

CS644- Introduction to Bigdata

HW2

Sirisha Bojjireddy(31485745)
Masters in Datascience(Spring 2019)

Snapshot of two amazon EC2 instances:

The screenshot displays the AWS Management Console for the us-east-2 region. The left-hand navigation pane lists various services, with 'INSTANCES' expanded and 'Instances' selected. The main content area shows a table of two EC2 instances, both in a 'running' state. Above the table are buttons for 'Launch Instance', 'Connect', and 'Actions'. A search bar is located above the table headers. The table columns include Name, Instance ID, Instance Type, Availability Zone, Instance State, Status Checks, Alarm Status, Public DNS (IPv4), and IPv4 Public IP.

	Name	Instance ID	Instance Type	Availability Zone	Instance State	Status Checks	Alarm Status	Public DNS (IPv4)	IPv4 Public IP
<input type="checkbox"/>		i-0f2202169d79c954b	t2.micro	us-east-2a	running	✓ 2/2 checks ...	None	ec2-3-17-154-128.us-e...	3.17.154.128
<input type="checkbox"/>		i-080deb538568eafca	t2.micro	us-east-2a	running	✓ 2/2 checks ...	None	ec2-18-222-166-114.us...	18.222.166.114

Snapshot of security group for VM1:

The screenshot displays the AWS Management Console interface for the 'Security Groups' section. The left-hand navigation pane lists various AWS services, with 'Security Groups' highlighted under the 'NETWORK & SECURITY' category. The main content area shows the configuration for a specific security group, 'sg-03417aea565dfb5b8', which is associated with the instance 'instance2' in VPC 'vpc-40313828'. The 'Inbound' tab is selected, revealing a table of inbound rules. These rules include three SSH rules (Type: SSH, Protocol: TCP, Port Range: 22) with sources of 24.0.212.92/32, 172.31.6.165/32, and 172.31.2.8/32, and one rule for 'All ICMP - IPv4' (Type: All ICMP - IPv4, Protocol: All, Port Range: N/A) with source 'sg-0f4dc73583ac6e0e9 (launch-wiz'. An 'Edit' button is visible above the rules table.

EC2 Dashboard
Events
Tags
Reports
Limits

INSTANCES
Instances
Launch Templates
Spot Requests
Reserved Instances
Dedicated Hosts
Capacity Reservations

IMAGES
AMIs
Bundle Tasks

ELASTIC BLOCK STORE
Volumes
Snapshots
Lifecycle Manager

NETWORK & SECURITY
Security Groups
Elastic IPs

Create Security Group Actions

Filter by tags and attributes or search by keyword

Name	Group ID	Group Name	VPC ID	Owner	Description
	sg-03417aea565dfb5b8	instance2	vpc-40313828	097842502380	instance 2

Security Group: sg-03417aea565dfb5b8

Description Inbound Outbound Tags

Edit

Type	Protocol	Port Range	Source	Description
SSH	TCP	22	24.0.212.92/32	
SSH	TCP	22	172.31.6.165/32	
SSH	TCP	22	172.31.2.8/32	
All ICMP - IPv4	All	N/A	sg-0f4dc73583ac6e0e9 (launch-wiz	

Snapshot of security group for VM2:

aws

Services

Resource Groups

?

Sirisha Bojjireddy

Ohio

Support

EC2 Dashboard

Events

Tags

Reports

Limits

INSTANCES

Instances

Launch Templates

Spot Requests

Reserved Instances

Dedicated Hosts

Capacity Reservations

IMAGES

AMIs

Bundle Tasks

ELASTIC BLOCK STORE

Volumes

Snapshots

Lifecycle Manager

NETWORK & SECURITY

Security Groups

Create Security Group

Actions

Filter by tags and attributes or search by keyword

1 to 6 of 6

Name	Group ID	Group Name	VPC ID	Owner	Description
	sg-03417aea565dfb5b8	instance2	vpc-40313828	097842502380	instance 2

Security Group: sg-0f4dc73583ac6e0e9

DescriptionInboundOutboundTags

Edit

Type	Protocol	Port Range	Source	Description
SSH	TCP	22	172.31.6.165/32	
SSH	TCP	22	172.31.2.8/32	
SSH	TCP	22	24.0.212.92/32	
All ICMP - IPv4	All	N/A	sg-03417aea565dfb5b8 (instance2)	

