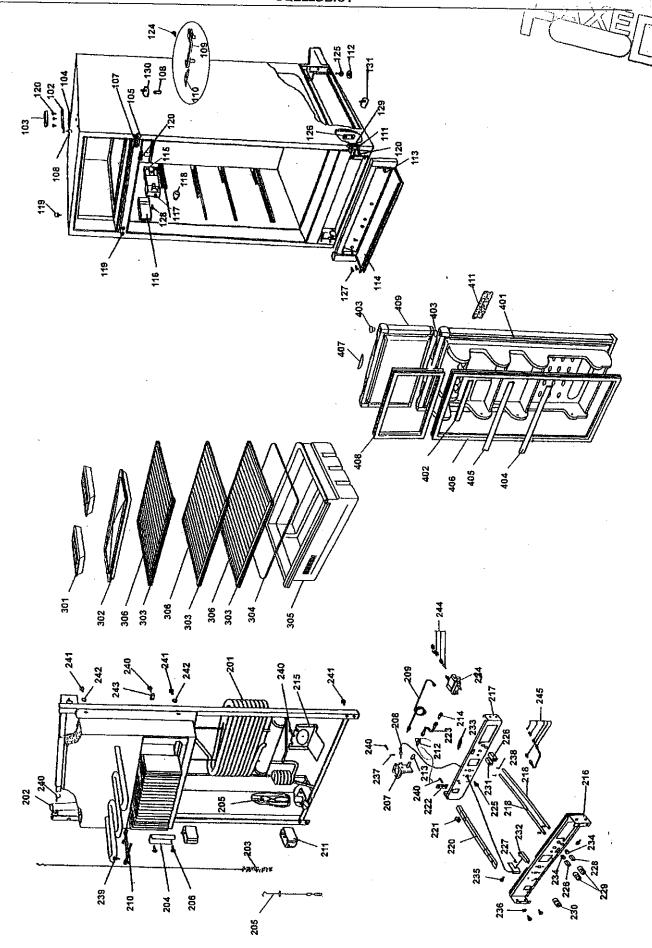


Consul

Absorption Refrigerators Service Manual





CQE22DBICT

Tri -		- CQL22DDIC1	•••		
Fig.	Part number	Description	Quantity		DEALER
102	004182235	Hinge, upper	 	PART # CR-102-R	PRICE
103	704515826	Cover, upper hinge	1	CR-102-R CR-103-R	3.56
104	704515824	Shim, upper hinge	2	CR-103-R	1.08
105	708056373	Shim, center hinge	1	CR-104-R	1.08
107	708057068	Hinge, center	1 1	CR-105-R	1
108	004177410	Bushing, upper hinge	2	CR-107-R CR-108-R	3.55
109	152166001	Chanel, drain		1	1.08
110	151277004	Tube, drain	1	CR-109-D	1.73
111	326000180	Hinge, lower	1	CR-110-DS	1.73
112	003022218	Pad, Leveling screw	1	CR-111-R	1.73
113	326016580	Console	4	CR-112-R	1.73
114	326014686		1	CR-113-R	5.87
115		Door, console	1	CR-114-R	5.92
	004162196	Box, light	1	CR-115-R	10.77
116	151145000	Reflector	1	CR-116-R	1.73
117	326001511	Switch, light	1	CR-117-R	3.01
118	002003120	Lamp	1	CR-118-R	3.77
119	150925002	Cap	2	CR-119-R	.81
120	004199154	Screw	5	CR-120-R	.81
124	044201526	Screw	1	CR-124-R	.81
125	043205013	Screw, leveling	, 4	CR-125-R	.81
126	004202716	Strip, threaded	1	CR-126-R	.81
127	044901021	Screw	4	CR-127-R	.81
128	000710460	Screw	1	CR-128-R	.81
129	704515818	Shirn, lower hinge	1	CR-129-R	.81
130	004210042	Bushing, center hinge, right side door opening	1	CR-130-R-RS	.81
130	004210050	Bushing, center hinge - to revert left side door	1	CR-130-R-LS	.81
131	004177398	Bushing, lower hinge, right side door opening	1	CR-131-R-RS	.81
131	004177401	Bushing, lower hinge – to revert left side door	11	CR-131-R-LS	.81
201	T1104	A1			
l	TU24	Absorption System	1	CR-201	389.95
202	231566007	Chimney	1	CR-202-CH	9.69
203	008003041	Brush, clean chimney		CR-203	6.46
204	116043009	Bulb pin		CR-204-BC	.81
205	270275001	Strangler, deflector	1	CR-205-R	4.31
206	000710460	Screw	1	CR-206-R	.81
207	004173457	Burner, blending gas	1	CR-207-H	9.69
208	002013045	Electrode	1	CR-208	2.70
209	006011705	Thermocouple	1	CR-209-Q	10.77
210	231034200	Clamp, freezer	1	CR-210	5.39
211	151860001	Box, evaporating	9	CR-211	2.15
212	006011667	injector 0,370mm	1	CR-212	4.31
213	006011373	Housing, injector	1	CR-213	1.95
214	006011454	Union	1	CR-214	1.30
215	111462003	Protection, burner	1	CR-215-R	3.77
216	112000003	Support, front	1	CR-207-Q	5.28
217	326020236	Support, rear		CR-217-R	5.28
218	040111468	Rod, selector		CR-210-Q	3.88
220	003008126	Sight, flame		CR-220-F	5.38
221	151810004	Protection, door		CR-221-DP	.81
222	111496218	Guide, sight		CR-218	.81
223	231141006	Tube, burner		CR-215-Q	4.31
224	002015072	Thermostat Valve CR-216-NEW		CR-216 4"×4"	121.83
225	043901010	Screw (2-06)	2	CR-225-S	.81
		\ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \ \	C. 201	N/ AP-21/	

After feb 2006 CR-216-NEW measures approx. 2"X4"

Fig. Part number		Description	Quantity	TEECO PART #	DEALER PRICE
226	151307000	Bushing, selector			
227	047101042	Nut, square	2	CR-223	.81
228	151308007	Bushing, selector	1	CR-227-N	.81
229	004231392	Knob, control		CR-230	.81
230	004231406	Knob, control	2	CR-229-R	.81
231	151311008		1	CR-230-R	.81
232		Bushing, thermostat valve	1	CR-224	.81
233	002014025	Lighter piezo	1	CR-232-I	10.24
	000601209	Elbow, inlet gas conection hose	1	CR-233-R	
234	152080000	Bushing, rod	1	CR-234-BR	1.08
235	043101013	Screw	2	CR-235-S	.81
236	150114004	Nut	4	CR-236-N	.81
237	008016151	Clamp	1	CR-237-B	.81
238	049201044	Pin, split 1,6 x 20	4	CR-238-SP	7.11
239	326006704	Screw	8	CR-239-R	.81
240	044201526	Screw	14	CR-124-R	.81
241	043201190	Screw	4	CR-241-S	.81
242	004166833	Washer	6	CR-239	.81
243	151223001	Clamp	3	CR-243-C	.81
244	006011780	Kit, Inlet gas valve	1 1	CR-244-R	
245	231472002	Tube, pressure	1	CR-245-R	
301	004195884	Tray, Ice cubes	3	CR-302	2.15
302	151278000	Colector, water	1	CR-302-T	3.23
303	708056879	Trim	3	CR-303-R	1.62
304	008002088	Glass, shelf		CR-304-S	7.55
305	004174895	Crisper, vegetables		CR-305-R	9.60
306	326015777	Shelf		CR-306-R	7.55
401	326021116	Door, refrigerator compartment	1	CR-401-R	102.33
402	326015444	Trim		CR-402-R	1.62
403	004177428	Plug		CR-403-R	.81
403	004177428	Plug		CR-403-R	.81
404	004231074	Trim		CR-404-R	
405	326000139	Trim		CR-404-R CR-405-R	1.62
406	326014980	Gasket, refrigerator door			1.62
407	326007764	Nameplate, CONSUL		CR-406-R	21.54
408	326014979	Gasket, freezer door		CR-407-R	2.15
409	326021117	Door, freezer compartment		CR-408-R	16.15
411	004231260	Holder, eggs		CR-409-R	52.78
		Indian, cyys	2	CR-411-R	2.75



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LP-GAS WARNING!

