10.4.3 Packet Tracer - Basic Device Configuration (Instructor Version)

Instructor Note: Red font color or gray highlights indicate text that appears in the instructor copy only.

Topology

You will receive one of three possible topologies.

Addressing Table

Device	Interface	IP Address	Default Gateway
College	G0/0	128.107.20.1/24	N/A
		2001:db8:a::1/64	
		FE80::1	
	G0/1	128.107.30.1/24	N/A
		2001:db8:b::1/64	
		FE80::1	
Class-A	VLAN 1	128.107.20.2/24	128.107.20.1
Class-B	VLAN 1	128.107.30.15/24	128.107.30.1
Student-1	NIC	128.107.20.25/24	128.107.20.1
		2001:db8:a::2/64	FE80::1
Student-2	NIC	128.107.20.30/24	128.107.20.1
		2001:db8:a::3/64	FE80::1
Student-3	NIC	128.107.30.25/24	128.107.30.1
		2001:db8:b::2/64	FE80::1
Student-4	NIC	128.107.30.30/24	128.107.30.1
		2001:db8:b::3/64	FE80::1

Objectives

- Complete the network documentation.
- Perform basic device configurations on a router and a switch.
- Verify connectivity and troubleshoot any issues.

Scenario

Your network manager is impressed with your performance in your job as a LAN technician. She would like you to demonstrate your ability to configure a router that connects two LANs. Your tasks include configuring basic settings on a router and a switch using the Cisco IOS. You will also configure IPv6 addresses on network devices and hosts. You will then verify the configurations by testing end-to-end connectivity. You goal is to establish connectivity between all devices.

Note: The VLAN1 interface on **Class-A** will not be reachable over IPv6.

In this activity you will configure the **College** router, **Class-B** switch, and the **PC hosts**.

Note: Packet Tracer will not score some configured values, however these values are required to accomplish full connectivity in the network.

Requirements

- Provide the missing information in the Addressing Table.
- Name the router **College** and the second switch **Class-B**. You will not be able to access the **Class-A** switch.
- Use **cisco** as the user EXEC password for all lines.
- Use **class** as the encrypted privileged EXEC password.
- Encrypt all plaintext passwords.
- Configure an appropriate banner.
- Configure IPv4 and IPv6 addressing for the **College** switch according to the Addressing Table.
- Configure IPv4 and IPv6 addressing for the **Class-B** switch according to the Addressing Table.
- The hosts are partially configured. Complete the IPv4 addressing, and fully configure the IPv6 addresses according to the Addressing Table.
- Document interfaces with descriptions, including the **Class-B** VLAN 1 interface.
- Save your configurations.
- Verify connectivity between all devices. All devices should be able to ping all other devices with IPv4 and IPv6.
- Troubleshoot and document any issues.
- Implement the solutions necessary to enable and verify full end-to-end connectivity.

Note: Click **Check Results** button to see your progress. Click the **Reset Activity** button to generate a new set of requirements.

ID: [[indexNames]][[indexAdds]][[indexTopos]]

This activity is configured with an error that the student must correct before receiving full credit. The IP address on Student-4 is in the wrong subnet and does not match the IP address in the Addressing Table. The correct answers depend on the scenario the student received. The password to access Activity Wizard is PT_ccna5**.**