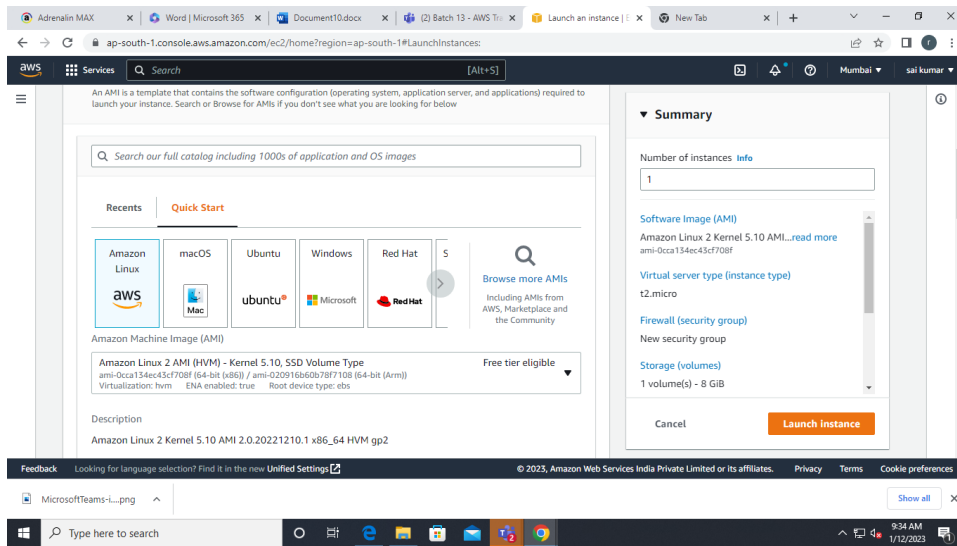
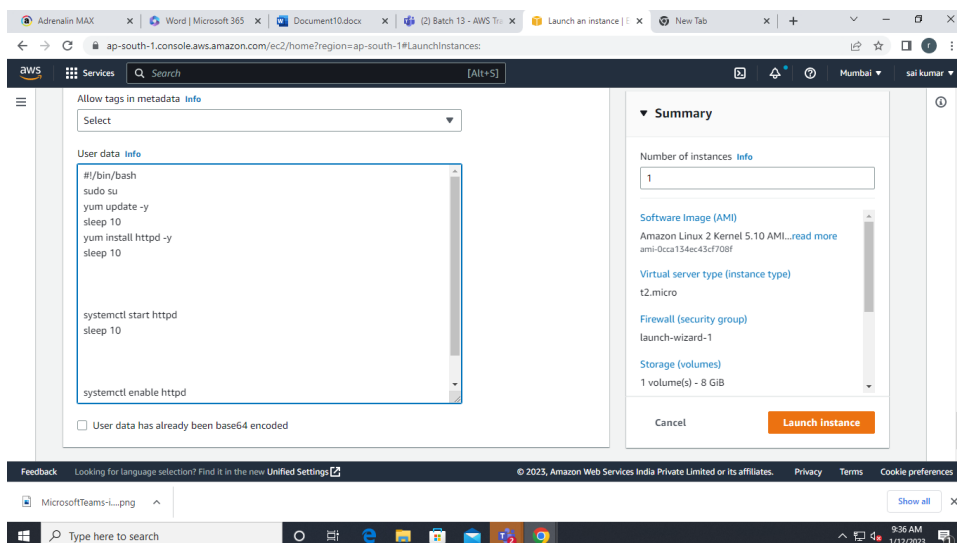
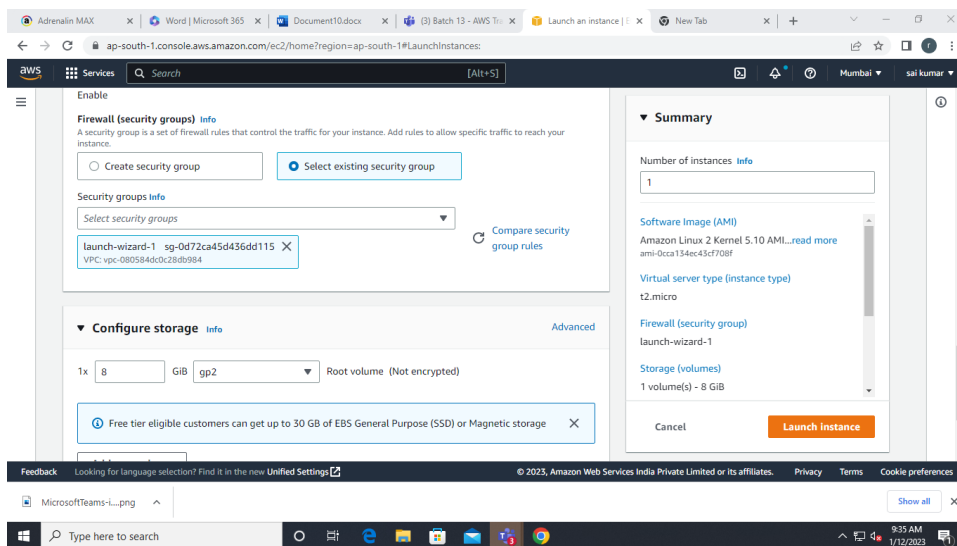


Launch an instance select Linux machine



Select the security group and then select the Advance settings there will be text box will be open and write Apache user data code. Finally launch the instance.



Now navigating to Target Groups then mention the Target Group name,protocol and port for Apache Target Group.

Protocol –TCP; Port -8080

Step 1
Specify group details

Step 2
Register targets

Specify group details

Your load balancer routes requests to the targets in a target group and performs health checks on the targets.

Basic configuration

Settings in this section cannot be changed after the target group is created.

Choose a target type

☒ **Instances**

- Supports load balancing to instances within a specific VPC.
- Facilitates the use of [Amazon EC2 Auto Scaling](#) to manage and scale your EC2 capacity.

☐ **IP addresses**

- Supports load balancing to VPC and on-premises resources.
- Facilitates routing to multiple IP addresses and network interfaces on the same instance.
- Offers flexibility with microservice based architectures, simplifying inter-application communication.
- Supports IPv6 targets, enabling end-to-end IPv6 communication, and IPv4-to-IPv6 NAT.

Target group name

ApacheTG

A maximum of 32 alphanumeric characters including hyphens are allowed, but the name must not begin or end with a hyphen.

Protocol

TCP

Port

80

VPC

Select the VPC with the instances that you want to include in the target group.

vpc-080584dc0c28db984
IPv4: 172.31.0.0/16

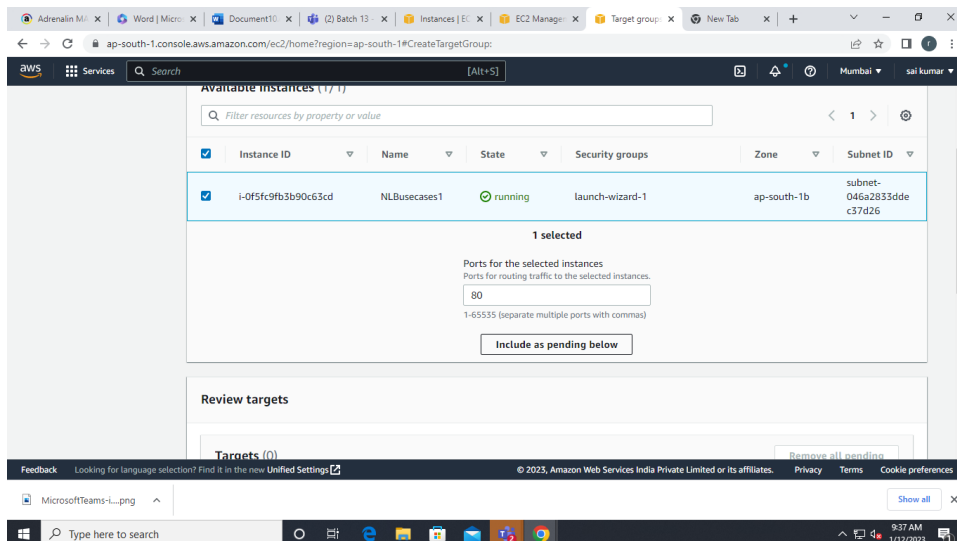
Health checks

The associated load balancer periodically sends requests, per the settings below, to the registered targets to test their status.

