

Lab Assignment-6

ECSE304L: Cloud Computing

Name: Tanvi Penumudy

Enroll no: E18CSE187

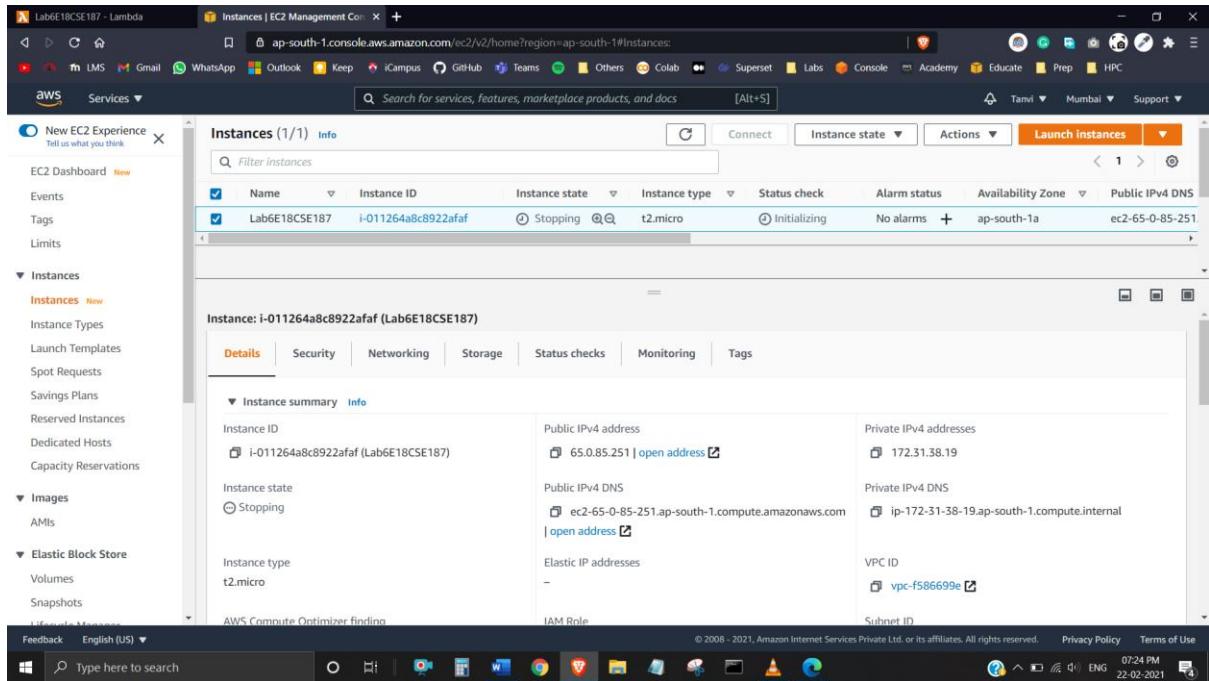
Batch: EB02

AWS Free Tier Console Name – Tanvi

Lab Activities:

- **Task A.6.1:** Start/Stop EC2 instances using AWS Lambda and CloudWatch Events Scheduler
- **Task A.6.2:** Create Alexa Skills with AWS Lambda using Python.

Task A.6.1



IAM Management Console

console.aws.amazon.com/iam/home?region=ap-south-1#/rolesNew?step=review&commonUseCase=Lambda%2BLambda&sel...

Services ▾

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Tanvi ▾ Global ▾ Support ▾

Create role

Review

Provide the required information below and review this role before you create it.

Role name* Lab6E18CSE187CC
Use alphanumeric and *_=,@_- characters. Maximum 64 characters.

Role description Allows Lambda functions to start and stop EC2 instances on your behalf.
Maximum 1000 characters. Use alphanumeric and *_=,@_- characters.

Trusted entities AWS service: lambda.amazonaws.com

Policies AWSLambdaBasicExecutionRole, AmazonEC2FullAccess

Permissions boundary Permissions boundary is not set

The new role will receive the following tag

Key	Value
* Required	

Cancel Previous Create role

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Lambda

ap-south-1.console.aws.amazon.com/lambda/home?region=ap-south-1#/create/function

Services ▾

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Tanvi ▾ Mumbai ▾ Support ▾

Basic information

Function name Lab6E18CSE187
Enter a name that describes the purpose of your function.
Use only letters, numbers, hyphens, or underscores with no spaces.

Runtime Python 3.8
Info Choose the language to use for your function.

Permissions Info By default, Lambda will create an execution role with permissions to upload logs to Amazon CloudWatch Logs. You can customize this default role later when adding triggers.

Change default execution role

Execution role Choose a role that defines the permissions of your function. To create a custom role, go to the IAM console.

Create a new role with basic Lambda permissions
 Use an existing role
 Create a new role from AWS policy templates

Existing role Choose an existing role that you've created to be used with this Lambda function. The role must have permission to upload logs to Amazon CloudWatch Logs.
Lab6E18CSE187CC
View the Lab6E18CSE187CC role on the IAM console.

