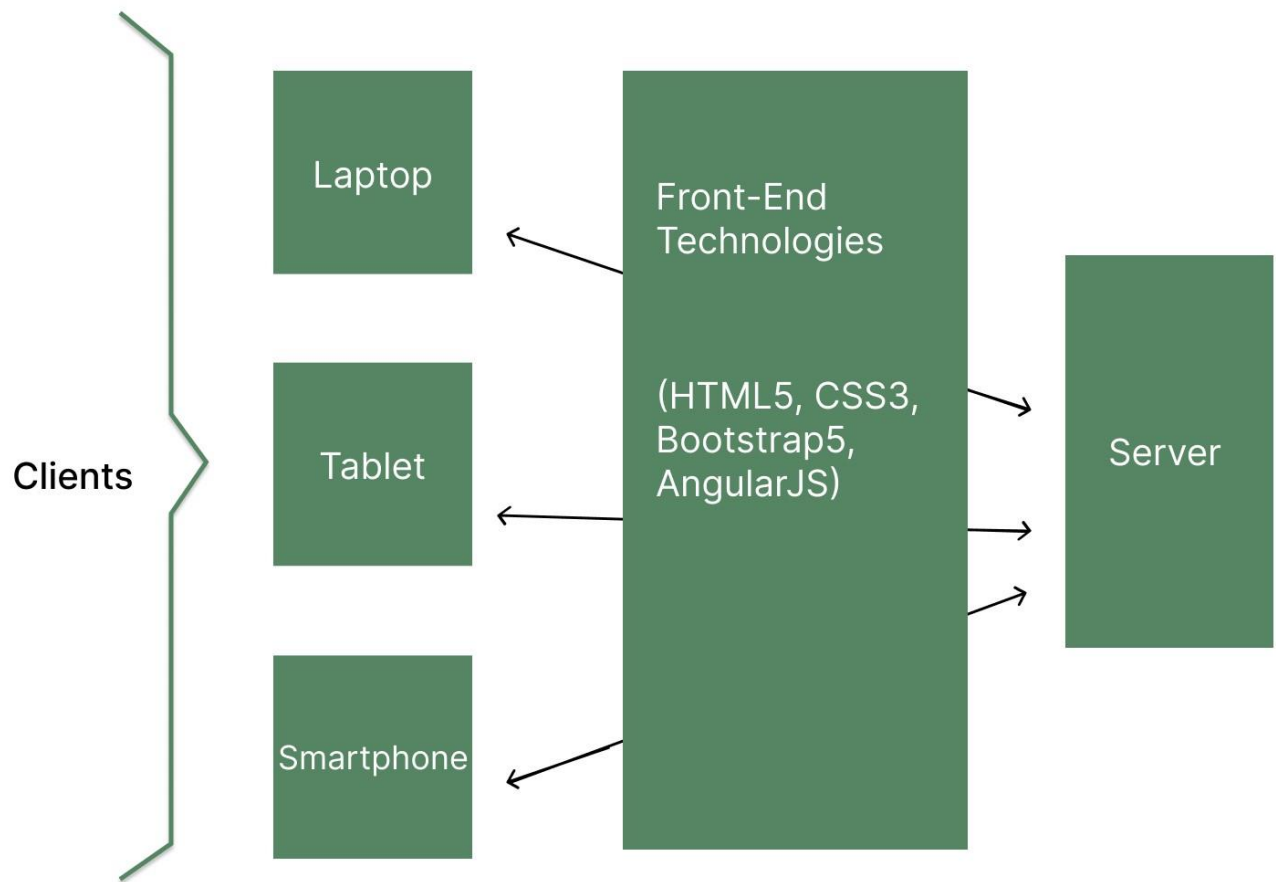
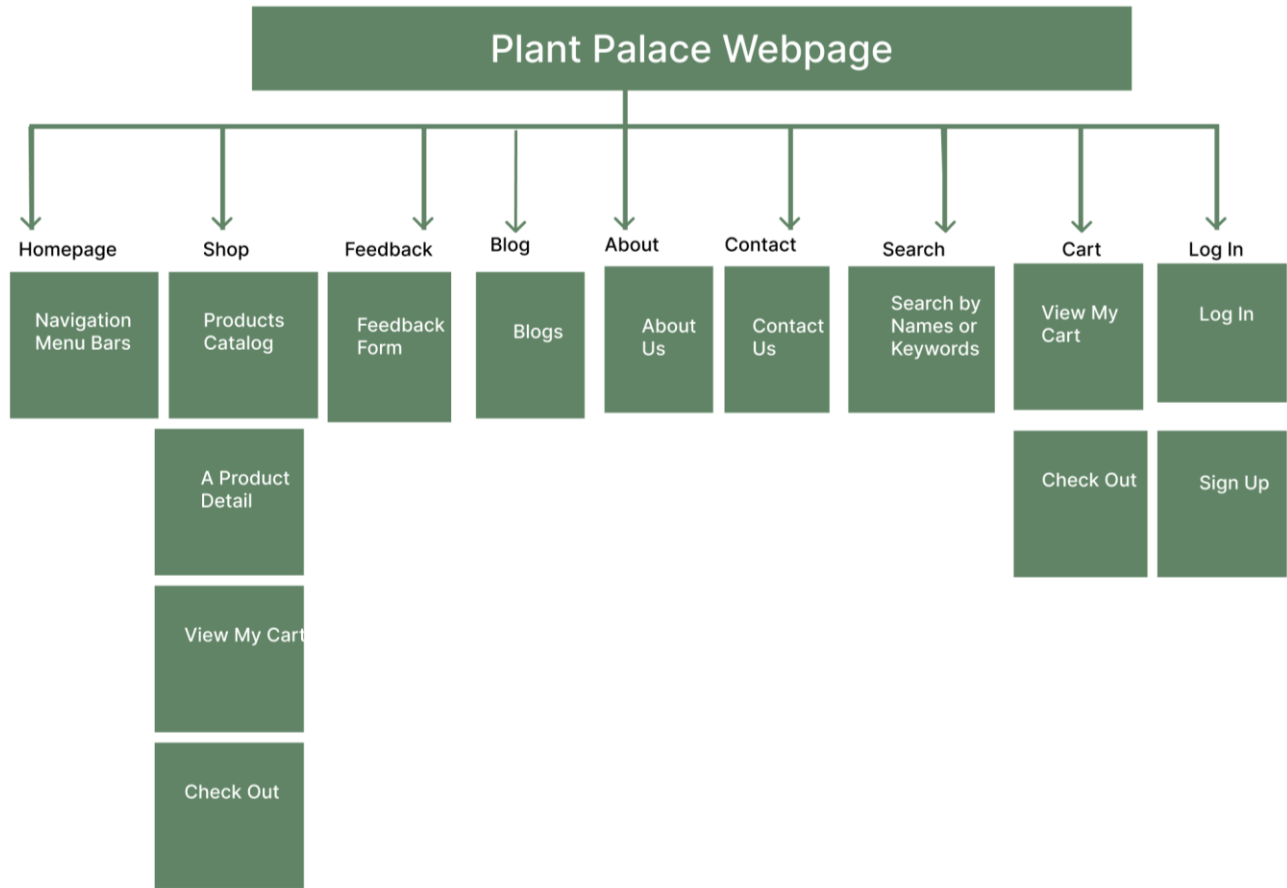


