

Linux Installation

2025 castle lab



Environment

Virtual Machine: Oracle VirtualBox

Distribution: Ubuntu 18.04 (highly recommended)







VirtualBox installation

Website: <https://www.virtualbox.org/wiki/Downloads>


VirtualBox Platform Packages

VirtualBox 7.1.8 platform packages

-  **Windows hosts**
-  **macOS / Intel hosts**
-  **macOS / Apple Silicon hosts**
-  **Linux distributions**
-  **Solaris hosts**
-  **Solaris 11 IPS hosts**

Platform packages are released under the terms of the [GPL version 3](#)

select the packages
fit your host system



VirtualBox installation

Follow Installation spirit step by step to complete the installation



VirtualBox installation

If you encounter this warning just press yes



VirtualBox installation

After installation you can see the control panel of VirtualBox



Ubuntu Installation

Website: <https://releases.ubuntu.com/18.04/>

Select an image

Ubuntu is distributed on three types of images described below.

Desktop image

The desktop image allows you to try Ubuntu without changing your computer at all, and at your option to install it permanently later. This type of image is what most people will want to use. You will need at least 1024MiB of RAM to install from this image.

64-bit PC (AMD64) desktop image

Choose this if you have a computer based on the AMD64 or EM64T architecture (e.g., Athlon64, Opteron, EM64T Xeon, Core 2). Choose this if you are at all unsure.

Server install image

The server install image allows you to install Ubuntu permanently on a computer for use as a server. It will not install a graphical user interface.

64-bit PC (AMD64) server install image

Choose this if you have a computer based on the AMD64 or EM64T architecture (e.g., Athlon64, Opteron, EM64T Xeon, Core 2). Choose this if you are at all unsure.

A full list of available files, including BitTorrent files, can be found below.

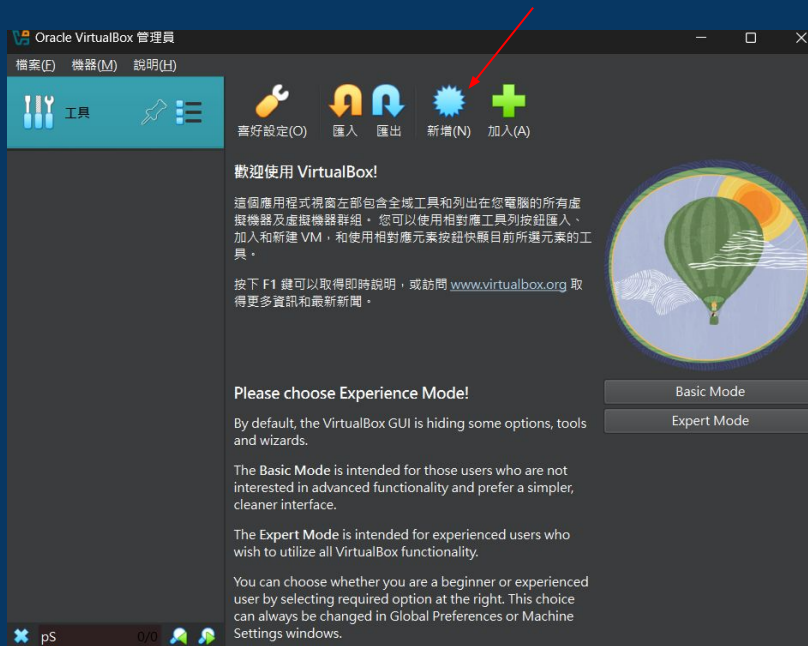
If you need help burning these images to disk, see the [Image Burning Guide](#).

download desktop
image(recommended)



Ubuntu Installation

Creating virtual machine through VirtualBox control panel



Ubuntu Installation

Select the Image download from Ubuntu website



select right iso file



Ubuntu Installation

fill in username
and password

建立虛擬機器

無人值守客體作業系統安裝設定

您可以透過修改使用者名稱、密碼和主機名稱來組建無人值守客體作業系統安裝。此外，您可以啟用 Guest Additions 安裝。對於 Microsoft Windows 客體，可以提供產品金鑰。

