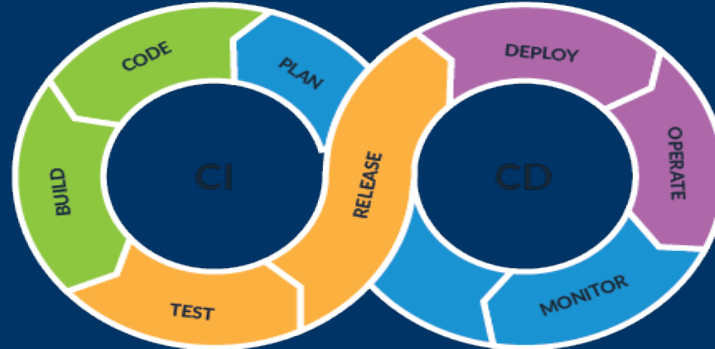# Udapeople - CI/CD to Achieve, Build, and Deploy Automation for Cloud-Based Products

Carlos

What is Continuous Integration/ Continous Deployment?
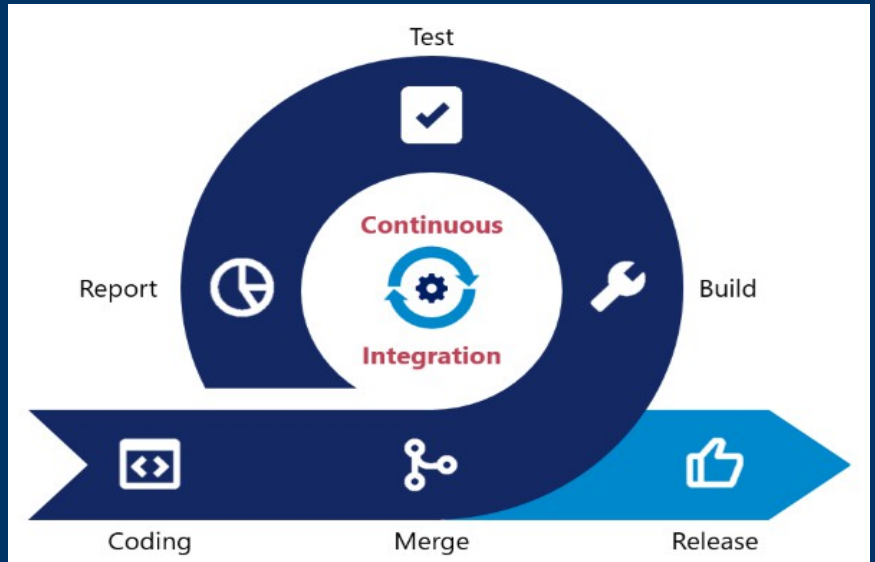
- With the continuous method of software development, you continuously build, test, and deploy iterative code changes[1]

- CI/CD strive to have less human intervention, from the development of new code until its deployment[1]

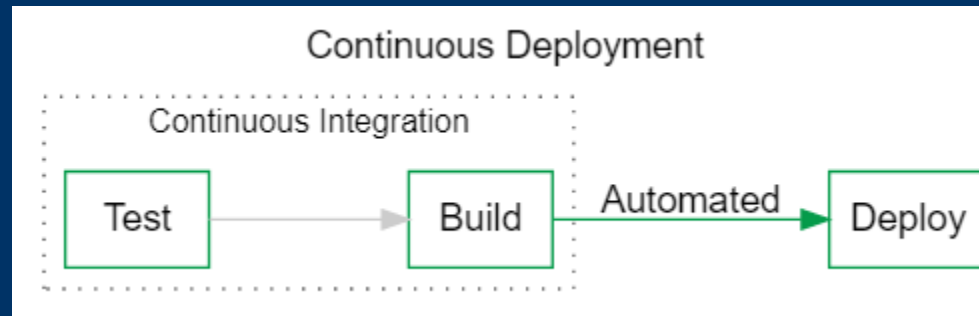1. https://docs.gitlab.com/ee/ci/introduction/

Continuous Integration

- Automates the changes we make to our code repositories such as:

  - Building

  - Testing

  - Merging

  - Reports

- Increases high quality code

- Increases release time

- Less coding bugs

- Catch bugs in test by continually running them

Continous Deployment

- Automates the deploy to beta/production environment

- Decreases deployment bugs

- Automates server scaling

- Faster deployments

Continuous Deployment

Continuous Integration

Test → Build — Automated → Deploy

Benefits

- Lower costs

- Reduce product delivery time

- Reduce bugs in our products

- Reduce labor work for on-premise servers

- AutoScaling servers

- Developers can focus on developing, therefore increase productivity