



manual operation & care

P-2112 & P-2122





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Environmental Conditions

Transport and storage environmental conditions (not to exceed 15 days)

Ambient temperature range of -40°C to +70°C (-40°F to +159°F) Relative humidity range of 10% to 95%, non-condensing Atmospheric pressure range of 50KPa to 106KPa

Operational environmental conditions

The appliance must acclimate to room temperature in the environment it will be placed—24 hours is recommended. The recommended environmental temperature range is 15°C to 32°C (60°F to 90°F). The recommended relative humidity is above 20%, non-condensing.

Receipt of Appliance

The appliance has been thoroughly tested and inspected to insure only the highest quality appliance is provided. Upon receipt, inspect for any possible shipping damage and report it at once to the delivering carrier. See **Transportation Damage and Claims** section.

This appliance, complete with unattached items and accessories, may be delivered in one or more packages. Confirm that all standard items and options have been received with each appliance as ordered. Save all the information packed with the appliance.



Indicates that the package contents should not be used if the package has been damaged or opened.

The serial number is required for all inquiries. Always include both model and serial number(s) in any correspondence regarding the appliance.

Model:

Serial number: _____

Purchased from:

Date installed: _____ Voltage: ___



All Pedigo Products, Inc. appliances are sold Free on Board (F.O.B.) shipping point, and when accepted by the carrier, such shipments become the property of the consignee.

Should damage occur in shipment, do not put the appliance into service until the damage has been inspected by an authorized service provider.

Should damage occur in shipment, it is a matter between the carrier and the consignee. In such cases, the carrier is assumed to be responsible for the safe delivery of the merchandise, unless negligence can be established on the part of the shipper.

- 1. Conduct an immediate inspection while the appliance is still in the truck or immediately after it is moved to the receiving area. Do not wait until after the appliance is moved to a storage area.
- 2. Do not sign a delivery receipt or a freight bill until a proper count has been made and inspection of all appliances are received.
- 3. Note all damage to packages directly on the carrier's delivery receipt.

Transportation Damage and Claims

- 4. Have the driver sign the delivery receipt. If the driver refuses to sign, make a notation of this refusal on the receipt.
- 5. If the driver refuses to allow inspection, write the following on the delivery receipt: **Driver refuses to allow inspection of containers for visible damage.**
- 6. Contact the carrier's office immediately upon finding damage, and request an inspection. Mail a written confirmation to the carrier's office with the time, date, and the person called.
- 7. Save any packages and packing material for further inspection by the carrier.
- 8. Promptly file a written claim with the carrier and attach copies of all supporting paperwork.

Pedigo will continue our policy of assisting our customers in collecting claims which have been properly filed and actively pursued. Pedigo cannot, however, file any damage claims, assume the responsibility of any claims, or accept deductions in payment for such claims.

Unpacking



- 1. Remove the warmer from the carton or crate.
 - **NOTE:** Do not discard the carton and other packaging material until the warmer has been inspected for hidden damage and tested for proper operation.

Do not discard this manual. This manual is considered to be part of the warmer and is to be provided to the owner or manager of the business or to the person responsible for training operators. Additional manuals are available from the service department.

- 2. Read all instructions in this manual carefully before initiating the installation of this warmer, using the warmer or performing routine maintenance. Following procedures other than those indicated in this manual to use and clean the warmer is considered inappropriate and may cause damage, injury or fatal accidents, in addition to invalidating the warranty and relieving the manufacturer of all liability.
- 3. Before connecting warmer to electrical power
 - a) Remove all protective plastic film and packaging material from the outside of the warmer
 - b) Remove all packaging material from the inside of the warmer.
 - c) Remove packaging material from accessories and store accessories in a convenient place for future use.
- 4. Slowly roll the warmer across high thresholds.





Knowledge of proper procedures is essential to the safe operation of electrically energized appliances. The following hazard signal words and symbols may be used throughout this manual.

DANGER

Used to indicate the presence of a hazard that will cause severe personal injury, death, or substantial property damage if the warning included with this symbol is ignored.

WARNING

Used to indicate the presence of a hazard that CAN cause personal injury, possible death, or major property damage if the warning included with this symbol is ignored.

CAUTION

Used to indicate the presence of a hazard that can or will cause minor or moderate personal injury or property damage if the warning included with this symbol is ignored.



