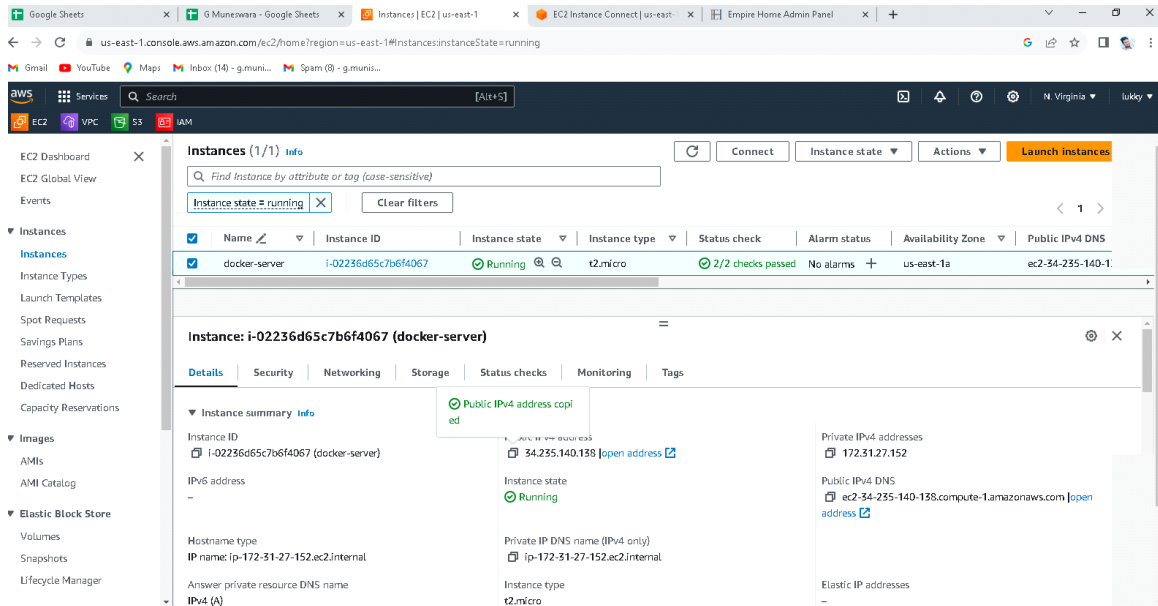


SCASA-PROJECT TASK

THIS IS THE SCASA-PROJECT TASK:

- first we have one lanuch the instance



- after connect the instance
- after first we have install the git

```
~$ curl -s https://aws.amazon.com/linux/amazon-linux-2023
ec2-user@ip-172-31-38-4 ~]$ sudo -i
root@ip-172-31-38-4 ~)# yum install git -y
Last metadata expiration check: 0:05:07 ago on Thu Oct 26 04:37:44 2023.
Dependencies resolved.
=====================================================================================================================================
Package                                Architecture      Version            Repository          Size
=====================================================================================================================================
Installing:
git                                     x86_64            2.40.1-1.amzn2023.0.1  amazonlinux        57 k
Installing dependencies:
git-core                               x86_64            2.40.1-1.amzn2023.0.1  amazonlinux        4.3 M
git-core-doc                           noarch            2.40.1-1.amzn2023.0.1  amazonlinux        2.6 M
perl-Error                              noarch            1:0.17029-5.amzn2023.0.2  amazonlinux        41 k
perl-File-Find                          noarch            1.37-477.amzn2023.0.5  amazonlinux        26 k
perl-Git                                noarch            2.40.1-1.amzn2023.0.1  amazonlinux        45 k
perl-Test-ReadKey                       x86_64            2.38-9.amzn2023.0.2  amazonlinux        36 k
perl-lib                                x86_64            0.65-477.amzn2023.0.5  amazonlinux        15 k
Transaction Summary
-----
Install  8 Packages
```

- next clone the github repository url
- command:git clone (github url)

```
git version 2.40.1
[root@ip-172-31-38-4 ~]# git clone https://github.com/Marolix2011/SCASA-project.git
Cloning into 'SCASA-project'...
remote: Enumerating objects: 3187, done.
remote: Counting objects: 100% (3/3), done.
remote: Total 3187 (delta 0), reused 3 (delta 0), pack-reused 3184
Receiving objects: 100% (3187/3187), 72.38 MiB | 26.68 MiB/s, done.
Resolving deltas: 100% (912/912), done.
[root@ip-172-31-38-4 ~]# ll
total 0
drwxr-xr-x. 3 root root 35 Oct 26 04:49 SCASA-project
[root@ip-172-31-38-4 ~]#
```

