



K4 CSF3133 REKA BENTUK ANTARA MUKA BERASASKAN WEB

SEM 3

LAB REPORT 6

PREPARED FOR:

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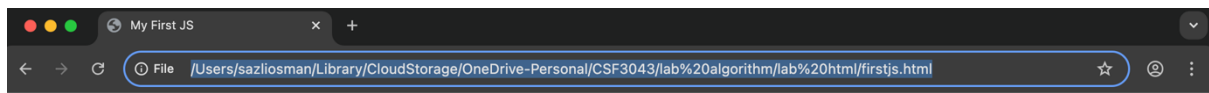
NUR ALYA ADRIANA BINTI SAZLI

NO. MATRIC:

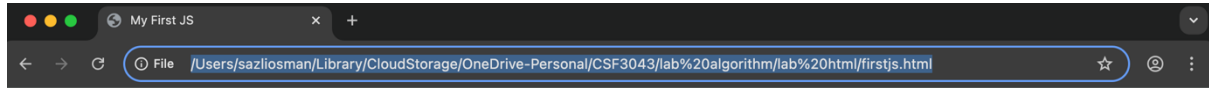
S75898

SUBMIT BY: **6 DEC 2025**

6.3 basic Javascript

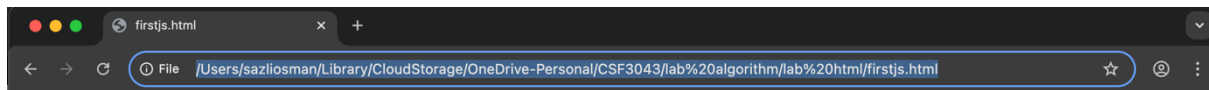


My First JS!



My First Java Script

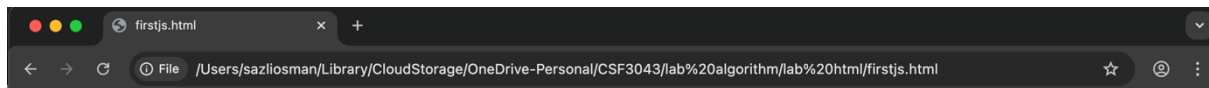
6.4 getElementByld()



What can JavaScript Do?

Javascript can change HTML content.

Click Me!

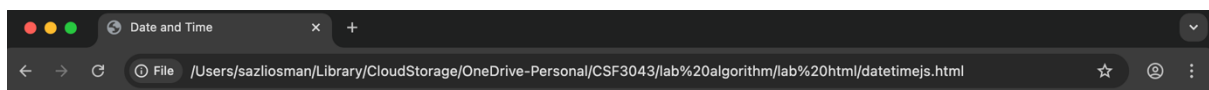


What can JavaScript Do?

Hello JavaScript!

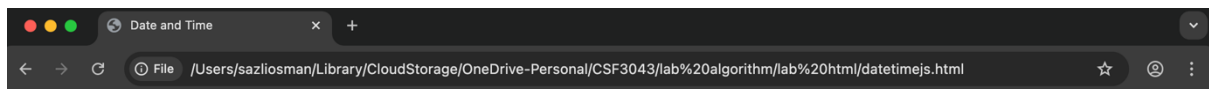
Click Me!

6.5 Date and Time



Tue Dec 02 2025 14:08:39 GMT+0800 (Malaysia Time)

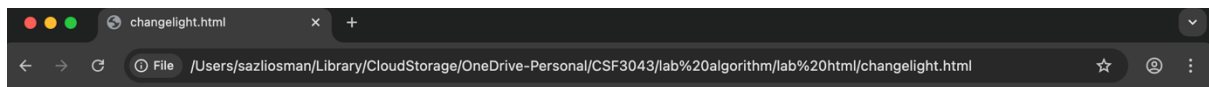
>Click me to display Date and Time



Click me to display Date and Time

Tue Dec 02 2025 11:41:39 GMT+0800 (Malaysia Time)

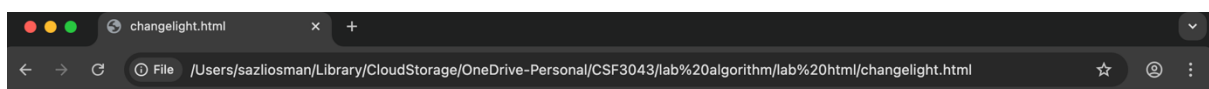
6.6 Change HTML Attributes Values



What Can JavaScript Do?

JavaScript can change HTML attribute values.

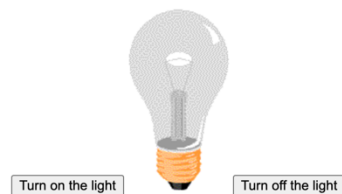
In this case, JavaScript changes the value of the 'src' (source) attribute of an image.



