

Amazon Web Services Console

Kin Cheng

Setting up Identity Access Management (IAM)

Welcome to Identity and Access Management

IAM users sign-in link:

<https://kincheng101.signin.aws.amazon.com/console>

[Customize](#)

IAM Resources

Users: 1

Roles: 10

Groups: 1

Identity Providers: 0

Customer Managed Policies: 4

Security Status

5 out of 5 complete.

✓	Delete your root access keys	▼
✓	Activate MFA on your root account	▼
✓	Create individual IAM users	▼
✓	Use groups to assign permissions	▼
✓	Apply an IAM password policy	▼

1. Created **user** kin.cheng within a **group** called TeamCheng
2. TeamCheng has a policy of AdministratorAccess to grant highest level of access
3. Activated Multi-Factor Authentication for enhanced security
4. Configured strict password policy (i.e. password length, expiration, no password reuse)

Setting up S3 buckets

The screenshot shows the 'Lifecycle rule' configuration window in the AWS console, specifically the 'Review' step (indicated by a circled '4' in the progress bar). The progress bar at the top shows four steps: 'Name and scope', 'Transitions', 'Expiration', and 'Review'. The 'Review' step is active. The configuration details are as follows:

- Name and scope:** Name is 'MyLifecycleRule', Scope is 'Whole bucket'. There is an 'Edit' link.
- Transitions:** There are two sections. The first section, 'For current version of objects', has two transitions: 'Transition to Standard-IA after 30 days' and 'Transition to Amazon Glacier after 60 days'. The second section, 'For previous versions of objects', also has two transitions: 'Transition to Standard-IA after 30 days' and 'Transition to Amazon Glacier after 60 days'. There is an 'Edit' link.
- Expiration:** There are two settings: 'Expire after 425 days' and 'Permanently delete after 425 days'. There is an 'Edit' link.

At the bottom right, there are two buttons: 'Previous' and 'Save'.

1. Created bucket called kin.cheng.project.folder (global access)
2. By default, S3 buckets and items within are private. Configure to allow public access to bucket
3. Make each individual object in bucket public
4. Set Lifecycle rules to transition files from Standard to:
 - a. Standard-IA (infrequently accessed) after 30 days
 - b. Glacier after 60 days
5. Set Expiration after 425 days
6. Turn on Versioning to preserve, retrieve, and restore every version of every object in the S3 bucket

Setting up EC2

aws

Services

Resource Groups

★

1. Choose AMI

2. Choose Instance Type

3. Configure Instance

4. Add Storage

5. Add Tags

6. Configure Security Group

7. Review

Step 7: Review Instance Launch

Please review your instance launch details. You can go back to edit changes for each section. Click **Launch** to assign a key pair to your instance and complete the launch process.

▼ AMI Details

Free tier eligible

Amazon Linux AMI 2018.03.0 (HVM), SSD Volume Type - ami-0080e4c5bc078760e

The Amazon Linux AMI is an EBS-backed, AWS-supported image. The default image includes AWS command line tools, Python, Ruby, Perl, and Java. The repositories include Docker, PHP, MySQL, PostgreSQL, and other packages.

Root Device Type: ebs Virtualization type: hvm

▼ Instance Type

Instance Type	ECUs	vCPUs	Memory (GiB)	Instance Storage (GB)	EBS-Optimized Available	Network Performance
t2.micro	Variable	1	1	EBS only	-	Low to Moderate

▼ Security Groups

Security group name

WebCMZ

Description

launch-wizard-1 created 2019-01-07T19:41:43.821-05:00

Type	Protocol	Port Range	Source	Description
SSH	TCP	22	100.34.243.130/32	
HTTP	TCP	80	0.0.0.0/0	
HTTP	TCP	80	:::0	
HTTPS	TCP	443	0.0.0.0/0	
HTTPS	TCP	443	:::0	

► Instance Details

▼ Storage

Volume Type	Device	Snapshot	Size (GiB)	Volume Type	IOPS	Throughput (MB/s)	Delete on Termination	Encrypted
Root	/dev/xvda	snap-01691204be02804b	8	gp2	100 / 3000	N/A	Yes	Not Encrypted
ebs	/dev/sdb		8	gp2	100 / 3000	N/A	No	Not Encrypted

▼ Tags

Key	Value	Instances	Volumes
Name	MyEc2WebServer	✓	✓
Department	Developer Department	✓	✓
Team	Cheng	✓	✓

1. Select Linux operating system. Default image includes Python, MySQL, PostgreSQL, and other packages
2. Choose t2.micro which has low to moderate network performance
3. Add tags such as {"Name" : "MyEc2WebServer", "Department" : "Developer Department"}
4. Add Security Group as a virtual firewall for this instance.
5. Use CloudWatch to monitor resources and cost of ownership