Figure 1.1: Application Architecture

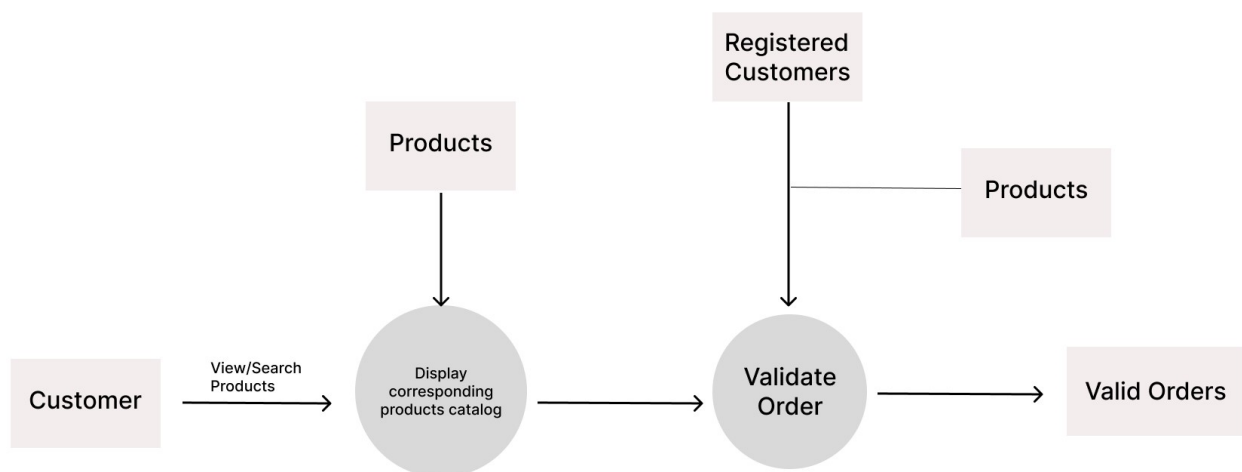
Site Map

The figure below shows the Sitemap identified for the Plant Palace web portal.

