Live Docker Containers

This is the questionnaire for the Live Docker Containers User Study. Fill this questionnaire according to the instructions provided.

Demographic Information

1. Gender *

   Mark only one oval.

   ◯ Female

   ◯ Male

   ◯ Prefer not to say

   ◯ Other: _____

2. Age *

   _____

3. What is the highest degree or level of education you have completed? *

   Mark only one oval.

   ◯ High School

   ◯ Bachelor's degree

   ◯ Master's degree

   ◯ Doctoral degree

Skills and Experience

4. At this point in time I am comfortable working with... *

Mark only one oval per row.

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
...Docker technologies.	◯	◯	◯	◯	◯
...Dockerfiles.	◯	◯	◯	◯	◯
...Visual Studio Code.	◯	◯	◯	◯	◯
...Visual Studio Code to edit Dockerfiles.	◯	◯	◯	◯	◯
...linters.	◯	◯	◯	◯	◯
...syntax highlighters.	◯	◯	◯	◯	◯
...Unix operating systems.	◯	◯	◯	◯	◯
...Javascript and NodeJS.	◯	◯	◯	◯	◯
...Python.	◯	◯	◯	◯	◯

Until now, approximately in how many projects have you ...

5. ... worked on that had a Dockerfile? *

_____

6. ... used Dockerfiles created by others (colleagues or third parties)? *

_____

7. ... created/updated a Dockerfile? *

_____

8. In the Dockerfiles I've developed, I've specified...

Tick all that apply.

- [ ] ... arguments/variables (ARG instruction).
- [ ] ... volumes (VOLUME instruction).
- [ ] ... the user (USER instruction).
- [ ] ... the working directory (WORKDIR instruction).
- [ ] ... environment variables (ENV instruction).

9. I have a good enough understanding of English so that I can confidently answer this survey and understand sentences with Docker and Unix related terms. *

1- Strongly Disagree / 2- Disagree / 3- Neutral / 4- Agree / 5- Strongly Agree

Mark only one oval.

	1	2	3	4	5	
Strongly Disagree	◯	◯	◯	◯	◯	Strongly Agree

DF1

Instructions for this task are available in the provided document.

Fill this section after finishing the task.

10. It was simple to understand the objective of the task and the task's instructions. *

1- Strongly Disagree / 2- Disagree / 3- Neutral / 4- Agree / 5- Strongly Agree

Mark only one oval.

	1	2	3	4	5	
Strongly Disagree	◯	◯	◯	◯	◯	Strongly Agree

11. Which of these features did you use to solve this task? (If you don't remember the name of a specific feature, the instructions document contains a list with all the features using the same names.) *

Tick all that apply.

☐ Static Analysis Errors
☐ Docker Management
☐ Image Build and Container Runtime Errors
☐ Changes to environment variables
☐ Processes running in the container
☐ Container performance statistics
☐ Open shell inside container
☐ Base image OS information
☐ Layer Size and Build Time
☐ Explore each layer's filesystem
☐ Service discovery
☐ Container log output
☐ None
Other: ☐ _____

DF2

Instructions for this task are available in the provided document.

Fill this section after finishing the task.

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12. It was simple to understand the objective of the task and the task's instructions. *
1- Strongly Disagree / 2- Disagree / 3- Neutral / 4- Agree / 5- Strongly Agree

Mark only one oval.

	1	2	3	4	5	
Strongly Disagree	○	○	○	○	○	Strongly Agree

13. Which of these features did you use to solve this task? (If you don't remember the name of a specific feature, the instructions document contains a list with all the features using the same names.) *

Tick all that apply.

- [ ] Static Analysis Errors
- [ ] Docker Management
- [ ] Image Build and Container Runtime Errors
- [ ] Changes to environment variables
- [ ] Processes running in the container
- [ ] Container performance statistics
- [ ] Open shell inside container
- [ ] Base image OS information
- [ ] Layer Size and Build Time
- [ ] Explore each layer's filesystem
- [ ] Service discovery
- [ ] Container log output
- [ ] None
- Other: [ ] _____

DF3

Instructions for this task are available in the provided document.

Fill this section after finishing the task.

14. It was simple to understand the objective of the task and the task's instructions. *
    1- Strongly Disagree / 2- Disagree / 3- Neutral / 4- Agree / 5- Strongly Agree

Mark only one oval.

	1	2	3	4	5	
Strongly Disagree	○	○	○	○	○	Strongly Agree

15. Which of these features did you use to solve this task? (If you don't remember the name of a specific feature, the instructions document contains a list with all the features using the same names.) *

Tick all that apply.

- [ ] Static Analysis Errors
- [ ] Docker Management
- [ ] Image Build and Container Runtime Errors
- [ ] Changes to environment variables
- [ ] Processes running in the container
- [ ] Container performance statistics
- [ ] Open shell inside container
- [ ] Base image OS information
- [ ] Layer Size and Build Time
- [ ] Explore each layer's filesystem
- [ ] Service discovery
- [ ] Container log output
- [ ] None

Other: [ ] _____

After tasks

Fill this section after finishing all the tasks.

16. Select your opinion towards the following sentences: *

Mark only one oval per row.

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
It was easy working with the remote desktop environment.	○	○	○	○	○
Having feedback displayed in the IDE (instead of, for example, in an external tool) helped me solve the tasks more quickly.	○	○	○	○	○
I found it easy to get all the information I needed to solve the tasks without leaving the IDE.	○	○	○	○	○
The feedback provided inside the IDE made it easier to solve the designated tasks.	○	○	○	○	○

17. I felt overwhelmed by...

Mark only one oval per row.

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
...the quantity of information displayed inside VSCode.	○	○	○	○	○
...the way the information was displayed inside VSCode.	○	○	○	○	○

18. During the execution of the tasks, the feedback provided in the IDE helped me... *

Mark only one oval per row.

	Strongly Disagree	Disagree	Neutral	Agree	Strongly Agree
...finding out what parent image is the most suitable.	○	○	○	○	○
...finding out what are the dependencies of the system that must be added to the docker image.	○	○	○	○	○
...finding out what are the Dockerfile commands that I need.	○	○	○	○	○
...trying to understand if the resulting container is working as intended (e.g., running commands and tests on the container).	○	○	○	○	○
...trying to understand why the resulting container is not working as intended.	○	○	○	○	○
...finding out which commands are responsible for the container misbehaviour.	○	○	○	○	○
...rebuilding the image and re-running the container to confirm that it is working as intended.	○	○	○	○	○

19. Which features do you feel were the most useful? And why?

_____

_____

_____

_____

20. What problems did you run into while working with this level of feedback?

_____

_____

_____

_____

_____

21. How would you improve this level of feedback?

_____

_____

_____

_____

Google Forms