ATTENTION!: AVOID SERIOUS INJURY & PROPERTY DAMAGE!

This refrigerator is fueled by LP-gas (propane). LP-gas is extremely flammable and explosive. If you see, smell or hear escaping gas, evacuate the area immediately and call your local fire department and LP-gas service person. Do not attempt to repair. Have your LP-gas dealer regularly inspect this installation and properly instruct you in safety matters.

Failure to follow these safety instructions, local, state, national codes and other instructions provided with this refrigerator, or failure to properly install, connect, disconnect, operate, test, service and maintain this gas appliance can result in death or serious bodily injury to hu-

mans and animals and/or property damage from asphyxiation, fire and/or explosion.

Do not attempt to install, repair or alter the gas supply line. This is to be performed only by a qualified gas installation person. Gas supply line installation requires expert training and knowledge and should not be attempted by anyone who is not so qualified.

National, state and/or local codes may impose standards applicable to installation and gas servicing subjects covered in this manual. If you believe a conflict exists between these instructions and applicable codes, follow code standards or recommendations and consult your LP-gas service man for information.

SAFETY NOTICE! - LP-GAS ABSORPTION REFRIGERATORS

INSTALLATION

The CONSUL LP-Gas refrigerator must be installed in accordance with the manufacturer's instructions. Failure to follow these instructions may result in poor operation of the unit, personal injury and/or property damage. Units should be installed by qualified gas appliance installers only. Any installations made by a consumer must be inspected by the selling dealer to assure that a safe and proper installation was performed.

CARBON MONOXIDE (CO)

A tasteless, colorless, odoriess poisonous gas, produced by the improper combustion of carbon based fuels. Improper combustion may result from insufficient ventilation, inadequate primary combustion air, impingement of flame or incorrect flame adjustments.

MAINTENANCE

Unlike electric refrigerators, CONSUL LP-gas units requires periodic maintenance of the burner and flue to prevent the accumulation of dust or debris. Failure to properly maintain the burner and flue can result in improper combustion and the formation of carbon monoxide gas.

Units out of service for any period of time must have the

burner and flue cleaned and checked for correct operation prior to use of the unit.

VENTILATION

The CONSUL LP-gas refrigerator (as with all gas appliances) requires adequate ventilation for proper operation. Specified installation clearances must be maintained. Use of the CONSUL simultaneously with other gas or fuel burning appliances or devices, without sufficient fresh air being available, is hazardous and may cause the formation of carbon monoxide gas.

NOTE: All gas burning appliances should be checked periodically by a qualified gas technician for proper operation and maintenance. Failure to provide adequate ventilation and sufficient fresh air may result in oxygen depletion and the formation of carbon monoxide gas.

Prolonged exposure to carbon monoxide may result in nausea, unconsciousness, brain damage or death. Should you suspect the presence of carbon monoxide gas, shut off all gas/fuel burning appliances or devices, leave the building and call a service technician to thoroughly check all appliances or devices for safe and correct operation before continuing use.

SAFETY INSTRUCTIONS

Damages caused by the fact that instructions in this manual were not strictly followed will be of the serviceman's own responsibility.

This refrigerator is intended for domestic use only.

To reduce fire risk or body injuries, follow these precautions:

- Never clean the refrigerator with flammable fluids. Vapors may create risk of fire.
- ✓ Do not store toxic products inside the refrigerator. They

may contaminate the food.

- Do not store or use flammable liquids such as gasoline, kerosene, etc. next to the refrigerator. This avoids fire and explosion risks.
- ✓ If the refrigerator is to be out of service for some time, tie it
 with a piece of rope etc., or remove its door.

ATTENTION!: Do not allow the refrigerator to be installed or service by untrained personnel.

SPECIAL RECOMMENDATIONS

- ✓ Use LPG only (liquefied petroleum gas).
- ✓ If the evaporation boxes need to be cleaned, replacing them at an angle of 180° to one another. Always keep the refrigerator clean, particularly the burner and the flue.
- Do not allow ice to accumulate on the evaporator fins since it causes low performance of the refrigerator.
- ✓ When in operation, do not obstruct the flue outlet (at the
- top of the refrigerator) with paper, wood, or other materials, as this is a fire hazard besides affecting the refrigerator performance.
- Do not leave the gas cylinder at the same side of the heater. High temperatures may cause the hose to break causing fire.
- Replace the gas hose for another of the same quality whenever it is worn or damaged.

ENERGY SAVING TIPS

- Avoid leaving the door open for a long period of time.
- Avoid frequent and unnecessary openings of the door; open partially.
- Never place hot food inside the refrigerator. Allow food to
- be at room temperature.
- ✓ Set the thermostat to the appropriate position.
- ✓ Place your refrigerator in a ventilated spot, away from sunlight, hot surfaces, or humid places.

LIMITED WARRANTY

The entire unit is warranted against defects in workmanship or materials for a period of twelve (12) months from date of purchase by the original purchaser, when installed and periodic maintenance recommended by the manufacturer is performed in accordance with instructions and in compliance with all local, state and national codes or standards.

This warranty is limited to the exchange, without charge, of parts or components deemed, upon inspection, to be defective. Replacement of defective parts may be, at our option,

made with new or reconditioned parts or components.

Parts or components returned for replacement under this warranty must be received by us on a freight paid basis. Warranty replacement parts or components will be shipped freight prepaid to the installing or selling dealer listed on the warranty registration card.

The warranty registration card must be completed and returned upon purchase and installation of unit.

EXTERIOR COMPONENTS

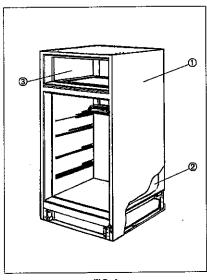


FIG. A

CABINET

The cabinet and liner are fabricated with polyurethane injected thermal insulation. The assembly is consists of the cabinet (A1), liner (A2) and freezer (A3).

DOOR

The refrigerator door is composed of several components; PVC plastic frame (B1), panel sheet (B2), polyure-thane-injected thermal insulation (B3), liner (B4) and gasket (B5).

NOTE: The gasket is not attached to the door; it is fitted under pressure.

Although smaller, the freezer door has the same characteristics. However, it has insulation made of EPS.

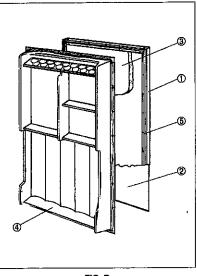


FIG. B

REFRIGERATION UNIT

The refrigeration unit uses an identical system regardless of the power supply source (gas or electricity). It is composed of five components; heater (C1), condenser (C2), absorber (C3), primary evaporator (C4) and secondary evaporator (C5).

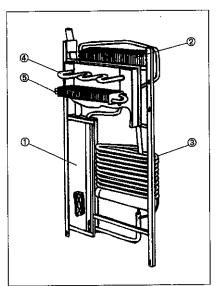


FIG. C

The performance of an absorption refrigerator depends directly on the performance of the gas burner, which is composed of the thermostatic valve or ATC (D1), injector (D2), injector housing (D3), burner (D4), piezo igniter (D5), electrode (D6), thermocouple (D7) and thermostat bulb (D8).

