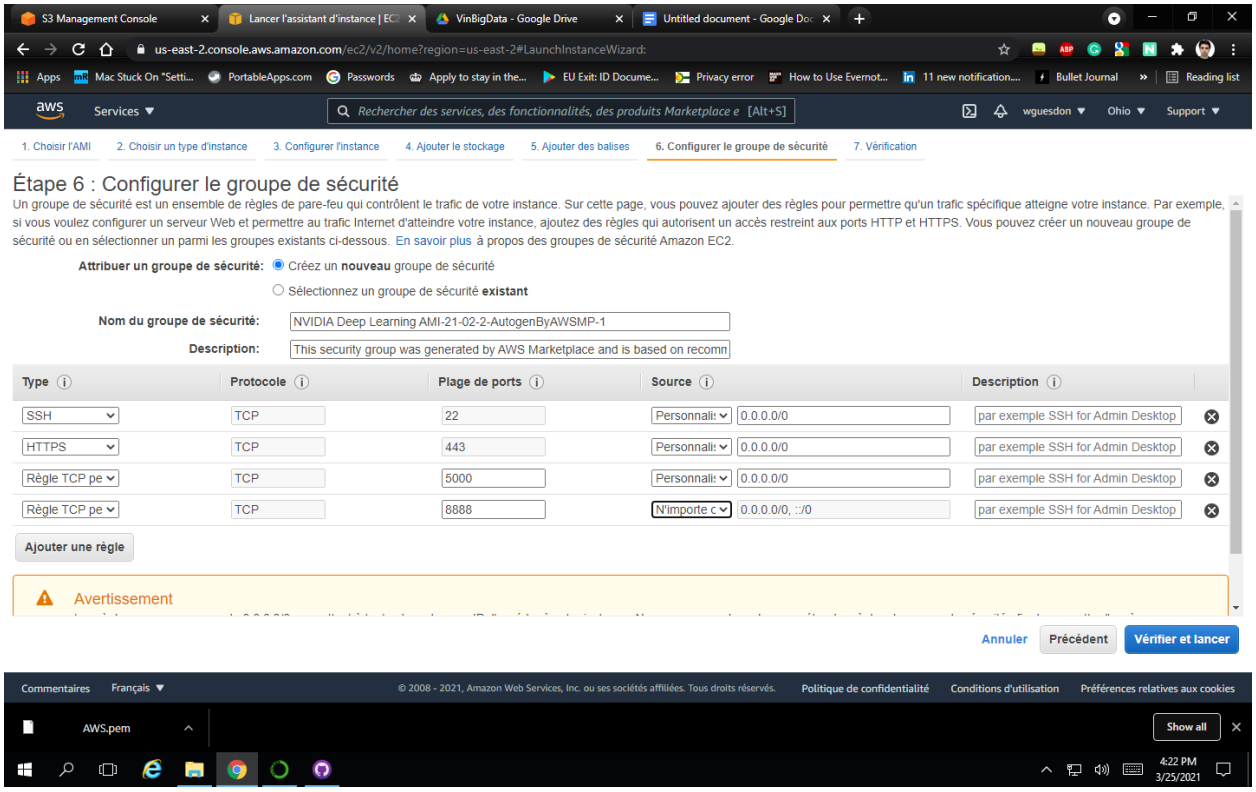
Create a p3 instance

Start the instance

AMI Nvidia Deep Learning AMI

Instance: p3.2xlarge



i-0fd1e342bb2715d2d
ec2-3-141-47-131.us-east-2.compute.amazonaws.com
3.141.47.131

