

A decorative border composed of various colorful abstract shapes, including semi-circles, triangles, and irregular polygons in shades of teal, orange, blue, green, purple, pink, and yellow, arranged in a repeating pattern around the central text.

NAMASTE NODE.JS SEASON 3

Episode-5

Hand Written Notes

-By Shanmuga Priya

www.linkedin.com/in/shanmuga-priya-e-tech2

Episode - 5

Sending Emails using Amazon SES (Simple Email Service)

Step 1: Set a new IAM user.

IAM (Identify and Access Management)

↳ it gives Permission to different services inside AWS.

→ To create a new user search "IAM" in search bar present in AWS

Console.

→ click on "user" then "create user" btn. add a username as you wish and click on next and set permission click on "attach policies directly"

it will display a list of policies search "amazonSES" in it and

* select "AmazonSESFullAccess" and click next it will take you to

the summary page click on "create new user".

→ Now user is successfully created.

Step 2: Setup SES account.

Once the IAM user is created search for "SES" in search bar to setup SES.

Step 1: Account creation:

click on "view get setup page" in the account dashboard and

it will take you to "get setup page" click on "create identity"

→ we can create identity either by using domain name (or) email address

Since we created a domain name already click on "domain" option.

and enter a domain name. and verify the domain name using

"Easy DKIM" type. select the key length of your choice. and click on "create Identity".

→ our Identity is created but its verification is in pending state to complete its verification, configure DKIM in DNS record of cloudflare.

Step 2: configuring DKIM in cloudflare

→ copy the CNAME records provided by DKIM identity to cloudflare's DNS record.

→ In cloudflare, go to DNS Records click on add record choose the type as "CNAME" and copy the CNAME Records from DKIM identity and turn off the proxy. (X)

→ Once the records are added SES takes some time to verify the records. once the identity is verified we can see the identity status as "Verified".

Step 3: Request Production action

→ Move back to setup page and click on "Request Production access" click on "Transactional" as mail type and provide our website url. and submit it.

→ It will take some time to grant permission.

Step 4: Using it in the code for sending Email

→ For that we need to get the credentials of the IAM user that we have created in step 1.

→ go to the user and click on "security credentials" click on "create Access Key" and select the usecase as others and give a tag name for it as your wish (or) just skip it and click on "Create access Key"

→ Now, the Secret key is generated copy it and place it in the .env file of our Project and also a access Key.

step 5: Copy the code from AWS SDK V3.

→ Google the AWS SDK V3 documentation and move onto Amazon SES search for sendEmail.

Step a: create sesclient.

→ In utils folder of our project, create a new file called "sesclient.js" and copy the sesclient code from github repo.

→ In order to use this code we need to install package

npm i @aws-sdk/client-ses

and edit the code to include access key.

eg: //sesclient.js

```
const { SESClient } = require("@aws-sdk/client-ses")
```

const REGION = "us-east-1" → it should be equal to the region where we sending from.

```
const sesclient = new SESClient({  
  region: REGION,
```

```
    credentials: {  
      accessKeyId: process.env.AWS_ACCESS_KEY,  
      secretAccessKey: process.env.AWS_SECRET_KEY,  
    },  
  },  
})
```

```
module.exports = { sesclient }
```

step b: write a code for sending emails.

→ copy the code of sendmail from github repo of aws SDK V3.

and edit the recipient & sender email address.

→ the email we are using here should be verified as user in IAM.
if not add a new user in IAM with this email.

step: Using the sendmail fn in project:

whenever a connection req is ~~send~~ made it should send a email to the other user.

eg:

//api for sending connection req.

```
const const sendEmail = require ("../utils/sendEmail")
```

```
requestRouter.post("/request/send/:status/:toUserId", userAuth,
```

```
  async(req, res) => {
```

```
    try {
```

----- Logic for sending a connection req -----

```
const emailRes = await sendEmail.run()
```

```
console.log(emailRes)
```

----- sending res to user -----

```
  } catch {}
```

```
  }
```

```
})
```

Whenever Person 1 makes connect req to Person 2, email is send to Person 2 stating that Person 1 send you a connection req.

X