What Can JavaScript Do?

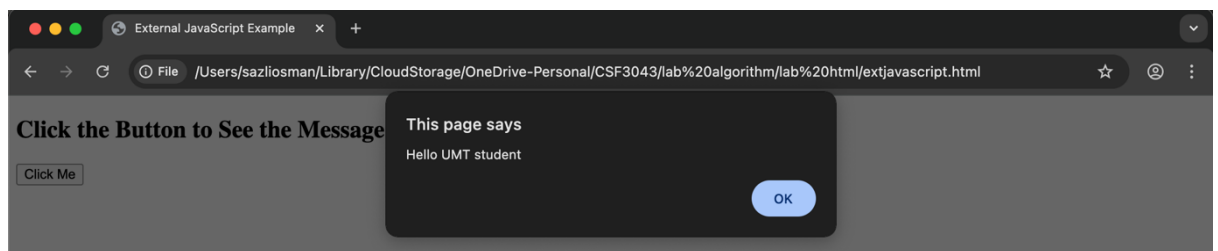
JavaScript can change HTML attribute values.

In this case, JavaScript changes the value of the 'src' (source) attribute of an image.

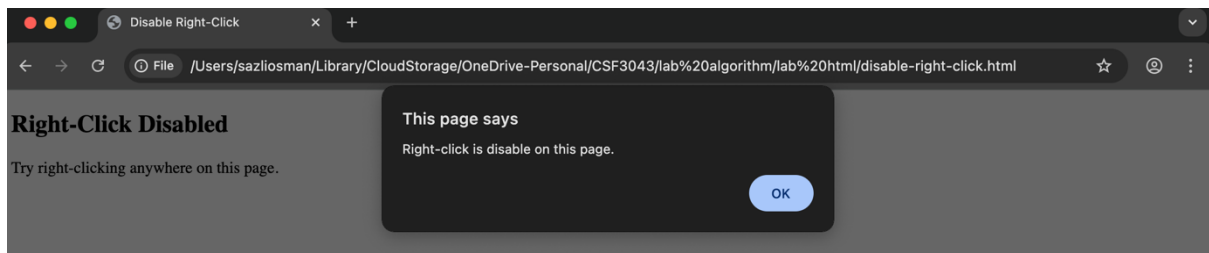


6.7 Link to file Javascript

6.7.3 External references



