

Item # 1301000, 1301004, 1301050, 1301053 and 1301051

Download complete Owner's and Installers Manual at www.steffes.com/SteffesConnectManual

THIS PROCEDURE MUST BE PERFORMED BY A QUALIFIED TECHNICIAN

INSTALLATION

NOTE: Verify continuous Wi-Fi connection at device location.

- 1) Remove the painted front cover and securely mount the transceiver for the application. For more information on how to mount the various transceivers, refer to the Mounting Section of the Transceiver Installation in the Owner's and Installer's Manual.
- 2) Route line voltage wiring to the transceiver and connect to the red and the black/white 16 AWG power wires coming from the circuit board (Figure 1). The transceiver can be powered with 120 VAC or 208/240 VAC.
- 3) Ground transceiver using ground screws provided.

4) Transceiver Relay Connections:

- a) If the transceiver relay(s) are being used to control other loads, one leg of the circuit going to the controlled load will be broken through the relay using the wires provided. See Figure 1.
 - b) If any transceiver relay(s) are NOT being used to control other loads, insulate ends of unused wires.
- 5) Set the DIP switches for the application. For more information on the DIP switches, refer to the label on the inside cover of the transceiver.
 - a) DIP switch #1 inverts the peak status. ON is to close for charging and OFF is to open for charging.

NOTE: DIP switch #1 must be in the OFF position for Steffes Connect applications.

- b) DIP switches #2, 3, 4, and 5 are used to set the channel the transceiver will communicate on. All Steffes heating systems in the application must be set to the same channel.
- c) DIP switches #6, 7, and 8 should all be in the OFF position.

6) Low Voltage Wiring (Figure 2):

- a) Indoor transceivers are equipped with a factory-installed indoor sensor. If installing an outdoor transceiver, an indoor sensor can be connected to IS and TC on the low voltage terminal strip. No other loads can be controlled or supplied through this cable.
- b) Outdoor transceivers are equipped with a factory-installed outdoor temperature sensor (thermistor). If installing an indoor transceiver, an outdoor sensor can be connected to OS and TC on the low voltage terminal strip. No other loads can be controlled or supplied through this cable.

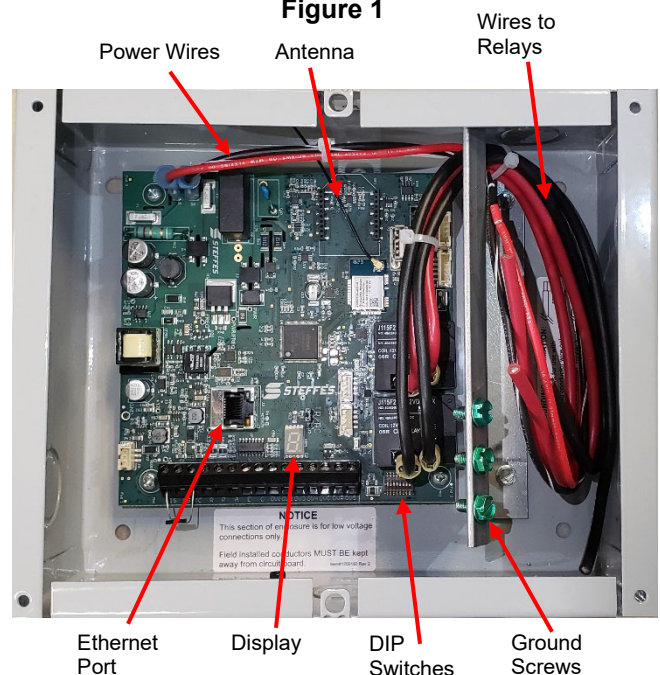


WARNING

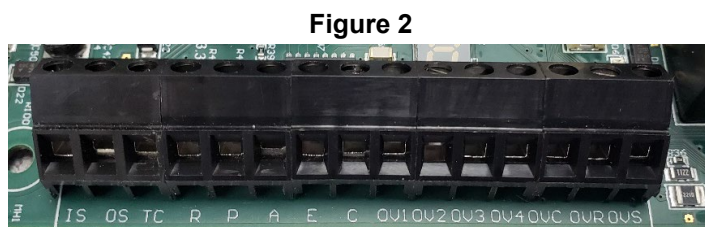
HAZARDOUS VOLTAGE: Risk of electric shock. Can cause injury or death.

