

Ta Quang Tung – 104222196

COS20019 - Cloud Computing Architecture - Wk3: ACF Lab 2: Build a VPC and launch a Web Server

Search results for 'vpc'

Services (12)

Features (47)

Resources **New**

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- VPC** ☆ Isolated Cloud Resources
- AWS Firewall Manager** ☆ Central management of firewall rules
- Detective** ☆ Investigate and analyze potential security issues
- Managed Services** ☆ IT operations management for AWS

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- VPC Reachability Analyzer**
VPC feature
- Subnet groups**
ElastiCache feature
- Peering connections**
VPC feature
- VPC links**
API Gateway feature

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aws

Services

Search

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N. Virginia

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VPC dashboard

EC2 Global View

Filter by VPC:

Select a VPC

Virtual private cloud

Your VPCs

Subnets

Route tables

Internet gateways

Egress-only internet gateways

Carrier gateways

DHCP option sets

Elastic IPs

Managed prefix lists

Endpoints

Endpoint services

NAT gateways

Peering connections

Security

Network ACLs

Security groups

DNS firewall

Rule groups

Domain lists

Network Firewall

Firewalls

Firewall policies

Create VPC

Launch EC2 Instances

Note: Your Instances will launch in the US East region.

Resources by Region

Refresh Resources

You are using the following Amazon VPC resources

VPCs

See all regions

US East 2

NAT Gateways

See all regions

US East 0

Subnets

See all regions

US East 7

VPC Peering Connections

See all regions

US East 0

Route Tables

See all regions

US East 3

Network ACLs

See all regions

US East 2

Internet Gateways

See all regions

US East 2

Security Groups

See all regions

US East 3

Egress-only Internet Gateways

See all regions

US East 0

Customer Gateways

See all regions

US East 0

DHCP option sets

See all regions

US East 1

Virtual Private Gateways

See all regions

US East 0

Elastic IPs

See all regions

US East 1

Site-to-Site VPN Connections

See all regions

US East 0

Endpoints

See all regions

US East 0

Running Instances

See all regions

US East 1

Endpoint Services

See all regions

US East 0

Service Health

View complete service health details

Settings

Zones

Console Experiments

Additional Information

VPC Documentation

All VPC Resources

Forums

Report an Issue

AWS Network Manager

AWS Network Manager provides tools and features to help you manage and monitor your network on AWS. Network Manager makes it easier to perform connectivity management, network monitoring and troubleshooting, IP management, and network security and governance.

Get started with Network Manager

Site-to-Site VPN Connections

Amazon VPC enables you to use your own isolated resources within the AWS Cloud, and then connect those resources directly to your own datacenter using industry-standard encrypted IPsec VPN connections.

Create VPN Connection

Activate Windows

Go to Settings to activate Windows.

After verifying that the region is correctly N. Virginia, create a VPC in the VPC dashboard (step 6)

Services

Search

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N. Virginia

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VPC > Your VPCs > Create VPC

Create VPC [Info](#)

A VPC is an isolated portion of the AWS Cloud populated by AWS objects, such as Amazon EC2 instances. Mouse over a resource to highlight the related resources.

VPC settings

Resources to create [Info](#)

Create only the VPC resource or the VPC and other networking resources.

☐ VPC only

☒ VPC and more

Name tag auto-generation [Info](#)

Enter a value for the Name tag. This value will be used to auto-generate Name tags for all resources in the VPC.

☒ Auto-generate

lab

IPv4 CIDR block [Info](#)

Determine the starting IP and the size of your VPC using CIDR notation.

10.0.0.0/16 65,536 IPs

IPv6 CIDR block [Info](#)

☒ No IPv6 CIDR block

☐ Amazon-provided IPv6 CIDR block

Tenancy [Info](#)

Default

Number of Availability Zones (AZs) [Info](#)

Choose the number of AZs in which to provision subnets. We recommend at least two AZs for high availability.