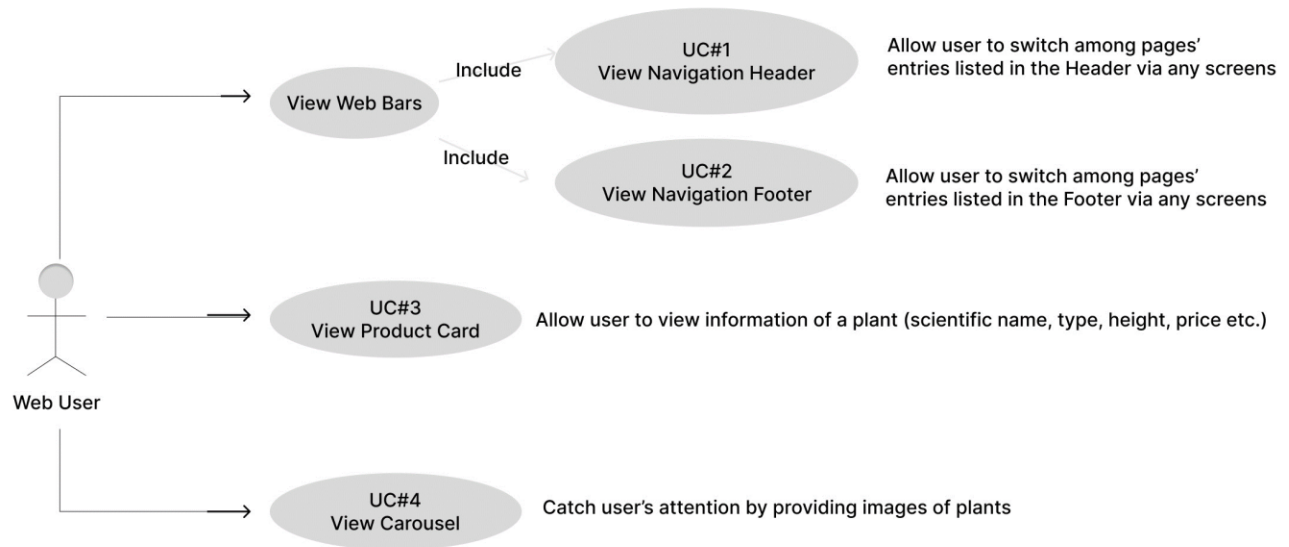


Data Flow Diagram

The figure below shows the Data Flow Diagram identified for Plant Palace



Below are the common use cases:



Common Use Cases Description:

UC#1: Common-View Navigation Header

Path	User accesses the webpage User view Menu entries in the Header User interacts with entries via any URL
Pre-conditions	None
Trigger	On Click
Post-condition	System always displays the navigation header with all entries enabled On click each entry of the menu, system navigates user to the corresponding page



[Home](#)

[Shop](#)

[Blog](#)

[About](#)

[Login](#)

[Feedback](#)

[Contact](#)



[Home](#)

[Shop](#)

[Blog](#)

[About](#)

[Login](#)

[Feedback](#)

[Contact](#)



[Home](#)

[Shop](#)

[Blog](#)

[About](#)

[Login](#)

[Feedback](#)

[Contact](#)



[Home](#)

[Shop](#)

[Blog](#)

