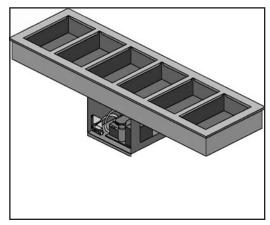


8100-EF

Service and Installation Manual

Please read this manual completely before attempting to install or operate this equipment! Notify carrier of damage! Inspect all components immediately. See page 2.



8100-EF LiquiTec[™] Cold Pans

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Serial Number Information

The serial number on self-contained refrigerated units is on the electrical specifications tag located near the condensing unit. The serial number tag also lists the refrigerant used and the amount of charge.

Always have the serial number of your unit available when calling for parts or service. A complete list of authorized Delfield parts depots is shown on the back cover of this manual.



This manual covers only standard 8100-EF series units. If you have a custom designed unit, you should contact our service department for parts and service questions.

Receiving and Inspecting the Equipment

Even though most equipment is shipped crated, care should be taken during unloading so the equipment is not damaged while being moved into the building.

Carefully check for any visible signs of damage to the cartons or containers. If evidence of damage exists, the package should be opened immediately and a joint inventory and examination of the contents should be made by you and the driver. Sign delivery receipt as damaged. Example - if (2) pieces of (5) are damaged, you must indicated the number of units damaged.

Concealed damage

If a concealed loss or damage is discovered after you have given the carrier a clear delivery receipt, notify the carrier in

writing immediately or within 10 days from the delivery date. If you phone the carrier, you must follow up the call in writing to protect your rights. You can only improve your position as a claimant by promptly reporting such loss or damage. You should also retain all cartons or containers, including packing material, until an inspection has been made or waived.

Filing a claim

Notation of loss or damage does not constitute the filing of a claim. You should file your claim in writing with the carrier immediately.

Carriers will furnish the necessary form upon request. You should also request an inspection. If a claim is filed by phone, always follow up immediately in writing.

Specifications

						1 1	
MODEL NUMBER	COUNTER CUTOUT DIMENSIONS	LOUVER CUTOUT DIMENSIONS	VOLTZ/HERTZ PHASE	AMPS	H.P.	REMOTE BTU	SHIP WEIGHT LBS
8118-EF	17.5" x 25.2" (44.45cm x 64cm)	22" x 11"	115/60/1	7	1/4	292	200/91
8132-EF	31" x 25.2" (78.74cm x 64cm)	22" x 11"	115/60/1	7	1/4	379	225/102
8145-EF	44.5" x 25.2" (113cm x 64cm)	22" x 11"	115/60/1	7	1/4	569	235/107
8159-EF	58" x 25.2" (147.3cm x 64cm)	22" x 11"	115/60/1	7	1/4	758	285/130
8172-EF	71.5" x 25.2" (181.6cm x 64cm)	22" x 11"	115/60/1	7	1/4	948	295/134
8186-EF	85.2" x 25.2" (216.4cm x 64cm)	22" x 11"	115/60/1	7	1/4	1138	306/139
SLIM LINE	MODELS	!					
MODEL NUMBER	COUNTER CUTOUT DIMENSIONS	LOUVER CUTOUT DIMENSIONS	VOLTZ/HERTZ PHASE	AMPS	H.P.	NEMA PLUG	SHIP WEIGHT LBS/KG
8148-EFN	44.5" x 25.2" (113cm x 64cm)	22" x 11"	115/60/1	7.0	1/4	5-15P	235/107
8169-EFN	58" x 25.2" (147.3cm x 64cm)	22" x 11"	115/60/1	7.0	1/4	5-15P	285/130
8191-EFN	71.5" x 25.2" (181.6cm x 64cm)	22" x 11"	115/60/1	7.0	1/4	5-15P	295/134



Installation

Drop In Procedure

These units are designed to be used only in air conditioned areas. A room temperature of not more than 75°F (24°C) is recommended. Reinforce the counter as necessary to provide for maximum loading.



