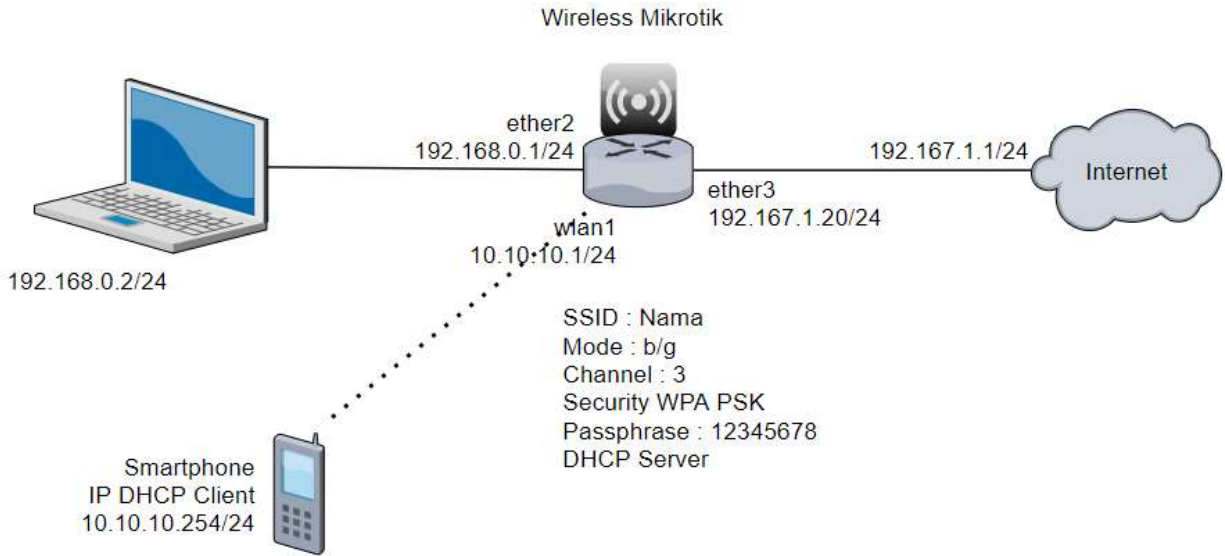
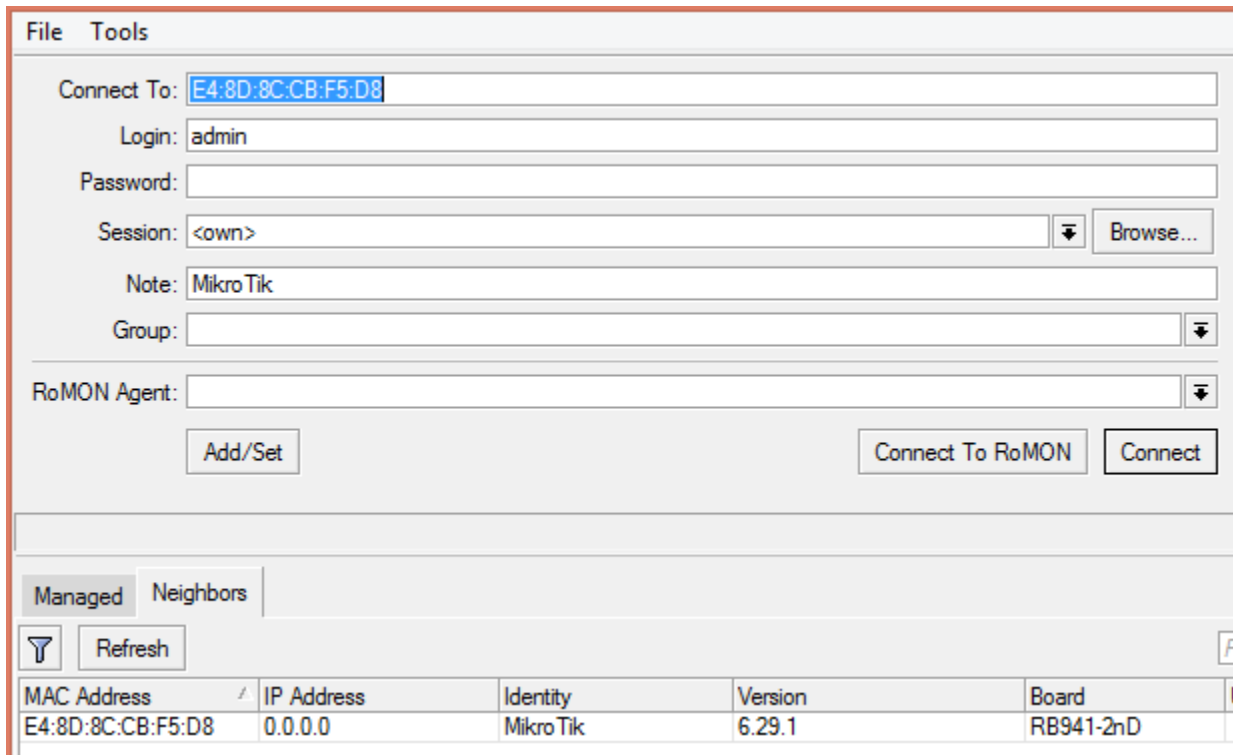