- after we have install the docker version
- command: yum install docker

```
[root@ip-172-31-38-4 SCASA-project]# yum install docker -y
Last metadata expiration check: 0:31:09 ago on Thu Oct 26 04:37:44 2023.
Dependencies resolved.
```

| Package | Architecture | Version | Repository | Size |
|------------------------------|--------------|-----------------------|-------------|-------|
| Installing: | | | | |
| docker | x86_64 | 24.0.5-1.amzn2023.0.2 | amazonlinux | 42 M |
| Installing dependencies: | | | | |
| containerd | x86_64 | 1.7.2-1.amzn2023.0.4 | amazonlinux | 34 M |
| iptables-libs | x86_64 | 1.8.8-2.amzn2023.0.2 | amazonlinux | 401 k |
| iptables-nft | x86_64 | 1.8.8-3.amzn2023.0.2 | amazonlinux | 193 k |
| libgroup | x86_64 | 3.0-1.amzn2023.0.1 | amazonlinux | 75 k |
| libnetfilter_comtrack | x86_64 | 1.0.8-2.amzn2023.0.2 | amazonlinux | 58 k |
| libnftnl | x86_64 | 1.0.1-19.amzn2023.0.2 | amazonlinux | 30 k |
| libnftnl | x86_64 | 1.2.2-2.amzn2023.0.2 | amazonlinux | 84 k |
| pkgconf | x86_64 | 2.5-1.amzn2023.0.3 | amazonlinux | 83 k |
| rpm | x86_64 | 1.1.7-1.amzn2023.0.3 | amazonlinux | 3.0 M |

```
Transaction Summary
Install 10 Packages
```

- next start the docker services normally disable in the services we have first enable it the service after start the services
- command: systemctl start docker

```
docker.service - Docker Application Container Engine
Loaded: loaded (/usr/lib/systemd/system/docker.service; enabled; preset: disabled)
Active: active (running) since Thu 2023-10-26 05:13:52 UTC; 36s ago
TriggeredBy: ● docker.socket
Doc: https://docs.docker.com
Main PID: 29240 (dockerd)
Tasks: 10
Memory: 37.4M
CPU: 323ms
CGroup: /system.slice/docker.service
└─29240 /usr/bin/dockerd -H fd:// --containerd=/run/containerd/containerd.sock --default-ulimit nfile=32768:65536

oct 26 05:13:51 ip-172-31-38-4.ec2.internal systemd[1]: Starting docker.service - Docker Application Container Engine...
oct 26 05:13:51 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:51.827053489Z" level=info msg="Starting up"
oct 26 05:13:51 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:51.893749630Z" level=info msg="Loading containers: start."
oct 26 05:13:52 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:52.492852426Z" level=info msg="Loading containers: done."
oct 26 05:13:52 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:52.731732046Z" level=info msg="Docker daemon" commit=a61e2b4 graphdriver=overlay2 version=2
oct 26 05:13:52 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:52.732153595Z" level=info msg="Daemon has completed initialization"
oct 26 05:13:52 ip-172-31-38-4.ec2.internal dockerd[29240]: time="2023-10-26T05:13:52.777925401Z" level=info msg="API listen on /run/docker.sock"
oct 26 05:13:52 ip-172-31-38-4.ec2.internal systemd[1]: Started docker.service - Docker Application Container Engine.
oct 26 05:14:24 ip-172-31-38-4.ec2.internal systemd[1]: /usr/lib/systemd/system/docker.service:20: Failed to parse resource value, ignoring: infinity
lines 1-21/21 (RND)
```

- next go to the SCASA-project
- next check which branch you are in change the master branch
- command: git checkout (master branch)

```
git Version 2.40.1
[root@ip-172-31-38-4 ~]# git clone https://github.com/Marclix2011/SCASA-project.git
Cloning into 'SCASA-project'...
remote: Enumerating objects: 3187, done.
remote: Counting objects: 100% (3/3), done.
remote: Total 3187 (delta 0), reused 3 (delta 0), pack-reused 3184
Receiving objects: 100% (3187/3187), 72.38 MiB | 26.68 MiB/s, done.
Resolving deltas: 100% (912/912), done.
[root@ip-172-31-38-4 ~]# ll
total 0
-rwxr-xr-x. 3 root root 35 Oct 26 04:49 SCASA-project
[root@ip-172-31-38-4 ~]#
```

- after create one Dockerfile
- command: touch (Dockerfile)
- next enter the instruction in docker file

```
FROM mcr.microsoft.com/dotnet/sdk:3.1 AS build
WORKDIR /app
COPY . .
RUN dotnet restore "SCASA.csproj"
RUN dotnet build "SCASA.csproj" -c Release -o /app/build
RUN dotnet publish "SCASA.csproj" -c Release -o /app/publish
FROM mcr.microsoft.com/dotnet/aspnet:3.1 AS runtime
WORKDIR /app
COPY --from=build /app/publish .
EXPOSE 80
ENTRYPOINT ["dotnet", "SCASA.dll"]
```

