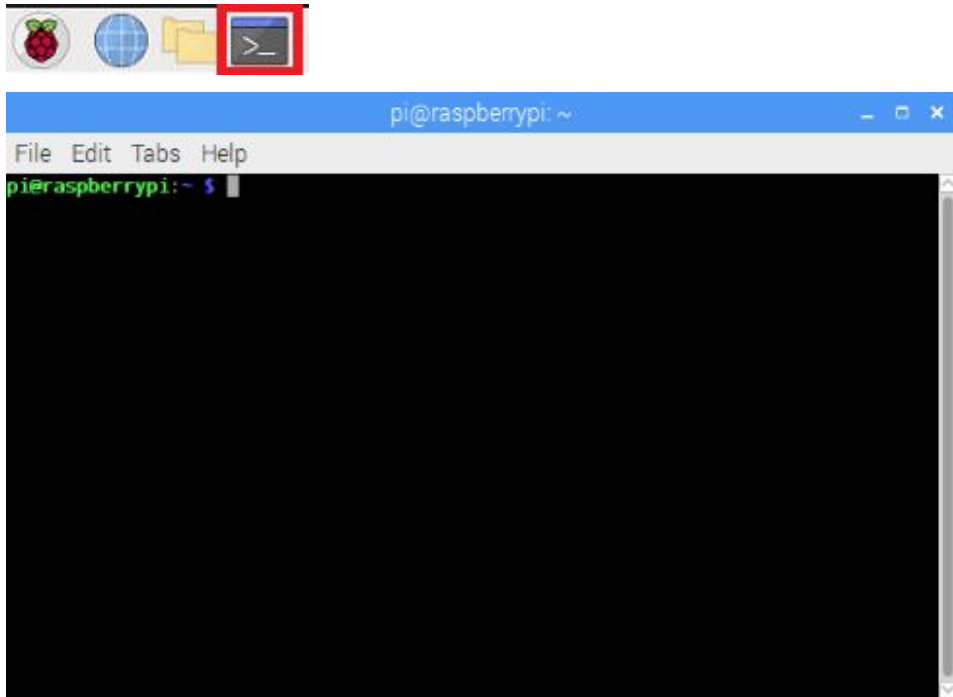


How to use Terminal to write a program?

1. Open terminal by clicking the “**Terminal**” icon at the top menu bar or using shortcut key: **Ctrl + Alt + T**.



2. Type in `cd Desktop` which means to changes your current directory to desktop.

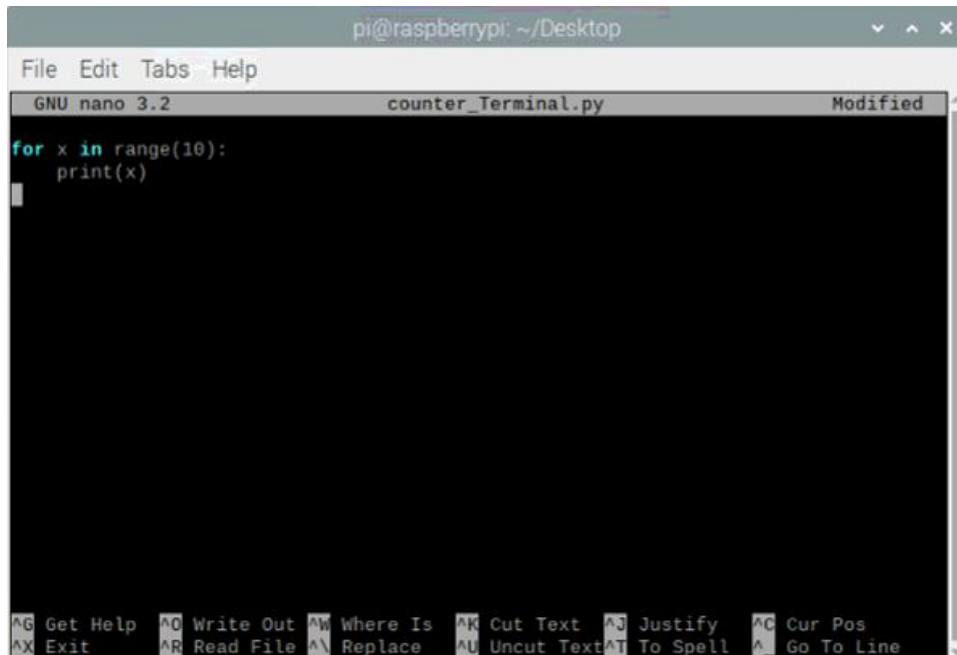
```
pi@raspberrypi:~ $ cd Desktop
pi@raspberrypi:~/Desktop $
```

3. Type in `nano counter_Terminal.py` which means using Nano Text Editor to open an existing file or to create a new file with the file name `counter_Terminal.py`.

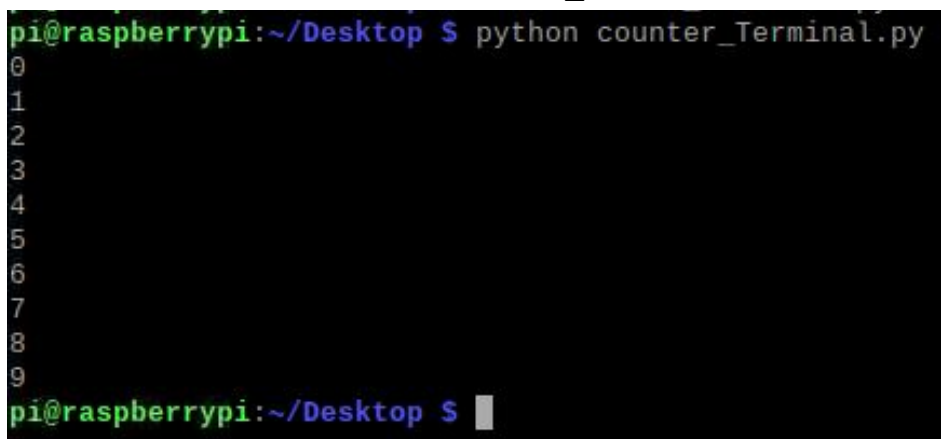
```
pi@raspberrypi:~/Desktop $ nano counter_Terminal.py
```

4. Inside the text editor, create a sequence of numbers from 0 to 9, and print each item in the sequence using the following loop:

```
for x in range(10):  
    print(x)
```



5. To exit the text editor and save the file, press **Ctrl + X** → **Y** → **Enter**.
6. Back to terminal, type `python counter_Terminal.py` to run the program.



7. Try to tune the time of your Raspberry Pi. You may notice that the clock on your Raspberry Pi is not the current time. You can change it manually on the terminal. Enter the following command to the terminal but change the **red part** to the current time.

```
sudo date -s "Fri June 5 17:36:00 UTC+8 2020"
```

This command change the time to 5-Jun-2020, Friday, 17:36:00 in UTC+8 time zone which is Hong Kong time zone.

The system may end your TeamViewer session, just wait a few minutes before reconnect to the TeamViewer.

Please make sure the time is correct **everyday**. Since incorrect time will affect the tasks that we are going to do in this workshop.

8. There are some hints on using the terminal:
- Linux command line is **case-sensitive**.
 - You do not need to type in the command word by word. You can simply **copy and paste** them.
 - The **upwards arrow** and the **downwards arrow** on your keyboard allow you to check out the previous commands and the next commands. You can use them to remind yourself what is the previous command.
 - You can use **Ctrl + C** to aborts anything running in the terminal immediately if you needed.