THERMOSTATIC VALVE

The thermostatic valve, or ATC (automatic temperature control) automatically controls the temperature inside

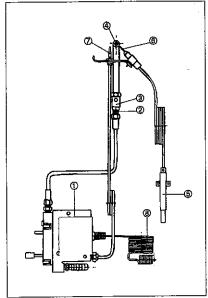


FIG. D

the refrigerator, partially interrupting the gas flow which feeds the burner.

The thermostatic valve is aluminum body containing a manual feeding system with gas selector (E3), an electromagnetic safety system, which is actuated by gas operation only, a temperature automatic control system or thermostat (E10) and a by-pass screw (E12) or pilot flame injector.

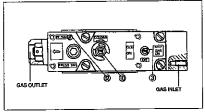


FIG. E

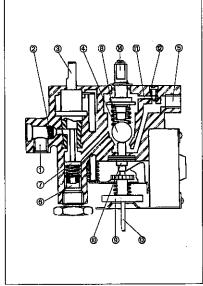


FIG. F

NOTE: Because the equipment has a laser drilled ruby injector and a valve constructed to precise specifications, the unit does not require or allow adjustment of the gas flow.

When the selector switch (F3) is set to "gas on", gas is admitted (F1) and filtered (F2).

If the selector switch command shaft (F3) is pressed, the safety device allows the gas to pass through by means of the main circuit, once the ball (F4) is unseated. This allows the gas to flow to the outlet (F5) to the burner tube to be ignited.

The selector switch shaft must be kept pressed for approximately five seconds until the thermocouple, mounted next to the burner, starts to

REFRIGERATION UNIT - CONTINUED

generate enough voltage (approximately 25mV) to energize the coil (**F6**), and convert it into an electromagnet which keeps the safety device open while the flame remains lit.

If the burner flame is extinguished for any reason, the thermocouple will stop generating voltage, and the safety device automatically closes within 40 seconds, preventing gas leakage.

NORMAL OPERATION - With the safety device (F7) open, gas flows via the main duct to the thermostat obstruction mechanism (F4).

An increasing temperature at the evaporator causes the gas pressure inside the thermostat capillary (F13) to increase, raising the set (F9) and pin (F10). As temperature in the evaporator cools, gas pressure inside the thermostat capillary decreases, and the pin, under pressure from the spring (F8), will lower and block the main gas passage. Temperature is set by the adjuster (F14) which acts on the spring.

A small flow of gas through the by-pass circuit (F11) keeps the thermoelement and refrigeration system heated. Adjustment of this circuit is made by the by-pass screw (F12).

NOTE: The by-pass screw is already factory adjusted, and must not be handled.

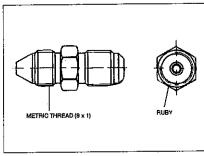


FIG. G

INJECTOR

The injector (**G**) controls the amount of gas injected in the burner. It is made of two parts. The body, made of brass with metric thread (9x1), has a conical seat on both sides, allowing a perfect sealing at the connections.

The injector itself is located inside the brass body, and is a thin ruby cylinder, with a smooth, high precision drilled hole. These characteristics avoid clogging of the injector by gas dirt particles, and the ruby will not change size regardless of heat.

NOTE: Do not use sharp tools to clean the injector. Use solvent products and compressed air only.

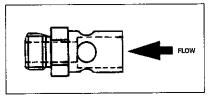
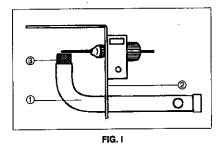


FIG. H

INJECTOR HOUSING

The injector housing (H) provides a perfect mixture of air/gas for burning, leaving the injector at high velocity. The diameters of air/gas passage are predetermined, and require no adjustment.



BURNER

A steel tube, electrolytically treated and galvanized. The tube (I1) is welded to the base (I2), and the screen (I3) is welded under pressure at the side.

The tube has a baffle to improve the heat transfer of the combustion gases, and a choke to limit the excess of air that passes through the flame tube. Over it is the flue which is fixed to the system by a screw.

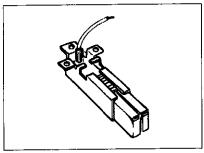


FIG. J

PIEZO IGNITER

The piezo igniter (J) provides ignition of the gas burner flame. A hammer and a spring assembly, when pressed, exerts power on a piezoelectric crystal. The impact on the crystal generates a low current (120 to 180mA) of high voltage (13,000V).

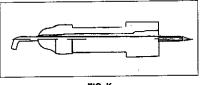


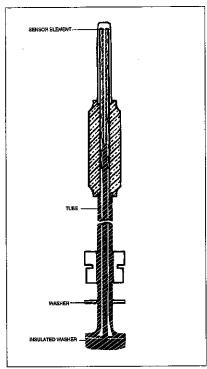
FIG. K

ELECTRODE

The electrode (K) ignites the gas from the injector. The voltage generated by the piezo igniter causes sparking between the electrode and the screen. The distance between the electrode and the screen should be 1/16".

THERMOCOUPLE

The thermocouple (L) is a safety device that guards against gas leakage should the flame be accidentally extinguished. It is constructed of chromium nickel and constantan. These two materials, when heated generate an electromotive power (E.P.) or potential difference (mV).



EIG I

This E.P. is conducted by the thermocouple to the coil in the thermostatic valve. The coil, when energized, becomes an electromagnet which holds the gas flow valve open while the flame is lit. At the moment the flame is extinguished the coil loses power, and in 30-40 seconds cuts off the flow of gas.

Thermocouple durability depends on proper installation. The distance between the thermocouple and the screen must be between \(^{1}_{54}\)" and \(^{1}_{32}\)".

THERMOSTAT BULB

The thermostat bulb is a copper capillary tube which contains gas. This tube is fixed at the rear of the refrigerator, and its end is housed in the evaporator receptacle. When replacing bulb, check for a good fit and seal with caulking compound.

INSTALLATION INSTRUCTIONS

BEFORE INSTALLING

The refrigerator must be installed with the following minimum clearances: Right side - 6"; left side - 0"; top - 6"; rear - 0".

It must be placed on a surface that withstands its weight and that is appropriate to its size and use.

Do not install the refrigerator directly over a carpet. Protect the area to be occupied by the refrigerator directly over a carpet. Protect the area to be occupied by the refrigerator with a 24" x 24" metal panel. On an uneven floor, the panel will aid in sliding the refrigerator.

It must be out of the weather. It must not be near an oven, heater, or other heat source. Choose a place with good ventilation, free of draft, without direct incidence of sunlight or other heat radiators.

Avoid installing your refrigerator in humid places (e.g. next to sinks), for moisture causes ice to build up very quickly on the evaporator and defrosting needs to be done at shorter intervals

The doors are reversible, and can also open from right to left. If required, reverse doors before installing. See "Reversing the Doors".

INSTALLATION INSTRUCTIONS

- Wait one hour after shipment before starting system to let levels of solutions balance.
- Remove the base of the packaging, keeping the fixing screws.
- Clean the inside and outside of your refrigerator with neutral soap and warm water to eliminate the characteristic odor of new products (do not use abrasives).
- Install your refrigerator so as to be level to the floor. Use the screws that used to fix the packaging to level the refrigerator and to protect it against moisture. Use a spanner.
- Place nylon covers on screws. (Read packaging instructions).
- ✓ Place the refrigerator in its permanent position, touching the wall behind it and the wall to the left, if any. Use a spirit level or a plumb bob to true up the refrigerator in the left-right and front-rear directions. This is done by adjusting the leveling screws beneath the refrigerator.

The refrigerator is equipped with an

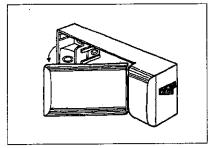


FIG. M

internal lighting system (M) powered by batteries. To install the batteries:

- ✓ Remove the light box reflector (M1).
- Insert two 1.5V batteries, pressing them against the contacts.
- ✓ Replace the reflector.

Change batteries whenever light dims or fails to go on.

