# **IS216 Web Application Development II**

Lab Test 1 (a.k.a. Mini Lab Test)

**Grading Rubrics & Common Mistakes** 



## Where can I view my grade?

- 1. Go to IS216-xx eLearn page (Link goes here)
- 2. Go to



Results Processing

- 3. You will see your **Lab Test 1** marks with breakdowns
  - Q1 Part A
  - Q1 Part B
  - ..

We do <u>NOT</u> release class average and other statistics.



### You want to seek clarification on your Lab Test 1 marks?

### If so, please do the following (in sequence):

- The deadline for seeking clarification from the teaching team is 24-OCT-2024 (Thursday) 9AM SG Time.
   This will be strictly enforced.
- 2. Refer to this slidedeck and check your own solutions by yourself see where you lost marks.
- 3. If you are still *unsure* where you lost marks, you can contact the grading team via Slack DM:

Question	Contact Person
1 & 4	Your Section Faculty
2 & 3	Your Section Instructor

- 4. Should you decide to seek clarification from the graders, they may discover new errors which will result in further marks deduction. *In such cases, you cannot retract the inquiries that you already submitted and you must accept the marks deduction.*
- 5. This is NOT an opportunity for you to challenge graders' professional judgements and attempt to gain extra marks. IS216 teaching team will not entertain such requests.



## Where can I get the solutions?

- 1. Go to IS216-MERGED eLearn page (Link)
- 2. Go to **Content** → **Mini Lab Test Solutions** → solutions (zip file)
  - → Should be posted by 21-OCT-2024 (Monday) afternoon
  - → Please **WAIT** for them to upload solutions.

Q1

**CSS** 



# **Q1-A :: Header** (1.5 marks)

Part	Marks	Criteria
	0.5	Text size 40px -0.5 if not rendered as expected
	0.25	Text centered -0.25 if not rendered as expected
A	0.25	Text color white #fff -0.25 if not rendered as expected
	0.5	Background color #3498db -0.5 if not rendered as expected



# Q1-B :: Featured Review (3 marks)

Part	Marks	Criteria
	0.5	Background color white #fff -0.5 if not rendered as expected
	0.5	Border solid line 1px thick color #ddd -0.25 if border thickness is not 1px -0.25 if border color is something else or if border type is not solid
	0.5	Border radius 8px -0.5 if not rendered as expected
В	0.25	Center content -0.25 if not rendered as expected
	0.25	Center book image -0.25 if not rendered as expected
	0.5	30px space between the article content & top border 30px space between the article content & bottom border -0.25 each if not rendered as expected
	0.5	Book image width 200px -0.5 if not rendered as expected



# Q1-C :: Rating Section (3 marks)

Part	Marks	Criteria
	0.5	Stars are colored in gold color -0.5 if not rendered as expected
	0.5	Stars are sized 20px -0.5 if not rendered as expected
С	1	Stars appear in a single row with <b>no bullet points</b> -1 stars don't appear in a single row -0.5 if bullet point(s) appear
	1	Stars and the "20 ratings" text appear in a single row with padding  -1 if not rendered as expected



# **Q1-D** :: Footer (1.5 marks)

Part	Marks	Criteria
	0.5	Text color white o#fff -0.5 if not rendered as expected
D	0.5	Background color #2c3e50 -0.5 if not rendered as expected
	0.5	Center the footer text -0.5 if not rendered as expected