Soal

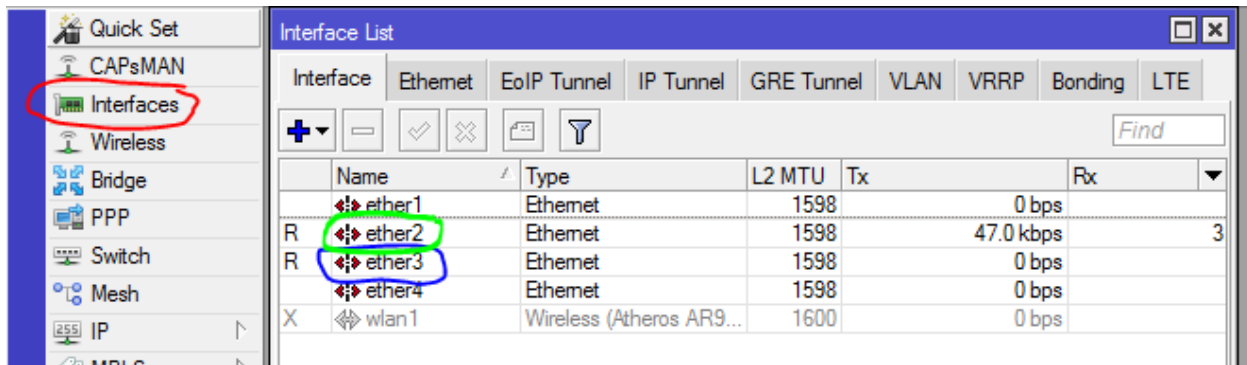


Pembahasan :

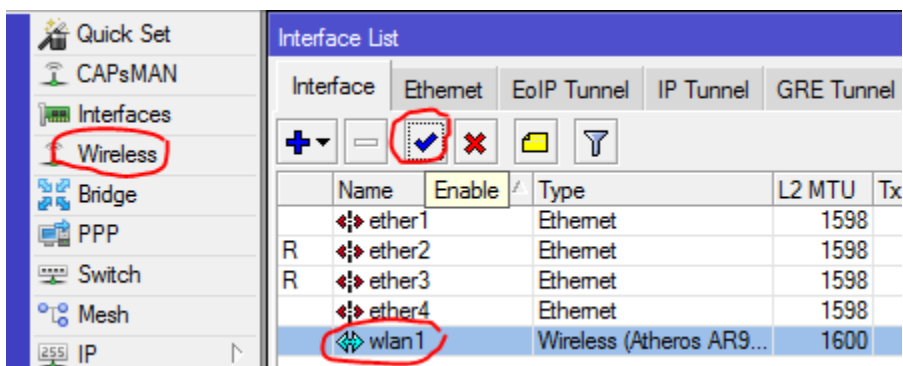
Login menggunakan Winbox, Klik MAC Address Mikrotik dan Klik Connect



Klik Interfaces



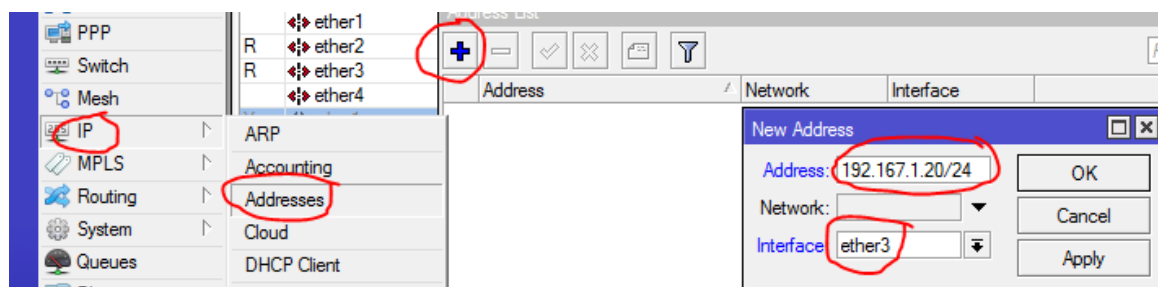
Perhatikan pada Interface diatas, ether2 menuju ke LAN (Laptop) dan ether3 menuju ke internet. Dan wlan1 belum aktif, klik wlan1 dan klik enable (v)