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The screenshot shows the AWS Lambda function code editor. The code is as follows:

```
1 import boto3
2 region = 'ap-south-1'
3 instances = ['i-0112648c8922afaf']
4 ec2 = boto3.client('ec2', region_name=region)
5
6 def lambda_handler(event, context):
7     ec2.start_instances(InstanceIds=instances)
8     print('starting your instances: ' + str(instances))
```

The screenshot shows the AWS Lambda function execution results. The status is Succeeded, and the duration was 555.54 ms. The logs show the function starting instances.

```
START RequestId: 1f3302ae-120e-447e-albf-6f65a80025ad Version: $LATEST
starting your instances: ['i-0112648c8922afaf']
END RequestId: 1f3302ae-120e-447e-albf-6f65a80025ad
REPORT RequestId: 1f3302ae-120e-447e-albf-6f65a80025ad Duration: 555.54 ms Billed Duration: 556 ms Memory Size: 128 MB Max Memory Used: 83 MB Init Duration: 380.60 ms
```

Screenshot of the AWS Lambda console showing the execution result for the function Lab6E18CSE187.

Execution result: succeeded (logs)

The area below shows the result returned by your function execution. [Learn more](#) about returning results from your function.

```
null
```

Summary

Code SHA-256	Request ID
b7anQ6n8CZ7QOArugEqqm6k2UW6LkNGgb6Crgz4KGvE=	1f3302ae-120e-447e-a1bf-6f65a80025ad
Init duration	Duration
380.60 ms	555.54 ms
Billed duration	Resources configured
556 ms	128 MB
Max memory used	
83 MB	

Log output

The section below shows the logging calls in your code. [Click here](#) to view the corresponding CloudWatch log group.

```
START RequestId: 1f3302ae-120e-447e-a1bf-6f65a80025ad Version: $LATEST
```

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Screenshot of the AWS EC2 Management Console showing the Instances page.

Instances (1/1) Info

Name	Instance ID	Instance state	Instance type	Status check	Alarm status	Availability Zone	Public IPv4 DNS
Lab6E18CSE187	i-011264a8c8922afaf	Running	t2.micro	Initializing	No alarms	ap-south-1a	ec2-13-234-48-1

Instance: i-011264a8c8922afaf (Lab6E18CSE187)

Details Security Networking Storage Status checks Monitoring Tags

Instance summary

Instance ID	Public IPv4 address	Private IPv4 addresses
i-011264a8c8922afaf (Lab6E18CSE187)	13.234.48.158 open address	172.31.38.19
Instance state	Public IPv4 DNS	Private IPv4 DNS
Running	ec2-13-234-48-158.ap-south-1.compute.amazonaws.com open address	ip-172-31-38-19.ap-south-1.compute.internal
Instance type	Elastic IP addresses	VPC ID
t2.micro	-	vpc-f586699e
AWS Compute Optimizer finding	IAM Role	Subnet ID

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The screenshot shows the AWS Lambda console interface for creating a new function. The 'Basic information' section is active, displaying:

- Function name:** Lab6E18CSE187-2
- Runtime:** Python 3.8
- Permissions:** A note stating "By default, Lambda will create an execution role with permissions to upload logs to Amazon CloudWatch Logs. You can customize this default role later when adding triggers."
- Execution role:** A dropdown menu set to Lab6E18CSE187CC.

The browser status bar at the bottom indicates the URL is ap-south-1.console.aws.amazon.com/lambda/home?region=ap-south-1#/create/function.

The screenshot shows the AWS Lambda function configuration interface for Lab6E18CSE187-2. The 'Function code' tab is active, displaying the following Python code in the 'lambda_function' file:

```
1 import boto3
2 region = 'ap-south-1'
3 instances = ['i-011264a8c8922afaf']
4 ec2 = boto3.client('ec2', region_name=region)
5
6 def lambda_handler(event, context):
7     ec2.stop_instances(InstanceIds=instances)
8     print('stopped your instances: ' + str(instances))
```

The browser status bar at the bottom indicates the URL is ap-south-1.console.aws.amazon.com/lambda/home?region=ap-south-1#/functions/Lab6E18CSE187-2?newFunction=true&tab=Code.

The screenshot shows the AWS Lambda console interface. At the top, there are two tabs: "Lab6E18CSE187-2 - Lambda" and "Lab6E18CSE187 - Lambda". The URL in the address bar is ap-south-1.console.aws.amazon.com/lambda/home?region=ap-south-1#/functions/Lab6E18CSE187-2?newfunction=true&tab=function. The main area displays the "Function code" tab with the file "lambda_function.py" open. The code contains a single line: "print('Hello World')". Below the code, the "Execution results" section shows a successful execution with the following details:

- Status: Succeeded
- Max memory used: 82 MB
- Time: 398.97 ms

The "Request ID" is 98608120-2324-4f3e-a893-a4a940f222c2.

