Mackenzie Van Vliet Log

Took inventory of Raspberry Pi 3 B+ Starter Kit from SparkFun Electronics

* Raspberry Pi 3 B+
* SparkFun Pi Wedge
* SparkFun FTDI Basic Breakout 3.3V
* Breadoard – Full-Size (Bare)
* Pi Tin for Raspberry Pi – Black
* 16GB microSD (Preloaded with OS)
* microSD USB Reader
* Multicolor Buttons (4 pack)
* Assorted LED (20 pack)
* Resistor 330 Ohm 1/6 Watt PTH – 20 pack
* Raspberry Pi GPIO Ribbon Cable – 40-pin 6”
* SparkFun USB Mini-B Cable – 6 Foot
* Wall Adapter Power Supply – 5.1V DC 2.5A (USB Micro-B)
* Jumper Wires Premium 6” M/F – 10 Pack
* Jumper Wires Standard 7” M/M – 30 Pack

Acquired HDMI cable from dollar store ($4)

Hooked up PI to keyboard and USB mouse (stolen from home computer)

Hooked up PI to TV via HDMI port with HDMI cable

Inserted the 16GB microSD (Preloaded with OS) that came with the PI into the PI  
  
MicroSD card was unreadable by the PI, came up as formatting error   
  
Acquired VGA to HDMI from Walmart ($24) so the PI can be connected to a monitor   
  
Salvaged monitor, keyboard and mouse from grandparents old computer  
  
Switched home monitor with grandparents monitor (because its nicer) and took home monitor for PI

Returned mouse and keyboard to home computer   
  
Set up PI

* Extension cord plugged into wall
* PI wall adapter power supply plugged into extension cord
* Montior cord plugged into extension cord
* USB mouse and keyboard plugged directly into PI
* VGA from monitor hooked up HDMI-VGA adaptor that is plugged into the PI’s HDMI port

Completely reformatted SD card on laptop using the official SD card formatting software https://www.sdcard.org/downloads/formatter\_4/eula\_windows/index.html  
  
Download NOOBS zip onto laptop

https://www.raspberrypi.org/downloads/noobs/  
  
Extracted NOOBS onto micro SD card  
  
Inserted micro SD card into PI

Setup Raspbian   
  
Hooked up PI to Internet with Ethernet cable (from Launch Centre)   
  
Download updates and upgraded pi in terminal

sudo apt update

sudo apt upgrade

Some things failed to download but continued anyways  
  
Attempted to install CUPS (Common UNIX Printing System)

sudo apt-get install CUPS

CUPS failed to install   
  
Inserted other micro SD card that came with the other PI  
  
Setup Raspbian

Mouse is now very sensitive for some reason

Changed USB mouse to Bluetooth USB wireless mouse and attempted to change mouse settings

Mouse still sensitive   
  
Connected to the WiFi at my house  
  
Download updates and upgraded pi in terminal

sudo apt update

sudo apt upgrade

All updates and upgrades went smoothly

Installed cups

Sudo apt-get install cups  
  
Formatted cups giving it administrative functions and giving it across the whole network

Sudo usermod -a -G lpadmin pi

Sudo cupsctl –remote-any

Sudo /etc/init.d/cups restart   
  
Installed SAMBA so the print server can be used with Windows Computers

Sudo apt-get install samba   
  
Formatted SAMBA

Sudo nano /etc/samba/smb.conf ///this opens the configurations of SAMBA

///Change the end of the SAMBA code to

# CUPS printing.

[printers]

comment = All Printers

browseable = no

path = /var/spool/samba

printable = yes

guest ok = yes

read only = yes

create mask = 0700

# Windows clients look for this share name as a source of downloadable

# printer drivers

[print$]

comment = Printer Drivers

path = /var/lib/samba/printers

browseable = yes

read only = no

guest ok = no

Saved changes

Ctrl+X then Y then Enter

Restarted SAMBA

Sudo /etc/init.d/samba restart  
  
Got PI IP address

Hostname -I

Went onto laptop browser to setup SAMBA/CUPS with printer

<http://INSERT> IP ADDRESS:631  
  
Needed login credentials to add new printer   
  
Tried to update and upgrade PI but failed   
  
Did clean of pi terminal

clear  
  
Updated and upgraded pi successfully  
  
Did another clean of pi   
  
Still needed login credentials to add new printer

Guessed/examined SAMBA and CUPS files to get the password and username

Password = pi

Username = pi  
  
Borrowed Mr. Vas’s printer   
  
Plugged into printer into wall and plugged in PI into PI via USB cord

On http:// INSERT IP ADDRESS:631 went to Administrative Tab

Under Printers, clicked Add Printer

Selected Mr Vas’s printer, enabled Share This Printer and clicked continue

On Mr Vas computer examined what driver the printer used

On Mr Vas’s computer went to My Computer – Network – RASPBERRYPI – Printer

Used Windows Driver installer to install driver for the printer

Done

Supplies Needed

* Pi Tin for Raspberry Pi – Black (Kit)
* 16GB microSD (Preloaded with OS) (Kit)
* microSD card to SD card reader (Kit)
* Raspberry Pi 3 B+ (Kit)
* Wall Adapter Power Supply – 5.1V DC 2.5A (USB Micro-B) (Kit)
* Monitor (Salvaged)
* Keyboard (Salvaged)
* Mouse (Salvaged)
* Ethernet Cable (Launch Centre)
* Extension Cord (Home)
* Computer (Home)
* VGA to HDMI adapter (Walmart)
* Printer (Mr Vas)