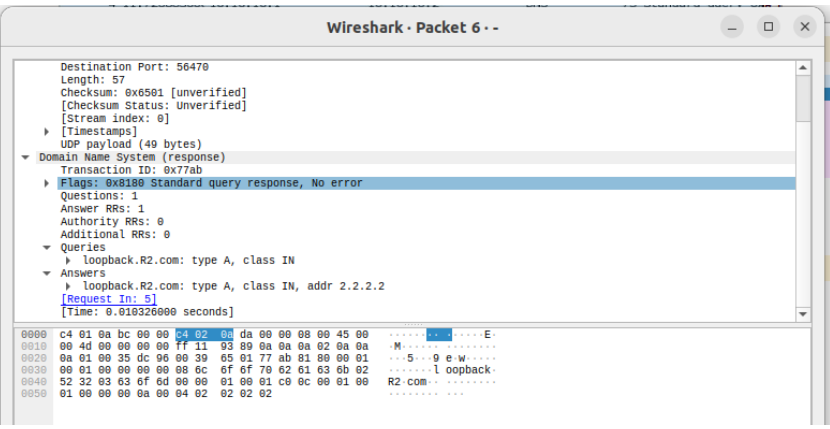
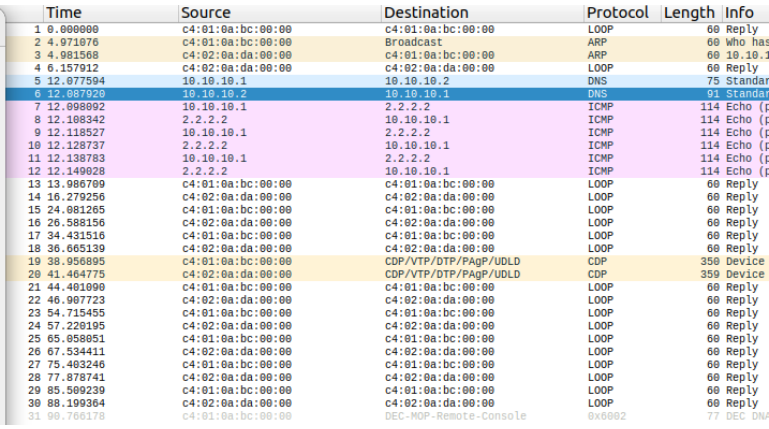
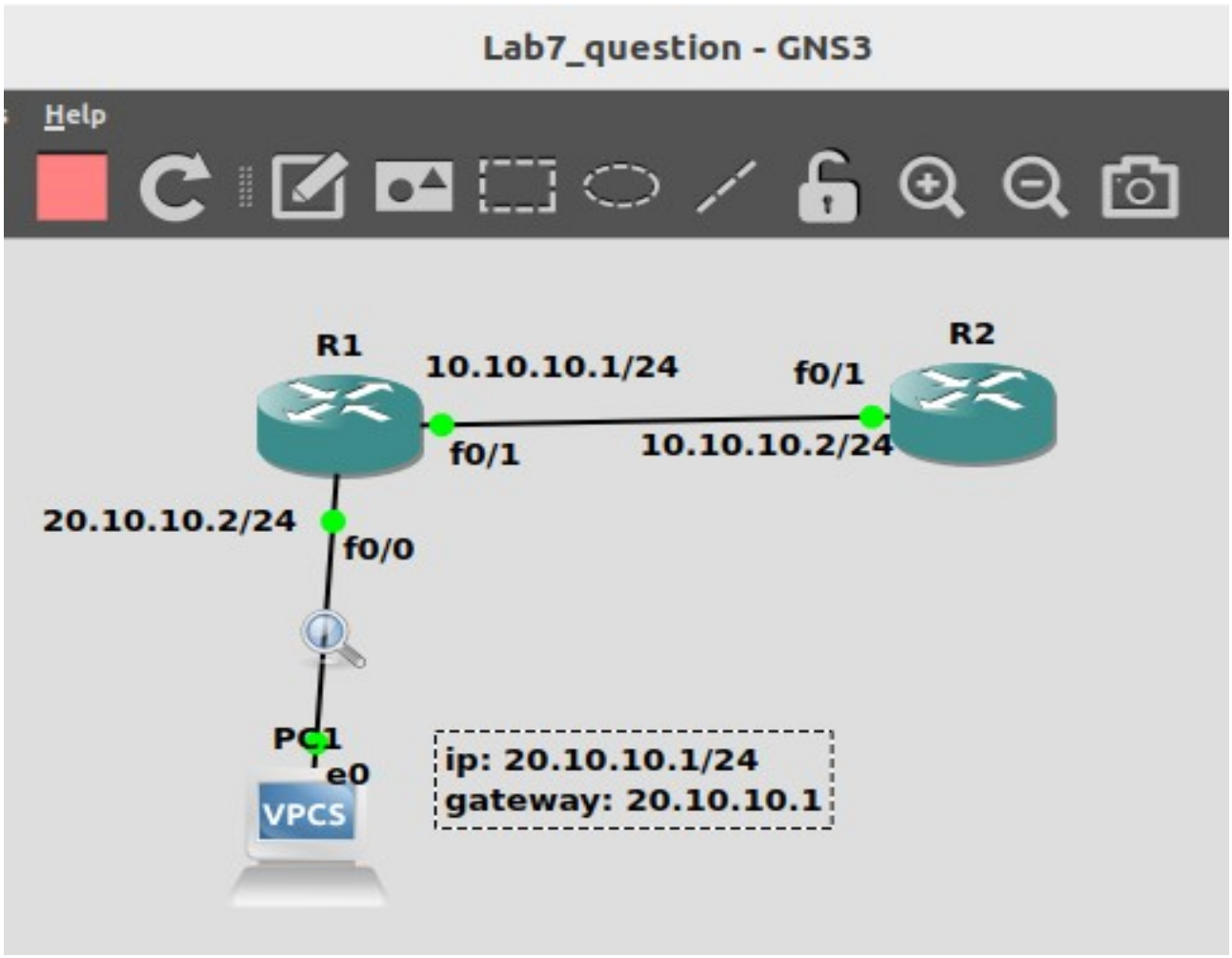
LAB 7>Study of Domain Name Server