Health check protocol

TCP

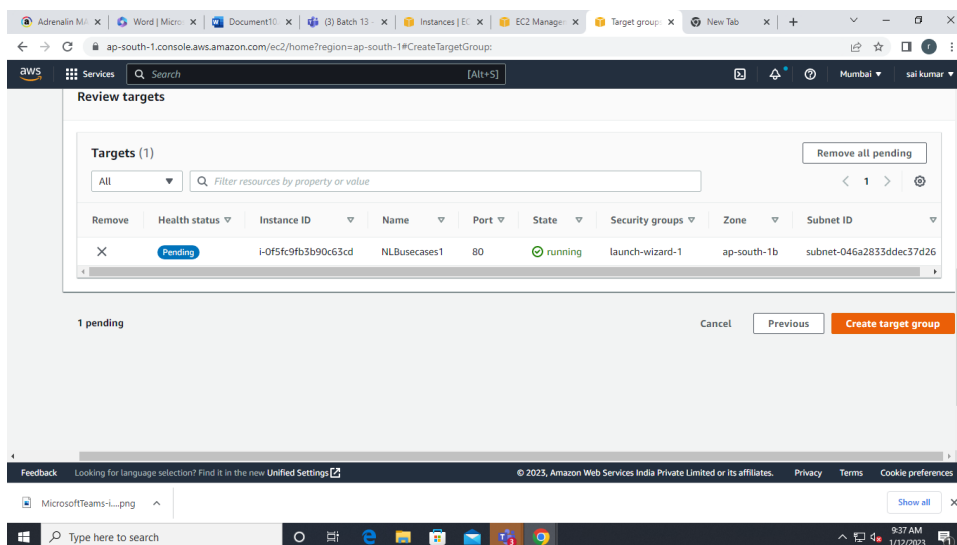
Then Register the targets and create the target group



The screenshot shows the AWS Management Console interface for creating a target group. The 'Available instances' section displays a table with the following data:

Instance ID	Name	State	Security groups	Zone	Subnet ID
i-0f5fc9fb3b90c63cd	NLBusecases1	running	launch-wizard-1	ap-south-1b	subnet-046a283dddc37d26

Below the table, it indicates '1 selected' and provides a section for 'Ports for the selected instances'. The 'Include as pending below' button is visible.



The screenshot shows the 'Review targets' section of the AWS Management Console. It displays a table with the following data:

Remove	Health status	Instance ID	Name	Port	State	Security groups	Zone	Subnet ID
X	Pending	i-0f5fc9fb3b90c63cd	NLBusecases1	80	running	launch-wizard-1	ap-south-1b	subnet-046a283dddc37d26

At the bottom, it shows '1 pending' and the 'Create target group' button is highlighted in orange.

Now create the second Target Group name,protocol and port for Nginx Target group

Protocol –TCP; Port -8081

Accessable to Application Load Balancers only.

☐ Application Load Balancer

- Offers the flexibility for a Network Load Balancer to accept and route TCP requests within a specific VPC.
- Facilitates using static IP addresses and PrivateLink with an Application Load Balancer.

Target group name

NginxTG

A maximum of 32 alphanumeric characters including hyphens are allowed, but the name must not begin or end with a hyphen.

Protocol Port

TCP : 8081

VPC

Select the VPC with the instances that you want to include in the target group.

vpc-080584dc23db9984
IPv4: 172.31.0.0/16

Health checks

Feedback Looking for language selection? Find it in the new Unified Settings. © 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png Show all

Type here to search

Adrenalin M Word | Micro Document10 Batch 13 Instances | E EC2 Manage Target group New Tab

ap-south-1.console.aws.amazon.com/ec2/home?region=ap-south-1#CreateTargetGroup

TCP

Advanced health check settings

Attributes

Certain default attributes will be applied to your target group. You can view and edit them after creating the target group.

Tags - optional

Consider adding tags to your target group. Tags enable you to categorize your AWS resources so you can more easily manage them.

Cancel Next

Feedback Looking for language selection? Find it in the new Unified Settings. © 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png Show all

Type here to search

Then Register the targets and create the target group

The screenshot shows the AWS Management Console interface for the 'Register targets' step in creating a target group. The page title is 'Register targets'. Below the title, there is a sub-header 'Available instances (1/1)' and a search bar. A table lists the available instances:

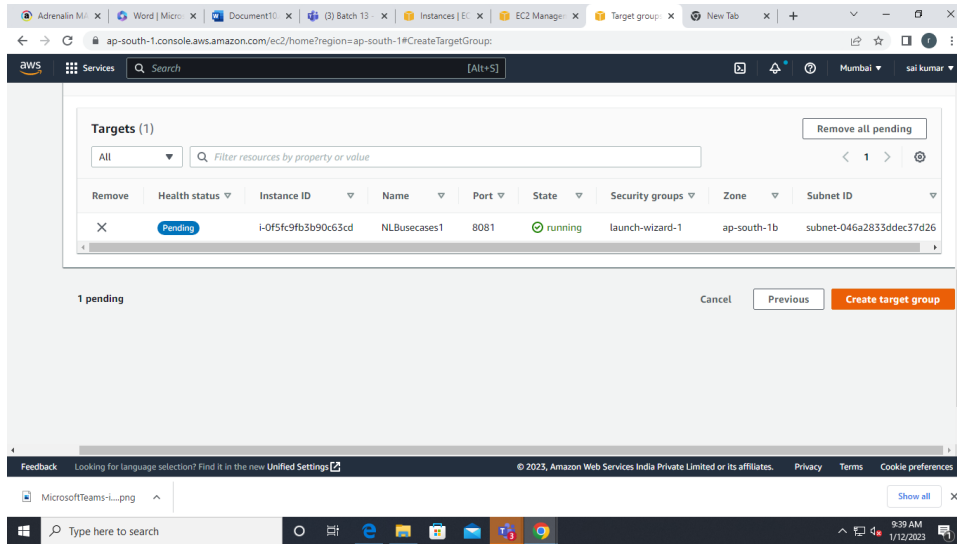
<input checked="" type="checkbox"/>	Instance ID	Name	State	Security groups	Zone	Subnet ID
<input checked="" type="checkbox"/>	i-0f5fc9fb3b90c63cd	NLBusecases1	running	launch-wizard-1	ap-south-1b	subnet-046a2833dde c37d26

Below the table, it indicates '1 selected'. There is a section for 'Ports for the selected instances' with a text input field containing '8081' and a button 'Include as pending below'.

Emp Name:V.Sai Kumar

Apache,Nginx and Jenkins installations using Network Load Balancers (NLB)

Emp Id:6778



Now create the Third Target Group name,protocol and port for Jenkins Target group

Protocol –TCP; Port -8080

Accessible to Application Load Balancers only.

☐ Application Load Balancer

- Offers the flexibility for a Network Load Balancer to accept and route TCP requests within a specific VPC.
- Facilitates using static IP addresses and PrivateLink with an Application Load Balancer.

