How to Maximize Wi-Fi Range

Summary

There could be multiple causes if you are not able to connect to the Wi-Fi at a desire range with BEC Wi-Fi Routers. These simple tips can help optimize your Wi-Fi network.

Troubleshooting

1. **Update your router Firmware**
   Please make sure your router has latest firmware. You can check firmware with our tech support by email teamsupport@bectechnologies.net or call 972.422.0877 option 2.

2. **Move your router**
   Sounds obvious, but where you place the router can affect your wireless coverage. Please take some time to try at different locations for your router, and see which spot provides the best performance. Rather than relegating it to a far end of your place, the router should be in the center of your place. In addition, the Wi-Fi router needs open space, away from walls and obstructions. Keep it away from heavy-duty appliances or electronics as well, since running those in close proximity can impact Wi-Fi performance. Make sure the router is not on the floor – placing it higher up on a table or shelf generally gets better results.

3. **Wi-Fi Antenna**
   For best performance, please use the antennas provided from the BEC and follow the installation guide to install Wi-Fi antenna correctly. 2.4GHz and 5GHz antenna are different.

4. **Change the Band**
   Some BEC Wi-Fi devices support both the 2.4GHz and 5GHz bands. The 5GHz band likely has less interference from other wireless networks because the 5GHz frequency is not as commonly used and provides more non-overlapping channels than the 2.4GHz band.

However, 2.4GHz band has better penetration than 5GHz through objects such as walls or doors.

5. **Change the Channel**

    Interference is a big issue, especially for those who live in densely populated areas. If neighboring wireless networks are also using the same channel as you, then you are going to encounter signal interference. BEC Wi-Fi router support channel switch and please try changing the channel on your router to prevent interference with other Wi-Fi networks. You can run Site Survey to find out all the Wi-Fi networks around you and see which channels have been used on other Wi-Fi networks.

▼Wireless 2.4G [Site Survey]	
Access Point Settings	
Access Point	⦿ Activated ○ Deactivated
AP MAC Address	60:03:47:34:CE:13
Wireless Mode	802.11b+g+n ⌄
Channel	UNITED STATES ⌄ 06 ⌄ Current Channel : 6

▼Wireless 5G [Site Survey]	
Access Point	⦿ Activated ○ Deactivated
AP MAC Address	60:03:47:34:CE:14
Wireless Mode	802.11a+n+ac ⌄
Channel	UNITED STATES ⌄ 153 ⌄ Current Channel 153