**Docker /Ansible /RDS assignments:**

**Deploy index.html on three containers from 3 different branch**

**pipeline{**

**agent{**

**label "qa"**

**}**

**tools {**

**git "Default"**

**dockerTool "docker"**

**}**

**stages{**

**stage("stage0"){**

**steps{ sh "rm -rf \*"**

**}**

**}**

**stage("stage1"){**

**steps{**

**git branch:'Q1-2024' , url:'https://github.com/dhan1411/new.git'**

**sh "docker run -dp 80:80 --name test httpd”**

**sh "docker cp index.html test:/usr/local/apache2/htdocs"**

**}**

**}**

**stage("stage2"){**

**steps{**

**git branch:'Q2-204' , url:'https://github.com/dhan1411/new.git'**

**sh "docker run -dp 90:80 --name test1 httpd"**

**sh "docker cp index.html test1:/usr/local/apache2/htdocs"**

**}**

**}**

**stage("stage3"){**

**steps{**

**git branch:'Q3-2024' , url:'https://github.com/dhan1411/new.git'**

**sh "docker run -dp 8080:80 --name test2 httpd"**

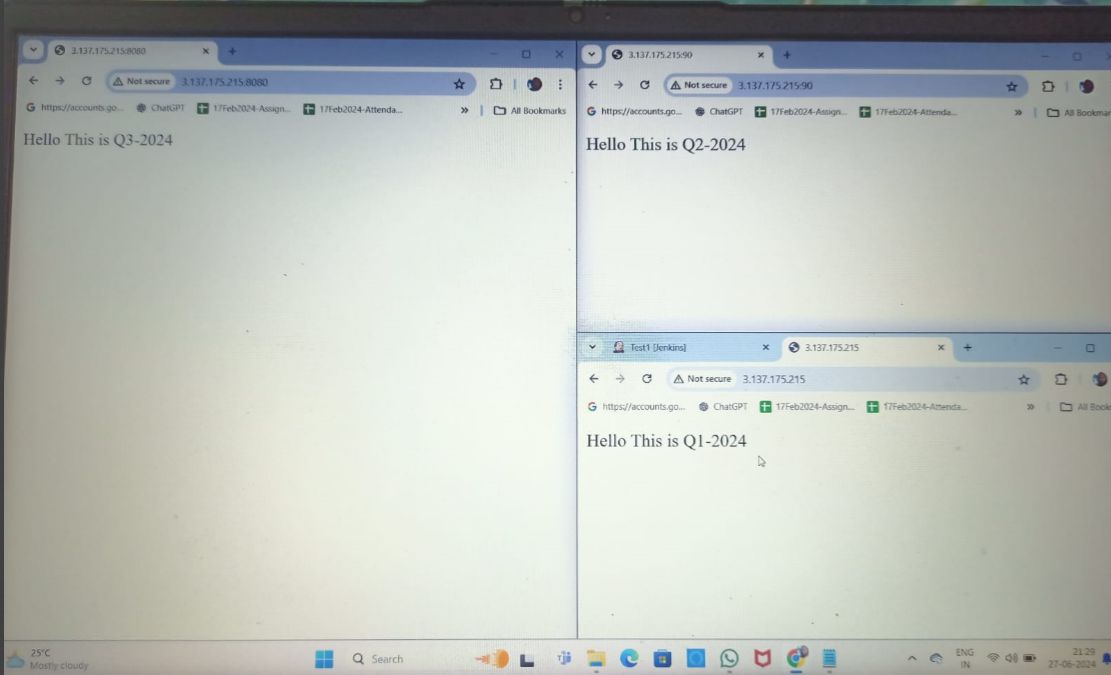
**sh "docker cp index.html test2:/usr/local/apache2/htdocs"**

