Router

R1(config)#ipv6 unicast-routing

R1(config)#interface g0/0/1

R1(config-if)#no shutdown

R1(config)#interface g0/0/1.3

R1(config-subif)# encap dot1q 3

R1(config-subif)#ip address 192.168.3.1 255.255.255.0

R1(config-subif)#no shutdown

R1(config-subif)#interface g0/0/1.4

R1(config-config)#encap dot1q 3

R1(config-subif)#ip address 192.168.4.1 255.255.255.0

R1config-subif)#no shutdown

R1(config-subif)#end

R1(config-subif)#interface Loopback 0

R1(config-subif)#description Loopback

R1(config-subif)#ip address 209.165.201.1 255.255.255.224

R1(config-subif)#no shutdown

R1(config-subif)#exit

R1(config)#crypto key generate rsa

1024

R1(config)#ip route 0.0.0.0 0.0.0.0 loopback 0

R1(config)#ipv6 route ::/0 loopback 0

R1 DHCP POOL

R1(config)#ip dhcp excluded address 192.168.3.1 192.168.3.9

R1(config)#ip dhcp excluded address 192.168.10.254

R1(config)#ip dhcp pool LAN-POOL-1

R1(dhcp-config)# network 192.168.3.0 255.255.255.0

R1(dhcp-config)# default-router 192.168.3.1

R1(dhcp-config)# dns-server 192.168.4.5

Switch #1

S1(config-vlan)#vlan 3

S1(config-vlan)#name management

S1(config-vlan)#vlan 4

S1(config-vlan)#name operations

S1(config-vlan)#vlan 7

S1(config-vlan)#name Parking

S1(config-vlan)#vlan 8

S1(config-vlan)#name Native

S1(config)#interface vlan 3

S1(config-if)# ip address 192.168.3.11 255.255.255.0

S1(config-if)#no shutdown

S1(config-if)#ip defaut-gateway 192.168.3.1

S1(config)#interface range f0/1-2

S1(config-if-range)#switchport mode trunk

S1(config-if-range)#switchport trunk native vlan 8

S1(config-if-range)#exit

S1(config)#interface range f0/1-2

S1(config-if-range)#channel-group 1 mode active

S1(config-if-range)#no shut

S1(config-if-range)#exit

S1(config)#interface f0/6

S1(config-if)#switchport mode access

S1(config-if)#switchport access vlan 4

S1(config-if)#switchport port-security maximum 2

S1(config-if)#switchport port-security aging time 60

S1(config-if)#swich port-security aging type inactivity

S1(config-if)#switch port-security violation shut

Switch #2

S2(config-vlan)#vlan 3

S2(config-vlan)#name management

S1(config-vlan)#vlan 4

S1(config-vlan)#name operations

S1(config-vlan)#vlan 7

S1(config-vlan)#name Parking

S1(config-vlan)#vlan 8

S1(config-vlan)#name Native

S1(config)#interface vlan 3

S1(config-if)# ip address 192.168.3.12 255.255.255.0

S1(config-if)#no shutdown

S1(config-if)#ip defaut-gateway 192.168.3.1

S1(config)#interface range f0/1-2

S1(config-if-range)#switchport mode trunk

S1(config-if-range)#switchport trunk native vlan 8

S1(config-if-range)#exit

S1(config)#interface range f0/1-2

S1(config-if-range)#channel-group 1 mode active

S1(config-if-range)#no shut

S1(config-if-range)#exit

S1(config)#interface f0/18

S1(config-if)#switchport mode access

S1(config-if)#switchport access vlan 4

S1(config-if)#switchport port-security maximum 2

S1(config-if)#switchport port-security aging time 60

S1(config-if)#swich port-security aging type inactivity

S1(config-if)#switch port-security violation shut