GAS CONNECTION

ATTENTION!: The gas main or cylinder must be located at the right side of the refrigerator. Do not allow the hose to be run behind the heater box.

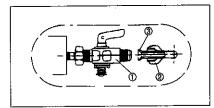


FIG. N

Connect the gas main or cylinder to refrigerator with $\frac{3}{6}$ " flex connector. The unit is supplied with a valve (N1) with a flare nut (N2) to hold the tube flange (N3) against the valve inlet.

IMPORTANT: Do not bend connector far enough to constrict gas flow.

The length of the connector should allow movement access of the refrigerator to reach rear parts.

PRESSURE REGULATOR

The use of a pressure regulator on the gas cylinder is required. The supplied regulator comes preadjusted to 11.0" WC., but should always be checked at time of installation. To adjust the pressure regulator, remove the cover (O1) and turn the disc (O2) to the right in to increase the pressure, and to the left to decrease.

The cover protects the mechanism and also acts as a diaphragm vibrations stabilizer during gas flow. When missing, unwanted noises can occur. Vent hole in the center of the cover must always remain open.

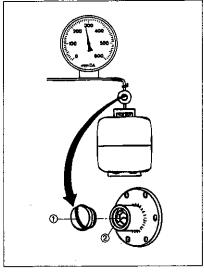


FIG. O

GAS PRESSURE

The specified fuel is propane and the supply pressure is 11" of water column at sea level. At higher altitudes, we recommend that the pressure be increased according to the following table:

	The state of the s	AND AND A CAST PROPERTY	and value 19
4 (717) (75)		DEFECTION.	
ALTITUDE	1	PRESSURE	
2. 2.2.2	The second second		
0-3,280		11"WC	
			*
3,280'-6,5	እስ'	11.8" WC	111
0,200 0,0	JU	1	
161666	4.0	3.0833200	
6,560-9,8	4U	ID WC.	
CAN SELECT COURT OF THE PARTY OF	The second of the second of	STATE OF THE PARTY	BENEVAL STREET

If gas pressure is not adequate for correct operation, replace injector with one calibrated for specific altitude.

PRESSURE MEASUREMENT

Pressure can be measured in two ways: by means of a pressure gauge with a scale in inches of water column (In. WC) or with a water column manometer.

PRESSURE GAUGE - The pressure gauge scale should read from 0" to 24" WC. Connect pressure gauge between regulator and refrigerator inlet (P). The gauge should read between 11.0" and 13.0" WC, based on altitude (see previous table).

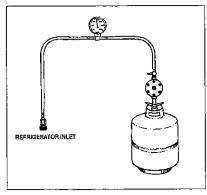


FIG. P

INSTALLATION INSTRUCTIONS - CONTINUED

MANOMETER - Follow manufacturers instructions for set up of the manometer. Make sure unit is perfectly zeroed.

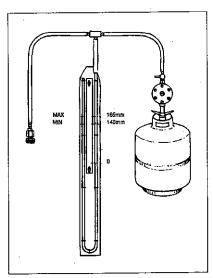


FIG. Q

Connect pressure gauge outlet hose to the refrigerator inlet (Q). Check if the water is level on both sides of the hose, and at zero on the ruler. Open the valve slowly, and light the burner.

Determine the number of inches the water rose and multiply by two. The result should be between 11.0" and 13.0" WC, based on altitude (see previous table).

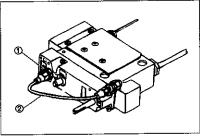


FIG. R

The previous measuring methods are used to adjust the gas pressure at the burner inlet. To measure the pressure at the valve outlet, unscrew the front screw (R1) to connect a gauge or manometer hose. A pressure fall of ¼" WC is considered normal.

NOTE: In some cases, an adapter tube (**Z2**) from the ATC to the support rear part makes measurement work easier.

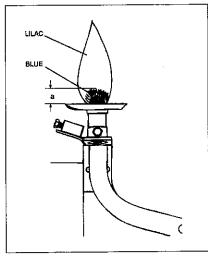


FIG. S

FLAME ADJUSTMENT

The gas burner has an Automatic Temperature Control (ATC), manufactured to international standards. The flow is preadjusted at the factory. The only way to increase or decrease the flame is by varying the gas pressure at the regulator, as described earlier.

If in doubt about the quality of the flame a visual inspection should be made. The height of the blue flame (S) must be approximately ½" to 3/4". It must be close to the burner screen, without too long a tip. The side of the flame should be light lilac. If the flame is yellow, too high or too low, see "Troubleshooting".

ATTENTION!: In a polluted environment (dust particles, fumes, gases etc.) a yellow flame may occasionally occur. This type of flame is not continuous.

TESTING

Now test the refrigerator operation. Operate the refrigerator according to the instructions and let it run for at least 30 minutes.

LEAKS - Meanwhile, check for leakages in the connections from the gas inlet to the injector using a mixture of water and detergent or a commercial leak detector solution.

FLAME - Inspect the quality of the flame (see "Flame Adjustment" above).

SAFETY DEVICE - Test the operation of the safety device. The device is a safeguard that causes the flow of gas to be interrupted in the event of any error (poor electric contact, thermocouple away from the flame, or the like). Even so, it should be checked for proper operation when the refrigerator is installed, and then periodically. Proceed as follows:

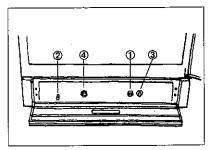


FIG. T

Allow the refrigerator to operate with high flame, and the thermostat (T1) set to coldest position.

Close and then immediately open the selector valve (T3). The flame will be extinguished, but gas will still be supplied. If you are in doubt, actuate the igniter (T4) and see the flame light up. Wait a few minutes, repeat these two steps and do as follows:

Listen carefully. In about 30 to 40 seconds you will hear a very slight but distinct "click" when the valve closes.

Actuate the igniter; the flame will not light up.

IGNITER - Check the spark of the piezo igniter and ensure that the cable is securely attached to the electrode.

Return the refrigerator back to its permanent position.

REVERSING THE DOOR

- 1. Remove the control panel (U7).
- 2. Remove (disengaging) the upper hinge cover (U1).
- Remove the upper hinge (U2).
- Remove the freezer door.
- Remove the middle right hinge and the door stops (U3).
- 6. Remove the refrigerator door.
- 7. Remove the lower hinge (U5).
- Remove plastic covers that cover the middle and upper hinge holes on the left, and insert them in the right side holes.
- 9. Remove the door covers and bushes, inverting their positions (right/left and vice-versa).
- 10. Assemble the lower hinge.
- 11. Place the refrigerator door into the lower hinge.

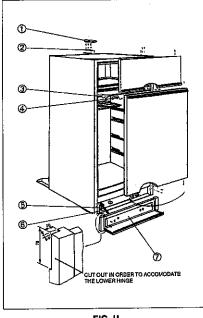


FIG. U

- 12. Assemble the middle left hinge (U4) - this part comes together with the refrigerator - as well as the door stops.
- 13. Place the freezer door onto the middle hinge.
- 14. Assemble the upper hinge.
- 15. Align the door with the upper and intermediate hinges in order to obtain a perfect sealing all around the magnetic gas-
- 16. Place the upper hinge cover.
- 17. Cut the left side of the control panel where indicated.
- 18. Assemble the control panel, checking for the correct position of the reflector (U6) in its support on the lower rear part of the refrigerator.

OPERATION & CONTROLS

ATTENTION!: The use of an external flame is extremely dangerous and the manufacturer is not responsible for any damages caused as a result of the non-observance of this recommendation.

With the refrigerator properly installed and the gas supply connected proceed as follows to start it up:

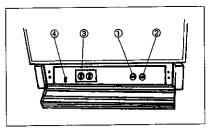


FIG. V

Set thermostat dial (V1) to the coldest position.