# Literary Corner

#### **Featured Review**



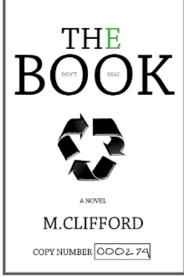
```
Sources
          Elements
                      Console
                                           Network
                                                      Performance
<!DOCTYPE html>
                                 Styles Computed
                                                     Layout Eve
<html lang="en">
                                 Y Filter
 ▶ <head> ··· </head>
 ▼ <body>
                                element.style {
   ▼<header>
      <h1>Literary Corner
                                h1 {
      </h1> == $0
    </header>
                                h1 {
  ▶ <main> ··· </main>
                                  display: block;
  ▶ <footer> ··· </footer> flex
                                   font-size: 2em;
  </body>
                                  margin-block-start: 0.67em;
 </html>
                                  margin-block-end: 0.67em;
                                  margin-inline-start: 0px;
                                  margin-inline-end: 0px;
                                  font-weight: bold;
                                  unicode-bidi: isolate;
                                Inherited from header
                                header {
                                   padding: ▶ 5px;
                                  font-size: 40px;
                                   text-align: center;
                                  color: white;
                                  background-color: ■#3498db;
```

```
header {
    padding: 5px;
    font-size: 40px;
    text-align: center;
    color: ■white;
    background-color: ■#3498db;
}
```

Incorrectly set font-size in header

```
h1 {
    font-size: 40px;
    text-align: center;
}
```

### **Featured Review**



by M. Clifford

The book that does not deserved to be read ....



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Incorrect border color (not set to color #ddd)



# Q2

# Bootstrap

# Released grade components

- Part A
  - At >=992px, div#desc and div#image span 4 columns and are on the same line
- Part B.1: At <992px, Input fields "name" and "email" span 5 columns</li>
   i.e. Change col-md-3 to col-md-5
- Part B.2: At < 992px, "Thank ... contact... us!" text is above the "Submit" button
- Part C.1: At <768px, menu "Home" & "About us", and "Schedule" & "Contact Us" span 5 columns and each pair is on same line.
- Part C.2: At <768px, Input fields name, email spans 10 columns</li>
- At the other viewport width, it should stay as given in the resource.
- Check your answer against the screenshots in the next two slides.

### <576px E.g. 575px

#### One Piece Interest Group

Home About Us

Schedule Contact Us

"One Piece," the globally renowned manga by Eichiro Oda, follows the thrilling adventures of Monkey D. Luffy and his diverse crew, the Straw Hat Pirates. Setting sail in search of the ultimate treasure, the One Piece, they face formidable foes and navigate perilous seas. Each member, from swordsman Zoro to navigator Nami and sharpshooter Usopp, brings unique skills and dreams to the crew. Their unbreakable bond and relentless pursuit of freedom captivate readers, making "One Piece" a masterpiece of camaraderie and high-seas adventure. The Straw Hats' journey is a testament to friendship, courage, and the endless quest for dreams. Contact us to join our interest group!



#### Contact Us

Name		
Email		
Comment		

Thank you for contacting us!

SMU Classification: Restricted

576px<= width <768px E.g. 767px

#### One Piece Interest Group

Home	About Us		
Schedule	Contact Us		

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#### Contact Us

Name		
Email		
Comment		

Thank you for contacting us!

Subm

### 768px<= width <992px E.g. 991px

#### One Piece Interest Group

Home About Us Schedule Contact Us

"One Piece," the globally renowned manga by Eiichiro Oda, follows the thrilling adventures of Monkey D. Luffy and his diverse crew, the Straw Hat Pirates. Setting sail in search of the ultimate treasure, the One Piece, they face formidable foes and navigate perilous seas, Each member, from swordsman Zoro to navigator Nami and sharpshooter Usopp, brings unique skills and dreams to the crew. Their unbreakable bond and relentless pursuit of freedom captivate readers, making "One Piece" a masterpiece of camaraderie and high-seas adventure. The Straw Hats' journey is a testament to friendship, courage, and the endless quest for dreams. Contact us to join our interest group!



#### Contact Us

Name	Email	
Comment		

Thank you for contacting us!