1. Mengkonfigurasi IP Address

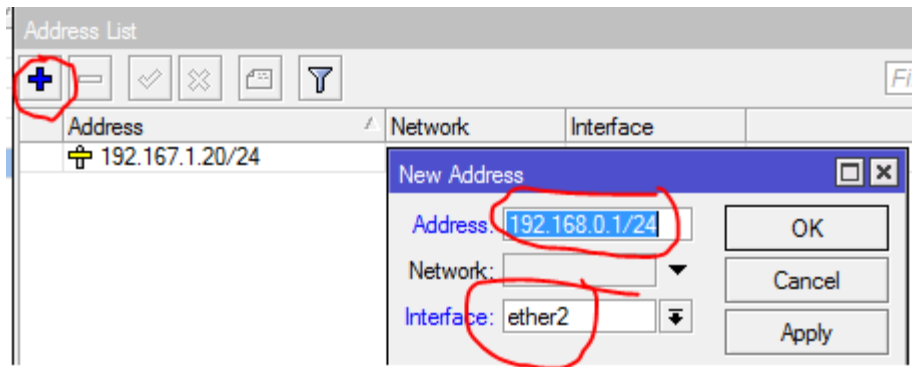
a. Mengkonfigurasi interface ether3 (Internet)

Klik IP > Address > +, address = 192.167.1.20/24, interface = ether3, Klik OK



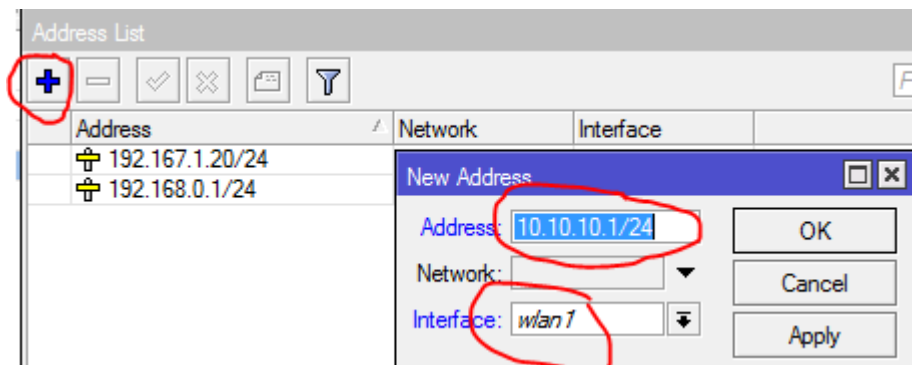
b. Mengkonfigurasi interface ether2 (LAN)

Klik IP > Address > +, address = 192.168.0.1/24, interface = ether2, Klik OK



c. Mengkonfigurasi interface wlan1 (wireless)

