

## ✓ Client-1ve Client-2nin 1.2.3.4 IP adresine erişmesi.

```
Client-1#ping 1.2.3.4
Type escape sequence to abort.
Sending 5, 100-byte ICMP Echos to 1.2.3.4, timeout is 2 seconds:
!!!!!!
Success rate is 100 percent (5/5), round-trip min/avg/max = 19/19/20 ms
Client-1#
```

```
Client-1#traceroute 1.2.3.4
Type escape sequence to abort.
Tracing the route to 1.2.3.4
VRF info: (vrf in name/id, vrf out name/id)
 1 192.168.1.254 0 msec 0 msec 0 msec
 2 192.168.26.2 8 msec 8 msec 11 msec
 3 10.10.123.1 8 msec 9 msec 8 msec
 4 10.1.1.18 9 msec 7 msec 8 msec
 5 10.1.1.22 9 msec 8 msec 9 msec
 6 201.15.3.6 18 msec * 17 msec
Client-1#
```

```
Client-2#ping 1.2.3.4
Type escape sequence to abort.
Sending 5, 100-byte ICMP Echos to 1.2.3.4, timeout is 2 seconds:
!!!!!!
Success rate is 100 percent (5/5), round-trip min/avg/max = 8/9/10 ms
Client-2#
```

```
Client-2#traceroute 1.2.3.4
Type escape sequence to abort.
Tracing the route to 1.2.3.4
VRF info: (vrf in name/id, vrf out name/id)
 1 10.2.2.254 0 msec 0 msec 0 msec
 2 10.1.1.3 0 msec 4 msec 5 msec
 3 10.10.123.1 0 msec 9 msec 8 msec
 4 10.1.1.18 9 msec 8 msec 9 msec
 5 10.1.1.22 7 msec 9 msec 9 msec
 6 201.15.3.6 12 msec * 9 msec
Client-2#
```

## ✓ R8, R7 ve R6 nın routing tabloları.

```

R8#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is 10.1.1.3 to network 0.0.0.0

D*EX 0.0.0.0/0 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      1.0.0.0/32 is subnetted, 1 subnets
D EX   1.1.1.1 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      2.0.0.0/32 is subnetted, 1 subnets
D EX   2.2.2.2 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      3.0.0.0/32 is subnetted, 1 subnets
D      3.3.3.3 [90/409600] via 10.1.1.3, 00:25:44, Ethernet0/0
      4.0.0.0/32 is subnetted, 1 subnets
D EX   4.4.4.4 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      5.0.0.0/32 is subnetted, 1 subnets
D EX   5.5.5.5 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      6.0.0.0/32 is subnetted, 1 subnets
D EX   6.6.6.6 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      7.0.0.0/32 is subnetted, 1 subnets
D      7.7.7.7 [90/409600] via 10.1.1.7, 00:25:41, Ethernet0/0
      8.0.0.0/32 is subnetted, 1 subnets
C      8.8.8.8 is directly connected, Loopback0
      10.0.0.0/8 is variably subnetted, 9 subnets, 4 masks
C      10.1.1.0/28 is directly connected, Ethernet0/0
L      10.1.1.8/32 is directly connected, Ethernet0/0
D EX   10.1.1.16/30 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
D EX   10.1.1.20/30 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
C      10.2.2.0/24 is directly connected, Ethernet0/1
L      10.2.2.254/32 is directly connected, Ethernet0/1
D EX   10.10.123.0/24 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
D EX   10.10.123.1/32 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
D EX   10.10.123.2/32 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
D EX   192.168.1.0/24 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
      192.168.26.0/28 is subnetted, 1 subnets
D EX   192.168.26.0 [170/284160] via 10.1.1.3, 00:25:44, Ethernet0/0
R8#

