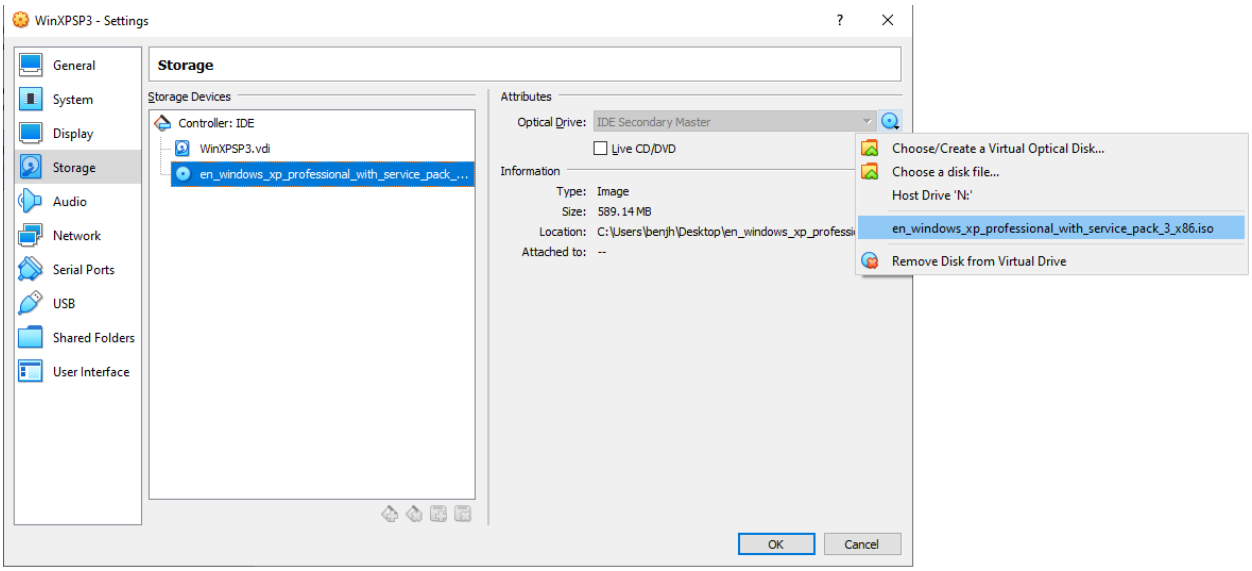
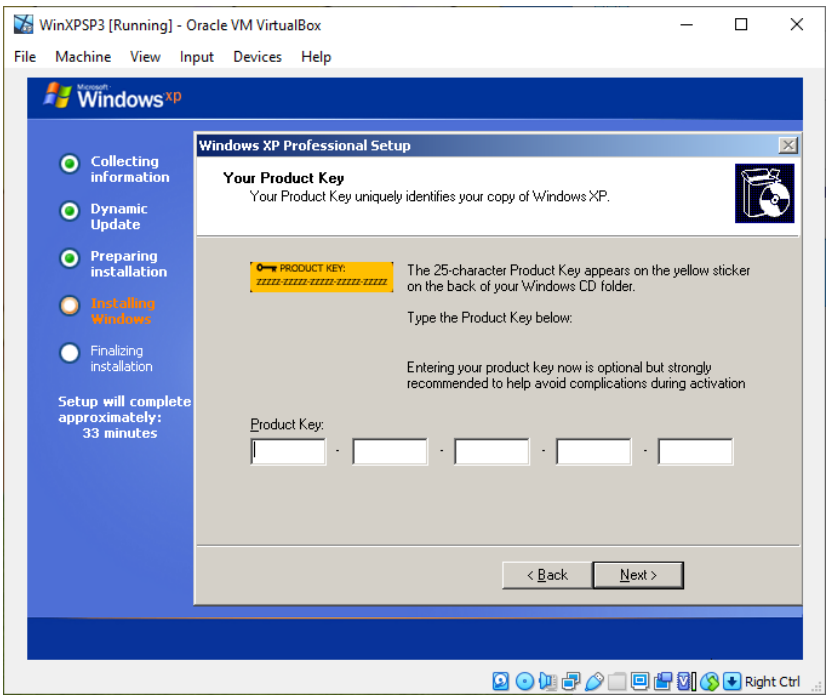
After you have imported the PAC2020 OVA file into VirtualBox you should setup a new Windows XP machine using the provided ISO file. You may wish to increase the amount of RAM and CPU cores available to the PAC2020 VM based on your system (by default it is conservative and somewhat slow).