Klik IP > Address > + , address = 10.10.10.1/24, interface = wlan1, Klik OK

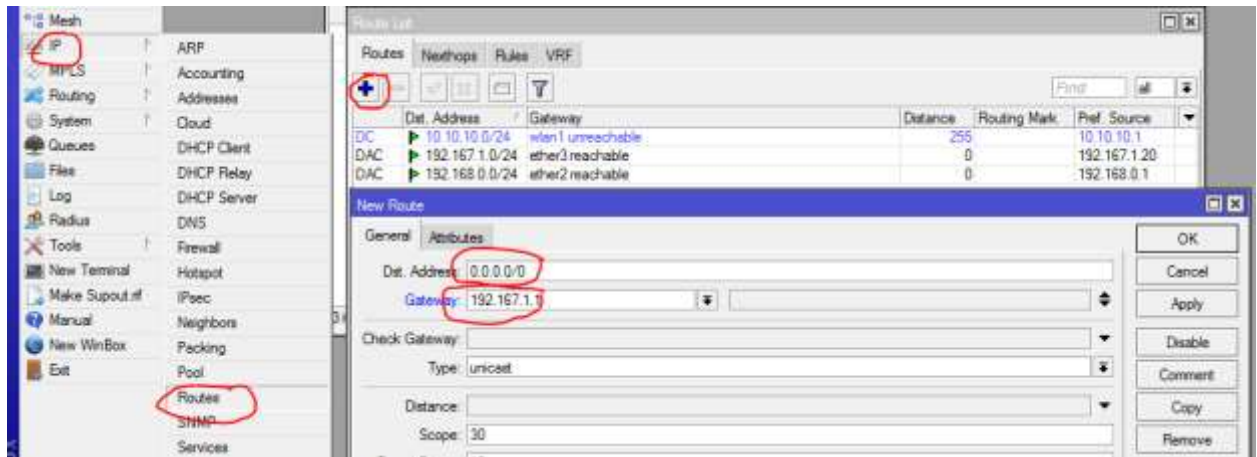


Hasilnya

Address List		
Address	Network	Interface
10.10.10.1/24	10.10.10.0	wlan1
192.167.1.20/24	192.167.1.0	ether3
192.168.0.1/24	192.168.0.0	ether2

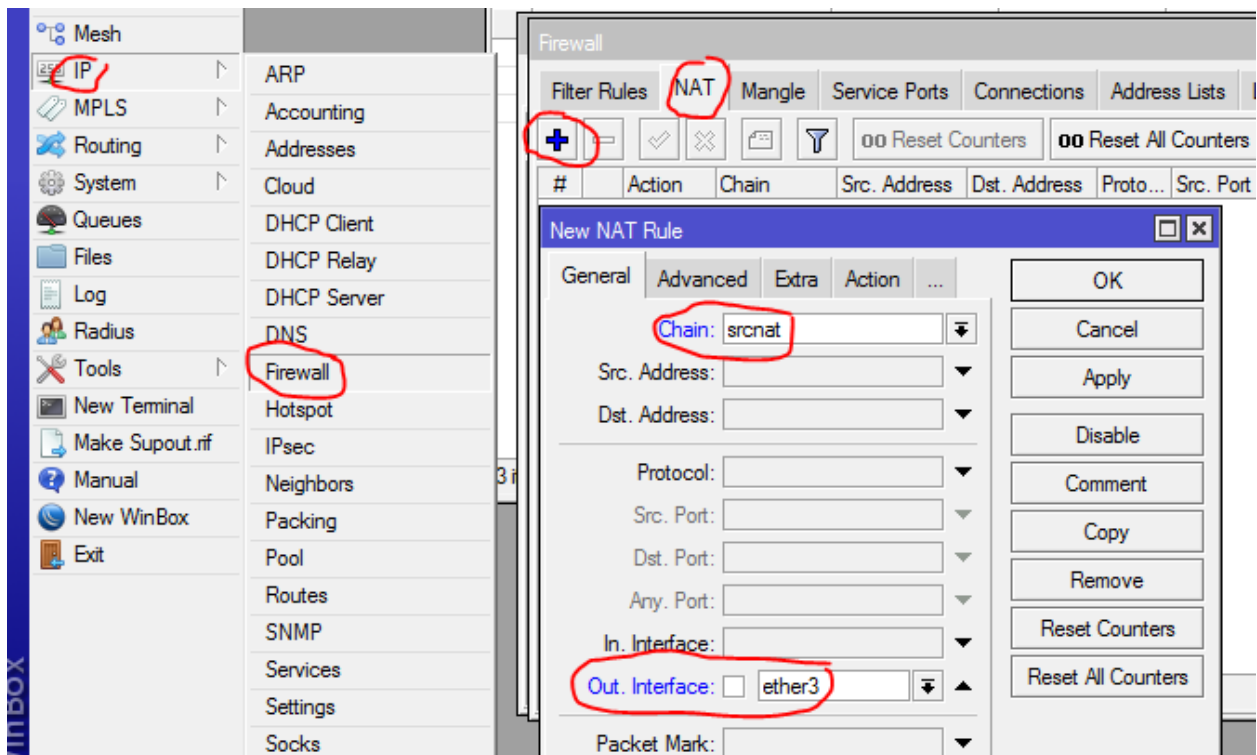
2. Mengkonfigurasi Default Route

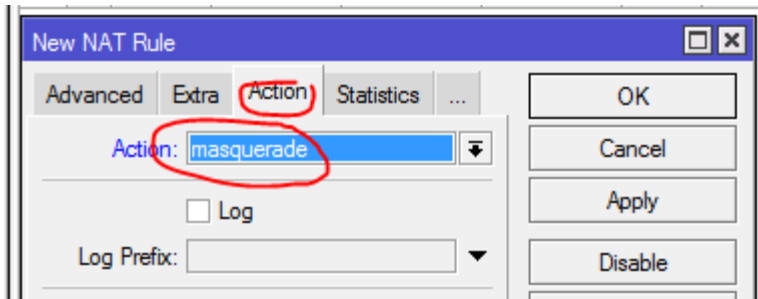
Klik IP > Routes > + , Dst address = 0.0.0.0/0, Gateway = 192.167.1.1, Klik OK