Do not install the unit within three inches of any combustible material or object affected by heat or moisture.

The counter cut-out sizes and power requirements are shown on page 2. For units manufactured after August 1, 2001, the gasket will be pre-installed at the factory. For units manufactured before August 1, 2001, after the cut-out is made, lay the gasket on the counter around the cut-out opening. Place the unit over the gasket. The weight of the unit on the gasket forms a seal preventing liquids from seeping into the cut-out opening.

Louvers

Self contained refrigerated units (8100-EF Series) require airflow to the compressor. A 13" x 25" louver is (33cm x 63.5cm) provided by Delfield and must be installed in the counter in front of the condenser. See specifications on page 2 for louver cutout dimensions. The rear must have an opening to permit removal of heated air. The opening must be at least 8" x 11", a total of 88 square inches (20.3cm x 27.9cm, a total of 566 square centimeters).

Plumbing

The unit's 1.00" diameter drain must have an outlet to an appropriate drainage area or container.



Moisture collecting from improper drainage can create a slippery surface on the floor and a hazard to employees. It is the owner's and operator's responsibility to provide a container or outlet for drainage.

Electrical Connection

Refer to the amperage data on page 2, the serial tag, your local code and the National Electrical Code to be sure the 8100-EF Series unit is connected to the proper power source. A protected circuit of the correct voltage and amperage must be run for connection of the line cord.



The unit should be disconnected from the power source whenever performing service or maintenance functions.

Never operate the unit without the louvered panel in place.

Operation

8100-EF Series cold pans are adjusted at the factory to provide satisfactory operation without any further adjustments. However, if it is necessary to adjust the temperature, the control is located in the machine compartment. Turn the knob clockwise as indicated on the control. Settings are from 1 through 7; 7 being the coldest. Adjustments should be made gradually. Several small adjustments will be more effective than one large adjustment. It may take an hour or longer to realize the temperature change depending on the application and location of the unit.

These units are not designed to cool warm food products. Items should be placed in the unit pre-cooled at least to the desired holding temperature, if not slightly colder. In some applications, a gradual warming of product may occur, particularly at the exposed top of the product. Stirring or rotation of the product may be necessary to maintain overall temperature. Warming of food product can occur very quickly outside of the unit. When loading or rotating the product, avoid leaving food items in a non-refrigerated location for any length of time to prevent warming or spoilage.

The temperature control is used to turn the unit on and off as well as control the temperature of the cold pan. The settings range from 1 through 7 (7 being the coldest). To turn the cold pan off, turn the knob to the off position.

The cold pan is not intended to be used with ice.



Cleaning

The Unit

The exterior can be cleaned using soap and warm water. If this is not sufficient, try ammonia and water or a nonabrasive liquid cleaner. When cleaning the exterior, always rub with the grain" of the stainless steel to avoid marring the finish. Do not use an abrasive cleaner because it will scratch the stainless steel. A stainless steel cleaner or polish may be used to eliminate water spotting and fingerprints and bring out the finish of the exterior.

The interior of the tank should be cleaned daily with a non-abrasive cleaner and a non-abrasive pad. If necessary, a mild abrasive may be used on the interior of the pans only. Hard water stains and lime scaling may require a special cleaning product. Never use steel wool.

The Condenser

In order to maintain proper refrigeration performance, the condenser fins must be cleaned of dust, dirt, and grease regularly. It is recommended that this be done at least every three months. If conditions are such that the condenser is totally blocked in three months, the frequency of cleaning should be increased. Clean the condenser with a vacuum cleaner or stiff brush. If extremely dirty, a commercially available condenser cleaner may be required.



