TEST APPROACH FOR BUGGY CARS RATING WEBSITE

This document outlines the test approach for testing the Buggy Cars Rating website. The examples mentioned below are all my findings and observations gathered while testing the website. This document is just a reference to what was tested, it does not cover all the scenarios. Please feel free to reach out to me if you need more information

Website to Test: Buggy Cars Rating URL: https://buggy.justtestit.org/

Test Approach: The test approach for this website has been divided into 6 phases as listed below.

- 1. Functional Testing
- 2. Usability Testing
- 3. Cross Browser Testing
- 4. Security Testing
- 5. Performance Testing
- 6. Automation Testing

Functional Testing:

The coverage for functional testing of Buggy Cars Rating website includes

- The input fields and validations of the data types for all fields on Registration page
- The input fields and validations of the data types for all fields of Login functionality
- The input fields and validations of the data types for all fields on Profile page
- The input fields and validations of the data types for voting feature on car model page
- Successful User Registration
- Unsuccessful User Registration
- Successful Login
- Unsuccessful Login
- Ability to add a vote with and without adding comments
- View, change password, add, modify and save information on profile page
- Logout

Usability Testing

The coverage for Usability testing of Buggy Cars Rating website

- Navigations Example: clicking the overall rating image takes me to the URL of overall rating page with URL - https://buggy.justtestit.org/overall
- Pages and Information on pages loads Example Make, Rank, Votes, Comment tables loading on list of all ratings pages
- Button clicks Example: clicking cancel on registration page takes me back to the home page of the website whereas clicking logout does not.
- Message Prompts to user Example: The password field on registration page displays exception as a message and does not specify the expected length but if I do not fill login or password and try signing in then appropriate message is displayed
- Images Example the Lancia car model image is broken on chrome browser and does nothing when clicked, other images are clickable
- Links Example Make, Model are clickable and redirect the user to the specific make/model's information page, view more link in the tables on overall rating page navigates the user to comments page
- Pages- Example Overall rating has 5 pages of data and the user is able to navigate between pages

Cross Browser Testing

To cater to the different browser preferences of users I have tested Buggy Cars Rating website on Chrome, Firefox and Safari

Chrome(v90): I was able to carry out overall testing on chrome with minor issues across image loading in tables

Safari (v14.1): The website does not perform well on Safari – Example: On Clicking on the popular model and overall listing images the spinner keeps spinning and page is not loaded which means user is unable to view ratings or cast vote. Clicking the

Firefox(v88): The website has similar page rendering issues as on safari.

Security Testing

For Security testing the focus the areas focused on are listed below:

• Authentication – Any users not registered must not be able to login

- SQL injection This is used by attackers to steal information, Example entering "1=1"
 a condition which is always true in the login or password field should not return user
 login details
- Exposure of any sensitive information Any exposure of user related information in the source code: Example - View page source should not expose any user related information, for Buggy Cars Rating any information from registration page or profile page of user like Gender, Age, Phone, login details firstname, lastname or username should not be exposed
- Session Management Example: When a user opens the website in 2 different tabs and logs out of one, the user session should expire in another tab and user should automatically get logged out of another tab. This issue is present in Buggy Cars Rating. Session does not expire, if a user does not logout, then the session remains active.

Performance Testing

The performance testing for Buggy Cars Rating covers the time each page takes to load, further testing if needed will require tools like JMeter or Gatling.

Below statistics are observations on the chrome browser v90

- Home page takes 109ms to load
- Overall ratings page took 615ms to load
- Popular Make page took 539ms to load
- Popular Model page took 534ms to load
- Profile Page takes 162ms to load
- Overall ratings page took 615ms to load
- Takes 30ms to logout

Automation:

Some of the critical functionalities that are mandatory for user acceptance testing of the website and will need to be covered every time as a part of regression when new changes are released have been automated using Selenium-Java-Cucumber framework

Please refer the below Github repository to check out the test automation for Buggy Car Rating

Link: https://github.com/Deepika-QA/BuggyCarRatingTestAutomation
For more information feel free to reach out on deeps3m@gmail.com

Bugs encountered during this testing are shared in a separate document and linked in the same repository