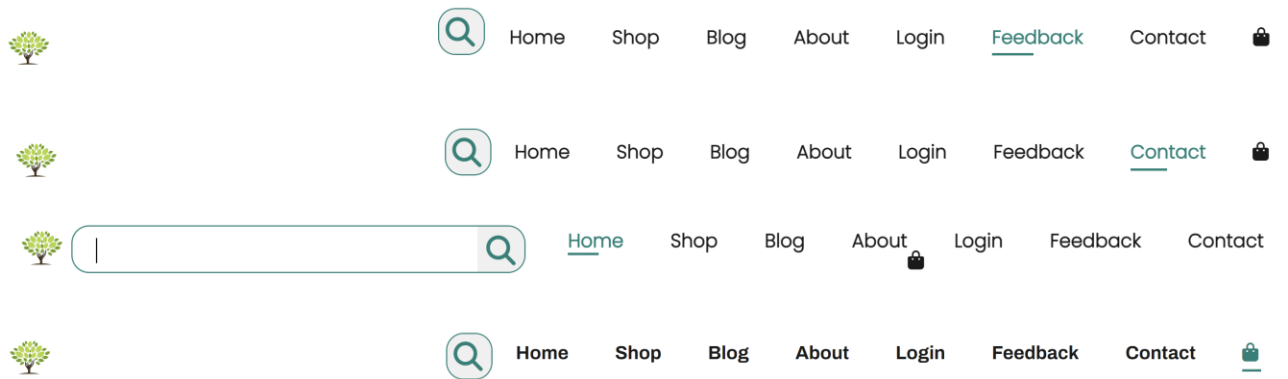
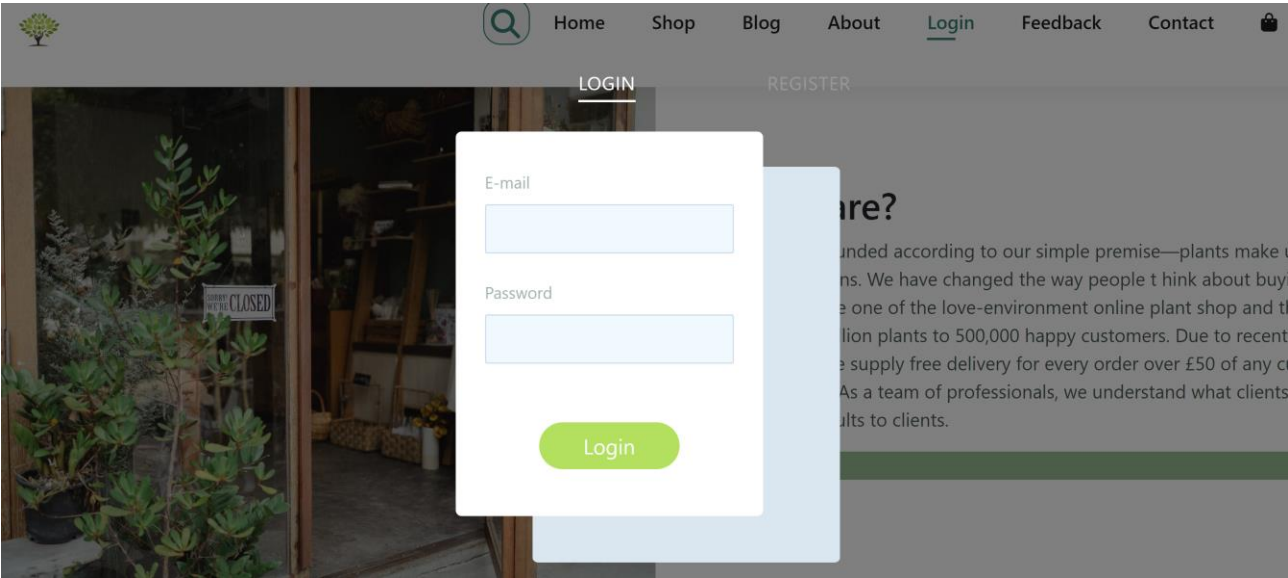
[About](#)




[Login](#)

[Feedback](#)

[Contact](#)





Field Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
The Header bar	<section>	Background-color: rgb(255, 255, 255)	-	-	-
Plant Palace Logo	<div></div> <div>Image</div>	-	PNG	Enabled	On Click
Home	Cell (Label)	Open the Homepage	Text		
Plants		Open the Products page			
Feedback		Open the Feedback page			
About		Open the About page			
Contact		Open the Contact page			
Search Icon	<div></div> <div>Icon</div>	Open the Search bar	-		
Cart Icon	<div></div> <div>Icon</div>	Open the View My Cart page	-		
Login Button	<div>Login</div> <div>Button</div>	Open Login and Register page	-		

UC#2: Common-View Navigation Footer

Path	User accesses the webpage User entries in the Footer User interacts with entries via any URL
Pre-conditions	None
Trigger	On Click
Post-condition	System displays the navigation footer across the system pages with some entries, that are feasible in this plant nursery website, are enabled.