Check the GPU drivers

ssh -i "AWS.pem" ubuntu@ec2-3-141-47-131.us-east-2.compute.amazonaws.com

nvidia-smi

```
ubuntu@ip-172-31-12-53:~$ nvidia-smi
Thu Mar 25 16:29:25 2021
+-----------------------------------------------------------------------------+
| NVIDIA-SMI 460.32.03    Driver Version: 460.32.03    CUDA Version: 11.2     |
|-------------------------------+----------------------+----------------------+
| GPU  Name        Persistence-M| Bus-Id        Disp.A | Volatile Uncorr. ECC |
| Fan  Temp  Perf  Pwr:Usage/Cap|         Memory-Usage | GPU-Util  Compute M. |
|                               |                      |               MIG M. |
|===============================+======================+======================|
|   0  Tesla V100-SXM2...  On   | 00000000:00:1E.0 Off |                    0 |
| N/A   32C    P0    23W / 300W |      0MiB / 16160MiB |      0%      Default |
|                               |                      |                  N/A |
+-------------------------------+----------------------+----------------------+

+-----------------------------------------------------------------------------+
| Processes:                                                                  |
|  GPU   GI   CI        PID   Type   Process name                  GPU Memory |
|        ID   ID                                                   Usage      |
|=============================================================================|
|  No running processes found                                                 |
+-----------------------------------------------------------------------------+
```

Configure Anaconda and Jupyter notebook

see
https://medium.com/google-cloud/set-up-anaconda-under-google-cloud-vm-on-windowsf71fc1064bd7

sudo apt-get update
sudo apt-get install bzip2 libxml2-dev

cd ubuntu
wget https://repo.anaconda.com/miniconda/Miniconda3-latest-Linux-x86_64.sh
bash Miniconda3-latest-Linux-x86_64.sh
rm Miniconda3-latest-Linux-x86_64.sh
source .bashrc
conda

```
conda create -n ml python=3.7

conda activate ml

conda install scikit-learn pandas jupyter ipython
```

