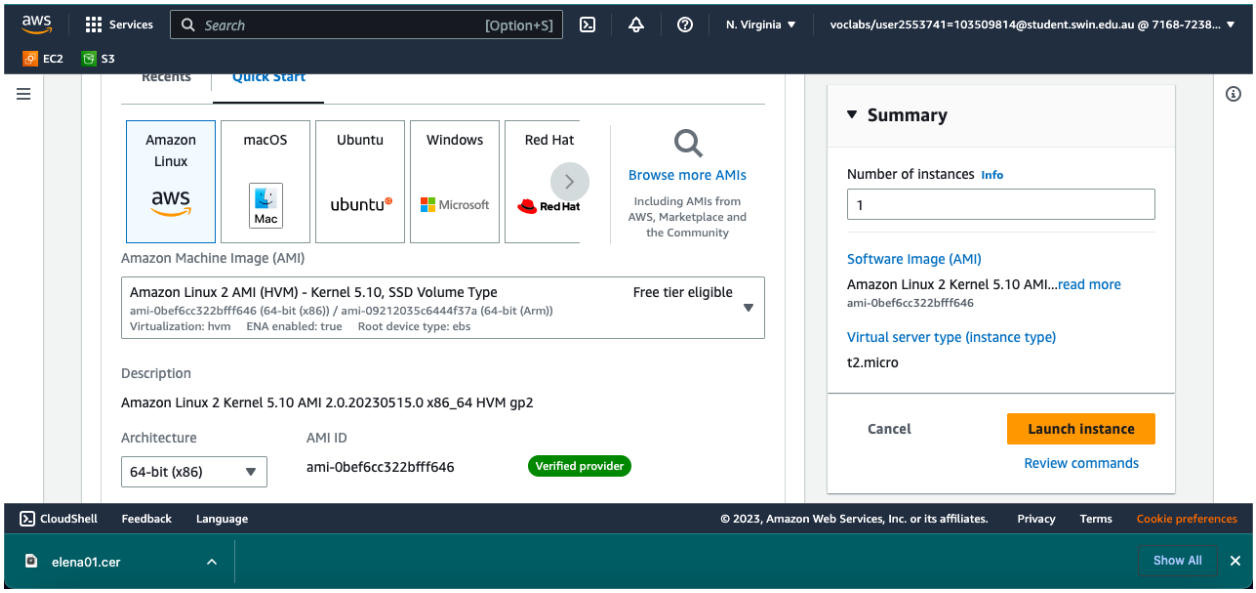
ASSIGNMENT 1A

Name: Le Ngoc An Thu

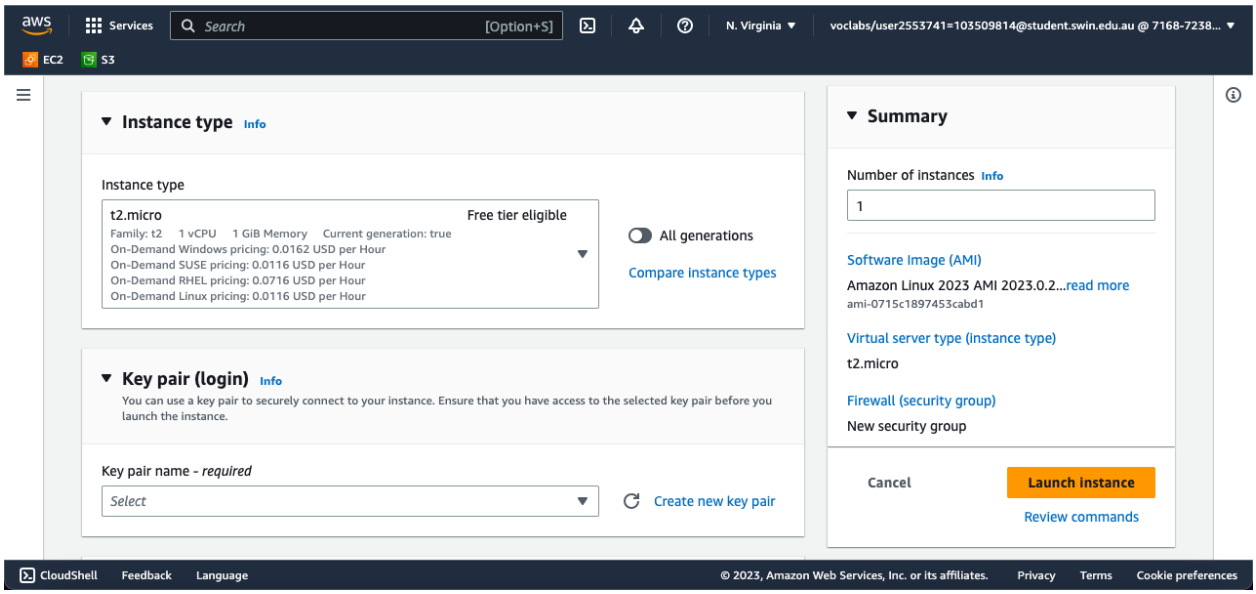
TASK 1 – Launch your own Linux EC2 instance