This screenshot shows the AWS Lambda console with the "Execution result" details for the function. The ARN is listed as arn:aws:lambda:ap-south-1:634102821134:function:Lab6E18CSE187-2. The "Execution result: succeeded (logs)" section is expanded, showing the log output:

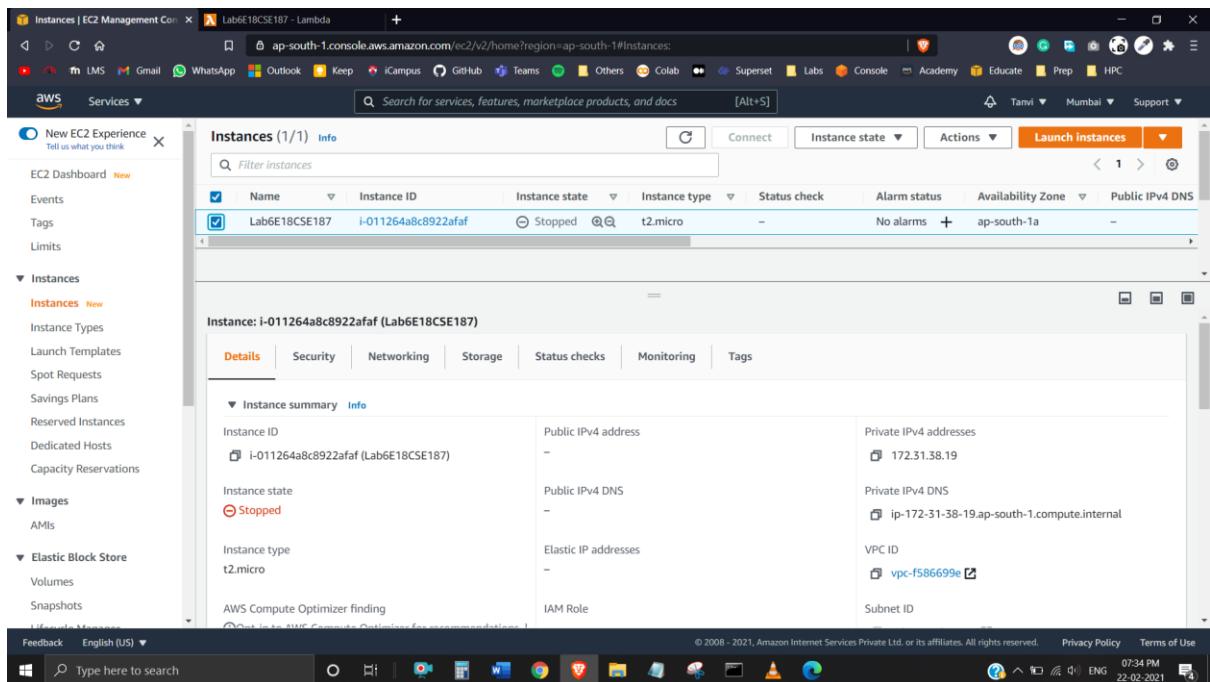
```
START RequestId: 98608120-2324-4f3e-a893-a4a940f222c2 Version: $LATEST
stopped your instances: ["i-011264a8c8992afaf"]
END RequestId: 98608120-2324-4f3e-a893-a4a940f222c2
REPORT RequestId: 98608120-2324-4f3e-a893-a4a940f222c2 Duration: 398.97 ms Billed Duration: 399 ms Memory Size: 128 MB Max Memory Used: 82 MB Init Duration: 350.79 ms
RequestID
98608120-2324-4f3e-a893-a4a940f222c2
```

The "Summary" section provides the following metrics:

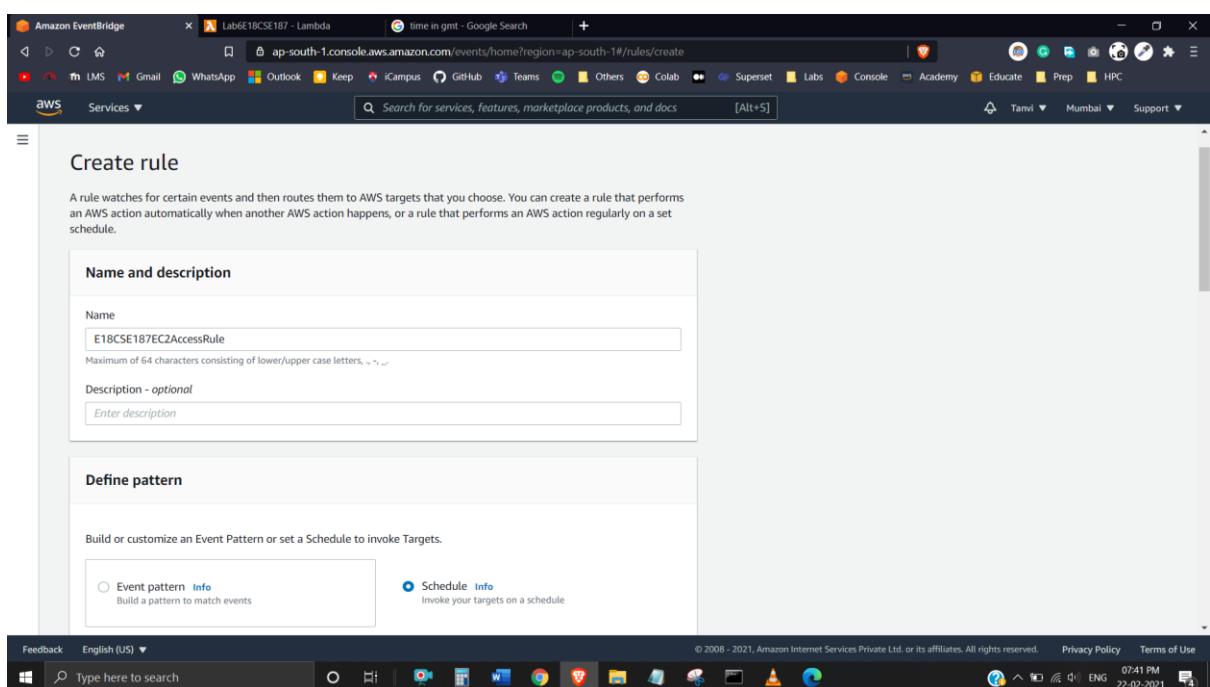
Code SHA-256	Request ID
k6pjRRsyYu3ZT0pamC46oNtaMhmbf75oi+OHhlClci=	98608120-2324-4f3e-a893-a4a940f222c2
Init duration	Duration
350.79 ms	398.97 ms
Billed duration	Resources configured
399 ms	128 MB
Max memory used	
82 MB	