Used to indicate that referral to operating instructions is a mandatory action. If not followed, the operator or patient could suffer personal injury.



Used to indicate that referral to operating instructions is recommended to understand operation of the appliance.

NOTICE: Used to notify personnel of installation, operation, or maintenance information that is important but not hazard related.

NOTICE: A temporary odor may be noticeable upon initial start-up of the warmer. Contact manufacturer if the odor persists after a day or more of continuous use.



NOTICE: For appliances delivered for use in any location regulated by the following directive (2012/19/EU -WEEE):

Do not dispose of electrical or electronic appliances with other municipal waste.

- Fluid warmers are **only** intended for warming medical solutions for irrigation and injection prior to use. Refer to the labeling of the manufacturer of the products to be warmed regarding the recommended temperature and the duration of warming. No other use for this appliance is authorized or recommended.
- If the equipment is used in a manner not specified by the manufacturer, the protection provided by the equipment may be impaired.
- Appliance must be accessible. Do not place the appliance in a location where it is difficult to unplug.
- This warmer is intended for use in commercial establishments where all operators are familiar with the purpose, limitations, and associated hazards of this appliance. The warmer can be used wherever there is appropriate space and electrical source including patient support areas, ER, ICU, PACU, surgical suites, patient rooms, and nursing stations. **Do not** use the warmer in the presence of flammable anesthetic mixtures (with air, oxygen, or nitrous oxide).
- Operating instructions and warnings must be read and understood by all operators and users.
- Any troubleshooting guides, component views, and parts lists included in this manual are for general reference only and are intended for use by qualified and trained technicians.
- This manual should be considered a permanent part of this appliance. This manual and all supplied instructions, diagrams, schematics, parts lists, notices, and labels must remain with the appliance if the item is sold or moved to another location.



Appliance and accessories may be heavy. To prevent serious injury, **always** use a sufficient number of trained and experienced workers when moving or leveling appliance and handling accessories.



The door may swing during transport. Only transport the appliance when the door is closed and secure.



DANGER

To prevent serious personal injury, death, or property damage:

Do not use this warmer in the presence of flammable anesthetic mixtures (with air or with oxygen or nitrous oxide).

Not category AP or APG equipment

WARNING



To prevent serious injury, death, or property damage:

All electrical connections must be made by a qualified and trained service technician in accordance with applicable electrical codes.



This appliance must be adequately grounded in accordance with local electrical codes or, in the absence of local codes, with the current edition of the National Electrical Code ANSI/NFPA No. 70. In Canada, all electrical connections are to be made in accordance with CSA C22.1, Canadian Electrical Code Part 1 or local codes.



CE-approved appliances include an equipotential-bonding terminal marked with the symbol shown on the left. Provisions for earthing are to be made in accordance with IEC:2010 60335-1 section 27 or local codes.



To prevent serious personal injury, death, or property damage:

Do not steam clean, hose down or flood the interior or exterior with water or liquid solution of any kind. Do not use water jet to clean. Failure to observe this precaution will void the warranty.



Power source must match voltage identified on appliance rating tag. The rating tag provides essential technical information required for any appliance installation, maintenance or repairs. Do not remove, damage or modify the rating tag.

Power Requirements

P-2112

120 V.A.C. - 60 Hz, 1 ph 0.6 kW, 5.0 Amps Safety Class I Equipment No Applied Parts Mode of Operation: Continuous





P-2122

120 V.A.C. – 60 Hz, 1 ph 0.8 kW, 6.7 Amps Safety Class I Equipment No Applied Parts Mode of Operation: Continuous





*Other international plugs are available, contact the manufacturer for more information.

Wire diagram is located under top lid of appliance.

Grounding reliability can only be achieved when appliance is connected to an equivalent receptacle marked "Hospital Grade."

Ground Symbol

Medical Equipment classified by Underwriters Laboratories with Respect to Electrical Shock, Protective Earth Fire and Mechanical Hazards only, in Accordance with UL 61010-1 and CAN/CSA C22.2 No. 61010-1.



MM-1077 (MN-39639) • Rev 0 • 03/18 • P-2112, P-2122 Pedigo Fluid Warmer



Guidance and Manufacturer's Declaration



The warmer requires special precautions regarding EMC (Electromagnetic Compatibility) and needs to be installed and put into service according to the EMC information provided in the accompanying documents.