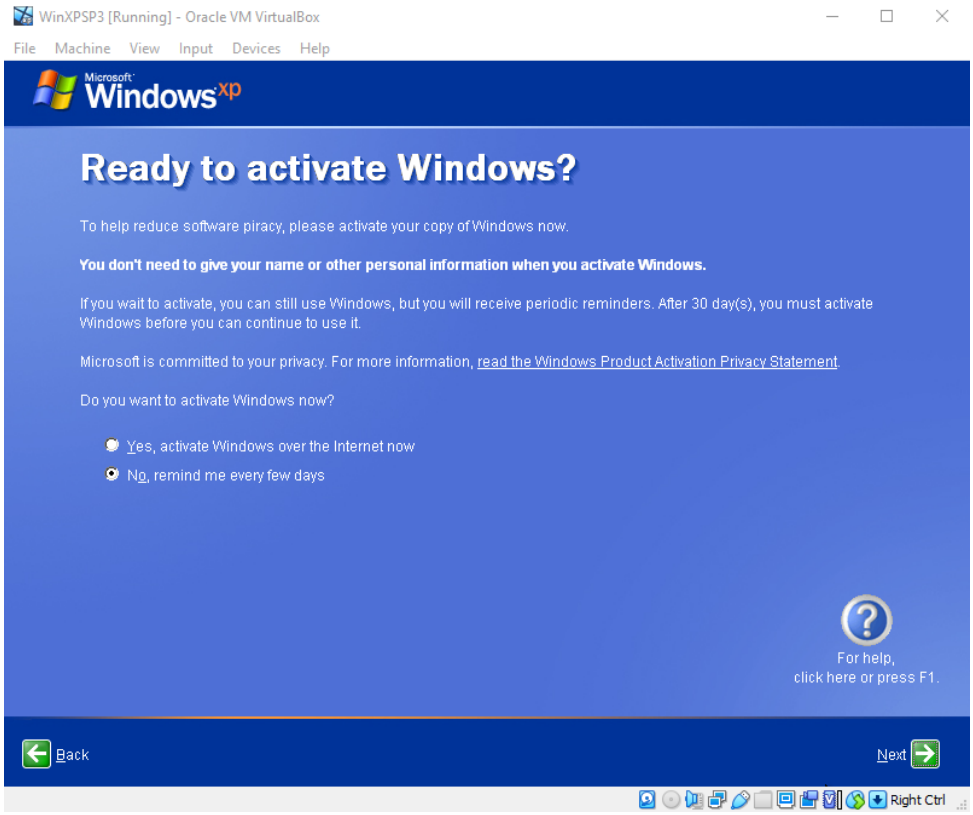
Withing the VirtualBox manager select Machine > New to create a new virtual machine. When selecting resources for the virtual machine remember that Windows XP is not a resource intensive OS (1GB of RAM is plenty). Before starting the virtual machine insert the ISO file as a CD-ROM using the Settings menu to access the Storage settings.



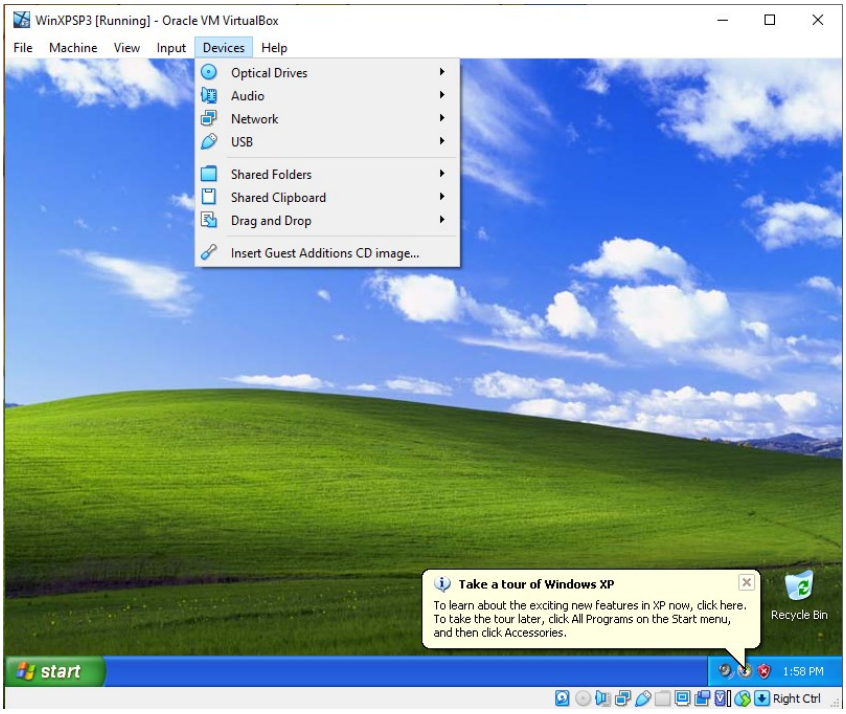
Start the virtual machine to be greeted by the Windows XP installer. You will need to follow the prompts to create a partition and install Windows on the partition. The default install options are fine. Once the machine reboots you will be prompted to enter a license key. Do not enter a license key and press Next.