1

2

3

Customize AZs

Preview

step 7

VPC [Show details](#)

Your AWS virtual network

lab-vpc

Subnets (2)

Subnets within this VPC

us-east-1a

lab-subnet-public1-us-east-1a

lab-subnet-private1-us-east-1a

Route tables (2)

Route network traffic to resources

lab-rtb-public

lab-rtb-private1-us-east-1a

Network connections (2)

Connections to other networks

lab-igw

lab-nat-public1-us-east-1a

choose VPC and more

enable auto-generation of name tag, set value to "lab"

keep the default IPv4 CIDR block

set number of availability zones to 1

Activate Windows

Go to Settings to activate Windows.

Number of public subnets [Info](#)
The number of public subnets to add to your VPC. Use public subnets for web applications that need to be publicly accessible over the internet.

0

1

Number of private subnets [Info](#)
The number of private subnets to add to your VPC. Use private subnets to secure backend resources that don't need public access.

0

1

2

▼ Customize subnets CIDR blocks

Public subnet CIDR block in us-east-1a

10.0.0.0/24256 IPs

Private subnet CIDR block in us-east-1a

10.0.1.0/24256 IPs

NAT gateways (\$) [Info](#)
Choose the number of Availability Zones (AZs) in which to create NAT gateways. Note that there is a charge for each NAT gateway.

None

In 1 AZ

1 per AZ

VPC endpoints [Info](#)
Endpoints can help reduce NAT gateway charges and improve security by accessing S3 directly from the VPC. By default, full access policy is used. You can customize this policy at any time.

None

S3 Gateway

DNS options [Info](#)

☒ Enable DNS hostnames

☒ Enable DNS resolution

► Additional tags

Preview

step 7 (continued)

VPC [Show details](#)
Your AWS virtual network

Subnets (2)
Subnets within this VPC

Route tables (2)
Route network traffic to resources

Network connections (2)
Connections to other networks

lab-vpc

us-east-1a

lab-subnet-public1-us-east-1a

lab-subnet-private1-us-east-1a

lab-rtb-public

lab-rtb-private1-us-east-1a

lab-igw

lab-nat-public1-us-east-1a

← set the number of public subnets to 1

← set the number of private subnets to 1

← change public subnet CIDR block to 10.0.0.0/24

← change private subnet CIDR block to 10.0.1.0/24

← set NAT gateways to In 1 AZ

← set VPC endpoints to none

← enable both DNS hostnames and DNS resolution

← step 9 - create VPC

step 8 - verify that all configurations are correct.

Cancel

Create VPC

Activate Windows
Go to Settings to activate Windows.

VPC > Your VPCs > Create VPC > Create VPC resources

Create VPC workflow

✓ Success

▼ Details

- ✓ Create VPC: [vpc-0fe9866c12e19462a](#)
- ✓ Enable DNS hostnames
- ✓ Enable DNS resolution
- ✓ Verifying VPC creation: [vpc-0fe9866c12e19462a](#)
- ✓ Create subnet: [subnet-096a42b574a87464f](#)
- ✓ Create subnet: [subnet-0de246ff396791e4e](#)
- ✓ Create internet gateway: [igw-0b79bb21329b50d2d](#)
- ✓ Attach internet gateway to the VPC
- ✓ Create route table: [rtb-0082ee2637d61723b](#)
- ✓ Create route
- ✓ Associate route table
- ✓ Allocate elastic IP: [eipalloc-0f51e2fdf4c22e8ba](#)
- ✓ Create NAT gateway: [nat-08d4481be5fccd811](#)
- ✓ Wait for NAT Gateways to activate
- ✓ Create route table: [rtb-0a2ed012df167c24a](#)
- ✓ Create route
- ✓ Associate route table
- ✓ Verifying route table creation

[View VPC](#)

step 9 + 10: VPC successfully created.

Activate Windows
Go to Settings to activate Windows.

aws

Services

Search

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VPC dashboard

EC2 Global View

Filter by VPC:

Select a VPC

Virtual private cloud

Your VPCs

Subnets

Route tables

Internet gateways

Egress-only internet gateways

Carrier gateways

DHCP option sets

Elastic IPs

Managed prefix lists

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Endpoint services

NAT gateways

Peering connections

Security

Network ACLs

Security groups

DNS firewall

Rule groups

Domain lists

Network Firewall

Firewalls

Firewall policies

Subnets (9)