**}**

**}**

**}**

**}**

****

**Deploy index.html on httpd container using volume binding**

**pipeline{**

**agent{**

**label "qa"**

**}**

**tools {**

**git "Default"**

**dockerTool "docker"**

**}**

**stages{**

**stage("stage0"){**

**steps{ sh "rm -rf \*"**

**}**

**}**

**stage("stage1"){**

**steps{**

**git branch:'Q1-2024' , url:'https://github.com/dhan1411/new.git'**

**sh "docker volume create velocity"**

**sh "cp index.html /var/lib/docker/volumes/velocity/\_data**

**sh "docker run -itdv velocity:/usr/local/apache2/htdocs -p 80:80 --name test httpd"**

**}**

**}**

**}**

**}**

**Deploy war file using Ansible**

**---**

**# war file on tomcat**

**- hosts: devlinux**

**user: velocity**

**become: yes**

**connection: ssh**

**gather\_facts: yes**

**tasks:**

**- name: intsall java**

**action: yum name=java-11-amazon-corretto.x86\_64 state=present**

**- name: install tomcat**

**action: get\_url url=https://dlcdn.apache.org/tomcat/tomcat-9/v9.0.91/bin/apache-tomcat-9.0.91.zip dest=/tmp**

**- name: unzip tomcat**

**action: unarchive src=/tmp/apache-tomcat-9.0.91.zip dest=/home/velocity remote\_src=yes**

**- name: permissions**

**action: file path=apache-tomcat-9.0.91 recurse=yes mode='0777'**

**- name: start server**

**shell:**

**nohup /home/velocity/apache-tomcat-9.0.91/bin/catalina.sh start**

**- name: copy war file**

**action: copy src=sample.war dest=/home/velocity/apache-tomcat-9.0.91/webapps**

**Using Jenkins pipeline deployed a war file on a container and also itegrated RDS**

**pipeline{**

**agent any**

**tools{**

**git "Default"**

**maven "maven"**

**dockerTool "Docker"**

**}**

**environment{**