```

```
R7#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is 10.1.1.3 to network 0.0.0.0

D*EX 0.0.0.0/0 [170/284160] via 10.1.1.3, 00:28:31, Ethernet0/0
      1.0.0.0/32 is subnetted, 1 subnets
D EX  1.1.1.1 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
      2.0.0.0/32 is subnetted, 1 subnets
D EX  2.2.2.2 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
      3.0.0.0/32 is subnetted, 1 subnets
D     3.3.3.3 [90/409600] via 10.1.1.3, 00:29:37, Ethernet0/0
      4.0.0.0/32 is subnetted, 1 subnets
D EX  4.4.4.4 [170/284160] via 10.1.1.3, 00:29:06, Ethernet0/0
      5.0.0.0/32 is subnetted, 1 subnets
D EX  5.5.5.5 [170/284160] via 10.1.1.3, 00:28:36, Ethernet0/0
      6.0.0.0/32 is subnetted, 1 subnets
D EX  6.6.6.6 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
      7.0.0.0/32 is subnetted, 1 subnets
C     7.7.7.7 is directly connected, Loopback0
      8.0.0.0/32 is subnetted, 1 subnets
D     8.8.8.8 [90/409600] via 10.1.1.8, 00:26:44, Ethernet0/0
      10.0.0.0/8 is variably subnetted, 8 subnets, 4 masks
C     10.1.1.0/28 is directly connected, Ethernet0/0
L     10.1.1.7/32 is directly connected, Ethernet0/0
D EX  10.1.1.16/30 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
D EX  10.1.1.20/30 [170/284160] via 10.1.1.3, 00:28:51, Ethernet0/0
D     10.2.2.0/24 [90/307200] via 10.1.1.8, 00:26:44, Ethernet0/0
D EX  10.10.123.0/24 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
D EX  10.10.123.1/32 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
D EX  10.10.123.2/32 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
D EX  192.168.1.0/24 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
      192.168.26.0/28 is subnetted, 1 subnets
D EX  192.168.26.0 [170/284160] via 10.1.1.3, 00:29:37, Ethernet0/0
R7#
```

```
R6#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is 192.168.26.2 to network 0.0.0.0

R*    0.0.0.0/0 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      1.0.0.0/32 is subnetted, 1 subnets
R      1.1.1.1 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      2.0.0.0/32 is subnetted, 1 subnets
R      2.2.2.2 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      3.0.0.0/32 is subnetted, 1 subnets
R      3.3.3.3 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      4.0.0.0/32 is subnetted, 1 subnets
R      4.4.4.4 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      5.0.0.0/32 is subnetted, 1 subnets
R      5.5.5.5 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      6.0.0.0/32 is subnetted, 1 subnets
C      6.6.6.6 is directly connected, Loopback0
      7.0.0.0/32 is subnetted, 1 subnets
R      7.7.7.7 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      8.0.0.0/32 is subnetted, 1 subnets
R      8.8.8.8 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      10.0.0.0/8 is variably subnetted, 7 subnets, 4 masks
R      10.1.1.0/28 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.1.1.16/30 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.1.1.20/30 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.2.2.0/24 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.10.123.0/24 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.10.123.1/32 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
R      10.10.123.3/32 [120/3] via 192.168.26.2, 00:00:21, Serial1/0
      192.168.1.0/24 is variably subnetted, 2 subnets, 2 masks
C      192.168.1.0/24 is directly connected, Ethernet0/0
L      192.168.1.254/32 is directly connected, Ethernet0/0
      192.168.26.0/24 is variably subnetted, 2 subnets, 2 masks
C      192.168.26.0/28 is directly connected, Serial1/0
L      192.168.26.6/32 is directly connected, Serial1/0
R6#
```