Info

Filter subnets

1

Create subnet

	Name	Subnet ID	State	VPC	IPv4 CIDR	IPv6 CIDR	Available IPv4 addresses	Avai
<input type="checkbox"/>	-	subnet-0b1fcb1c00cf76c2d	Available	vpc-0415fdcc80c1d8355	172.31.0.0/20	-	4091	US-E
<input type="checkbox"/>	Work Public Subnet	subnet-0fddaf4736751890f	Available	vpc-0e366eb685274a64e Wo...	10.0.0.0/24	-	250	US-E
<input type="checkbox"/>	lab-subnet-private...	subnet-0de246ff396791e4e	Available	vpc-0fe9866c12e19462a lab...	10.0.1.0/24	-	251	US-E
<input type="checkbox"/>	-	subnet-0943fcc1bc3a76e14	Available	vpc-0415fdcc80c1d8355	172.31.64.0/20	-	4091	US-E
<input type="checkbox"/>	-	subnet-0b46f8ba3a2c6c372	Available	vpc-0415fdcc80c1d8355	172.31.80.0/20	-	4091	US-E
<input type="checkbox"/>	-	subnet-0dad7ded3a8709390	Available	vpc-0415fdcc80c1d8355	172.31.48.0/20	-	4091	US-E
<input type="checkbox"/>	-	subnet-0d47311fe776a03e9	Available	vpc-0415fdcc80c1d8355	172.31.32.0/20	-	4091	US-E
<input type="checkbox"/>	-	subnet-0d8c087c32961d183	Available	vpc-0415fdcc80c1d8355	172.31.16.0/20	-	4091	US-E
<input type="checkbox"/>	lab-subnet-public1...	subnet-096a42b574a87464f	Available	vpc-0fe9866c12e19462a lab...	10.0.0.0/24	-	250	US-E

Select a subnet

Activate Windows
Go to Settings to activate Windows.

step 11 - create a second public subnet

aws

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VPC > Subnets > Create subnet

Create subnet

VPC

VPC ID

Create subnets in this VPC.

vpc-0fe9866c12e19462a (lab-vpc)

Associated VPC CIDRs

IPv4 CIDRs

10.0.0.0/16

Subnet settings

Specify the CIDR blocks and Availability Zone for the subnet.

Subnet 1 of 1

Subnet name

Create a tag with a key of 'Name' and a value that you specify.

lab-subnet-public2

The name can be up to 256 characters long.

Availability Zone

Choose the zone in which your subnet will reside, or let Amazon choose one for you.

US East (N. Virginia) / us-east-1b

IPv4 CIDR block

10.0.2.0/24

Tags - optional

Key

Value - optional

Q Name X

Q lab-subnet-public2 X

Remove

step 12 - create the second public subnet

choose the lab-vpc ID

choose the subnet name lab-subnet-public2

chosed the availability zone us-east-1b

select the 10.0.2.0/24 address block

Activate Windows
Go to Settings to activate Windows.

aws Services Search [Alt+S] N. Virginia voclabs/user2564760=104222196@student.swin.edu.au @ 0653-8348...

VPC > Subnets > Create subnet

Create subnet [Info](#)

VPC

VPC ID
Create subnets in this VPC.

vpc-0fe9866c12e19462a (lab-vpc)

Associated VPC CIDRs

IPv4 CIDRs

10.0.0.0/16

Subnet settings

Specify the CIDR blocks and Availability Zone for the subnet.

Subnet 1 of 1

Subnet name
Create a tag with a key of 'Name' and a value that you specify.

lab-subnet-private2

The name can be up to 256 characters long.

Availability Zone [Info](#)
Choose the zone in which your subnet will reside, or let Amazon choose one for you.

US East (N. Virginia) / us-east-1b

IPv4 CIDR block [Info](#)

10.0.3.0/24

▼ Tags - optional

Key	Value - optional	
Name	lab-subnet-private2	Remove

step 13 + 14 - create the second private subnet (also 15)

choose the lab-vpc ID

choose subnet name lab-subnet-private2

select the second availability zone us-east-1b

choose the 10.0.3.0/24 address block

Activate Windows
Go to Settings to activate Windows.

aws

Services

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VPC dashboard

EC2 Global View

Filter by VPC:

Select a VPC

Virtual private cloud

Your VPCs

Subnets

Route tables

Internet gateways

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DHCP option sets

Elastic IPs

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Endpoints

Endpoint services

NAT gateways

Peering connections

Security

Network ACLs

Security groups

DNS firewall

Rule groups

Domain lists

Network Firewall

Firewalls

Firewall policies

Route tables (1/6)

Find resources by attribute or tag

Actions

Create route table

	Name	Route table ID	Explicit subnet associati...	Edge associations	Main	VPC	Owner ID
<input type="checkbox"/>	-	rtb-0ad3423f20af7907b	-	-	Yes	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input type="checkbox"/>	lab-rtb-public	rtb-0082ee2637d61723b	subnet-096a42b574a874...	-	No	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input type="checkbox"/>	-	rtb-023c96f462a7b2a98	-	-	Yes	vpc-0415fdcc80c1d8355	065383483938
<input type="checkbox"/>	Work Public Route Table	rtb-039cd60d24f8e2b9c	subnet-0fddaf47367518...	-	No	vpc-0e366eb685274a64e Wor...	065383483938
<input checked="" type="checkbox"/>	lab-rtb-private1-us-east-1a	rtb-0a2ed012df167c24a	subnet-0de246ff396791e...	-	No	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input type="checkbox"/>	-	rtb-0e7680cb24bcc6a73	-	-	Yes	vpc-0e366eb685274a64e Wor...	065383483938

rtb-0a2ed012df167c24a / lab-rtb-private1-us-east-1a

DetailsRoutesSubnet associationsEdge associationsRoute propagationTags

Routes (2)

Filter routes

Both

Edit routes

Destination	Target	Status	Propagated
0.0.0.0/0	nat-08d4481be5fccd811	Active	No
10.0.0.0/16	local	Active	No

steps 16-18: in the route tables screen, the routes tab for lab-rtb-private1-us-east-1a shows destination address range 0.0.0.0/0 is mapped to the NAT gateway target.

Activate Windows
Go to Settings to activate Windows.

VPC > Route tables > rtb-0a2ed012df167c24a > Edit subnet associations

Edit subnet associations

Change which subnets are associated with this route table.

Available subnets (2/4)

Filter subnet associations

	Name	Subnet ID	IPv4 CIDR	IPv6 CIDR	Route table ID
<input checked="" type="checkbox"/>	lab-subnet-private1-us-east-1a	subnet-0de246ff396791e4e	10.0.1.0/24	-	rtb-0a2ed012df167c24a / lab-rtb-private1-us-e...
<input type="checkbox"/>	lab-subnet-public2	subnet-06fd93a1977f10b4d	10.0.2.0/24	-	Main (rtb-0ad3423f20af7907b)
<input checked="" type="checkbox"/>	lab-subnet-private2	subnet-07d36f1e07c48d38f	10.0.3.0/24	-	Main (rtb-0ad3423f20af7907b)
<input type="checkbox"/>	lab-subnet-public1-us-east-1a	subnet-096a42b574a87464f	10.0.0.0/24	-	rtb-0082ee2637d61723b / lab-rtb-public

Selected subnets

subnet-0de246ff396791e4e / lab-subnet-private1-us-east-1a X subnet-07d36f1e07c48d38f / lab-subnet-private2 X

Cancel Save associations

steps 19-22: Editing subnet associations to also associate the newly created second private subnet to the private route table.

aws

Services

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VPC dashboard

EC2 Global View

Filter by VPC:

Select a VPC

Virtual private cloud

Your VPCs

Subnets

Route tables

Internet gateways

Egress-only internet gateways

Carrier gateways

DHCP option sets

Elastic IPs

Managed prefix lists

Endpoints

Endpoint services

NAT gateways

Peering connections

Security

Network ACLs

Security groups

DNS firewall

Rule groups

Domain lists

Network Firewall

Firewalls

Firewall policies

You have successfully updated subnet associations for rtb-0a2ed012df167c24a / lab-rtb-private1-us-east-1a.