Portable and mobile RF communications equipment can affect medical electrical equipment.

A risk of increased emissions or decreased immunity

Electromagnetic Emissions

may result if the power cord attached is altered or a manufacturer supplied power cable is not used.

The warmer should not be used adjacent to or stacked with other equipment.

Observe to verify normal operation if it is necessary to use adjacent to or stacked with other equipment.

The essential performance of the warmer is to not exceed an internal temperature of 180° F / 82° C (+10%) for blanket warmers or 150° F / 66° C (+10%) for fluid warmers.

The warmers are intended for use in the electromagnetic environment specified below. The customer or the end user of this warmer should assure that it is used in such an environment.

Emissions test	Compliance	Electromagnetic environment - guidance
RF emissions; CISPR 11	Group 1	The warmer uses RF energy only for internal function. Therefore, its RF emissions are very low and are not likely to cause any interference in nearby electronic equipment.
RF emissions; CISPR 11	Class B	The warmer is suitable for use in all establishments, including domestic establishments and those directly connected to the pub
Harmonic emissions; IEC 61000-3-2	Class A	low-voltage power supply network that supplies buildings used for domestic purposes.
Voltage fluctuations/Flicker emissions; IEC 61000-3-3	Complies	

Electromagnetic Immunity

The warmer is intended for use in the electromagnetic environment specified below. The customer or the end user of this warmer should assure that it is used in such an environment.

Immunity test	IEC 60601 test level	Compliance level	Electromagnetic environment - guidance
Electromagnetic discharge (ESD) IEC 61000-4-2	±6 kV contact ±8 kV air	±6 kV contact ±8 kV air	Floors should be wood, concrete or ceramic tile. If floors are covered with synthetic material, the relative humidity should be at least 30%.
Electrical fast transient/burst IEC 61000-4-4	±2 kV for power supply lines; ±1 kV for input/output lines	+2 kV for power supply lines	Main power quality should be that of a typical commercial or hospital environment. The warmer does not have any input/output lines.
Surge IEC 61000-4-5	±1 kV differential mode; ±2 kV common mode	±1 kV differential mode; ±2 kV common mode	Mains power quality should be that of a typical commercial or hospital environment.
Voltage dips, short interruptions and voltage variations on power supply input lines IEC 61000-4-11	<5 % UT (>95 % dip in UT) for 0.5 cycle 40 % UT (60 % dip in UT) for 5 cycles 70 % UT (30 % dip in UT) for 25 cycles <5 % UT (>95 % dip in UT) for 5 sec	<5 % UT (>95 % dip in UT) for 0.5 cycle 40 % UT (60 % dip in UT) for 5 cycles 70 % UT (30 % dip in UT) for 25 cycles <5 % UT (>95 % dip in UT) for 5 sec	Mains power quality should be that of a typical commercial or hospital environment. If the user of the warmer requires continued operation during power mains interruptions, it is recommended that the warmer be powered from an uninterrupted power supply or a battery.
Power frequency (50/60 Hz) magnetic field IEC 61000-4-8	3 A/m	3 A/m	Power frequency magnetic fields should be at levels characteristic of a typical location in a typical commercial or hospital environment.

NOTE: UT is the a.c. mains voltage prior to application of the test level.

Electrical Information



Electromagnetic Emissions

The warmer is i this warmer sho	ntended for use in the ould assure that it is us	electromagnetic en ed in such an enviro	vironment specified below. The customer or the end user of onment.
Immunity test	IEC 60601 test level	Compliance level	Electromagnetic environment - guidance
Conducted RF IEC 61000-4-6 Radiated RF IEC 61000-4-3	3 V/m 150 kHz to 80 MHz 3 V/m 80 MHz to 2.5 GHz	3 V/m 3 V/m	Portable and mobile RF communications equipment should be used no closer to any part of the warmer, including cables, than the recommended separation distance calculated from the equation applicable to the frequency of the transmitter. Recommended separation distance $d = [3.5/3] \sqrt{P}$ $d = [3.5/3] \sqrt{P}$ 80 MHz to 800 MHz $d = [7/3] \sqrt{P}$ 800 MHz to 2.5 GHz where P is the maximum output power rating of the transmitter in watts (W) according to the transmitter manufacturer and d is the recommended separation distance
			in meters (m).
			Field strengths from fixed RF transmitters, as determined by an electromagnetic site survey, ^{<i>a</i>} should be less than the compliance level in each frequency range. ^{<i>b</i>}
			Interference may occur in the vicinity of equipment marked with the following symbol:
NOTE: 1. At 80 M Electromo	Hz and 800 MHz, the high agnetic propagation is af	ter frequency range ap fected by absorption o	pplies. 2. These guidelines may not apply in all situations. and reflection from structures, objects and people.
a. Field strengths f and FM radio br fixed RF transmi	rom fixed transmitters, such oadcast and TV broadcast ca itters, an electromagnetic sit	as base stations for radio nnot be predicted theore e survey should be consi	o (cellular/cordless) telephones and land mobile radios, amateur radio, AM tically with accuracy. To assess the electromagnetic environment due to dered. If the measured field strength in the location in which the warmer is

