Configure Single Point Setup on a Wireless Access Point

Objective

The Single Point Setup feature provides a centralized method to administer and control wireless services across multiple devices. Single Point Setup is used to create a single group or cluster of Wireless Access Points (WAPs). Once WAPs are clustered, you can view, deploy, configure, and secure the wireless network as a single entity. Settings from a device with Single Point Setup configured are propagated to other devices as they join the cluster.

Configuring Single Point Setup is very useful in order to facilitate channel planning and share information such as Virtual Access Point (VAP) settings, Quality of Service (QoS) queue and radio parameters across your wireless services to reduce radio interference, and maximize bandwidth on the wireless network.

The objective of this document is to explain how to configure Single Point Setup on your access point.

Note: Before proceeding with the configuration, the following rules must be observed:

A cluster can be created only among the same model of two or more WAPs, each of which has Single Point Setup enabled and reference the same Single Point Setup name.

The WAPs must be in the same network or subnet and it should use the same type of IP addressing. IPv6 and IPv4 configured devices cannot form a cluster.

Applicable Devices

- WAP100 Series – WAP121, WAP150
- WAP300 Series
- WAP500 Series

Software Version

- 1.0.1.2 – WAP150, WAP361
- 1.0.6.2 – WAP121, WAP321
- 1.0.2.2 – WAP351
- 1.2.1.3– WAP551, WAP561, WAP371
- 1.0.0.17 – WAP571, WAP571E

Single Point Setup

Step 1. Log in to the web-based utility and choose Single Point Setup > Access Points.

Note: The web-based utility menu may vary depending on the model of your WAP. The images below are taken from WAP361.
Note: Once the page opens, icons showing at the right side of the page indicate whether Single Point Setup is enabled or disabled. If it is enabled, the number of WAPs that are currently joined in the cluster is also indicated.

Note: You can only edit the Single Point Setup settings if Single Point Setup is disabled. By default, this feature is disabled on the WAP.

Step 2. (Optional) In the Location field, enter a description of where the WAP device is physically located. In this example, Reception Area is used.

Step 3. In the Cluster Name field, enter the name of the cluster for the WAP to join. In this example, cluster-A is used.
Note: The cluster name is not sent to other WAPs so you must configure the same name on each device that is a member. The cluster name must be unique for each Single Point Setup that you configure on the network.

Step 4. Choose the IP version that you want the WAP devices in the cluster to use to communicate with other members. The default clustering IP version is IPv4.

Step 5. Enter the priority of the cluster for Dominant WAP (Cluster Controller) election. The higher number you set, the higher the chance for this WAP to become the Dominant WAP. In case of a tie, lowest Media Access Control (MAC) address becomes dominant.

Note: In this example, 1 is used.

Step 6. Click the **Enable Single Point Setup** button.
The WAP will start to search for other WAPs in the subnet that are configured with the same cluster name and IP version. While searching for other cluster members, the status indicates that the configuration is being applied.

Step 7. Refresh the page until you see the new configuration. The Access Points page will show a table displaying the Locations, MAC Addresses, and IP Addresses of the access points detected currently in the cluster.

Step 8. Repeat all the steps above for each additional WAP that you want to join in the cluster. Make sure to refresh the Access Points page each time to see the most updated configuration. If the additional WAPs are configured with the same cluster settings, the WAP will join the cluster and the information on the new member will appear in the table.

**Note:** All WAPs in a Single Point Setup cluster will now share the same device configuration settings. Changes to device settings on any WAP in the cluster will be propagated to other members.

Step 9. (Optional) If you no longer want your WAP to share configuration settings with others, simply remove it from the cluster by clicking **Disable Single Point Setup**.
You should now have successfully configured Single Point Setup on your access point.