使用者名稱和密碼	額外選項
使用者名稱(S): johnnychang ✓	產品金鑰(P): #####-#####-#####-#####
密碼(W): ●●●●●●●●	主機名稱(M): Ubuntu ✓
重複密碼(R): ●●●●●●●●	域名(D): myguest.virtualbox.org ✓
	<input type="checkbox"/> 在背景安裝(I)

Guest Additions

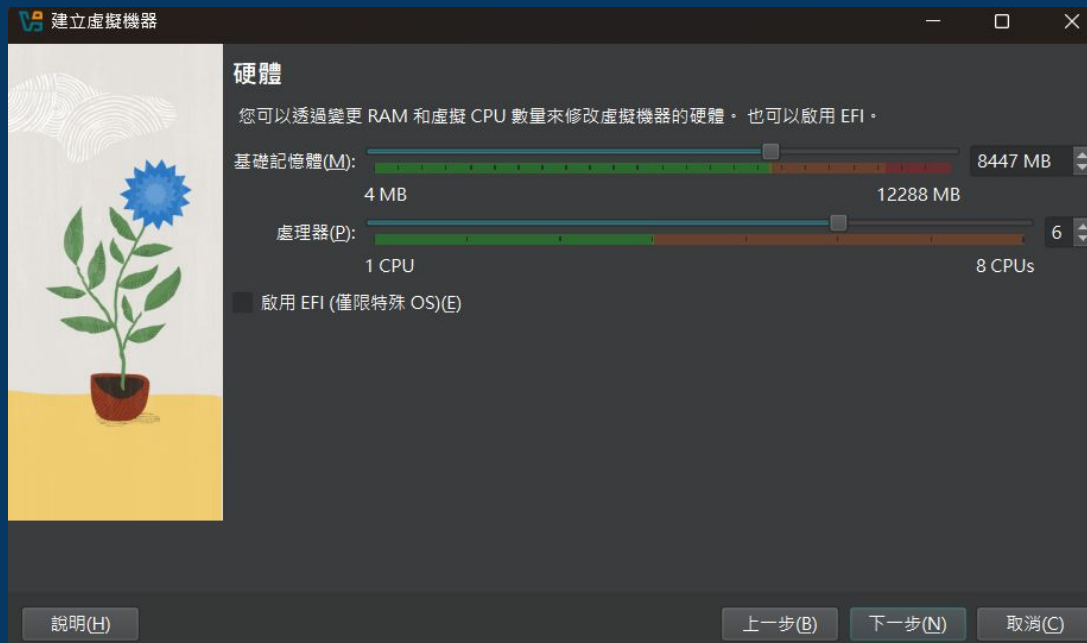
Guest Additions ISO: C:\Program Files\Oracle\VirtualBox\VBBoxGuestAdditions.iso

說明(H) 上一步(B) 下一步(N) 取消(C)



