

How to set up networking on your Raspberry Pi

Hi Emma,

Please use following IPs:

| | | |
|----------------|-----------------|-------------------|
| 130.246.77.141 | apple_pi | B8:27:EB:80:28:23 |
| 130.246.77.142 | blueberry_pi | B8:27:EB:48:D3:F9 |
| 130.246.77.143 | cherry_pi | B8:27:EB:65:3F:B6 |
| 130.246.77.144 | dragon_fruit_pi | B8:27:EB:3C:2F:0B |

Cheers,
Suleman

On your (Ethernet connected) Windows PC, get the IP address of your router

```
C:\>ipconfig | findstr /i "Gateway"
    Default Gateway . . . . . :
    Default Gateway . . . . . :
    Default Gateway . . . . . : 130.246.76.254
    Default Gateway . . . . . :
```

And the DNS servers

```
C:\>ipconfig /all
```

Windows IP Configuration

Ethernet adapter Ethernet:

```

    Connection-specific DNS Suffix  . : esc.rl.ac.uk
    Description . . . . . : Intel(R) Ethernet Connection (3)
I218-LM
    Physical Address. . . . . : 84-7B-EB-37-AF-48
    DHCP Enabled. . . . . : Yes
    Autoconfiguration Enabled . . . . : Yes
    Link-local IPv6 Address . . . . . : fe80::19de:9a42:c29:12c8%11(Preferred)
    IPv4 Address. . . . . : 130.246.76.212(Preferred)
    Subnet Mask . . . . . : 255.255.252.0
    Lease Obtained. . . . . : 24 April 2017 09:42:24
    Lease Expires . . . . . : 07 May 2017 13:32:02
    Default Gateway . . . . . : 130.246.76.254
    DHCP Server . . . . . : 130.246.8.6
    DHCPv6 IAID . . . . . : 159677419
    DHCPv6 Client DUID. . . . . : 00-01-00-01-1F-72-C8-12-84-7B-EB-
37-AF-48
    DNS Servers . . . . . : 130.246.8.13
                           130.246.72.21
    Primary WINS Server . . . . . : 130.246.132.69
    Secondary WINS Server . . . . . : 130.246.74.27
    NetBIOS over Tcpip. . . . . : Enabled
```

And then on your Raspberry pi:

```
pi@raspberrypi:~$ sudo nano /etc/dhcpd.conf
```

Add these lines:

```
interface eth0
static ip_address=[IP Address provided for your pi by Suleman]/22
static routers=[IP address of your router - mine was 130.246.76.254]
static domain_name_servers=[IP address of DNS server - mine was
130.246.8.13]
```

*** The “/22” at the end of the second line is important – it tells the pi about the subnet mask used by the local network. ***

Save and reboot Pi