**username = "admin"**

**passwd = "vel12345"**

**}**

**stages{**

**stage("Clean Workspace"){**

**steps{**

**sh "rm -rf \*"**

**}**

**}**

**stage("Clone URL"){**

**steps{**

**git branch:'master' , url:'https://github.com/Shantanumajan6/project.git'**

**}**

**}**

**stage("Build & test") {**

**steps{**

**sh "mvn clean install"**

**}**

**}**

**stage("Deploy"){**

**steps{**

**script{**

**sh 'docker run -dp 80:8080 --name test tomcat:9.0'**

**sh 'docker cp target/LoginWebApp.war test:/usr/local/tomcat/webapps'**

**sh 'chmod -R 777 target/LoginWebApp'**

**sh '''**

**sed -i 's/localhost/database-1.ct6o2q6cmpjg.us-east-2.rds.amazonaws.com/' target/LoginWebApp/userRegistration.jsp &&**

**sed -i 's/test/velocity/' target/LoginWebApp/userRegistration.jsp &&**

**sed -i 's/root/admin/' target/LoginWebApp/userRegistration.jsp &&**

**sed -i 's/root/vel12345/' target/LoginWebApp/userRegistration.jsp**

**'''**

**sh 'docker cp target/LoginWebApp test:/usr/local/tomcat/webapps’**

**}**

**}**

**}**

**stage("connect DB"){**

**steps{**

**script{**

**sh '''**

**mysql -h database-1.ct6o2q6cmpjg.us-east-2.rds.amazonaws.com -u $username -p$passwd -e '**

**create database velocity;**

**use velocity;**

**CREATE TABLE USER (**

**id int(10) unsigned NOT NULL auto\_increment,**

**first\_name varchar(45) NOT NULL,**

**last\_name varchar(45) NOT NULL,**

**email varchar(45) NOT NULL,**

**username varchar(45) NOT NULL,**

**password varchar(45) NOT NULL,**

**regdate date NOT NULL,**

**PRIMARY KEY (id)**

**)**

**ENGINE=InnoDB DEFAULT CHARSET=latin1;'**

**'''**

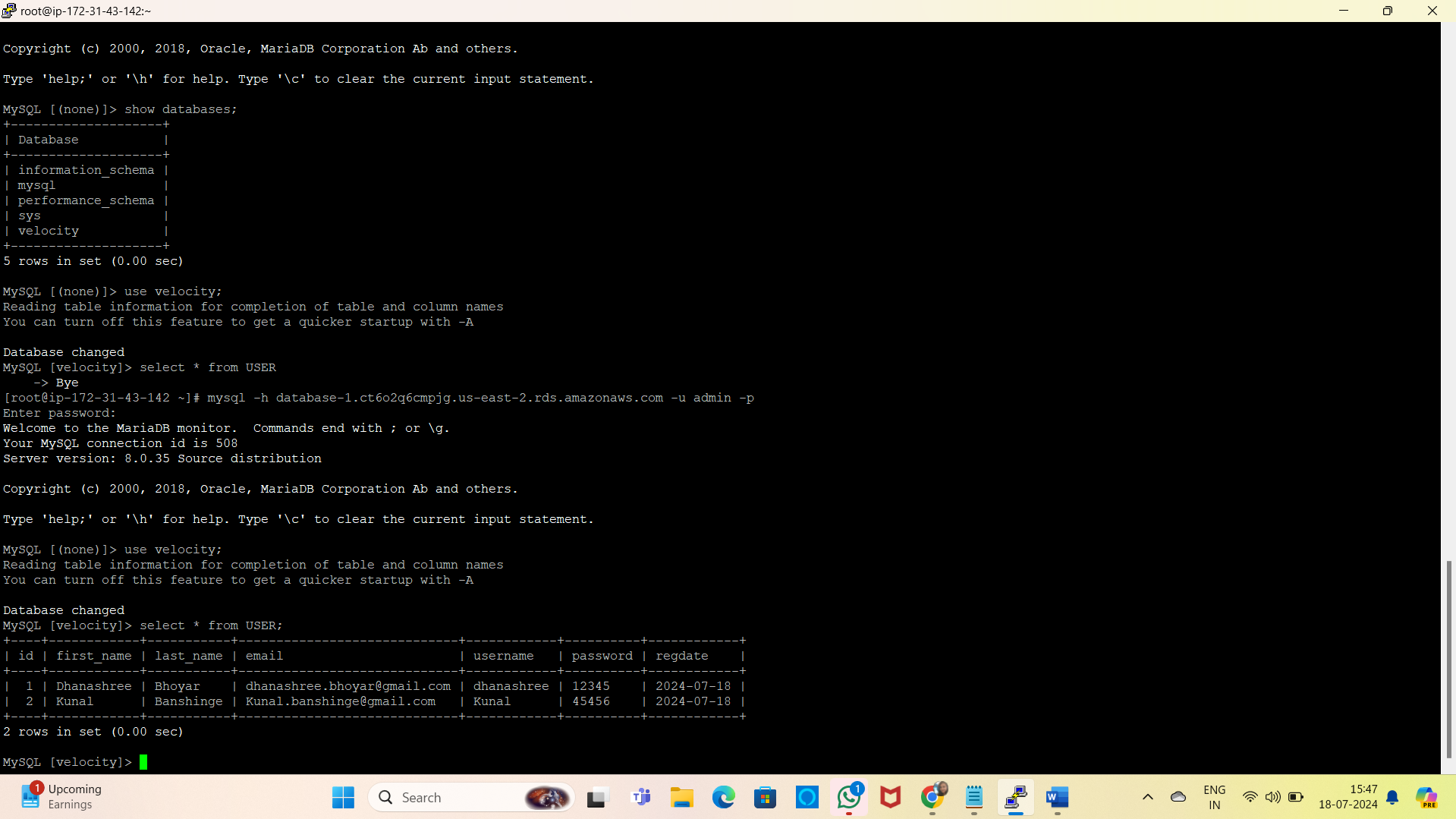
**}**

**}**

**}**

**}**

**}**

****