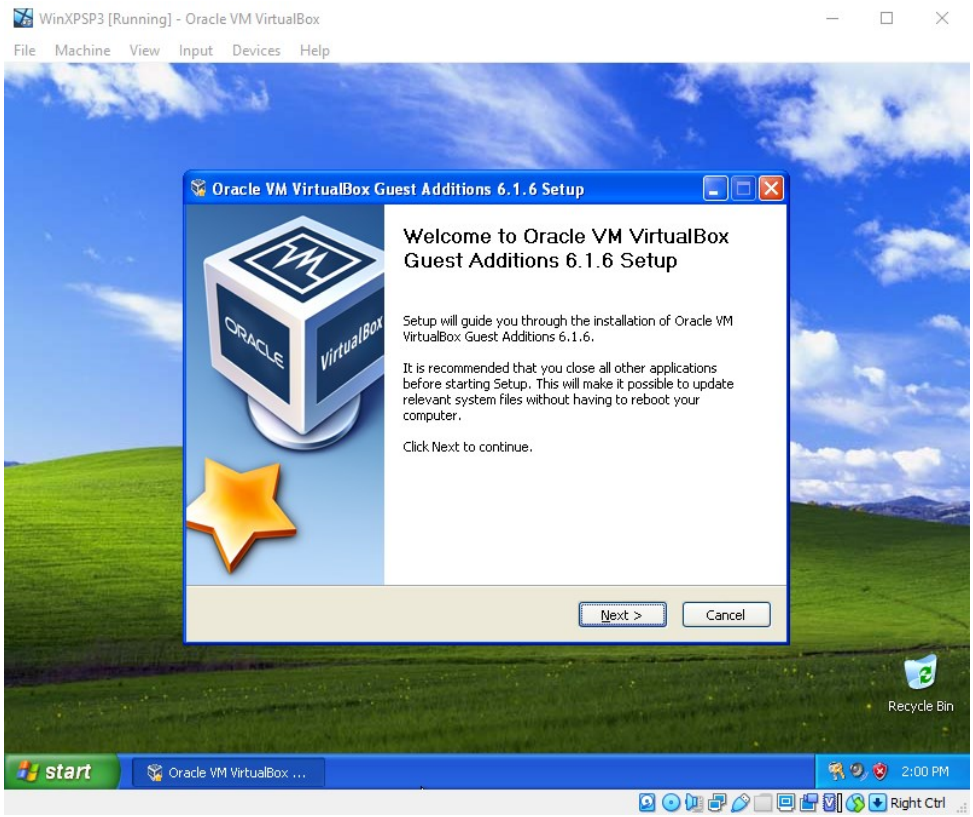


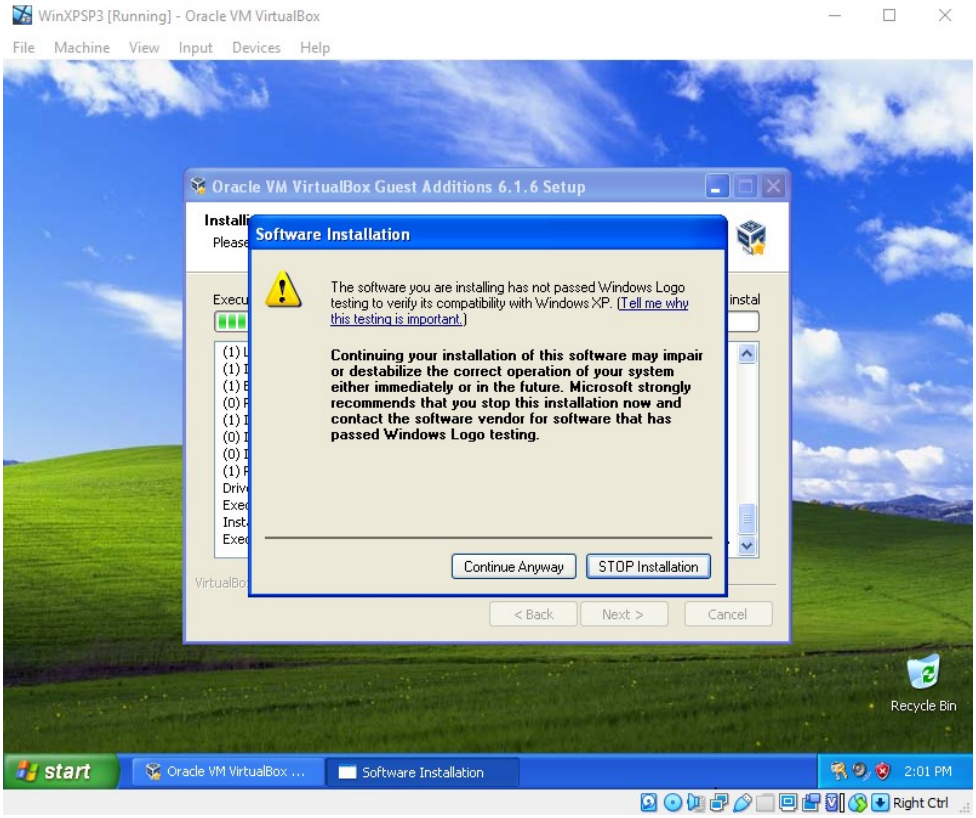
You do not have a license key and we will be using Windows XP in its 30-day evaluation mode to complete the lab (the Microsoft activation servers have been disabled for Windows XP anyway). There is also no need to bother with turning on Automatic Updates.