3. Mengkonfigurasi NAT

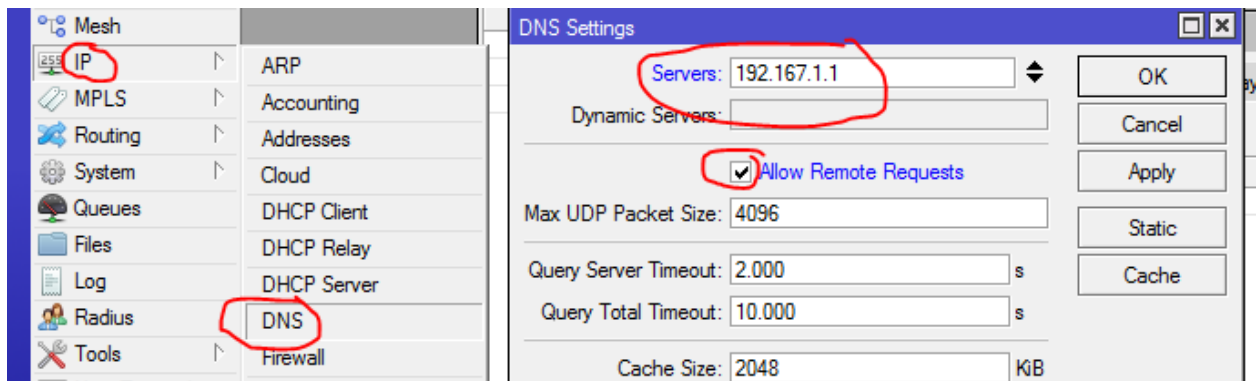
Klik IP > Firewall > NAT > +, Chain = srcnat, Out-interface = ether3, Action = masquerade, Klik OK





4. Mengkonfigurasi DNS

Klik IP > DNS, Server = 192.167.1.1, centrang Allow Remote Request Klik OK



5. Mengkonfigurasi IP Address PC



6. Mengakses internet



Apabila gagal gunakan utility **ping** untuk mengecek koneksi ke router dan internet

```

Command Prompt

Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
  Minimum = 35ms, Maximum = 44ms, Average = 38ms
C:\Users\Dell Inspiron>ping 10.10.10.1

Pinging 10.10.10.1 with 32 bytes of data:
Reply from 10.10.10.1: bytes=32 time=1ms TTL=64
Reply from 10.10.10.1: bytes=32 time=1ms TTL=64
Reply from 10.10.10.1: bytes=32 time=1ms TTL=64