Snapshot of SSH based communication between VM1 and VM2:

```
courses — ec2-user@ip-172-31-6-165:~ — ssh -i AWS_EC2.pem ec2-user@ec2-18-222-166-114.us-east-2.compute.amazonaws.com — 139x31
```

```
Warning: Permanently added 'ec2-52-14-179-109.us-east-2.compute.amazonaws.com,172.31.6.165' (ECDSA) to the list of known hosts.
```

```
Permission denied (publickey).
```

```
[ec2-user@ip-172-31-2-8 ~]$ vi AWS_EC2.pem
```

```
[ec2-user@ip-172-31-2-8 ~]$ chmod 0400 AWS_EC2.pem
```

```
[ec2-user@ip-172-31-2-8 ~]$ ssh -i AWS_EC2.pem ec2-user@ec2-52-14-179-109.us-east-2.compute.amazonaws.com
```

```
Last login: Sun Feb 10 19:59:09 2019 from c-24-0-212-92.hsd1.nj.comcast.net
```

```
--|  --|_ )  
_ | (  /  Amazon Linux AMI  
---|\---|---
```

```
https://aws.amazon.com/amazon-linux-ami/2018.03-release-notes/
```

```
10 package(s) needed for security, out of 12 available
```

```
Run "sudo yum update" to apply all updates.
```

```
[ec2-user@ip-172-31-6-165 ~]$ ssh -i AWS_EC2.pem ec2-user@ec2-18-224-54-170.us-east-2.compute.amazonaws.com
```

```
Last login: Sun Feb 10 20:00:44 2019 from ip-172-31-6-165.us-east-2.compute.internal
```

```
--|  --|_ )  
_ | (  /  Amazon Linux AMI  
---|\---|---
```

```
https://aws.amazon.com/amazon-linux-ami/2018.03-release-notes/
```

```
10 package(s) needed for security, out of 12 available
```

```
Run "sudo yum update" to apply all updates.
```

```
[ec2-user@ip-172-31-2-8 ~]$ ping ec2-18-224-54-170.us-east-2.compute.amazonaws.com
```

Snapshot of network traffic between VM1 and VM2:

```
courses — ec2-user@ip-172-31-6-165:~ — ssh -i AWS_EC2.pem ec2-user@ec2-18-222-166-114.us-east-2.compute.amazonaws.com — 139x31

  __|  __|_ )
 _| (  _/  Amazon Linux AMI
---|\___|___|

https://aws.amazon.com/amazon-linux-ami/2018.03-release-notes/
10 package(s) needed for security, out of 12 available
Run "sudo yum update" to apply all updates.
[ec2-user@ip-172-31-6-165 ~]$ ping 172.31.2.8
PING 172.31.2.8 (172.31.2.8) 56(84) bytes of data.
64 bytes from 172.31.2.8: icmp_seq=1 ttl=255 time=0.340 ms
64 bytes from 172.31.2.8: icmp_seq=2 ttl=255 time=0.589 ms
64 bytes from 172.31.2.8: icmp_seq=3 ttl=255 time=0.500 ms
64 bytes from 172.31.2.8: icmp_seq=4 ttl=255 time=0.456 ms
64 bytes from 172.31.2.8: icmp_seq=5 ttl=255 time=0.487 ms
64 bytes from 172.31.2.8: icmp_seq=6 ttl=255 time=0.493 ms
64 bytes from 172.31.2.8: icmp_seq=7 ttl=255 time=0.450 ms
64 bytes from 172.31.2.8: icmp_seq=8 ttl=255 time=0.426 ms
64 bytes from 172.31.2.8: icmp_seq=9 ttl=255 time=0.503 ms
64 bytes from 172.31.2.8: icmp_seq=10 ttl=255 time=0.458 ms
64 bytes from 172.31.2.8: icmp_seq=11 ttl=255 time=0.443 ms
64 bytes from 172.31.2.8: icmp_seq=12 ttl=255 time=0.518 ms
64 bytes from 172.31.2.8: icmp_seq=13 ttl=255 time=0.522 ms
64 bytes from 172.31.2.8: icmp_seq=14 ttl=255 time=0.533 ms
```

