Exercise 9

1. Please develop a logo show page based on "ex-9-1-partial.html":
   - Show icons of six famous IT companies ("microsoft", "google", "yahoo", "facebook", "amazon", and "apple") in random orders and random coordinates (both X and Y should be larger than 100px and smaller than 400px).
   - Shuffle these icons in random orders and random coordinates every 2 seconds (每 2 秒刷新畫面一次).
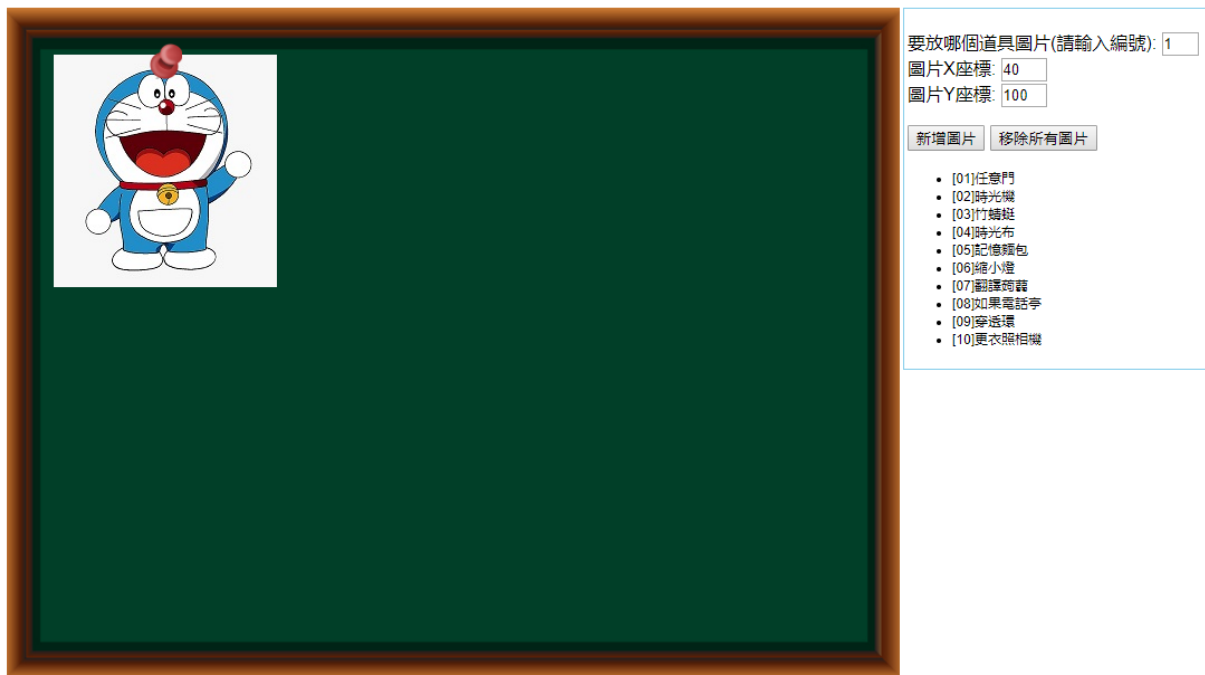
Initial view:

After two seconds:

Hints:

- The image file names can be stored in an array.
- Please resize the images appropriately. (請記得調整一下圖片大小，讓幾張圖的大小均衡)
- Please set the "absolute" position (top and left) for all pictures.
- Please update the page periodically by using "setInterval()".

2. Please develop a webpage to let a user pin (釘) the pictures of Doraemon accessories to the blackboard.

- Please refer to ex-9-2-partial.html to obtain the initial UI. Notice that a pin (大頭針) is shown atop each picture. (We have images of three kinds of pins: blue.png, red.png, and yellow.png)

- The user can select the picture number, input the coordinates of X and Y, and click the button "新增圖片." A corresponding picture will appear on the blackboard. A random pin will be shown atop the picture (亂數決定大頭針的顏色，並顯示於圖片上層). Note that a newly added picture should be displayed in front of old pictures. The accessory pictures should be resized to 200*200.

- When the user clicks the button "移除所有圖片," all pictures should be removed.

Advanced:

- When the user closes the *browser* and reopens, all posted pictures are still shown on the blackboard. (請留意移除所有圖片也要從本地端儲存中移除)

Bonus:

- The picture can be dragged and dropped (拖放功能) within the scope of the blackboard. The new coordinates will be updated to the local storage.

Hints:

- Be sure to understand the current HTML and CSS before coding JavaScript.
- Please use "z-index" appropriately.
- Please observe the relative position of the pin and the picture, and design the rules to set the coordinates of the pin every time an image is added.
- Drag and drop: https://www.w3schools.com/html/html5_draganddrop.asp.