Target group name

JenkinsTG

A maximum of 32 alphanumeric characters including hyphens are allowed, but the name must not begin or end with a hyphen.

Protocol TCP Port 8080

VPC

Select the VPC with the instances that you want to include in the target group.

vpc-0805846dc28db984
IPv4: 172.31.0.0/16

Health checks

Feedback Looking for language selection? Find it in the new Unified Settings.

© 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png

Type here to search

Adrenalin M... Word | Micro... Document10... Batch 13... Instances | E... EC2 Manage... Target group: New Tab

ap-south-1.console.aws.amazon.com/ec2/home?region=ap-south-1#CreateTargetGroup:

Attributes

ⓘ Certain default attributes will be applied to your target group. You can view and edit them after creating the target group.

Tags - optional

Consider adding tags to your target group. Tags enable you to categorize your AWS resources so you can more easily manage them.

Cancel Next

Feedback Looking for language selection? Find it in the new Unified Settings.

© 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png

Type here to search

Adrenalin M... Word | Micro... Document10... Batch 13... Instances | E... EC2 Manage... Target group: New Tab

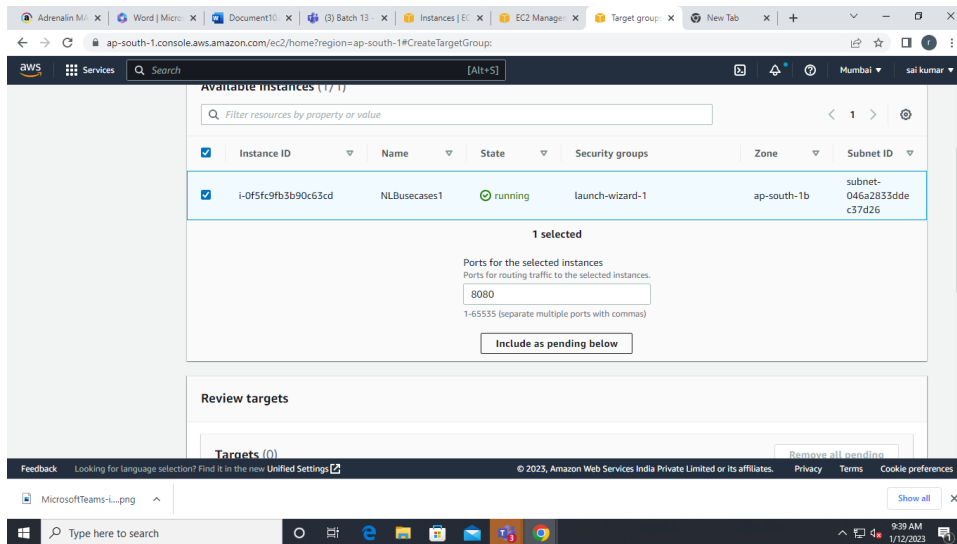
ap-south-1.console.aws.amazon.com/ec2/home?region=ap-south-1#CreateTargetGroup:

Then Register the targets and create the target group

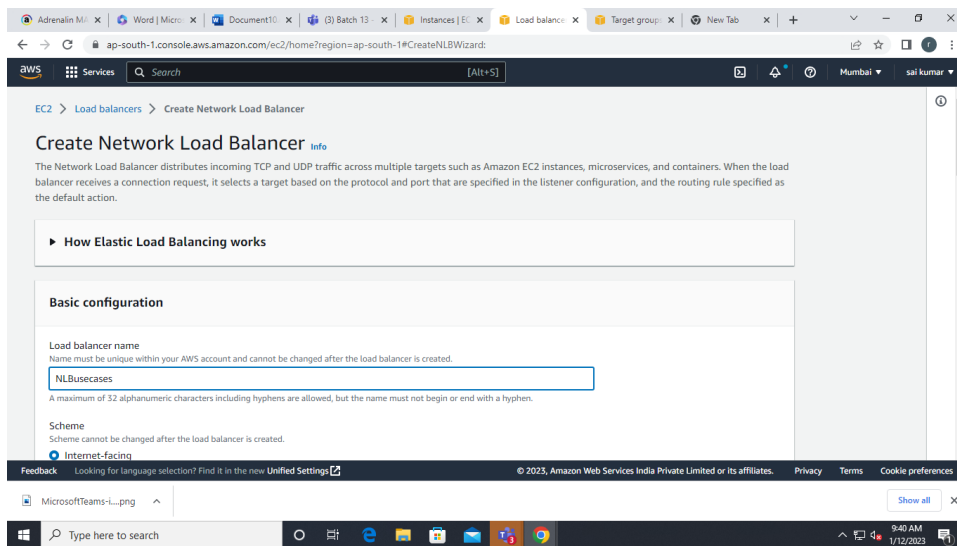
Emp Name:V.Sai Kumar

Apache,Nginx and Jenkins installations using Network Load Balancers (NLB)