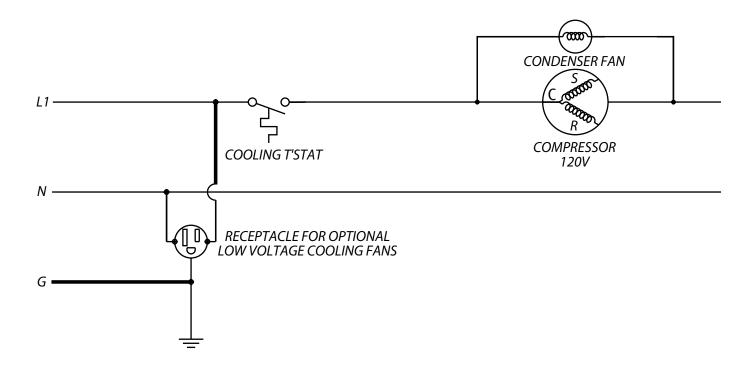
Do not use a hose or pressure washer on these units. The water will damage the electrical components



The 8100-EF Series cold pans contain a non-toxic, eutectic fluid within a sealed inner liner. This fluid may leak if the tank is punctured so care must be taken during uncrating and setting in place. The eutectic fluid is non-toxic and may be flushed down a disposal drain.

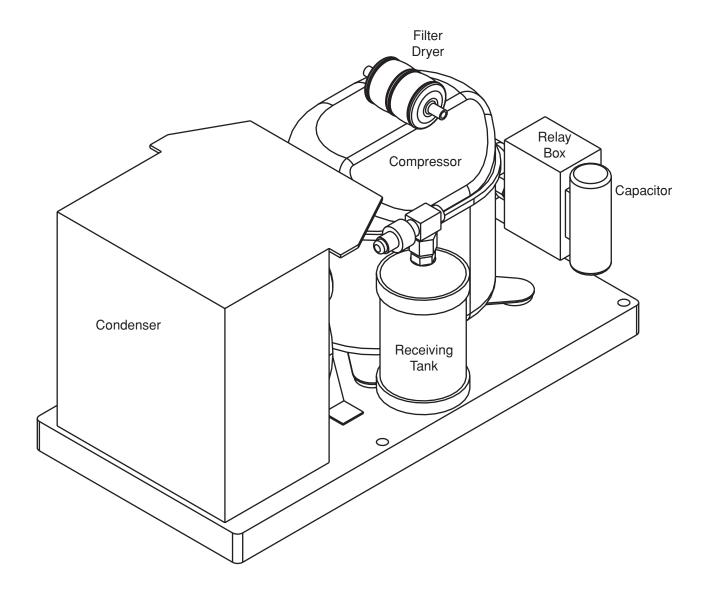
If the 8100-EF Series cold pan leaks immedately call the Delfield service department directly at 1-800-733-8821, not your local service agent.

Wiring Diagram 8100-EF and 8100-EFN





Condensing Unit Assembly



Replacement Parts

000-254-0039 1/4 Condensing Unit Assembly

3526716 Condensing Unit 1/4 115/60 R404A

3516101 Dryer, Filter, 1/4 ODF Low



Standard One Year Warranty

The Delfield Company ("Delfield") warrants to the Original Purchaser of the Delfield product (herein called the "Unit") that such Unit, and all parts thereof, will be free from defects in material and workmanship under normal use and service for a period of one (1) year from the date of shipment of the Unit to the Original Purchaser or, if the Original Purchaser returns the warranty card completely filled out including the date of installation within thirty (30) days of receipt of the Unit, one (1) year from the date of installation. During this one year warranty period. Delfield will repair or replace any defective part or portion there of returned to Delfield by the Original Purchaser which Delfield determines was defective due to faulty material or workmanship. The Original purchaser will pay all labor, crating, freight and related costs incurred in the removal of the Unit of defective component and shipment to Delfield, except that during a period of either ninety (90) days from the date of shipment of the Unit to the Original Purchaser or, if the Original Purchaser returns the warranty card completely filled out including the date of installation within thirty (30) days of receipt of the Unit, ninety (90) days from the date of installation Delfield will pay all related labor costs. Delfield will pay the return costs if the Unit or part thereof was defective.