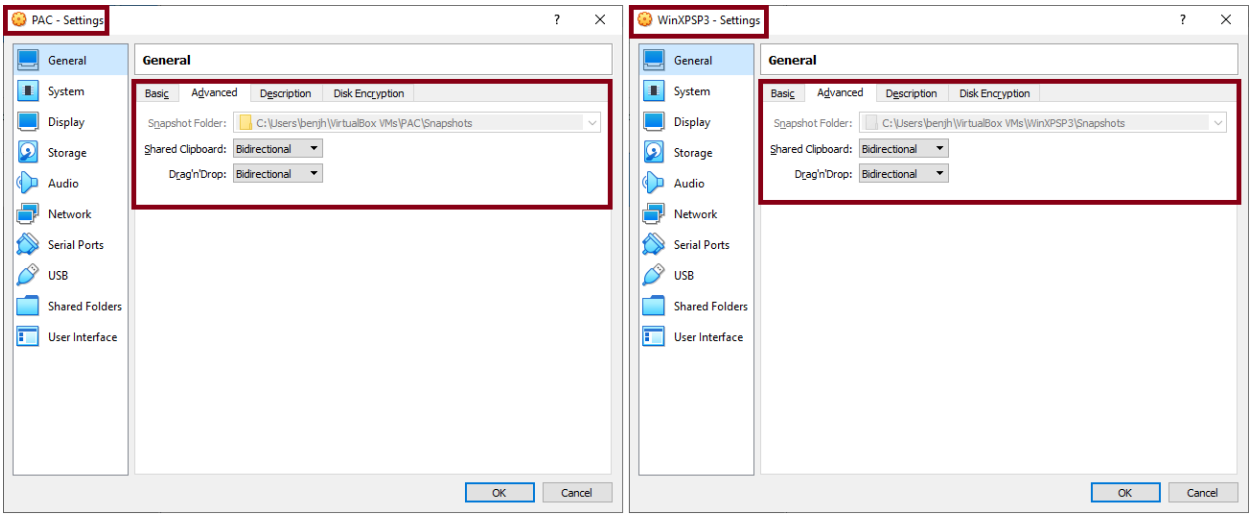
After Windows installation completes, we can install the VirtualBox guest additions for better support (full screen resolution, device drivers, etc.). Press continue whenever Microsoft complains about the drivers not passing Windows Logo testing. Navigate to Devices > Insert Guess Additions CD Images…