## ✓ R4 ve R5 in routing tabloları.

```
R4#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is 10.1.1.22 to network 0.0.0.0

O*E1  0.0.0.0/0 [110/110] via 10.1.1.22, 00:06:49, Ethernet0/1
      1.0.0.0/32 is subnetted, 1 subnets
O      1.1.1.1 [110/11] via 10.1.1.17, 00:29:50, Ethernet0/0
      2.0.0.0/32 is subnetted, 1 subnets
O      2.2.2.2 [110/1011] via 10.1.1.17, 00:29:50, Ethernet0/0
      3.0.0.0/32 is subnetted, 1 subnets
O      3.3.3.3 [110/1011] via 10.1.1.17, 00:29:50, Ethernet0/0
      4.0.0.0/32 is subnetted, 1 subnets
C      4.4.4.4 is directly connected, Loopback0
      5.0.0.0/32 is subnetted, 1 subnets
O      5.5.5.5 [110/11] via 10.1.1.22, 00:29:39, Ethernet0/1
      6.0.0.0/32 is subnetted, 1 subnets
O E2   6.6.6.6 [110/20] via 10.1.1.17, 00:30:10, Ethernet0/0
      7.0.0.0/32 is subnetted, 1 subnets
O E1   7.7.7.7 [110/1030] via 10.1.1.17, 00:03:49, Ethernet0/0
      8.0.0.0/32 is subnetted, 1 subnets
O E1   8.8.8.8 [110/1030] via 10.1.1.17, 00:03:49, Ethernet0/0
      10.0.0.0/8 is variably subnetted, 9 subnets, 4 masks
O E1   10.1.1.0/28 [110/1030] via 10.1.1.17, 00:03:49, Ethernet0/0
C      10.1.1.16/30 is directly connected, Ethernet0/0
L      10.1.1.18/32 is directly connected, Ethernet0/0
C      10.1.1.20/30 is directly connected, Ethernet0/1
L      10.1.1.21/32 is directly connected, Ethernet0/1
O E1   10.2.2.0/24 [110/1030] via 10.1.1.17, 00:03:49, Ethernet0/0
O      10.10.123.1/32 [110/10] via 10.1.1.17, 00:29:50, Ethernet0/0
O      10.10.123.2/32 [110/1010] via 10.1.1.17, 00:29:50, Ethernet0/0
O      10.10.123.3/32 [110/1010] via 10.1.1.17, 00:29:50, Ethernet0/0
O E2   192.168.1.0/24 [110/20] via 10.1.1.17, 00:30:10, Ethernet0/0
      192.168.26.0/28 is subnetted, 1 subnets
O E2   192.168.26.0 [110/20] via 10.1.1.17, 00:30:10, Ethernet0/0
R4#
```

```

R5#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is not set

    1.0.0.0/32 is subnetted, 2 subnets
O IA   1.1.1.1 [110/21] via 10.1.1.21, 00:30:00, Ethernet0/1
B      1.2.3.4 [200/10] via 201.15.3.6, 00:18:53
    2.0.0.0/32 is subnetted, 1 subnets
O IA   2.2.2.2 [110/1021] via 10.1.1.21, 00:30:00, Ethernet0/1
    3.0.0.0/32 is subnetted, 1 subnets
O IA   3.3.3.3 [110/1021] via 10.1.1.21, 00:30:00, Ethernet0/1
    4.0.0.0/32 is subnetted, 1 subnets
O IA   4.4.4.4 [110/11] via 10.1.1.21, 00:30:00, Ethernet0/1
    5.0.0.0/32 is subnetted, 1 subnets
C      5.5.5.5 is directly connected, Loopback0
    6.0.0.0/32 is subnetted, 1 subnets
O E2   6.6.6.6 [110/20] via 10.1.1.21, 00:30:00, Ethernet0/1
    7.0.0.0/32 is subnetted, 1 subnets
O E1   7.7.7.7 [110/1040] via 10.1.1.21, 00:04:09, Ethernet0/1
    8.0.0.0/32 is subnetted, 1 subnets
O E1   8.8.8.8 [110/1040] via 10.1.1.21, 00:04:09, Ethernet0/1
    10.0.0.0/8 is variably subnetted, 8 subnets, 4 masks
O E1   10.1.1.0/28 [110/1040] via 10.1.1.21, 00:04:09, Ethernet0/1
O IA   10.1.1.16/30 [110/20] via 10.1.1.21, 00:30:00, Ethernet0/1
C      10.1.1.20/30 is directly connected, Ethernet0/1
L      10.1.1.22/32 is directly connected, Ethernet0/1
O E1   10.2.2.0/24 [110/1040] via 10.1.1.21, 00:04:09, Ethernet0/1
O IA   10.10.123.1/32 [110/20] via 10.1.1.21, 00:30:00, Ethernet0/1
O IA   10.10.123.2/32 [110/1020] via 10.1.1.21, 00:30:00, Ethernet0/1
O IA   10.10.123.3/32 [110/1020] via 10.1.1.21, 00:30:00, Ethernet0/1
O E2   192.168.1.0/24 [110/20] via 10.1.1.21, 00:30:00, Ethernet0/1
    192.168.26.0/28 is subnetted, 1 subnets
O E2   192.168.26.0 [110/20] via 10.1.1.21, 00:30:00, Ethernet0/1
    201.15.3.0/24 is variably subnetted, 2 subnets, 2 masks
C      201.15.3.4/30 is directly connected, Serial1/0
L      201.15.3.5/32 is directly connected, Serial1/0
R5#

```

## ✓ ISP nin routing tablosu.

```
ISP#show ip route
Codes: L - local, C - connected, S - static, 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
       i - IS-IS, su - IS-IS summary, 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, H - NHRP, l - LISP
       a - application route
       + - replicated route, % - next hop override

Gateway of last resort is not set

    1.0.0.0/32 is subnetted, 1 subnets
C       1.2.3.4 is directly connected, Loopback0
    201.15.3.0/24 is variably subnetted, 2 subnets, 2 masks
C       201.15.3.4/30 is directly connected, Serial0/0
L       201.15.3.6/32 is directly connected, Serial0/0
ISP#
```