**EtherChannel Packet Tracer Exercise Instructions**

You will be required to activate etherchannel functionality on the physical links that interconnect SW1, SW2, and SW3.

1. The link from SW1 to SW2 requires PAgP as the channel protocol. SW2 will not initiate the channel. SW1 will initiate the channel. SW1 and SW2 will label **port-channel 1**.
2. The link from SW1 to SW3 requires LACP as the channel protocol. SW3 will not initiate the channel. SW1 will initiate the channel. SW1 and SW3 will label **port-channel 2**.
3. The link from SW2 to SW3 will not use PAgP or LACP to channel. SW2 and SW3 will label **port-channel 3**.

You now must activate dot1q trunking on all the port-channels.

1. Port-channel 1 should dynamically negotiate a trunk. SW1 will initiate the negotiation. SW2 will not initiate.
2. Port-channel 2 should dynamically negotiate a trunk. SW3 will initiate the trunk. SW1 will not initiate.
3. Port-channel 3 should be forced to trunk and both ends of this link should never be able to become an access port.

Verify the spanning-tree roots for VLANs 1, 2, and 3. Ensure SW1 is the root for VLAN 1, SW2 is the root for VLAN 2, and SW3 is the root for VLAN 3. Use the macro command **spanning-tree root primary** if you need to configure.

You will now change the native VLAN on the port-channels.

1. Port-channel 1 will use native VLAN 1
2. Port-channel 2 will use native VLAN 2
3. Port-channel 3 will use native VLAN 3

You will now add an additional physical port to each port-channel.

1. Add port fa0/3 to port-channel 1
2. Add port fa0/ 7 to port-channel 2
3. Add port fa0/10 to port-channel 3

This exercise should take you no more than 30 minutes. Practice entering the commands and verify etherchannel operation. The **show etherchannel summary** and **show interface trunk** commands will be handy.