VM creation and OS installation manual

01/28/2025

Montserrat Flores Castillo

CS475: Capstone Seminar

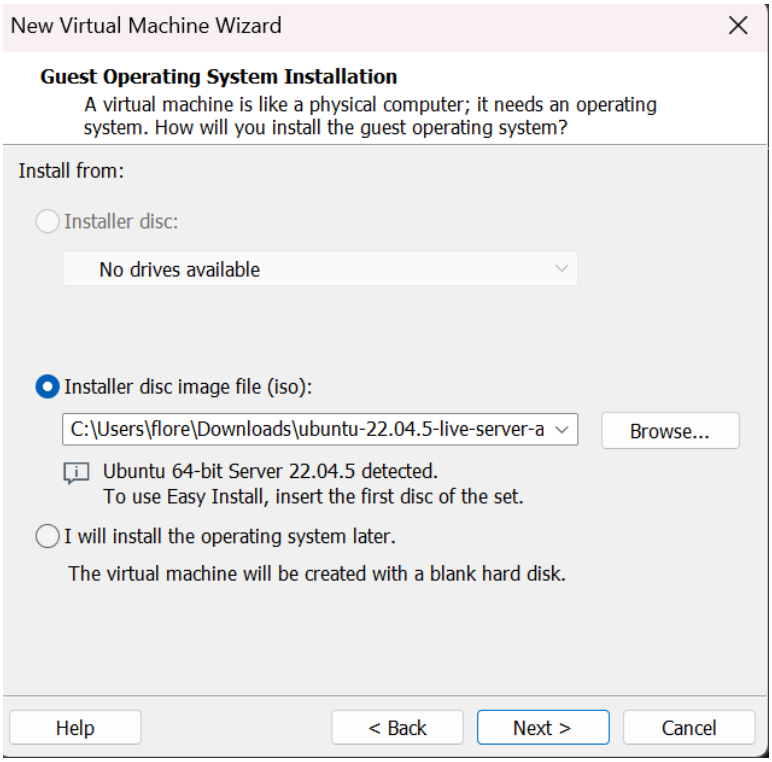
Index

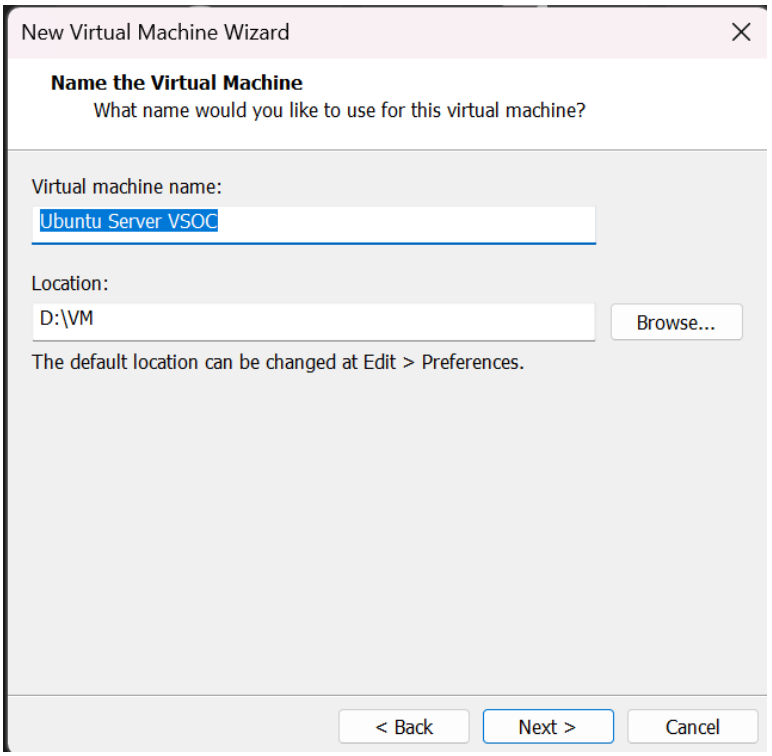
1. Creaton of VM in VMware

For this project we need to create a VM machine where we are going to locate our vSOC.

The creation of the VM in VMware is very straightforward, we will use the recommended option for the creation of our VM.

