Exercise 7

1

Use the pipeline from last week to build a container that has the "calculator program" jar file.

The pipeline must trigger when a new PR is created at a minimum (it can trigger on other operations). You can use polling rather than webhooks to trigger the pipeline.

As in last week, the pipeline should work with 3 branches (feature, master, and playground).

- The playground branch runs no tests.
- The master branch runs all tests.
- The feature branch runs all tests except CodeCoverage.

A container should be created in some cases

- **only** if the build succeeds.
- **never** for the "playground" branch.

The container's name is repository/image:version. Naming depends on the branch.

- release: image name is "calculator"
- feature: image name is "calculator-feature"
- release: version is 1.0
- feature: version is 0.1

Submit

- Description of your experiment and any problems you ran into. How did you test it?
- A copy of your pipeline.
- Console output of your job for 3 cases
    - the master branch
    - feature branch
    - playground branch

2

In your own words, explain why containers are useful for packaging software. There are many benefits, but some downsides. Give 3 pros and 3 cons to the technology.

3

We are using a public repository. We could have used a private one and set that up in kubernetes. What would be the necessary steps to build a private repository in our kubernetes setup? If you were an organization, what would be the pros and cons of a private vs a public repository?