Frymaster®

FRYMASTER
8700 LINE AVENUE, SHREVEPORT, LA 71106

318-865-1711
800-551-8633
WWW.FRYMASTER.COM
EMAIL:FRYSERVICE@WELBILT.COM

Instruction Sheet

Follow these steps to update the fryer and install FQLink.

NOTE: FQLink ==ONLY== functions on fryers with at least ONE (1) Common Controller (see Figure 1) installed in the far-left Vat #1 position.

Subject: 8263836, 8263837 FQ4000 FQLink Installation Instructions

Models affected: Taco Bell FilterQuick 4000 (Touch Screen) Fryers

11.21.2024

Figure 1

STEP 1: CONFIRM COMMON CONTROLLER IS INSTALLED

1. The fryer **MUST** have at least **ONE (1)** Common Controller (see Figure 1) installed in the battery. It must be located in the far-left Vat #1 position. If a Common Controller is installed in the far-left Vat #1 position, continue to step 2. The Common Controller can be identified by the large silver metal bezel that surrounds the touch screen. If the fryer **==DOES NOT==** have a Common Controller installed, **==DO NOT PROCEED==**. **A Taco Bell controller conversion kit 8263741 will need to be installed in the far-left vat #1 position prior to continuing to STEP 2 for installation.**

Figure 2

STEP 2: UPDATE THE FRYER SOFTWARE

1. Locate the USB with the **==FRYER SOFTWARE FILES==** and follow the enclosed instructions to update the fryer software using the USB port on the **FAR-LEFT** side of the fryer, just inside the left fryer door (see Figure 2). The software versions after update should be: UIC – 20.00.175; SIB – 04.02.000; VIB –01.01.000, 1.02.000, 01.02.001 or 1.03.003; FIB – 20.00.069
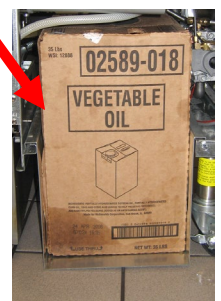

Figure 3

STEP 3: DISCONNECT KCCM & RELOCATE MODEM (IF INSTALLED)
For 30lb fryers continue to step 1 below.

1. Disconnect power from the fryer.
2. For 30lb fryers open the **FAR-RIGHT** door of the fryer or door with the oil reservoir (it may be third door from the left in 4 vat fryers or larger) (see Figure 3).
3. Remove the JIB/BIB to access the FIB box (see Figure 3). Note: The appearance of the FIB box may differ depending on date of manufacture.

WELBILT®

4. Remove the FIB box cover by removing the two (2) ¼" screws attaching the cover and lifting on the cover to remove (see Figure 5). This box may vary by date of manufacture.

5. The KCCM board is located on the right side or rear of the FIB box (see Figure 6) depending on date of manufacture. Prior to starting, disconnecting the J1 harness may provide easier access to the RJ connectors on the FIB board (see Figure 6 & 6A).
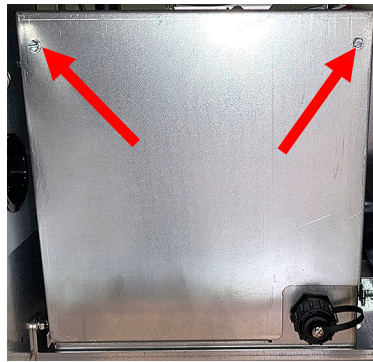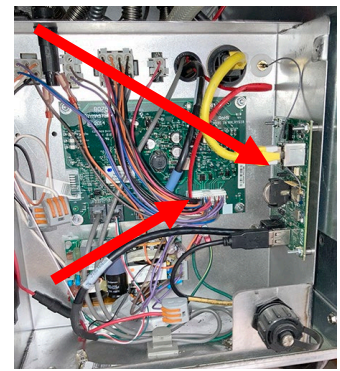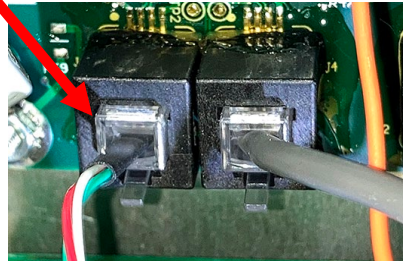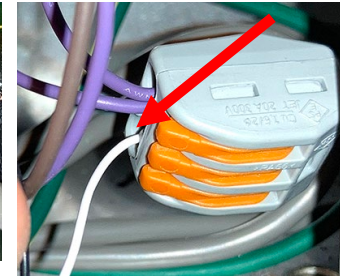

