# WSL – Vagrant – Ansible

## Install ubuntu in WSL

1. Enable WSL: wsl –install
2. Enable Virtual Machine Platform: dism.exe /online /enable-feature /featurename:VirtualMachinePlatform /all /norestart
3. Restart Your Computer
4. Set WSL2 as Default Version: wsl --set-default-version 2
5. Install a Linux Distribution from the Microsoft Store
   1. wsl --install -d Ubuntu
6. Launch and Set Up Your Linux Distribution

### Fix internet connection in WSL:

Edit wsl.conf:

sudo nano /etc/wsl.conf

Add the following:

[network]

generateResolvConf = **false**

wsl –shutdown

sudo nano /etc/resolv.conf

Add the following:

nameserver 8.8.8.8

ping ubuntu.com

### Fix SSH permissions in WSL

nano /etc/wsl.conf

Add the following:

*# Enable extra metadata options by default*

[automount]

enabled = **true**

root = /mnt/

options = "metadata,umask=77,fmask=11"

mountFsTab = **false**

### Update Ubuntu

sudo apt-get update

### Install Python in WSL

sudo apt-get install python3 python3-pip python3-venv

### Install Vagrant in WSL (Windows System and WSL Vagrant versions MUST match)

sudo apt-get install vagrant

Verify version number for Windows installation

vagrant --version

## Install Vagrant on Windows

Go to: <https://releases.hashicorp.com/vagrant/>

Select the same version as shown above in the last instructions

Then pick the vagrant\_ . . \_windows\_amd64.msi

From the download folder install the msi file.

Verify the installation version:

Open Powershell and type the following:

PS > vagrant --version

## Create a vagrant home directory

Create the following directory structure:

C:\vagrant\_home\

Copy the .vagrant.d folder to the C:\vagrant\_home directory

## Update user files .bashrc & .profile

sudo nano ~/.bashrc

Add the following:

export VAGRANT\_WSL\_ENABLE\_WINDOWS\_ACCESS=1

export PATH="$PATH:/mnt/c/Program files/Oracle/VirtualBox"

export VAGRANT\_WSL\_WINDOWS\_ACCESS\_USER\_HOME\_PATH="/mnt/c/vagrant\_home/"

export VAGRANT\_DEFAULT\_PROVIDER=virtualbox

sudo nano ~/.profile

Add the following:

PATH="mnt/c/Windows/System32:$PATH"

## Install Ansible

In WSL Ubuntu

sudo apt install pip

python3 -m pip install --user pipx

python3 -m pipx ensurepath

pipx install --include-deps ansible

sudo apt install ansible-core

ansible –version

### Create a Vagrant project folder:

Create the following folder structure: ~/VagrantProjects/V-Test

cd ~/VagrantProjects/V-Test

vagrant plugin install virtualbox\_WSL2

vagrant init generic/ubuntu --box-version 4.3.12

cp Vagrantfile ORIG-Vagrantfile-ORIG

nano Vagrantfile

Copy and paste the Vagrantfile.txt file contents into the nano session