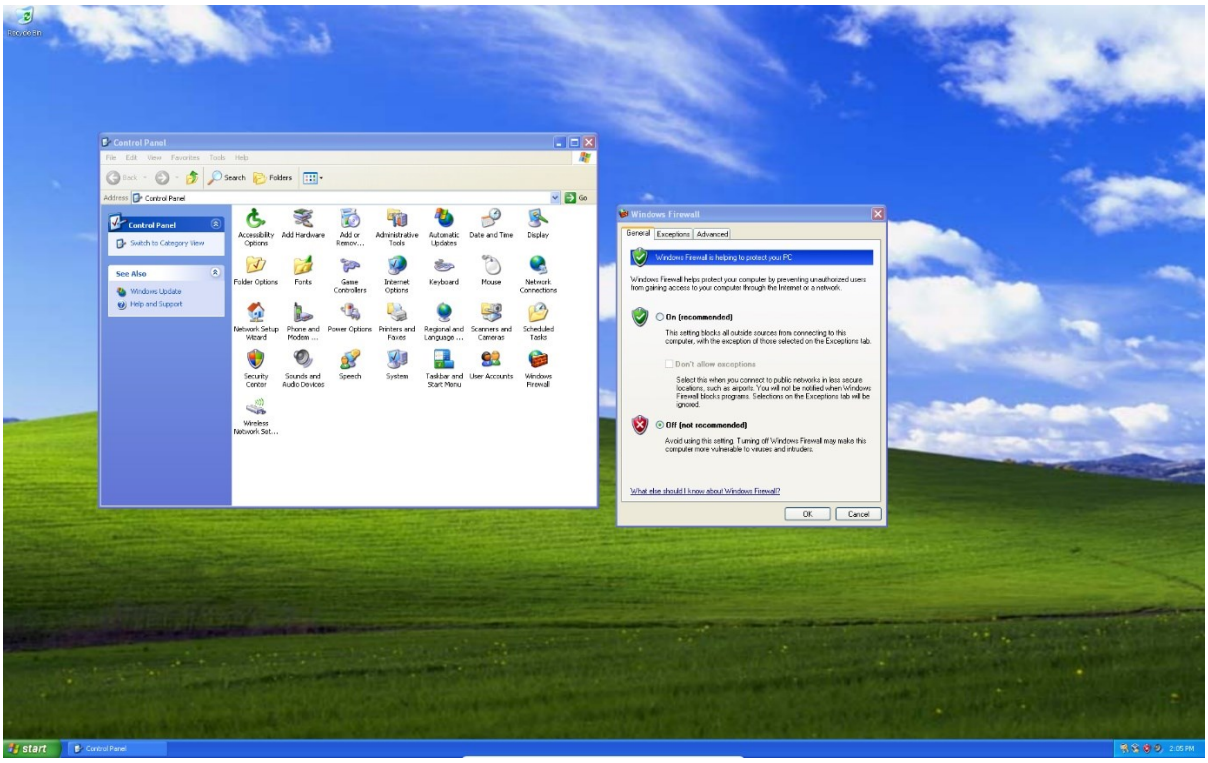

WinXPSP3 [Running] - Oracle VM VirtualBox
File Machine View Input Devices Help
Oracle VM VirtualBox Guest Additions 6.1.6 Setup
Welcome to Oracle VM VirtualBox Guest Additions 6.1.6 Setup
Setup will guide you through the installation of Oracle VM VirtualBox Guest Additions 6.1.6.
It is recommended that you close all other applications before starting Setup. This will make it possible to update relevant system files without having to reboot your computer.
Click Next to continue.
Next >
Cancel
Recycle Bin
start
Oracle VM VirtualBox ...
2:00 PM
Right Ctrl


WinXPSP3 [Running] - Oracle VM VirtualBox
File Machine View Input Devices Help
Oracle VM VirtualBox Guest Additions 6.1.6 Setup
Software Installation
The software you are installing has not passed Windows Logo testing to verify its compatibility with Windows XP. (Tell me why this testing is important.)
Continuing your installation of this software may impair or destabilize the correct operation of your system either immediately or in the future. Microsoft strongly recommends that you stop this installation now and contact the software vendor for software that has passed Windows Logo testing.
Continue Anyway
STOP Installation
< Back
Next >
Cancel
Recycle Bin
start
Oracle VM VirtualBox ...
Software Installation
2:01 PM
Right Ctrl

