**AWS CICD**

CodeCommit, CodePipeline, CodeBuild, CodeDeploy…

Why we need CICD ?

When I pushed my code in S3 bucket or github and I want it to automate in a right way . Making sure it’s tested before being deployed . With possibility to go into different stages (dev, test, staging, prod). With manual approval where needed. **To be a proper AWS developer… we need to learn AWS CICD.**

**Continuous Integration (CI):**

Developers frequently upload their code to a code repository, such as GitHub or an S3 bucket.

Upon code submission, a testing or build server promptly examines the code (e.g., using CodeBuild).

The developer receives feedback regarding the tests and checks that have been successful or unsuccessful.

A diagram of a software development process

Description automatically generated

**Continuous Deployment (CD):**

Guarantees the software's ability to be released consistently whenever required.

Ensures frequent and rapid deployments.

Transitioning from a quarterly release schedule to a frequency of five releases per day.

Typically, this involves automated deployment mechanisms, such as CodeDeploy.

A diagram of a computer server

Description automatically generated

**AWS Codepipeline :**

**A diagram of a tool and test

Description automatically generated with medium confidence**

**Workflow of CICD :**

Source : S3, Github.

Build : CodeBuild,Jenkins.

Test : CodeBuild.

Deploy : Codedeploy, ECS, Cloudformation, Elastic Beanstalk.

**Build → Test → Deploy → Load Testing 🡺 Example**