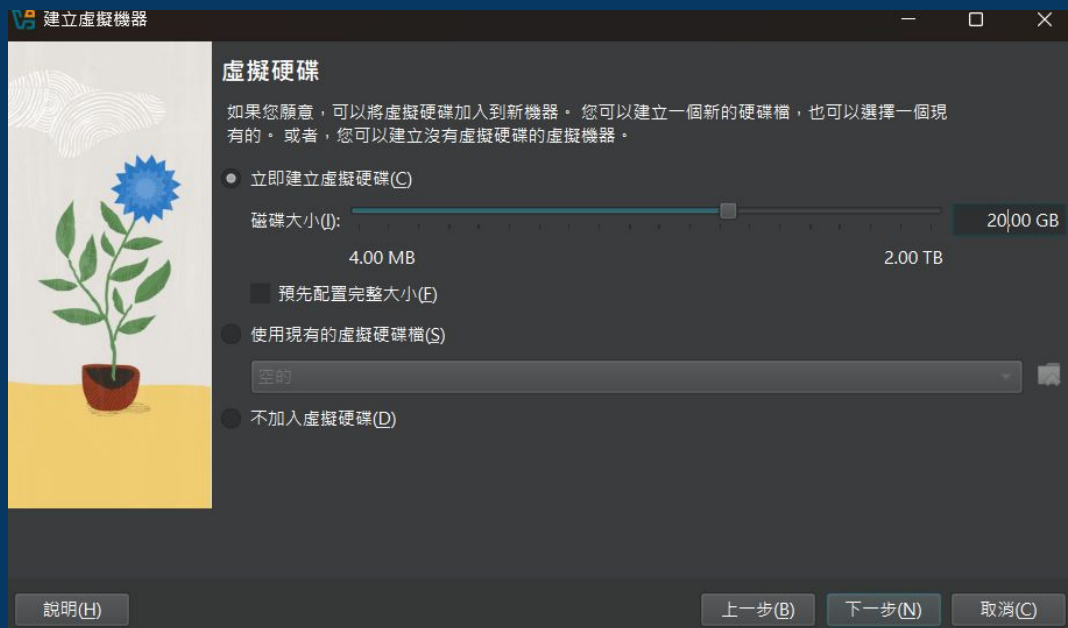
Ubuntu Installation

CPU should be more than two



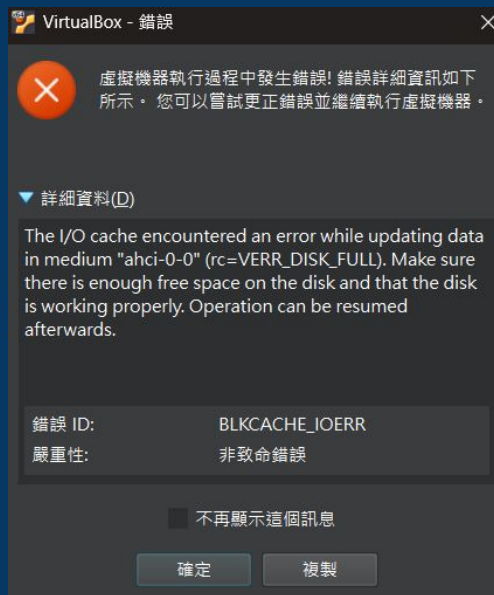
Ubuntu Installation

Virtual Disk should be at least 20GB (more is recommended)



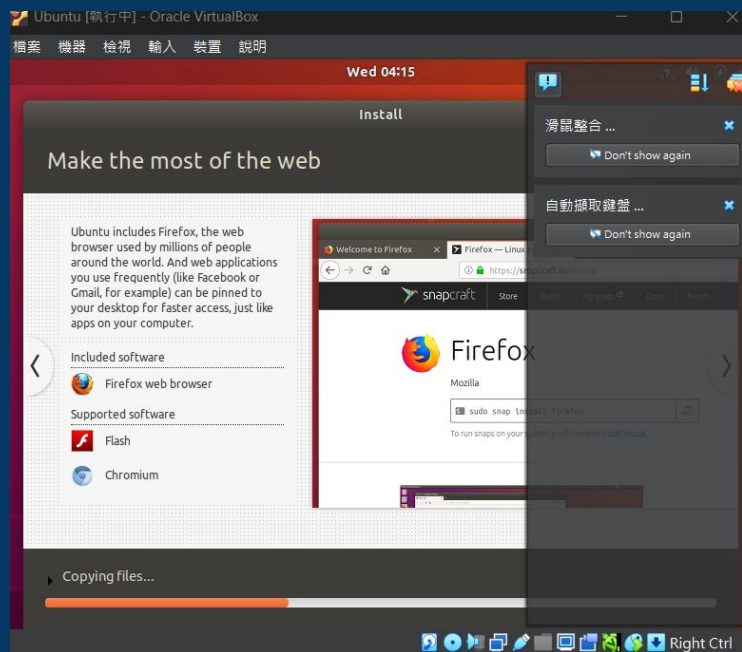
Ubuntu Installation

If you encounter this error, please check your host system has enough space for virtual machine