6.8 Working with events

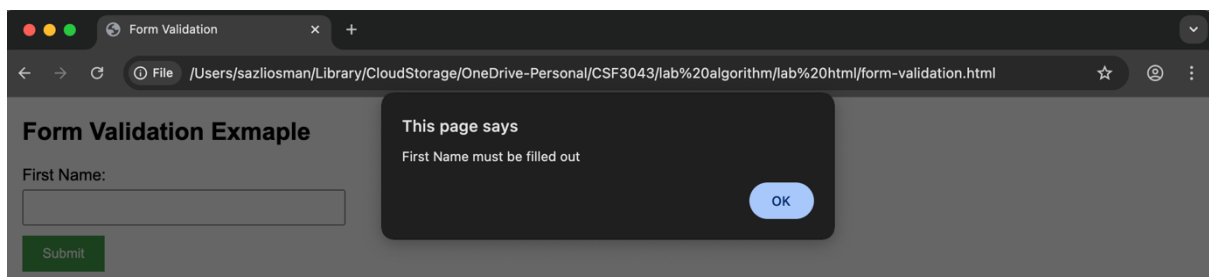


6.9 Multiplication Table

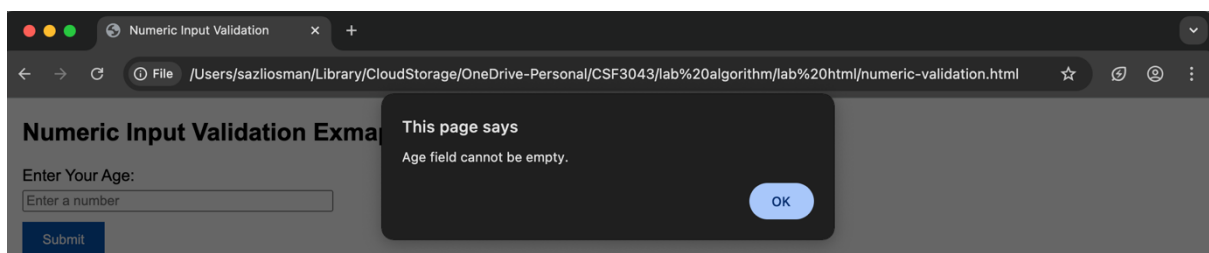


6.10 Client-side validation

6.10.1 Form Validation

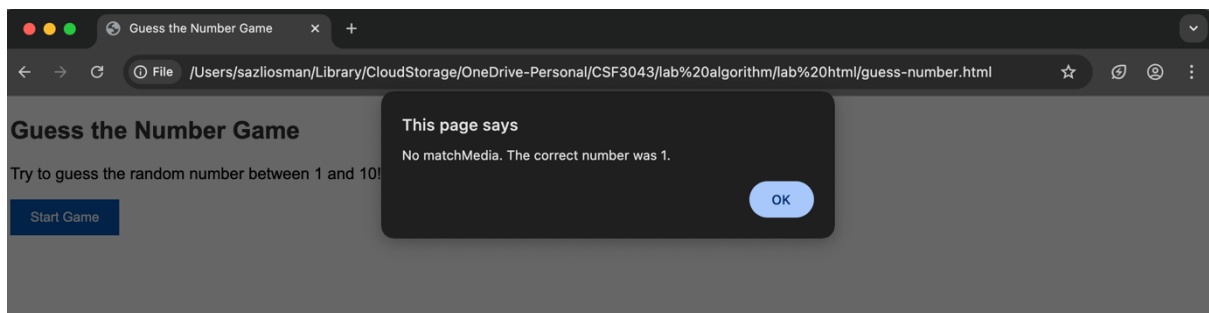
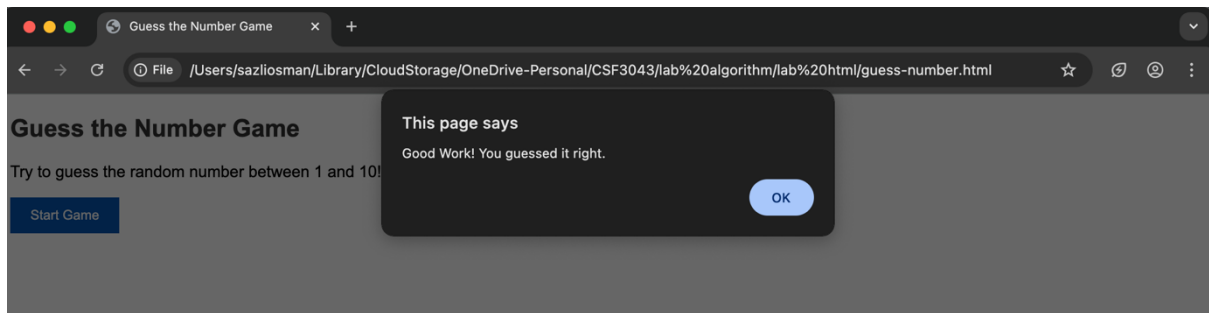
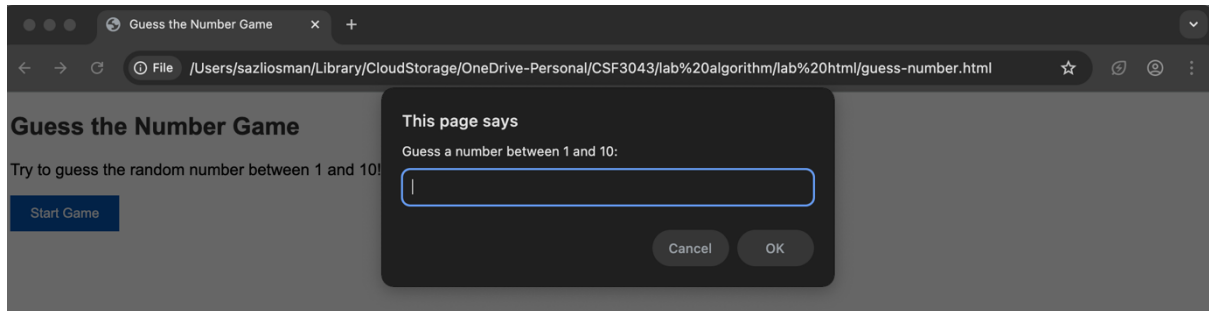