fixed RF transmitters, an electromagnetic site survey should be considered. If the measured field strength in the location in which the warmer is used exceeds the applicable RF compliance level above, the warmer should be observed to verify normal operation. If abnormal performance is observed, additional measures may be necessary, such as reorienting or relocating the warmer.

b. Over the frequency range 150 kHz to 80 MHz, field strengths should be less than [VI] V/m.

Electromagnetic Immunity Recommended Separation Distance Between Portable And Mobile RF Communications Equipment And This Warmer

The warmer is intended for use in an electromagnetic environment in which radiated RF disturbances are controlled. The customer or the user of the warmer can help prevent electromagnetic interference by maintaining a minimum distance between portable and mobile RF communications equipment (transmitters) and the warmer as recommended below, according to the maximum output power of the communications equipment.

	Separation distance according to frequency of transmitter			
Rated maximum output		m		
power of transmitter	150 kHz to 80 MHz	80 MHz to 800 MHz	800 MHz to 2.5 GHz	
W	$d = \left[\frac{3.5}{3}\right]\sqrt{P}$	$d = \left[\frac{3.5}{3}\right]\sqrt{P}$	$d = \left\lfloor \frac{7}{3} \right\rfloor \sqrt{P}$	
0.01	0.117	0.117	0.233	
0.1	0.369	0.369	0.738	
1	1.167	1.167	2.333	
10	3.689	3.689	7.379	
100	11.667	11.667	23.333	

For transmitters rated at a maximum output power not listed above, the recommended separation distance d in meters (m) can be estimated using the equation applicable to the frequency of the transmitter, where P is the maximum output rating of the transmitter in watts (W) according to the transmitter manufacturer.

NOTE: 1. At 80 MHz and 800 MHz, the separation distance for the higher frequency range applies. 2. These guidelines may not apply in all situations. Electromagnetic propagation is affected by absorption and reflection from structures, objects and people.

Using the Fluid Controller



How to Set the Temperature Scale

- While the fluid controller is in the off mode, press and hold the temperature recall button ① for four (4) seconds.
- 2. Press the up arrow button (5) or the down arrow button (8) to change to Fahrenheit (°F) or Celsius (°C).

How to Start the Fluid warming Cabinet

- 1. Connect the fluid warming cabinet to an appropriate hospital grade receptacle specified on the electrical information page.
- 2. Locate the circuit breaker on the back of the fluid warming cabinet.
- 3. Push the circuit breaker to the ON (I) position.
- Press the ON/OFF button 6. The previous heating mode status indicator 3 or 10 illuminates and temperature set-point is displayed 2.

How to Select the Heating Mode

- 1. Cool the fluid compartment prior to switching from a high temperature to a lower temperature to prevent an unwanted over-temp alarm.
- 2. Press the ON/OFF button ⁶.
- 3. Press the irrigation fluid button ④ or the injection fluid button ⑤. The status indicator ③ or ⑩ illuminates and the previous temperature set-point is displayed ②.

A fan located inside the chamber mixes the air to prevent temperature stratification and to ensure an accurate chamber temperature for each mode.

- Within +0/-1.12°C (+0/-2°F) for set points of 37°C to 40°C (98°F to 104°F).
- Within +0/-1.67°C (+0/-3°F) for set points of 43°C to 66°C (110°F to 150°F)

An alarm will sound if temperatures exceed $6^{\circ}C$ ($10^{\circ}F$) over the set-point temperature, and an overtemp indicator will blink indicating an over-temperature condition.