Ubuntu Installation

Wait for the installation finish



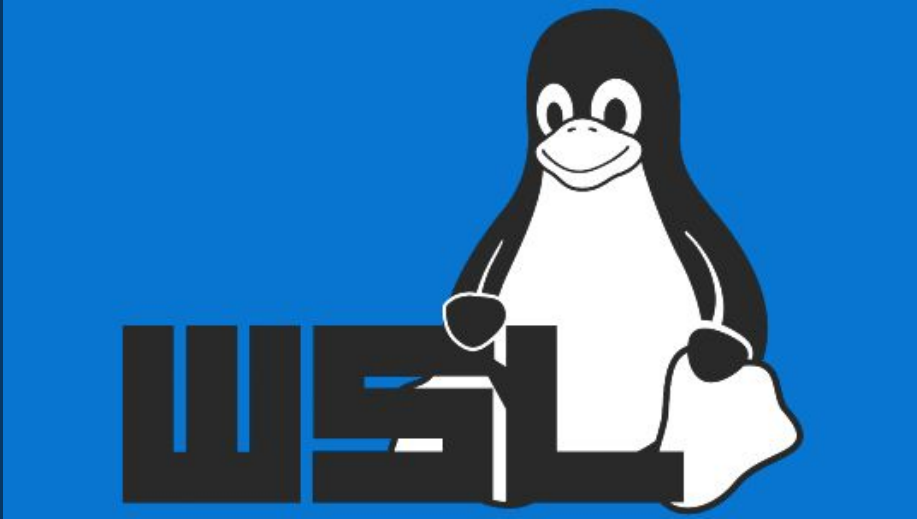
Ubuntu Installation

All done, enjoy



Alternative way – Windows Subsystem for Linux

More difficult way due to lack of desktop environment (not tested by TA yet, but it should work as well)



Alternative way – Windows Subsystem for Linux

Install command

```
wsl --install -d Ubuntu-18.04
```

```
Windows PowerShell
Copyright (C) Microsoft Corporation. 著作權所有，並保留一切權利。
請嘗試新的跨平台 PowerShell https://aka.ms/pscore6
PS C:\Users\USER> wsl --install -d Ubuntu-18.04
```



Alternative way – Windows Subsystem for Linux

Wait for Downloading, **reboot** after complete

```
C:\Windows\system32\wsl.exe
正在安裝：虛擬機器平台
已完成安裝 虛擬機器平台。
正在安裝：Windows 子系統 Linux 版
已完成安裝 Windows 子系統 Linux 版。
正在安裝：Windows 子系統 Linux 版
[==== 8.0% ]
```



Alternative way – Windows Subsystem for Linux

Fill in username and password

```
Ubuntu 18.04.6 LTS
已安裝 Ubuntu 18.04 LTS。
正在啟動 Ubuntu 18.04 LTS...
Installing, this may take a few minutes...
Please create a default UNIX user account. The username does not need to match your Windows username.
For more information visit: https://aka.ms/wslusers
Enter new UNIX username: johnnychang
Enter new UNIX password:
```



Alternative way – Windows Subsystem for Linux

All done, enjoy

```
johnnychang@DESKTOP-P84OD9G: ~  
已安裝 Ubuntu 18.04 LTS。  
正在啟動 Ubuntu 18.04 LTS...  
Installing, this may take a few minutes...  
Please create a default UNIX user account. The username does not need to match yo  
For more information visit: https://aka.ms/wslusers  
Enter new UNIX username: johnnychang  
Enter new UNIX password:  
Retype new UNIX password:  
passwd: password updated successfully  
操作順利完成。  
Installation successful!  
To run a command as administrator (user "root"), use "sudo <command>".  
See "man sudo_root" for details.  
  
johnnychang@DESKTOP-P84OD9G:~$
```