6.10.2 Numeric Input Validation

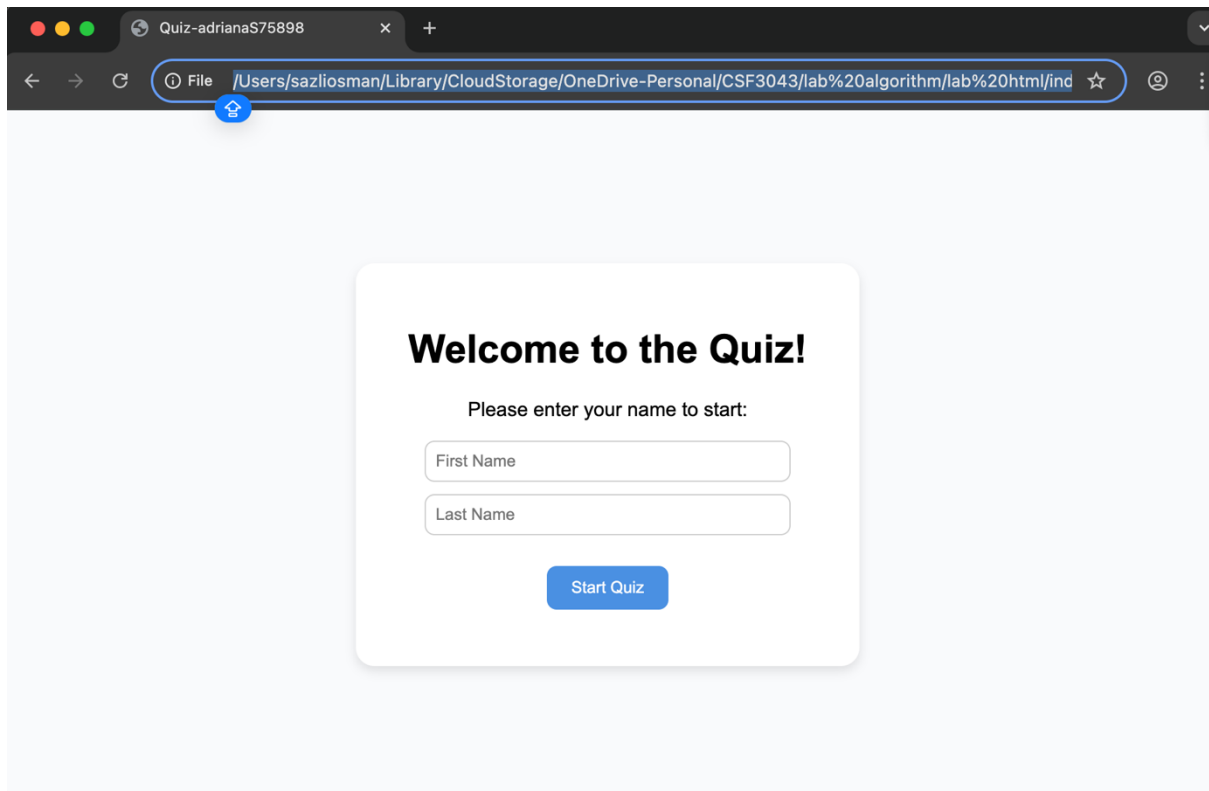


6.11 Math Function

6.11.1 Guess a Number



Lab Exercise 6



A screenshot of a web browser window. The address bar shows a file path: `/Users/sazliosman/Library/CloudStorage/OneDrive-Personal/CSF3043/lab%20algorithm/lab%20html/ind`. The page content is a white card with a light gray shadow on a light blue background. The card has the heading "Welcome to the Quiz!" in bold black text. Below it is the instruction "Please enter your name to start:". There are two text input fields, one labeled "First Name" and one labeled "Last Name". At the bottom of the card is a blue button with the text "Start Quiz".

Quiz-adrianaS75898

File /Users/sazliosman/Library/CloudStorage/OneDrive-Personal/CSF3043/lab%20algorithm/lab%20html/ind

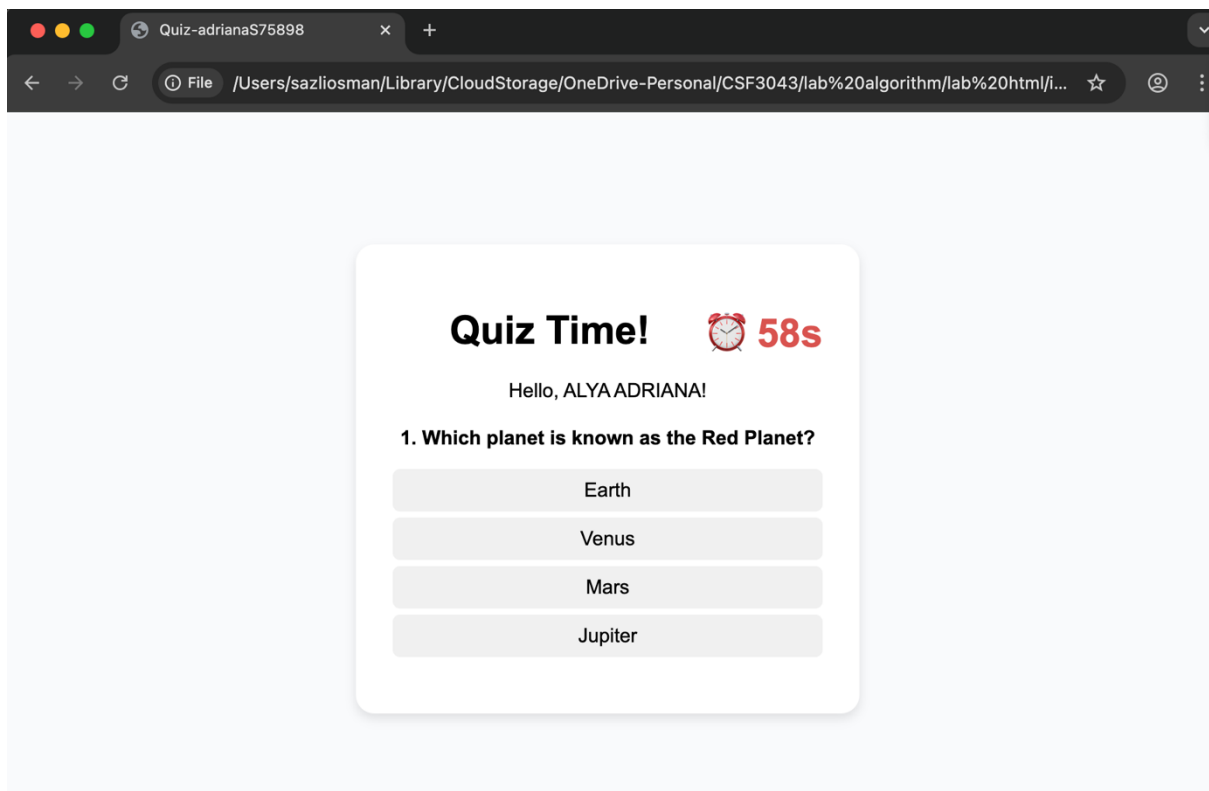
Welcome to the Quiz!