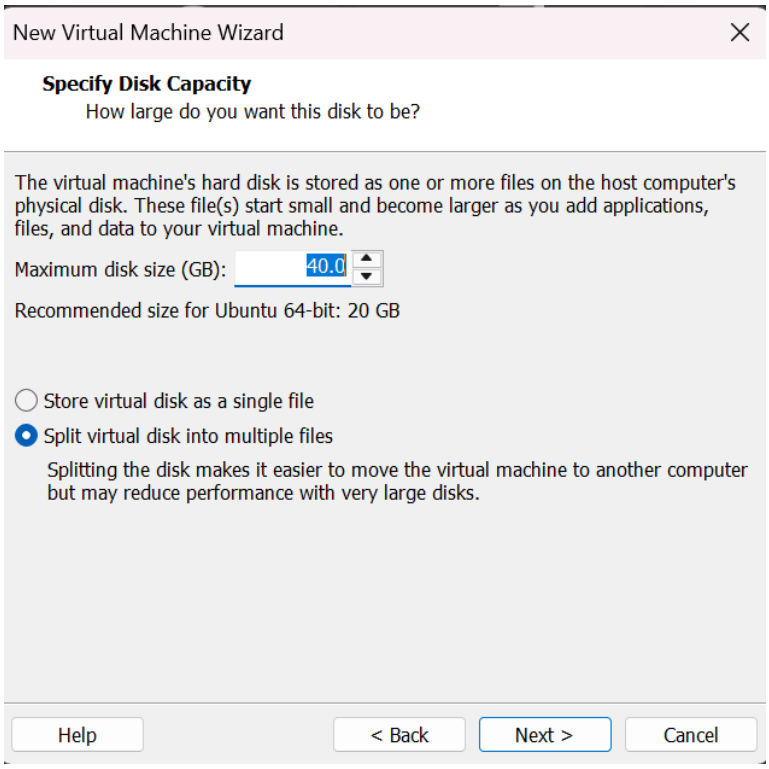
In this section we need to choose the image iso (single file that contains an entire optical disc), in this project we are using Ubuntu Server 22.05 LTS.

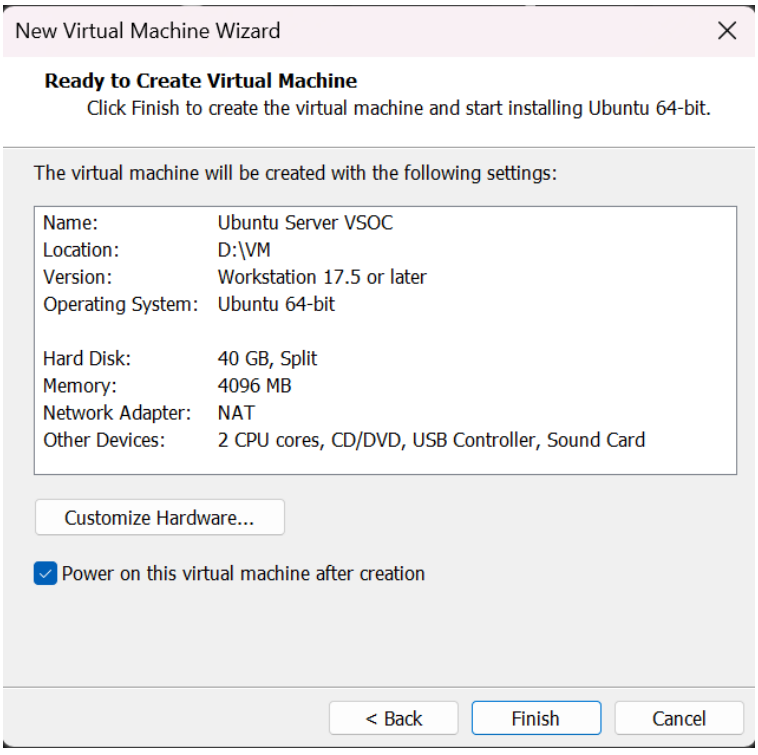




Naming of the machine and where we are to locate this VM in our case into a USB driver.

We added a standard size for installing the operating system in the VM, but we can add more disk space anytime during the project in case is more needed.