Press the selector valve knob (V2). and rotate it to the "OPEN" position.

Keep selector valve knob (V2) pressed while operating the piezo igniter (V3) a few times until the flame light up.

Sparks can be seen at the reflector (V4) which will show a blue light when the flame is alight. If no spark is

noted, see "Troubleshooting"

Keep selector valve knob (V2) pressed for five seconds. Then release it and check whether the flame is still burning.

if the flame goes out, repeat the process, pressing selector valve knob (V2) for ten seconds after the flame is lit. If it still goes out when the knob is released, it is a sign of a faulty safety device. Check the thermocouple for defect or incorrect positioning. If defective, replace it.

The first time the refrigerator is operated or whenever a repair is carried out on the gas supply system, it is possible that air may enter the lines, which will require a little more time for the flame to light. Hold selector valve knob (V2) pressed for one to two minutes while operating piezo igniter (V3) every three to five seconds.

NOTE: The operation of an absorption refrigerator is noiseless; it is impossible to hear whether it is working or not. However, within one hour, the bottom of the freezer should begin to aet coid.

The lowering of temperature to operating temperature takes from six to twelve hours, depending on room temperature. After that, set the thermostat to an intermediate position.

We recommend that you refrain from filling the refrigerator with food at least during the first few hours of operation. Even when it is operating on a permanent basis, it is not advisable to fill it at once with very large amounts of food.

Food must be properly packed, mainly the food which is to be stored in the vegetable drawer.

Avoid covering shelves with towels, plastic or trays. They will prevent air circulation inside the refrigerator, impairing its operation.

Be careful when placing bottles that contain liquids, especially liquids with gas, inside the freezer. Liquids expand when they freeze and may break the bottles.

TEMPERATURE CONTROL

During normal operation conditions, the thermostat dial (V1) must be set within the range of 1 to 2. On very hot days, or when the refrigerator is used a lot, set the thermostat (V1) to the coldest position of the scale. Low room temperatures require its setting at the beginning of the scale.

CLEANING, DEFROSTING, MAINTENANCE

IMPORTANT: To keep your refrigerator operating safely and efficiently and to avoid odor buildup or changes in the taste of food, a simple program of periodic maintenance is recommended. Follow this program at least once every two months, and after a season of continued use and/or before the refrigerator is to be stored for some time.

The periodic program consists of:

- √ Cleaning
- ✓ Defrosting
- ✓ Maintenance

CLEANING

Remove ice cubes at least once a month. They change color and create a kind of smell if left for a longer period of time.

Clean the inside of the refrigerator with a cloth damped in a solution of one soup spoon of mild detergent or soap for every two liters of warm water.

Clean the outside with a damp cloth and mild soap. Dry it with a clean cloth.

Do not use abrasive products. Do not wash parts of your refrigerator in a dishwasher.

DEFROSTING

After some time, ice builds up on the evaporator fins, lowering the performance of the refrigerator. Whenever the ice layer exceeds %" defrosting is necessary. There are two ways to defrost:

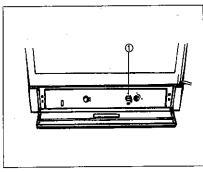


FIG. W

PARTIAL DEFROSTING

In order to defrost, it is not necessary to remove food from the refrigerator and the freezer. Simply set thermostat dial (W1) to the defrosting position, preferable in the evening, allowing it to remain in this position for a few hours.

The refrigerator will operate with a low flame and still provide refrigeration to the freezer. The fins will defrost and the water will run down a drain on the rear of the refrigerator to a number of evaporating containers), where it collects and dries away automatically.

After a few hours, check the fins to make sure that they are free from ice and then set the thermostat back to its normal position of 1 to 2.

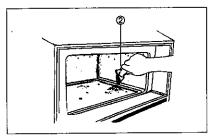


FIG. X

The freezer requires less frequent defrosting. Use the plastic scraper (X2) to remove ice from the walls. To defrost it, see "Total Defrosting".

IMPORTANT: If more than 50 percent of the evaporator fin area is taken up by ice, the drip tray should be reversed so that melted water can be collected by a suitable container placed on the upper shelf to avoid overflow of the evaporation container, which total capacity is just about one liter, reversed so that melted water can be collected by a suitable container placed on the upper shelf to avoid overflow of the evaporation container, which total capacity is just over one quart.

TOTAL DEFROSTING

Total defrosting should be made every two months according to the following instructions:

Switch off the gas at the selector, and remove the food from the freezer and the refrigerator (including the ice trays).

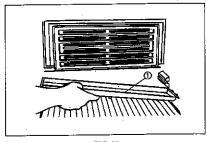


FIG. Y

Reverse the drip tray (Y1) so that the drain hole is toward the front.

Place a container under the drip tray (Z) to collect the water as the ice melts down. Leave the doors open until all the ice has melted and then remove the container.

NOTE: If there is the need for faster defrosting, remove everything from the

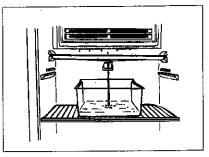


FIG. Z

freezer and keep it in a container with thermal insulation or wrap it in paper or cardboard. Place a container with hot water inside the freezer. The hot water may be renewed to speed up defrosting.

Clean the refrigerator on the inside with a damp cloth and dry it out.

Before starting the refrigerator again, make sure that the drain, located between the freezer/refrigerator compartment, is not clogged with ice. Also see that the drip tray (Y1) is returned to its normal position. Then restart the unit.

We recommend that maintenance of the refrigerator be performed on this occasion. If the refrigerator is to be left out of operation for some time, leave the doors slightly open, and remove the batteries in the light box.

ATTENTION!: Do not use sharp, and metal objects to remove the ice. They may damage the refrigeration system. Do not remove inside cover when cleaning. Food contact with coiled can be dangerous.

PERIODIC MAINTENANCE

It is convenient to perform periodic maintenance when total defrosting of the refrigerator is done.

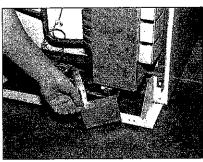


FIG. AA

- Disassemble the flame protector cover (AA). Remove the retaining screw, lift the cover, the pull it outwards.
- 2. Place a cloth (BB) over the burner tip.
- B. FLAME TUBE MAINTENANCE -Remove the flue retaining screw and lift the flue (CC) off the flame tube.

CLEANING, DEFROSTING, MAINTENANCE - CONTINUED



FIG. 89

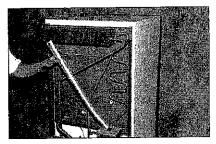


FIG. CC

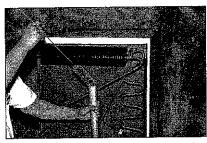


FIG. DD

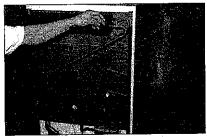


FIG. EE

- Clean the flue (DD) by running the brush supplied through it.
- Remove the wire with the deflector and choke from the flame tube (EE). Inspect the assembly and clean of burnt dust and surface corrosion. The baffle tip must be intact. If corroded, have it replaced.
- Run the brush through the flame tube (FF) several times to eliminate all soot.
- Reinstall the wire with deflector and choke. Make sure that baffle wire fits into its slot. Replace the flue and retaining screw. Remove the cloth from the burner tip.
- BURNER MAINTENANCE -Clean the openings and the wire mesh of the burner with a toothbrush (GG).
- Clean and inspect the electrode (HH4) and the thermocouple (HH3). If they are corroded, have them replaced. Make sure that they are properly secured and tighten them as required.
- Replace the flame protector and reinstall screw.
- 11. ADDITIONAL CHECKS Check the spark of the piezo igniter. Ensure that the cable is securely attached to the electrode. If corroded, have them replaced. Make sure that they are properly secured and tighten them as required.
- Check gas connections for leakages.
- 13. Relight the unit (see "Installation

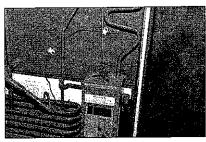


FIG. FF

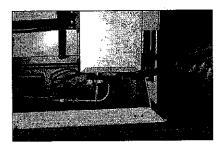


FIG. GG

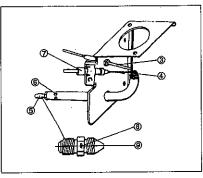


FIG. HH

and Operation Manual") and observe the flame; it must be clear and blue. If not, adjust as outlined in "Installation Instructions"

 Check the safety device as described in "Installation Instructions".

