IMY 220
Practical 4:
ES6

Due: Friday 4 September @ 14:00

The submission instructions are available on ClickUP. Any deviation from these instructions will cause a 10% deduction from your mark.
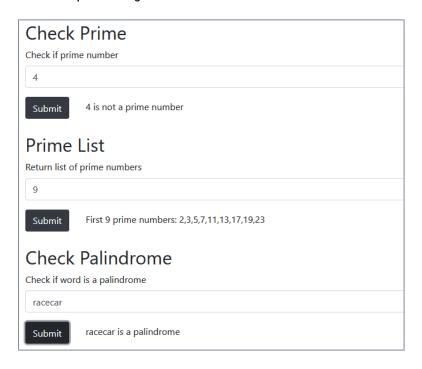
Instructions

- For this practical, you will need to update the JavaScript from last week to use ES6 as well as add another function.
- Download *index.html* and *script.js* from ClickUP. These files contain the functionality for last week's practical. You are not allowed to edit index.html, except for putting your name and surname in the "author" meta tag. All your code for this practical must be written inside *script.js*.

Section 1: ES6

Rewrite all the code inside script.js to use recommended ES6 syntax. This includes:

- Using an ES6 class to define *PrimeChecker*
- Using arrow functions
- Using appropriate variable declarations, i.e. changing it from the *var* keyword

Furthermore, you must redefine how the functionality is printed on the page. Each result must be printed in a descriptive string which must look as follows:

Check Prime
Check if prime number

| 4 |

[Submit]   4 is not a prime number

Prime List
Return list of prime numbers

| 9 |

[Submit]   First 9 prime numbers: 2,3,5,7,11,13,17,19,23

Check Palindrome
Check if word is a palindrome

| racecar |

[Submit]   racecar is a palindrome

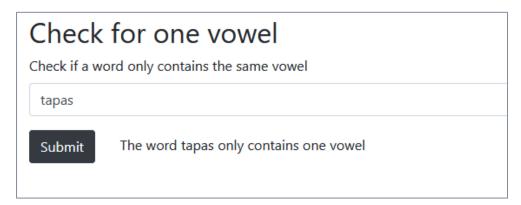Note that you must print the results to the page using ES6 template strings.

Section 2: Single vowel checker

Using the array of vowels provided inside script.js, write a function called *checkSameVowel* that checks whether a word contains only a single vowel, which may appear more than once in the word. For example, the word "ensemble" only contains one vowel ("e") while the word "different" contain two vowels ("i" and "e"). Therefore, the first word would return true and the second would return false.

HINT: the Array.includes() function returns true if an array contains one/more of an element.

You must use the *Array.reduce* function to check for this. However, if you are unable to complete this functionality using *Array.reduce*, you should use another method, as this would earn you more marks than using *Array.reduce* without any working functionality.

This section must also be done with ES6 syntax where appropriate and must also be printed to the page in a descriptive string, for example:

Additional Information

- Refer to the slides as well as MDN website (https://developer.mozilla.org/en-US/) for help

Submit only the following file(s) according to the submission instructions.

- *index.html*
- *script.js*