Figure 5

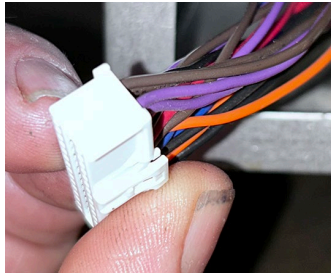**Figure 6**

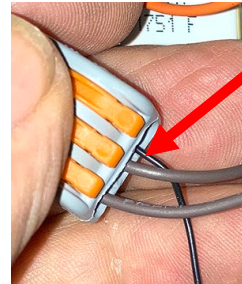**Figure 7**
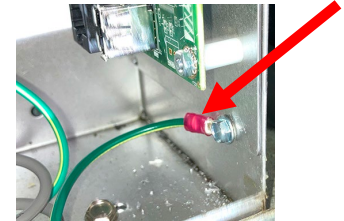

Figure 8

Figure 6A

Figure 9

Figure 10

6. Disconnect the RJ11 KCCM CAN/power harness (see Figure 7) from the FIB board.

7. Disconnect the white & black wires from the harness in the previous step from the Wago snap connectors (see Figure 8 & 9.

8. Cut or disconnect the green ground wire of the harness from the box (see Figure 10).

Figure 11

Figure 12

9. If a cellular modem is **NOT CONNECTED** to the KCCM board, skip to step 10. If a modem is connected, disconnect the cellular modem USB cable from the KCCM board (see Figure 11).

10. Disconnect the RJ45 connector from the KCCM board (see Figure 12). Discard the complete harness, it will no longer be used. The KCCM board will remain in the box.

Figure 13

11. Connect the supplied RJ11 CAN terminator to the connector on the FIB board from step 6 above (see Figure 13).

WELBILT®

Frymaster

12. If a cellular modem is installed continue to the next step. If not skip to step 17.
13. If applicable, relocate the cellular modem between the controllers on the rear of the bezel using double sided tape (see Figure 15).
14. If antenna extensions were used, disconnect the extensions and connect antennas directly to the modem (see Figure 15). Ensure the antennas are parallel to each another (see Figure 16).
15. Using the supplied USB cable, route the USB cable from the modem to the rear of the vat #1 controller.
16. Connect to the USB plug on the rear of the Vat #1 controller. If a cooling housing is installed, connect a splitter between the USB cable modem and the cooling fan cable (see Figure 17).
17. If connecting using ethernet, route the ethernet cable to the rear of the Vat #1 controller ethernet connection and connect to the controller (see Figure 18).
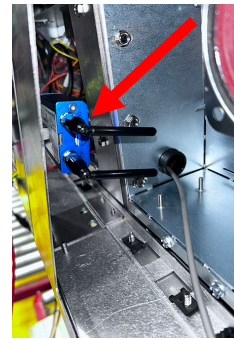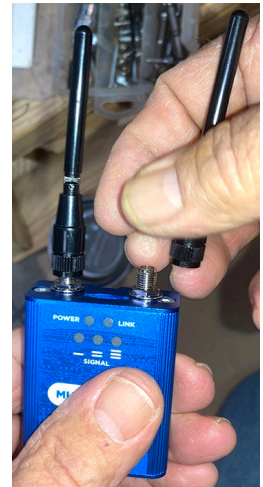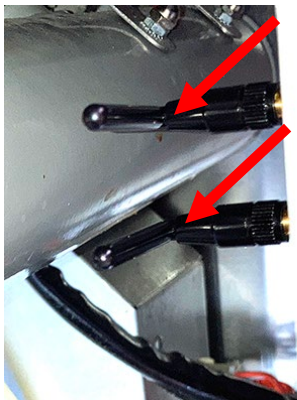
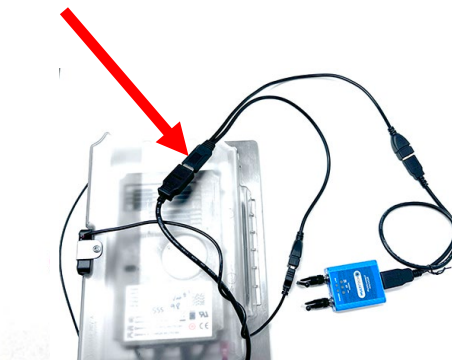**Figure 14**
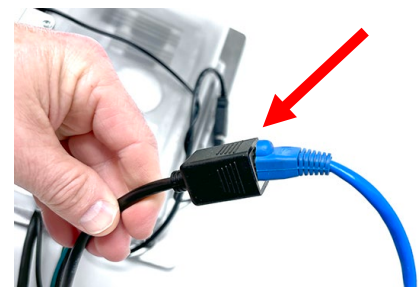
Figure 15