The term "Original Purchaser" as used herein means that person, firm, association, or corporation for whom the Unit was originally installed.

This warranty does not apply to any Unit or part thereof that has been subjected to misuse, neglect, alteration, or accident, such as accidental damage to the exterior finish, operated contrary to the recommendations specified by Delfield: or repaired or altered by anyone other than Delfield in any way so as to, in Delfield's sole judgement, affect its quality or efficiency. This warranty does not apply to any Unit that has been moved from the location where it was originally installed. This warranty also does not cover the refrigerator drier or the light bulbs used in the Unit. The warranty is subject to the user's normal maintenance and care responsibility as set forth in the Service and Installation Manual, such as cleaning the condenser coil, and is in lieu of all other obligations of Delfield. Delfield neither assumes, nor authorizes any other person to assume for Delfield, any other liability in connection with Delfield's products.

Removal or defacement of the original Serial Number or Model Number from any Unit shall be deemed to release Delfield form all obligations hereunder or any other obligations, express or implied.

Parts furnished by suppliers to Delfield are guaranteed by Delfield only to the extent of the original manufacturer's express warranty to Delfield. Failure of the Original Purchaser to receive such manufacturer's express warranty to Delfield. Failure of the Original Purchaser to receive such manufacturers warranty shall in no way create any warranty, expressed or implied, or any other obligation or liability on Delfield's part in respect thereof.

If shipment of a replacement part is requested prior to the arrival in the Delfield factory of the part claimed to be defective, the Original Purchaser must accept delivery of the replacement part of a C.O.D. basis, with credit being issued after the part has been received and inspected at Delfield's plant and determined by Delfield to be within this warranty.

Under no condition does this warranty give the Original Purchaser the right to replace the defective Unit with a complete Unit of the same manufacturer or of another make. Unless authorized by Delfield in writing, this warranty does not permit the replacement of any part, including the motor-compressor, to be made with the part of another make or manufacturer.

No claims can be made under this warranty for spoilage of any products for any reason, including system failure.

The installation contractor shall be responsible for building access, entrance and field conditions to insure sufficient clearance to allow any hood(s), vent(s), or Unit(s) if necessary, to be brought into the building. Delfield will not be responsible for structural changes or damages incurred during installation of the Unit or any exhaust system.

Delfield shall not be liable in any manner for any default or delay in performance hereunder caused by or resulting form any contingency beyond Delfield's control, including, but not limited to, war, governmental restrictions or restraints, strike, lockouts, injunctions, fire, flood, acts of nature, short or reduced supply of raw materials, or discontinuance of the parts by the original part manufacturer.

Except as provided in any Additional Four Year Protection Plan, if applicable, and the Service Labor Contract, if applicable, the foregoing is exclusive and in lieu of all other warranties, whether written or oral, express or implied. This warranty superseded and excludes any prior oral or written representations or warranties. Delfield expressly disclaims any implied warranties of merchantability, fitness for a particular purpose of compliance with any law, treaty, rule or regulation relating to the discharge of substances into the environment. The sole and exclusive remedies of any person relating to the Unit, and the full liability of Delfield for any breach of this warranty, will be as provided in this warranty.

Other than this Delfield Standard One Year Limited Warranty, any applicable Delfield Additional Four Year Protection Plan or applicable Delfield Service Labor Contract, the Original Purchaser agrees and acknowledges that no other warranties are offered or provided in connection with or for the unit or any other part thereof.

In no event will Delfield be liable for special, incidental or consequential damages, or for damages in the nature of penalties.



