

CodeFun

Objective

To design an online coding platform. A platform with predefined questions set. The user is allowed to code in the terminal provided on the website and can compile his code. Inbuilt test cases are built to validate his code and marks are awarded accordingly. A set of four questions are to be designed and validated.

Design

The website is designed using responsive HTML , javascript , jQuery , css and bootstrap.

The template of the website is to follow a login/registration page with basic validation, followed by a landing page that provides you access to view and track your progress, and a list of coding questions available to solve.

Login/Registration Page

The page introduces you to the coding platform Codefun. It highlights a login page with username and password input boxes. Bootstrap along with CSS has been used to achieve the look and feel of the page. Validation has been added to the username input , where we validate if the given input is of a form of an email or not. We use regular expressions to achieve this. The page also highlights a slideshow of images. Javascript has been written to automate the sequences of images. The images transition at a period interval of 3.5 seconds. Validation has been added for the password . The password must contain atleast 6 character where the first character is capital and it has atleast one number.

Test cases:

Username: suvanika@gmail.com

Password:1234

Failed

Username: raghul.com

Password:S123

Failed

Username:raghul@ml.com

Password:Sabhj123

Passed

Progress Page

The progress page is an option on the navbar. It highlights points you've scored in the given areas:

- 1)Data Structures
- 2).Analytical thinking
- 3).Algorithms
- 4).Problem Solving

The points are to be awarded based on scores we evaluate from the code submission which is to be implemented in the future. We also feature a completion progress bar that is an estimate of how far one has progressed since the start of their time in codefun. Javascript has been written for the chart with hard coded values and for the progress bar.

Signup Page

The sign up page provides input boxes for username , email id and password. The username should not be null. We provide validation for email and password. The password is has to have atleast 6 characters , a capital letter , special symbols or numbers.

Test cases :

Username: null
Email :@.com
Password:asdsf
Retype:asdf
Failed

Username: Raghul
Email :ml@g.com
Password:asdsf
Retype:asdf
Failed

Username: Raghul
Email :ml@.com
Password:Asdsf123
Retype:Asdf123
Passed.