Contact

Address: 56 Glassford Street Glasgow
G1 1UL New York
Email: weLovePlantPalace@gmail.com
Phone: +84 705 806 353
Hours: 10:00 – 18:00, Mon – Sat

Explore

Our Story
Plant Care
Privacy Policy
Terms & Conditions
Locations

My Plant Palace

Sign In
Sign Up
My Wishlist
Track My Order
View Cart

Install App

From App Store or Google Play



Secured Payment Gateways



Follow us



© 2023 Plant Palace Ltd

Interactive Fields Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
Our Story	Hyperlink Text	System opens the About Us page	-	-	-
Plant Care		System opens the Blogs page	PNG	Enabled	On Click
Privacy Policy		-	Text		
Terms & Conditions		-			
Locations		System opens the Contact Us page with the mini map of the store			
Sign In		System opens the Log In page			
Sign Up		System opens the Register page			
My Wishlist		-			
Track My Order		-			
View Cart		System opens the View My Cart page			

UC#3: Common-View Product Card



Path	1: User view product card in Homepage 2. User views in Product Catalog
Pre-conditions	None
Trigger	-
Post-condition	Product cards are displayed row by row in applicable areas



Apricot Drift® Rose

69.95



Field Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
<category>	Cell (Label)	Display category of each plant	Text	-	-
<name>	Cell (Label)	Display name of each plant	Text	-	-
<price>	Cell (Label)	Display the price of each plant	CHAR	-	-
Cart icon	 Icon	On hover, change to another icon as below  On click, system add the product to the cart	Icon	-	On Click

UC#4: Common-View Web Carousel

Path	User accesses the Homepage
Pre-conditions	None
Trigger	On click
Post-condition	System displays the carousel with several images

[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

More plants, better future.

For a clean green environment and a happier life, green the place you live

[Go Shop](#)[or Call +84 705 806 353](#)[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

More plants, better future.

For a clean green environment and a happier life, green the place you live

[Go Shop](#)[or Call +84 705 806 353](#)[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

More plants, better future.

For a clean green environment and a happier life, green the place you live

[Go Shop](#)[or Call +84 705 806 353](#)

[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

More plants, better future.

For a clean green environment and a happier life, green the place you live

[Go Shop](#)

or Call +84 705 806 353

[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

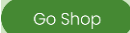
More plants, better future.

For a clean green environment and a happier life, green the place you live


[Go Shop](#)

or Call +84 705 806 353




Field Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
Carousel	Images	Display category of each plant	PNG	-	On click
Text	Paragraph	Display name of each plant	Text	-	-
Go Shop button	 Go Shop Button	Navigate user to Products page	-	Enabled	On click

Plant Palace Self-Introduction




HomeShopBlogAboutLoginFeedbackContact



Who we are?

Plant Palace was founded according to our simple premise—plants make us happier and healthier humans. We have changed the way people think about buying plants since 2019. We were one of the love-environment online plant shop and they have delivered over 2 million plants to 500,000 happy customers. Due to recent demands of online shopping, we supply free delivery for every order over £50 of any customer within the country. As a team of professionals, we understand what clients want and deliver the best results to clients.

Don't be mean, just go green.



Contact

Address: 56 Glassford Street Glasgow
G1 1UL New York

Email: weLovePlantPalace@gmail.com

Phone: +84 705 806 353

Hours: 10:00 - 18:00, Mon - Sat

Explore

[Our Story](#)
[Plant Care](#)
[Privacy Policy](#)
[Terms & Conditions](#)
[Locations](#)

My Plant Palace


[Sign In](#)
[Sign Up](#)
[My Wishlist](#)
[Track My Order](#)
[View Cart](#)

Install App





From App Store or Google Play

[Google Play](#)[App Store](#)

