Ilyes MOBAREK and nathan PHILIPPE

Table of Contents

Part 1: Commands and Navigation

Essential commands for installation and navigation in the Debian installer on VirtualBox. (Page 1)

Part 2: Installing Debian on VirtualBox

- Detailed steps to start and install Debian, including disk configuration, network settings, and user management. (Pages 2-17)

Part 3: Software Installation and GNOME Software

- Guide to installing software via GNOME Software, as well as using Snap and Flatpak to manage applications. (Page 17-18)

Part 1: Commands and Navigation

Before beginning the installation of Debian on VirtualBox, here are the essential commands and shortcuts to navigate through the installer:

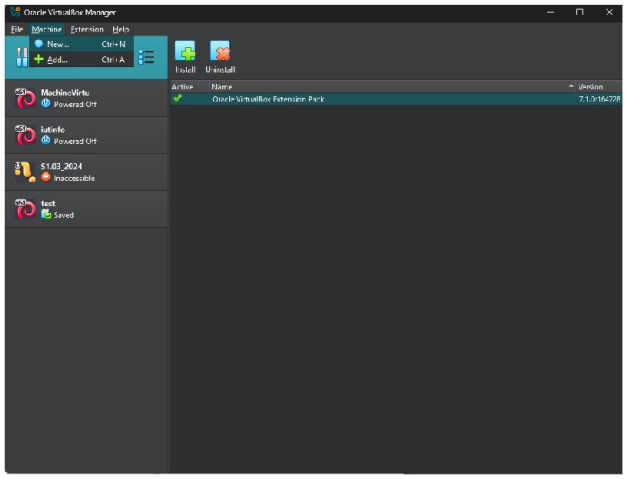
- **Arrow keys**: Move the cursor through menus or options.
- **Tab**: Switch between fields.
- **Space**: Select or deselect an option.
- **Enter**: Confirm selection.
- **Ctrl + Right Arrow**: Release the keyboard and mouse captured by VirtualBox.

Shortcuts for Debian:

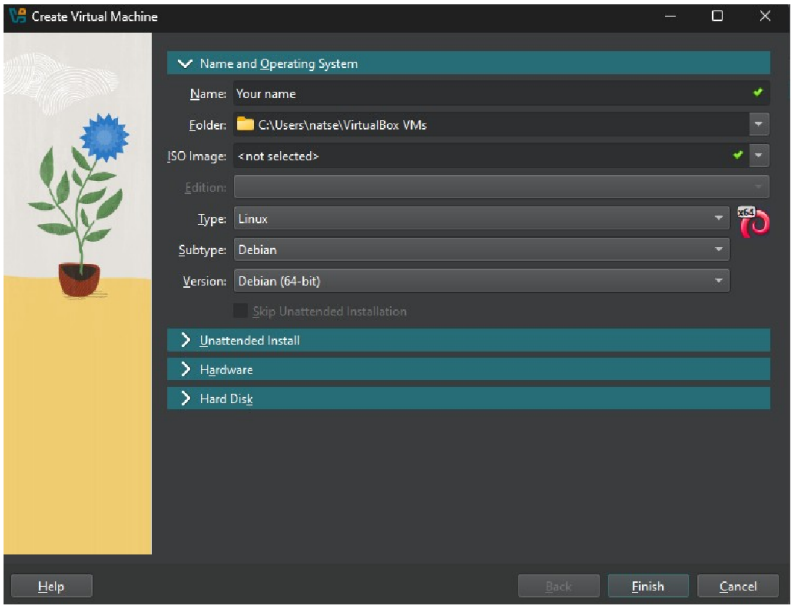
- **Ctrl + Alt + T**: Opens a terminal.
- **Alt + F2**: "Run" window.
- **Ctrl + C**: Cancel the current command in the terminal.

Part 2: Installing Debian on VirtualBox

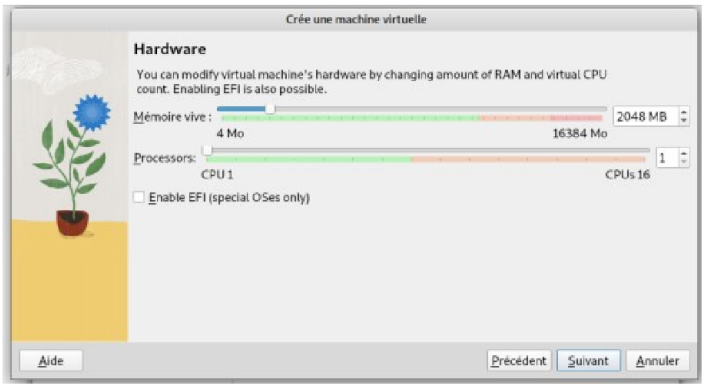
1. **Starting VirtualBox**
   Launch VirtualBox.
2. **Creating a Virtual Machine**
   We will create a virtual machine. To do this, choose **New**.

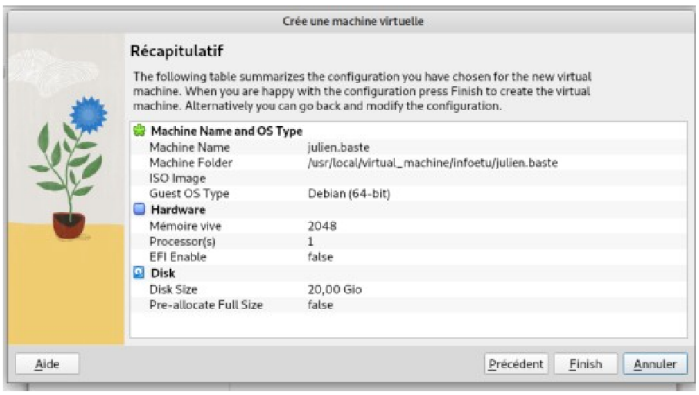


- **Name and Operating System**:
  Choose your name and file location. Select the type and version as shown in the image.



Choose the same settings as shown in the screenshots for hardware and hard drive, then click on Finish.

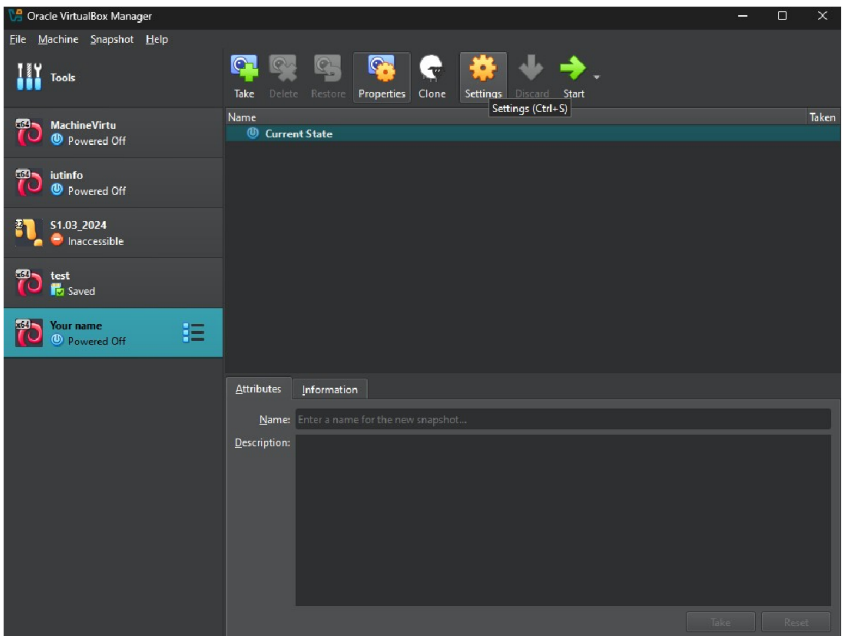




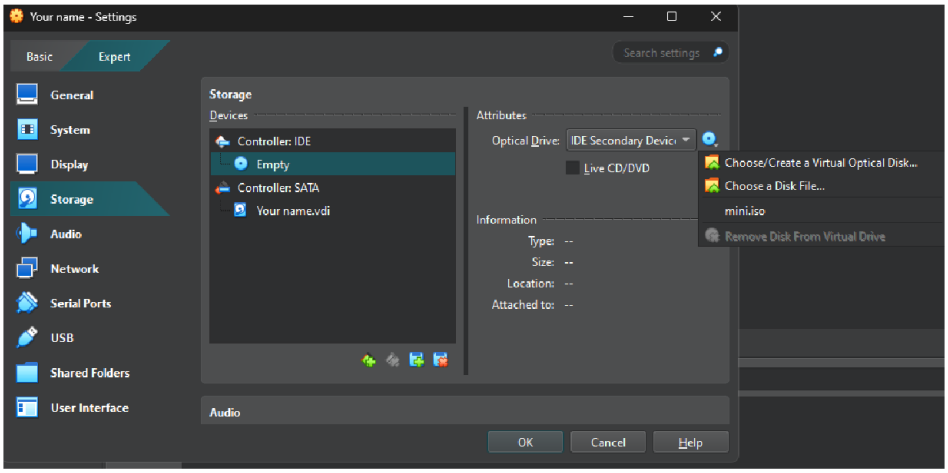
3. Installing Debian

3.1 Setting up the installation disk

1. Open the configuration of the virtual machine.



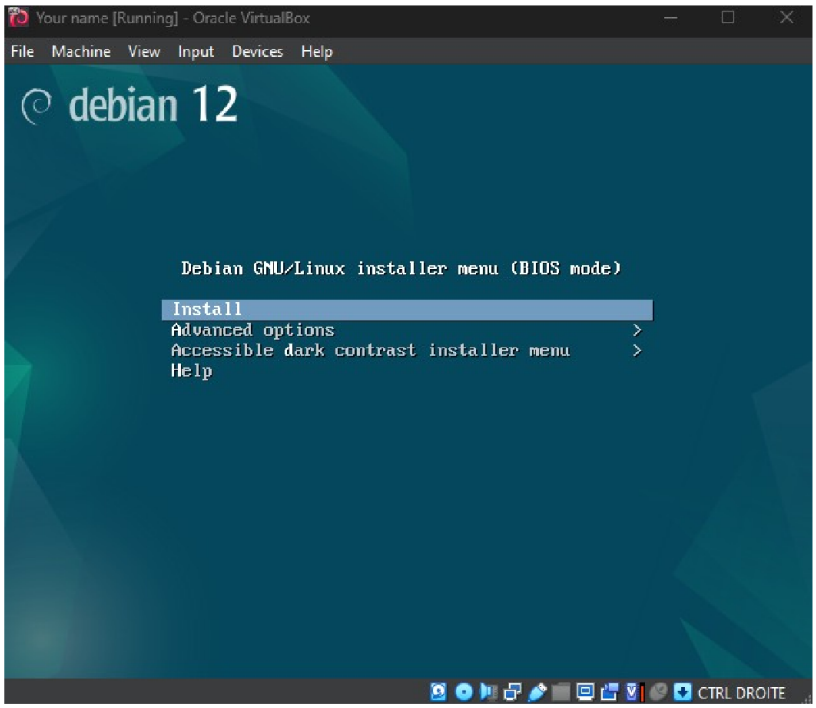
1. Go to **Storage** > **IDE Controller**, select the CD, and load the Debian ISO (if you don’t have it, download it from the official website).



