

STUDENT VERSION (Week-12)



CLARUSWAY
WAY TO REINVENT YOURSELF

Meeting Agenda

- ▶ Icebreaking
- ▶ Questions
- ▶ Interview/Certification Questions
- ▶ Coding Challenge
- ▶ Video of the week
- ▶ Retro meeting
- ▶ Case study / project

Teamwork Schedule

Ice-breaking

10m

- Personal Questions (Stay at home & Corona, Study Environment, Kids etc.)
- Any challenges (Classes, Coding, AWS, studying, etc.)
- Ask how they're studying, give personal advice.
- Remind that practice makes perfect.

Team work

10m

- Ask what exactly each student does for the team, if they know each other, if they care for each other, if they follow and talk with each other etc.

Ask Questions

15m

1. How can we rename a branch ?

- A. `git branch -m current-branch-name new-branch-name`
- B. `git branch checkout current-branch-name new-branch-name`
- C. `git checkout -b current-branch-name new-branch-name`
- D. `git clone current-branch-name new-branch-name`

2. Which of the following has highest priority for Ansible configuration settings?

- A. `ansible.cfg` (in the current directory)
- B. `.ansible.cfg` (in the home directory)

C. `ANSIBLE_CONFIG` (an environment variable)

- D. `/etc/ansible/ansible.cfg`

Configuration settings

Configuration settings include both values from the `ansible.cfg` file and environment variables. Within this category, values set in configuration files have lower precedence. Ansible uses the first `ansible.cfg` file it finds, ignoring all others. Ansible searches for `ansible.cfg` in these locations in order:

`ANSIBLE_CONFIG` (environment variable if set)
`ansible.cfg` (in the current directory)
`~/.ansible.cfg` (in the home directory)
`/etc/ansible/ansible.cfg`

3. The command to create Kubernetes service is _____.

- A. `kubectl expose`
- B. `kubectl set service`
- C. `kubectl run`
- D. `kubectl deploy`

4. Can we run Junits as a part of Jenkins job?

- A. True**
- B. False

5. Which command is used to create a new deployment in kubernetes?

- A. `kubernetes set deployment`
- B. `kubernetes get deployment`
- C. `kubectl run`**
- D. `kubectl deploy`

Interview/Certification Questions**20m**

1. A company requires an open-source system for automating the deployment, scaling, and management of containerized applications. Which of the following would be ideal for such a requirement?

- A. Use the Amazon Elastic Container Service for Kubernetes.**
- B. Install a custom orchestration tool on EC2 Instances.
- C. Use SQS to orchestrate the messages between docker containers.
- D. Use AWS Lambda functions to embed the logic for container orchestration.

2. Your company has a legacy application that uses the monolithic architecture. You need to design a new microservices architecture for the application and host it in AWS. The application should be dockerized so that it can be easily deployed.

Which of the following AWS services would you choose to host the application?

- A. Elastic Kubernetes Engine
- B. Amazon Lambda
- C. Elastic Container Registry
- D. Elastic Container Service**

3. You have launched an ECS cluster with 5 EC2 instances with its task definitions. However, ECS is not getting any status information back from the container agent in each ECS instance. What could be the reason? (choose 3 options)

- A. IAM role used to run ECS instance does not have `ecs:Poll` action in its policy**
- B. Key-pair information is missing in ECS cluster.
- C. ECS Instance security groups' outbound rules are not allowing traffic to ECS service endpoint**
- D. Interface VPC endpoint is not configured for ECS service.**
- E. You are running ECS on t2.micro instance type which is not supported.

4. What is a pod in Kubernetes?

A pod is the smallest execution unit in Kubernetes. ... Pods are ephemeral by nature, if a pod (or the node it executes on) fails, Kubernetes can automatically create a new replica of that pod to continue operations. Pods include one or more containers (such as Docker containers).

5. Do all of the nodes have to be at the same size in your cluster? (kubernetes)

Video of the Week

5m

- [A Guide to the DevOps Technical Interview](#)

Retro Meeting on a personal and team level

10m

Ask the questions below:

- What went well?
- What could be improved?
- What will we commit to do better in the next week?

Coding Challenge

5m

- [Vote Count](#)

We assume that each group has two sub teams. Each week, one of the sub-teams will present their solution.

Case study/Project

10m

Case study should be explained to the students during the weekly meeting and has to be completed in one Sprint (2 weeks) by the students. Students should work in small teams to complete the case study.

- [Project-203 : Microservice Architecture for Phonebook Web Application \(Python Flask\) with MySQL using Kubernetes.](#)

Closing

5m

-Next week's plan

-QA Session