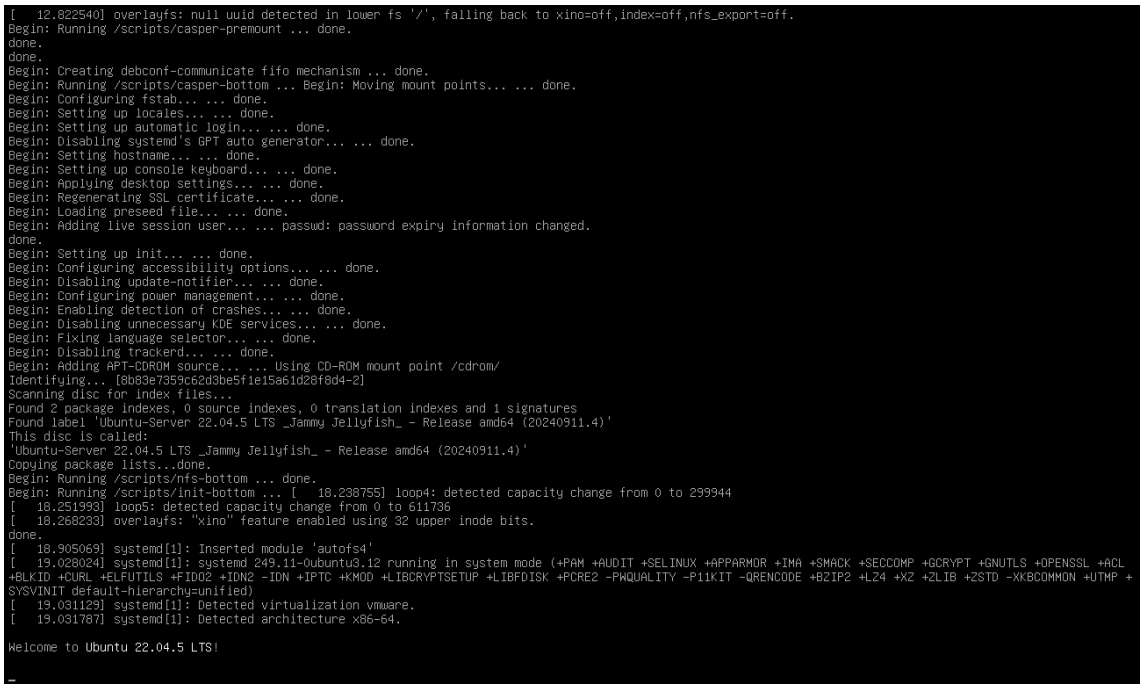




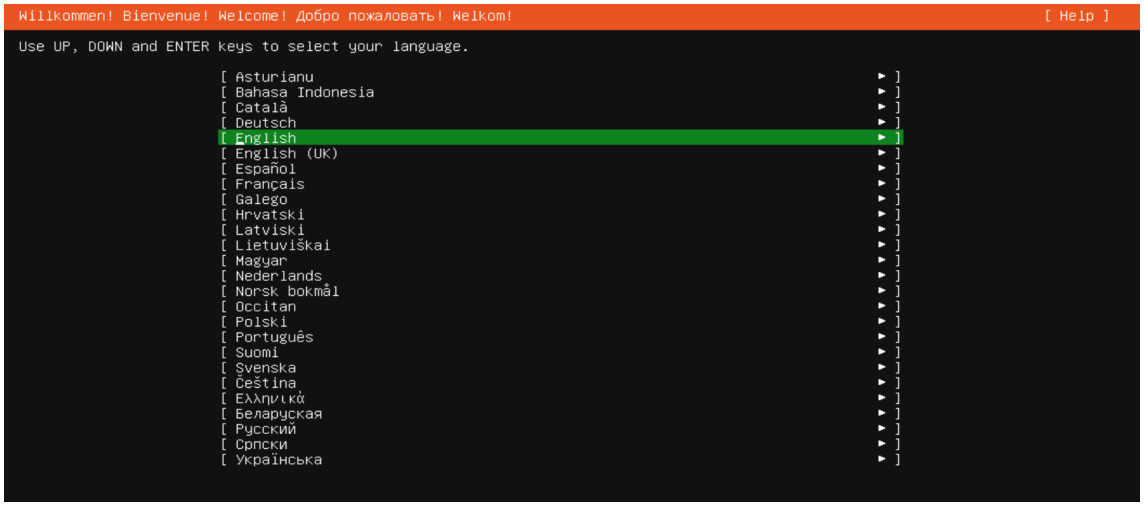
Summary of our virtual machine specifications.

2. Installation of the OS (Ubuntu Server)

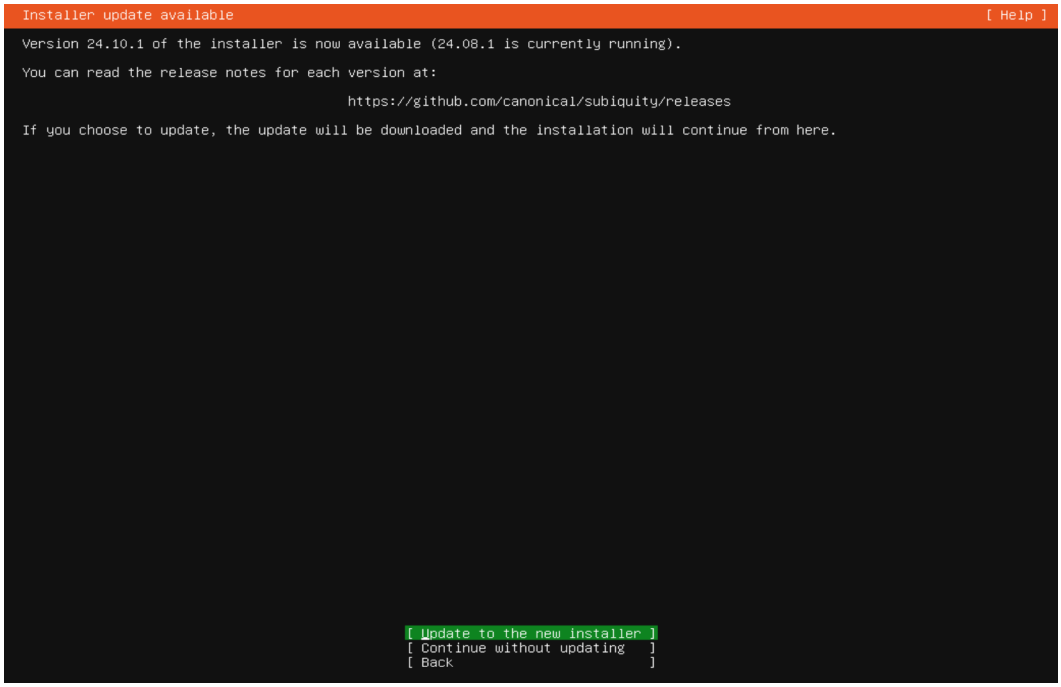
At the beginning of the installation we will see this prompt which can take couple minutes until it pop you up the installation of the operating system.