Figure 16

Figure 17

Figure 18

STEP 4: INSTALL THE IoT AGENT SOFTWARE

1. Ensure all controllers are OFF and in the standby mode (see Figure 19).
2. Locate the USB with the <mark>IoT AGENT SOFTWARE FILES</mark> and insert the USB drive into the USB port on the **FAR-LEFT** side of the fryer, just inside the left fryer door (see Figure 20). The USB port may differ in appearance based on date of manufacture.
3. Wait for the controller to reboot.
    a. The process should take about three & a half (3½) minutes.
    b. The controller will be unresponsive to touch after two & a half (2½) minutes.
    c. If the controller **DOES NOT** reboot after five (5) minutes, leave the USB drive inserted and reboot the entire fryer. Once it's finished rebooting, go back to 2.a. on the previous page.
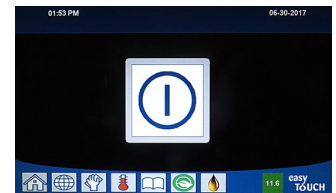
Figure 19

Figure 20

WELBILT

4. Wait two (2) minutes and press the "**HOME**" button on the (see Figure 21).

5. Press the **?** button (see Figure 22).

6. Press the down arrow button (see Figure 23).

7. Press the software version button (see Figure 24).

8. Press the down arrow button **TWO** (2) times (see Figure 25).

9. The **GATEWAY SOFTWARE VERSION** should be **60.99.018 for AWS or 61.99.032 Generic** (see Figure 26). If not, repeat steps 1-8 of this section. If after two tries of loading the software and the version below is **NOT** displayed, go to STEP 4 (Troubleshooting) on the last page.
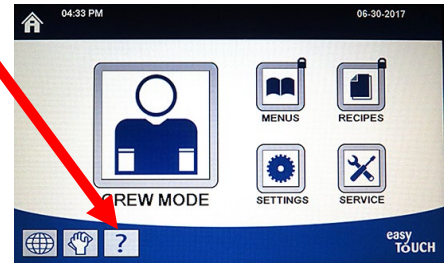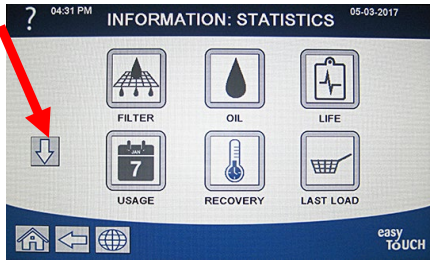
Figure 21

Figure 22

Figure 23

Figure 24
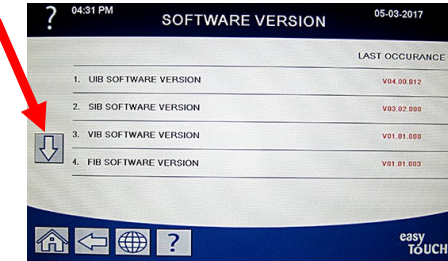
Figure 25

10. GATEWAY SOFTWARE VERSION

Figure 26

V60.99.018 AWS or 61.99.032 Generic

10. Press the "HOME" button (see Figure 21) when finished.

11. This concludes installing hardware and updating software. The instructions on the following pages are for techs that are connecting the fryer to the cloud.

STOP!!!! THE NEXT SECTION SHOULD ONLY BE COMPLETED BY PERSONNEL THAT HAVE THE INFORMATION, PASSWORDS, SSID, ETC. TO CONNECT THE FRYER TO THE CLOUD.