Before launching an EC2 instance, a key pair is required for logging in to your instance in the future. For more details, see Remote Access to an EC2.pdf file. Then launch an EC2 instance from the AWS management console in US East (N. Virginia) us-east-1 region. It must have the following properties:

• Amazon Machine Image: Amazon Linux 2 AMI (HVM), SSD Volume Type

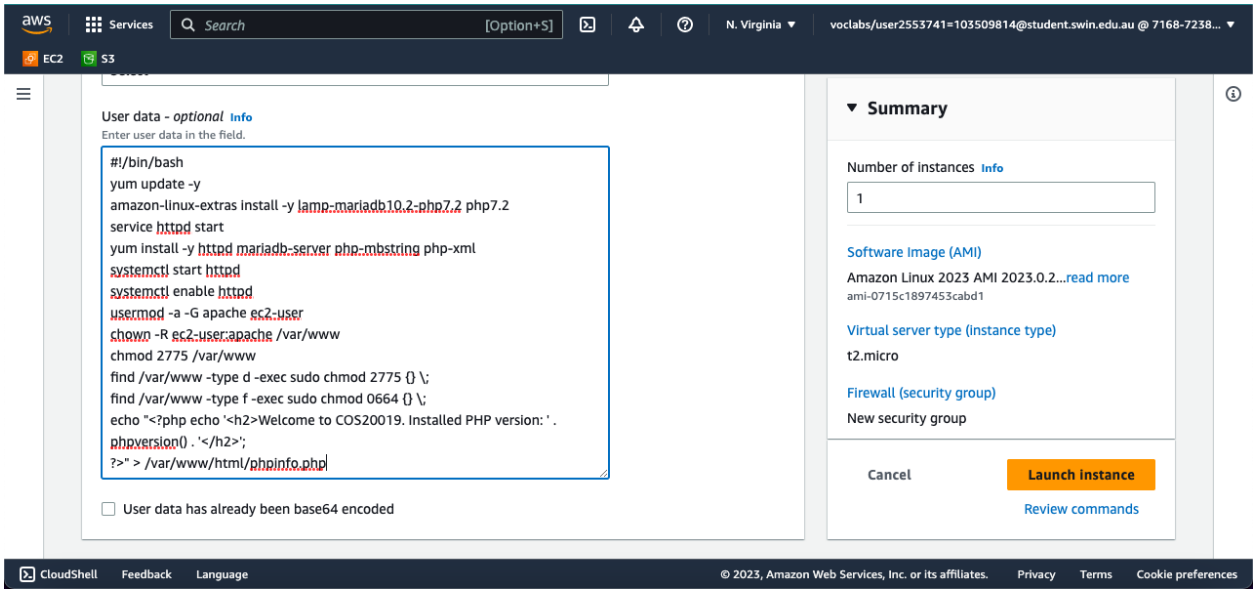


• Instance type: t2.micro

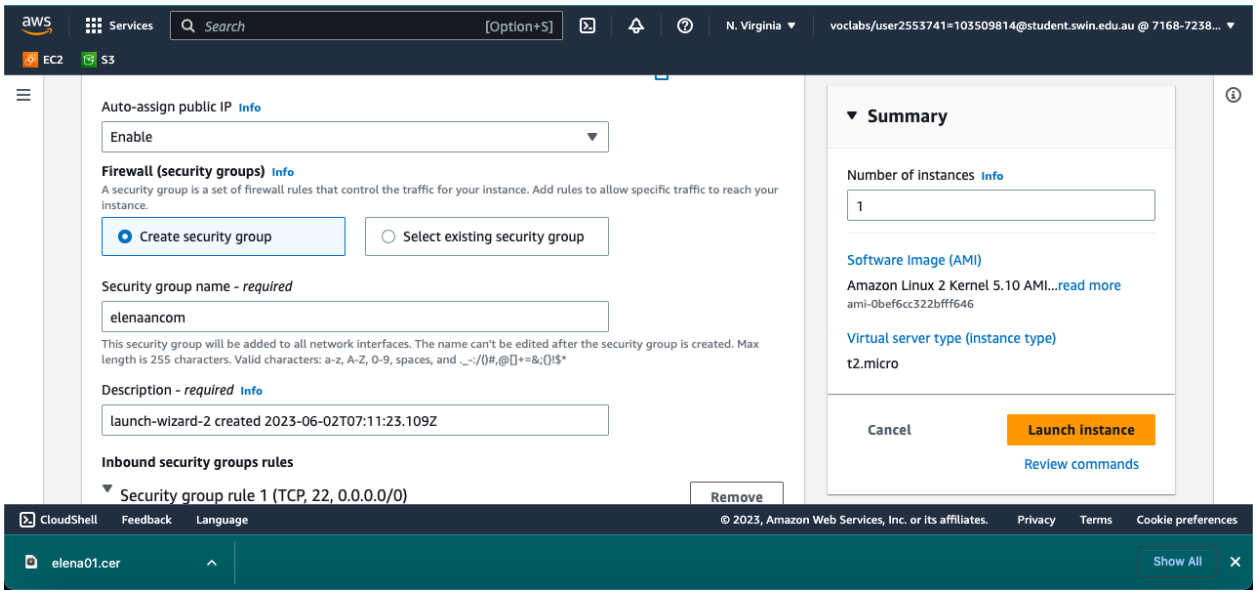


• Advanced Details – User data: Use the script in Auto Setup EC2 with script.pdf file to

automatically set up and configure the Apache server, PHP, and MySQL at launch.

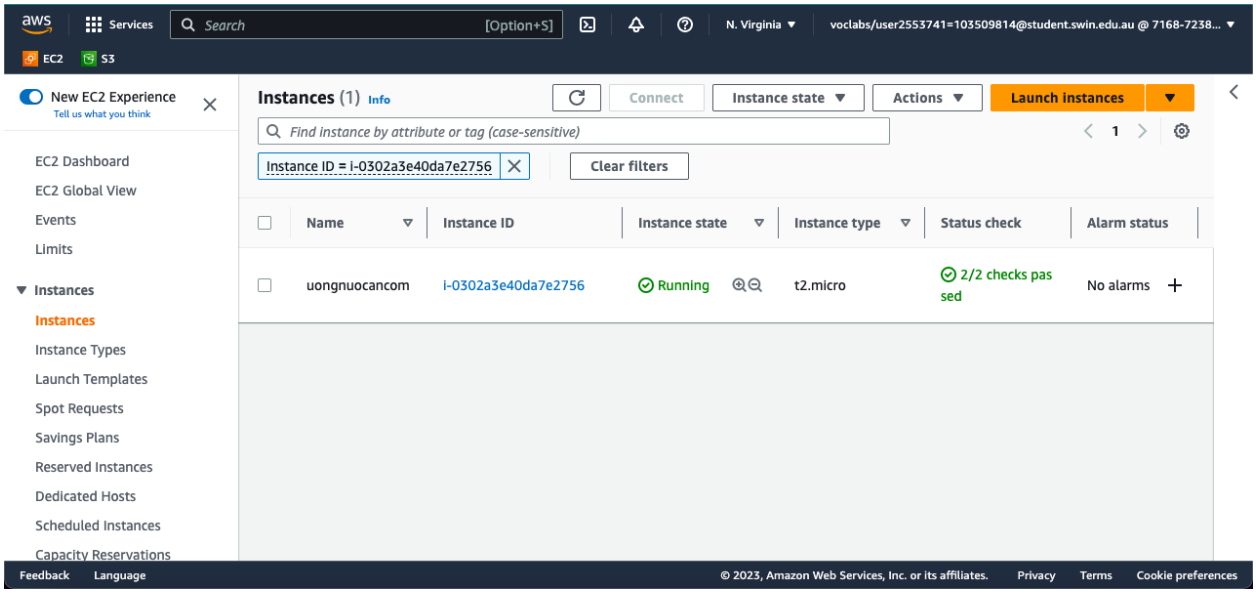


• New security group named “WebServer-SG” that allows only necessary traffic types (SSH, HTTP, HTTPS) to reach the instance from anywhere. Do not allow every traffic types.
Other configurations should be left as default such as default Virtual Private Cloud (VPC), default subnet, etc.

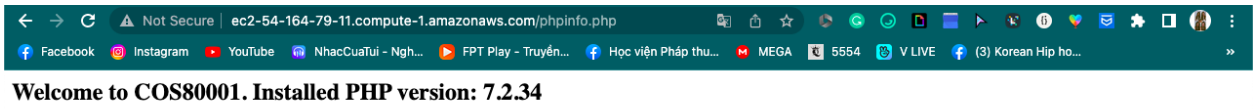


Note: In this introductory assignment you will create an EC2 Web server in the default VPC. In general, the default VPC is suitable only for experimental / toy deployments, and its use is considered bad practice for production resources. In the next assignments, you will create your own secure VPC. Allow a few minutes for the instance to launch and execute the commands in the above script, the Instance State and Status Check should change to ‘running’ and ‘2/2 checks

passed', respectively.