Please enter your name to start:

First Name

Last Name

Start Quiz



A screenshot of a web browser window, similar to the one above. The address bar shows a file path: `/Users/sazliosman/Library/CloudStorage/OneDrive-Personal/CSF3043/lab%20algorithm/lab%20html/i...`. The page content is a white card with a light gray shadow on a light blue background. The card has the heading "Quiz Time!" in bold black text, followed by a red alarm clock icon and the text "58s" in red. Below this is the greeting "Hello, ALYA ADRIANA!". The first question is "1. Which planet is known as the Red Planet?". There are four gray buttons with rounded corners, each containing a planet name: "Earth", "Venus", "Mars", and "Jupiter".

Quiz-adrianaS75898

File /Users/sazliosman/Library/CloudStorage/OneDrive-Personal/CSF3043/lab%20algorithm/lab%20html/i...

Quiz Time! 58s

Hello, ALYA ADRIANA!

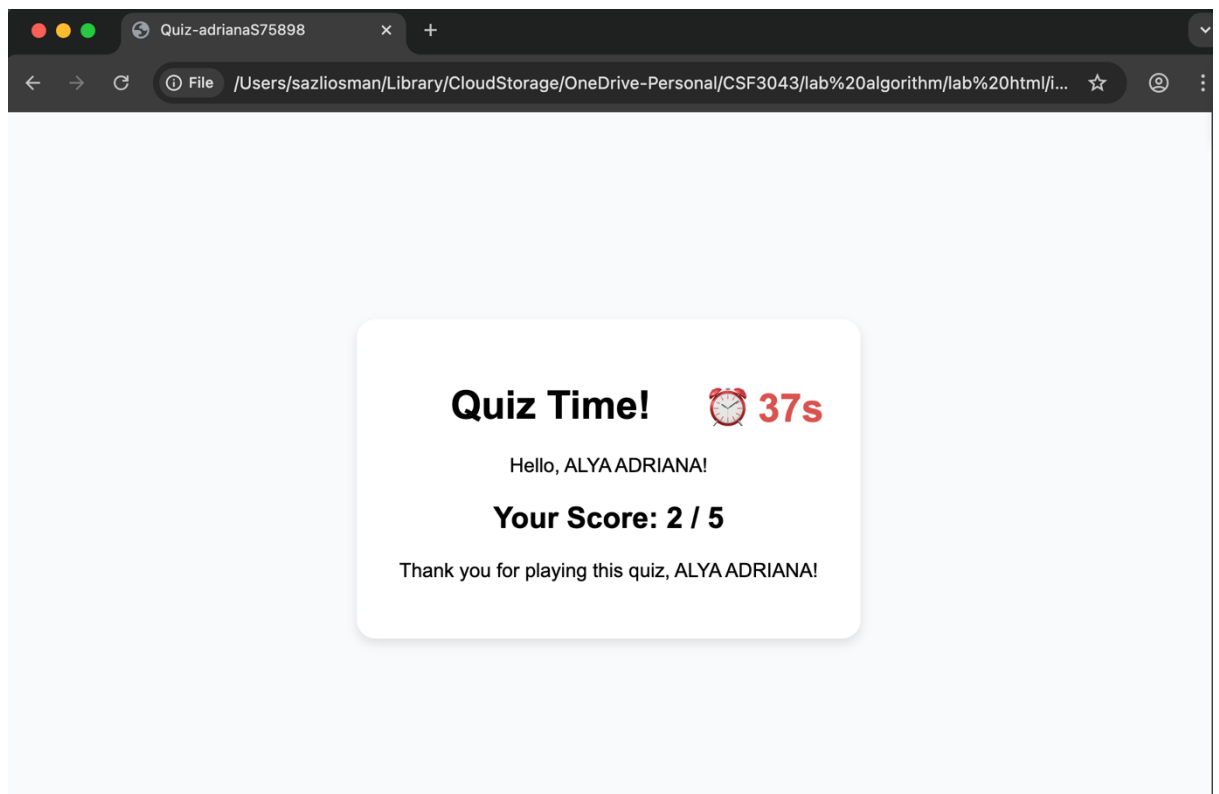
1. Which planet is known as the Red Planet?

