1. Preparation

1. Unpack your thermostat and make sure everything is in good condition:
   - **Thermostat**
   - **Floor sensor**
   - **Mounting screws**
   - **Wires**

   If any parts are missing or damaged, contact the store where you purchased this thermostat. Do not install a damaged part.

2. Gather the following tools and supplies:
   - Phillips-head screwdriver
   - Wire strippers
   - “Fish tape”, other electrical tools
   - Electrical box for floor warming system
      - a. If you are connecting to power leads from only 1 or 2 floor warming systems, you may use a 6 x 3 inch deep box.
      - b. If you are connecting to power leads from 3 floor warming systems, use a 4 x 4 x 6 inch or deeper box (not a 2-gang box) when your wall studs are 20 inches or greater from the thermostat location.

   Also include other GFCIs.

3. This is a line voltage device that could cause serious injury or damage if not properly installed. Always turn the power off before installing the thermostat lead wires into the thermostat location.

4. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

5. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

6. The display in normal operating mode will not show a “U1” indicating use in the Factory Programmed “User” Schedule. It will operate in the “User” Schedule (U1), pre-programmed as follows, and can be customized later to your needs (see section 4 "Additional Setups").

7. To use these cycles again, adjust their time and temperature.

8. If you set the “away” cycles too low, it will take much longer to raise the temperature again and may result in unsatisfying performance.

9. Note: GFCI and laminated film manufacturers recommend a maximum of 82 to 84°F (27° to 28°C). Check with manufacturer.

10. Repeat Steps 3 through 7 to adjust the remaining cycle times and setpoints temperature 

3. Quick Setup

1. Turn off the power to the floor warming system at the main circuit panel before doing any electrical work.

2. A qualified electrician should run a dedicated circuit from the main circuit panel to the thermostat location.

3. If a dedicated circuit is not possible, you may tap from another circuit in the main.

4. Before installing the thermostat, be sure to:
   - a. DO NOT install a GFCI.
   - b. Temporarily override the thermostat setpoint to make sure it is healing to the floor (see section 2).
   - c. Test the GFCI (section 5).

2. Off/On Switch

1. Your thermostat should be turned off when it is not in use. It is designed to be turned on and off only during the time and day.

2. Note: A 120VAC circuit fused at 15 amps or less is suitable for indoor use only, on insulated wiring systems. A 240VAC circuit fused at 15 amps or less may be extended up to 2400 feet.

3. Change Format Between °F/12-hour and °C/24-hour

   a. Change the display in the “User” Schedule (U1)

4. Set the Current Time and Day

   a. Press the PROGRAM button and hold for 1 second. The hour should be blinking.
   b. Press the down or up button to adjust the hour.
   c. Press the down or up button to adjust the minutes.
   d. Press the up or down button to adjust the day.
   e. Press the down or up button to adjust the time.

5. Set the Normal Operating Mode 

   a. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

   b. Connect the wire ends into the “RELOUT” terminals (3 and 4) and tighten the screws (no polarity). This wire will occur and all programming is retained.

   c. The display in the “User” Schedule (U1) will operate in the “User” Schedule (U1), pre-programmed as follows, and can be customized later to your needs (see section 4 "Additional Setups").

6. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

7. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

8. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

9. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

10. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

11. Pull the power supply wiring into this box, leaving about 6 inches of wire.

12. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

13. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

14. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

15. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

16. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

17. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

18. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

19. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

20. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

21. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

22. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

23. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

24. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

25. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

26. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

27. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

28. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.

29. Pull the 2-conductor wire, size 18- to 24-gage, through the wall from the Infloor heating system lead wires and secure the wires to the green or bare lead wire(s) of your nonmetallic box.

30. Secure the thermostat Power Module into this electrical box. This wire may be up to 100 feet (30 m) in length for a floor warming system at the main circuit panel to the thermostat location.
5. Operation
Controlling the Temperature
Your thermostat has several ways to control your floor warming system. It is factory set to the program schedule selected but this can be overridden to meet your needs.

Program Schedule
The thermostat will operate normally in the program schedule selected. When heat is called for, heating will show on the display and full power is supplied to the floor warming system. This also signals to turn on any Infloor Relays that may be connected to your thermostat.

Temporarily Overriding the Temperature
You can temporarily adjust the temperature setpoint as follows. This will hold until the next scheduled program time:
1. Press the down or up button to adjust for 1 second to adjust the setpoint temperature.
2. Wait 5 seconds and the thermostat will return to the normal operating mode.
3. To cancel this temporarily override and return to the normal schedule temperature, press the HOLD/RETURN button briefly.

Hold a Selected Temperature
You can hold the current setpoint temperature indefinitely, especially useful when you are away.

1. Press the HOLD/RETURN button and hold for 1 second. HOLD will show on the display and the temperature setpoint shown will be maintained until you cancel it.
2. To cancel this hold, press the HOLD/RETURN button and hold for 1 second. HOLD will disappear from the display.
3. Press the down or up button briefly and the thermostat will return to the normal schedule temperature.
4. You can use the Setback button to override the current setpoint temperature. This is especially useful if you have an alternate floor warming system.