Reply from 10.10.10.1: bytes=32 time=2ms TTL=64

Ping statistics for 10.10.10.1:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 1ms, Maximum = 2ms, Average = 1ms
C:\Users\Dell Inspiron>ping google.com

Pinging google.com [74.125.68.101] with 32 bytes of data:
Reply from 74.125.68.101: bytes=32 time=52ms TTL=56
Reply from 74.125.68.101: bytes=32 time=40ms TTL=56
Reply from 74.125.68.101: bytes=32 time=46ms TTL=56
Reply from 74.125.68.101: bytes=32 time=76ms TTL=56

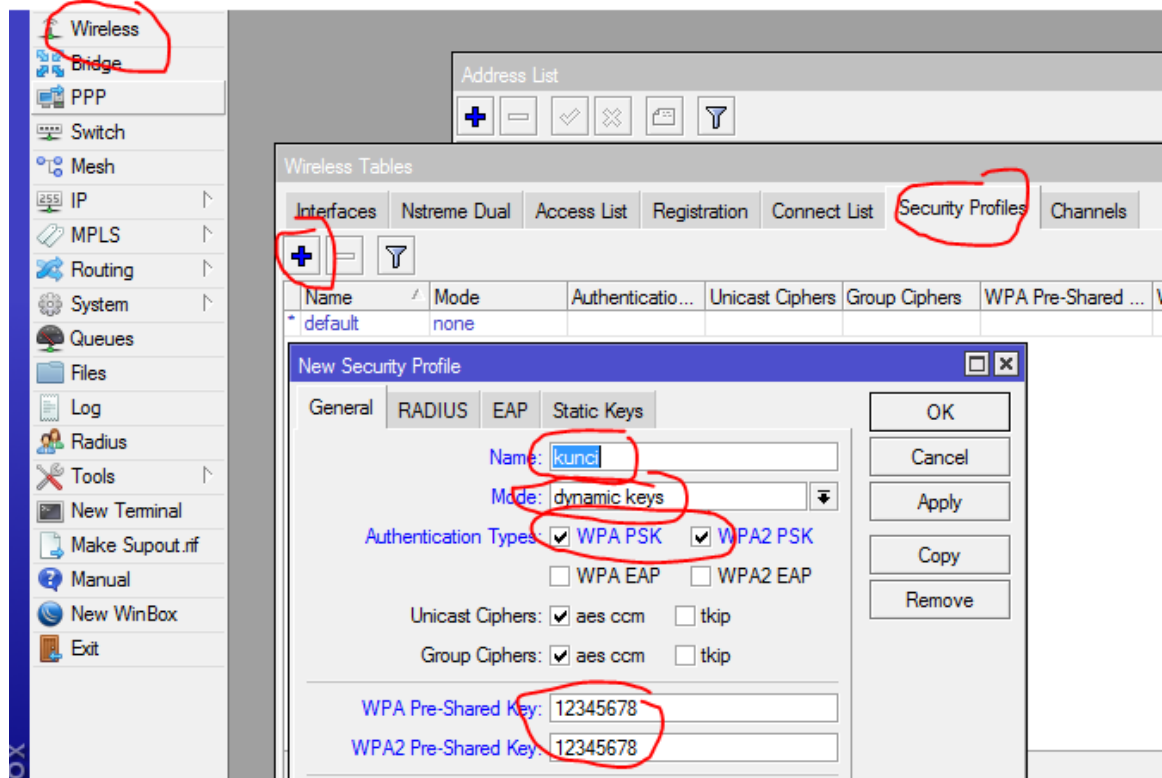
Ping statistics for 74.125.68.101:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
    Approximate round trip times in milli-seconds:
        Minimum = 40ms, Maximum = 76ms, Average = 53ms
C:\Users\Dell Inspiron>