The "Log output" section shows the CloudWatch log group for the function.

Screenshot of the AWS EC2 Management Console showing the Instances page. A single instance, Lab6E18CSE187, is listed as stopped. The instance details show it has a Public IPv4 address of 172.31.38.19 and a Private IPv4 DNS of ip-172-31-38-19.ap-south-1.compute.internal.



Screenshot of the AWS EventBridge console showing the 'Create rule' wizard. The 'Name and description' step is active, with the name 'E18CSE187EC2AccessRule' entered. The 'Define pattern' step is shown below, with the 'Schedule' option selected.



Amazon EventBridge

Lab6E18CSE187 - Lambda

time in gmt - Google Search

ap-south-1.console.aws.amazon.com/events/home?region=ap-south-1#/rules/create

Services ▾

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Fixed rate every

Cron expression

CRON expression has six required fields, which are separated by white space. [Learn more about CRON expression.](#) [Enter CRON expression below to see the next 10 trigger date\(s\).](#)

15 2 22 ? * *

Next 10 trigger date(s) GMT Hours

Tue, 22 Feb 2022 02:15:00 GMT
Wed, 22 Feb 2023 02:15:00 GMT
Thu, 22 Feb 2024 02:15:00 GMT
Sat, 22 Feb 2025 02:15:00 GMT
Sun, 22 Feb 2026 02:15:00 GMT
Mon, 22 Feb 2027 02:15:00 GMT
Tue, 22 Feb 2028 02:15:00 GMT
Thu, 22 Feb 2029 02:15:00 GMT
Fri, 22 Feb 2030 02:15:00 GMT
Sat, 22 Feb 2031 02:15:00 GMT

▶ Sample event(s)

Select event bus

Select an event bus for this rule.

AWS default event bus

Custom or partner event bus

Custom or partner event bus is not supported when Schedule is selected.

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07:41 PM 22-02-2021

This screenshot shows the 'Schedule' configuration step for a Lambda function. The user has chosen a 'Cron expression' and entered '15 2 22 ? * *'. A list of the next 10 trigger dates is displayed, starting from Tuesday, 22 Feb 2022 at 02:15:00 GMT. The interface also includes a 'Sample event(s)' button and a note about selecting an event bus.

Amazon EventBridge

Lab6E18CSE187 - Lambda

time in gmt - Google Search

ap-south-1.console.aws.amazon.com/events/home?region=ap-south-1#/rules/create

Services ▾

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Select targets

Select target(s) to invoke when an event matches your event pattern or when schedule is triggered (limit of 5 targets per rule).

Target

Select target(s) to invoke when an event matches your event pattern or when schedule is triggered (limit of 5 targets per rule).

Lambda function

Function

Lab6E18CSE187

Configure version/alias

Configure input

Retry policy and dead-letter queue

Add target

Tags - optional

Key Value

Enter key Enter value Remove tag

Feedback English (US) ▾

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This screenshot shows the 'Targets' configuration step for a Lambda function. The user has selected 'Lambda function' as the target and specified the function name 'Lab6E18CSE187'. There are options for configuring version/alias, input, and retry policies. The interface also includes a 'Tags' section for optional metadata.

Amazon EventBridge Lab6E18CSE187 - Lambda time in gmt - Google Search

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Rule E18CSE187EC2AccessRule was created successfully

Amazon EventBridge > Events > Rules

Rules

A rule watches for specific types of events. When a matching event occurs, the event is routed to the targets associated with the rule. A rule can be associated with one or more targets.