- next to build the dockerfile image
- command: docker build -t (image name)

```
Google Sheets x G Muneshwara - Google Sheets x Instances | EC2 | us-east-1 x EC2 Instance Connect | us-east-1 x Empire Home Admin Panel x +
us-east-1.console.aws.amazon.com/ec2-instance-connect/ssh?region=us-east-1&connType=standard&instanceId=i-02236d65c7b6f4067&osUser=ec2-user&sshPort=22#/?
Gmail YouTube Maps Inbox (14) - g.muni... Spam (0) - g.muni...
AWS Services Search [Alt+S] N. Virginia lucky
EC2 VPC S3 IAM
> extracting sha256:c88a95092be1a4441be71d24c85bd428a2822cc8cd28387f3d4e15ee0b776458 5.8s
> extracting sha256:208cfb120a77b6282506e4dd1bad46b3393d9ef9e4d8e0ce240a72470fa9336c7 0.6s
> [runtime 1/3] FROM mcr.microsoft.com/dotnet/aspnet:3.1.8sha256:317404f1c9c67f0cb99f31b16ae3d2fab4e2b5443ffb605a700e6e4e7369ad09 24.1s
> resolve mcr.microsoft.com/dotnet/aspnet:3.1.8sha256:317404f1c9c67f0cb99f31b16ae3d2fab4e2b5443ffb605a700e6e4e7369ad09 0.1s
> sha256:c30ae929a3cfe2f78f140c6e2e050ea2bbab17cfc6b3426cf806d9b3b6dd 1.38kB / 1.38kB 0.0s
> sha256:454a55eab920c34d8fca036ed25d1ed7f539ae9fd63b858c2af022c875e46fe4 4.53kB / 4.53kB 0.0s
> sha256:31740421c9c67f0cb99f31b16ae3d2fab4e2b5443ffb605a700e6e4e7369ad09 1.67kB / 1.67kB 0.0s
> sha256:852eb4d398ad2ca02e40b56c778d45a5947ae4e2a02097251ba08242e7e2 27.14MB / 27.14MB 3.2s
> sha256:1ef9390740c7fee485c185286f76155d8cc06a8edcabb3a5e963d4fca31ee0 17.09MB / 17.09MB 4.7s
> sha256:747ae99f521d656b757b56d6211c55d98be5ff2685e7fa0cddfed3fa39061647 1.02MB / 1.02MB 3.8s
> sha256:016ca20b2cbaa7ff105a77acade0c9b9d7207c185941ae243cb5a010ffdf9f2b 31.31MB / 31.31MB 5.0s
> extracting sha256:b5c8bd4398ed2c4602ead6056c778d45a5947ae4e2a02097251ba08242e7e2 7.9s
> sha256:a3dbd1fdecdad2aee8931a5aef52e81979277484e2cd4e276d48 8.10MB / 8.10MB 4.7s
> extracting sha256:0a593987a0e7fec485c185286f76155d8cc06a8edcabb3a5e963d4fca31ee0 4.6s
> extracting sha256:747ae99f521d656b757b56d6211c55d98be5ff2685e7fa0cddfed3fa39061647 0.4s
> extracting sha256:016ca20b2cbaa7ff105a77acade0c9b9d7207c185941ae243cb5a010ffdf9f2b 5.5s
> extracting sha256:a3dbd1fdecdad2aee8931a5aef52e81979277484e2cd4e276d48 1.1s
> [internal] load build context
> transferring context: 548.91MB 21.7s
> [runtime 2/3] WORKDIR /app 0.2s
> [build 2/6] WORKDIR /app 0.1s
> [build 3/6] COPY . 10.3s
> [build 4/6] RUN dotnet restore "SCASA.csproj" -o Release -o /app/build 25.9s
> [build 5/6] RUN dotnet build "SCASA.csproj" -o Release -o /app/build 40.0s
> [build 6/6] RUN dotnet publish "SCASA.csproj" -o Release -o /app/publish 12.3s
> [runtime 3/3] COPY --from=build /app/publish . 0.6s
> exporting to image 3.7s
> exporting layers 3.7s
> writing image sha256:e1bb77461d436700cb8501281bf0fa127d88c69aafa38f6916ddaae6774fb4 0.0s
> naming to docker.io/library/muni 0.0s
```

- next create one container and port number
- command:docker run -d --name (container name) -p 80:80 (image name)

```
root@ip-172-31-27-152 SCASA-project# docker images .
REPOSITORY TAG IMAGE ID CREATED SIZE
root@ip-172-31-27-152 SCASA-project# docker images
REPOSITORY TAG IMAGE ID CREATED SIZE
muni latest e1bb77461d43 2 minutes ago 409MB
root@ip-172-31-27-152 SCASA-project# docker run -d --name muni1 -p 80:80 muni .
9824b84db5f432b3402fa0c8bc2759594ae62a8fc74617fa801dc13f19d9b9
root@ip-172-31-27-152 SCASA-project# docker ps
CONTAINER ID IMAGE COMMAND STATUS PORTS NAMES
9824b84db5f muni "dotnet SCASA.dll ." 6 seconds ago Up 4 seconds 0.0.0.0:80->80/tcp, :::80->80/tcp muni1
root@ip-172-31-27-152 SCASA-project#
```

i-02236d65c7b6f4067 (docker-server)
PublicP: 34.235.140.138 PrivateP: 172.31.27.152

- in the next instance go to security group and add the all tcp in edit inbound rules
- next copy the ip address go to the chorme paste the ip address