2. Exit the configuration and start the virtual machine.

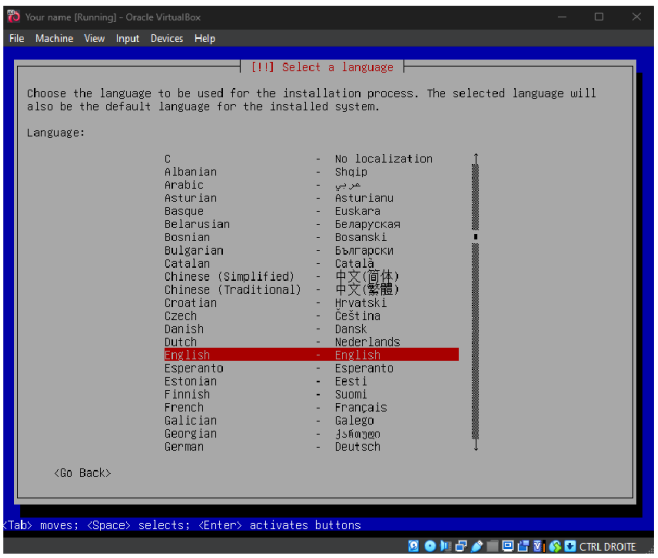
3.2 Beginning the Installation

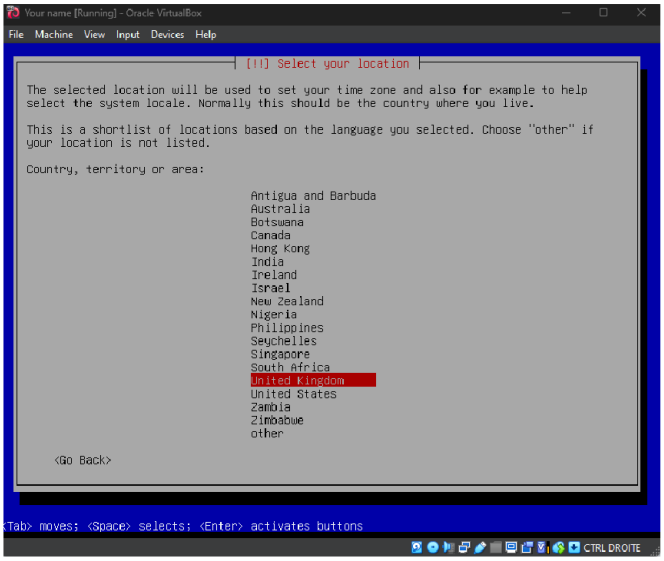
The Debian installer will launch automatically. Refer to the important commands in **Part 1**.

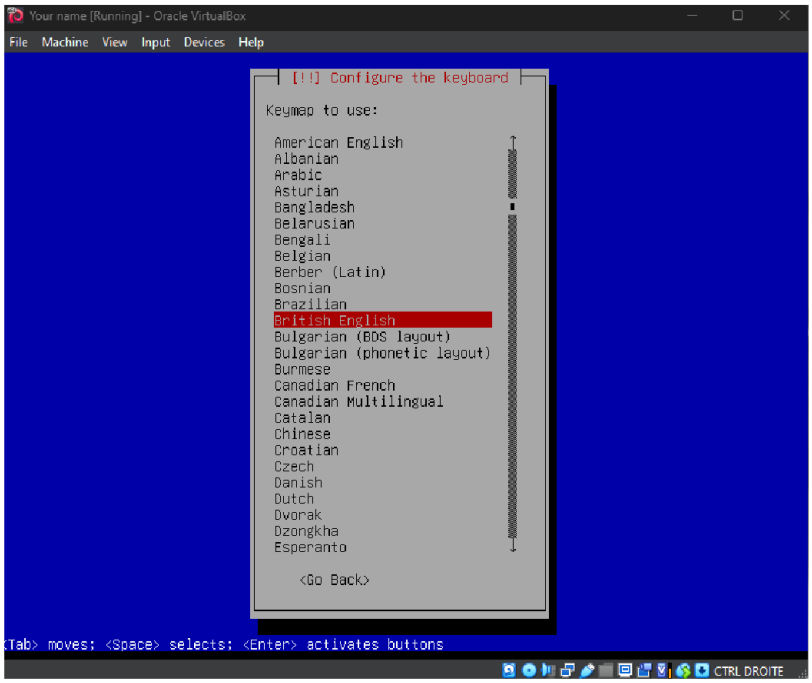


3.3 Language Configuration

Follow the steps to configure the language (except for your country, where you must choose your country).

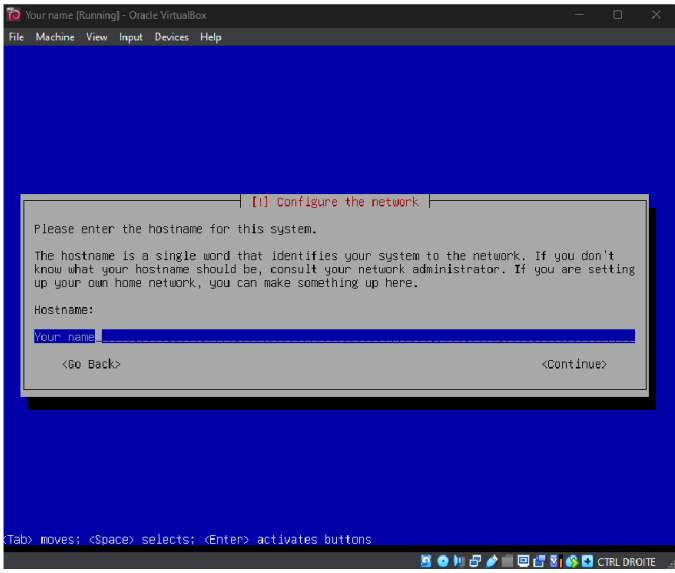

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Select a language
Choose the language to be used for the installation process. The selected language will also be the default language for the installed system.
Language:
C - No localization
Albanian - Shqip
Arabic - عربي
Asturian - Asturianu
Basque - Euskara
Belarusian - Беларуская
Bosnian - Bosanski
Bulgarian - Български
Catalan - Català
Chinese (Simplified) - 中文(简体)
Chinese (Traditional) - 中文(繁體)
Croatian - Hrvatski
Czech - Čeština
Danish - Dansk
Dutch - Nederlands
English - English
Esperanto - Esperanto
Estonian - Eesti
Finnish - Suomi
French - Français
Galician - Galego
Georgian - ქართული
German - Deutsch
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE


Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Select your location
The selected location will be used to set your time zone and also for example to help select the system locale. Normally this should be the country where you live.
This is a shortlist of locations based on the language you selected. Choose "other" if your location is not listed.
Country, territory or area:
Antigua and Barbuda
Australia
Botswana
Canada
Hong Kong
India
Ireland
Israel
New Zealand
Nigeria
Philippines
Seychelles
Singapore
South Africa
United Kingdom
United States
Zambia
Zimbabwe
other
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE


Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Configure the keyboard
Keymap to use:
American English
Albanian
Arabic
Asturian
Bangladesh
Belarusian
Bengali
Belgian
Berber (Latin)
Bosnian
Brazilian
British English
Bulgarian (BDS layout)
Bulgarian (phonetic layout)
Burmese
Canadian French
Canadian Multilingual
Catalan
Chinese
Croatian
Czech
Danish
Dutch
Dvorak
Dzongkha
Esperanto
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

