Devops

Code Repository – **Git** 🡪 build using **Maven** 🡪 Then test using **Junit** 🡪 then check the code quality using **Sonarqube** 🡪 then the Artifact is ready in **Nexus** 🡪 then need to configure the code changes using **Ansible/Chef/Puppet** 🡪 then continuous delivery 🡪 and manually deploy the code changes in Production ready environment using **Kubernetes Cluster**.

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Once code is deployed in to Production then we need to operate and monitor.

So we can monitor using **Graffana/Nagios/Splunk** etc.

**Graffanna** is configured with cloud watch in AWS to monitor AW resources.

**Splunk** is used to monitor Applications like JVM is running or not.

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**Docker** 🡪 Using Docker we can orchestrates than docker into Kubernetes cluster.

**Kubernetes**🡪 it is used to orchestrates docker containers.

**Git** 🡪 To create a CI/CD pipeline in Devops we need one VCS/SCM tool. So VCS stands for Version control System and SCM stands for Source code management.

Again VCS is divided into two categories.

1. Centralized VCS
2. Distributed VCS.

So GIT is one of the popular Distributed VCS now a days.

Maven 🡪 using Maven we can build the code and all the files and components will be stored in Nexus tool.

**Junit**🡪 using Junit we can test the code

**Sonarqube**🡪 it used to check the quality of code.

**Nexus** 🡪 it used to store the Artifact.

**Ansible/Chef/Puppet** 🡪 need to configure the code changes using these tools.