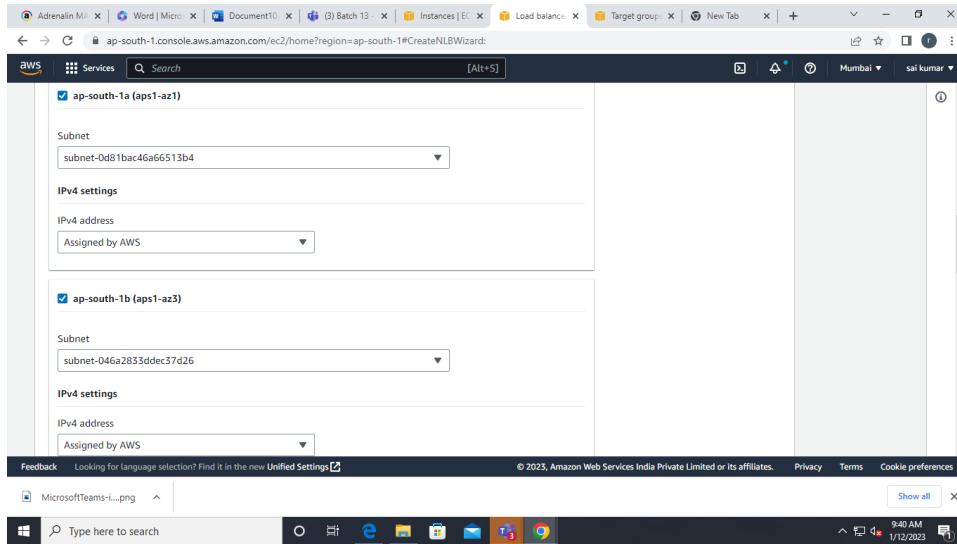
Emp Id:6778



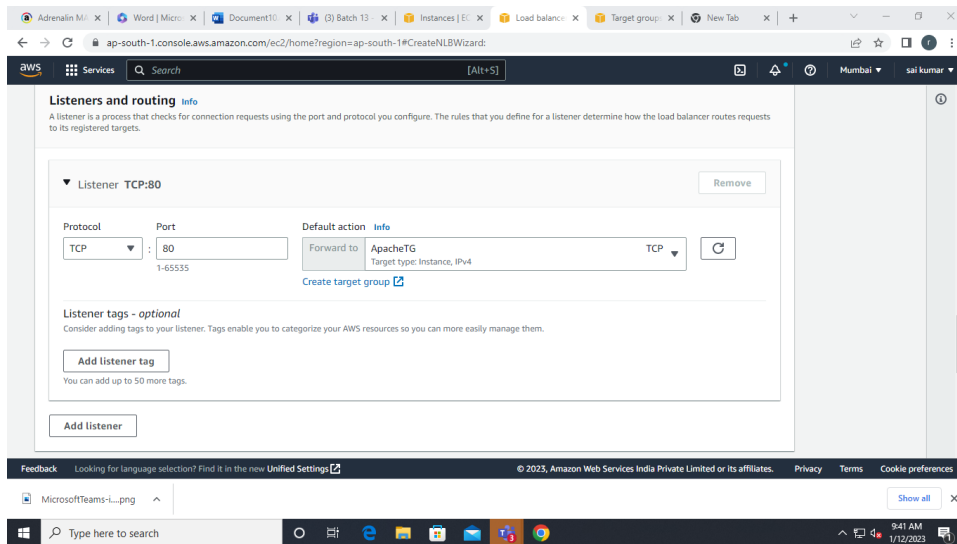
Create the Load Balancer



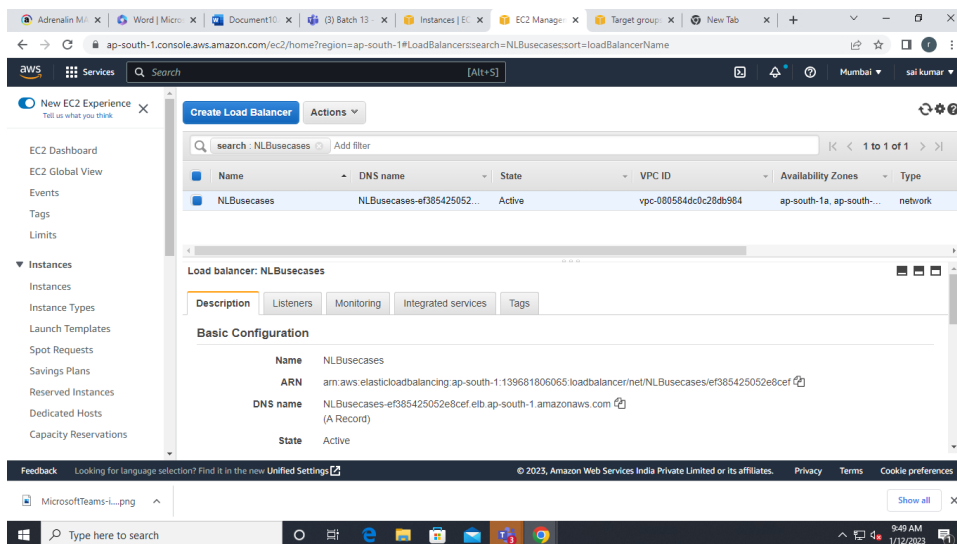
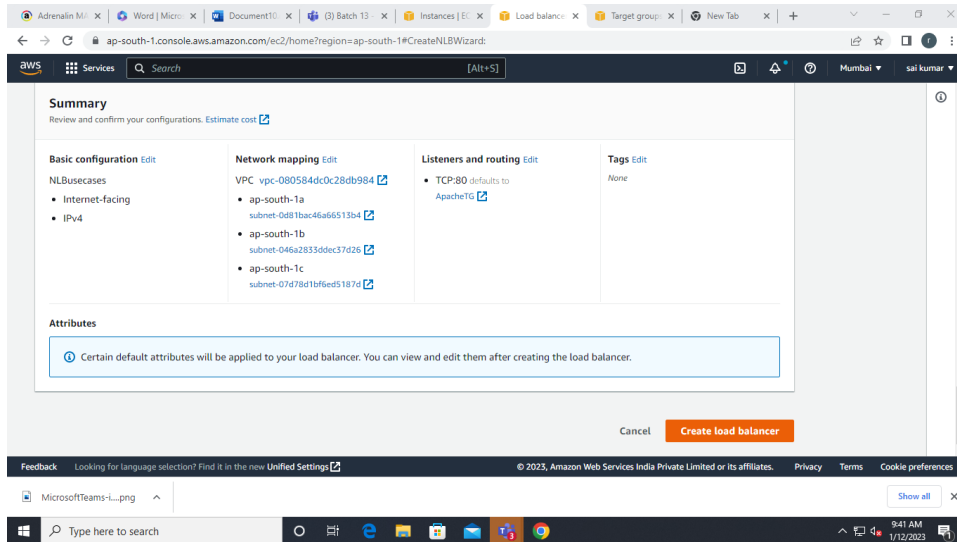
Select all the Availability Zones of the particular Region.



Select the port 80 and Default action is refresh and select the Apache Target Group



Finally Create the Load Balancer. Initially the load balancer is **provisioning state** and wait some time it converted into **Active state**



Select the each Target Group and check the health condition of the Target Group. Is they are healthy state or Unhealthy state.

The screenshot shows the AWS Management Console interface for the 'ApacheTG' target group. The left sidebar contains navigation links for various AWS services. The main content area displays the 'Details' tab for the target group, which is associated with the VPC 'vpc-080584dc0c28db984'. The 'Targets' section shows a table with the following data:

Total targets	Healthy	Unhealthy	Unused	Initial	Draining
1	1	0	0	0	0

The 'Healthy' status is indicated by a green checkmark, and the 'Unhealthy' status is indicated by a red cross. The 'Initial' and 'Draining' statuses are both 0.

The screenshot shows the AWS Management Console interface for the 'NginxTG' target group. The left sidebar contains navigation links for various AWS services. The main content area displays the 'Details' tab for the target group, which is associated with the VPC 'vpc-080584dc0c28db984'. The 'Targets' section shows a table with the following data:

Total targets	Healthy	Unhealthy	Unused	Initial	Draining
1	1	0	0	0	0

The 'Healthy' status is indicated by a green checkmark, and the 'Unhealthy' status is indicated by a red cross. The 'Initial' and 'Draining' statuses are both 0.

Now we can Select the EC2 instance and connect to Linux machine

The image shows two screenshots of the AWS Management Console. The top screenshot displays the 'JenkinsTG' target group details. The bottom screenshot displays the 'NLBusecases1' EC2 instance details.

JenkinsTG Target Group Details:

Target type	Protocol : Port	VPC	IP address type
Instance	TCP: 8080	vpc-080584dc0c28db984	IPv4

Target Status:

Total targets	Healthy	Unhealthy	Unused	Initial	Draining
1	1	0	0	0	0

NLBusecases1 EC2 Instance Details:

Name	Instance ID	Instance state	Instance type	Status check	Alarm status	Availability Zone
NLBusecases1	i-0f5fc9fb3b90c63cd	Running	t2.micro	2/2 checks passed	No alarms	ap-south-1b

Instance: i-0f5fc9fb3b90c63cd (NLBusecases1) Details:

Instance ID	Public IPv4 address	Private IPv4 addresses
i-0f5fc9fb3b90c63cd (NLBusecases1)	65.2.70.101 open address	172.31.12.187

Instance state: Running

Public IPv4 DNS: ec2-65-2-70-101.ap-south-1.compute.amazonaws.com | [open address](#)

Apply the commands regarding the Nginx server installation in Linux Machine

The screenshot displays the AWS Management Console interface for connecting to an EC2 instance. The 'EC2 Instance Connect' tab is active, showing the instance ID 'i-0f5fc9fb3b90c63cd' (NLBusecases1) with a public IP address of 65.2.70.101. The user name is set to 'ec2-user'. A note indicates that the guessed user name is correct, but users should verify the AMI usage instructions.