SMU Classification: Restricted = 992px

E.g. 992px

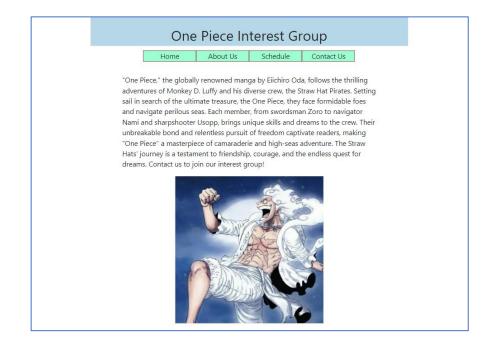
#### One Piece Interest Group Home About Us Schedule Contact Us "One Piece," the globally renowned manga by Eiichiro Oda, follows the thrilling adventures of Monkey D. Luffy and his diverse crew, the Straw Hat Pirates. Setting sail in search of the ultimate treasure, the One Piece, they face formidable foes and navigate perilous seas. Each member, from swordsman Zoro to navigator Nami and sharpshooter Usopp, brings unique skills and dreams to the crew. Their unbreakable bond and relentless pursuit of freedom captivate readers, making "One Piece" a masterpiece of camaraderie and high-seas adventure. The Straw Hats' journey is a testament to friendship, courage, and the endless quest for dreams. Contact us to join our interest group! Contact Us Name Email Comment Thank you for contacting us! Submit

## Part A

>=992px E.g. 992px



<992px E.g. 991px



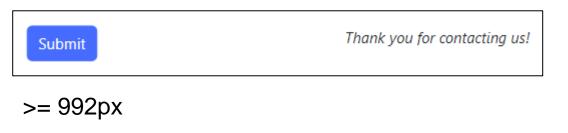
When the browser width is >= 992 px (lg breakpoint), ... div with id="desc" (the paragraph of text) and the div with id="image" (the image) should occupy 4 columns

Should be col-**lg**-4

# Parts B & C: "Thank you..." Before Submit button

Part B: When the browser width is >= 768 px (md breakpoint) but < 992 px (lg breakpoint), ... The "Thank you for contacting us!" text comes before the Submit button.

Part C: When the browser width is < 768 px (md breakpoint), ... The "Thank you for contacting us!" text still comes before the Submit button.





- 0 marks for rearranging the HTML elements without using Bootstrap class
- 0.5 marks correct order for md and sm
  - >=Ig button is not left of text XOR
  - Incorrect order <sm breakpoints</li>

# Part C.1

Part C: When the browser width is < 768 px (md breakpoint), ... menu items of "Home" and "About Us" are side-by-side and occupy 5 columns ... "Schedule" and "Contact Us" are side-by-side and occupy 5 columns ...

At 575px

One Piece Interest Group

Home About Us

Schedule Contact Us

At 767px

One Piece Interest Group

Home About Us

Schedule Contact Us

"Home", "About Us", "Schedule" and "Contact Us" <a href="div class="... col-5">div class="... col-5">div class="... col-5"</a>

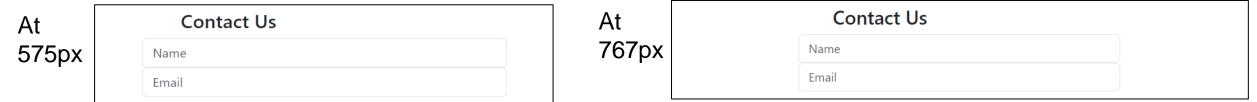
- 0.5 marks for **col-sm**-5
- Takes up whole width at <576px</li>

# Part C.2

Part C: When the browser width is < 768 px (md breakpoint), ...

Name field occupies 10 columns ...

Email field occupies 10 columns ...



"Name" and "Email" input fields: <div class="... col-10 ...">

- 0.5 marks for **col-sm**-10
- Takes up whole width at <576px</li>

0 mark for "col-lg-3 col-md-5"

 The above means, when less than md, takes up whole width (normal div), thus, not equal to 10 columns.