Route tables (1/6)

Find resources by attribute or tag

Actions

Create route table

	Name	Route table ID	Explicit subnet associati...	Edge associations	Main	VPC	Owner ID
<input type="checkbox"/>	-	rtb-0ad3423f20af7907b	-	-	Yes	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input checked="" type="checkbox"/>	lab-rtb-public	rtb-0082ee2637d61723b	subnet-096a42b574a874...	-	No	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input type="checkbox"/>	-	rtb-023c96f462a7b2a98	-	-	Yes	vpc-0415fdcc80c1d8355	065383483938
<input type="checkbox"/>	Work Public Route Table	rtb-039cd60d24f8e2b9c	subnet-0fddaf47367518...	-	No	vpc-0e366eb685274a64e Wor...	065383483938
<input type="checkbox"/>	lab-rtb-private1-us-east-1a	rtb-0a2ed012df167c24a	2 subnets	-	No	vpc-0fe9866c12e19462a lab-vpc	065383483938
<input type="checkbox"/>	-	rtb-0e7680cb724b7c6a73	-	-	Yes	vpc-0e366eb685274a64e Wor...	065383483938

rtb-0082ee2637d61723b / lab-rtb-public

DetailsRoutesSubnet associationsEdge associationsRoute propagationTags

Routes (2)

Filter routes

Both

Edit routes

Destination	Target	Status	Propagated
0.0.0.0/0	igw-0b79bb21329b50d2d	Active	No
10.0.0.0/16	local	Active	No

step 23-24: The route table for the first subnet.

Activate Windows
Go to Settings to activate Windows.

aws

Services

Search

[Alt+S]

N. Virginia

voclabs/user2564760=104222196@student.swin.edu.au @ 0653-8348...

VPC > Route tables > rtb-0082ee2637d61723b > Edit subnet associations

Edit subnet associations

Change which subnets are associated with this route table.

Available subnets (2/4)

Filter subnet associations

< 1 >

	Name	Subnet ID	IPv4 CIDR	IPv6 CIDR	Route table ID
<input type="checkbox"/>	lab-subnet-private1-us-east-1a	subnet-0de246ff396791e4e	10.0.1.0/24	-	rtb-0a2ed012df167c24a / lab-rtb-private1-us-e...
<input checked="" type="checkbox"/>	lab-subnet-public2	subnet-06fd93a1977f10b4d	10.0.2.0/24	-	Main (rtb-0ad3423f20af7907b)
<input type="checkbox"/>	lab-subnet-private2	subnet-07d36f1e07c48d38f	10.0.3.0/24	-	rtb-0a2ed012df167c24a / lab-rtb-private1-us-e...
<input checked="" type="checkbox"/>	lab-subnet-public1-us-east-1a	subnet-096a42b574a87464f	10.0.0.0/24	-	rtb-0082ee2637d61723b / lab-rtb-public

Selected subnets

subnet-096a42b574a87464f / lab-subnet-public1-us-east-1a X subnet-06fd93a1977f10b4d / lab-subnet-public2 X

Cancel

Save associations

step 25-28: associate the second public subnet with the same route table as the first subnet.

Activate Windows
Go to Settings to activate Windows.

VPC > Security Groups > Create security group

Create security group [Info](#)

A security group acts as a virtual firewall for your instance to control inbound and outbound traffic. To create a new security group, complete the fields below.

Basic details

Security group name [Info](#)

Web Security Group

Name cannot be edited after creation.

Description [Info](#)

Enable HTTP access

VPC [Info](#)

vpc-0fe9866c12e19462a

steps 29-33: creating a security group

← set the group name to Web Security Group

← set the description to Enable HTTP access

← choose the lab VPC

Inbound rules [Info](#)

Type [Info](#)

HTTP

Protocol [Info](#)

TCP

Port range [Info](#)

80

Source [Info](#)

Anywhere-I...

Q

0.0.0.0/0 X

Description - optional [Info](#)

Permit web requests

Delete

Add rule

add a new inbound rule with the correct type, source and description

Outbound rules [Info](#)

Type [Info](#)

All traffic

Protocol [Info](#)

All

Port range [Info](#)

All

Destination [Info](#)

Custom

Q

Description - optional [Info](#)

Delete

Activate Windows
Go to Settings to activate Windows.

aws

Services

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N. Virginia

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EC2 > Instances > Launch an instance

Launch an instance Info

Amazon EC2 allows you to create virtual machines, or instances, that run on the AWS Cloud. Quickly get started by following the simple steps below.