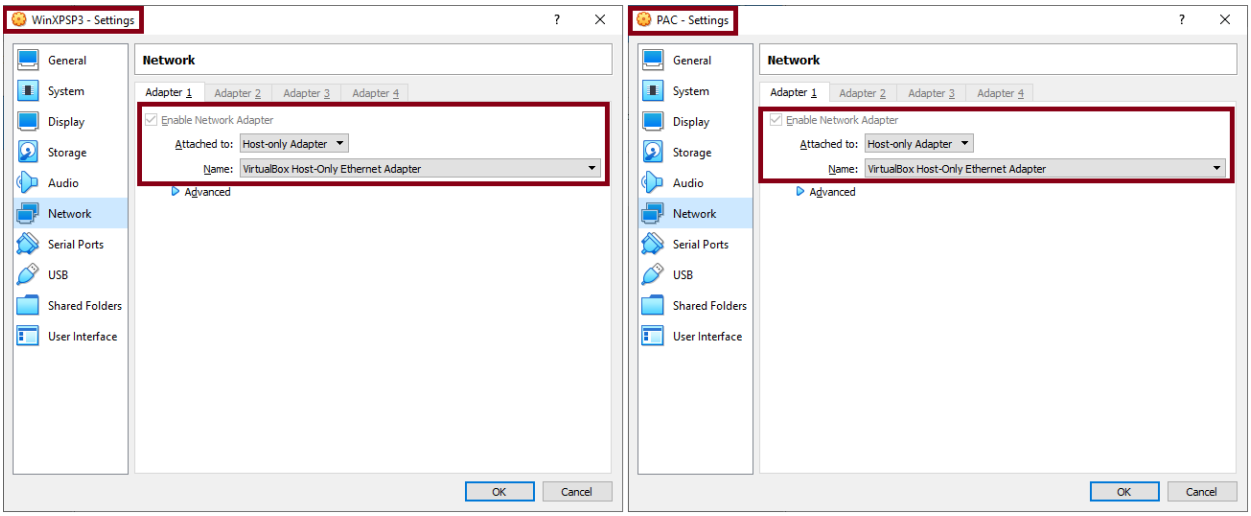
With VirtualBox guest additions installed we can also enable sharing our host machine clipboard (copy-paste in and out of the VM) and drag/drop files between the VM.



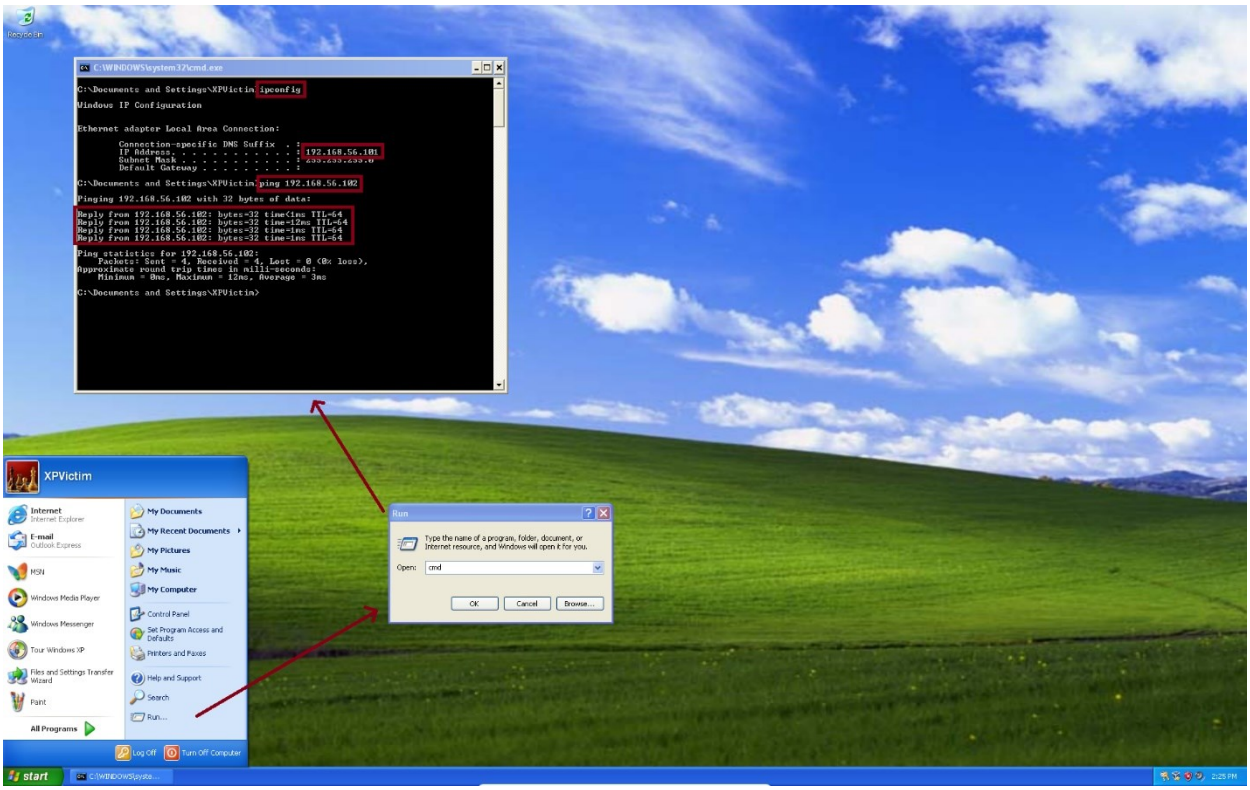
It's not strictly necessary, but turning off Windows Firewall will make testing network connectivity easier for the lab.

