

# Project Write-Up

## \*Size Testing:

1. Laptop size: width 1320 \* height 695
2. Phone size: width 792 \* height 417(if the screen is less than width 924 or height 486)

## Accessibility WAVE testing

### Structure of project

1. Html pages
2. Js pages
3. Style page
4. No assets folder: Since I have too many images, the rendering speed will be slow if I put them into the assets folder. Therefore, I uploaded all the photos to Imgur and used the link from Imgur.

### Part 1 Write-up

My project is an educational website that teaches users about different topics of Chinese tea culture. Users can click on different icons on the homepage to go to different units, including tea set, tea making, tea brewing, and tea history. Each unit will lead to a detailed page containing a learning session and a testing session. Users will first go through a learning session with five pages that teach them about the major steps of the unit. Users can click the “Previous” and “Next” buttons to toggle between different pages of the learning session. Then, they will get to the testing session, which asks them a question and lets them select the right answer from four options. Once they submit the answer by clicking the “Next” button, they will see if they chose the right or wrong answer. If they are correct, the corresponding stamp on the stamp page(clicking on the stamp icon on the home page) will become colorful. Otherwise, the corresponding stamp is black and white. They can reset the stamp by clicking the “Reset” button on the stamp page. By resetting, they can learn these units again and again.

### Part 2 Write-up

- Get to detailed pages of different units
  - Interaction type: Clicking
  - Click on icons on the Home page
- Get to the next page of the learning session
  - Interaction type: Clicking
  - The learning progress line(at the bottom) will be updated
  - Click on the “Next” button on the detailed pages
- Get to the previous page of the learning session
  - Interaction type: Clicking
  - The learning progress line(at the bottom) will be updated

- Click on the “Previous” button on the detailed pages
- Get back to the home page from the detailed pages
  - Interaction type: Clicking
  - Click on the “Return To Home” button on the detailed pages
- Choosing one option on the testing session
  - Interaction type: Clicking
  - A filled rectangle will appear on that box
  - Click on the box of a specific option for the testing session on the detailed pages
- Submit the selected option on the testing session
  - Interaction type: Clicking
  - A pop-up will be displayed
  - Click on the “Next” button to submit the selected option
- Exit the congrats/ false pop-up
  - Interaction type: Clicking
  - A pop-up will be removed
  - Click on the “X” icon at the top left of the pop-up
- Reset the stamp page
  - Interaction type: Clicking
  - All the collected stamps(colorful) will become black and white
  - Click on the “Reset” button on the stamp page
- Resize the website
  - Interaction type: Resizing
  - The website will become larger or smaller based on the current viewport size
  - Resizing the browser viewport

### Part 3 Write-up

Name of the tool: JavaScript Library p5.js

Why did you choose to use it?

Since I need to use many images on my website by displaying them in various positions, using the HTML structure to put all these images in is not very convenient. The reason p5.js works for images is beneficial for my website is that I can make subtle changes to the image position by adjusting the x and y coordinates. Also, p5.js is intuitive to use and simple to begin in a short amount of time. Therefore, this is very suitable for this project.

How you used it?

The primary uses of p5.js are the `image()` function and `mousePressed()` function to display images and detect the mouse pressing position. I used the x and y coordinates of the `image()` function to display the picture or icons in a specific position. For the `mousePressed()` function, I used “mouseX” and “mouseY” to detect where the mouse clicked and change the state of variables.

What does it add to your website?

It improved the aesthetic level of my website by directly retrieving the image and controlling the size of the image in js files. Also, this makes the background of my website a canvas, and I can directly imagine that I'm drawing on the website. Adding shapes to my website becomes very easy on the website as well.

## Part 4 Write-up

In my original prototypes, I split the detailed pages into two parts: the learning and testing parts (displayed on the same page). When implementing this, I found it too overwhelming for users to see both parts on the same page. Therefore, I divided them into two sessions, with the learning session displayed first and the testing session shown after the learning session. With a progress line at the bottom of the detailed page, users can see where they are and how many pages are left. Also, I added many drop-down shadows for texts on my prototype. However, it might be distracting for the users. Therefore, I didn't implement that in my actual website.

## Part 5 Write-up

The most challenging part of my project is to make the website responsive. Since I'm using p5.js to load all the images, it's hard to make the website responsive using the way we learned during the lab session. Therefore, I must set a resizing variable and change the CSS style on js files.

## Accessibility WAVE testing:

### 1. Home Page

The screenshot displays the WAVE (Web Accessibility Evaluation Tool) interface. The top bar shows the URL: <https://paulinezhanghgh.github.io/pui-hw1fm/>. The page title is "Tea Culture". The "Summary" panel on the left indicates: 0 Errors, 0 Contrast Errors, 1 Alert, 1 Feature, 1 Structural Element, and 0 ARIA. A message at the bottom states: "Congratulations! No errors were detected! Manual testing is still necessary to ensure compliance and optimal accessibility." The "Details" panel on the right lists the following issues:

- 1 Alerts
  - 1 X No page regions
- 1 Features
  - 1 X Language
- 1 Structural Elements
  - 1 X Heading level 1

A note at the bottom of the details panel reads: "If an icon does not appear within the page, turn off Styles above to view it."

