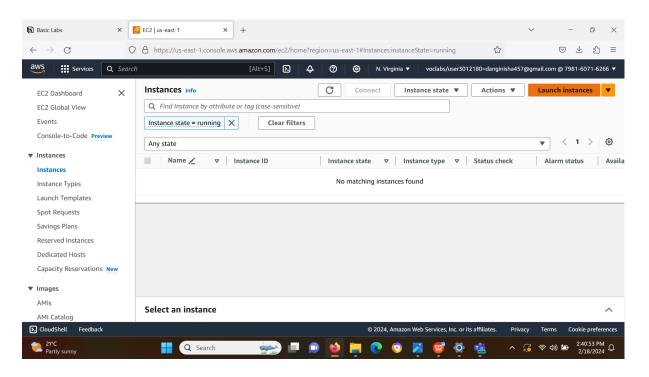
## **EC2 Basics Lab**

Objective: To understand the process of setting up and managing an Amazon EC2 instance. Approach: Students will start by launching a new EC2 instance, selecting an appropriate instance type and configuring the instance details. They will then create and configure a new Security Group, and allocate an Elastic IP address to the instance. The lab will also include connecting to the instance via SSH.

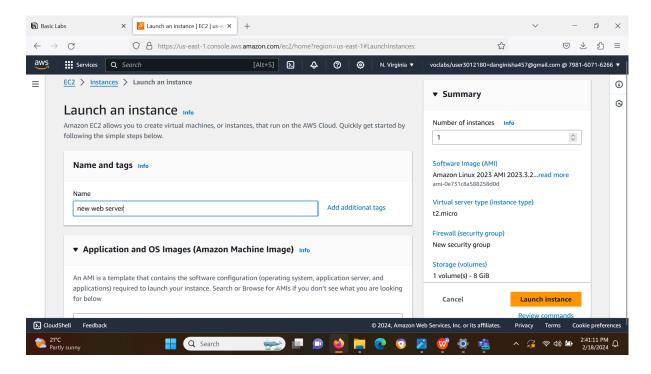
Goal: By the end of this lab, students should be able to launch and manage an EC2 instance, understand instance types, security groups, and IP addressing in AWS.

## Solution:

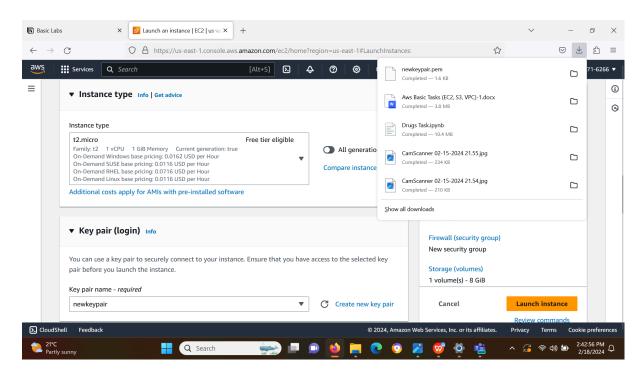
Step 1: We start by launching an instance.



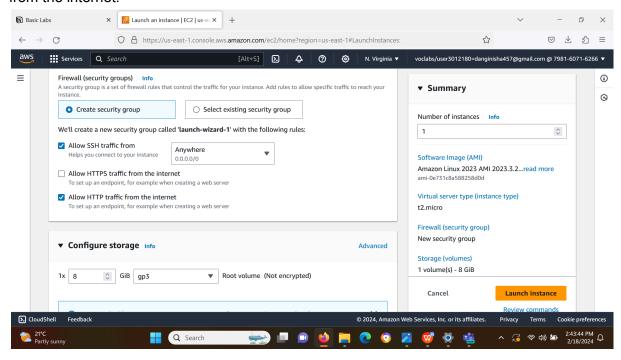
Step 2: Then, we can give any name to an instance.



Step 3: Set instance type as t2.micro and create a new keypair which automatically gets downloaded after creating.

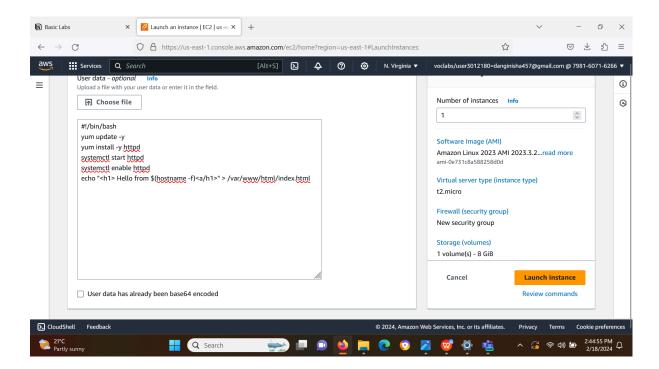


Step 4: Create a security group and allow SSH traffic from anywhere and allow HTTP traffic from the internet.