Below the console window, a terminal session is shown with the following commands and output:

```
[ec2-user@ip-172-31-12-187 ~]$ sudo su -
Last login: Thu Jan 12 04:07:17 UTC 2023
[root@ip-172-31-12-187 ~]# httpd -v
Server version: Apache/2.4.54 ()
Server built:   Jun 30 2022 11:02:23
[root@ip-172-31-12-187 ~]# ifconfig -i | grep eth0
eth0: flags=4163<UP,BROADCAST,MULTICAST>  mtu 1500
        inet 172.31.12.187 netmask 255.255.255.0  broadcast 172.31.12.255
        ether 08:00:27:00:00:00  txqueuelen 1000  (Ethernet)
        RX packets 0  bytes 0 (0.0 B)  rxerrors 0
        TX packets 0  bytes 0 (0.0 B)  txerrors 0
        [root@ip-172-31-12-187 ~]# ss -ltn
State      Recv-Q    Send-Q      Local Address:Port      Peer Address:Port      Process
LISTEN     0          128         127.0.0.1:25            0.0.0.0:0+              *
LISTEN     0          128         0.0.0.0:111             0.0.0.0:0+              *
LISTEN     0          128         0.0.0.0:22              0.0.0.0:0+              *
LISTEN     0          128         [::]:111                [::]:0+                  *
LISTEN     0          511         *:80                     *:0+                      *
LISTEN     0          128         [::]:22                  [::]:0+                  *
```

The terminal output shows the Nginx version and configuration details, and the status of the listening ports. The public IP address is 65.2.70.101 and the private IP address is 172.31.12.187.

Nginx installation commands:

Sudo su -

Httpd -v

Isof -l tcp:80

Sudo amazon-linux-extras install nginx1 -y

nginx -v

Cd /etc/nginx

vi nginx.conf

Press I for inserted mode

Changing the port 80 to 8081 then enter the esc+:wq then enter

```
httpd 3353 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
httpd 3354 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
httpd 3355 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
[root@ip-172-31-12-187 ~]# ss -ltn
State     Recv-Q    Send-Q    Local Address:Port      Peer Address:Port      Process
LISTEN     0         128      127.0.0.1:25             0.0.0.0:*               postfix
LISTEN     0         128      0.0.0.0:111              0.0.0.0:*               xfs
LISTEN     0         128      0.0.0.0:22               0.0.0.0:*               sshd
LISTEN     0         128      [::]:22                  [::]:*                  sshd
LISTEN     0         128      [::]:22                  [::]:*                  sshd
[root@ip-172-31-12-187 ~]# sudo amazon-linux-extras install nginx1 -y
Installing nginx
Loaded plugins: extras_suggestions, langpacks, priorities, update-motd
Cleaning repos: amzn2-core amzn2extra-docker amzn2extra-kernel-5.10 amzn2extra-nginx1
17 metadata files removed
6 sqlite files removed
0 metadata files removed
Loaded plugins: extras_suggestions, langpacks, priorities, update-motd
amzn2-core                               | 3.7 kB  00:00:00
amzn2extra-docker                        | 3.0 kB  00:00:00
amzn2extra-kernel-5.10                   | 3.0 kB  00:00:00

i-0f5fc9fb3b90c63cd (NLBUsecases1)
PublicIPs: 65.2.70.101 PrivateIPs: 172.31.12.187

Feedback Looking for language selection? Find it in the new Unified Settings
© 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences
MicrosoftTeams-L.png Show all
Type here to search 9:52 AM 1/12/2023

nginx 3353 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
httpd 3354 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
httpd 3355 apache 4u IPv6 21303 0x0 TCP *:http (LISTEN)
[root@ip-172-31-12-187 ~]# cat /etc/nginx/nginx.conf
# See http://nginx.org/en/docs/http_module.html#http_module for more details.
# Load configuration file for the default server block.
include /etc/nginx/conf.d/*.conf;

server {
    listen 8081;
    server_name localhost;

    # Load configuration file for the default server block.
    include /etc/nginx/default.d/*.conf;

    error_page 404 /404.html;
    location = /404.html {
    }

    error_page 500 502 503 504 /50x.html;
    location = /50x.html {
    }
}

--
i-0f5fc9fb3b90c63cd (NLBUsecases1)
PublicIPs: 65.2.70.101 PrivateIPs: 172.31.12.187

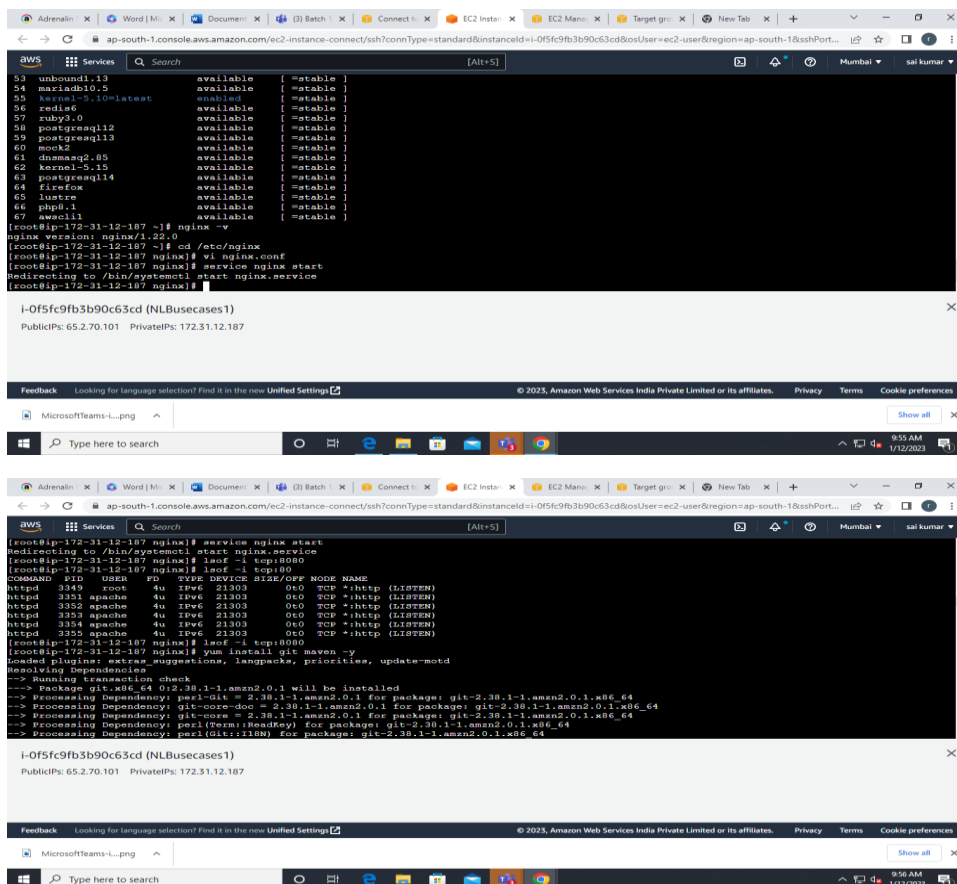
Feedback Looking for language selection? Find it in the new Unified Settings
© 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences
MicrosoftTeams-L.png Show all
Type here to search 9:54 AM 1/12/2023
```

Then enter the command service nginx start

Now we can check the which port is assigned to which server and also checks the which servers are installed in linux machine.