Configure the below topology to setup DNS server. R1 will use R2 as DNS server to make DNS resolutions.





QUESTION>



COMMANDS:>
PC1> ip 20.10.10.1 255.255.255.0 20.10.10.2

R1#config t
R1(config)#interface f0/1
R1(config-if)#ip address 10.10.10.1 255.255.255.0
R1(config-if)#no shut
R1(config-if)#do wr
R1(config-if)#end

R2#config t
R2(config)#interface f0/1
R2(config-if)#ip address 10.10.10.2 255.255.255.0
R2(config-if)#no shut
R2(config-if)#do wr
R2(config-if)#end

R2#config t
R2(config)#ip dns server
R2(config)#ip host server.R2.com 10.10.10.2
R2(config)#no shut
R2(config)#end

R1#config t
R1(config)#ip route 0.0.0.0 0.0.0.0 10.10.10.2
R1(config)#end

R2#config t
R2(config)#ip route 20.10.10.0 255.255.255.0 10.10.10.1
R2(config)#end

PC1> ping 10.10.10.2

PC1> ip dns 10.10.10.2

PC1> ping server.R2.com

```
Frame 3: 89 bytes on wire (712 bits), 89 bytes captured (712 bits) on interface -, id 0
Ethernet II, Src: c4:01:0f:49:00:00 (c4:01:0f:49:00:00), Dst: Private_66:68:00 (00:50:79:66:68:00)
Internet Protocol Version 4, Src: 10.10.10.2, Dst: 20.10.10.1
User Datagram Protocol, Src Port: 53, Dst Port: 52222
Domain Name System (response)
    Transaction ID: 0xd639
  ▸ Flags: 0x8180 Standard query response, No error
    Questions: 1
    Answer RRs: 1
    Authority RRs: 0
    Additional RRs: 0
  ▾ Queries
    ▾ server.R2.com: type A, class IN
        Name: server.R2.com
        [Name Length: 13]
        [Label Count: 3]
        Type: A (Host Address) (1)
        Class: IN (0x0001)
  ▾ Answers
    ▾ server.R2.com: type A, class IN, addr 10.10.10.2
        Name: server.R2.com
        Type: A (Host Address) (1)
        Class: IN (0x0001)
        Time to live: 10 (10 seconds)
        Data length: 4
        Address: 10.10.10.2
    [Request In: 2]
    [Time: 0.022630000 seconds]
```