Additional Four Year Protection Plan (for Motor-Compressos only)

Delfield Model#	Serial #	Installation Date

In addition to the Standard One Year Warranty on the Motor-Compressor contained in the above listed Delfield product (the "Unit"), The Delfield Company ("Delfield") also agrees to repair, or exchange with similar or interchangeable parts in design and capacity at Delfield's option, the defective Motor-Compressor contained in the Unit (the "Motor-Compressor), or any part thereof, for the Original Purchaser only, at any time during the four (4) years following the initial one (1) year period commencing on the date of installation for the Original Purchaser. Failure of the Original Purchaser to register the registration card containing the Original Purchasers name, address, date of installation, model number and serial number of the Unit containing the Motor-Compressor within 30 days from the date of installation shall void this warranty. This additional warranty is only available if the Motor-Compressor is inoperative due to defects in material or factory workmanship. as determined by Delfield in its sole judgement and discretion. The Original Purchaser shall be responsible for returning the defective Motor-Compressor to Delfield prepaid, F.O.B. at the address shown on the back cover of this manual.

The term "Original Purchaser" as used herein means that person, firm, association, or corporation for whom the Unit was originally installed.

The term "Motor-Compressor" as used herein does not include unit base, air or water cooled condenser, receiver, electrical accessories such as relay, capacitors, refrigerant controls, or condenser fan/motor assembly. This warranty does not cover labor charges incidental to the replacement of parts. This warranty further does not include any equipment to which said condensing unit is connected, such as cooling coils, temperature controls or refrigerant metering devices. This warranty shall be void if the Motor-Compressor, in Delfield's sole judgement, has been subjected to misuse, neglect, alteration or accident, operated contrary to the recommendations specified by the Unit manufacturer, repaired or altered by anyone other than Delfield in any way so as, in Delfield's sole judgment, to affect its quality or efficiency or if the serial number has been altered, defaced or removed. This Warranty does not apply to a Motor-Compressor in any Unit that has been moved from the location where it was originally installed. The addition of methyl chloride to the condensing unit or refrigeration system

shall void this warranty. General Conditions

Delfield shall not be liable in any manner for any default or delay in performance hereunder caused by or resulting form any contingency beyond Delfield's control, including, but not limited to, war, governmental restrictions or restrains, strike, lockouts, injunctions, fire, flood, acts of nature, short or reduced supply of raw materials, or discontinuance of any part or the Motor-Compressor by the unit manufacturer.

Replacement of a defective Motor-Compressor is limited to one (1) Motor-Compressor by us during the four (4) year period. Delfield shall replace the Motor-Compressor at no charge.

This warranty does not give the Original Purchaser of the Motor-Compressor the right to purchase a complete replacement Motor-Compressor of the same make or of another make. It further does not permit the replacement to be made with a Motor-Compressor of another kind unless authorized by Delfield. In the event Delfield authorizes the Original Purchaser to purchase a replacement Motor-Compressor locally, only the wholesale cost of the Motor-Compressor is refundable.

Expressly excluded from this warranty are damages resulting from spoilage of goods.

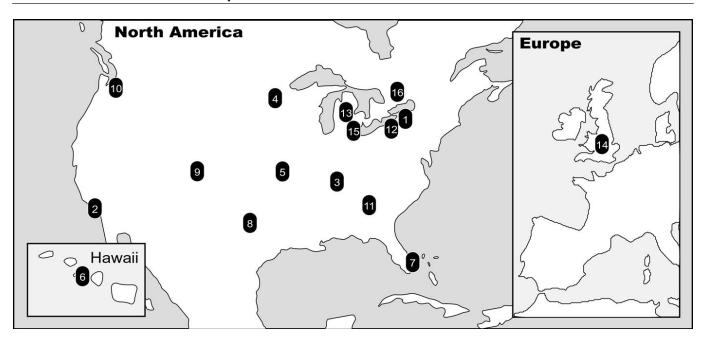
Except as provided in any applicable Standard One Year Limited Warranty or applicable Service Labor Contract, the foregoing is exclusive and in lieu of all other warranties, whether written or oral, express or implied. This Warranty supersedes and excludes any prior oral or written representations or warranties. Delfield expressly disclaims any implied warranties of merchantability, fitness for a particular purpose or compliance with any law, treaty, rule or regulation relating to the Motor-Compressor, and the full liability of Delfield for any breach of this warranty, will be as provided in this warranty.