## 1. Tea Set Page

WAVE

powered by

WebAIM

web accessibility evaluation tool

Address: <https://paulinezhanghh.github.io/pui-hw1fm/>

Styles: OFF ON

Summary

Errors 0

Contrast Errors 0

Alerts 1

Features 1

Structural Elements 9

ARIA 0

View details

Congratulations! No errors were detected! Manual testing is still necessary to ensure compliance and optimal accessibility.

The following apply to the entire page:

Tea Set

Testing

Tea Clip

The tea clip, also known as tea chopsticks, serves the same purpose as a tea spoon, allowing the removal of tea residue from the teapot. It can also be used to hold tea cups for washing, providing both heat protection and hygiene.

What is the function of Tea Strainer?

A. To cool down the tea temperature

B. To enhance the aroma of the tea

C. To strain out tea leaves and prevent them falling

D. To add decorative patterns to the tea surface

"Press next button to submit ton."

Details

Summary Details Reference Order Structure Contrast

1 Alerts

1 X No page regions

1 Features

1 X Language

9 Structural Elements

9 X Heading level 1

If an icon does not appear within the page, turn off Styles above to view it.

## 2. Tea Making Page

WAVE

powered by

WebAIM

web accessibility evaluation tool

Address: <https://paulinezhanghh.github.io/pui-hw1fm/>

Styles: OFF ON

Summary

Errors 0

Contrast Errors 0

Alerts 1

Features 1

Structural Elements 9

ARIA 0

View details

Congratulations! No errors were detected! Manual testing is still necessary to ensure compliance and optimal accessibility.

The following apply to the entire page:

Tea Making

Testing

Picking Tea

The tea clip, also known as tea chopsticks, serves the same purpose as a tea spoon, allowing the removal of tea residue from the teapot. It can also be used to hold tea cups for washing, providing both heat protection and hygiene.

What is the second step of Making Tea?

A. Picking Tea

B. Packaging

C. Fumigation

D. Sieving Tea

"Press next button to submit ton."

Details

Summary Details Reference Order Structure Contrast

1 Alerts

1 X No page regions

1 Features

1 X Language

9 Structural Elements

9 X Heading level 1

If an icon does not appear within the page, turn off Styles above to view it.

## 3. Tea History Page

WAVE

powered by

WebAIM

web accessibility evaluation tool

Address: <https://paulinezhanghh.github.io/pui-hw1fm/>

Styles: OFF ON

Summary

Errors 0

Contrast Errors 0

Alerts 1

Features 1

Structural Elements 9

ARIA 0

View details

Congratulations! No errors were detected! Manual testing is still necessary to ensure compliance and optimal accessibility.

The following apply to the entire page:

Tea History

Testing

Song Dynasty

The tea clip, also known as tea chopsticks, serves the same purpose as a tea spoon, allowing the removal of tea residue from the teapot. It can also be used to hold tea cups for washing, providing both heat protection and hygiene.

Where did Chinese tea culture originate?

A. Beijing

B. Luoyang

C. Hebei

D. Guangzhou

"Press next button to submit ton."

Details

Summary Details Reference Order Structure Contrast

1 Alerts

1 X No page regions

1 Features

1 X Language

9 Structural Elements

9 X Heading level 1

If an icon does not appear within the page, turn off Styles above to view it.

## 4. Tea Brewing Page

The screenshot shows the WAVE web accessibility evaluation tool interface. The top bar indicates the tool is powered by WebAIM. The address bar shows the URL: <https://paulinezhangh.github.io/pui-hw/finx>. The left sidebar contains a 'Summary' panel with the following statistics: 0 Errors, 0 Contrast Errors, 1 Alerts, 1 Features, 9 Structural Elements, and 0 ARIA. A 'View Details' button is located below the summary. The main content area displays the page title 'Tea Brewing' and a list of sections: 'Testing', 'Washing Tea Set', 'For tea brewing, what is the first thing to consider?', 'A. Washing Tea Set', 'B. Pouring Tea', 'C. Sercing Tea', 'D. Putting Leaves In', and '"Press next button to subr...ton."'.

The 'Details' panel for the Tea Brewing page shows the following results:

- 1 Alerts**
  - 1 X No page regions
- 1 Features**
  - 1 X Language
- 9 Structural Elements**
  - 9 X Heading level 1

If an icon does not appear within the page, turn off Styles above to view it.

## 5. Stamp Page

The screenshot shows the WAVE web accessibility evaluation tool interface for the Stamp page. The top bar indicates the tool is powered by WebAIM. The address bar shows the URL: [http://pui-hw/finx\\_project/html/stamp.html](http://pui-hw/finx_project/html/stamp.html). The left sidebar contains a 'Summary' panel with the following statistics: 0 Errors, 0 Contrast Errors, 2 Alerts, 1 Features, 0 Structural Elements, and 0 ARIA. A 'View Details' button is located below the summary. The main content area displays the page title 'Stamp' and a list of sections: 'Return To Home' and 'Reset'.

The 'Details' panel for the Stamp page shows the following results:

- 2 Alerts**
  - 1 X No heading structure
  - 1 X No page regions
- 1 Features**
  - 1 X Language

If an icon does not appear within the page, turn off Styles above to view it.