

LIBRARIES, TOOLS & WORKFLOW CRN-15081-202401

50% 0 0 0

Exercise #5: Browser automation and report generation via GitHub Actions

0 0 0

Instructions

Follow-up Discussion

Having a "no auto@ random@run@7B" turns out the issue had to do with the fact that the latest version of Ubuntu on GitHub Actions "Ubuntu@latest" (currently Ubuntu version 22.04 and 24.04) is incompatible with our work. This can be solved by updating your "YAML" file to use "ubuntu@22.04" via <https://github.com/derailed/devs3025-43/commit/44293c7793272a0f85a0f409b3b0b0c749a0d>

**Challenge**

Using the provided GitHub repo as a starting point, experiment with 1) browser automation with Puppeteer and Lighthouse and 2) GitHub Actions pipeline with a brand new workflow file.

**Sample submission**

<https://github.com/derailed/devs3025-43>

**Tutorial recordings**

<https://youtu.be/dB7D5C7MnIQ>

**Scenarios**

"Our website repo is complete and set to deploy automatically, but it would be great to generate a Google Lighthouse report each time somebody pushes a commit. Do you think you can handle that with a new GitHub Actions workflow?"

**Preparation**

- Starting point: <https://github.com/derailed/devs3025-43-example>
- Google Puppeteer: <https://pptr.dev/>
- Google Lighthouse: <https://github.com/GoogleChrome/lighthouse/blob/master/docs/running-the-command-line.md>
- CloudPT Puppeteer: <https://puppeteer.github.io/puppeteer/>
- Prerequisite: Write a GitHub Actions workflow that can manually trigger a 1) fetch repo content, 2) run report 1, 3) run website analysis, and 4) archive the artifacts.
- Prerequisite: Make it run automatically when another workflow is completed?

**Deliverables**

- Repository: Public URL of the GitHub repository
- Repository: Accompanying discussion (approximately 50 to 100 words) detailing your experience: what was challenging? what did you find fascinating? where else would you apply these techniques?

**Evaluation**

5% assigned per valid submission

This exercise is designed for open-ended exploration and experimentation, but will be subject to potential penalty based on submission timing, presence of accompanying discussion, and quality of submitted entry.

**Due date**

October 29, 2024 at 11:59PM  
(10% penalty of 20% equivalent to 0.5% of the final grade, for late submission)

Submissions

Oct 15, 2024 2:13 PM

Public URL of the GitHub repository:

<https://github.com/derailed/devs3025-43>

<https://github.com/derailed/devs3025-43>

<https://github.com/derailed/devs3025-43>

<https://github.com/derailed/devs3025-43>

**What was challenging?**

Installed wrong version of @lighthouse and there was dependency error. Had to update Lighthouse to higher version and it worked.

**What did you find fascinating?**

Using YML for automating tasks that are repetitive by nature and have to be run in presence or absence of a person.

**Where else would you apply these techniques?**

When automating tasks that run on its own and generated reports and attach it before sending it off to the inspection of whatever via the specific task of that date.

Text Submission

Browser 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18 19 20 21 22 23 24 25 26 27 28 29 30 31 32

Submit

Feedback

Great work!

See feedback Tuesday, October 29, 2024 2:28 PM EDT

5 / 5 100 %

Activity Detail

✓ Valid Demo: You have completed the assignment

Submitted

🔒 No other IP or ID info

5 / 5 100 %

Last Validated Oct 15, 2024 2:25 PM

https://learn.georgebrown.ca/d2l/le/content/279143/viewContent/9308632/View

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