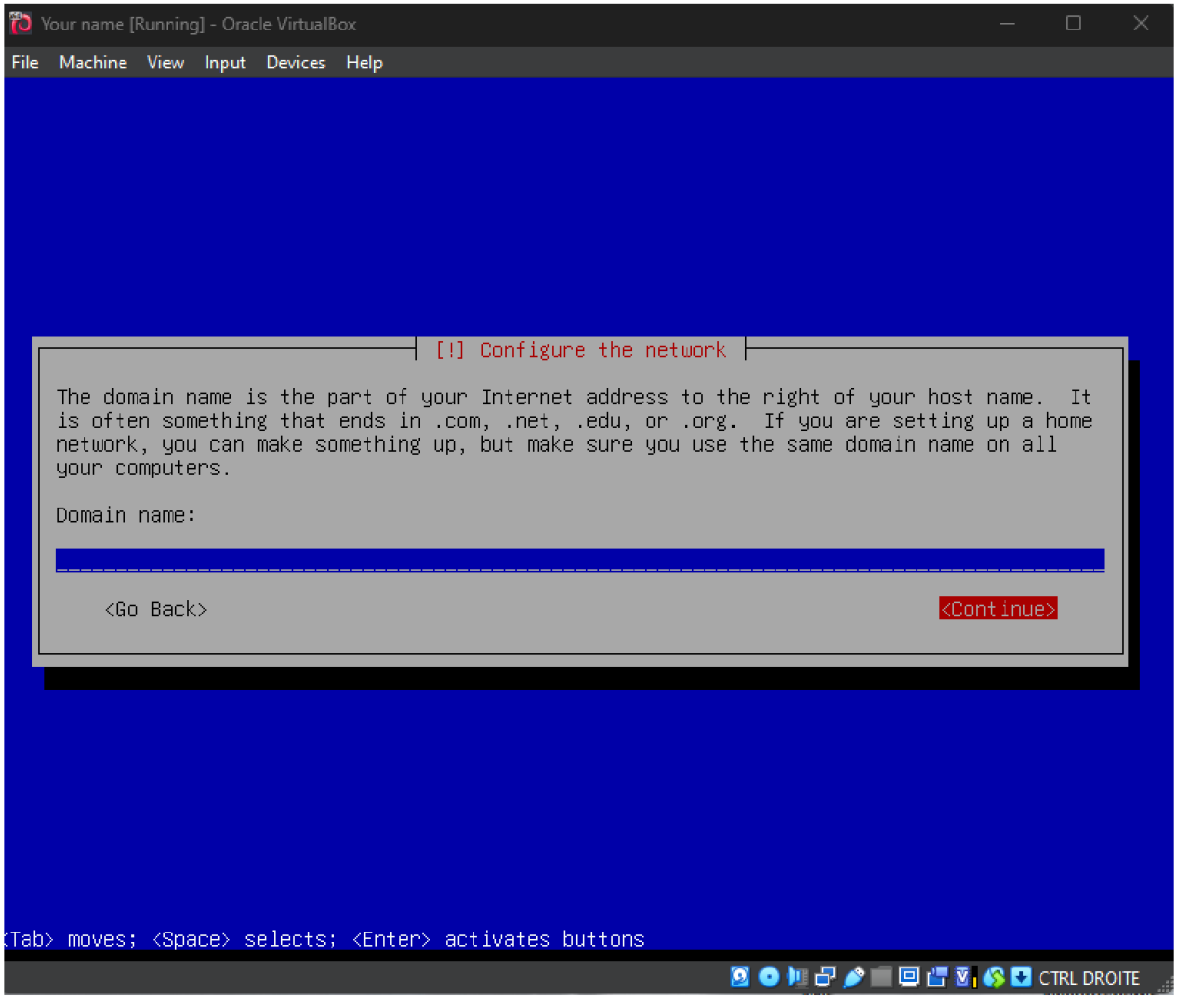
3.4 Machine Name

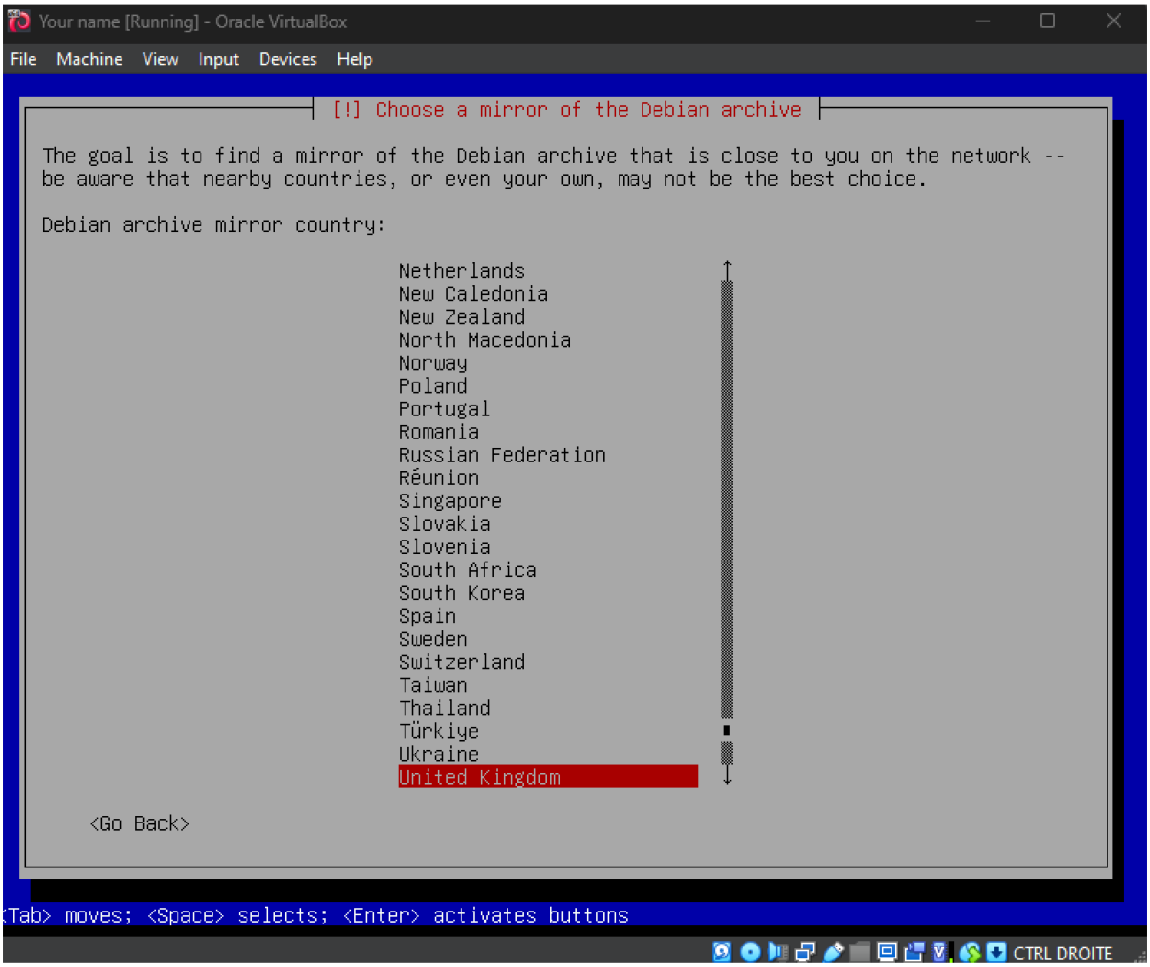
Assign a name to your machine, such as "ilikeenglish."

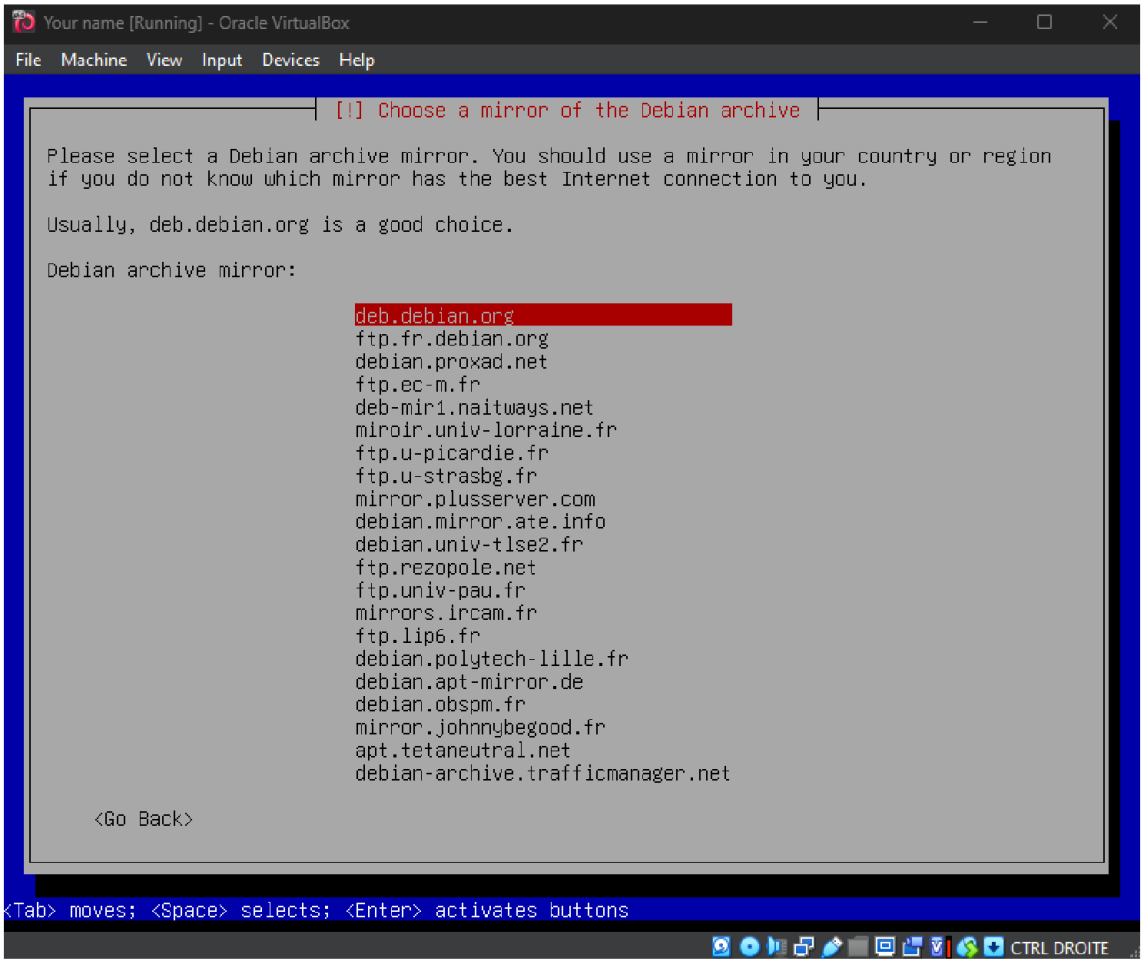


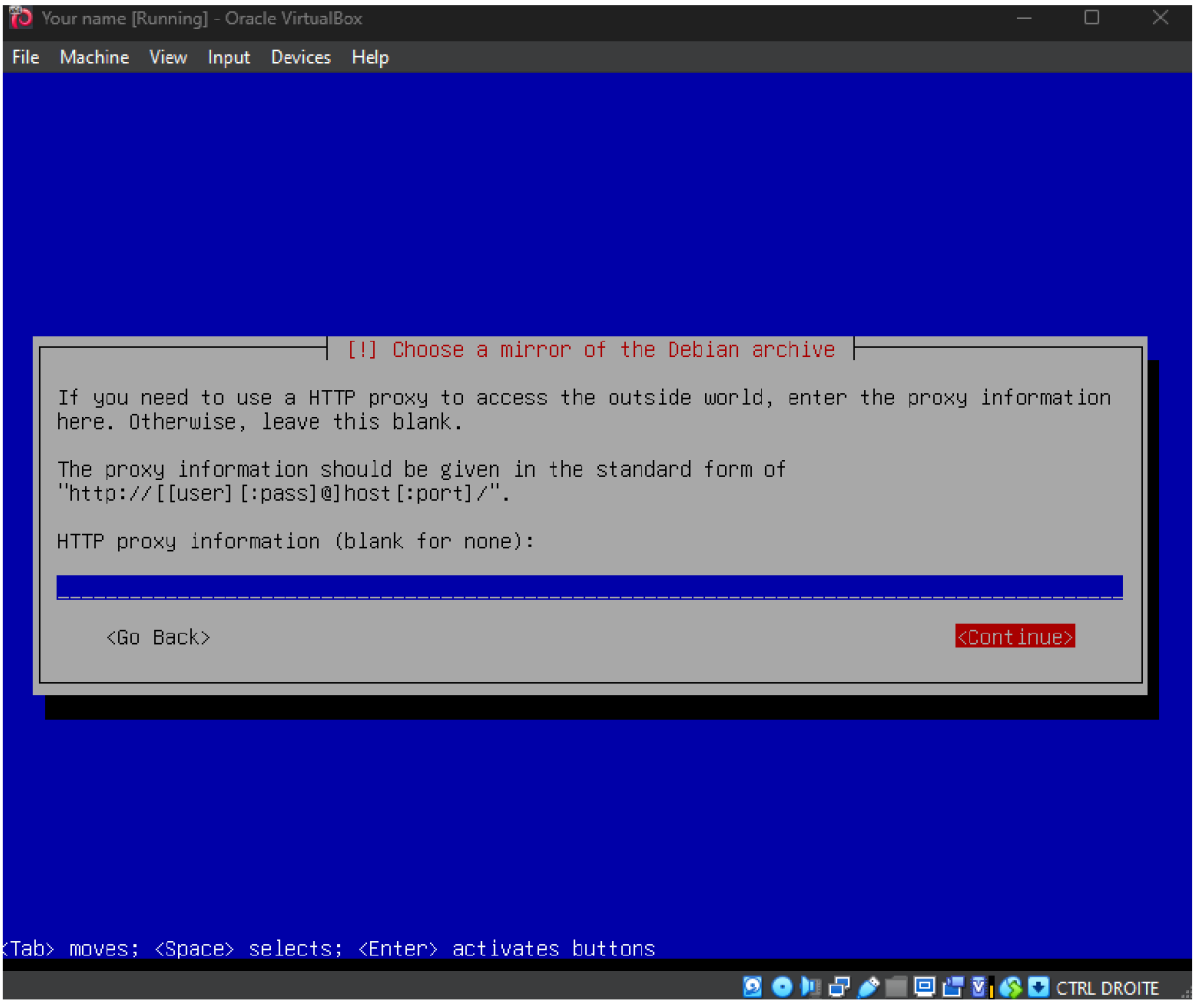
3.5 Network Configuration

Leave the domain field empty and choose an archive mirror like deb.debian.org, then follow the steps from the screenshots.