Appendix A

<mark>This section should ONLY be completed by IT departments or other personnel with the ability to edit config files and connect to the cloud.</mark>

STEP 1: EDIT THE CONFIG FILE

1. The following information is needed from the fryer:
a. Serial number and model number located inside the door of the far-left fryer.
b. How many vats are in the fryer battery (ie. 3 vat fryer)
c. What type each vat is (FULL, SPLIT).
d. Type of fryer (GAS, ELECTRIC).
e. Store ID that matches KitchenConnect.
2. Locate the USB drive with the configuration file on it.
3. Insert the supplied USB drive into a Microsoft PC based computer (see Figure 27).
4. Open explorer and right click on the file named **fryer.conf** and open with Notepad to edit the file (see Figure 28).
5. Below are the parameters listed in this file.   Enter the parameters listed below. Some of the parameters are **case sensitive**; enter these parameters **exactly** as they are displayed. Do not add extra spaces. The settings highlighted in **<mark>BLUE</mark>/<mark>YELLOW</mark>** are **REQUIRED**.
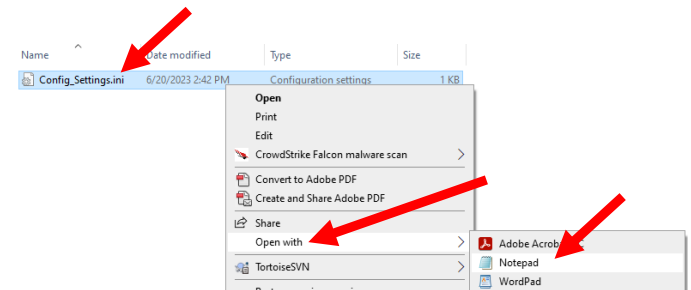
Figure 27

Figure 28

FRYER.CONF FILE PARAMETERS
<mark>DEVICE_TYPE</mark>=<mark>GAS</mark> Should match energy type of fryer. (i.e. GAS or ELECTRIC)
<mark>STOREID</mark>=FRYENG Should match the Store ID in Kitchen Connect. Maximum 10 characters. ID of the store or unit number of the store
<mark>SERIAL_NUMBER</mark>=<mark>2307xxxxxx</mark> Should match the Serial Number in Kitchen Connect. (i.e. 2307xx0001)
TCPPORTNO=20001 Do **NOT** change this.
UDPPORTNO=20002 Do **NOT** change this.
DHCP=YES Do **NOT** change this.
<mark>NUMBER_OF_UI</mark>=<mark>3</mark> Should match the number of frypots in Kitchen Connect. (i.e. 3 [Range 1-6]
UI1TYPE=<mark>FULL</mark> Vat type of vat #1 (i.e. FULL, SPLIT)
UI2TYPE=<mark>SPLIT</mark> Vat type of vat #2 (i.e. FULL, SPLIT)
UI3TYPE=<mark>FULL</mark> Vat type of vat #3 (i.e. FULL, SPLIT) Do not delete extra UI Types if not present.

UI4TYPE=FULL Vat type of vat #4 (i.e. FULL, SPLIT) Do not delete extra UI Types if not present.

UI5TYPE=FULL Vat type of vat #5 (i.e. FULL, SPLIT) Do not delete extra UI Types if not present.

UI6TYPE=FULL Vat type of vat #6 (i.e. FULL, SPLIT) Do not delete extra UI Types if not present.

PUBLISH_STATE=ENABLE Do **NOT** change this.

PRODUCT_NAME= Filter Quick 4000 Do **NOT** change this.

PRODUCT_MODEL_NUMBER=1FQG30 Type of model. Enter the model from the rating plate on the inside of the left door.

CUSTOMER_NAME=General Market Do **NOT** change this.

MANUFACTURER_NAME=Frymaster Do **NOT** change this.

SERVER_ADDRESS=192.168.43.83 Do **NOT** change this.

NETWORK_MODE=WI-FI Type of network. (i.e. CELLULAR or WI-FI) Enter network type

KEY_MGMT=wpa-psk (SSID security type - NONE/WPA-PSK/WPA2-PSK) Enter the SSID security type.

SSID=Set_SSID (SSID of the store network) Enter the SSID of the router connection.