lsf -i tcp:80

lsf -i tcp:8081



The screenshot displays the AWS Management Console interface with a terminal window open. The terminal shows the installation of Nginx on an Amazon Linux 2 instance. The output includes a list of installed packages, the Nginx version (1.22.0), and the successful start of the Nginx service. Below the terminal output, the instance details for 'i-0f5fc9fb3b90c63cd' are shown, including its PublicIPs (65.2.70.101) and PrivateIPs (172.31.12.187). The bottom of the screenshot shows the Windows taskbar with various application icons and the system clock indicating 9:55 AM on 1/12/2023.

```
53 unbound1.13 available [ =table ]
54 mariadb10.5 available [ =table ]
55 kernel-5.10=latest enabled [ =table ]
56 ceph6 available [ =table ]
57 ruby3.0 available [ =table ]
58 postgresql12 available [ =table ]
59 postgresql13 available [ =table ]
60 mock2 available [ =table ]
61 docker-engine available [ =table ]
62 kernel-5.15 available [ =table ]
63 postgresql14 available [ =table ]
64 firefox available [ =table ]
65 lustre available [ =table ]
66 php8.1 available [ =table ]
67 awscli1 available [ =table ]

[root@ip-172-31-12-187 ~]# nginx -v
nginx version: nginx/1.22.0
[root@ip-172-31-12-187 ~]# cd /etc/nginx
[root@ip-172-31-12-187 nginx]# vi nginx.conf
[root@ip-172-31-12-187 nginx]# service nginx start
Redirecting to /bin/systemctl start nginx.service
[root@ip-172-31-12-187 nginx]#

i-0f5fc9fb3b90c63cd (NLBusecases1)
PublicIPs: 65.2.70.101 PrivateIPs: 172.31.12.187

Feedback Looking for language selection? Find it in the new Unified Settings. © 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png Show all

Type here to search

Adrenalin Word | Mi | Document | Batch | Connect | EC2 Instanc EC2 Man Target gro New Tab + - v - o x
ap-south-1.console.aws.amazon.com/ec2-instance-connect/sh?connType=standard&instanceId=i-0f5fc9fb3b90c63cd&osUser=ec2-user&region=ap-south-1&sshPort... i o ☆ ⓘ
AWS Services Search [Alt+S] Mumbai sai kumar
[root@ip-172-31-12-187 ~]# service nginx start
Redirecting to /bin/systemctl start nginx.service
[root@ip-172-31-12-187 nginx]# lsof -i tcp:8080
COMMAND PID USER FD TYPE DEVICE SIZE/OFF NODE NAME
httpd 3349 root 4u IPv6 21303 0k0 TCP *:http (LISTEN)
httpd 3351 apache 4u IPv6 21303 0k0 TCP *:http (LISTEN)
httpd 3352 apache 4u IPv6 21303 0k0 TCP *:http (LISTEN)
httpd 3353 apache 4u IPv6 21303 0k0 TCP *:http (LISTEN)
httpd 3354 apache 4u IPv6 21303 0k0 TCP *:http (LISTEN)
httpd 3355 apache 4u IPv6 21303 0k0 TCP *:http (LISTEN)
[root@ip-172-31-12-187 nginx]# lsof -i tcp:8080
[root@ip-172-31-12-187 nginx]# yum install git -y
Loaded plugins: extras_suggestions, langpacks, priorities, update-motd
Resolving Dependencies
--> Running transaction check
--> Package git.x86_64 0:2.38.1-1.amzn2.0.1 will be installed
--> Processing Dependency: perl-git = 2.38.1-1.amzn2.0.1 for package: git-2.38.1-1.amzn2.0.1.x86_64
--> Processing Dependency: git-core-doc = 2.38.1-1.amzn2.0.1 for package: git-2.38.1-1.amzn2.0.1.x86_64
--> Processing Dependency: git-core = 2.38.1-1.amzn2.0.1 for package: git-2.38.1-1.amzn2.0.1.x86_64
--> Processing Dependency: perl(Perl::Git) for package: git-2.38.1-1.amzn2.0.1.x86_64
--> Processing Dependency: perl(Git::HTTP) for package: git-2.38.1-1.amzn2.0.1.x86_64

i-0f5fc9fb3b90c63cd (NLBusecases1)
PublicIPs: 65.2.70.101 PrivateIPs: 172.31.12.187

Feedback Looking for language selection? Find it in the new Unified Settings. © 2023, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png Show all

Type here to search
```



```
Address | Word | Documents | EC2 Instance | EC2 Menu | Target | New Tab | ...
ap-south-1-console.aws.amazon.com/ec2-instance-connect/s3?fromType=standard&instanceId=i-0f56c9b3b90c63cd80&user=ec2-user&region=ap-south-1&sshPort=...

AWS | Services | Search | [Alt+R] | Mumbai | Sai Kumar |
loaded plugins: extra_suggestions, langpacks, priorities, update-motd
cleaning up: amzn2-core amzn2extra-docker amzn2extra-java-openjdk11 amzn2extra-kernel-5.10 amzn2extra-nginx1
2 metadata files removed
3 apt files removed
amzn2extra files removed
loaded plugins: extra_suggestions, langpacks, priorities, update-motd
amzn2-core
amzn2extra-java-openjdk11
amzn2extra-kernel-5.10
amzn2extra-nginx1
12/11: amzn2-core/2/a06_64/group.gp
12/11: amzn2-core/2/a06_64/updateinfo
4/11: amzn2extra-java-openjdk11/2/a06_64/primary_db
4/11: amzn2extra-kernel-5.10/2/a06_64/updateinfo
6/11: amzn2extra-kernel-5.10/2/a06_64/updateinfo
6/11: amzn2extra-java-openjdk11/2/a06_64/updateinfo
6/11: amzn2extra-nginx1/2/a06_64/updateinfo
6/11: amzn2extra-kernel-5.10/2/a06_64/primary_db
6/11: amzn2extra-kernel-5.10/2/a06_64/primary_db
10/11: amzn2extra-kernel-5.10/2/a06_64/primary_db
11/11: amzn2-core/2/a06_64/primary_db
42% [=====] 16 MB/s 01:00:02 ETA

i-0f56c9b3b90c63cd (NLB:ascaseni)
PublicIP: 65.2.70.101 PrivateIP: 172.31.12.107

Feedback | Looking for language selection? Find it in the new Unified Settings
© 2021, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png | Type here to search

Address | Word | Documents | EC2 Instance | EC2 Menu | Target | New Tab | ...
ap-south-1-console.aws.amazon.com/ec2-instance-connect/s3?fromType=standard&instanceId=i-0f56c9b3b90c63cd80&user=ec2-user&region=ap-south-1&sshPort=...

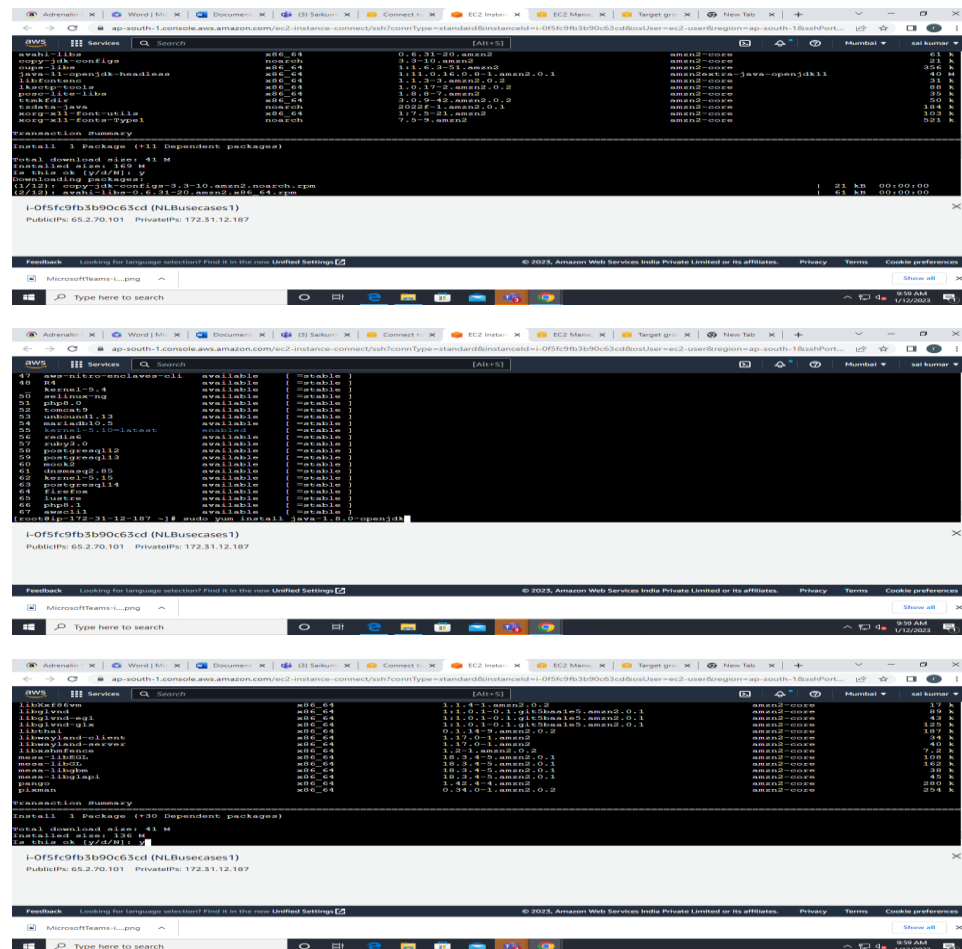
AWS | Services | Search | [Alt+R] | Mumbai | Sai Kumar |
installing 1/2-31-12-107 | sudo amazon-linux-extras install java-openjdk11
loaded plugins: extra_suggestions, langpacks, priorities, update-motd
cleaning up: amzn2-core amzn2extra-docker amzn2extra-java-openjdk11 amzn2extra-kernel-5.10 amzn2extra-nginx1
2 metadata files removed
3 apt files removed
amzn2extra files removed
loaded plugins: extra_suggestions, langpacks, priorities, update-motd
amzn2-core
amzn2extra-java-openjdk11
amzn2extra-kernel-5.10
amzn2extra-nginx1
12/11: amzn2-core/2/a06_64/group.gp
12/11: amzn2-core/2/a06_64/updateinfo
4/11: amzn2extra-java-openjdk11/2/a06_64/primary_db
4/11: amzn2extra-kernel-5.10/2/a06_64/updateinfo
6/11: amzn2extra-kernel-5.10/2/a06_64/updateinfo
6/11: amzn2extra-java-openjdk11/2/a06_64/updateinfo
6/11: amzn2extra-nginx1/2/a06_64/updateinfo
6/11: amzn2extra-kernel-5.10/2/a06_64/primary_db
10/11: amzn2extra-kernel-5.10/2/a06_64/primary_db
11/11: amzn2-core/2/a06_64/primary_db
1 3.7 kB 00:00:00
1 3.0 kB 00:00:00
1 3.0 kB 00:00:00
1 3.0 kB 00:00:00
1 3.0 kB 00:00:00
1 2.5 kB 00:00:00
1 539 kB 00:00:00
1 19 kB 00:00:00
1 22 kB 00:00:00
1 2.7 kB 00:00:00
1 2.0 kB 00:00:00
1 1.9 kB 00:00:00
1 1.9 kB 00:00:00
1 76 kB 00:00:00
1 98 kB 00:00:00
1 56 kB 00:00:00

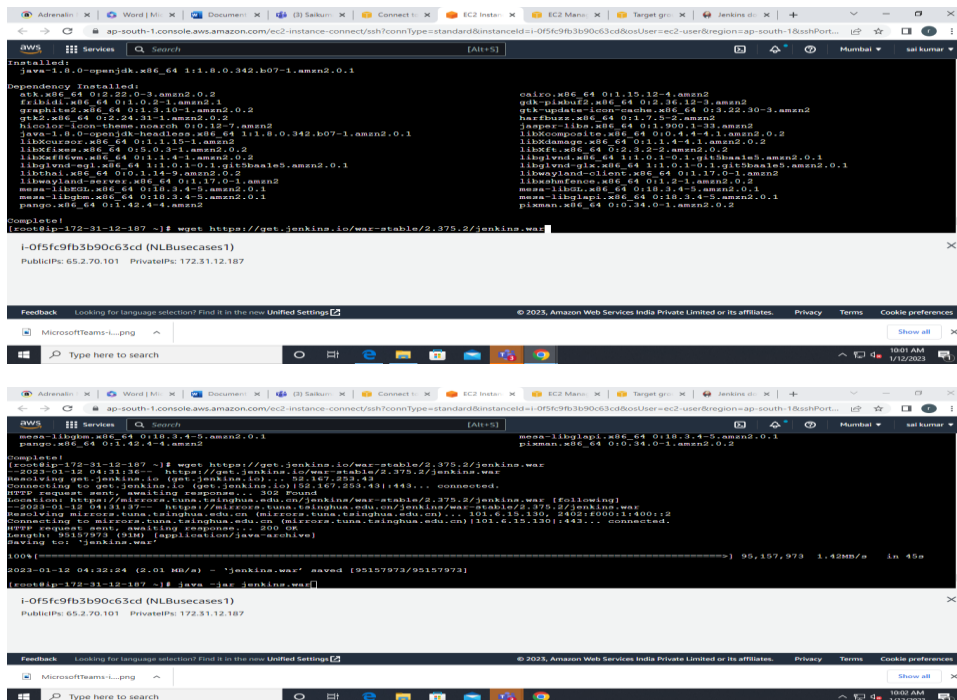
i-0f56c9b3b90c63cd (NLB:ascaseni)
PublicIP: 65.2.70.101 PrivateIP: 172.31.12.107

Feedback | Looking for language selection? Find it in the new Unified Settings
© 2021, Amazon Web Services India Private Limited or its affiliates. Privacy Terms Cookie preferences

MicrosoftTeams-L.png | Type here to search
```