Earth

Venus

Mars

Jupiter



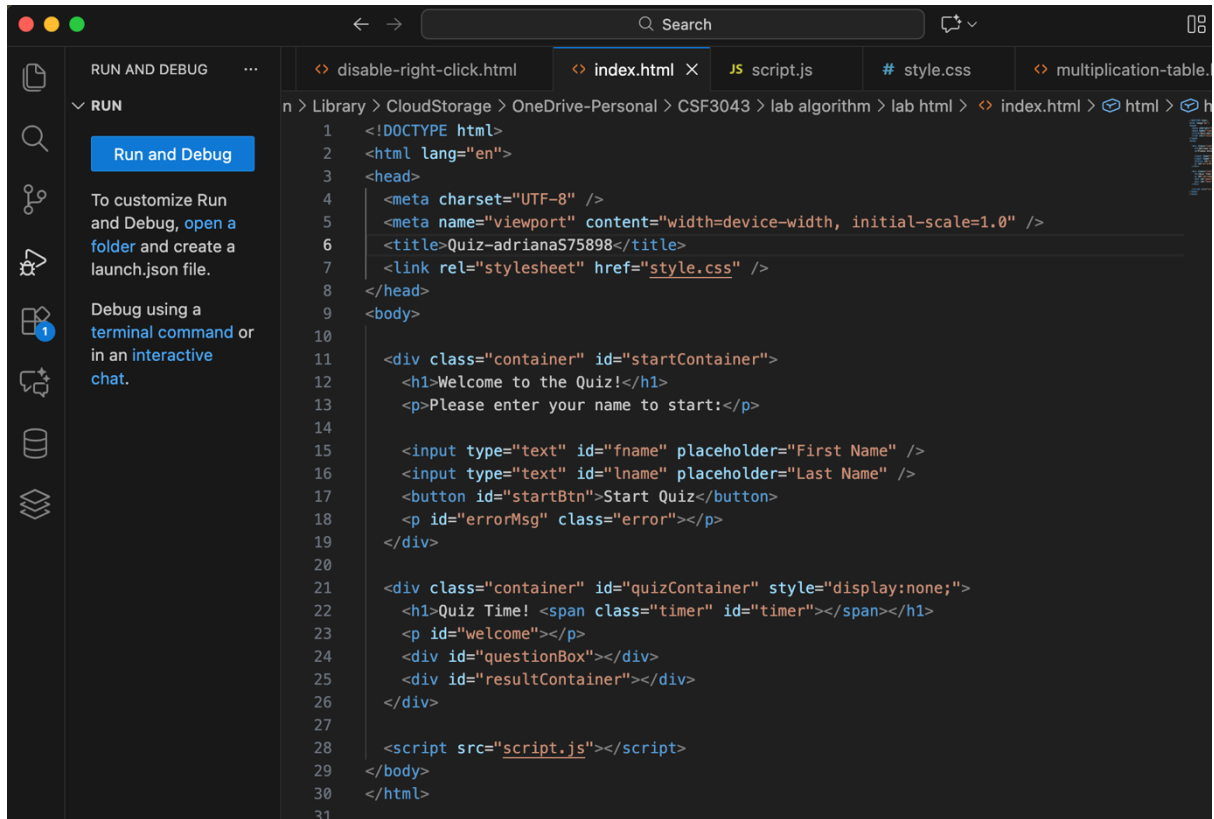
Quiz Time!  **37s**

Hello, ALYA ADRIANA!

Your Score: 2 / 5

Thank you for playing this quiz, ALYA ADRIANA!