How to Set the Operational Sound Volume

- 1. While the fluid controller is on, press the temperature recall button (1) and the down arrow button (8) simultaneously. The current sound volume setting is displayed (2).
- Press the up arrow button (5) or the down arrow button
 (8) to change the volume. Volume settings range from 0 (mute) to 12 (loud).

NOTE: The alarm volume is set at the maximum (12) and cannot be disabled.

How to Display the Compartment Temperature

1. Press the temperature recall button ①.

The temperature at the compartment sensor is displayed (2) for five (5) seconds. Then the fluid chamber temperature set-point displays.

How to Adjust the Interior Lighting

- 1. Press the interior light button (7).
- 2. Press the interior light button (7) again to change the blue interior LED light to high, low, or off.

How to Clear an Over-Temperature Alarm

When the controller senses a temperature of 5° over the temperature set-point the over-temperature indicator (1) will flash and an alarm will sound.

- 1. Press the ON/OFF button .
- 2. Allow the warmer to cool to the temperature set-point to prevent an unwanted over-temp alarm.
- 3. Make sure the product inside the warmer is at the correct temperature before using.
- **NOTE:** If the alarm continues or reoccurs, the warmer needs to be serviced.



Using the Fluid Controller (continued)



How to Lock the Controller

The controller can be locked to prevent changes being made to the temperature set-point or the mode selection.

Press the ON/OFF button ⁽⁶⁾ and the up arrow button
 ⁽⁵⁾ simultaneously. The lock icon ⁽¹²⁾ illuminates.

How to Unlock the Controller

1. Press the ON/OFF button ⁽⁶⁾ and the down arrow button ⁽⁸⁾ simultaneously. The controller unlocks and the lock icon ⁽¹²⁾ goes off.

How to Mute the Alarm

When the controller senses an alarm condition (see troubleshooting guide), the controller sounds an alarm and the alarm icon (11) flashes.

- 1. Press the ON/OFF button ⁽⁶⁾ to acknowledge and mute the alarm.
 - **NOTE:** If the alarm continues or reoccurs, the warmer needs to be serviced.

Power Fail Detection

The controller stores all settings and resumes operation using these settings in the event of a power failure. When the power is restored, the controller sounds an alarm once. The LED screen (2) flashes.

- 1. Press the ON/OFF button 6. The LED screen 2 stops flashing.
 - **NOTE:** The controller displays the length of time of the power outage in hours and minutes (hh:mm) for five (5) seconds. Then the controller displays the set operating temperature.
- 2. Make sure the product inside the warmer is at the correct temperature before using.



Operating the Fluid Chamber

Verify the fluid temperature prior to using the fluid. Refer to fluid manufacturer's labeling for recommended warming procedures.

Injection fluid manufacturer suggests not to warm injection fluids above 40°C (104°F). If fluids are warmed above the suggested temperature, the fluids should be discarded.

The warm-up stabilization time will vary depending on the warmer load. Exercise judgement to determine inventory rotation protocols and warm-up time for the fluids used

This warmer is not approved for warming blood or blood products.

If the fluid warmer controller has failed, or if error messages are displayed, it is recommended that the fluid inventory be discarded. Refer to the troubleshooting guide for error descriptions and action required.



- 1. Connect the fluid warming cabinet to an appropriate hospital grade receptacle specified on the electrical information page.
- 2. Locate the circuit breaker on the back of the fluid warming cabinet.



- 3. Push the circuit breaker to the ON (I) position.
- 4. Press the ON/OFF button (6). The previous mode of operation indicator (3) or (10) illuminates and the temperature set-point is displayed (2).
- 5. Press the irrigation button ④ or the injection button
 ⑨ to select the desired mode of operation.
- 6. Press the up arrow button (5) or down arrow button (8) to adjust the temperature set-point (2).

NOTE: Cool the chamber prior to changing from a higher temperature setting to a lower temperature setting to prevent an unwanted alarm.

- 7. Load the fluid chamber with appropriate fluid containers.
- 8. Make sure the warmer door is securely closed after initial loading and following each fluid removal.

Important

Do not load the fluid warming cabinet beyond the recommended maximum capacity:

P-2112	P-2122
16 (1) liter bags, 8 bags	16 (1) liter bags, 8 bags per
— on unit bottom	— shelf
— basket (if equipped)	— basket (if equipped) or
12 (1) liter fluid bottles on	24 (1) liter bags, 12 bottles per
— on unit bottom	— shelf
— basket (if equipped)	— basket (if equipped) or

Overloading the fluid warming cabinet may cause lower or uneven temperatures of product and damage to basket and basket rail supports. Baskets that are overloaded may slip off the rail supports and damage the equipment, as well as causing possible injury.