Select event bus

Event bus
Select or enter event bus name
default

Rules (1/1)

Name	Status	Type	Description
E18CSE187EC2AccessRule	Enabled	Scheduled Standard	



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Instances | EC2 Management Con X time in gmt - Google Search

Services ▾

New EC2 Experience Tell us what you think

EC2 Dashboard New

- Events
- Tags
- Limits

▼ Instances

- Instances New
- Instance Types
- Launch Templates
- Spot Requests
- Savings Plans
- Reserved Instances
- Dedicated Hosts
- Capacity Reservations

▼ Images

- AMIs

▼ Elastic Block Store

- Volumes
- Snapshots

Feedback English (US) ▾

Instances (1) Info

Name	Instance ID	Instance state	Instance type	Status check	Alarm status	Availability Zone	Public IPv4 DNS
Lab6E18CSE187	i-011264a8c8922afaf	Running	t2.micro	-	No alarms	ap-south-1a	ec2-13-126-14-1

Select an instance above

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07:42 PM ENG 22-02-2021

Amazon EventBridge Amazon EventBridge time in gmt - Google Search

ap-south-1.console.aws.amazon.com/events/home?region=ap-south-1#/eventbus/default/rules/E18CSE187EC2AccessRule/edit

Services ▾

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Tanvi ▾ Mumbai ▾ Support ▾

Define pattern

Build or customize an Event Pattern or set a Schedule to invoke Targets.

Event pattern Info
Build a pattern to match events

Schedule Info
Invoke your targets on a schedule

Fixed rate every Hours

Cron expression CRON expression have six required fields, which are separated by white space. [Learn more about CRON expression](#).

19 2 22 2 ? *

Next 10 trigger date(s) GMT

Tue, 22 Feb 2022 02:19:00 GMT
Wed, 22 Feb 2023 02:19:00 GMT
Thu, 22 Feb 2024 02:19:00 GMT
Sat, 22 Feb 2025 02:19:00 GMT
Sun, 22 Feb 2026 02:19:00 GMT
Mon, 22 Feb 2027 02:19:00 GMT
Tue, 22 Feb 2028 02:19:00 GMT
Thu, 22 Feb 2029 02:19:00 GMT
Fri, 22 Feb 2030 02:19:00 GMT
Sat, 22 Feb 2031 02:19:00 GMT

▶ Sample event(s)

Feedback English (US) ▾

Type here to search

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07:48 PM 22-02-2021

This screenshot shows the 'Define pattern' section of the AWS EventBridge console. It allows users to build an event pattern or set a schedule to invoke targets. In this case, a cron expression is selected. The cron expression '19 2 22 2 ? *' is entered into the input field. Below it, a list of the next 10 trigger dates from February 2022 to February 2031 is displayed. The interface includes tabs for 'Event pattern' and 'Schedule', and sections for 'Fixed rate every' and 'Cron expression'. A 'Sample event(s)' button is also present.

Amazon EventBridge Amazon EventBridge time in gmt - Google Search

ap-south-1.console.aws.amazon.com/events/home?region=ap-south-1#/eventbus/default/rules/E18CSE187EC2AccessRule/edit

Services ▾

Search for services, features, marketplace products, and docs [Alt+S]

Tanvi ▾ Mumbai ▾ Support ▾

Enable the rule on the selected event bus

Select targets

Select target(s) to invoke when an event matches your event pattern or when schedule is triggered (limit of 5 targets per rule).

Target Select target(s) to invoke when an event matches your event pattern or when schedule is triggered (limit of 5 targets per rule).

Lambda function

Function
Lab6E18CSE187-2
Retry policy and dead-letter queue

Tags - optional

Feedback English (US) ▾

Type here to search

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07:48 PM 22-02-2021

This screenshot shows the 'Select targets' section of the AWS EventBridge console. It allows users to choose targets to invoke when an event matches the event pattern or schedule. In this case, a Lambda function target is selected. The target is identified as 'Lab6E18CSE187-2'. Below the target, there are buttons for 'Configure version/alias', 'Configure input', and 'Retry policy and dead-letter queue'. An 'Add target' button is also present. The interface includes tabs for 'Event pattern' and 'Schedule', and sections for 'Fixed rate every' and 'Cron expression'. A 'Tags - optional' section is shown at the bottom.

The screenshot shows the AWS EC2 Management Console. The main pane displays a table of instances with one entry:

Name	Instance ID	Instance state	Instance type	Status check	Alarm status	Availability Zone	Public IPv4 DNS
Lab6E18CSE187	i-011264a8c8922afaf	Stopping	t2.micro	2/2 checks passed	No alarms	ap-south-1a	ec2-13-126-14-1

The left sidebar contains navigation links for EC2 Dashboard, Instances (with sub-links for Instance Types, Launch Templates, Spot Requests, Savings Plans, Reserved Instances, Dedicated Hosts, Capacity Reservations), Images (AMIs), and Elastic Block Store (Volumes, Snapshots).

Task A.6.2

The screenshot shows the Alexa Developer Console at developer.amazon.com/alexa/console/ask/create-new-skill. The page is titled "Create a new skill".

Skill name: InteractionWithAlexaE18CSE187
29/50 characters
Brand names are only allowed if you provide proof of rights in the testing instructions or if you use the brand name in a referential manner that doesn't imply ownership (examples of what can be added to a brand name for referential usage: unofficial, unauthorized, fan, fandom, for, about).

Default language: English (US)
More languages can be added to your skill after creation.

1. Choose a model to add to your skill
There are many ways to start building a skill. You can design your own custom model or start with a pre-built model. Pre-built models are interaction models that contain a package of intents and utterances that you can add to your skill.

Model: Custom
Host: Alexa-hosted (Node.js)
Hosting Region: US East (N. Virginia) ▾

The screenshot shows the Alexa Developer Console interface. At the top, there's a navigation bar with various links like LMS, Gmail, WhatsApp, Outlook, Keep, iCampus, GitHub, Teams, Others, Colab, Superset, Labs, Console, Academy, Educate, Prep, and HPC. Below the navigation bar, a message says "More languages can be added to your skill after creation".