After that, visit http://your.public.dns.amazonaws.com/phpinfo.php, if you see a welcome page, it means the EC2 instance, PHP, and Apache server have been installed correctly.



NOTE: Due to the pay-as-you-go pricing, the longer your instances run the more you pay. You are advised to stop the instances after each working session to save cost.

TASK 2 – Create a PHP website (Photo Album)

Create two PHP web pages (photouploader.php and photolookup.php) with user interfaces as illustrated in Figures 1 & 2. Feel free to individualise/style the web page as you wish.

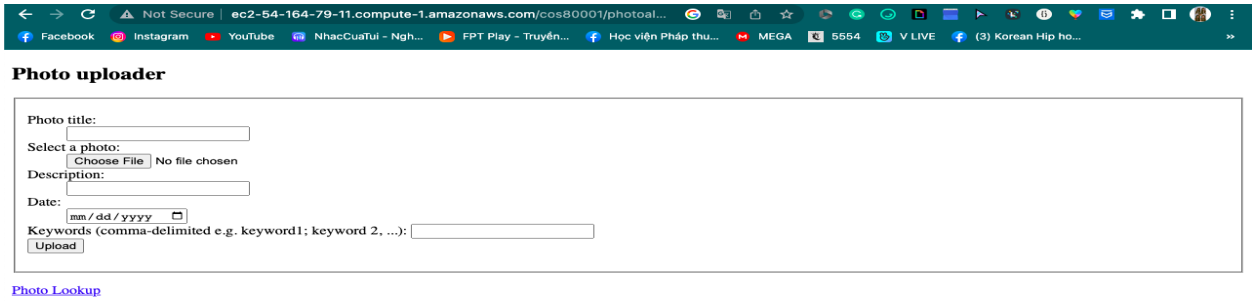


Figure 1 - Photo uploader page (photouploader.php). The “Photo Lookup” hyperlink at the bottom should link to photolookup.php

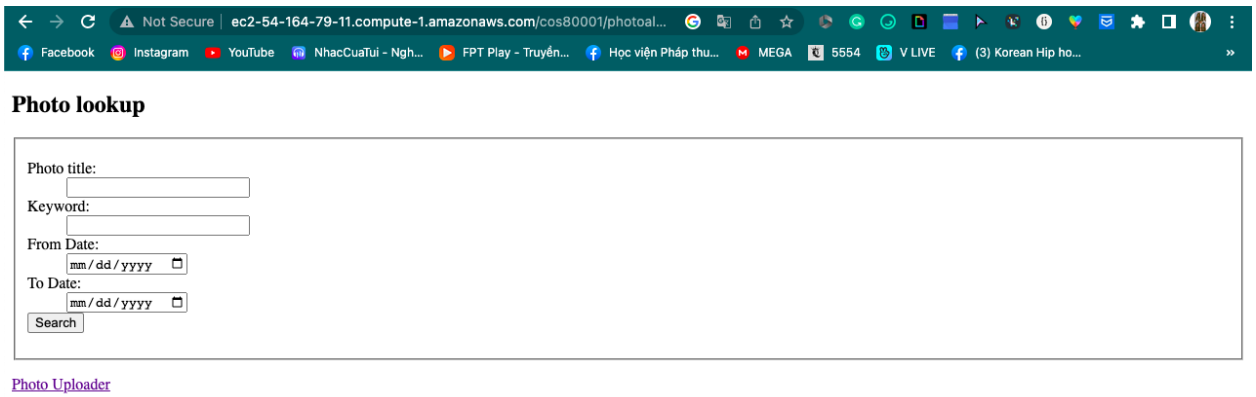


Figure 2 - Photo lookup page (photolookup.php). The “Photo Uploader” hyperlink at the bottom should link to photouploader.php

The directory structure of your website is described below. You can create additional HTML, CSS, PHP, JavaScript files if needed. The Apache HTTP server serves files located in a directory called Apache document root (/var/www/html); the cos80001 folder must be in the Apache document root folder. Follow the instructions in Remote Access to an EC2.pdf file to learn how to transfer files to a Linux EC2 instance.

NOTE: File and directory names in Linux are case sensitive.
NOTE: You are not required to implement the actual functionalities of the website at this stage. After having the website deployed on the Apache server on your instance, your web page should be accessible from anywhere on the Internet via this URL: http://your.public.dns.amazonaws.com /cos80001/photoalbum/photouploader.php

You should try accessing your website from different devices/networks/browsers to make sure it works correctly.