Emp Id:6778





The screenshot displays a terminal window on an AWS EC2 instance, showing the installation of Jenkins. The terminal output includes the following commands and results:

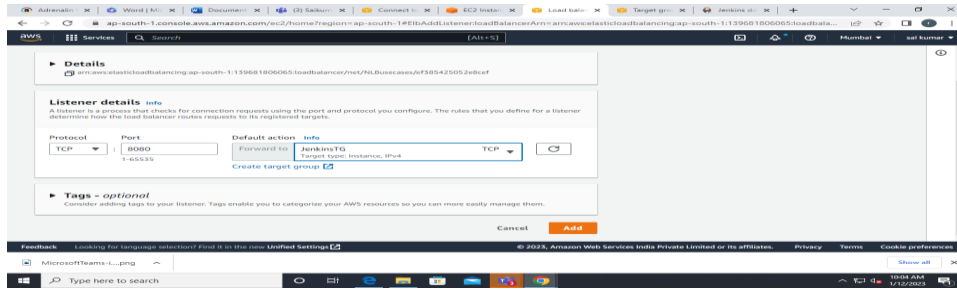
```
Completed!
[root@ip-172-31-12-187 ~]# wget https://get.jenkins.io/war-stable/2.375.2/jenkins.war
--2023-01-12 04:31:32-- https://get.jenkins.io/war-stable/2.375.2/jenkins.war
Resolving get.jenkins.io (get.jenkins.io)... 192.167.253.43
Connecting to get.jenkins.io (get.jenkins.io):80... connected.
HTTP request sent, awaiting response... 200 Found
[100%] https://microservices.tuni.tsinghua.edu.cn/jenkins/war-stable/2.375.2/jenkins.war (following)
--2023-01-12 04:31:37-- https://microservices.tuni.tsinghua.edu.cn/jenkins/war-stable/2.375.2/jenkins.war
Resolving microservices.tuni.tsinghua.edu.cn (microservices.tuni.tsinghua.edu.cn)... 101.4.15.130, 2402:6000:1:400::2
Connecting to microservices.tuni.tsinghua.edu.cn (microservices.tuni.tsinghua.edu.cn) [101.4.15.130]:443... connected.
HTTP request sent, awaiting response... 200 OK
[Length: 95157973 (91M)] (application/java-archive)
Saving to: 'jenkins.war'

100%[=====] 95,157,973  1.42MB/s  in 45s

2023-01-12 04:32:24 (2.01 MB/s) = 'jenkins.war' saved [95157973/95157973]

[root@ip-172-31-12-187 ~]# java -jar jenkins.war
```

The terminal window also shows the public and private IP addresses of the EC2 instance: PublicIP: 65.2.70.101, PrivateIP: 172.31.12.187.