1. Choose a model to add to your skill

There are many ways to start building a skill. You can design your own custom model or start with a pre-built model. Pre-built models are interaction models that contain a package of intents and utterances that you can add to your skill.

The screenshot displays a grid of skill models:

- Custom** (Selected): Design a unique experience for your users. A custom model enables you to create all of your skill's interactions.
Utterances: "Alexa, what's in the news?"
- Flash Briefing**: Give users control of their news feed. This pre-built model lets users control what updates they listen to.
Utterance: "Alexa, turn on the kitchen lights"
- Smart Home**: Give users control of their smart home devices. This pre-built model lets users turn off the lights and other devices without getting up.
Utterance: "Alexa, play music by Lady Gaga"
- Music**: Give users complete control of their music. This pre-built model lets users search, pause, skip, or shuffle in your skill.
Utterance: "Alexa, play Interstellar"
- Meetings**: This pre-built model leverages Alexa for Business APIs to allow users to search for and book available meeting rooms in their office.
Utterance: "Alexa, book a room"
- Education**: This pre-built model leverages Alexa Education APIs to let users know about upcoming coursework, recent grades and school communications.
Utterance: "Alexa, what's due tomorrow?"

2. Choose a method to host your skill's backend resources

You can provision your own backend resources or you can have Alexa host them for you. If you decide to have Alexa host your skill, you'll get access to our code. [Feedback](#) will allow you to deploy code directly to AWS Lambda from the developer console.



The screenshot shows the same grid of hosting methods as the previous section:

- Alexa-hosted (Node.js)** (Selected): Alexa will host skills in your account up to the AWS Free Tier limits and get you started with a Node.js template. You will gain access to AWS Lambda endpoints in all Alexa service regions, a DynamoDB table for data persistence, and S3 for media storage. [Learn more](#)
- Alexa-hosted (Python)**: Alexa will host skills in your account up to the AWS Free Tier limits and get you started with a Python template. You will gain access to AWS Lambda endpoints in all Alexa service regions, a DynamoDB table for data persistence, and S3 for media storage. [Learn more](#)
- Provision your own**: Provision your own endpoint and backend resources for your skill. This is recommended for skills that have significant data transfer requirements. You will not gain access to the console's code editor.

2. Choose a method to host your skill's backend resources

You can provision your own backend resources or you can have Alexa host them for you. If you decide to have Alexa host your skill, you'll get access to our code editor, which will allow you to deploy code directly to AWS Lambda from the developer console.



Alexa Developer Console

developer.amazon.com/alexa/console/ask/editor/templates?runtime=nodejs10.x&locale=en_US&name=InteractionWithAlexaE1... | 🔍

alex developer console

Choose a template to add to your skill

Select a skill template from the list below or import a skill shared by the Alexa community as a public Git repository.

Start from Scratch SELECTED

This skill gets you started with the required intents and with code demonstrating "Hello World" functionality if you are building an Alexa-hosted skill.

[Learn more](#)

By Alexa

Fact Skill

Build an engaging fact skill about any topic. Alexa will select a fact at random and share it with the user when the skill is invoked.

[Learn more](#)

↳ Includes: custom intents

By Alexa

High-Low Game Skill

Try to guess a target number in a given range and Alexa will tell you if the number she had in mind was higher or lower.

[Learn more](#)

↳ Includes: slots, custom intents, data persistence

By Alexa

Pet Tales Skill

Build a compelling multi-turn conversational audio and visual experience for a user looking for her favorite pet.

[Learn more](#)

↳ Includes: APL for Audio, API, custom intents, data persistence

By Alexa

Fruit Shop Skill

Build a multi-modal grocery shopping skill using custom and library controls for item lists, shopping cart management, and checkout.

[Learn more](#)

↳ Includes: ASK SDK Controls Framework Preview, API

By Alexa

Scheduling Skill

Build a skill to allow users to schedule appointments on your calendar, receive email confirmations and reminders.

[Learn more](#)

↳ Includes: voice permissions, reminders, API calls, session persistence

By Dabbie Lab

Survey Skill

Build a stand-up or survey skill that uses passcodes to allow only authorized users to provide updates and respond to questions.

[Learn more](#)

↳ Includes: using passcodes, API calls, session persistence

By Dabbie Lab

Intro to Alexa Conversations

This skill introduces you to Alexa Conversations by providing basic "Hello World" functionality and generating a voice response from Alexa.

[Learn more](#)

↳ Includes: Alexa Conversations Preview, APL, API for Audio, session persistence

By Alexa

Feedback X

Type here to search

08:06 PM 22-02-2021

Amazon Alexa Console - Amazon

developer.amazon.com/alexa/console/ask

alex developer console

Alexa Conversations

Alexa Conversations (beta) lets you create Alexa skills that feel more natural with fewer lines of code.