PSK=Set_passphrase Network password (this parameter can be blank if it is open or unlocked network)

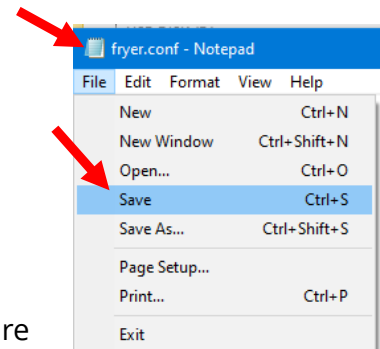6. When finished, Click on File and Save (see Figure 29). The file name **<u>MUST</u>** be **fryer.conf**.

Figure 29

STEP 2: COMPRESS THE CONFIG FILE

1. Right click on the fryer.conf file on the desktop (see Figure 30).
2. Click on Send to Compressed (zipped) Folder.
3. Name the .zip folder "fqlink_config_aws.zip (see Figure 31).
4. Place the folder in the root directory of the USB drive.
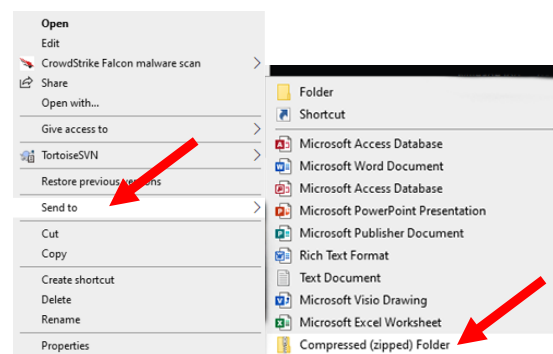

Figure 30

5. Go to Explorer (My Computer). Right click on the USB drive. Click Eject (see Figure 32).
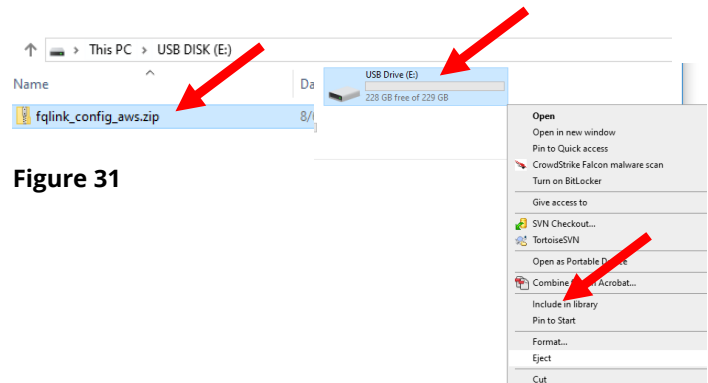6. Remove USB drive from computer.

Figure 31

Figure 32

STEP 3: LOAD THE CONFIG FILE

1. Ensure all the controllers are in the OFF state.
2. On the left screen, press 🏠 → ✖️ → 🧑‍🔧 → **3000 Or 1650** → ✔️ → **TECH MODES** ⬇️ → **SOFTWARE UPGRADE**

   SERVICE   SERVICE

3. Insert the USB drive from the previous step, with the compressed zip folder fqlink_config_aws.zip with fryer.conf file (for AWS cloud) **OR** fqlink_config_generic.zip with fryer.conf file (for generic cloud), into the USB port on the **FAR-LEFT** side of the fryer, just inside the left fryer door (see Figure 33).
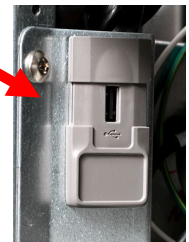
   Figure 33

4. Follow the onscreen instructions to load the settings and configuration (see Figure 33A & 33B).
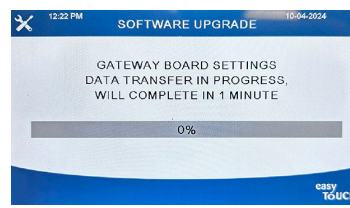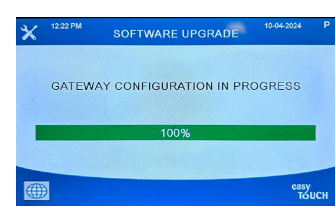
5. When the update has completed on **ALL** screens, press the **YES** button to confirm.