Secured Payment Gateways



Follow us



© 2023 Plant Palace Ltd

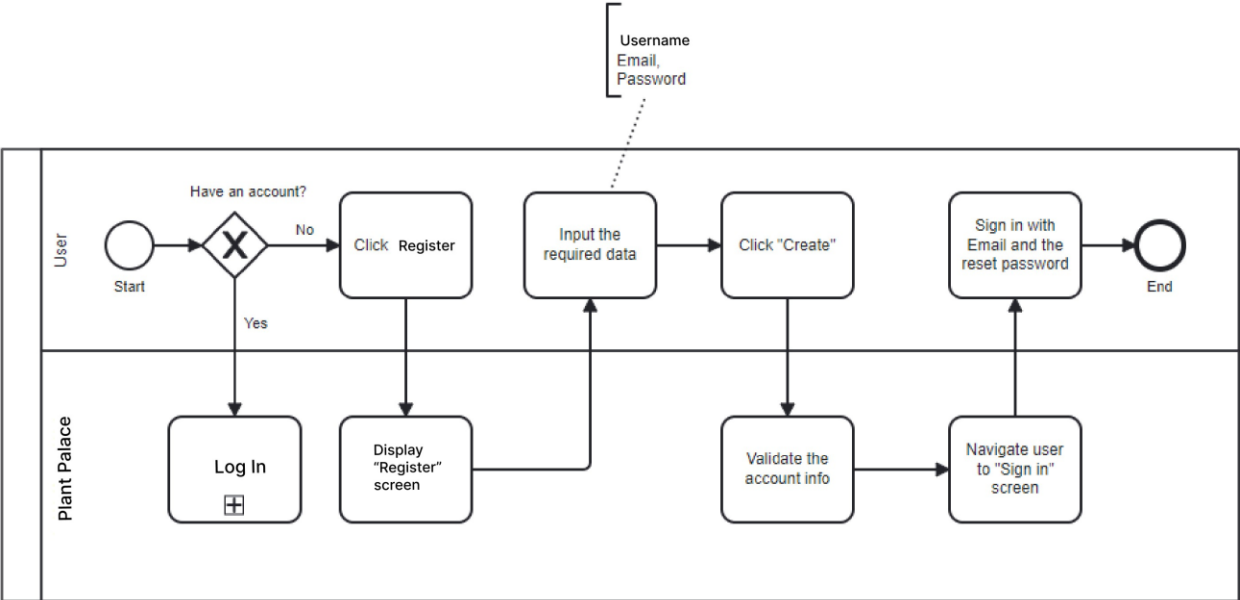
Field Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
<image>	Image	Image inserted, refer to ./img/aboutUs.png	PNG	Displayed	-
<introduction text>	<p>	Display the paragraph text: "Plant Palace was founded according to our simple premise—plants make us happier and healthier humans. We have changed the way people think about buying plants since 2019. We were one	Text	Displayed	-

		<p>of the love-environment online plant shop and they have delivered over 2 million plants to 500,000 happy customers.</p> <p>Due to recent demands of online shopping, we supply free delivery for every order over £50 of any customer within the country. As a team of professionals, we understand what clients want and deliver the best results to clients.</p>			
Carousel	Images	Display plants' gallery	PNG	Displayed	On click

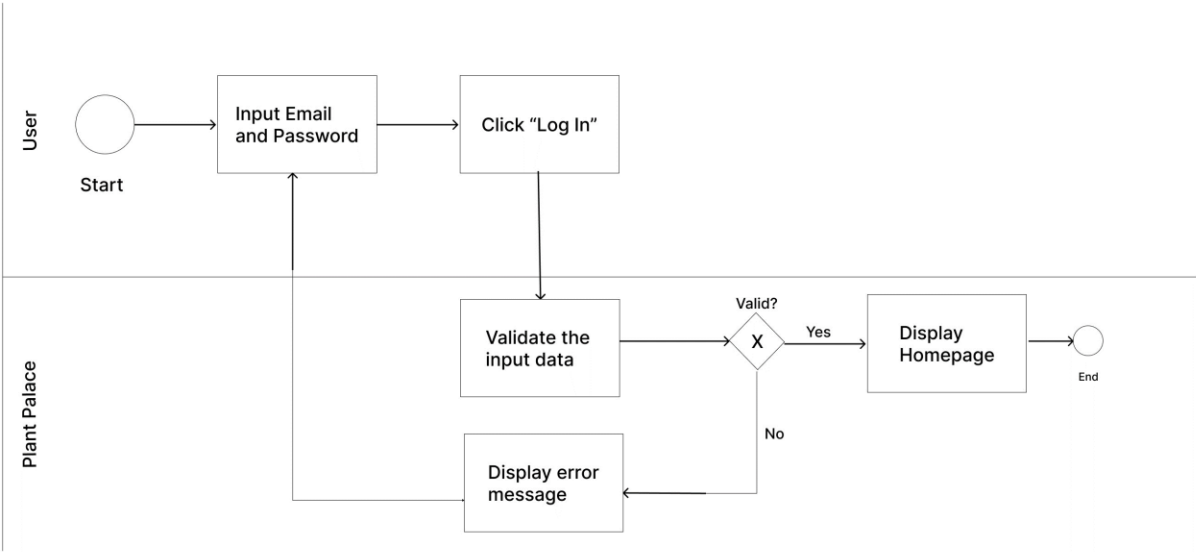
Log In/Register

Process Flows

The figure below shows the Register flow identified for the system



The figure below shows the Log In flow identified for the system




Use Cases



#	UC Name	Description
5	Log In	Allows user to log into Plant Palace with corresponding user email and password
6	Register	Allows user to create a new account to log into Plant Palace

Use Case Description:

UC#5: Log In

Path	1: User accesses Log In screen via any URL of the system (Footer >> Sign In) or user is requested to Log In upon checking out his/her shopping cart. 2. User inputs his or her Email and Password to log into the system.
Pre-conditions	User account is setup successfully The password must be valid
Trigger	Login button On Click
Post-condition	Success: System send Success Response and redirect users to the Homepage with user's corresponding username. Fail: (This is one of our wish-list features that do not have enough time to consistently implemented) Display Error Messages: "Email and Password are not valid."