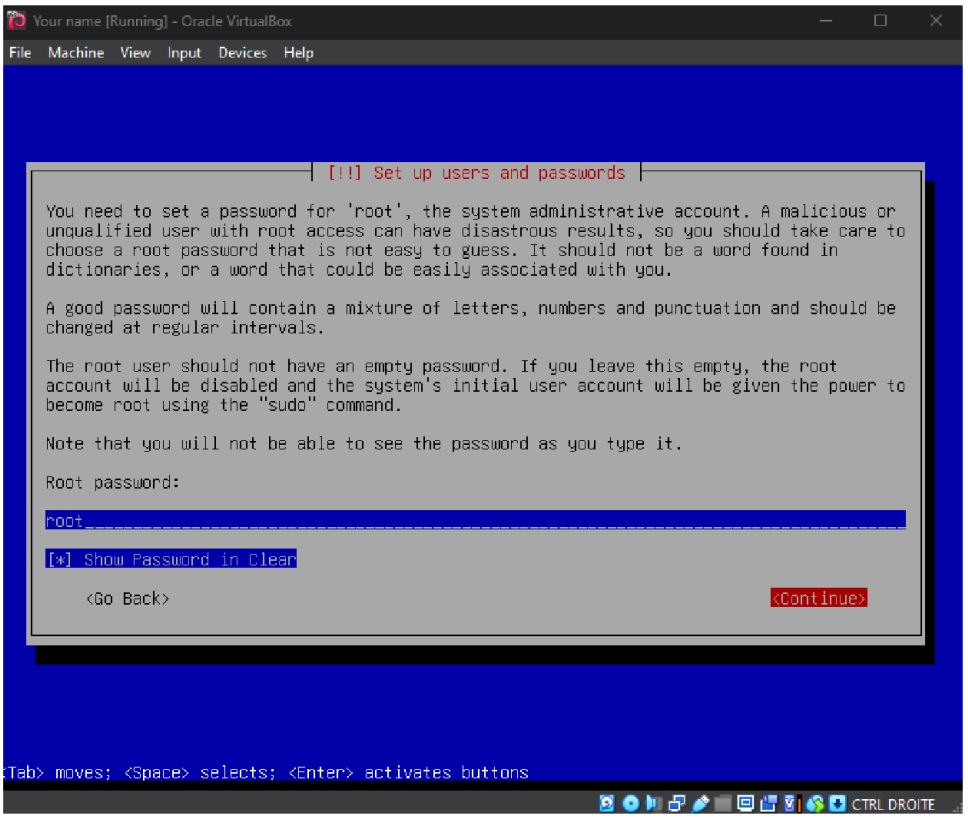

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!] Choose a mirror of the Debian archive
The goal is to find a mirror of the Debian archive that is close to you on the network --
be aware that nearby countries, or even your own, may not be the best choice.
Debian archive mirror country:
Netherlands
New Caledonia
New Zealand
North Macedonia
Norway
Poland
Portugal
Romania
Russian Federation
Réunion
Singapore
Slovakia
Slovenia
South Africa
South Korea
Spain
Sweden
Switzerland
Taiwan
Thailand
Türkiye
Ukraine
United Kingdom
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

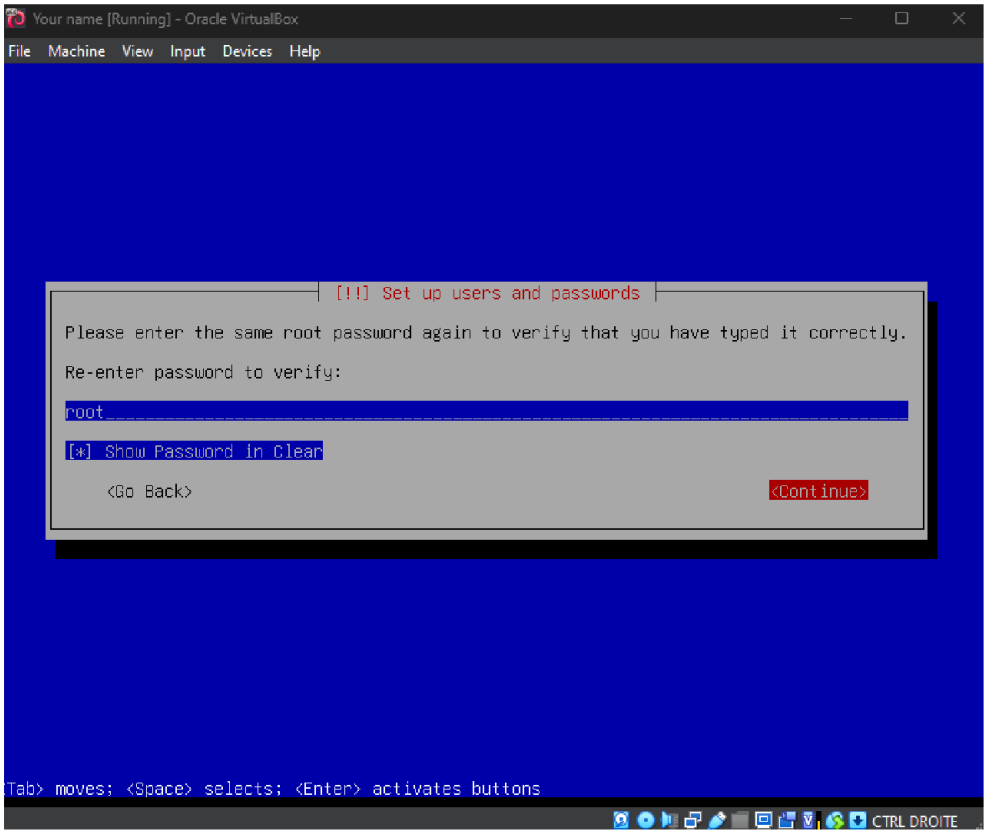

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!] Choose a mirror of the Debian archive
Please select a Debian archive mirror. You should use a mirror in your country or region
if you do not know which mirror has the best Internet connection to you.
Usually, deb.debian.org is a good choice.
Debian archive mirror:
deb.debian.org
ftp.fr.debian.org
debian.proxad.net
ftp.ec-m.fr
deb-mir1.naitways.net
miroir.univ-lorraine.fr
ftp.u-picardie.fr
ftp.u-strasbg.fr
mirror.plusserver.com
debian.mirror.ate.info
debian.univ-tlse2.fr
ftp.rezopole.net
ftp.univ-pau.fr
mirrors.ircam.fr
ftp.lip6.fr
debian.polytech-lille.fr
debian.apt-mirror.de
debian.obspm.fr
mirror.johnnybegood.fr
apt.tetaneutral.net
debian-archive.trafficmanager.net
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE



3.6 Superuser

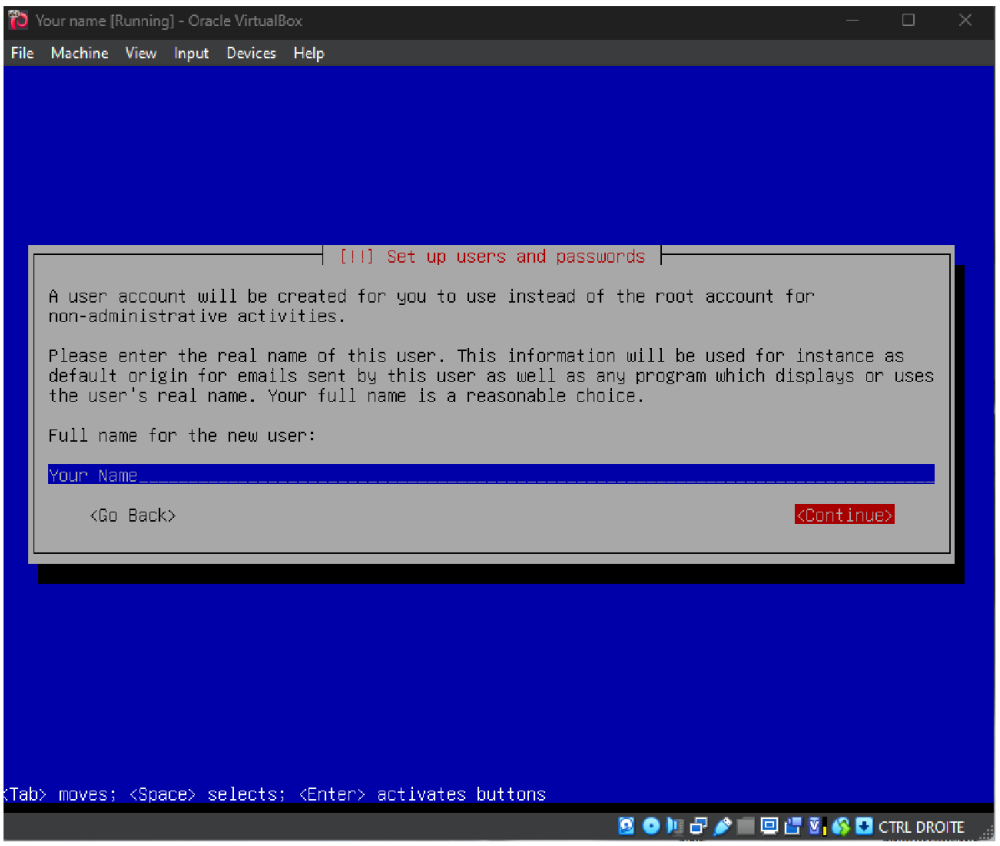
Set a password for the superuser (root).

