# Downloading & Setting up the Virtual Machine

Download and install Virtual box on your computer.

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

Once down, navigate to the download for Debian amd64:

<https://cdimage.debian.org/debian-cd/current/amd64/iso-cd/>

Download the file named:[debian-12.1.0-amd64-netinst.iso](https://cdimage.debian.org/debian-cd/current/amd64/iso-cd/debian-12.1.0-amd64-netinst.iso)

Once you have the download downloaded, start up virtualbox and:

Click on “New” (CTRL-N) to create a new Virtual Machine:

Give it a name, like CST357457-Debian or something like that, in that same dialog area, select ISO Image: -> select the downloaded iso file you downloaded earlier…

Select the tab labeled unattended install and change the username to student, password to student. (you call really change it to whatever you want as long as you remember it)

Finally, select the hardware tab and make sure you have more than one processor selected.

Click “Finish”

It takes a good minute or two (more like 30-40 minutes) depending on your computer.

Once it’s finished, start the VM (select the VM and click on the green “right arrow”)

Once started,

you have a user named: **student**

the password for the default user is **student**

So, select the user name and type in the password…

Once in,

You need to install virtualbox guest additions:

#Open a terminal

click on “Activities”, type terminal in search bar and press enter…

Select it and open terminal to open a terminal window…

We need to switch to root (same password) so type

**su** (and when prompted for a password, enter **student**)

#need to update packages

**apt update**

#need to install necessary packages for guest additions:

**apt-get install build-essential dkms linux-headers-$(uname –r)**

#now add the CD image

#select “Devices” on the virtual box tool bar and in that dialog select “Install Guest Additions CD Image…”

#create a directory

**mkdir /mnt/cdrom**

#mount cdrom to directory

**mount /dev/cdrom /mnt/cdrom**

# move to that directory

**cd /mnt/cdrom**

#install guest additions (don’t forget the no X11)

**sh ./VBoxLinuxAdditions.run –noX11**

#once finished (it takes a minute –like 5), restart… upper right hand corner

#Once back in,

click on “Activities”, click on firefox application near the top

#google visual studio code

#Download the 64-bit deb installation…

#Open a terminal

click on “Activities”, type terminal in search bar and press enter…

Select it and open terminal to open a terminal window…

We need to switch to root (same password) so type

**su** (and when prompted for a password, enter **student**)

# you’ll need to change directory to Downloads, so type:

**cd Downloads**

Now install visual studio code:

**apt install ./code\*.deb**

#open **visual studio code**

#extensions you need to install in **visual studio code**: C/C++, code runner