Steffes Transceivers

Controls for Off-Peak Energy and Power Regulation with Power Line Carrier (PLC) Communication

"Manufactured in North America"

Steffes Transceivers are controls generally used to regulate operation of heating appliances and other electric loads to take advantage of off-peak, time of day or smart metering electric rates or for demand management purposes. When the transceiver receives a signal, its internal relays will activate to regulate operation of directly connected loads while at the same time it will transmit a wireless power line carrier (PLC) signal to any device having a corresponding Steffes receiver.

Product Details

Each transceiver has a built-in PLC communication system and either 2 or 5 relays (depending on model) for control of direct connected loads. The transceiver can be used either to transmit or receive information. Operation mode is selected at the time of installation.

Transmit Mode

The transceiver can interface with any signaling device such as a utility meter having a low voltage output port, load control switch, time clock, etc. Upon receipt of a control signal, it transmits this signal through the power lines to Steffes heaters and controls using the same communication channel. At the same time, its built-in relays activate to control the load connected to them.

The transceiver can also transmit outdoor temperature information. The Steffes heaters use this information to automatically adjust the amount of heat being stored.

Receive Mode

When set to "Receive Mode", the transceiver accepts and interprets PLC information sent from either another Steffes Transceiver (set in "Transmit Mode") or previous models of Steffes PLC Transmitters. Upon receipt of a control signal, the transceiver will actuate its internal relays to regulate operation of the direct connected loads.

Power Line Carrier (PLC) Communication

The transceiver directly communicates information through the existing power lines to an unlimited number of Steffes heating systems including 1000, 2000 and 2100 series room heaters and whole house Comfort Plus furnaces as well as any Steffes mini receivers provided they are all on the same power company distribution transformer.

- 15 selectable communication channels
- Transmits or receives on-peak and anticipated peak signals, outdoor temperature and automatic room temperature set back information (external signaling device required).

Applications

Use for control of just about any electrical device such as ETS heaters, water heaters, electric baseboards, electric furnaces and ceiling and floor heat.

Specifications

- 2-pole or 5-pole configurations (30AMP DC held, board mounted relays)
- 15 selectable channels for PLC communication
- Relays can be operated independently of PLC communication when low voltage signal wiring is directly connected
- One-hour peak override option (single button or zonal control module)
- Metal enclosure with power company seal/lockout provision
- Optional factory pre-wired umbilical cord in rain tight conduit configuration
- 120V or 208V/240V, 1 phase or 3 phase configurations
- 200:1 current transformer option available for 5-pole configurations

Item #	Configuration	Enclosure	Phase	Dimensions (WxHxD)
1302090	2-Pole	Outdoor	1	8.5” x 7” x 3.7”
1302080	2-Pole	Indoor	1	8.5” x 7” x 3.5”
1302093	2-Pole	Outdoor	3	12” x 7” x 3.7”
1302082	2-Pole with Time Clock*	Indoor	1	8.5” x 7” x 3.5”
1302091	2-Pole with Umbilical Cord	Outdoor	1	8.5” x 7” x 3.7”
1302084	5-Pole	Indoor	1	10” x 18” x 4.25”
1302085	5-Pole with Current Transformer	Indoor	1	10” x 18” x 4.25”
1302094	5-Pole	Outdoor	1	11.5” X 14” x 4.3”

Indoor Enclosure: NEMA 1 Flush Mount
Outdoor Enclosure: NEMA 3 Surface Mount
*Time clock is a 7-day programmable with lithium battery backup.

Optional Accessories

Item #	Description	Mounting
1302070	1 Zone, Push Button Override	On Transceiver
1302060	3 Zone, Switch Station Override Module	On Wall

Limited Three Year Manufacturer’s Warranty

STEFFES Heating Systems
701-483-5400 ◆ E-Mail: offpeak@steffes.com ◆ Website: www.steffes.com