```

7. Mengkonfigurasi Wireless

a. Membuat Security Profile

Klik Wireless > Security Profiles > +, Name = kunci, mode =dynamic keys, authentication types= WPA PSK, WPS2 PSK, WPA Pre-Shared Keys, WPA Pre-Shared Keys = 12345678, Klik OK

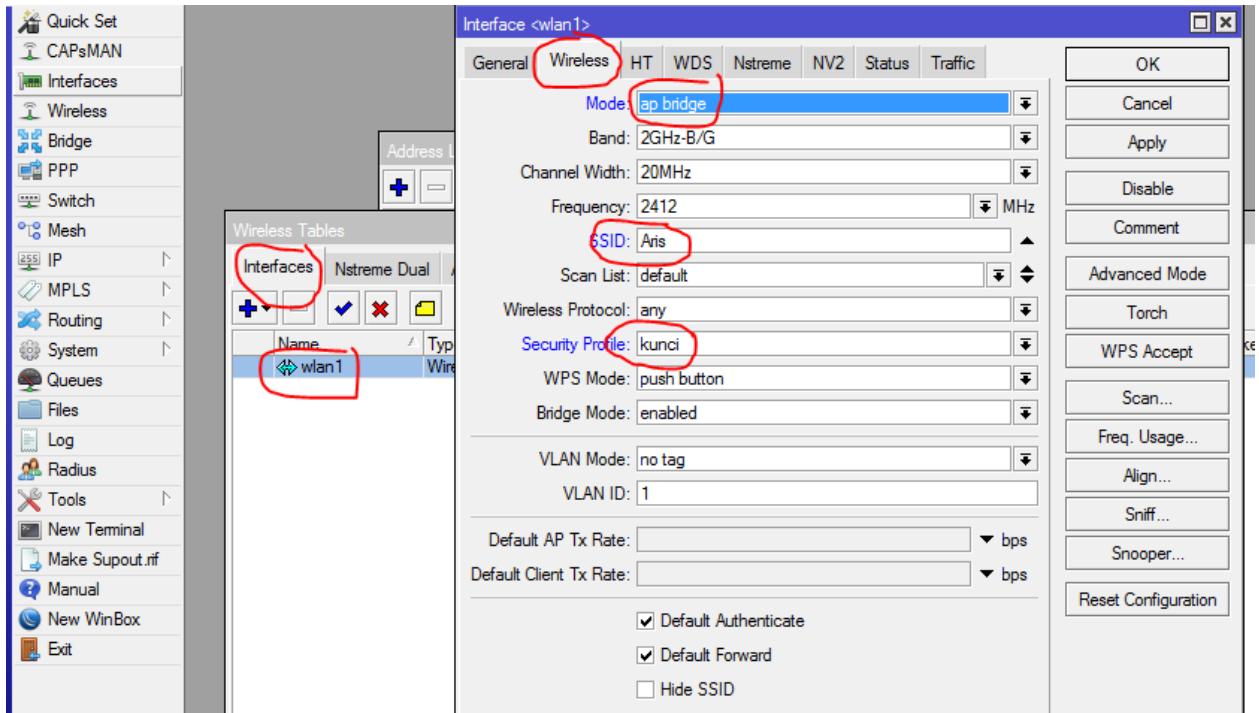


Hasilnya

Wireless Tables						
Interfaces	Nstreame Dual	Access List	Registration	Connect List	Security Profiles	Channels
Name	Mode	Authenticatio...	Unicast Ciphers	Group Ciphers	WPA Pre-Shared ...	WPA2 Pre-Sh...
* default	none					
kunci	dynamic keys	WPA PSK W...	aes ccm	aes ccm	12345678	12345678

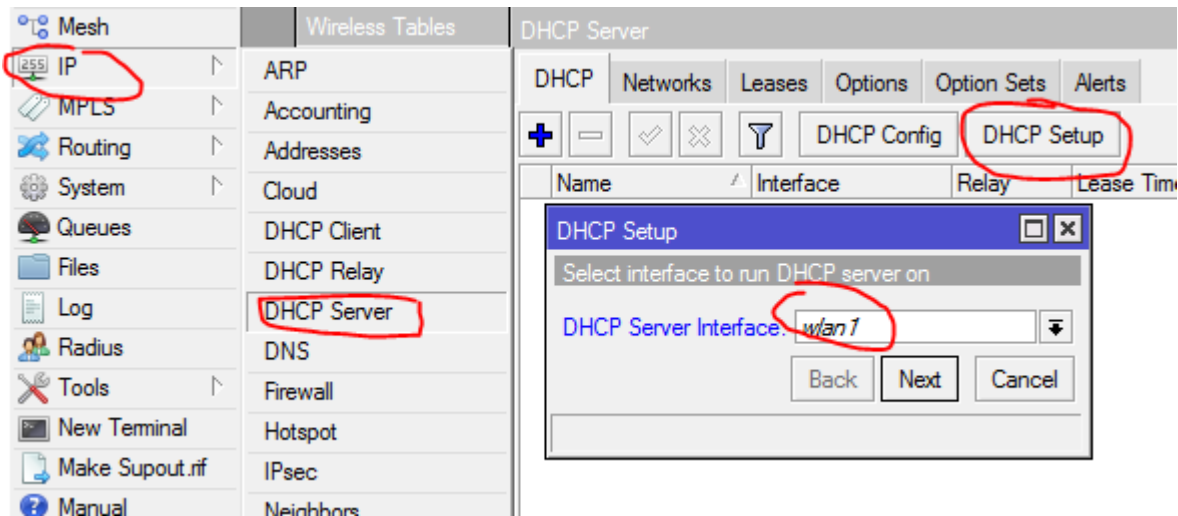
b. Mengkonfigurasi Access Point

Klik Wireless > Interfaces > klik 2 kali wlan1 > Wireless, Mode = ap_bridge, SSID =nama, security profile = kunci, Klik OK



c. Mengkonfigurasi DHCP Server

Klik IP > DHCP Server > DHCP Setup, DHCP Server Interface = wlan1, Next, Next,Next,Next