- Install in accordance with applicable local, state, and national codes and regulations.
- Use only copper conductors rated for 75° C minimum.
- Route line voltage conductors and make line voltage connections only in the line voltage connection area.
- Route low-voltage conductors only into the low-voltage connection area.

Figure 1

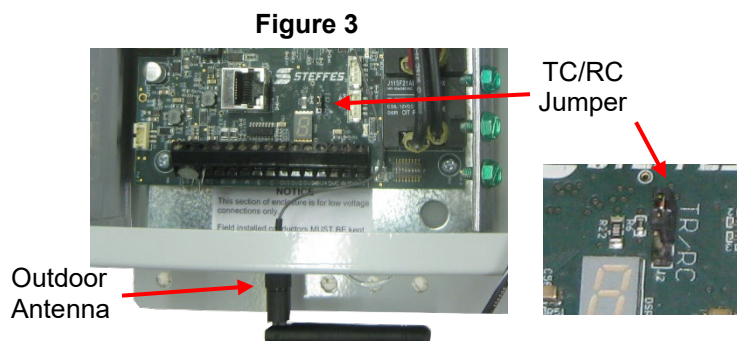


- c) In applications where the system will be controlled by the Power Company's meter device (not controlled by Steffes Connect), the metering device will be wired to the R and P positions on the low voltage terminal strip. If the transceiver is equipped with an umbilical cord (flexible conduit), connect the metering device to the blue and blue/white wires.



- 7) **PLC Transmit/Receive Select Jumper:** The transceiver can be used as a transmitter or a receiver. Position the TR/RC jumper appropriately for the application.

- a) To use as a transmitter, place the select jumper on the TR position covering the top and center pins. (Figure 3)
- b) To use as a receiver, place the select jumper to the RC position covering the bottom and center pins. (Figure 3)



STEFFES CONNECT INSTALLATIONS ONLY:

- 8) **Internet Connection:** Transceivers connect through 2.4 GHz Wi-Fi networks. If a wireless network is not available, connect an Ethernet cable from router to the Ethernet port shown in Figure 1.
- 9) **Antenna Installation:**
- a) **Indoor Transceiver:** The antenna is pre-installed. If the application requires additional Wi-Fi signal range, order the outdoor antenna kit (Order Item #1040272).
- b) **Outdoor Transceiver:** Remove the antenna from packaging. Connect the antenna to the threaded cable port at the bottom of the transceiver enclosure as shown in Figure 3.

NOTE: Antenna should be hand tightened only to ensure no damage or cross threading.

Check Out Procedure

Energize the transceiver. The 7-segment display will illuminate, and a lower case "b" should flash, indicating it is going through the boot cycle. Once the boot cycle is complete, the display will flash three "8"s followed by a sequence of letters and numbers. Complete the appropriate Check Out Procedure for the application.

NOTE: Refer to full check out procedure in the Owner's and Installers Manual.

Check Out Procedure – Transmit Mode:

1. Using the 7-segment display, verify the peak control status is correct. The letter following the three "8"s on the display will indicate P for peak, A for anticipated peak, or C for off-peak.
2. Make sure PLC signal is received by each controlled device (i.e. transceiver set to receive, Steffes heating systems, Mini Receiver).
3. Make sure all relay-controlled loads are off if in peak mode and on if in off-peak mode.
4. Make sure all connections are secure.

Check Out Procedure – Receive Mode:

1. Using the 7-segment display, verify the peak control status is correct. The letter following the three "8"s on the display will indicate P for peak, A for anticipated peak, or C for off-peak.

NOTE: It can take 2-3 minutes for PLC signal reception when using a fast channel (Channels 3 thru 11) and 7-10 minutes when using a slow channel (Channels 1, 2, 12, 13, 14, and 15).

2. Make sure all relay-controlled loads are off if in peak mode and on if in off-peak mode.
3. Make sure all connections are secure.

NOTE: If connecting to Steffes Connect refer to Connecting Transceiver to Steffes Connect via Internet procedure included with transceiver.