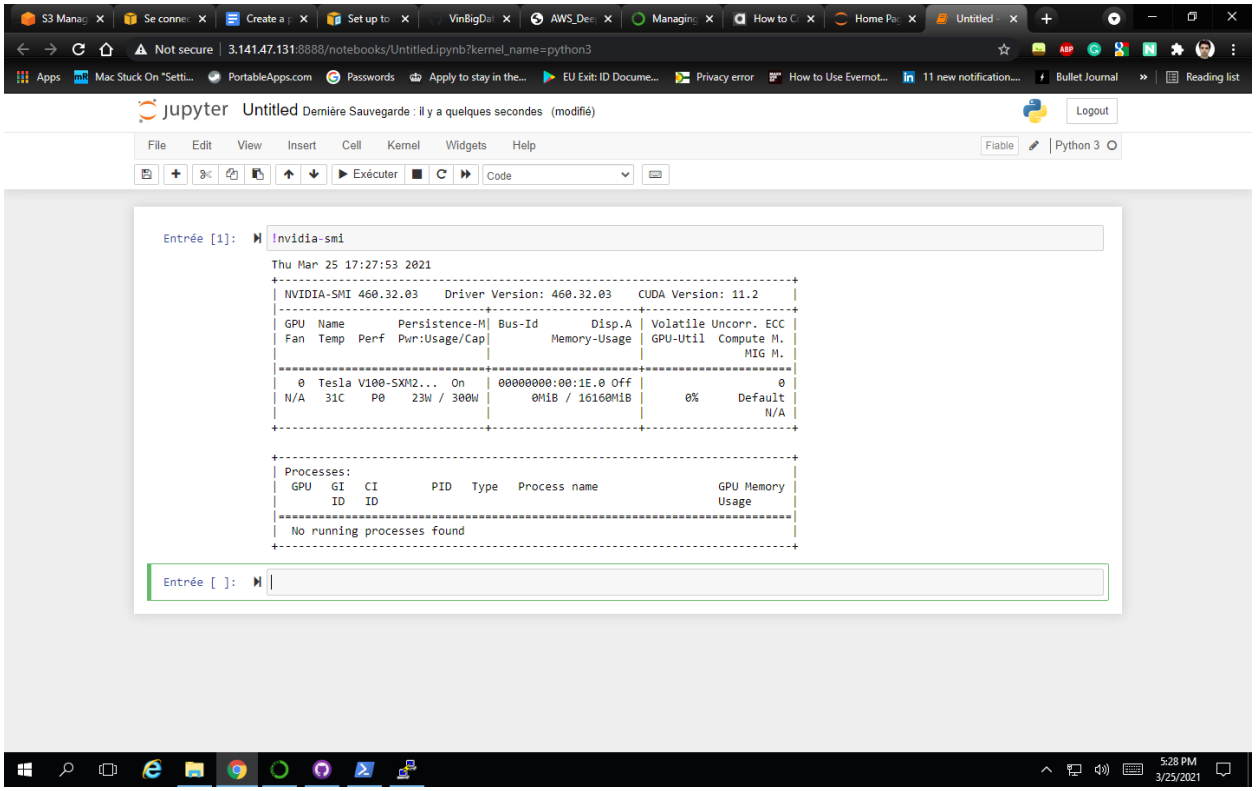
Start Jupyter notebook

tmux new -s StreamSession
`conda activate ml`

jupyter notebook --ip=0.0.0.0 --no-browser

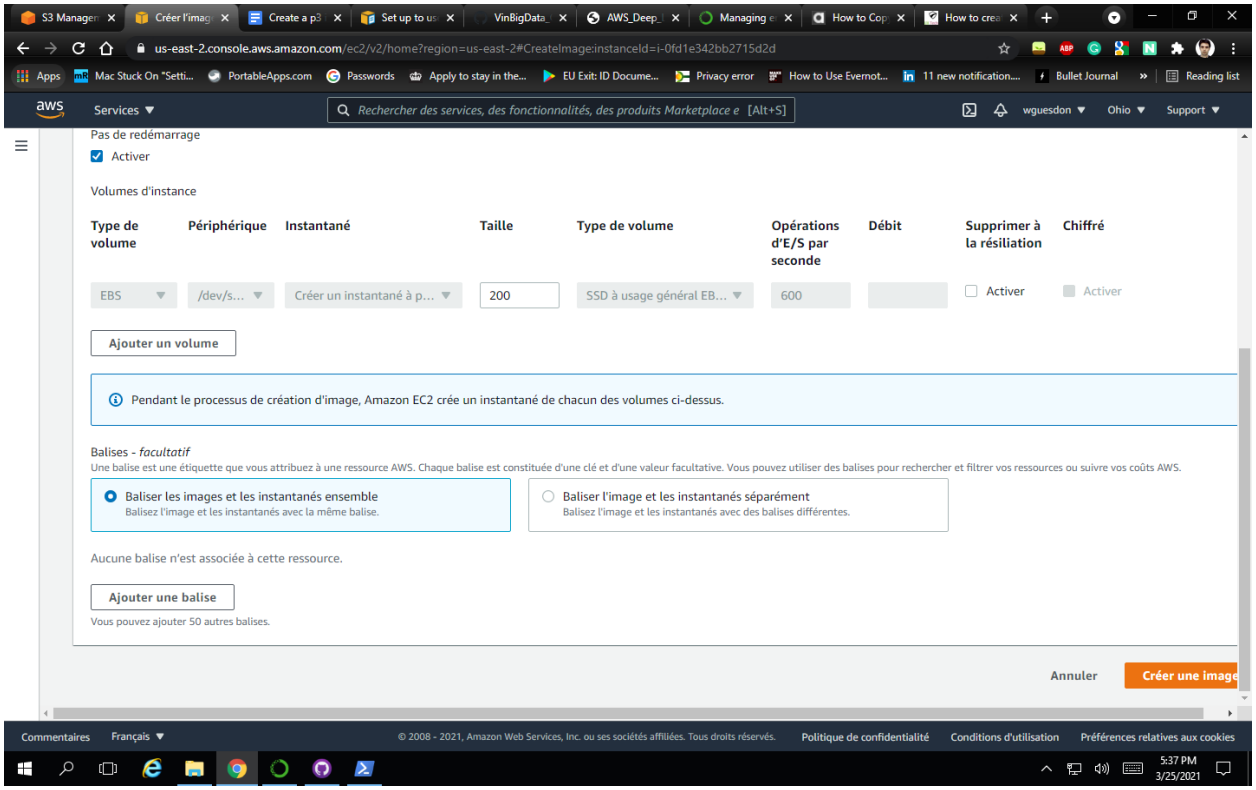
d5c29df61b8d5d0fd0fbde65d3d65b1d71ec9da91c715f48