ELECTRICAL CONVERSION KIT

The gas refrigerator can be converted into an electrical refrigerator through an electrical kit. This kit consists of electrical resistance, thermostat, electrical wiring, screws, etc.

Before installing the electrical conversion kit on the refrigerator, check with the local authority having jurisdiction whether the kit is approved to be used.

Determine whether the unit voltage is compatible with the power supply voltage.

ATTENTION!: Use an exclusive wall outlet. Do not connect your refrigerator to extension cords or together with any other appliance in the same wall

outlet. Do not splice the cord.

The power network connection requires cord 14AWG or equivalent according to official standards.

For complete safety all appliances must be properly grounded. Connect the refrigerator ground wire (green wire at the rear bottom of the refrigerator) to an effective ground according to local standards.

For thermostat grounding see "Thermostat Installation".

INSTALLATION PREPARATION

Place the refrigerator so that you can reach the rear and front parts.

1. Remove the flue (II1).

Remove the baffle set from the flame tube (II4).

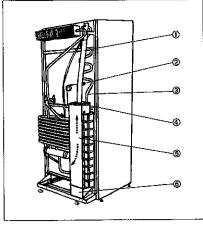
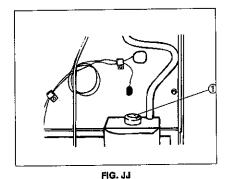


FIG. II

ELECTRICAL CONVERSION KIT - CONTINUED



3. Place the cover (JJ1) on the flame

NOTE: If the refrigerator is converted back to gas, the cover (JJ1) must be removed, the baffle set and the flue must be reinstalled.

ATTENTIONI: Never use gas and electricity at the same time.

HEATING RESISTANCE

- 4. Remove screw (II6).
- 5. Remove cover (II5) lifting it, then pulling it outwards as indicated by the arrows.

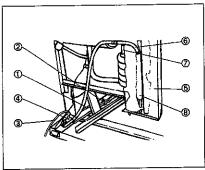


FIG. KK

- 6. Remove the fiberglass (KK5).
- 7. Place the heating resistance (KK6) properly in the receptacle (KK8) until its horizontal part fits into the heater box cut (KK7).
- 8. Replace the fiberglass (KK5), the cover (II5), and the screw (II6).

POWER SUPPLY CORD

- Connect the fixing bushing (KK4) to the power supply cord (KK3), 4" from the tip of the cord. With pliers, install the bushing on the refrigerator left rear support.
- 10. Connect one power supply cord terminal to one resistance terminals. Connect the other power supply cord terminal to one of the two thermostat conductors and connect to the second thermostat terminal.
- 11. Connect the remaining thermostat conductor to the resistance terminal.

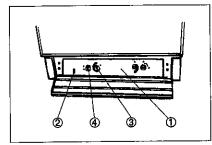


FIG. LL

THERMOSTAT INSTALLATION

12. Remove the panel (LL1) and the reflector (LL2). Remove the four fixing screws.

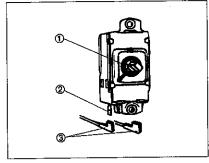


FIG. MM

13. Connect the two shunting conductors (MM3) to the thermostat terminals (MM2).

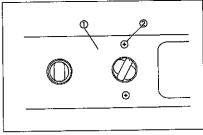


FIG. NN

- 14. Assemble the thermostat to the support (NN1). Make sure thermostat connection terminals are positioned facing down.
- 15. Attach the thermostat with two self-locking setscrews (NN2).

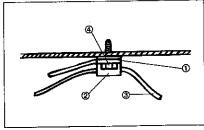


FIG. QQ

16. Place the ground wire (green) on the largest terminal at the rear of the thermostat. Attach the other round terminal end (OO1) to the bottom of the refrigerator, under the clamp (OO2) that holds the

piezoelectric igniter wire (003). Make sure the lock washer (OO4) is positioned between the terminal and the bottom of the refrigerator, effectively grounding of thermostat.

- 17. Fit the plastic bushing on the thermostat (MM1) shaft.
- 18. Slide the command knob (LL3) onto the plastic bush.
- 19. Cut the control panel as indicated.
- 20. Attach the self-adhesive label (LL4) on the control panel.
- 21. Assemble the control panel (LL1) with the reflector (LL2) in place and fitted on its support on the lower rear part of the refrigerator.

BULB INSTALLATION

The bulb is in the form of a coil on the rear part of the thermostat. It must be uncoiled backwards from the refrigerator without bending or kinking.

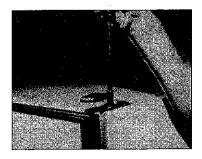
- 22. Insert a cylindrical object in the coil. Pull it with both hands in your direction, uncoiling the capillary.
- 23. Run the capillary between the absorption system and the cabinet to hole (II2).
- 24. In the hole (II2) replace the thermostat capillary with the thermostatic valve capillary. Keep the capillaries fixed to the refrigerator (B). NOTE: if you wish your refrigerator to operate with gas again, substitute the capillary in hole.
- 25. Close hole (II2) with a sealing compound.

ATTENTION!: The excess of shunting conductors from the thermostat must be connected with the piezo igniter by the clamp (OO2) located under the cabinet.

FINAL ARRANGEMENTS

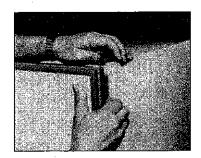
- 26. Connect the two terminals of the resistance wire (KK1) to the shunting conductor (KK2).
- 27. Connect the power supply cord to the wall outlet.
- 28. Set the thermostat to its coldest position.
- 29. The refrigerator current must be approximately 2.2A for 127V, and 1.3A for 220V. In the absence of an ohmmeter, check the pre-condensor tube (II3); it must become hot in 20 min.

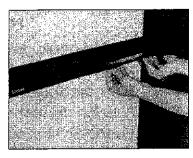
REFRIGERATOR DISASSEMBLY



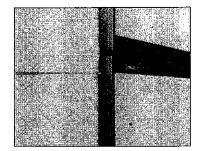
DISASSEMBLING THE REFRIGERATOR

- Remove the hinge cover. With a 5/16" socket wrench, remove the screws.
 - 2. Lift the hinge, and remove the freezer



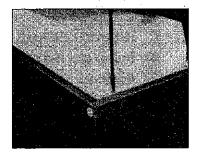


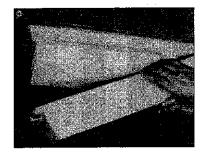
- The door insert is glued. To remove it, gently pull it from underneath edge.
 - 4. The screws that attach the plastic trim to the door do not release the frame after removal.



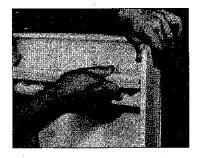


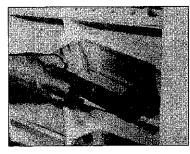
- 5. Starting at the center of the freezer door, remove the gasket manually.
 - **6.** With a ½" socket wrench remove the screws from the panel.



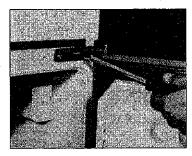


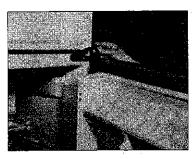
- Remove the panel and insulating complement.
 - 8. Remove the refrigerator door rails bending them slightly in the center.