# Q3

# JavaScript DOM

# Q3 – Checking test script

- Steps to check Q3 marking
  - 1. Download and unzip <a href="q3-grade.zip">q3-grade.zip</a>
  - 2. Put your own q3.js into the unzipped folder (which uses a clean version of q3\_grade.html and q3 grade.css).
  - 3. In VS Code, open a terminal and run it via the command in the unzipped folder:

    i.e. \_\_\_/q3-grade>python .\grade\_q3.py
  - 4. If you wish to try out the suggested solution, change the file path to the javascript file to q3\_solution.js
- Note that any use of innerHTML is penalized by deducting 1 mark per use, but the penalty will not
  cause you to have negative marks i.e. the penalty will only deduct at most the number of marks you
  have.
- If your code causes the bulb to be turned OFF on the first click, and the rest of the behavior matches
  the desired output. your code will at most get half the allocated marks (correct behavior is for the bulb to
  be turned ON the first click).

offFirst = True

## Q3 – Sample output (based on suggested solution)

```
Created TensorFlow Lite XNNPACK delegate for CPU.
innerHTML was used 0 time(s) on the page.
Test 1 passed. Marks awarded for Part A: Fill color yellow = 1
Test 2 passed. Marks awarded for Part B: Toggle button disabled = 1
Test 3 passed. Marks awarded for Part C: Logs added correctly = 1
Test 4 passed. Marks awarded for Part D: Error message correctly shown = 0.5
Test 5 passed. Marks awarded for Part E1: Halving logs once works = 1
Test 6 passed. Marks awarded for Part E2: Last remaining log not removed with correct
error message = 1
Test 7 passed. Marks awarded for Part F: No error message = 0.5
Subtotal marks awarded = 6.0
Final total marks awarded (after taking into account innerHTML penalty, minimum 0)
= 6.0
Part A, Part B, Part C, Part D, Part E1, Part E2, Part F, innerHTML penalty, Q3 Total
1,1,1,0.5,1,1,0.5,0,6.0
Submitted by: Instructor or student name goes here
```



# **Q4**

# JavaScript Axios & JSON



# Q4-A :: Displaying # Bikes & # Docks (2 marks)

Part	Marks	Criteria
Α	2	Retrieving available # bikes & docks from the API. Display it in HTML.  -1 if the HTML formatting is different from the expected output -1 if missing any data-1 if the HTML formatting is different from the expected output -2 the entire webpage crashes



## **Q4-B**:: Displaying Dropdowns of Locations (1 mark)

Part	Marks	Criteria
В	1	Retrieving locations from the API. Display it in "Rent a Bike" dropdown and "Return a Bike" dropdown.  -0.5 if "Rent a Bike" dropdown is not populated correctly -0.5 if "Return a Bike" dropdown is not populated correctly -1 the entire webpage crashes



# Q4-C :: Button Clicks (1.5 marks)

Part	Marks	Criteria
	0.75	(Rent Bike button) -0.25 Upon successful bike rental, data is not updated (# bikes, # docks) at all <u>OR</u> updated data is not shown on the webpage automatically without the user reloading the webpage. If this feature works sometimes and doesn't work in other times, we conclude that your code works inconsistently and it will attract the said penalty0.25 Pressing "Rent Bike" button results in the drop-down menu showing duplicated locations. Each button click results in more duplicates added to the dropdown menu.
•		<ul> <li>-0.25 Upon successful bike rental, the alert "Bike rented successfully" is not shown.</li> <li>-0.75 if pressing the button results in the entire webpage crashing.</li> </ul>
С	0.75	(Return Bike button) -0.25 Upon successful bike return, data is not updated (# bikes, # docks) at all OR updated data is not shown on the webpage automatically without the user reloading the webpage. If this feature works sometimes and doesn't work in other times, we conclude that your code works inconsistently and it will attract the said penalty.
		-0.25 Pressing "Return Bike" button results in the drop-down menu showing duplicated locations. Each button click results in more duplicates added to the dropdown menu.
		<ul> <li>-0.25 Upon successful bike return, the alert "Bike returned successfully" is not shown.</li> <li>-0.75 if pressing the button results in the entire webpage crashing.</li> </ul>