steps 34-37: creating a new EC2 instance

Name and tags Info

Name **name the instance**
Web Server 1

Add additional tags

Application and OS Images (Amazon Machine Image) Info

An AMI is a template that contains the software configuration (operating system, application server, and applications) required to launch your instance. Search or Browse for AMIs if you don't see what you are looking for below

Recents

Quick Start

Amazon Linux

macOS

Ubuntu

Windows

Red Hat

S

aws

Mac

ubuntu

Microsoft

Red Hat

>

Browse more AMIs

Including AMIs from AWS, Marketplace and the Community

Amazon Machine Image (AMI)

Amazon Linux 2023 AMI

ami-0889a44b331db0194 (64-bit (x86)) / ami-08fc6fb8ad2e794bb (64-bit (Arm))

Virtualization: hvm ENA enabled: true Root device type: ebs

Free tier eligible

Summary

Number of instances Info
1

Software Image (AMI)
Amazon Linux 2023 AMI 2023.0.2...read more
ami-0889a44b331db0194

Virtual server type (instance type)
t2.micro

Firewall (security group)
Web Security Group

Storage (volumes)
1 volume(s) - 8 GiB

Free tier: In your first year includes 750 hours of t2.micro (or t3.micro in the Regions in which t2.micro is unavailable) instance usage on free tier AMIs per month, 30 GiB of EBS storage, 2 million IOs, 1 GB of snapshots, and 100 GB of bandwidth to the internet.

×

Cancel

Launch instance

Review commands

Activate Windows
Go to Settings to activate Windows.

CloudShell Feedback Language

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▼ Instance type

Info

steps 38,39: choose an instance type and keypair

Instance type

t2.micro

Family: t2 1 vCPU 1 GiB Memory Current generation: true

On-Demand Windows pricing: 0.0162 USD per Hour

On-Demand SUSE pricing: 0.0116 USD per Hour

On-Demand RHEL pricing: 0.0716 USD per Hour

On-Demand Linux pricing: 0.0116 USD per Hour

Free tier eligible

All generations

Compare instance types

▼ Key pair (login)

Info

You can use a key pair to securely connect to your instance. Ensure that you have access to the selected key pair before you launch the instance.

Key pair name - required

vockey

Create new key pair

keypair name is vockey

▼ Network settings

Info

VPC - required

vpc-0fe9866c12e19462a (lab-vpc)

10.0.0.0/16

Subnet

subnet-06fd93a1977f10b4d

lab-subnet-public2

VPC: vpc-0fe9866c12e19462a Owner: 065383483938 Availability Zone: us-east-1b

IP addresses available: 251 CIDR: 10.0.2.0/24

Create new subnet

Auto-assign public IP

Enable

▼ Summary

Number of instances

1

Software Image (AMI)

Amazon Linux 2023 AMI 2023.0.2...read more

ami-0889a44b331db0194

Virtual server type (instance type)

t2.micro

Firewall (security group)

Web Security Group

Storage (volumes)

1 volume(s) - 8 GiB

Free tier: In your first year includes 750 hours of t2.micro (or t3.micro in the Regions in which t2.micro is unavailable)

instance usage on free tier AMIs per month, 30 GiB of EBS storage, 2 million IOs, 1 GB of snapshots, and 100 GB of bandwidth to the internet.

Cancel

Launch instance

Review commands

Activate Windows

Go to Settings to activate Windows.

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N. Virginia

voclabs/user2564760=104222196@student.swin.edu.au @ 0653-8348...

vockey

Create new key pair

▼ Network settings

Info

step 40: configuring the instance's network settings

VPC - required

Info

vpc-0fe9866c12e19462a (lab-vpc)

10.0.0.0/16

choose the lab VPC

Subnet

Info

subnet-06fd93a1977f10b4d

lab-subnet-public2

VPC: vpc-0fe9866c12e19462a

Owner: 065383483938

Availability Zone: us-east-1b

IP addresses available: 251

CIDR: 10.0.2.0/24

select the public subnet

Create new subnet

Auto-assign public IP

Info

Enable

enable auto assign public IP

Firewall (security groups)

Info

A security group is a set of firewall rules that control the traffic for your instance. Add rules to allow specific traffic to reach your instance.