[Get Started](#)

Skills [Earnings](#) [Payments](#) [Hosting](#) [Settings](#)

Alexa Skills [Skill examples](#) [Learn more](#)

Search by skill name or skill ID

Create Skill

SKILL NAME	LANGUAGE	MODIFIED	STATUS	ACTIONS
InteractionWithAlexaE18CSE187	English (US)	2021-02-22	In Dev	Choose action

Custom-Copy Skill ID

View all skills

To Dos

Build a Multimodal Alexa Skill [Learn more](#)

Test Your Utterances as You Build Your Model [Learn more](#)

Learn from Alexa cookbook sample code [Learn more](#)

Announcements

Build Immersive Audio and Visual Alexa Skills with New Alexa Presentation Language (APL) Features

We are excited to announce new audio and visual features that enable you to build richer...

Feedback X

Type here to search

08:31 PM 22-02-2021

The screenshot shows the Alexa Developer Console interface. On the left, there's a sidebar with sections like 'CUSTOM' (Invocation, Interaction Model, Assets), 'MODELS', and 'TOOLS'. The main area has a heading 'How to get started' with a video thumbnail for 'Alexa Skills Kit Developer Tutorial for P...'. Below it is a 'Resources' section with links for 'Technical Walkthrough: Toolkit for VS Code', 'Watch: Simulate Skills in VS Code with Alexa Skills Toolkit', and 'Make Money'. To the right, a 'Skill builder checklist' is displayed with four items: 1. Invocation Name (status: Full Build Successful), 2. Intent (status: Add at least one intent and one sample utterance), 3. Build (status: Successf), and 4. Endpoint (status: New to Hello World?).

This screenshot shows the 'Invocation' configuration page. The sidebar includes 'Invocation' under 'CUSTOM', 'Interaction Model', 'Assets', 'Slot Types (0)', 'Multimodal Responses', 'Interfaces', and 'Endpoint'. The main content area is titled 'Invocation' and contains a note about users saying a skill's invocation name to begin an interaction. It shows an example interaction: 'User: Alexa, ask daily horoscopes for the horoscope for Gemini'. Below this is a 'Skill Invocation Name' input field with placeholder text 'test interaction'. A note states that brand names are only allowed if proof of rights is provided or used in a referential manner.

Alexa Developer Console

alexa developer console

Your Skills InteractionWithAlexaE18CSE187 Build Code Test Distribution Certification Analytics

English (US)

CUSTOM

Invocation

Interaction Model

Intents (7)

Annotation Sets New

Intent History

Utterance Conflicts (0)

JSON Editor

Assets

Slot Types (0)

Multimodal Responses

Interfaces

Endpoint

Feedback X

Save Model Version Build Model Update live skill Evaluate Model Export

Intents / InteractionIntent

Sample Utterances (5) Bulk Edit Export

What might a user say to invoke this intent? +

what are you doing

hi

hello

how are you

hey

Type here to search

08:13 PM 22-02-2021

Alexa Developer Console

alexa developer console

Your Skills InteractionWithAlexaE18CSE187 Build Code Test Distribution Certification Analytics

New File New Folder Delete Rename

DynamoDB Database S3 Storage CloudWatch Logs Usage AWS Integrate Download Offline Tools Docs

Save Deploy Promote to live Deploy before testing your skill

Skill Code

lambda

index.js

local-debugger.js

package.json

util.js

index.js

```
27 -   handle(handlerInput) {
28 -     const speakOutput = 'Hello World!';
29 -
30 -     return handlerInput.responseBuilder
31 -       .speak(speakOutput)
32 -       // .reprompt('add a reprompt if you want to keep the session open for the user to respond')
33 -       .getResponse();
34 -   }
35 -
36 -   const InteractionIntentHandler = {
37 -     handle(handlerInput) {
38 -       return Alexa.getRequestType(handlerInput.requestEnvelope) === 'IntentRequest'
39 -         && Alexa.getIntentName(handlerInput.requestEnvelope) === 'InteractionIntent';
40 -     },
41 -     handle(handlerInput) {
42 -       const speakOutput = 'Hello Tamvi! I am Alexa';
43 -
44 -       return handlerInput.responseBuilder
45 -         .speak(speakOutput)
46 -         // .reprompt('add a reprompt if you want to keep the session open for the user to respond')
47 -         .getResponse();
48 -     }
49 -   };
50 - };
51 - const HelpIntentHandler = {
52 -   handle(handlerInput) {
53 -     return Alexa.getRequestType(handlerInput.requestEnvelope) === 'IntentRequest'
54 -       && Alexa.getIntentName(handlerInput.requestEnvelope) === 'AMAZON.HelpIntent';
55 -   },
56 -   handle(handlerInput) {
57 -     const speakOutput = 'You can say hello to me! How can I help?';
58 -
59 -     return handlerInput.responseBuilder
60 -       .speak(speakOutput)
61 -       .reprompt('You can say hello to me! How can I help?');
62 -   }
63 - };
64 - 
```

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English (US) Feedback X

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Alexa Developer Console

developer.amazon.com/alexa/console/ask/editor/amzn1.ask.skill.496cf9ed-7654-42ad-a5d9-690ed93e4bc7/development/en_US