- 9. Remove the egg tray.
 - 10. With a 5/16" socket wrench loosen the middle hinge screws.

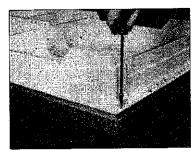




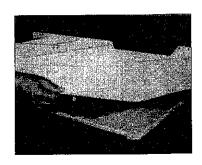
- 11. Remove the refrigerator door.
 - 12. Starting at the center of the door, remove the gasket manually.

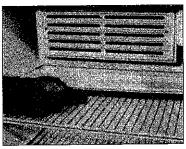


REFRIGERATOR DISASSEMBLY - CONTINUED

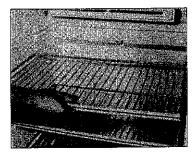


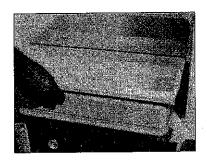
- **13.** With a 1/4" socket wrench remove the screws from the panel.
 - **14.** Remove the panel, and keep it in a safe place.



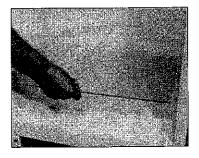


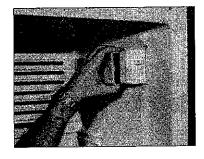
- 15. Remove the drip tray...
 - 16....the shelves...



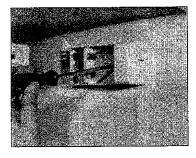


- 17. ...the humid drawer...
 - 18. ...and the glass cover.



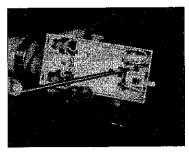


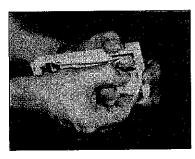
- **19.** Remove the light box reflector on the rear.
 - 20. With a screwdriver release the box.



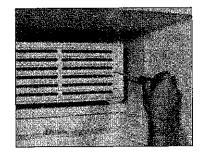


- 21. Remove the bulb.
 - 22. Disconnect the terminals with a screw-driver.

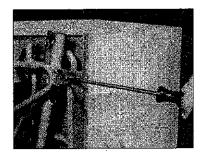




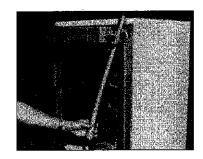
- 23. Simultaneously press the side spring and pendulum between the fingers pull outwards.
 - 24. With a 1/4" screwdriver remove the two evaporator cover screws.

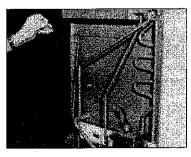


REFRIGERATOR DISASSEMBLY - CONTINUED

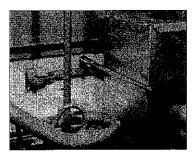


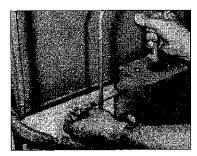
- 25. With same screwdriver remove the screw that attaches the flue.
 - **26.** The flue is dismounted and removed underneath.



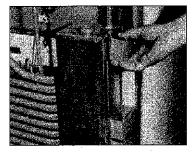


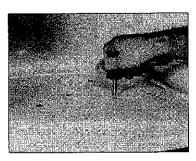
- 27. Remove the flame tube deflector. NOTE: The wire with throttle and the deflector are essential to good gas performance.
 - 28. With a 1/4" socket wrench remove the drain duct.



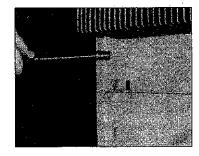


- 29. Remove the heater and remove from the cabinet. Remove the drain on the left side.
 - **30.** The evaporator boxes are suspended. Remove from the bottom upwards.





- 31. With a small Phillips screwdriver remove the four screws holding the evaporator plate sides. Loosen The remaining screws.
 - **32.** With a 10mm socket wrench remove the screws that hold the system to the cabinet.





- **33.** The system is suspended by the absorber tube being pulled to the outside of the cabinet.
 - 34. When reassembling, the rubber gaskets and the caulking compound must be carefully seated around the door openings to ensure a perfect seal.

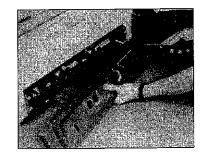


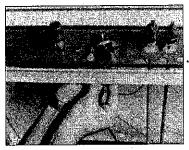
REFRIGERATOR DISASSEMBLY - CONTINUED



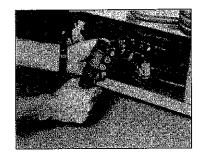
ELECTRICAL KIT DISASSEMBLY

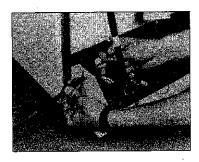
- Carefully bend the control panel door at the center, and disengage both sides.
 - 2. Remove the control panel side screws.



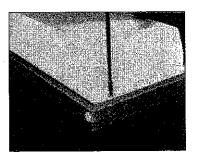


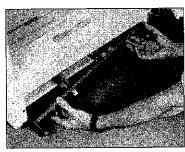
- When the screws are removed, the thermostat is released from the support.
 When reassembling, the thermostat should be mounted with its terminals facing downwards.
 - After releasing the bulb from the clamps, wind it on a 1%₆" diameter round gauge.





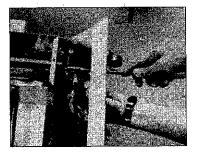
- Press the power supply cord bushing until it releases from the hole.
 - The electrical kit can be removed with the heater cover and the fiberglass in place.

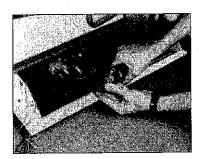




GAS KIT DISASSEMBLY

- The control panel support can be disassembled by removing the knobs and side screws.
 - 2. After the cover is removed, remove the burner from the refrigeration system.





- After releasing the bulb from the clamps, wind it on a 1%^a diameter round gauge.
 - 4. When the thermostatic valve side screws are removed, the assembly can be removed.



OPERATION PRINCIPLE

INTRODUCTION

An absorption refrigeration system is composed of four components; heater, condenser, evaporator and absorber. The manufacturing of these components and the assembling of the system demand sophisticated, high-precision equipment.

- Rich Solution (Provides the Heater)
- Poor Solution (Returns from Heater)
- Ammonia Vapor and Water
- (Ammonia Vapor
- Liquid Ammonia
- Hydrogen
- (Hydrogen and Ammonia Vapor

Legend to symbols used in figures.

Our absorption system works with a refrigerant solution formed by three ingredients; an absorbent (distilled water - H₂O), a refrigerant (ammonia - NH₃) and an anticorrosive (sodium chromate - Na₂CrO₄).

Besides the refrigerant solution, a small amount of hydrogen is added. The hydrogen is essential to the system, causing expansion of the ammonia in the evaporator.

The operation of an absorption systems is thermodynamic. Thermal energy (heat) is required to make the refrigerant solution flow. When heat is introduced into the heater-tube of the system, the ammonia boils and passes into the condenser.

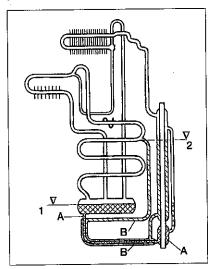


Fig. PP - Position of the refrigerant solution when the system is not operating.

Absorption refrigerators work with three different energy sources; electrical (110VDC), gas (LPG) and kerosene.

REFRIGERANT SOLUTION WHEN SYSTEM IS NOT OPERATING (FIG. PP)

Note that tubes A and B are shown in two different points. The solution inside tube A does not mix with the solution inside tube B since both solutions are at different levels. The circuit of tube A maintains the same level as the tank (PP1), and tube B maintains the same level as the absorber inlet (PP2). During normal operation, these levels are the same but the refrigerant solution has different characteristics.