To prevent serious personal injury, death, or property damage:

Do not steam clean, hose down or flood the interior or exterior with water or liquid solution of any kind. **Do not** use water jet to clean. Failure to observe this precaution will void the warranty.

(IPX-0 - Listed as Ordinary)

Fire hazard.



Do not use flammable cleaning agents on the appliance.



NOTICE: To protect surfaces, **never** use abrasive cleaning compounds, chloride based cleaners, or cleaners containing quaternary salts. Never use hydrochloric acid (muriatic acid) on stainless steel. Never use wire brushes, metal scouring pads or scrapers. Failure to observe this precaution will void the warranty.

Protecting Stainless Steel

It is important to guard against corrosion in the care of stainless steel surfaces. Harsh, corrosive, or inappropriate chemicals can completely destroy the protective surface layer of stainless steel, epoxy or plastic. Abrasive pads, steel wool, or metal implements abrade surfaces causing damage to this protective coating and eventually result in areas of corrosion. Water can contain high to moderate concentrations of chloride, causing oxidation and pitting that results in rust and corrosion. In addition, acidic spills that remain on metal surfaces are contributing factors in corroded surfaces.

Proper cleaning agents, materials, and methods are vital to maintaining the appearance and life of this warmer. Spilled items should be removed and the area wiped as soon as possible but at the very least, a minimum of once per day. Always wipe standing water as quickly as possible.



To prevent serious injury, death, or property damage, **always** disconnect the appliance from the power source before cleaning or servicing.

NOTICE: Always follow appropriate state or local health (hygiene) regulations regarding all applicable cleaning and sanitation requirements.

Cleaning Agents

Always use the proper cleaning agent at the manufacturer's recommended strength. Contact a local cleaning supplier for product recommendations.

Cleaning Materials

Cleaning can usually be accomplished with the proper cleaning agent and a soft, clean cloth. When more aggressive methods are needed, use a non-abrasive scouring pad on difficult areas and make certain to scrub with the visible grain of the surface metal to avoid surface scratches.

How to Clean the Warmer

- 1. Disconnect the warmer from the power source.
- 2. Remove and wash any detachable items such as the support assembly with hot, soapy water. Dry with a clean, lint-free cloth.
- 3. Clean the interior and exterior of the warmer with a mild soap and water solution. Apply the solution with a clean, damp cloth. Do not use commercial or household cleaners that contain ammonia.

NOTE: Make sure to wipe the control panel, door vents, door handle or door button, and door gaskets.

- 4. Remove all detergent residue from the interior and exterior of the warmer with a clean, damp cloth.
- 5. Dry the interior and exterior of the warmer with a clean, lint-free cloth. Leave the door open until the interior is completely dry.
- 6. Sanitize the interior of the warmer with a sanitizing solution. This solution must be approved for use on stainless steel surfaces.
- 7. Clean the warmer glass with glass cleaner or distilled vinegar.
- 8. Replace the support assembly.



Preventative Maintenance Checklist

Daily Checklist:

- □ Is the operation and care manual available?
- □ Has everyone been trained in the operation and safety instructions of this appliance?
- □ Do not overload the appliance.
- □ Make sure the air vents in the airflow insert panels located inside the fluid chamber are not obstructed.

Weekly Checklist:

- □ Inspect the condition of the plug and cord and replace if damaged.
- **Q** Remove the inserts and wash separately, set aside to dry before placing back into the appliance.
- □ Vacuum dust from the interior.
- $\hfill\square$ Vacuum the dust from the outer vents at the back of the appliance.
- □ Vacuum the dust from the fan vents at the back of the appliance.
- □ Clean the interior.
- □ Make sure the controller LEDs illuminate.*
- □ Make sure the interior LED illuminates (if applicable).*
- □ Make sure the fluid insert assemblies are installed.
- □ Inspect the fluid insert assembly for damage or missing pieces*. Make sure the baskets move smoothly and freely.