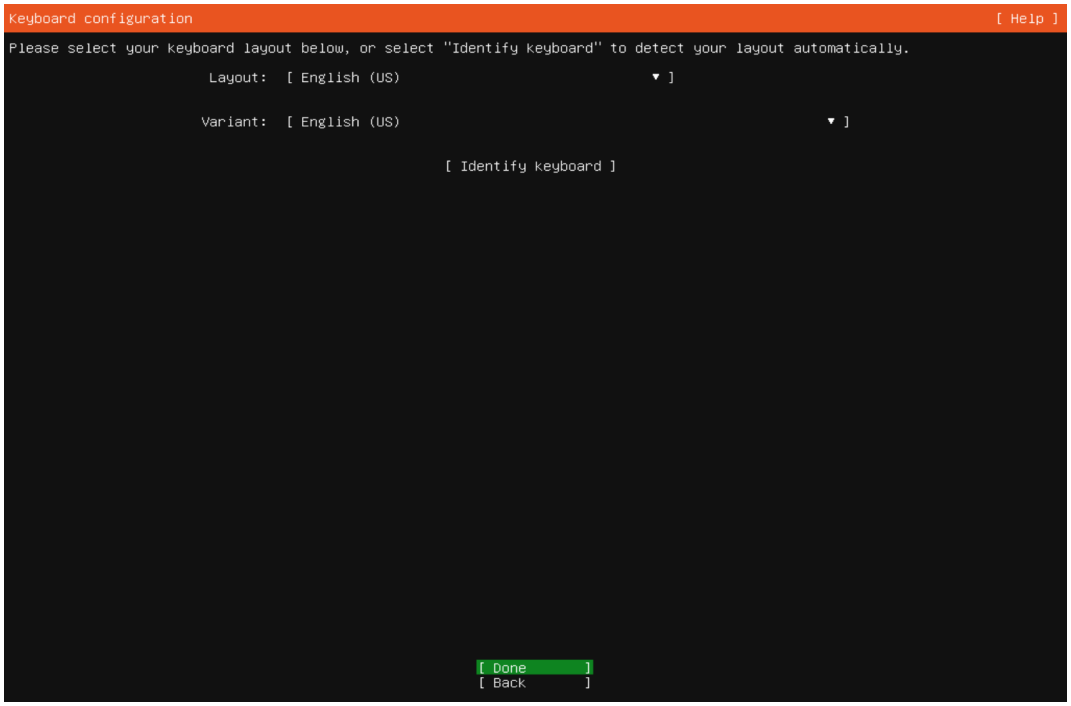
In this section we will need to choose the language of the system:



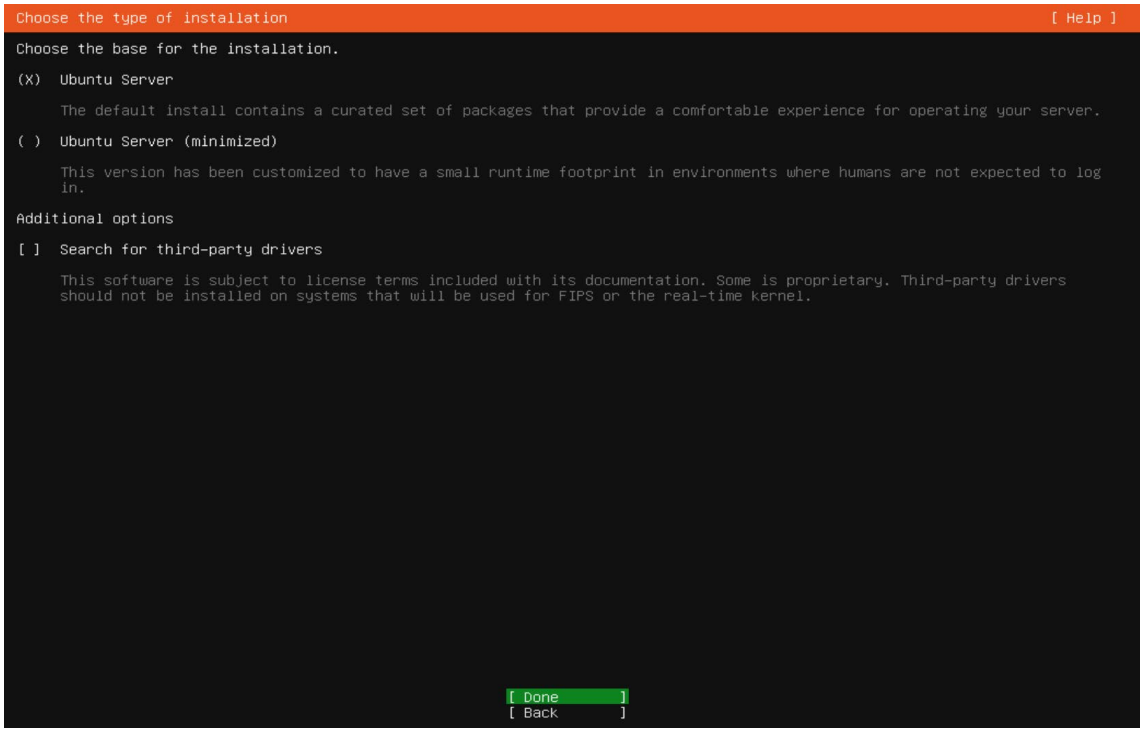
Indicates we have a new update available so is recommended to install the operating system with the newest version:



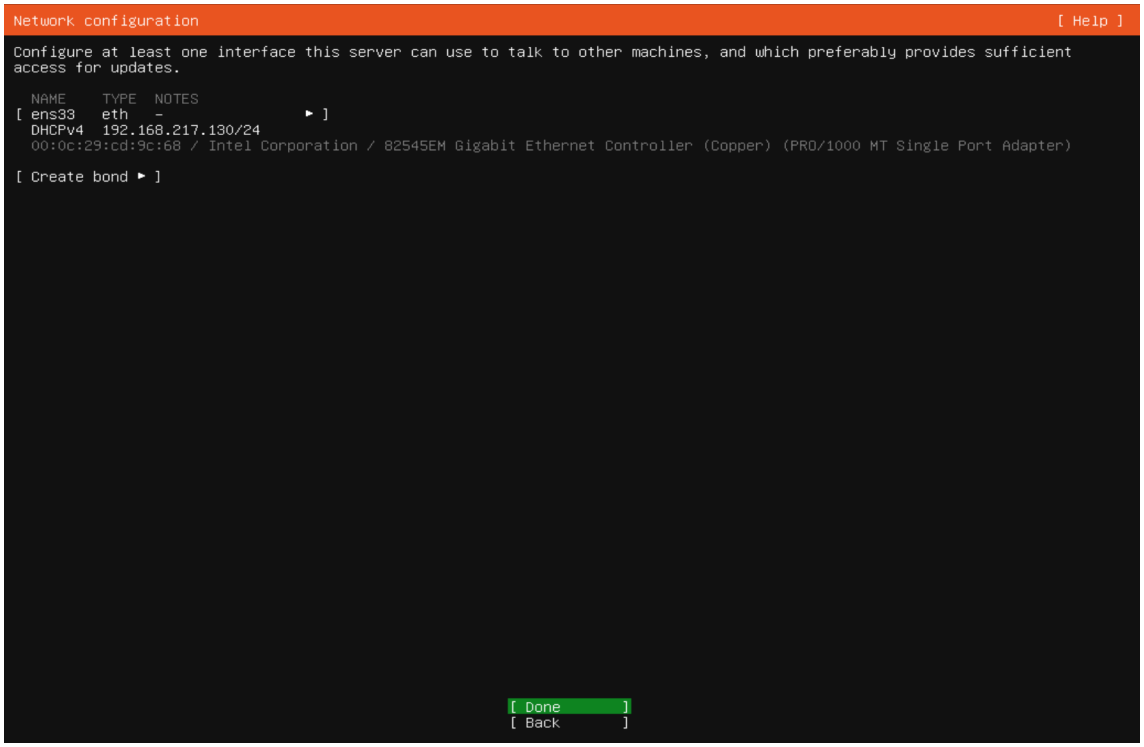
Choose the language of the keyboard and layout of the keyboard:



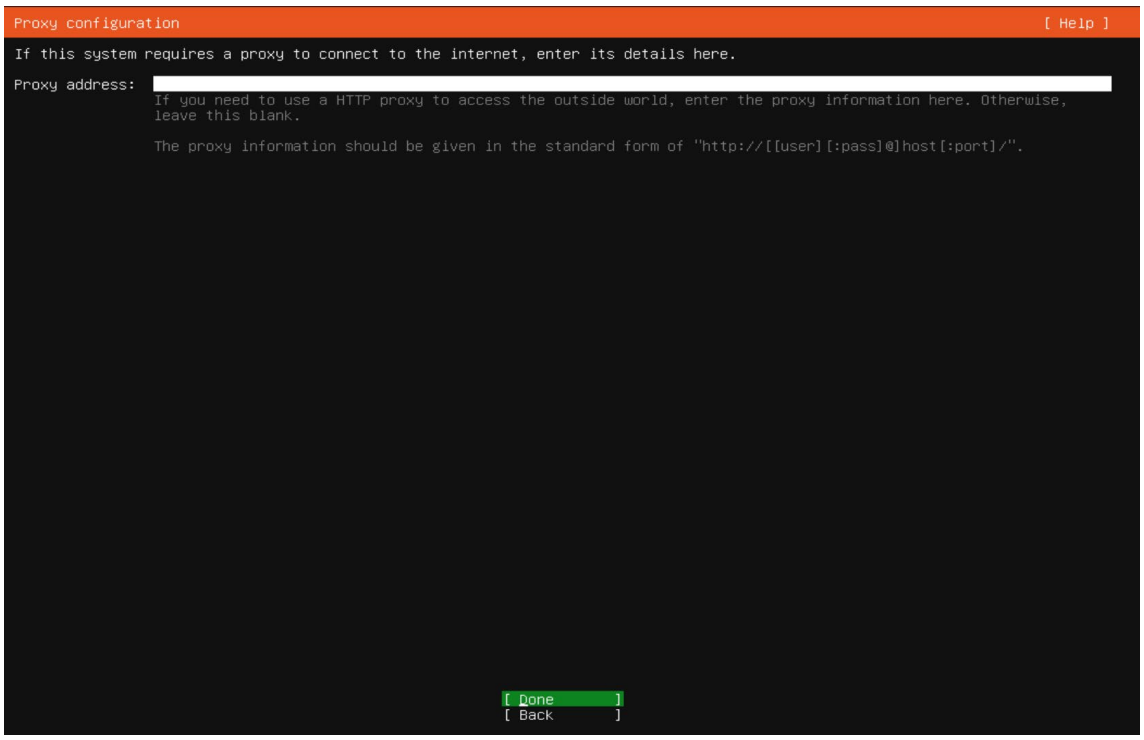
Here we indicate which kind of installation of Ubuntu Server we want, in our case the normal installation of Ubuntu Server:



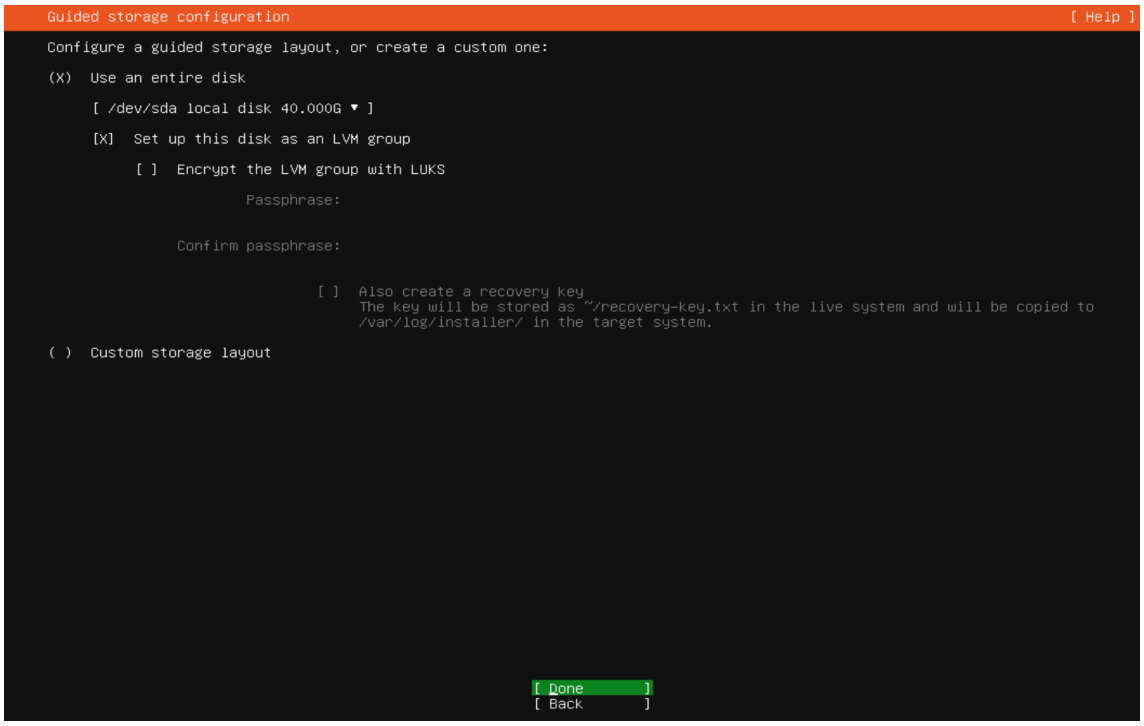
The network configuration we leaved in the default configuration until we need to configure it in the future:



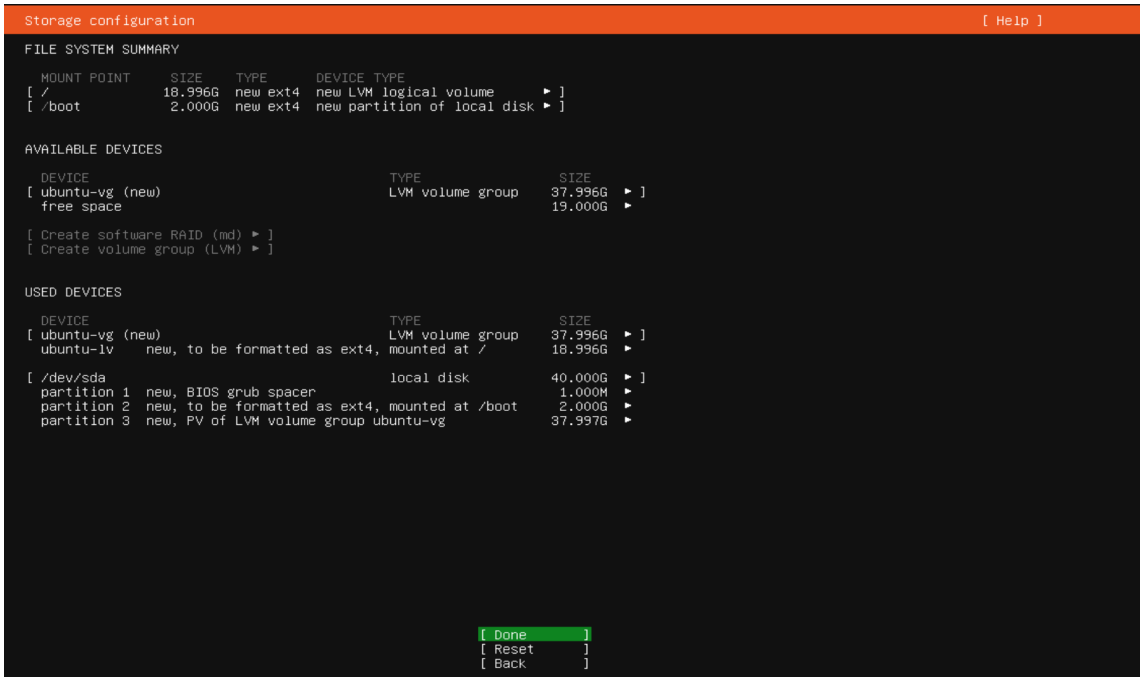
We left in the default configuration empty until we configure our own proxy:



The storage configuration we leave by default here we can change where we want to locate the installation of the ubuntu server.

