

Task #11 – CI/CD tools

What to read/watch beforehand

- CodeCommit
 - [\[AWS docs\] What is CodeCommit](#)
 - [\[AWS docs\] Setting up for CodeCommit](#) (choose your preferred option)
 - [\[AWS docs\] Migrating from Git to CodeCommit](#)
- CodeBuild
 - [\[AWS docs\] What is CodeBuild](#)
 - [\[AWS docs\] Creating a CodeBuild](#)
- CodeDeploy
 - [\[AWS docs\] What is CodeDeploy](#)
 - [\[AWS docs\] Creating a role for CodeDeploy](#)
 - [\[AWS docs\] Creating an automated deployment for Lambda](#)
 - [\[AWS docs\] CodeDeploy app spec file](#)
 - [\[AWS docs\] CodeDeploy integrations](#)
- CodePipeline
 - [\[AWS docs\] What is CodePipeline](#)
 - [\[AWS docs\] CodePipeline integrations](#)
 - [\[AWS docs\] Tutorial: CodePipeline with S3](#)
 - [\[AWS docs\] Tutorial: CodePipeline with CodeCommit](#)

What's given

- your AWS account
- the image management application from module 9
- the SNS/SQS resources from module 8
- the S3 image bucket from module 3

Demo tips

- It might take some time to make a commit and wait for the CodePipeline to fully complete. So, to reduce the demo duration, it's recommended to:
 - make a commit and deploy the Lambda before the demo
 - demonstrate that the commit and the active Lambda deployment are mentioned in the most recent CodePipeline execution

What to save money on

- In case you're not planning to experiment with your AWS resources after the demo, remove your S3 bucket, VPC, SNS topic, SQS queue, RDS instance, Lambda function(s), CodeCommit repo, CodeBuild resources, CodeDeploy resources, CodePipeline pipeline.

What answers to know

1. How to set up different deployment strategies (blue-green, canary) via the AWS CodeDeploy?

2. What is application, revision, deployment, deployment configuration, and deployment group in terms of AWS CodeDeploy?
3. What is stage, action and transition in CodePipeline?
4. What is pricing for the AWS CodeCommit/AWS CodeDeploy/AWS CodePipeline services?
5. What is CI?
6. What is CD (delivery)?
7. What is CD (deployment)?
8. What CodePipeline best practices do you know?
9. How easy is it to migrate from more traditional services like GitHub/GitLab onto CodeCommit?
10. How would you compare CodeCommit to Git?
11. What are the key elements of an app spec in CodeDeploy?
12. What are the key elements of a build spec in CodeBuild?
13. What AWS services may aid CodeBuild execution?
14. What 3rd party tools and other AWS services may participate CodePipeline execution?