http://3.141.47.131:8888



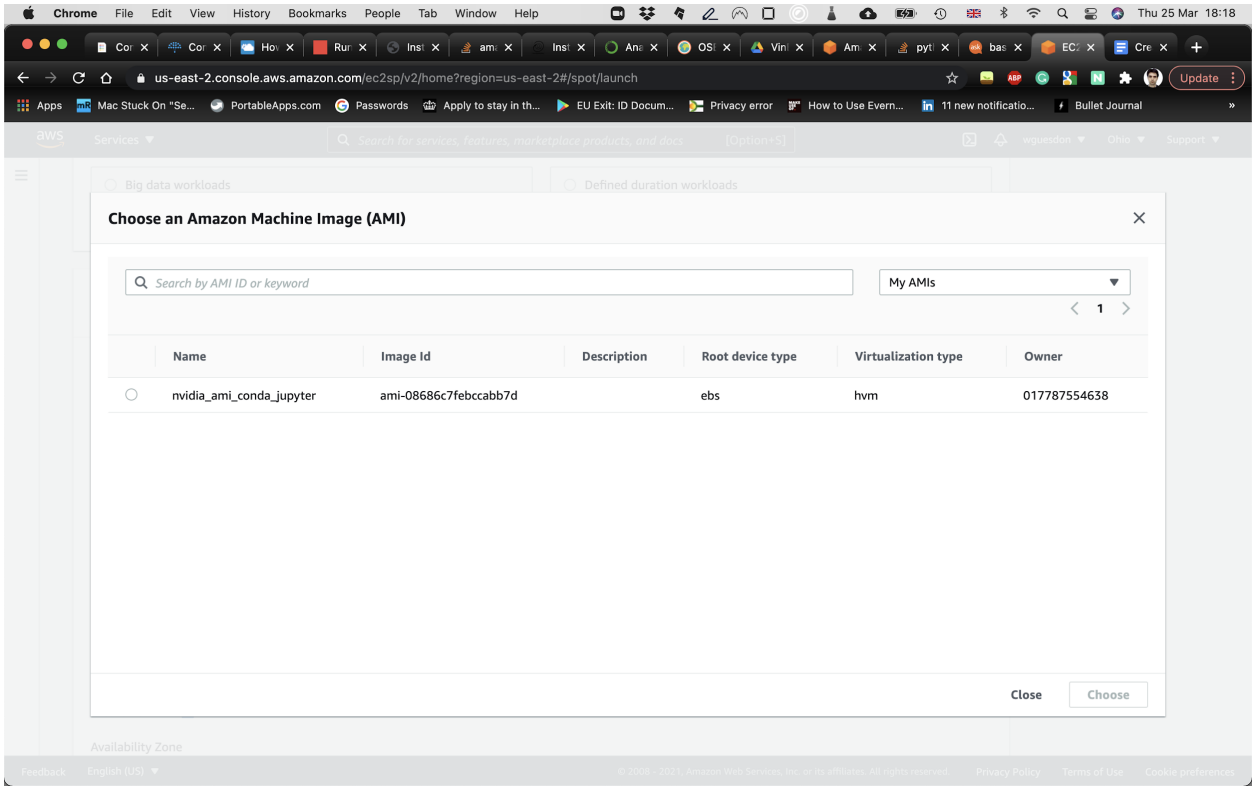
Create an image from the instance

https://linuxroutes.com/create-custom-ami-aws/



ami-08686c7febccabb7d

Start a spot instance from an AMI



References

https://chrisalbon.com/aws/basics/run_project_jupyter_on_amazon_ec2/
https://docs.nvidia.com/cuda/cuda-installation-guide-linux/index.html#abstract
https://devopsmyway.com/install-anaconda-on-amazon-linuxec2/
https://stackoverflow.com/questions/35246386/conda-command-not-found