Snapshot of network traffic between VM1 and VM2:

```
● ○ ● ■ courses — ec2-user@ip-172-31-6-165:~ — ssh -i AWS_EC2.pem ec2-user@ec2-18-222-166-114.us-east-2.compute.amazonaws.com — 139x31
  _| ( / Amazon Linux AMI
  ---|\---|---|

https://aws.amazon.com/amazon-linux-ami/2018.03-release-notes/
10 package(s) needed for security, out of 12 available
Run "sudo yum update" to apply all updates.
[ec2-user@ip-172-31-2-8 ~]$ ping 172.31.6.165
PING 172.31.6.165 (172.31.6.165) 56(84) bytes of data.
64 bytes from 172.31.6.165: icmp_seq=1 ttl=255 time=0.721 ms
64 bytes from 172.31.6.165: icmp_seq=2 ttl=255 time=0.416 ms
64 bytes from 172.31.6.165: icmp_seq=3 ttl=255 time=0.527 ms
64 bytes from 172.31.6.165: icmp_seq=4 ttl=255 time=0.441 ms
64 bytes from 172.31.6.165: icmp_seq=5 ttl=255 time=0.480 ms
64 bytes from 172.31.6.165: icmp_seq=6 ttl=255 time=0.508 ms
64 bytes from 172.31.6.165: icmp_seq=7 ttl=255 time=0.496 ms
64 bytes from 172.31.6.165: icmp_seq=8 ttl=255 time=0.449 ms
64 bytes from 172.31.6.165: icmp_seq=9 ttl=255 time=0.516 ms
64 bytes from 172.31.6.165: icmp_seq=10 ttl=255 time=0.537 ms
64 bytes from 172.31.6.165: icmp_seq=11 ttl=255 time=0.476 ms
64 bytes from 172.31.6.165: icmp_seq=12 ttl=255 time=0.569 ms
```


Snapshot of 2 amazon EC2 instance terminated:

```
Broadcast message from root@ip-172-31-6-165
(unknown) at 21:18 ...
```

```
The system is going down for power off NOW!
```

```
Broadcast message from root@ip-172-31-2-8
(unknown) at 21:18 ...
```

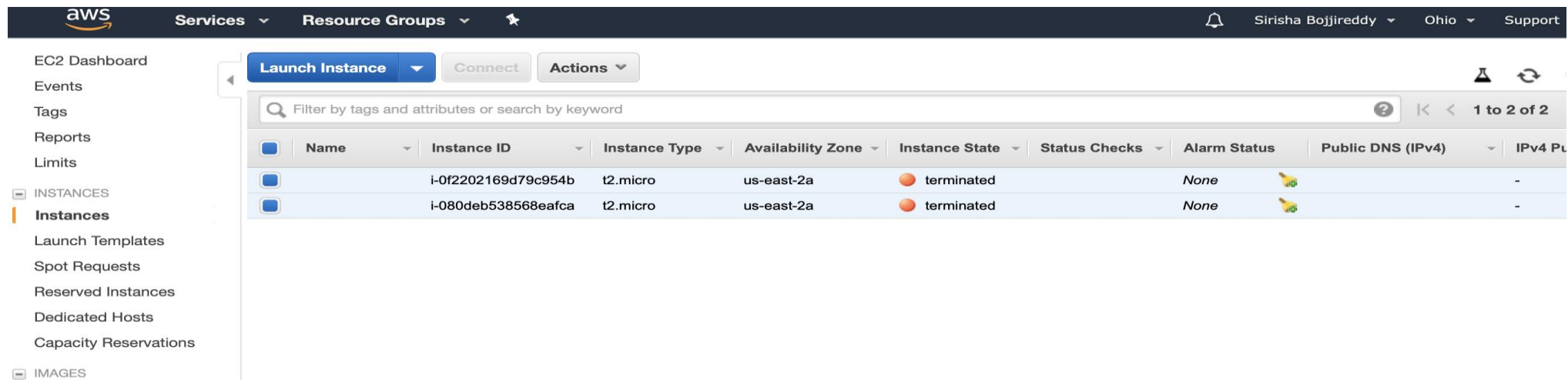
```
The system is going down for power off NOW!
```

```
Connection to ec2-3-17-154-128.us-east-2.compute.amazonaws.com closed by rem
```

```
Connection to ec2-3-17-154-128.us-east-2.compute.amazonaws.com closed.
```

```
[ec2-user@ip-172-31-2-8 ~]$ Connection to ec2-18-222-166-114.us-east-2.compu
```

```
Connection to ec2-18-222-166-114.us-east-2.compute.amazonaws.com closed.
```



The screenshot shows the AWS Management Console interface. The top navigation bar includes the AWS logo, 'Services', 'Resource Groups', and user information for 'Sirisha Bojjireddy' in 'Ohio'. The left sidebar shows the 'EC2 Dashboard' with various navigation options. The main content area displays a table of EC2 instances, with two instances listed as 'terminated'.

Name	Instance ID	Instance Type	Availability Zone	Instance State	Status Checks	Alarm Status	Public DNS (IPv4)	IPv4 P
	i-0f2202169d79c954b	t2.micro	us-east-2a	terminated		None		-
	i-080deb538568eafca	t2.micro	us-east-2a	terminated		None		-