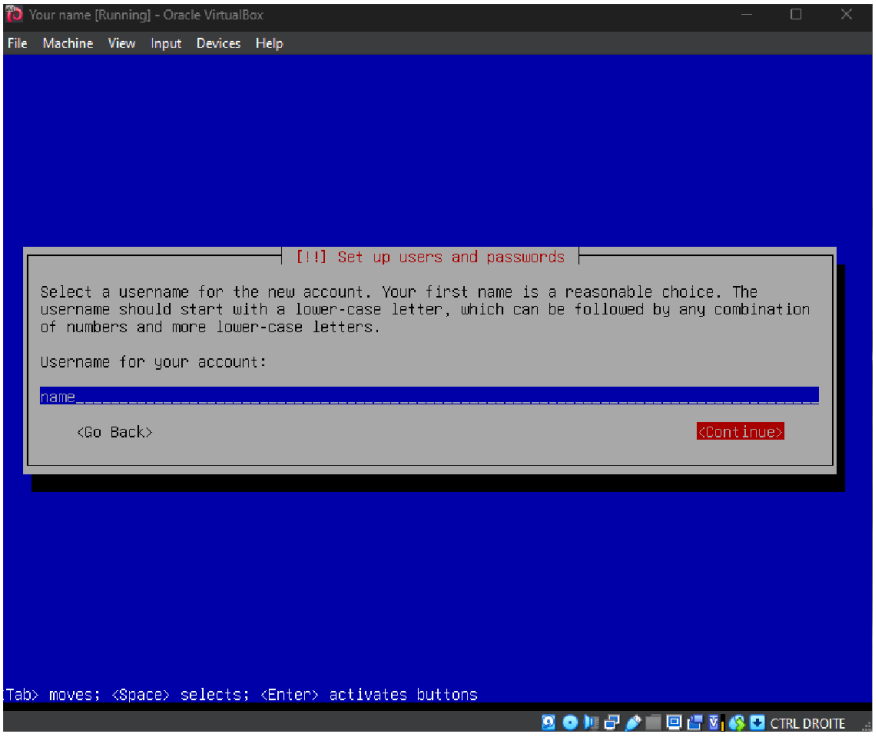


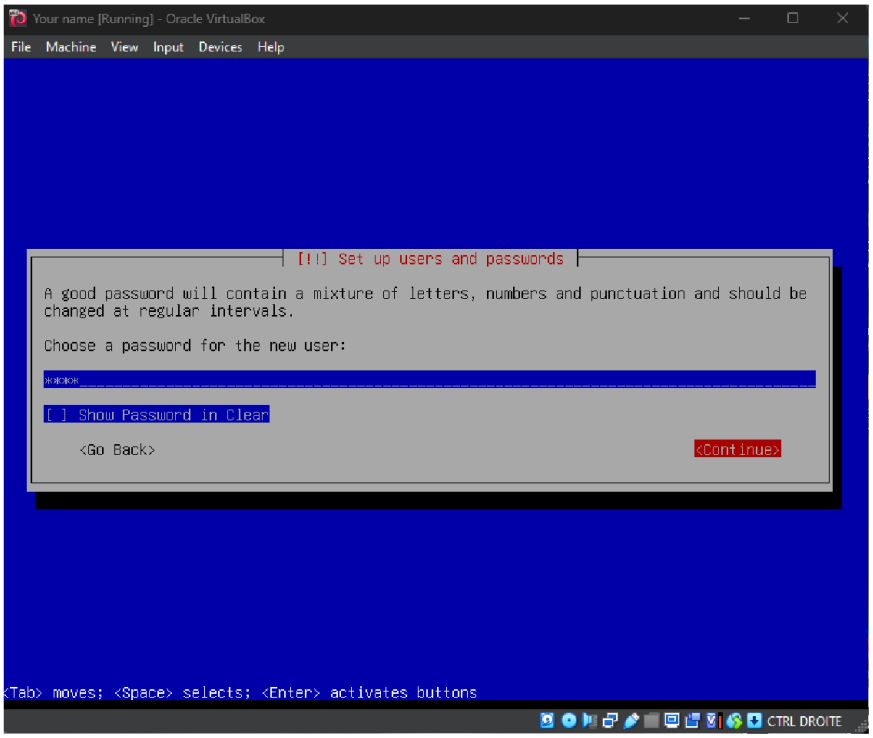


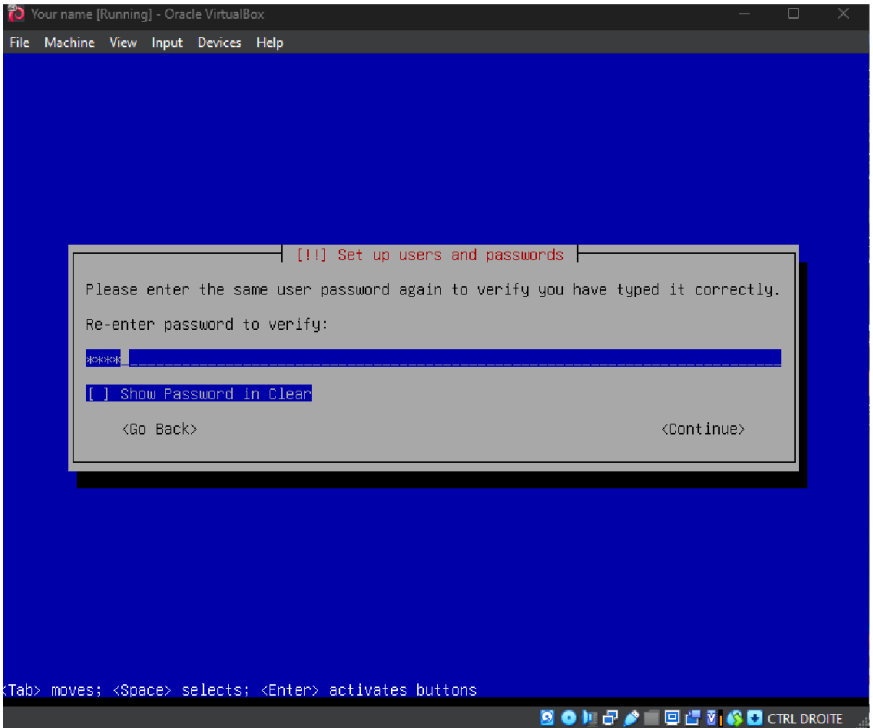
3.7 Creating a User

Create a user with a name, login, and password .



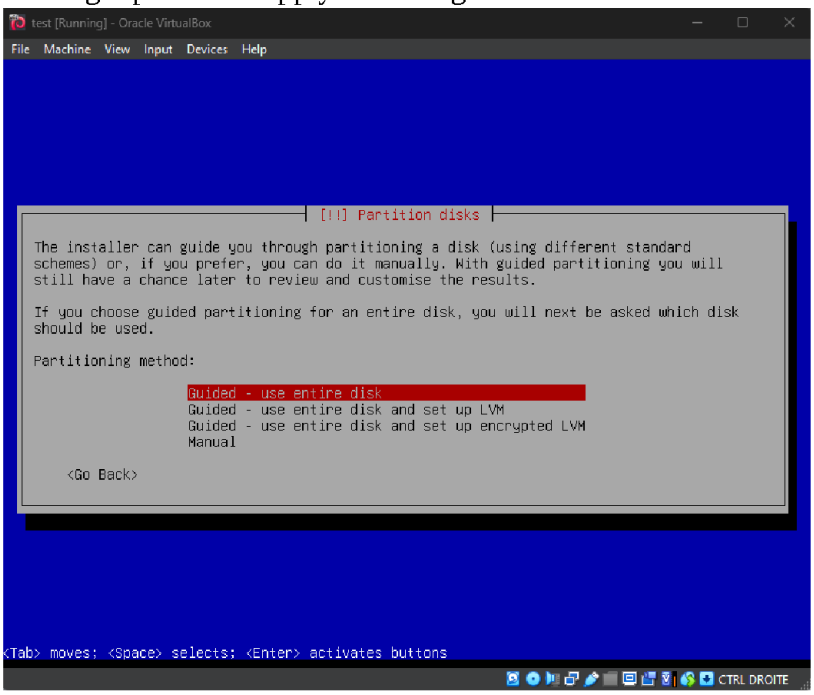

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Set up users and passwords
Select a username for the new account. Your first name is a reasonable choice. The username should start with a lower-case letter, which can be followed by any combination of numbers and more lower-case letters.
Username for your account:
name
<Go Back>
<Continue>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

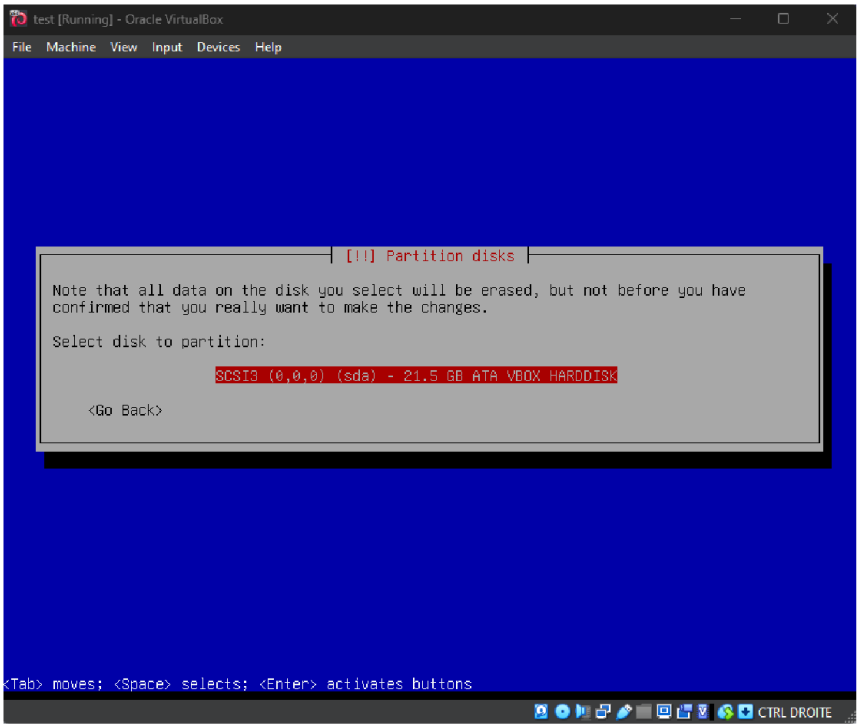

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Set up users and passwords
A good password will contain a mixture of letters, numbers and punctuation and should be changed at regular intervals.
Choose a password for the new user:
[ ] Show Password in Clear
<Go Back>
<Continue>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

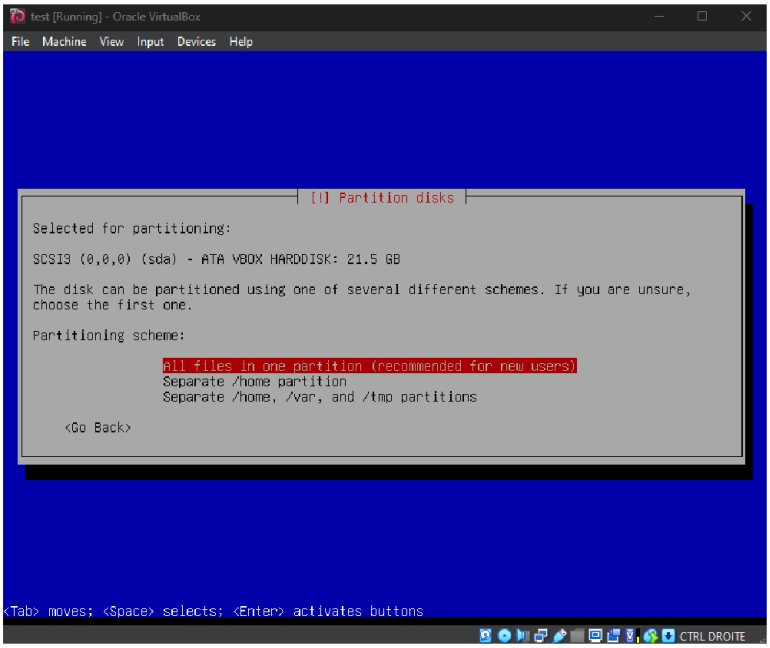

Your name [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Set up users and passwords
Please enter the same user password again to verify you have typed it correctly.
Re-enter password to verify:
[ ] Show Password in Clear
<Go Back>
<Continue>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