# Q4-D :: Button Clicks (0.5 marks)

Part	Marks	Criteria
D	0.25	(Rent Bike button) When there are no available bikes at a selected station and the user tries to rent a bike at that station, an alert box with the message "Error renting bike" should appear.  -0.125 If the alert appears but with the wrong message, e.g. "Error returning bike"0.25 if pressing the button results in the entire webpage crashing.
	0.25	<ul> <li>(Return Bike button)</li> <li>When there are no available docks at a selected station and the user tries to return a bike at that station, an alert box with the message "Error returning bike" should appear.</li> <li>-0.125 If the alert appears but with the wrong message, e.g. "Error renting bike".</li> <li>-0.25 if pressing the button results in the entire webpage crashing.</li> </ul>

SMU Classification: Restricted

## **City Bike Share**

#### Silverline Station

Available Docks: 2

### **Greenfield Depot Station**

Available Docks: 10

#### **Blue Horizon Station**

Available Docks: 8

### Showing only partial data

(e.g. In this case, **Available Bikes** data is not shown).

(This is incorrect – and penalty will apply)

## **City Bike Share**

#### Silverline Station

Available Bikes: 15

Available Docks: 0

#### **Greenfield Depot Station**

Available Bikes: 5

Available Docks: 10

#### **Blue Horizon Station**

Available Bikes: 7

Available Docks: 8

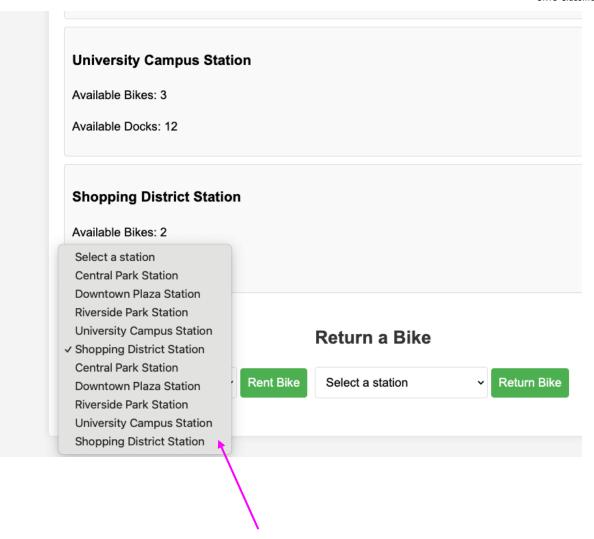
#### Maplewood Station

SMU Classification: Restricted

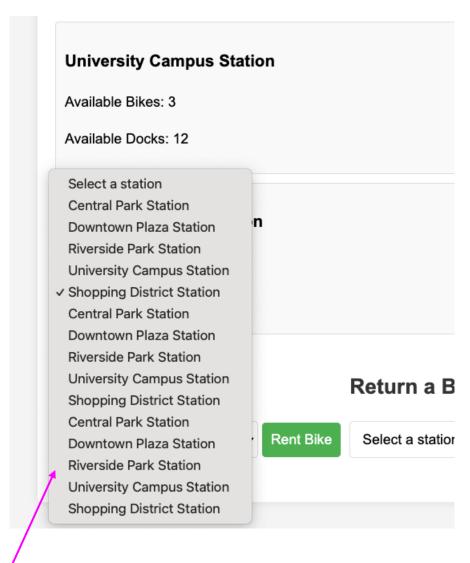
#### Incorrect HTML

(data is not shown using the correct HTML elements)

(This is incorrect – and penalty will apply)



Upon clicking on the **Rent Bike** button, this **dropdown menu** has **duplicated locations**. (This is incorrect – and penalty will apply)



Subsequently, pressing the **Rent Bike** button one more time results in **even more duplicated locations**populated in the dropdown menu.
(This is incorrect – and penalty will apply)