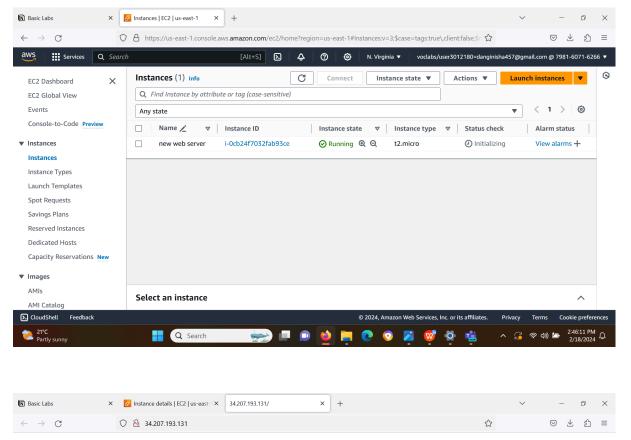


Step 5: Then, we write the code in an additional section. Whenever the instance is called, this code is executed.

Then we click on the "Launch Instance" button.



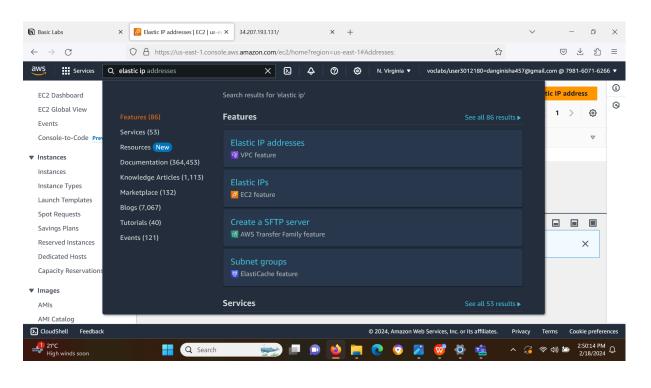
We can see that the instance is in the running state.

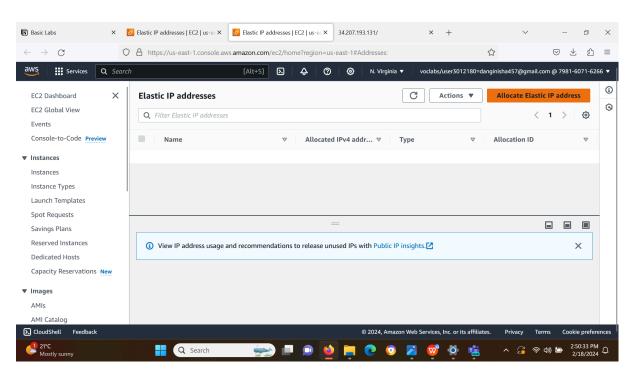


Hello from ip-172-31-80-151.ec2.internal

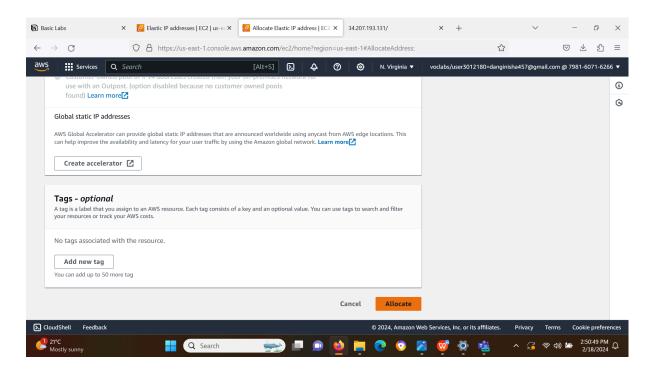


## Step 6: Now, we allocate an Elastic IP address to the instance.

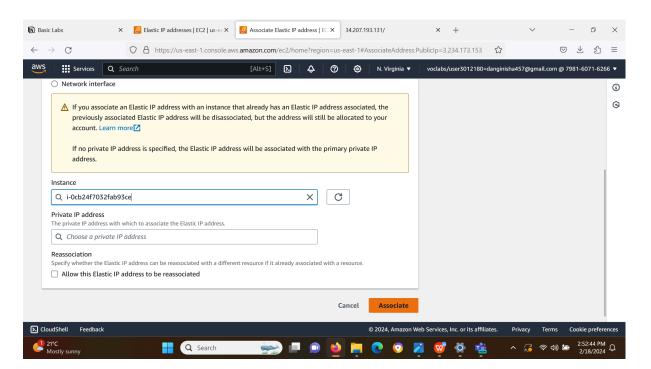




We set everything as default and allocate an elastic IP address.



Step 7: Then we associate an instance to the address.



## Step 8: Then, we connect the instance via SSH.