[Home](#)[Shop](#)[Blog](#)[About](#)[Login](#)[Feedback](#)[Contact](#)

REGISTER

E-mail

Password

Login

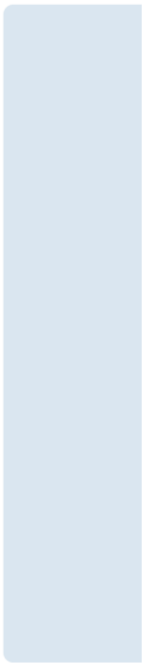
Login	Cell(Label)	Hidden "Login" text	PNG	Hidden	-
Email	Input Field	Be mandatory and user editable Must be in email format (...@...)	Email	Display placeholder: Email	On each character typing
Password	Input Field	Accept free text input Be mandatory and user editable	Free text	Display placeholder: Password	On each character typing
Login	Button	System prompts the success response "Create Account successfully!"	Text	-	On Click

UC#6: Register

Path	User accesses Register via Log In screen User is requested to have an account to continue. User inputs his or her Username, Email and Password to create his or her new account.
Pre-conditions	None
Trigger	Register button On Click
Post-condition	Success: System send Success Response and redirect users to the Log In page. Fail: (This is also our wish-list feature) Display Error Responses "Account Not Created"


[Home](#)
[Shop](#)
[Blog](#)
[About](#)
[Login](#)
[Feedback](#)
[Contact](#)