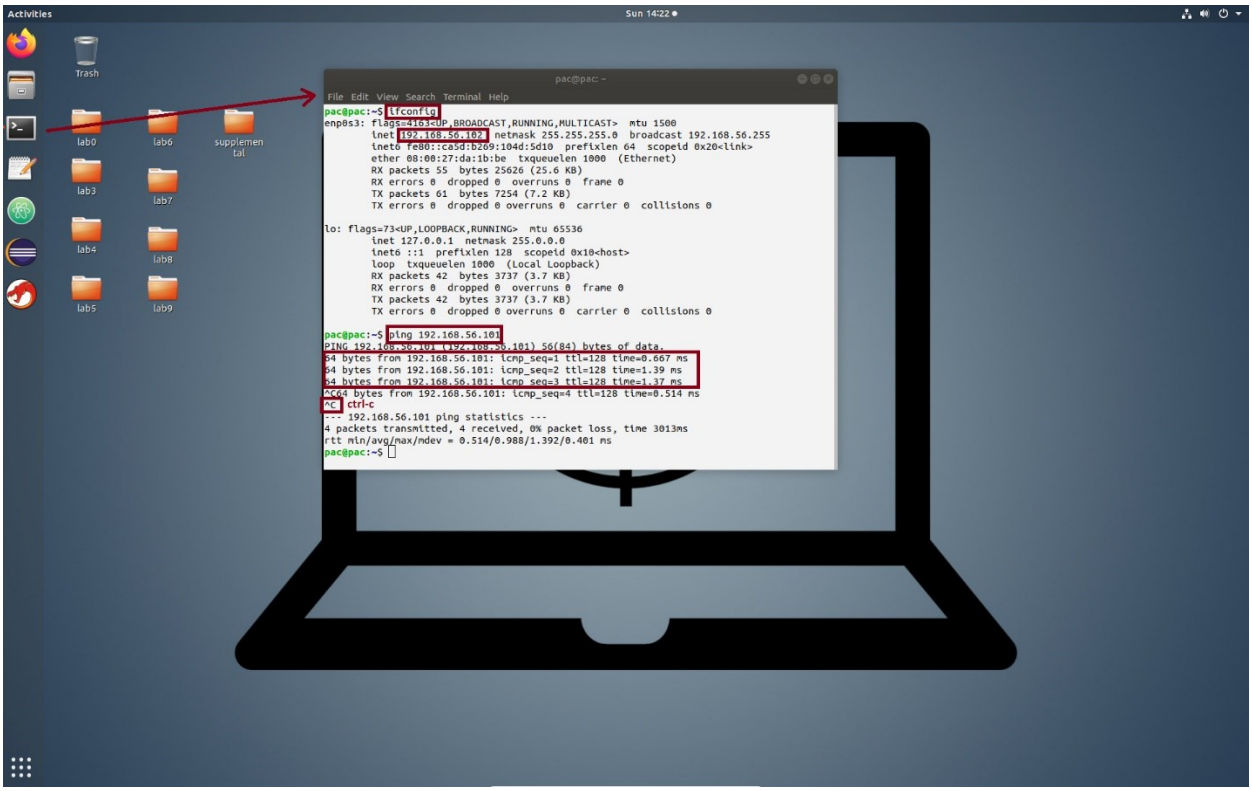


We will be attack Windows XP from the PAC2020 VM, so both VMs need to be on the same network. For this lab we can use the Host-only Adapter Network provided by VirtualBox. The host only network allows traffic between VMs but NOT outside of the host machine (i.e. it will not be possible for your attack to leave your personal computer, which is a safe setup to have).



Determine the IP address of each machine. If you have changed the network settings while the VM was running you can reboot each VM to make sure that the networking changes took effect (alternatively run commands to reset DHCP, for example in Windows run “ipconfig /release” and then “ipconfig /renew”). Once you have the addresses of each machine you should be able to ping the other machine in both directions.