Add listeners to the Load Balancer and mention the ports and protocols

For Nginx:

For Jenkins:

For Apache:

Protocol :TCP

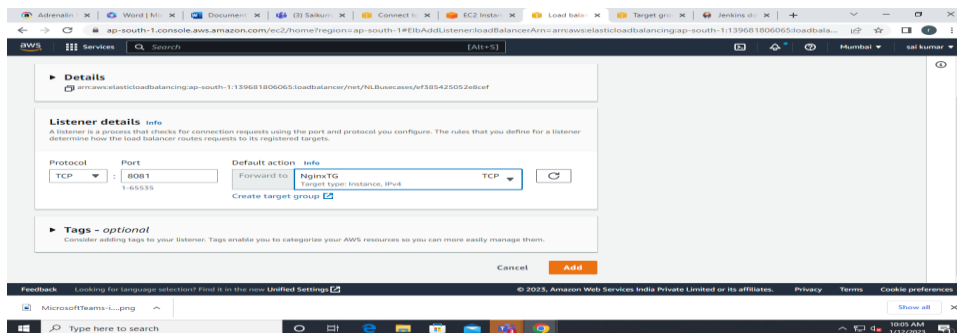
Protocol :TCP

Protocol :TCP

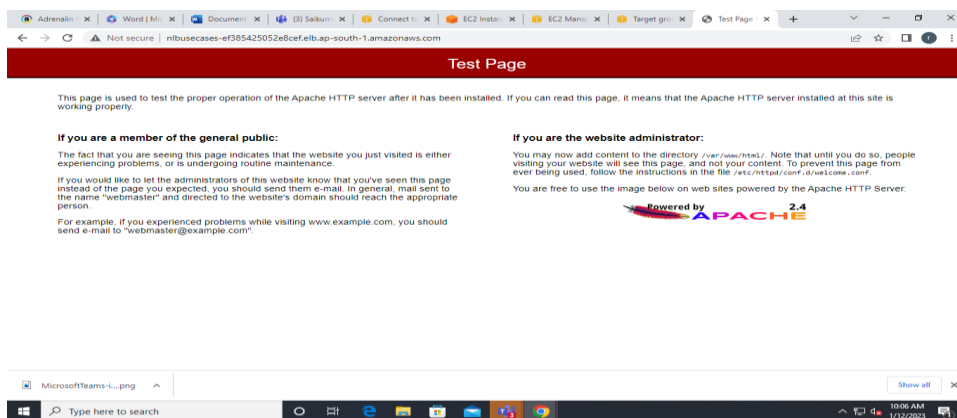
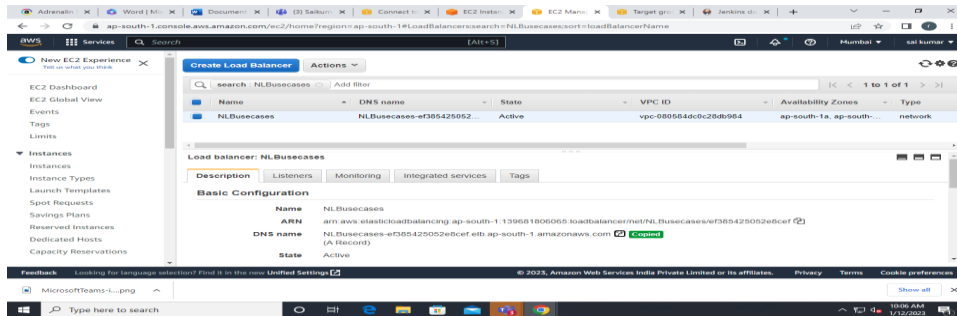
Port :8081

Port :8080

Port :80



Copy the Load Balancer DNS name and paste it into the new tab in browser then redirecting into the Apache server

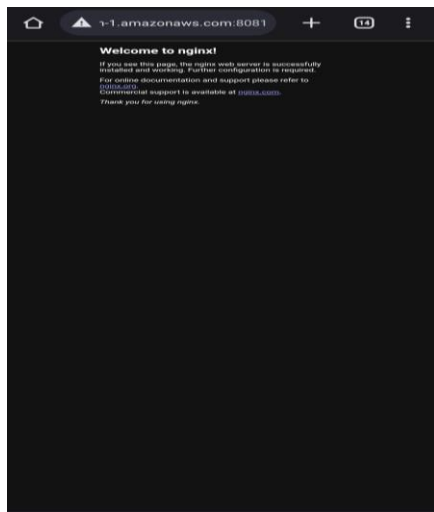


Copy the Load Balancer DNS name,mention the port number with :8081 and paste it into the new tab in browser then redirecting into the Nginx server

Emp Name:V.Sai Kumar

Apache,Nginx and Jenkins installations using Network Load Balancers (NLB)

Emp Id:6778

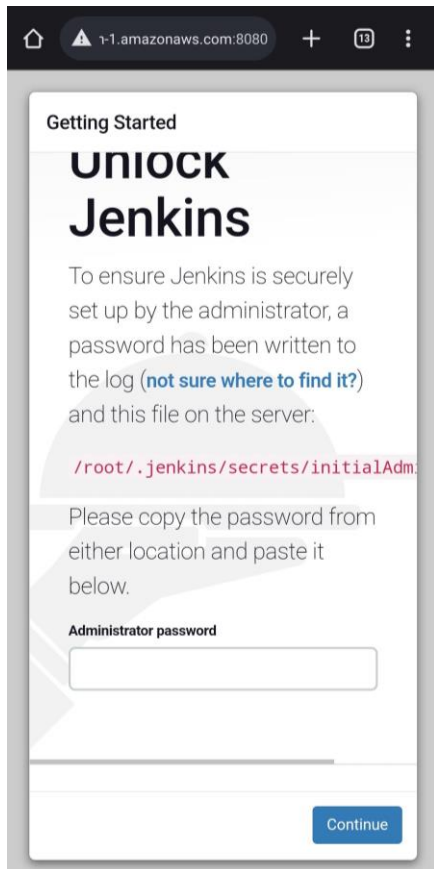


Copy the Load Balancer DNS name,mention the port number with :8080 and paste it into the new tab in browser then redirecting into the Jenkins server

Emp Name:V.Sai Kumar

Apache,Nginx and Jenkins
installations using Network Load
Balancers (NLB)

Emp Id:6778



Getting Started

UNLOCK Jenkins

To ensure Jenkins is securely set up by the administrator, a password has been written to the log ([not sure where to find it?](#)) and this file on the server:

```
/root/.jenkins/secrets/initialAdminPassword
```

Please copy the password from either location and paste it below.

Administrator password

Continue

Emp Name:V.Sai Kumar

**Apache,Nginx and Jenkins
installations using Network Load
Balancers (NLB)**

Emp Id:6778

Emp Name:V.Sai Kumar

**Apache,Nginx and Jenkins
installations using Network Load
Balancers (NLB)**

Emp Id:6778