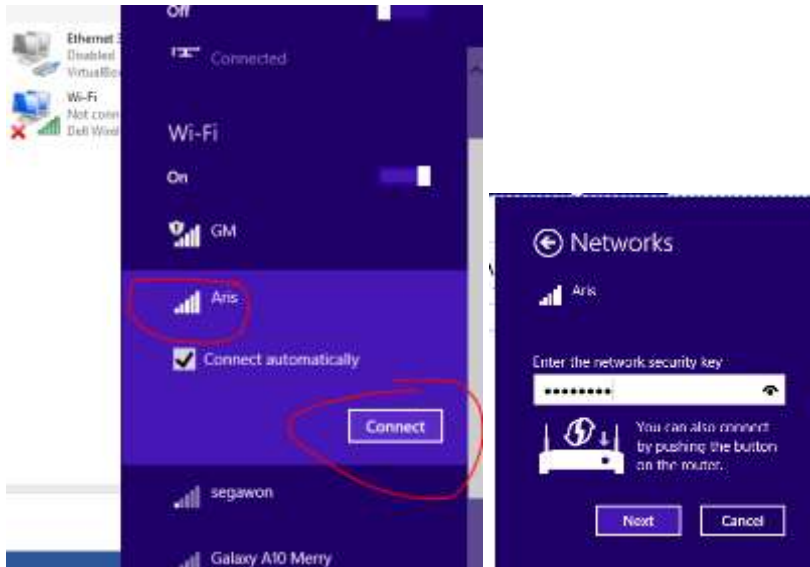


Sehingga hasilnya

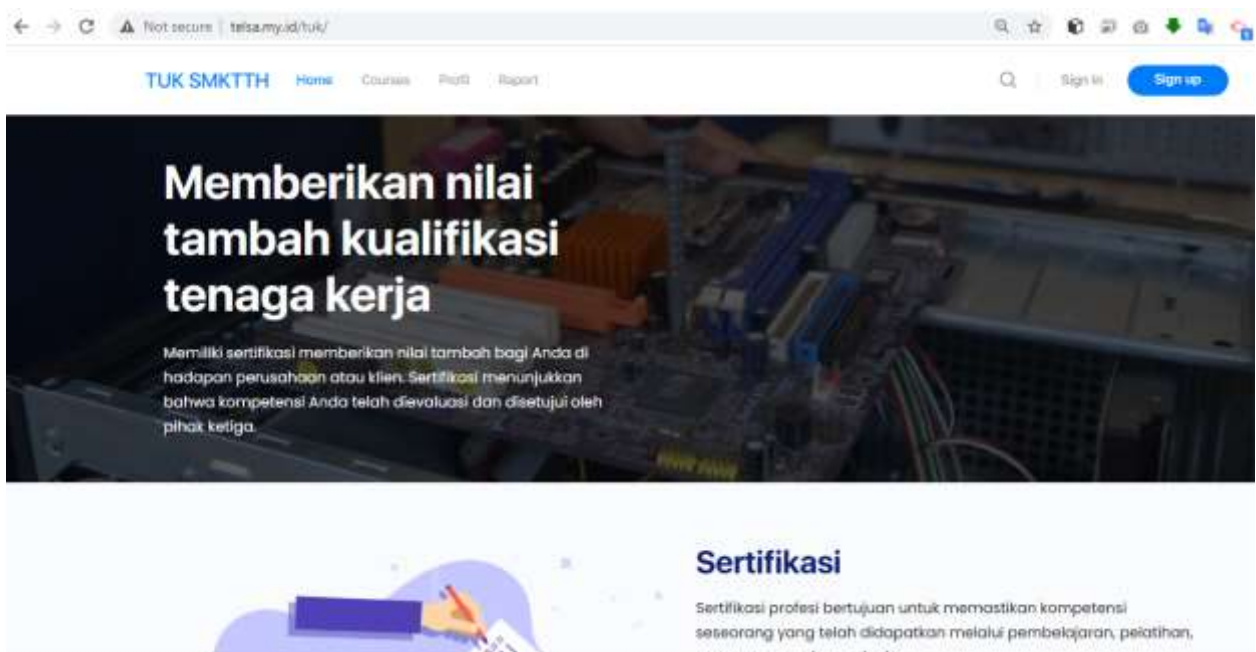
DHCP Server					
DHCP					
Networks					
Leases					
Options					
Option Sets					
Alerts					
DHCP Config					
DHCP Setup					
Name	Interface	Relay	Lease Time	Address Pool	Add AR...
dhcp1	wan1		00:10:00	dhcp_pool1	no

8. Mencoba koneksi internet melalui wireless,

Hubungkan dengan SSID Aris, masukkan password 12345678, dan akses situs di internet



Hasilnya apabila berhasil mengakses internet



Selesai

Troubleshooting

1. Pastikan kabel terkoneksi pada port yang tepat
2. Pastikan kabel terhubung pada port, kadang kendor dan lepas
3. Pastikan adanya koneksi internet
4. Pastikan port interface ether tidak terbalik
5. Pastikan pemberian IP Address lengkap misal 192.168.0.1/24
6. Pastikan pemberian IP Address pada interface tidak terbalik
7. Pastikan pemberian gateway pada router benar
8. Pastikan Out-interface yang dipilih tepat
9. Pastikan allow remote request pada DNS tercentang
10. Pastikan pemberian IP pada komputer benar, pemilihan gateway dan DNS
- 11.