INDEX.HTML





```
1 <!DOCTYPE html>
2 <html lang="en">
3 <head>
4   <meta charset="UTF-8" />
5   <meta name="viewport" content="width=device-width, initial-scale=1.0" />
6   <title>Quiz-adrianaS75898</title>
7   <link rel="stylesheet" href="style.css" />
8 </head>
9 <body>
10
11   <div class="container" id="startContainer">
12     <h1>Welcome to the Quiz!</h1>
13     <p>Please enter your name to start:</p>
14
15     <input type="text" id="fname" placeholder="First Name" />
16     <input type="text" id="lname" placeholder="Last Name" />
17     <button id="startBtn">Start Quiz</button>
18     <p id="errorMsg" class="error"></p>
19   </div>
20
21   <div class="container" id="quizContainer" style="display:none;">
22     <h1>Quiz Time! <span class="timer" id="timer"></span></h1>
23     <p id="welcome"></p>
24     <div id="questionBox"></div>
25     <div id="resultContainer"></div>
26   </div>
27
28   <script src="script.js"></script>
29 </body>
30 </html>
31
```


SCRIPT.JS

The screenshot shows the Visual Studio Code editor interface. The sidebar on the left has a 'RUN AND DEBUG' panel with options like 'Run and Debug', 'JavaScript Debug Terminal', and 'Debug URL'. The main editor area displays the file 'script.js' with the following code:

```
1 const startBtn = document.getElementById("startBtn");//start button
2 const startContainer = document.getElementById("startContainer");//start container
3 const quizContainer = document.getElementById("quizContainer");//quiz container
4 const questionBox = document.getElementById("questionBox");//question box
5 const resultContainer = document.getElementById("resultContainer");//result container
6
7
8 //variables
9 let userName = "";
10 let current = 0;
11 let score = 0;
12 let timer = 60;
13 let countdown;
14
15
16 //questions
17 const questions = [
18   { q: "What is the capital of France?", options: ["London", "Paris", "Berlin", "Rome"],
19     answer: "Paris" },
20   { q: "Which planet is known as the Red Planet?",
21     options: ["Earth", "Venus", "Mars", "Jupiter"], answer: "Mars" },
22   { q: "What is 5 * 6?", options: ["30", "35", "40", "25"], answer: "30" },
23   { q: "Who wrote 'Romeo and Juliet'?",
24     options: ["Shakespeare", "Hemingway", "Austen", "Dickens"], answer: "Shakespeare" },
25   { q: "What gas do plants absorb from the atmosphere?",
26     options: ["Oxygen", "Carbon Dioxide", "Nitrogen", "Helium"],
27     answer: "Carbon Dioxide" },
28 ];
29
30
31 //generate 5 random questions
32 const selected = questions.sort(() => 0.5 - Math.random()).slice(0, 5);
33
34 //start quiz - by click button
35 startBtn.addEventListener("click", () => {
36   const fname = document.getElementById("fname").value.trim();
37   const lname = document.getElementById("lname").value.trim();
38   const error = document.getElementById("errorMsg");
39
40   if (fname === "" || lname === "") {
41     error.textContent = "Please enter first name and last name.";
42     return;
43   }
44
45   userName = `${fname} ${lname}`;
46   document.getElementById("welcome").textContent = `Hello, ${userName}!`;
47
48   //hide start , show quiz container
49   startContainer.style.display = "none";
50   quizContainer.style.display = "block";
51
52   startQuiz();
53 });
54
55 function startQuiz() {
56   score = 0;
57   current = 0;
58   timer = 60; // 60 second - timer
59
60   countdown = setInterval(() => {
61     document.getElementById("timer").textContent = `⌚ ${timer}s`;
62     timer--;
```







To customize Run and Debug, open a folder and create a launch.json file.

JavaScript Debug Terminal

You can use the JavaScript Debug Terminal to debug Node.js processes run on the command line.

Debug URL

Debug using a terminal command or in an interactive chat.



To customize Run and Debug, open a folder and create a launch.json file.