Setback
The thermostat stores in memory the number of hours it is heating. This information may be useful in calculating the energy used by your floor warming system.

1. Press the OPTIONS button and hold for 1 second. HOLD will show on the display.
2. Press the options button again until USAGE 1 and 1.0 shows on the display.
3. The time shown on the display is the number of hours it was heated or turned on.
4. Press the down or up button to toggle between the previous 1-day, 7-day, and 30-day usages.
5. Press the HOLD/RETURN button or wait 15 seconds and the thermostat will return to the normal operating mode.

Lockout Feature
Your thermostat has the ability to lock out adjustment by other users. This may be useful in public locations. Only the on/off switch and the GFCI test button will remain operable.

1. Press the down and up button at the same time and hold for 1 second. LOCK will show on the display.
2. To cancel this lockout, the down and up button must be pressed and held for 1 second. The thermostat will return to the normal operating mode.
3. Test the GFCI

There is a GFCI (Ground Fault Circuit Interrupter) inside the thermostat. It is designed to help protect people from possible electrical shock if the floor warming system has been damaged.

To make sure the GFCI is operating, test it after it is installed and once each month:
1. Make sure the thermostat is heating.
2. Press the GFCI Test button on the side of the thermostat. GFCI TEST should show on the display and a red light will show next to the GFCI Test button. You should also hear a click, indicating power has been removed from the floor warming system. If any of these indicators fail, turn off the thermostat and replace it.
3. To test the Over/Off switch, turn the thermostat off and go to section 6 "Troubleshooting" for help.

6. Troubleshooting

Problem
Thermostat works, but not from the floor system.

Solution
1. Check wiring connections.
2. Check thermostat setpoint with on/off switch.
3. Check on/off switch on thermostat.

Problem
Thermostat is in program schedule selected.

Solution
1. Check wiring connections.
2. Check thermostat setpoint with on/off switch.
3. Check on/off switch on thermostat.
4. Check that the current time and schedule times are correct.🌡
5. Check if any Infloor Relays are marked as "limited" or "prohibit use".

7. Specifications
Power Supply
120/240 VAC, 50/60 Hz
Maximum Load
15 amps, resistive
1800 watts at 120 VAC
3600 watts at 240 VAC
GFCI
Class A (5 milliamp trip)
Display Range
32 °F to 140 °F (-0 °C to 60 °C)
Setting Range
40 °F to 99 °F (-4 °C to 37 °C)
Accuracy
± 0.5 °F (± 0.5 °C)
Storage Temp
0 °F to 120 °F (-18 °C to 49 °C)
Sensor
Thermistor, 120 NTC, double-insulated
Memory
Display Range
32 °F to 140 °F (-0 °C to 60 °C)
Setting Range
40 °F to 99 °F (-4 °C to 37 °C)
Accuracy
± 0.5 °F (± 0.5 °C)
Storage Temp
0 °F to 120 °F (-18 °C to 49 °C)
Sensor
Thermistor, 120 NTC, double-insulated
Display Range
32 °F to 140 °F (-0 °C to 60 °C)
Setting Range
40 °F to 99 °F (-4 °C to 37 °C)
Accuracy
± 0.5 °F (± 0.5 °C)
Storage Temp
0 °F to 120 °F (-18 °C to 49 °C)
Sensor
Thermistor, 120 NTC, double-insulated
Display Range
32 °F to 140 °F (-0 °C to 60 °C)
Setting Range
40 °F to 99 °F (-4 °C to 37 °C)
Accuracy
± 0.5 °F (± 0.5 °C)
Storage Temp
0 °F to 120 °F (-18 °C to 49 °C)
Sensor
Thermistor, 120 NTC, double-insulated

Limited Warranty
Infloor Sales & Service SW warrants this thermostat to be free from defects in material and workmanship for a period of two years from the date of original purchase from authorized dealers. During this warranty period, Infloor Sales & Service SW will replace the product or refund the original cost of the product at Infloor Sales & Service SW’s option, without charge, if the product is proven to be defective in material and workmanship. Please return the thermostat to your distributor to begin the warranty process.

This limited warranty extends only to the original consumer and cannot be transferred. Do not return defective or damaged products. This warranty does not cover labor charges or service calls for the installation, diagnosis, or any modification of the product. This limited warranty is in lieu of all other warranties, obligations, or liabilities excepted or implied by the company. In no event shall Infloor Sales & Service SW be liable for any incidental, special, or consequential damages resulting from the installation, use, or alleged defect in the product. Some states or provinces do not allow limitations on how long an implied warranty lasts, or the exclusions or limitations may not apply to you.

Infloor Sales & Service SW
503 Gregg Drive
Buena Vista, CO 81211
(800) 608-0562
www.infloor.com