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Save Deploy Promote to live

Deploy before testing your skill

index.js

```
1 // * the intent being invoked or included it in the Skill builder below
2 // *
3 const ErrorHandler = {
4   canHandle() {
5     return true;
6   },
7   handle(handlerInput, error) {
8     const speakOutput = "Sorry, I had trouble doing what you asked. Please try again.";
9     console.log(`---- Error handled: ${JSON.stringify(error)}----`);
10
11   return handlerInput.responseBuilder
12     .speak(speakOutput)
13     .reprompt(speakOutput)
14     .getResponse();
15 }
16 /**
17 * This handler acts as the entry point for your skill, routing all request and response
18 * payloads to the handlers above. Make sure any new handlers or interceptors you've
19 * defined are included below. The order matters - they're processed top to bottom
20 */
21 exports.handler = Alexa.SkillBuilders.custom()
22   .addRequestHandlers(
23     LaunchRequestHandler,
24     HelloWorldIntentHandler,
25     InteractionIntentHandler,
26     HelpIntentHandler,
27     FallBackIntentHandler,
28     SessionEndedRequestHandler,
29     IntentReflectorHandler,
30     IntentErrorHandler,
31   )
32   .addErrorHandlers(
33     FallbackIntentHandler,
34   )
35   .withCustomUserAgent("sample/hello-world/v1.2")
36   .lambda();
```

English (US) Feedback

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Alexa Developer Console

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Last Deployed: Feb 22, 2021, 8:19 PM

index.js

```
1 /**
2 * This sample demonstrates handling intents from an Alexa skill using the Alexa Skills Kit SDK (v2).
3 * Please visit https://alexa.design/cookbook for additional examples on implementing slots, dialog management,
4 * session persistence, api calls, and more.
5 */
6 const Alexa = require('ask-sdk-core');
7
8 const LaunchRequestHandler = {
9   canHandle(handlerInput) {
10   return Alexa.getRequestType(handlerInput.requestEnvelope) === 'LaunchRequest';
11 },
12   handle(handlerInput) {
13   const speakOutput = 'Welcome, you can say Hello or Help. Which would you like to try?';
14
15   return handlerInput.responseBuilder
16     .speak(speakOutput)
17     .reprompt(speakOutput)
18     .getResponse();
19 }
20;
21 const HelloWorldIntentHandler = {
22   canHandle(handlerInput) {
23     return Alexa.getRequestType(handlerInput.requestEnvelope) === 'IntentRequest'
24       && Alexa.getIntentName(handlerInput.requestEnvelope) === 'HelloWorldIntent';
25   },
26   handle(handlerInput) {
27     const speakOutput = 'Hello World!';
28
29     return handlerInput.responseBuilder
30       .speak(speakOutput)
31       .reprompt('add a reprompt if you want to keep the session open for the user to respond')
32       .getResponse();
33 }
34 };
35;
```

Deployment Successful

If you make any new changes, you will need to deploy for them to take effect.

Feedback

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Alexa Developer Console

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English (US)

Save Model Version Build Model Update live skill Evaluate Model

Invocation

Users say a skill's invocation name to begin an interaction with a particular custom skill. For example, if the invocation name is "daily horoscopes", users can say:

User: Alexa, ask daily horoscopes for the horoscope for Gemini

Skill Invocation Name

How to pick names that are right for you

test interaction

Brand names are only allowed if you provide proof of rights in the testing instructions or if you use the brand name in a referential manner that doesn't imply ownership (examples of terms that can be added to a brand name for referential usage: unofficial, unauthorized, fan, fandom, for, about).

Full Build Successful

If you make any new changes, you will need to rebuild your model for them to take effect.

Interact with your model using Utterance Profiler

How was the build experience? Your feedback will help us improve our tooling and services.

English (US) Feedback

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Alexa Developer Console

alexa developer console

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Skill testing is enabled in: Development

Skill I/O Device Display Device Log

Alexa Simulator Manual JSON Voice & Tone

English (US)

Type or click and hold the mic

open test interaction

Welcome, you can say Hello or Help. Which would you like to try?

Skill Invocations | Viewing: 1 / 2

JSON Input 1

```
1- {
2-   "version": "1.0",
3-   "session": {
4-     "new": false,
5-     "sessionId": "amzn1.echo-api.session.c7b1b9f5-f48e-4503-
6-     "application": {
7-       "applicationId": "amzn1.ask.skill.496cf9ed-7654-42ad-a5d9-690ed93e4bc7"
8-     },
9-     "user": {
10-       "userId": "amzn1.ask.account.AF0IU27NWR5VCJJDZ4UHNUJZ"
11-     }
12-   },
13-   "context": {
14-     "Viewports": [
15-       {
16-         "type": "APL",
17-         "id": "main",
18-         "shape": "RECTANGLE",
19-         "display": "Landscape",
20-         "presentationType": "STANDARD",
21-         "canRotate": false,
22-         "configuration": {
23-           "current": {
24-             "mode": "HIER"
25-           }
26-         }
27-       }
28-     ]
29-   }
30- }
```

JSON Output 1

```
1- {
2-   "body": {
3-     "version": "1.0",
4-     "response": {
5-       "type": "_DEFAULT_RESPONSE"
6-     },
7-     "sessionAttributes": {},
8-     "userAgent": "ask-node/2.9.0 Node/v10.23.1 sample/hello-wor
9-   }
10- }
```

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