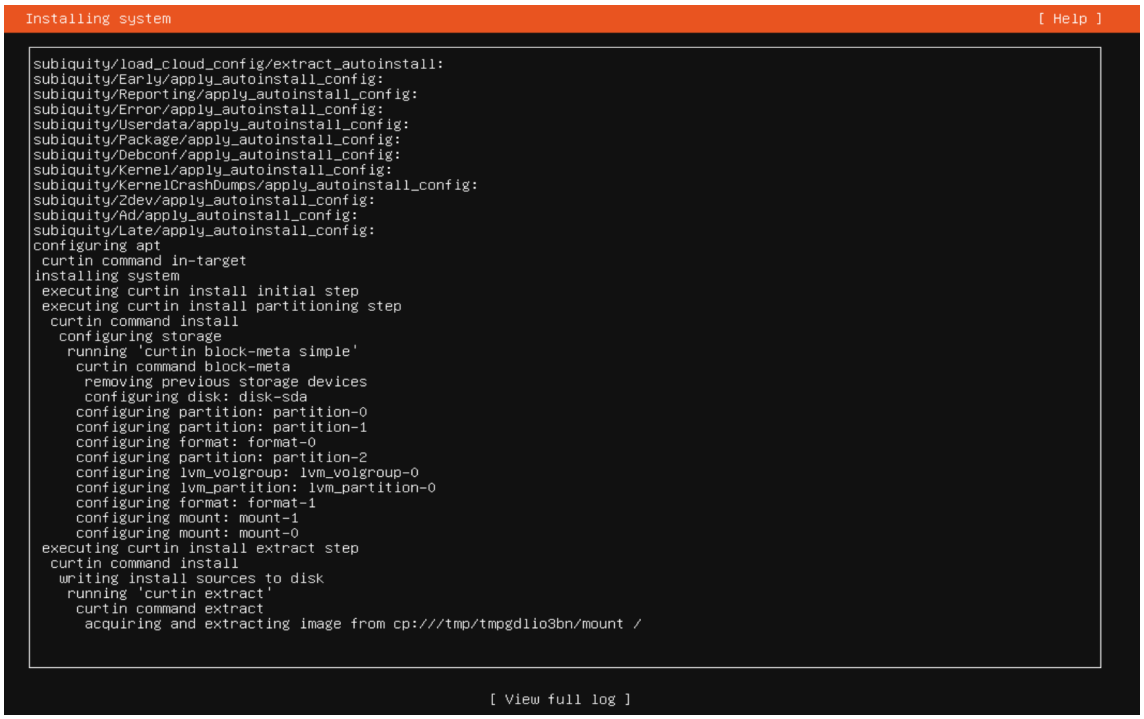


More extra configuration we can leave in default, like where is locate the /boot or the root system /:

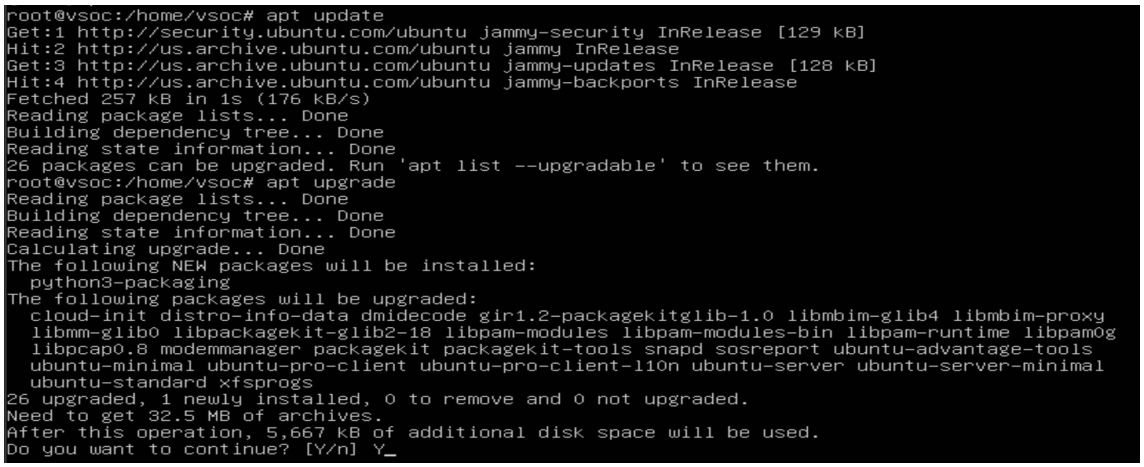


Creation of superuser and user of your ubuntu server.

Installation process:



After installing the operating system is always recommended to check for last updates and upgrades. Using the command: (sudo apt update, sudo apt upgrade):


root@vsoc:/home/vsoc# apt update
Get:1 http://security.ubuntu.com/ubuntu jammy-security InRelease [129 kB]
Hit:2 http://us.archive.ubuntu.com/ubuntu jammy InRelease
Get:3 http://us.archive.ubuntu.com/ubuntu jammy-updates InRelease [128 kB]
Hit:4 http://us.archive.ubuntu.com/ubuntu jammy-backports InRelease
Fetched 257 kB in 1s (176 kB/s)
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
26 packages can be upgraded. Run 'apt list --upgradable' to see them.
root@vsoc:/home/vsoc# apt upgrade
Reading package lists... Done
Building dependency tree... Done
Reading state information... Done
Calculating upgrade... Done
The following NEW packages will be installed:
python3-packaging
The following packages will be upgraded:
cloud-init distro-info-data dmidecode gir1.2-packagekitglib-1.0 libmbim-glib4 libmbim-proxy
libmm-glib0 libpackagekit-glib2-18 libpam-modules libpam-modules-bin libpam-runtime libpam0g
libpcap0.8 modemmanager packagekit packagekit-tools snapd sosreport ubuntu-advantage-tools
ubuntu-minimal ubuntu-pro-client ubuntu-pro-client-l10n ubuntu-server ubuntu-server-minimal
ubuntu-standard xfsprogs
26 upgraded, 1 newly installed, 0 to remove and 0 not upgraded.
Need to get 32.5 MB of archives.
After this operation, 5,667 kB of additional disk space will be used.
Do you want to continue? [Y/n] Y