Monthly Checklist:

- □ Inspect the door gasket for tears, wear, and fit. Make sure that the seal is tight to the body. Replace the gasket if the integrity is compromised.*
- □ Inspect the air temperature sensor mounted in the interior of chamber. Ensure that the sensor guard is in place and fully secured to the warmer.
- □ Inspect the casters or feet for damage. Ensure that the components are secure and tightly threaded.
- □ Inspect the controller panel overlay for any tears or excessive wear on the graphic. Confirm that the controller works properly when the buttons are pushed.*

Six-month Checklist:

□ Verify that the chamber air temperature and the set-point temperature are comparable to the actual temperature displayed. Use a quality thermocouple placed 1" (25mm) from the sensor inside the chamber. Do not allow the thermocouple to touch any surface. Monitor the temperature for one hour in an empty interior.

Note: Fluid chamber temperature may fluctuate from the set-point. The set-point will be within +0/-1.10°C (+0/-2°F) for injection fluids and within +0/-1.67°C (+0/-3°F) for irrigation fluids.

*Contact service for immediate repair.

Dimension Drawings



P-2112 with standard feet (shown with optional baskets)

Dimensions (HxWxD)	
With feet (standard):	22" x 18.5" x 23.5" (559mm x 470mm x 597mm)
With plate and casters (optional):	26.25" x 18.5" x 23.5" (667mm x 470mm x 597mm)
With bumper and casters (optional):	26.25" x 21.25" x 23.75" (667mm x 540mm x 603mm)
Capacity	2.5 ft ³
Weight** (est.)	Net: 67 lbs (30 kg) Ship: 116 lbs (53 kg)

**Domestic ground shipping information. Contact factory for export weight and dimensions.

Clearance requirements:

3" (76mm) from rear 1" (25mm) from top and sides 3/4" (19mm) from bottom









P-2112 with optional bumper and casters (shown with optional baskets)



P-2122 with standard feet (shown with optional baskets)

Dimensions (H x W x D)

Weight** (est.)	Net: 91 lbs (41 kg) Ship: 144 lbs (65 kg)		
Capacity	3.5 ft ³		
With bumper and casters (optional):	32.25" x 21.5" x 25.25" (819mm x 546mm x 641mm)		
With plate and casters (optional):	32.25" x 18.5" x 23.5" (819mm x 470mm x 597mm)		
With feet (standard):	28" x 18.5" x 23.5" (711mm x 470mm x 597mm)		

**Domestic ground shipping information. Contact factory for export weight and dimensions.

Clearance requirements:

3" (76mm) from rear 1" (25mm) from top and sides 3/4" (19mm) from bottom









P-2122 with optional bumper and casters (shown with optional baskets)







This section is provided for the assistance of qualified and trained service technicians only and is not intended for use by untrained or unauthorized service personnel. Failure to observe this precaution may void the warranty.

If the warmer is not operating properly, do the following before calling an authorized service agent:

- Verify that the power to the warmer is on.
- Ensure that the female end of plug is securely seated in the warmer and that the male end of the plug is in an appropriate, functioning outlet.
- If a temperature calibration adjustment is required, call service for proper instructions.

Notice: Do not attempt to repair or service the warmer beyond this point. Contact the manufacturer for the nearest authorized service agent. Repairs made by any other service agent without prior authorization by the manufacturer will void the warranty.

Troubleshooting Guide

Code	Description	Action Required
Display flashes set point	A new set point has been selected that is below current cavity temperature.	• Turn off the warmer, open the door and allow it to cool down. Restart the warmer once it has sufficiently cooled.
door	The door has been open for more than 3 minutes.	Close the door.Verify that the door switch is operating. Replace the door switch if necessary.
E-10	The compartment air sensor is shorted.	• Detach the sensor from the terminal block. Measure the resistance of the sensor with an ohmmeter. Test the sensor at 32°F (0°C) using a container of ice water. The ohm reading should be 100. If the ohm reading is +/- 10, replace the sensor.
		• Inspect wires for integrity. Ensure proper and secure connections are made at the controller and the terminal block.
		• If the error continues call service.
E-11	The compartment air sensor is open.	• Detach the sensor from the terminal block. Measure the resistance of the sensor with an ohmmeter. Test the sensor at 32°F (0°C) using a container of ice water. The ohm reading should be 100. If the ohm reading is +/- 10, replace the sensor.
		• Inspect wires for integrity. Ensure proper and secure connections are made at the controller and the terminal block.
		If the error continues call service.
E-30	Under Temperature	This error occurs when the compartment temperature is lower than the set temperature for 90 minutes or longer.
		• Ensure that the door is closed.
		• If the compartment is overloaded, redistribute the inventory. Do not exceed the height of the insert.

