

Day 43

* Read testing library :

A well-designed suite of automation tests is particularly effective in allowing us to discover defects or bugs before delivery to the client.

- Testing is important for guaranteeing the quality of the software we develop.

- Testing reduces the number of user complaints and can ultimately save an organization time and money.

Testing - Discover bugs
Ensure software quality
Save time and money

Best practices

- Avoid including implementation details
- Work with DOM nodes
- Resemble software usage
- Maintainability

Tools for tests

- 1) Jest

- 2) React testing library

Jest - javascript test runner

- Provide access to jsdom

Jest provides - Good iteration speed
Powerful feature making

Mocking refers to something made as an imitation that enables us to replace complex function from code with others that are simple and simulate the same behavior.

Mocking features can be used to make sure that unit testing is standalone.

2) React testing library

- Set of utilities
- Fulfills testing best practices.

```
import { render, screen } from "@testing-library/react"
```

Step 1 - render the app component in the artificial DOM environment.

Step 2 - Use the screen object to create a query against document.body

Continuous integration:-

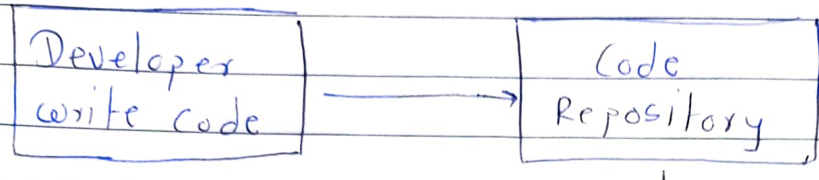
Continuous integration (CI) is a software development technique in which developers use a version control system like Git and push code changes daily, multiple times a day.

Benefits of CI

- 1) Improved developer productivity
- 2) Deliver working software more often
- 3) Find bugs earlier and fix them faster.

CI pipeline

continuous Delivery



continuous integration