LOGIN



UserName

E-mail

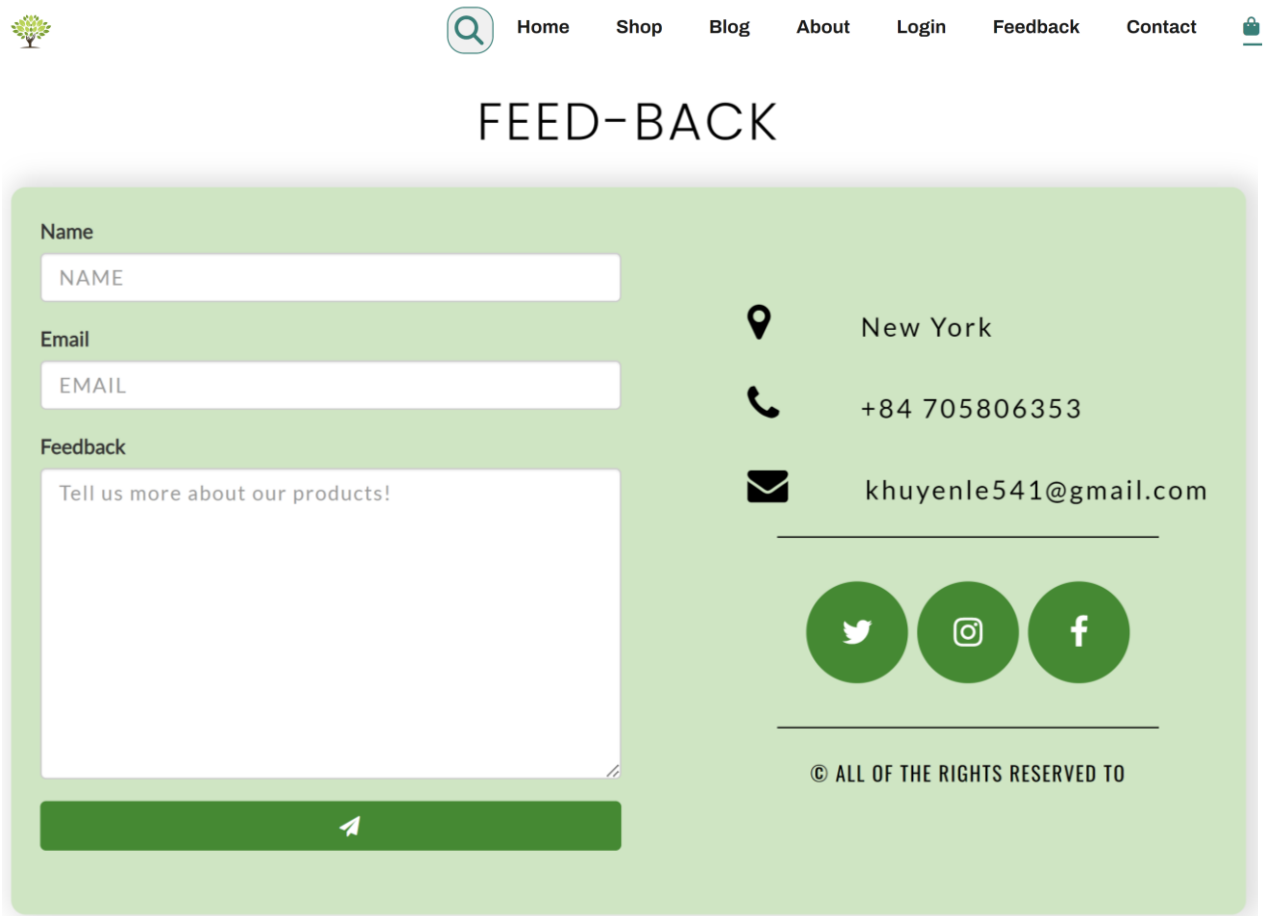
Password

Register

Field Name	Control	Validation Rule	Data	Default	Trigger
------------	---------	-----------------	------	---------	---------

	Format		Type	Value	Event
Login	Cell(Label)	Hidden "Login" text	PNG	Hidden	-
Email	Input Field	Accept free text input Be mandatory and user editable Must be in email format (...@...)	Text	Display placeholder: Email	On each character typing
Password	Input Field	Accept free text input Be mandatory and user editable	Free text	Display placeholder: Password	On each character typing
Login	Button	System prompts the success response "Create Account successfully!"	Text	-	On Click

UC#7: Feedback




The image shows a feedback form UI. At the top is a navigation bar with a search icon, a tree icon, and links for Home, Shop, Blog, About, Login, Feedback, and Contact. Below the navigation bar is a large heading "FEED-BACK". The form itself is a light green box containing:

- A "Name" label and a text input field with the placeholder "NAME".
- An "Email" label and a text input field with the placeholder "EMAIL".
- A "Feedback" label and a large text area with the placeholder "Tell us more about our products!".
- A green submit button with a white arrow icon.
- On the right side of the form, contact information: a location pin icon for "New York", a phone icon for "+84 705806353", and an email icon for "khuyenle541@gmail.com".
- Below the contact info are three circular social media icons for Twitter, Instagram, and Facebook.
- At the bottom right, a copyright notice: "© ALL OF THE RIGHTS RESERVED TO".

Path	User accesses Feedback through the Navigation bar or Customer Support Consulting User inputs his or her Username, Email and Feedback to complete his or her Feedback form.
Pre-conditions	None
Trigger	Send button On Click
Post-condition	(These are also our wish-list features) Success:

	System send Feedback Success to the user. Fail: In case of blank text, display Error Responses "Please fill all the content."
--	---

Field Name	Control Format	Validation Rule	Data Type	Default Value	Trigger Event
Name	Input Field	Display user's name	Text	Display placeholder: Name	On each character typing
Email	Input Field	Accept free text input Be mandatory and user editable Must be in email format (...@...)	Text	Display placeholder: Email	On each character typing
Feedback	Input Field	Accept free text input Be mandatory and user editable	Free text	Display placeholder: Password	On each character typing
Send	 Button	System prompts the success response "Feedback Success!"	-	-	On click

Project Tracking and Monitoring Activities

Review has been conducted time to time to monitor project status.

Documentation Section

<All filled up forms>

Source Code

- AJAX:
<https://ajax.googleapis.com/ajax/libs/angularjs/1.6.9/angular.min.js>
<https://ajax.googleapis.com/ajax/libs/angularjs/1.6.9/angular-route.js>
- Font Awesome:
<https://cdnjs.cloudflare.com/ajax/libs/font-awesome/6.4.2/css/all.min.css>
- Bootstrap5 cdn:
"https://cdn.jsdelivr.net/npm/bootstrap-icons@1.10.5/font/bootstrap-icons.css"

User Guide

The Website will be hosted on a local Web server and will be tested on all latest and popular browsers such as IE, Opera, and Chrome. The requirements on the client machine include Pentium 4 or higher processor, 1 GB or higher RAM, and a compatible browser to view the Website.

~~ End ~~