The serial number is required for all inquiries.



Troubleshooting Guide

Code	Description	Action Required
E-31	Cavity temperature above high tolerance limit.	• If the compartment is overloaded, redistribute the inventory. Do not exceed the height of the insert.
		• Measure the resistance of the sensor with an ohmmeter. Test the sensor at 32°F (0°C) using a container of ice water. The ohm reading should be 100. If the ohm reading is +/- 10, replace the sensor.
		• Inspect wires for integrity. Ensure proper and secure connections are made at the controller and the terminal block.
		• If the error continues, call service.
E-33	Cavity sensor	 Sensor reading is above maximum allowable temperature set-point and over temp value. [Blanket warmers trigger at 82°C (180°F). Fluid warmers trigger at 71°C (160°F).]
		Contact service
E-50	Temperature Measurement Error	• Call service.
E-90	A controller button is stuck	• A controller button has been held down for longer than 60 seconds. Adjust the controller. The error will reset when the problem has been resolved.

Service

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Part numbers and drawings are subject to change without notice.

Fuse Replacement

WARNING

For protection against fire and electrical shock use only UL listed 10A, 250V fast acting fuses, 5mm x 20mm (F1, F2). Access should be made by qualified service technicians only.

Hospital grade cord must be used. Refer to operation and care manual or contact manufacturer for acceptable cords. Equipment must be connected to an equivalent receptacle marked "hospital grade".

- 1. Unplug the power cord from the wall outlet and the power switch assembly.
- 2. Using a thin implement, open the fuse compartment door.
- 3. Using a thin implement, pull the fuse drawer out from the compartment.



- 4. Using a thin implement, push the fuses up and out of the drawer.
- 5. Replace with a new fuse.
- 6. Push the drawer back into the compartment.
- 7. Close the compartment door.



PEDIGO

Pedigo Products, Inc. warrants to the original purchaser that any original part that is found to be defective in material or workmanship will, at our option, subject to provisions hereinafter stated, be replaced with a new or rebuilt part.

The labor warranty remains in effect one (1) year from installation or fifteen (15) months from the shipping date, whichever occurs first.

The original parts warranty for the cavity fan motor remains in effect one (1) year from installation of appliance or fifteen (15) months from the shipping date, whichever occurs first. The original parts warranty on all other parts remains in effect three (3) years from installation of appliance or thirty-nine (39) months from the shipping date, whichever occurs first.

This warranty does not apply to:

- 1. Calibration
- 2. Equipment damage caused by accident, shipping, improper installation or alteration.
- 3. Equipment used under conditions of abuse, misuse, carelessness or abnormal conditions including equipment subjected to harsh or inappropriate chemicals including but not limited to compounds containing chloride or quaternary salts, poor water quality, or equipment with missing or altered serial numbers.
- 4. Any losses or damage resulting from malfunction, including loss of contents or consequential or incidental damages of any kind.
- 5. Equipment modified in any manner from original model, substitution of parts other than factory authorized parts, removal of any parts including legs, or addition of any parts.
- 6. Collateral or incidental damage as a direct result of servicing equipment built into a wall structure is not covered under warranty. It is the responsibility of the owner to bear all expense related to structural repairs including, but not limited to, external electrical connections and wiring, and the removal or replacement of caulk, grout, tile, or wall covering of any kind. A service access panel for built-in equipment installations is strongly recommended.

This warranty is exclusive and is in lieu of all other warranties, expressed or implied, including the implied warranties of merchantability and fitness for purpose. In no event shall the Company be liable for loss of use, loss of revenue, or loss of contents or revenue, or for indirect or consequential damages. This warranty is in lieu of all other warranties expressed or implied and Pedigo Products, Inc. neither assumes or authorizes any persons to assume for it any other obligation or liability in connection with Pedigo Products, Inc. equipment.

The serial number is required for all inquiries.			
Always include both model and serial number(s) in any correspondence regarding the appliance.			
Model:			
Serial number:			
Purchased from:			
Date installed: Voltage:			

Warranty Effective November 1, 2012



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Specifications are subject to change without notice.