

#### Router 1:

```
Router>enable
Router#configure terminal
Enter configuration commands, one per line. End with CNTL/Z.
Router(config) #interface Serial2/0
Router(config-if) #ip address 10.1.1.1 255.0.0.0
Router(config-if)#
Router(config-if) #exit
Router(config) #interface Serial2/0
Router(config-if)#
Router(config-if)#exit
Router(config) #interface Serial2/0
Router(config-if) #no shutdown
%LINK-5-CHANGED: Interface Serial2/0, changed state to down
Router(config-if)#
%LINK-5-CHANGED: Interface Serial2/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up
Router(config-if) #exit
Router(config)#interface Serial2/0
Router(config-if) #ip address 10.1.1.1 255.255.255.252
Router(config-if) #exit
Router(config)#
Router(config)#interface FastEthernet0/0
Router(config-if) #no ip address
Router(config-if) #no shutdown
```

### Router2

```
Router>enable
Router#configure terminal
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#interface Serial2/0
Router(config-if) #ip address 10.1.1.2 255.0.0.0
Router(config-if)#
Router(config-if)#exit
Router(config)#interface Serial3/0
Router(config-if)#
Router(config-if)#exit
Router(config) #interface Serial2/0
Router(config-if) #no shutdown
Router(config-if)#
%LINK-5-CHANGED: Interface Serial2/0, changed state to up
Router(config-if)#exit
Router(config)#interface Serial3/0
Router(config-if)#
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial2/0, changed state to up
Router(config-if)#exit
Router(config) #interface Serial2/0
Router(config-if) #ip address 10.1.1.2 255.255.255.252
Router(config-if)#
Router(config-if) #exit
Router(config) #interface Serial2/0
Router(config-if)#
Router(config-if)#exit
```

```
%LINK-5-CHANGED: Interface Serial3/0, changed state to down
Router(config-if)#
Router(config-if)#exit
Router(config)#interface Serial2/0
Router(config-if)#
Router(config-if)#exit
Router(config)#interface Serial3/0
Router(config-if)#
Router(config-if)#exit
Router(config)#interface Serial3/0
Router(config-if)#
%LINK-5-CHANGED: Interface Serial3/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
Router(config-if)#exit
Router(config) #interface FastEthernet4/0
Router(config-if)#
Router(config-if) #exit
Router(config)#interface Serial3/0
Router(config-if)#
Router(config-if)#exit
Router(config)#interface FastEthernet0/0
Router(config-if) #ip address 192.168.25.1 255.255.255.0
Router(config-if) #no shutdown
Router(config-if)#
%LINK-5-CHANGED: Interface FastEthernet0/0, changed state to up
```

#### **ROUTER 3**

```
Router>enable
Router#configure terminal
Enter configuration commands, one per line. End with CNTL/Z.
Router(config) #interface Serial3/0
Router(config-if) #no shutdown
Router(config-if)#
%LINK-5-CHANGED: Interface Serial3/0, changed state to up
ip address 10.2.2.2 255.0.0.0
Router(config-if)#
%LINEPROTO-5-UPDOWN: Line protocol on Interface Serial3/0, changed state to up
ip address 10.2.2.2 255.255.255.252
Router(config-if)#
Router(config-if) #exit
Router(config) #interface FastEthernet0/0
Router(config-if) #ip address 192.168.35.1 255.255.255.0
Router(config-if) #no shutdown
Router(config-if)#
%LINK-5-CHANGED: Interface FastEthernet0/0, changed state to up
%LINEPROTO-5-UPDOWN: Line protocol on Interface FastEthernet0/0, changed state to
up
```

## **OSPF:**

```
Router>
Router>en
Router#conf
Router#configure t
Enter configuration commands, one per line. End with CNTL/Z.
Router(config)#exit
Router#
%SYS-5-CONFIG_I: Configured from console by console
Router#sh 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 not set
     10.0.0.0/30 is subnetted, 2 subnets
       10.1.1.0 is directly connected, Serial2/0
       10.2.2.0 is directly connected, Serial3/0
   192.168.15.0/24 [110/65] via 10.1.1.1, 00:08:33, Serial2/0
    192.168.25.0/24 is directly connected, FastEthernet0/0
  192.168.35.0/24 [110/65] via 10.2.2.2, 00:06:49, Serial3/0
Router#
```

# **OSPF:**

```
Router(config) #router ospf 1
Router(config-router) #network 10.0.0.0 0.255.255.255 area 1
Router(config-router) #network 11.0.0.0 0.255.255.255 area 2
Router(config-router) #network 192.168.35.2 0.0.0.255 area 1
Router(config-router) #exit
Router(config) #
```

**Task 2:** 