JavaScript Debug Terminal

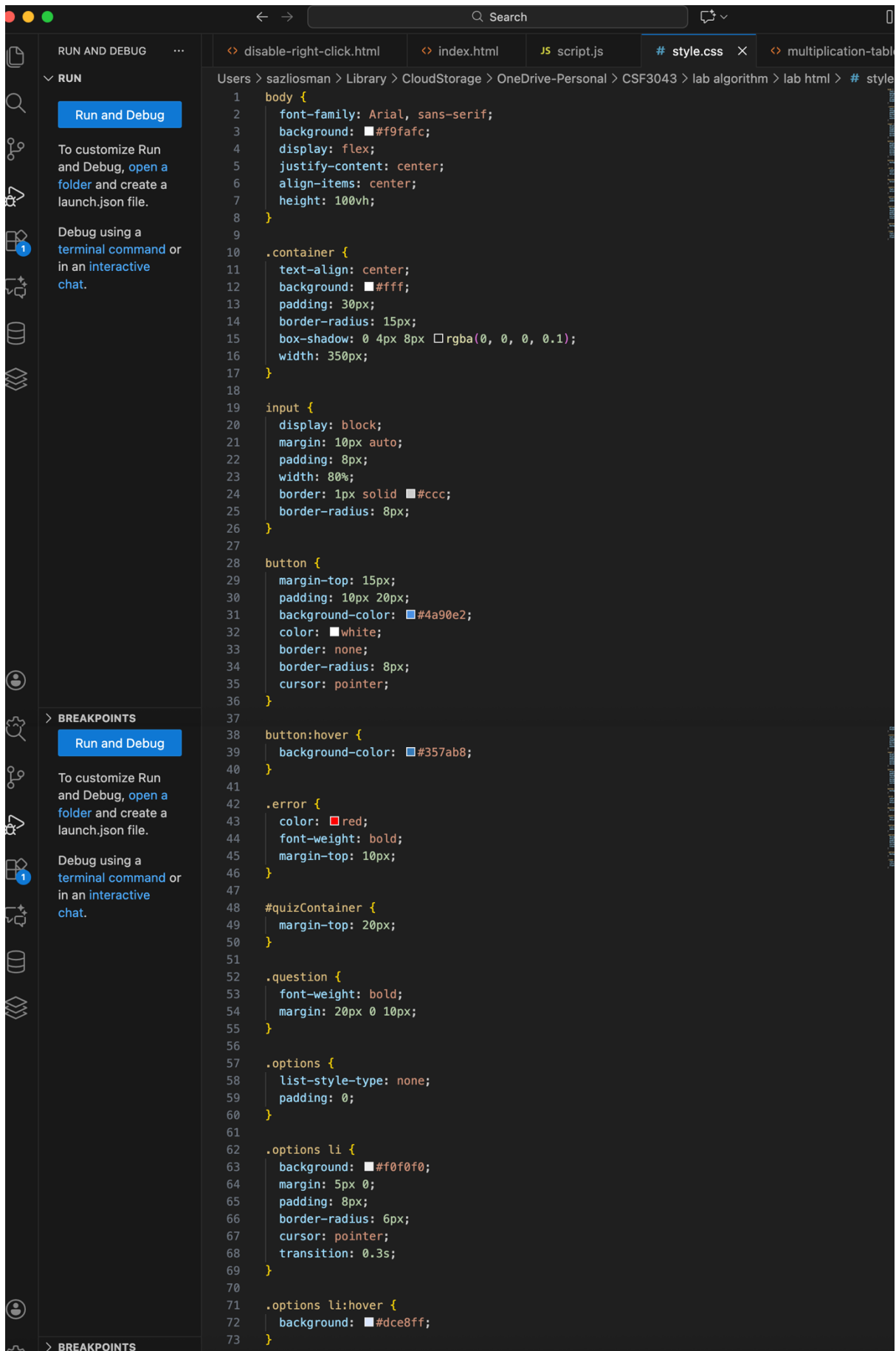
You can use the JavaScript Debug Terminal to debug Node.js processes run on the command line.

Debug URL

Debug using a terminal command or in an interactive chat.

```
62     timer--;
63     if (timer < 0) {
64         clearInterval(countdown);
65         showResult();
66     }
67 }, 1000);
68
69 loadQuestion();
70 }
71
72 //load questions and options
73 function loadQuestion() {
74     const q = selected[current];
75     questionBox.innerHTML = `
76     <div class="question">${current + 1}. ${q.q}</div>
77     <ul class="options">
78         ${q.options
79             .map(opt => `<li onclick="selectOption('${opt}', '${q.answer}')">${opt}</li>`)
80             .join("")}
81     </ul>
82     `;
83 }
84
85 //option - selection
86 window.selectOption = function(selectedOpt, correct) {
87     const options = document.querySelectorAll(".options li");
88     options.forEach(li => li.style.pointerEvents = "none");
89
90     if (selectedOpt === correct) {
91         score++;
92         event.target.style.background = "■#b2f7b2";
93     } else {
94         event.target.style.background = "■#f7b2b2";
95         options.forEach(li => {
96             if (li.textContent === correct) li.style.background = "■#b2f7b2";
97         });
98     }
99
100     // if time out or last question
101     setTimeout(() => {
102         current++;
103         if (current < selected.length) loadQuestion();
104         else showResult();
105     }, 1000);
106 };
107
108 //to show result of user
109 function showResult() {
110     clearInterval(countdown);
111     questionBox.innerHTML = "";
112     resultContainer.innerHTML = `
113     <h2>Your Score: ${score} / ${selected.length}</h2>
114     <p>Thank you for playing this quiz, ${userName}!</p>
115     `;
116 }
117
118
```

STYLE.CSS



```
74
75 .timer {
76   font-weight: bold;
77   color: #d9534f;
78   float: right;
79 }
80
```