   Figure 33A   **Figure 33B**

6. Remove the USB flash drive and lower cover over the USB slot.
7. Power cycle the fryer by **PRESSING** and **HOLDING** the black toggle reset switch for **60 SECONDS**. The reset switch is located either under the USB port, near the USB port or under the **FAR-LEFT** control box (see Figures 34 and 35).
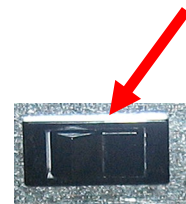
   Figure 34   **Figure 35**

STEP 5: CONFIRM THE IP ADDRESS

1. **WAIT FIVE (5) MINUTES** before proceeding to the next step.
2. Press the "**HOME**" button on the (see Figure 36).
3. Press the **?** button (see Figure 37).
4. Press the down arrow button (see Figure 38).
5. Press the software version button (see Figure 39).
6. Press the down arrow button **TWO** (2) times (see Figure 40).

Figure 36

Figure 37

Figure 38

Figure 39

7. The **GATEWAY IP ADDRESS** is shown. The **GATEWAY SOFTWARE IP ADDRESS** should have some numbers that are **NOT ALL ZEROS** (see Figure 41). **NOTE: The IP address may be different than shown below (see Figure 42).** If only zeros are shown, power cycle the entire fryer battery and wait 5-10 minutes before checking the software version and IP address again. **NOTE: An IP address should NOT start with 4 or 82**. If so, then it is not connected. If is not connected, repeat steps 1-15 of this section. If after two tries of loading the software and the version above is **NOT** displayed, go to STEP 4 (Troubleshooting) on the last page.

Figure 40

10. GATEWAY IP ADDRESS   192.168.10.122

Figure 41

8. Confirm the IO address matches with what the router displays.
9. Press the "HOME" button (see Figure 36) when finished.

SOFTWARE VERSION

	LAST OCCURANCE
9. GATEWAY SOFTWARE VERSION	V00.09.000
10. GATEWAY IP ADDRESS	192.168.10.122
11. GATEWAY LINK QUALITY	25/40
12. GATEWAY SIGNAL STRENGTH AND NOISE	-40dBm , -85dBm

Figure 42

STEP 6: CONFIRM THE UNIT APPEARS IN THE CLOUD

1. Confirm that the unit appears online in the cloud.

STEP 7: VERIFY DATA IN THE CLOUD
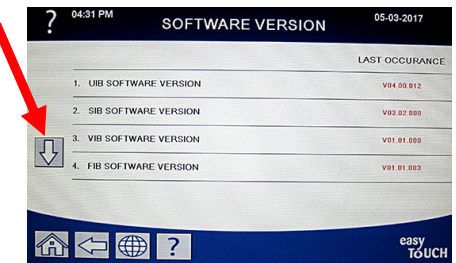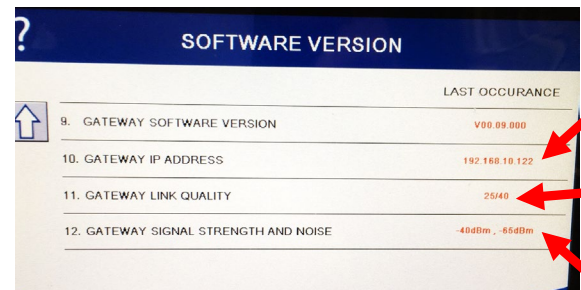
1. Perform a cook on the fryer.
2. Perform a filter on the fryer.
3. Confirm that the cloud displays the proper cooks and filters performed on the fryer.

STEP 8: TROUBLESHOOTING

1. If the software version is all zeros (0), **WAIT AN ADDITIONAL FIVE (5) MINUTES and recheck using steps 1-9 in STEP 5 (Confirm the IP address).**
2. The first number on gateway link quality (refer to Figure 42) in #11 (Gateway Link Quality) which is shown at 0/40) is the difference between received signal strength and background noise level. This number is called SNR (Signal-to-noise ratio).
   Below is breakdown of first number:
   a. 40dB = Excellent signal; always associated; lightning fast.
   b. 25dB to 40dB = Very good signal; always associated; very fast.
   c. 15dB to 25dB = Low signal; always associated; usually fast.
   d. 10dB to 15dB = Very low signal; mostly associated; mostly slow.
   e. 5dB to 10dB = No signal; not associated; no go.
3. Gateway signal strength and noise (refer to Figure 42 #12). Signal strength from -20 dbm to -65 dbm is good connection. Noise level should be below -70 dbm to -95dbm
4. If the IP address is not being displayed but the link quality and signal strength are good, then the modem or KitchenConnect has some issues and/or configuration file needs to be confirmed for accuracy and updated again.