Create security group

Select existing security group

Common security groups

Info

Select security groups

Web Security Group

sg-02e8ec5a81190200a

VPC: vpc-0fe9866c12e19462a

select the existing Web Security Group

Compare security group rules

Security groups that you add or remove here will be added to or removed from all your network interfaces.

► Advanced network configuration

▼ Configure storage

Info

Advanced

1x

8

GiB

gp3

Root volume (Not encrypted)

▼ Summary

Number of instances

Info

1

Software Image (AMI)

Amazon Linux 2023 AMI 2023.0.2...read more

ami-0889a44b331db0194

Virtual server type (instance type)

t2.micro

Firewall (security group)

Web Security Group

Storage (volumes)

1 volume(s) - 8 GiB

Free tier: In your first year includes 750 hours of t2.micro (or t3.micro in the Regions in which t2.micro is unavailable) instance usage on free tier AMIs per month, 30 GiB of EBS storage, 2 million IOs, 1 GB of snapshots, and 100 GB of bandwidth to the internet.

Cancel

Launch instance

Review commands

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Feedback

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Common security groups

Select security groups

Web Security Group sg-02e8ec5a81190200a VPC: vpc-0fe9866c12e19462a

Compare security group rules

Security groups that you add or remove here will be added to or removed from all your network interfaces.

Advanced network configuration

Configure storage

Advanced

1x 8 GiB gp3 Root volume (Not encrypted)

Add new volume

0 x File systems

Edit

Advanced details

Info

Purchasing option Request Spot Instances

Domain join directory Select Create new directory

IAM instance profile Select Create new IAM profile

Hostname type

Summary

Number of instances 1

Software Image (AMI) Amazon Linux 2023 AMI 2023.0.2...read more ami-0889a44b331db0194

Virtual server type (instance type) t2.micro

Firewall (security group) Web Security Group

Storage (volumes) 1 volume(s) - 8 GiB

Free tier: In your first year includes 750 hours of t2.micro (or t3.micro in the Regions in which t2.micro is unavailable) instance usage on free tier AMIs per month, 30 GiB of EBS storage, 2 million IOs, 1 GB of snapshots, and 100 GB of bandwidth to the internet.

Cancel Launch instance Review commands

step 41 - keep the default storage setting

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The selected instance type does not support CPU options.

Metadata accessible [Info](#)

Select

Metadata transport

Select

Metadata version [Info](#)

Select

Metadata response hop limit [Info](#)

Select

Allow tags in metadata [Info](#)

Select

User data - optional [Info](#)

Enter user data in the field.

```
#!/bin/bash
# Install Apache Web Server and PHP
dnf install -y httpd wget php mariadb105-server
# Download Lab files
wget https://aws-tc-largeobjects.s3.us-west-2.amazonaws.com/CUR-TF-100-ACCLFO-2/2-lab2-vpc/s3/lab-app.zip
unzip lab-app.zip -d /var/www/html/
# Turn on web server
chkconfig httpd on
service httpd start
```

☐ User data has already been base64 encoded

▼ Summary

Number of instances [Info](#)

1

Software Image (AMI)

Amazon Linux 2023 AMI 2023.0.2...[read more](#)

ami-0889a44b331db0194

Virtual server type (instance type)

t2.micro

Firewall (security group)

Web Security Group

Storage (volumes)

1 volume(s) - 8 GiB

❗ Free tier: In your first year includes 750 hours of t2.micro (or t3.micro in the Regions in which t2.micro is unavailable) instance usage on free tier AMIs per month, 30 GiB of EBS storage, 2 million IOs, 1 GB of snapshots, and 100 GB of bandwidth to the internet.