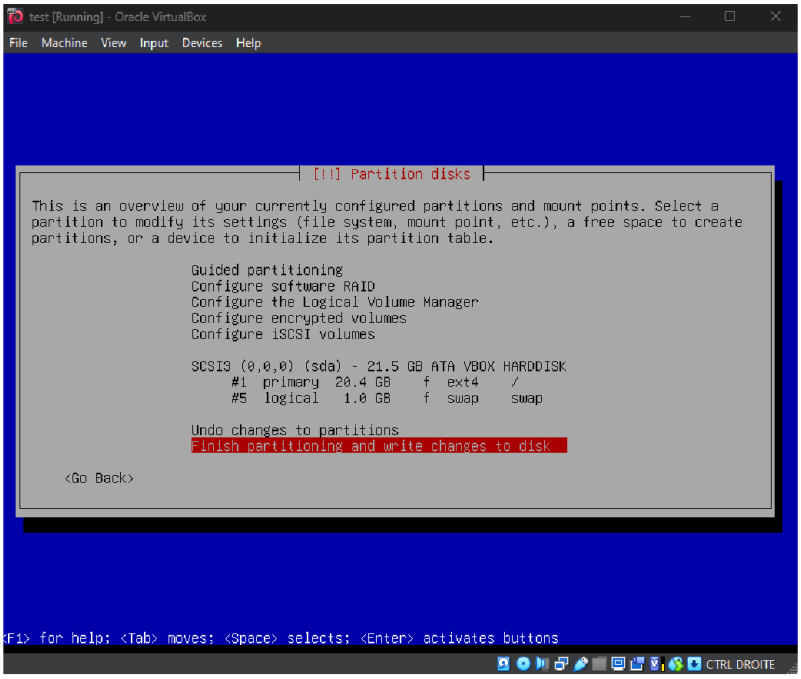
3.8 Disk Partitioning

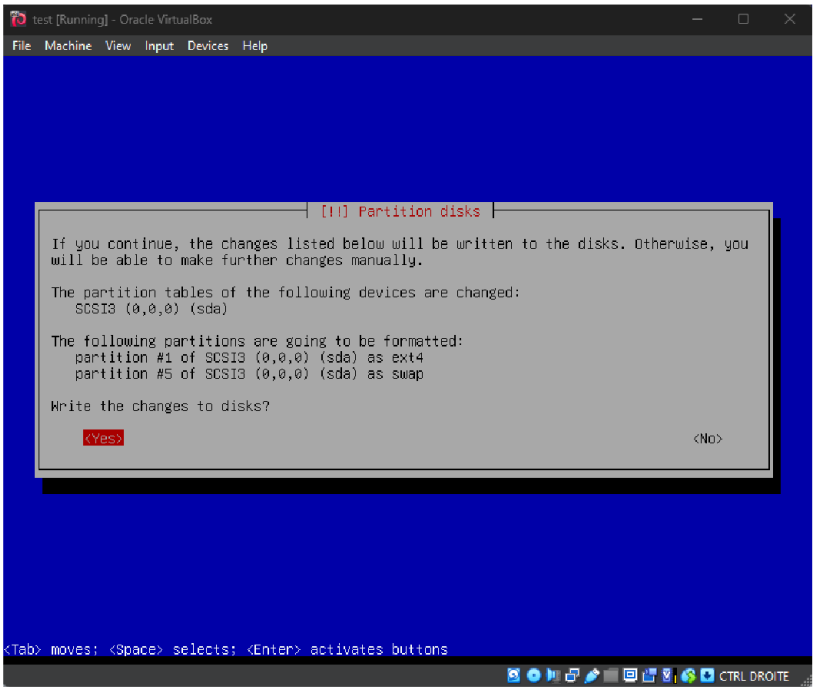
Accept the automatic disk partitioning with a single partition. Apply the changes

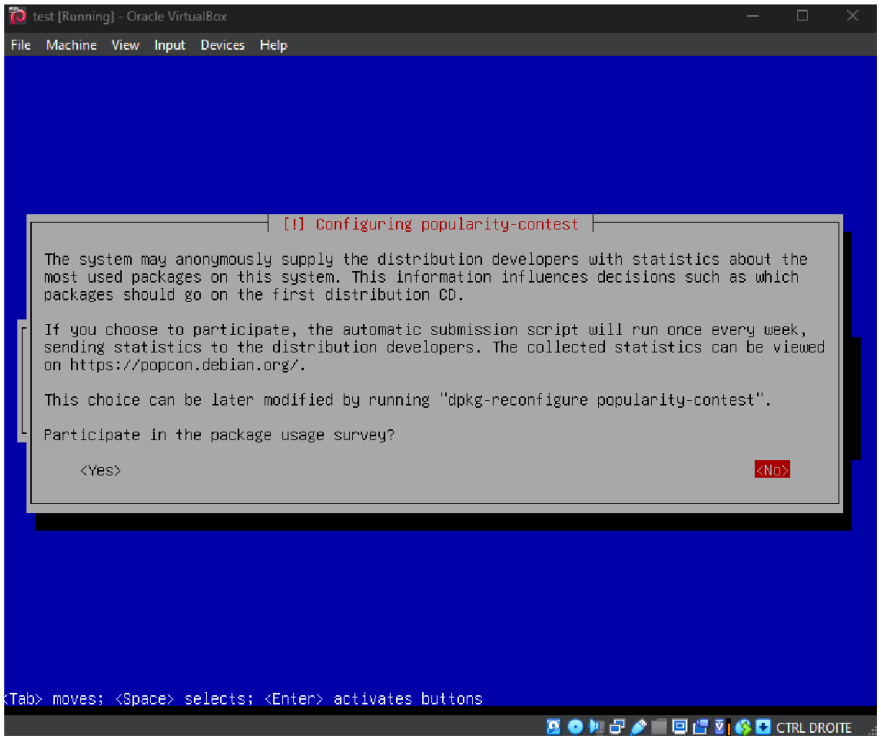





test [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!] Partition disks
Selected for partitioning:
SCSI3 (0,0,0) (sda) - ATA VBOX HARDDISK: 21.5 GB
The disk can be partitioned using one of several different schemes. If you are unsure, choose the first one.
Partitioning scheme:
All files in one partition (recommended for new users)
Separate /home partition
Separate /home, /var, and /tmp partitions
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

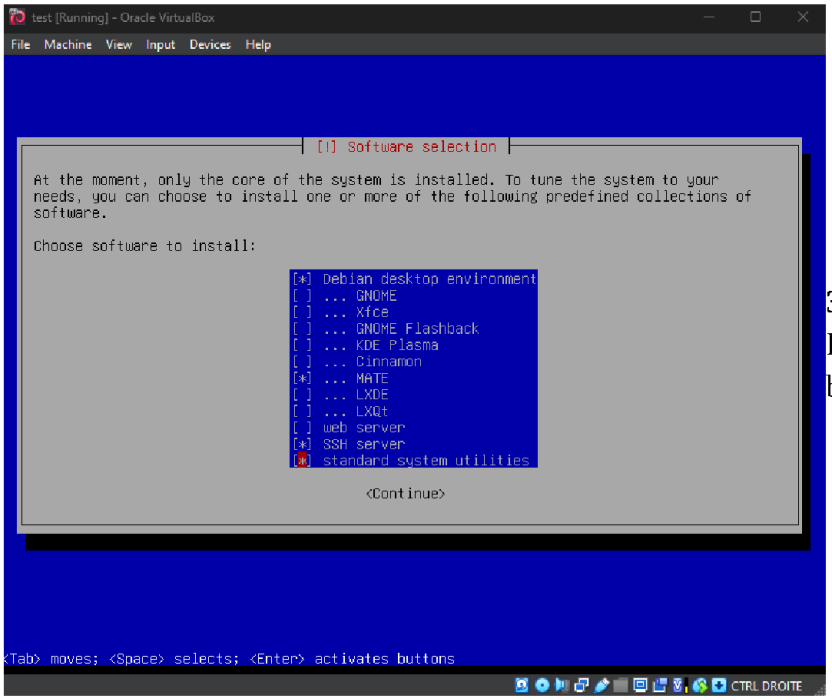

test [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Partition disks
This is an overview of your currently configured partitions and mount points. Select a partition to modify its settings (file system, mount point, etc.), a free space to create partitions, or a device to initialize its partition table.
Guided partitioning
Configure software RAID
Configure the Logical Volume Manager
Configure encrypted volumes
Configure iSCSI volumes
SCSI3 (0,0,0) (sda) - 21.5 GB ATA VBOX HARDDISK
#1 primary 20.4 GB f ext4 /
#5 logical 1.0 GB f swap swap
Undo changes to partitions
Finish partitioning and write changes to disk
<Go Back>
<F1> for help; <Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE


test [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!!] Partition disks
If you continue, the changes listed below will be written to the disks. Otherwise, you will be able to make further changes manually.
The partition tables of the following devices are changed:
SCSI3 (0,0,0) (sda)
The following partitions are going to be formatted:
partition #1 of SCSI3 (0,0,0) (sda) as ext4
partition #5 of SCSI3 (0,0,0) (sda) as swap
Write the changes to disks?
<Yes>
<No>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE



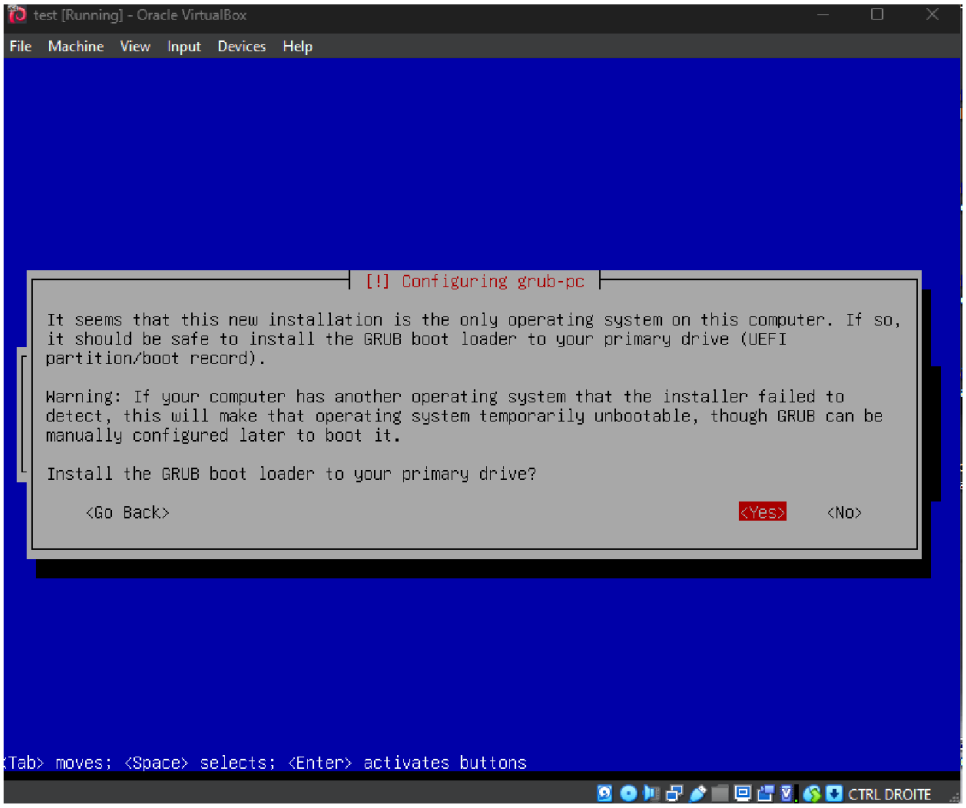
3.9 Software Installation

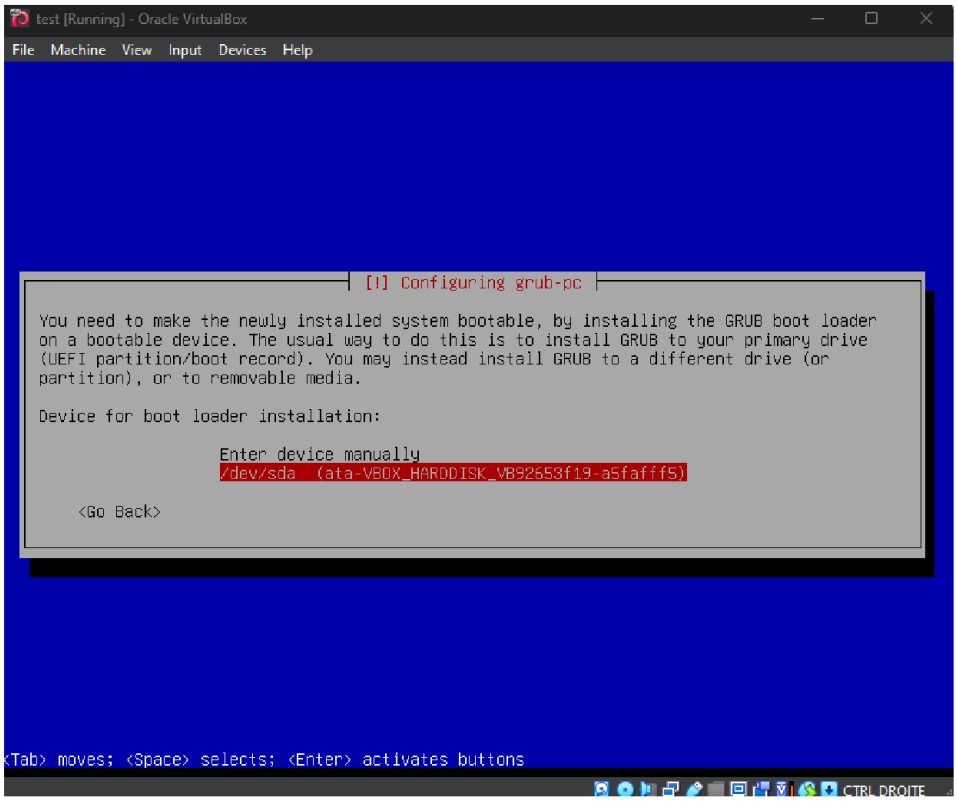
Choose exactly as shown in the screenshot.



3.10 Bootloader

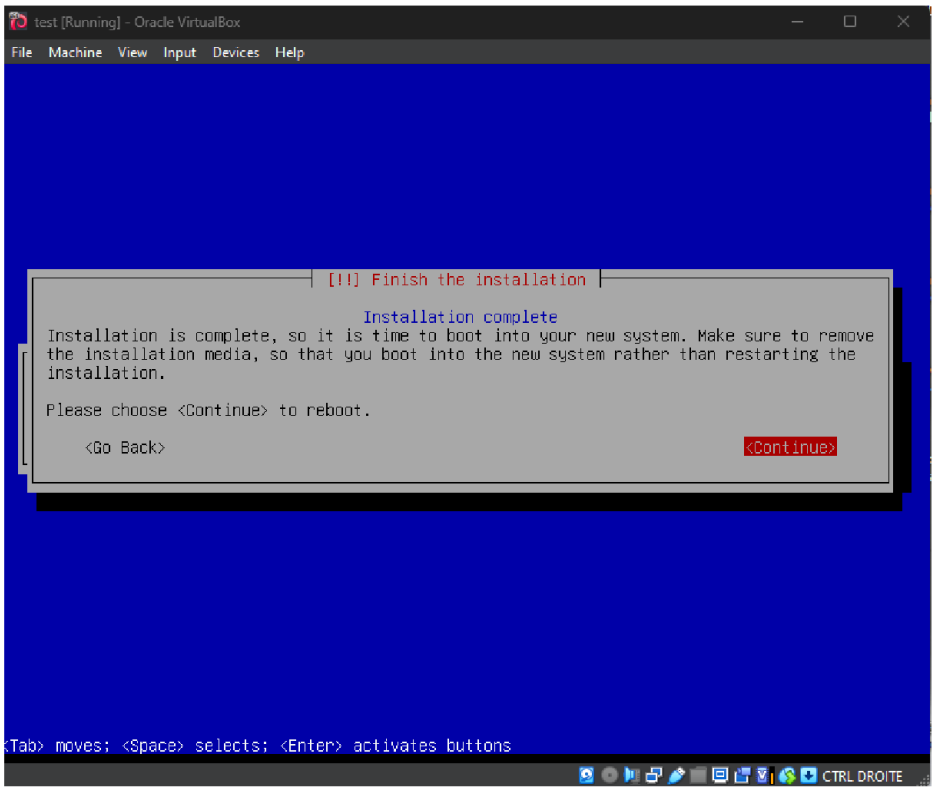
Install Grub to ensure your system boots correctly.


test [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!] Configuring grub-pc
It seems that this new installation is the only operating system on this computer. If so, it should be safe to install the GRUB boot loader to your primary drive (UEFI partition/boot record).
Warning: If your computer has another operating system that the installer failed to detect, this will make that operating system temporarily unbootable, though GRUB can be manually configured later to boot it.
Install the GRUB boot loader to your primary drive?
<Go Back>
<Yes>
<No>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE


test [Running] - Oracle VirtualBox
File Machine View Input Devices Help
[!] Configuring grub-pc
You need to make the newly installed system bootable, by installing the GRUB boot loader on a bootable device. The usual way to do this is to install GRUB to your primary drive (UEFI partition/boot record). You may instead install GRUB to a different drive (or partition), or to removable media.
Device for boot loader installation:
Enter device manually
/dev/sda (ata-VBOX_HARDDISK_VB92653f19-a5fafff5)
<Go Back>
<Tab> moves; <Space> selects; <Enter> activates buttons
CTRL DROITE

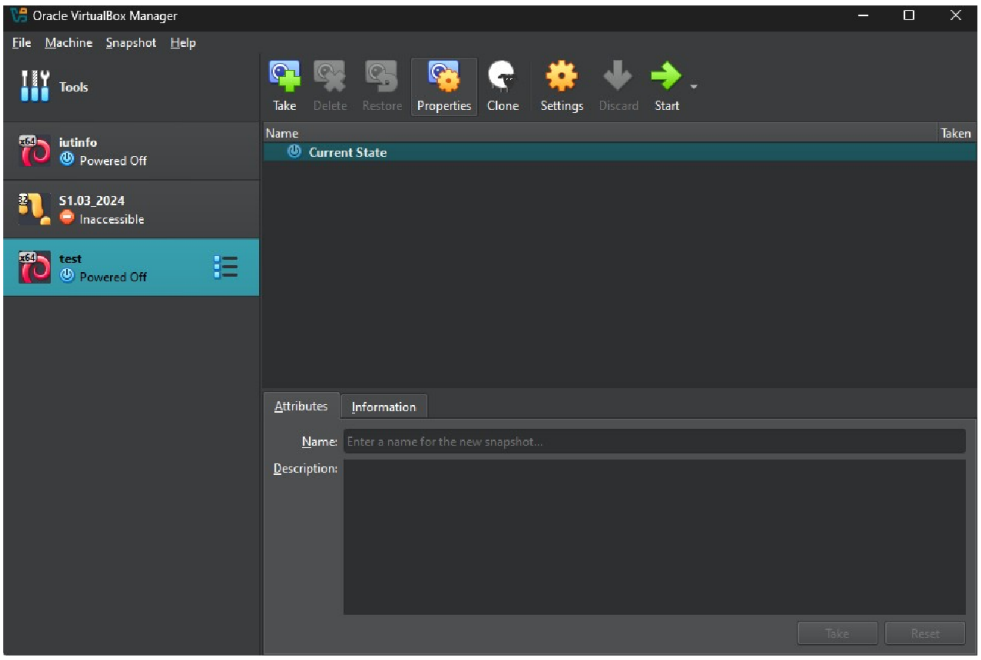
3.11 Finalization

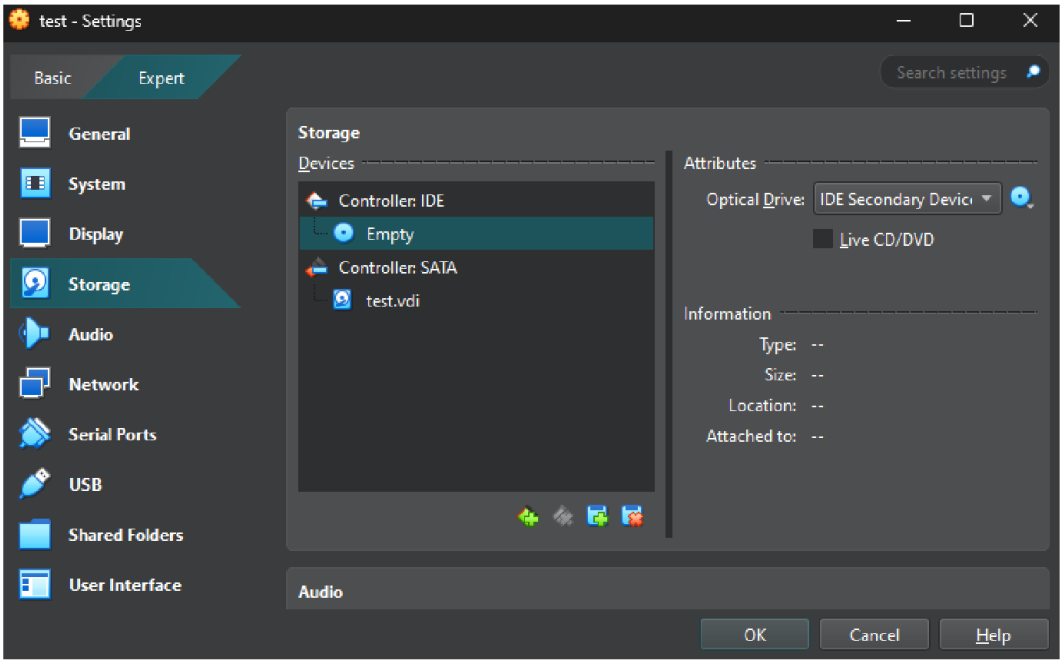
Once the installation is complete, click **Continue**, then shut down the virtual machine.