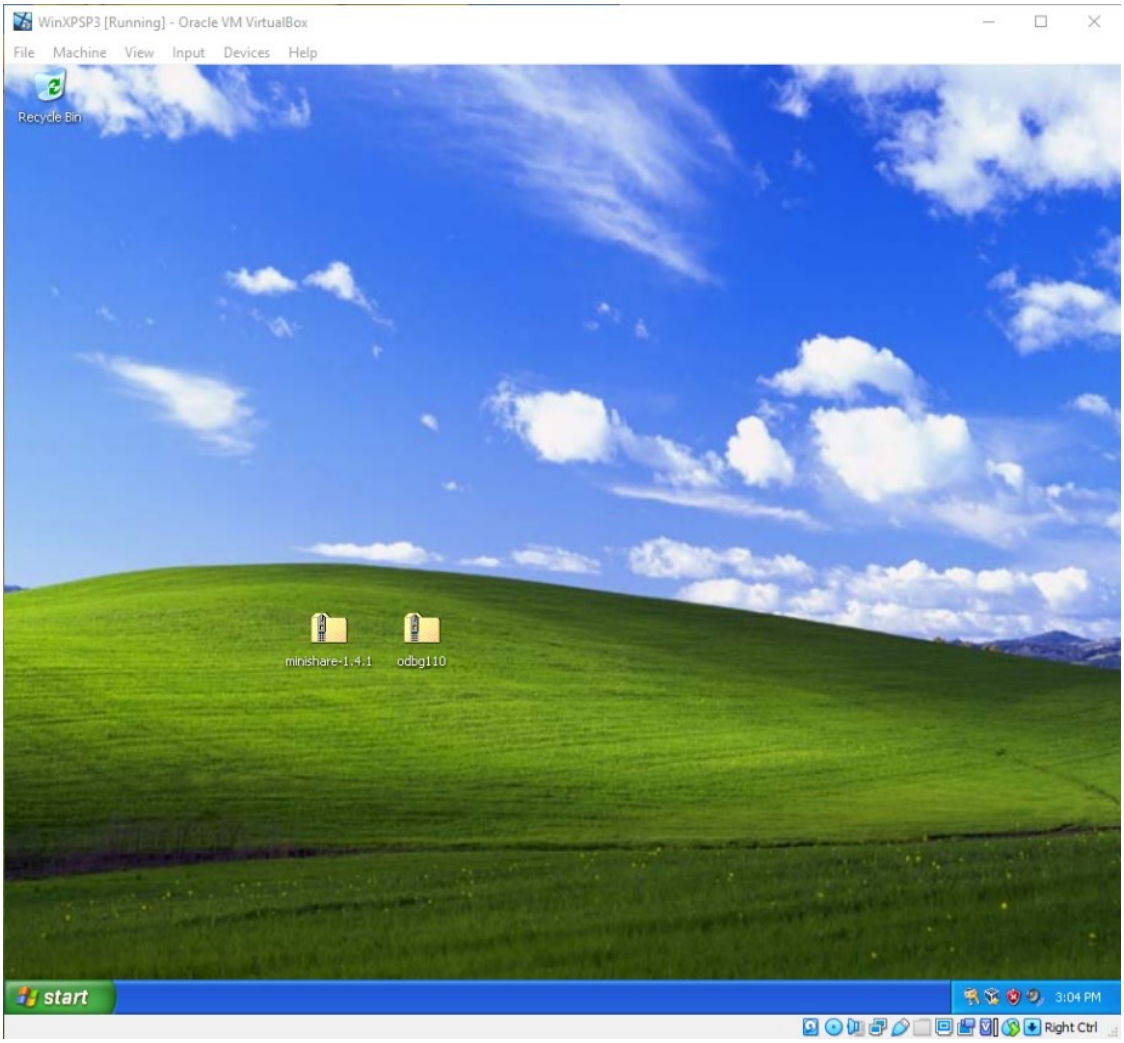
For the lab 4 setup we will be running two programs on Windows XP. You can copy them into the VM by downloading a copy of zip files from the links below and dragging and dropping them into the VM. Note that Windows XP is so old the SSL certificates fail in the browser. You want to copy over the minishare-1.4.1.zip file and the odb110.zip file. Alternatively if drag and drop is not working you can download the following ISO files that can be inserted as a CD-ROM in the VM settings and Windows XP can access the files that way.

Lab Materials (Option A – Drag and Drop using Guest Additions):

- https://github.com/benjholla/PAC2020/raw/master/labs/lab4/windows/MiniShare/minishare-1.4.1.zip
- https://github.com/benjholla/PAC2020/raw/master/labs/lab4/windows/OllyDBG/odbg110.zip

Lab Materials (Option B – Insert ISO file for Windows XP to read as a CD-ROM):

- https://github.com/benjholla/PAC2020/raw/master/labs/lab4/windows/MiniShare/minishare.iso
- https://github.com/benjholla/PAC2020/raw/master/labs/lab4/windows/OllyDBG/odbg110.iso


WinXPSP3 [Running] - Oracle VM VirtualBox
File Machine View Input Devices Help
Recycle Bin
minishare-1.4.1
odbg110
start
3:04 PM
Right Ctrl