Cancel

Launch instance

[Review commands](#)

steps 42-43: add some startup script and launch the instance

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New EC2 Experience

Tell us what you think

EC2 Dashboard

EC2 Global View

Events

Limits

Instances

Instances

Instance Types

Launch Templates

Spot Requests

Savings Plans

Reserved Instances

Dedicated Hosts

Scheduled Instances

Capacity Reservations

Images

AMIs

AMI Catalog

Elastic Block Store

Volumes

Snapshots

Lifecycle Manager

Network & Security

Security Groups

Elastic IPs

Placement Groups

Instances (1/2) Info

Find instance by attribute or tag (case-sensitive)

	Name	Instance ID	Instance state	Instance type	Status check	Alarm status	Availability Zone	Public IPv4 DNS	Public IPv4 ...	Elastic IP
<input type="checkbox"/>	Bastion Host	i-081d103c69da7b57f	Running	t2.micro	2/2 checks passed	No alarms	us-east-1a	ec2-18-208-249-129.co...	18.208.249.129	-
<input checked="" type="checkbox"/>	Web Server 1	i-0793d6672868efec2	Running	t2.micro	2/2 checks passed	No alarms	us-east-1b	ec2-18-209-27-224.co...	18.209.27.224	-

steps 44-46: in the Instances window, the newly created Web Server 1 has passed both checks and is running with public IPv4 address 18.209.27.224

Instance: i-0793d6672868efec2 (Web Server 1)

Details

Security

Networking

Storage

Status checks

Monitoring

Tags

Instance summary Info

Instance ID

i-0793d6672868efec2 (Web Server 1)

IPv6 address

-

Hostname type

IP name: ip-10-0-2-198.ec2.internal

Answer private resource DNS name

-

Auto-assigned IP address

18.209.27.224 [Public IP]

IAM Role

Public IPv4 address

18.209.27.224 | open address

Instance state

Running

Private IP DNS name (IPv4 only)

ip-10-0-2-198.ec2.internal

Instance type

t2.micro

VPC ID

vpc-0fe9866c12e19462a (lab-vpc)

Subnet ID

Private IPv4 addresses

10.0.2.198

Public IPv4 DNS

ec2-18-209-27-224.compute-1.amazonaws.com | open address

Elastic IP addresses

-

AWS Compute Optimizer finding

User: arn:aws:sts::065383483938:assumed-role/voclabs/user2564760=104222196@student.swin.edu.au is not authorized to perform: compute-optimizer:GetEnrollmentStatus on resource: * because no identity-based policy allows the compute-optimizer:GetEnrollmentStatus action

Retry

Auto Scaling Group name

Activate Windows

Go to Settings to activate Windows.

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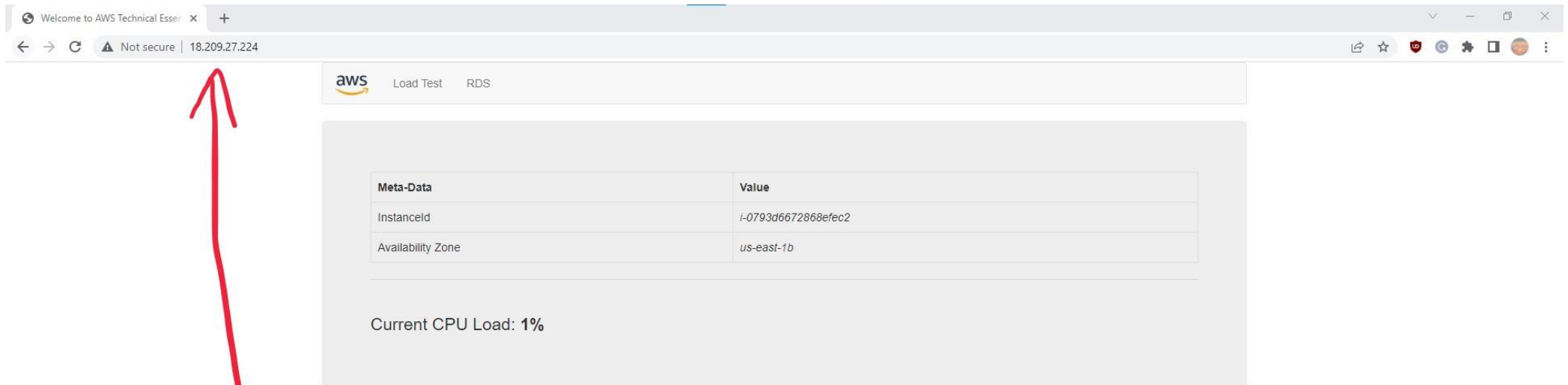
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steps 47-48: pasting the public IPv4 address into a browser window takes us to the correct website.