Other than any applicable Delfield Standard One year Limited Warranty, this Delfield Additional Four Year Protection Plan and any applicable Delfield Service Labor Contract, the Original Purchaser agrees and acknowledges that no other warranties are offered or provided in connection with or for the Motorcompressor or any part thereof.

In no event will Delfield be liable for special, incidental or consequential damages, or for damages in the nature of penalties.



Delfield Authorized Parts Depots



Delfield has 16 conveniently located Parts Depots to ensure parts are handled promptly and accurately

1) Appliance Installation Service

1336 Main Street Buffalo, NY 14209 800.722.1252 716.884.7425 716.884.0410 FAX serves: CT, OC, DE, MA, MD, ME, NH, NJ, NY, PA, RI, VA, VT, WV

5) E.M.C.O. Sales & Distributors

3909 St. Timothy Lane St. Ann, MO 63074 800.972.7670 314.427.7477 314. 427.8190 FAX serves: AR, JA, IL, KS, KY, MO, NE, OK

9) Hawkins Commercial Appl. Serv.

3000 S. Wyandot Englewood, CO 80110 (800) 624-2117 (303) 7618861 FAX serves: AZ. CO. KS, NE, NM. OK, UT, WY

13) The Delfield Company

980 South Isabella Road Mt. Pleasant, MI 48858 800.733.8829 517.773.7981 517.773.3210 FAX custom parts direct from Delfield

2) Barker's Food Machinery

5367 2nd Street Inwindale, CA 91706 800. 258.6999 626.960.9390 626.337.4541 FAX serves: CA, AZ, NV, OR

6) Food Equip Parts & Service Co.

300 Puuhale Road Honolulu, HI 96819 808.847.4871 808.842.1560 FAX serves: HI

10) Performance Refrigeration Parts

9923 S.W. 178th St. Vashon, WA 98070 888.872.2465 206-463-1772 206.463.4431 FAX

14) Hubbard Refrigeration Ltd.

Hill View. Church Road Suffolk Otley, England 1P69NP 011.44.147.389.0129 011.44.147.389.0133 FAX serves Europe

3) T.M.A.

2916 Sidco Drive Nashville, TN 37204 615.726.0351 800.737.0351 615.259.4100 FAX serves: TN Al

7) Global Parts and Supplies

2920 N.W. 109th Avenue Miami, FL 33172 305 994.9994 305.994.9992 FAX International parts depot

11) Southeastern Restaurant Services

2200 Norcross Parkway, Suite 210 Atlanta, GA 30071 800.235.6516 770.446.6177 770.446.3157 FAX serves: FL GA, MS, NC, SC, VA

15) MicroDine, Inc.

44792 Helm Plymouth, MI 48170 888.828.4454 734.451.2043 734.451.3215 FAX serves: MI. IN

4) Contract Ice

14450 Ewing Ave S. #100 Burnsville, MN 55306 800.422.2823 952.894.4427 952.894.2164 FAX serves: IA. MN. MT. ND. SD. WI

8) J & S Refrigeration

12613 Executive Drive, #712 Stafford, TX 77477 800.733.3143 281.240.5505 281.240.5519 FAX serves: AR LA NM, OK, TX

12) A.I.S. Commercial Parts & Service

1816 West 26th Street Erie, PA 16508-1149 800.332.3732 814.456.3732 814.452.4843 FAX serves: MD, NJ, OH, PA, VA, WV

16) Garland Group

1177 Kamato Road Mississauga, Ontario L4W1X4 800.427.6668 800.361.7745 FAX serves: Canada

