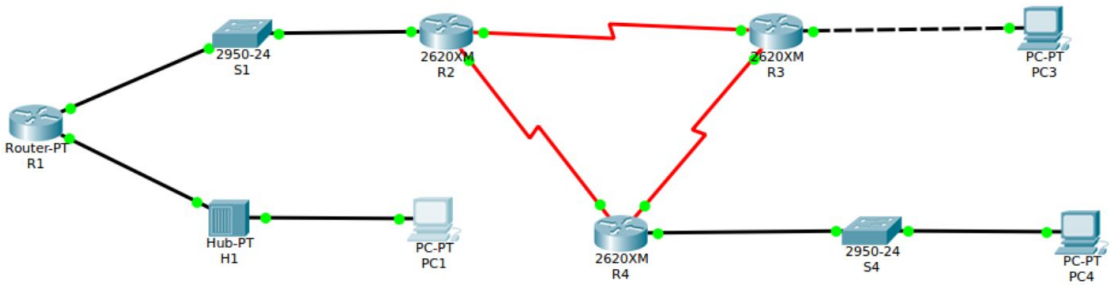
Лабараторная работа 4 частка 2

Богдан Уладзіслаў
ФПМІ, 3 курс, 3 група



Рэалізавалі схему і ўсе падключэнні, згаданыя ва ўмовах лабараторнай.
Пасля задаем статычныя маршруты на кожным з роўтараў R1-R4.
Прыклад задання (на R4):

```
Router>enable
Router#configure terminal
Enter configuration commands, one per line.  End with CNTL/Z.
Router(config)#
Router(config)#
Router(config)#
Router(config)#ip route 192.168.1.0 255.255.255.0 192.168.7.1
Router(config)#ip route 192.168.2.0 255.255.255.0 192.168.7.1
Router(config)#ip route 192.168.3.0 255.255.255.0 192.168.7.1
Router(config)#ip route 192.168.4.0 255.255.255.0 192.168.5.1
Router(config)#
Router(config)#
Router(config)#
Router(config)#ip route 0.0.0.0 0.0.0.0 192.168.5.1
Router(config)#
Router(config)#
Router(config)#exit
```

Табліца статычных IP-маршрутаў (на прыкладзе R4):

```
Router#show ip route
Codes: C - connected, S - static, I - IGRP, R - RIP, M - mobile, B - BGP
       D - EIGRP, EX - EIGRP external, O - OSPF, IA - OSPF inter area
       N1 - OSPF NSSA external type 1, N2 - OSPF NSSA external type 2
       E1 - OSPF external type 1, E2 - OSPF external type 2, E - EGP
       i - IS-IS, L1 - IS-IS level-1, L2 - IS-IS level-2, ia - IS-IS inter area
       * - candidate default, U - per-user static route, o - ODR
       P - periodic downloaded static route

Gateway of last resort is 192.168.5.1 to network 0.0.0.0

S    192.168.1.0/24 [1/0] via 192.168.7.1
S    192.168.2.0/24 [1/0] via 192.168.7.1
S    192.168.3.0/24 [1/0] via 192.168.7.1
S    192.168.4.0/24 [1/0] via 192.168.5.1
C    192.168.5.0/24 is directly connected, Serial0/0
C    192.168.6.0/24 is directly connected, FastEthernet0/0
C    192.168.7.0/24 is directly connected, Serial0/1
S*   0.0.0.0/0 [1/0] via 192.168.5.1
Router#
```

На ўсіх роўтарах сітуацыя падобная.

Правяраем дасягальнасць канечных прыладаў.
PC1 -> PC4:

```
PC>ping 192.168.6.10

Pinging 192.168.6.10 with 32 bytes of data:

Reply from 192.168.6.10: bytes=32 time=1ms TTL=125
Reply from 192.168.6.10: bytes=32 time=1ms TTL=125
Reply from 192.168.6.10: bytes=32 time=1ms TTL=125
Reply from 192.168.6.10: bytes=32 time=1ms TTL=125

Ping statistics for 192.168.6.10:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 1ms, Maximum = 1ms, Average = 1ms

PC>
```

```
PC>tracert 192.168.6.10

Tracing route to 192.168.6.10 over a maximum of 30 hops:

  1    2 ms      0 ms      0 ms      192.168.1.1
  2    0 ms      0 ms      0 ms      192.168.2.2
  3    0 ms      0 ms      0 ms      192.168.7.2
  4    0 ms      1 ms      0 ms      192.168.6.10

Trace complete.

PC>
```

PC3 -> PC1:

```
Packet Tracer PC Command Line 1.0
PC>ping 192.168.1.10

Pinging 192.168.1.10 with 32 bytes of data:

Reply from 192.168.1.10: bytes=32 time=2ms TTL=125
Reply from 192.168.1.10: bytes=32 time=1ms TTL=125
Reply from 192.168.1.10: bytes=32 time=10ms TTL=125
Reply from 192.168.1.10: bytes=32 time=1ms TTL=125

Ping statistics for 192.168.1.10:
    Packets: Sent = 4, Received = 4, Lost = 0 (0% loss),
Approximate round trip times in milli-seconds:
    Minimum = 1ms, Maximum = 10ms, Average = 3ms

PC>tracert 192.168.1.10

Tracing route to 192.168.1.10 over a maximum of 30 hops:

  1    0 ms      0 ms      0 ms      192.168.4.1
  2    1 ms      0 ms      1 ms      192.168.3.1
  3    4 ms      2 ms      1 ms      192.168.2.1
  4    0 ms      1 ms      0 ms      192.168.1.10

Trace complete.

PC>
```