3.12 Unmounting the ISO

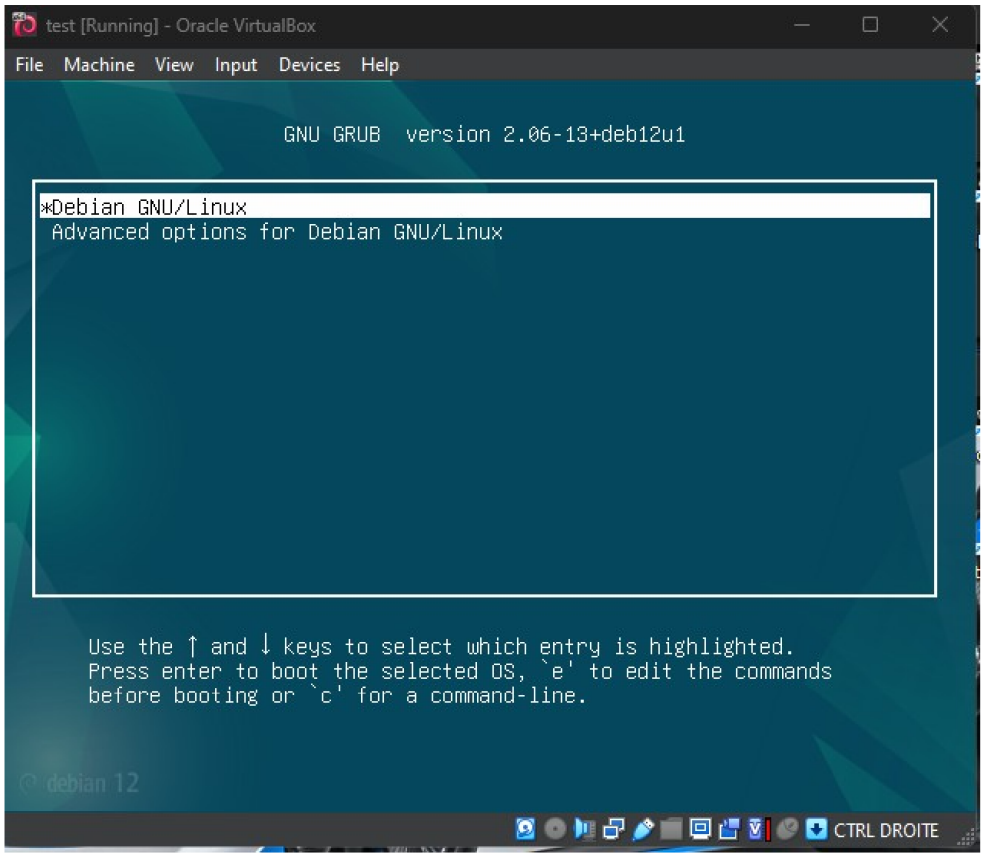
In the machine configuration, remove the ISO from the drive.

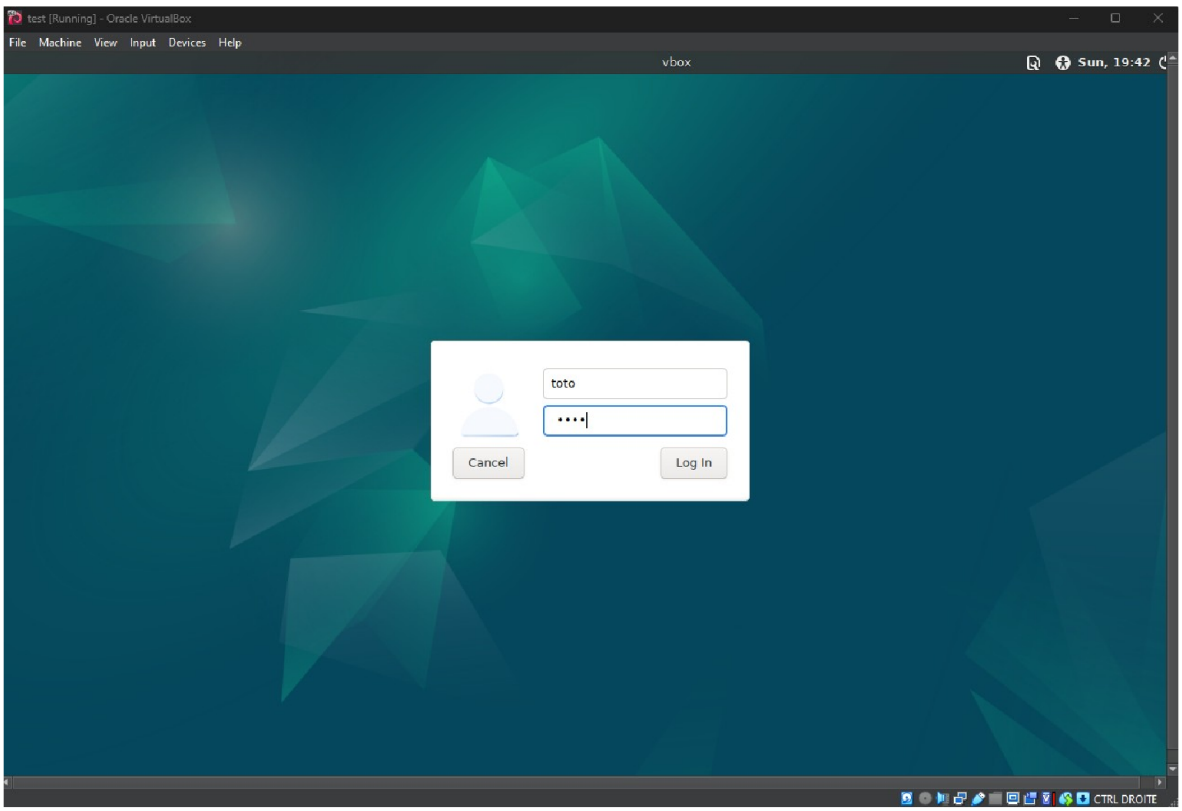




3.13 Starting Your Machine

Restart the machine and select the system to boot. Use **Enter** to start Debian.

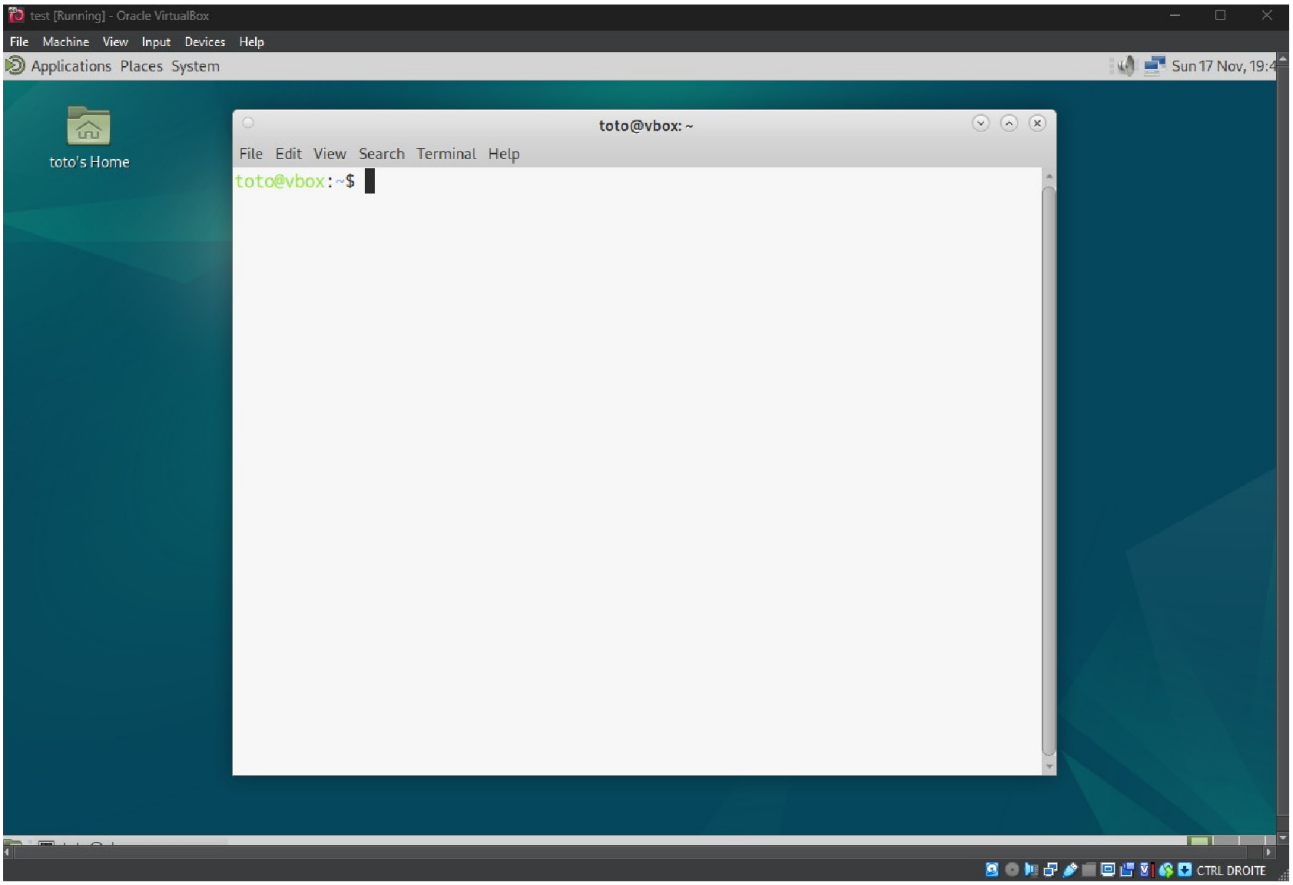




Part 3: Installing Software and GNOME Software on Debian

1. **Install GNOME Software**
   If GNOME Software is not already installed, here is how to install it:

- **Open the terminal**.



- **Update package information**:

```
bash
Copier le code
sudo apt update
```

- **Install GNOME Software**:

```
bash
Copier le code
sudo apt install gnome-software
```

- **Launch GNOME Software** via the menu or by typing `gnome-software` in the terminal.

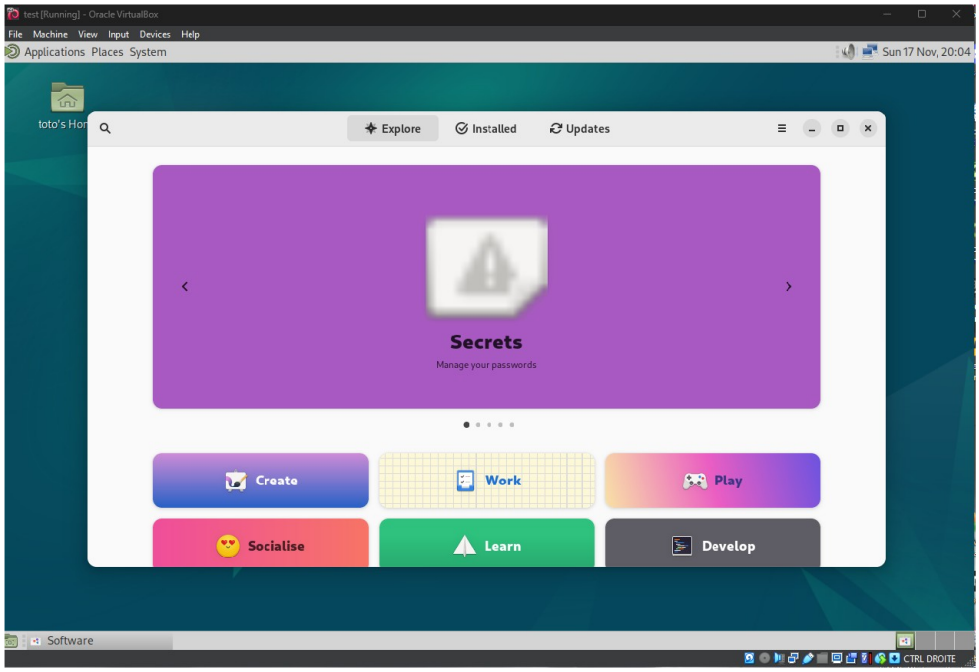
2. Using Snap or Flatpak with GNOME Software

To install applications via Snap or Flatpak, you first need to install these tools:

- **For Snap**:

```
bash
Copier le code
sudo apt install snapd
```

- **For Flatpak**:

```
bash
Copier le code
sudo apt install flatpak
sudo apt install gnome-software-plugin-flatpak
```

- Then, you'll have your store in **Applications** > **System Tools** > **Software**.