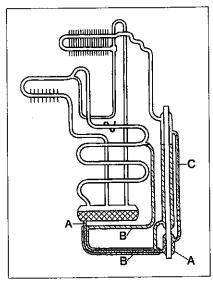


Fig. QQ - Position of the refrigerant solution when the system is operating.

REFRIGERANT SOLUTION WHEN SYSTEM IS OPERATING (FIG. QQ)

When the burners are lit or heating resistance is on, a quantity of heat is generated in the heater tube, warming the refrigerant solution from the tank. The motion of the solution inside tube A is connected only to the tank (rich solution). When the solution enters tube C, it is warmed and impelled up. The rich solution from the tank has a concentration of approximately 34% ammonia, the rest being distilled water. Ammonia evaporates before water, and the ammonia vapor under high temperature carries water through tube C.

CIRCUIT OF POOR SOLUTION (FIG. RR)

The ammonia evaporates and carries the Poor Solution (water) together through tube C. The boiling point of water being higher than the boiling point of ammonia, the water vapor

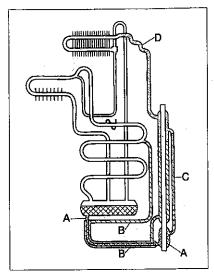


Fig. RR - Circuit of poor solution

does not go up to the condenser. When the water goes out tube C (pump tube), it travels through the absorber. As there is communication between the tubes, the level of tube B equals the level of the absorber tube. Ammonia gas an lower boiling point and density (weight) than water and so does not go down naturally through tube B (tube of the poor solution). The ammonia vapor travels up through tube D (pre-condenser) and afterwards to the condenser.

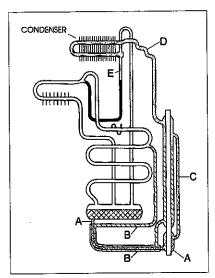


Fig. SS - Condensation of the ammonia vapor and the ammonia tube.

CIRCUIT OF LIQUID AMMONIA (FIG. SS)

After being separated from the water in the heater, the ammonia passes to the condenser through tube D, the pre-condenser (retifier). It functions to condense the water vapor that is carried by the ammonia vapor. The condenser water vapor returns naturally to tube B and goes to the absorber. The

OPERATION PRINCIPLE - CONTINUED

ammonia vapor goes to the condenser. The condenser is constructed of coil-shaped tubes with fins. The fins exchange heat with the ambient air. The vapor in the condenser outlet flows through the tube E of ammonia and to the evaporator. Notice that the level of liquid ammonia in tube E is the same as the evaporator inlet.

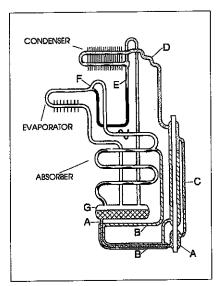


Fig. TT - Circuit of poor solution and hydrogen.

FUNCTION OF THE ABSORBER (FIG. TT)

The ammonia passes out of the tank and into the heater tube (tube C), where it is evaporated and then condensed in the condenser. The poor solution (water) returns through the tube B to the absorber inlet.

The Absorber is a coil-shaped tube which keeps the solution moving, permitting the circulation of the hydrogen.

There are two flows in the absorber; the poor solution going down and the hydrogen going up. The absorber performs a double function. First, when the poor solution passes down the tube of the absorber, it meets the hydrogen, saturated with ammonia vapor, moving up. Water, being an absorbent, removes the ammonia vapor from the hydrogen, lightening it and allowing its ascent to the evaporator. Second, the poor solution that returns from the heater tube (tube B) is poorer than the solution in the tank (container G). The absorber purifies the hydrogen, making the performance of the system better and the poor solution richer.

EVAPORATOR (FIG. UU)

The evaporator is made of coil-shaped tubes. The liquid ammonia, from the condenser flows through tube E to the

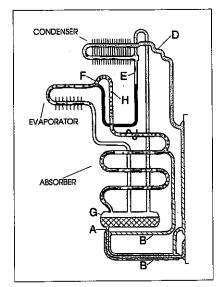


Fig. UU - Liquid ammonia and hydrogen entering the evaporator.

evaporator inlet F. The pure hydrogen passes up to the ammonia inlet through tube H. When the liquid ammonia goes through tube E and into tube F, it contacts a lower pressure, instantly expanding the ammonia.

Any gas, changing from liquid to gaseous state, absorbs heat. In an absorption system, this change cools the tubes of the evaporator. The evaporator pulls heat from the load (food, etc) inside the refrigerator.

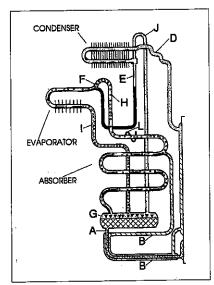


Fig. VV - Ammonia return to the tank.

RETURN OF THE AMMONIA (FIG. VV)

After evaporating, the ammonia joins the hydrogen. Since the ammonia gas is heavier than the hydrogen, they mix and proceed down through tube I. This heavy gas, then passes to the tank G, where it mixes with the poorer refrigerant solution. The poor solution in the tank then absorbs the ammonia.

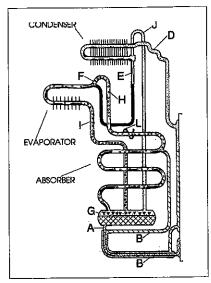


Fig. WW - Continuous operation of system.

NORMAL OPERATION (FIG. WW)

Let's look at a continuous, normal operation of the system.

The rich refrigerant solution (approximately. 34%), in the tank (G), passes through tube A and supplies the heater. In the heater, the solution is warmed, going up tube C and into the condenser to be condensed. It goes down through tube E and into the evaporator.

The water in the solution in the tank does not evaporate with the ammonia. The water, in poor solution (approximately. 15% NH₃) returns through tube B to the absorber, in the absorber, the poor solution is used to purify the hydrogen that ascends to the evaporator. In the evaporator, the ammonia evaporates, combines with hydrogen, becomes a heavy gas and returns to the tank through the tube I. The ammonia vapor goes down to the tank (G) and is immediately absorbed by the

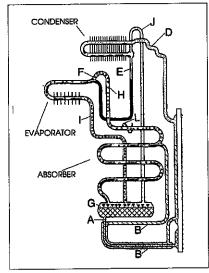


Fig. XX - Continuous operation of system.

OPERATION PRINCIPLE - CONTINUED

solution there. This solution begins again the process described previously, forming a continuous cycle.

FIGURE XX

NOTE: Illustrated In this figure are two tubes not previously mentioned, since they are not components required to

understand the normal operation of the system. Stabilizer tube J allows the ammonia vapor from the heater that did not reach condensing temperature to return to the tank. This will happen only when the refrigerator is incorrectly installed, restricting the circulation of air through the rear components of the system. The safety-valve tube L is a 15/64" tube, functioning as a kind of low fusion internal fuse (275° F). Located in a part of the absorber where only hydrogen circulates, it protects against explosion should the refrigerator be involved in a fire.

REFRIGERATOR SPECIFICATIONS

DIMENSIONS							
Height (without packaging)	57½°						
Width (without packaging)	23%"						
Depth (without packaging)	271/4"						
Door open at 90°	49%"						
Packed volume	26 sq. ft.						

USABLE CAPACITY								
Total	7.7 cu. ft.							
Refrigerator volume (net)	6.6 cu. ft.							
Freezer volume (net)	1.1 cu. ft.							

WEIGHT								
Gross	181 lbs.							
Net	165 lbs.							

AVERAGE AIR TEMPERATURES							
Refrigerator	40° F.						
Freezer	0° F.						
Thermal insulation	Polyurethane						

MAXIMUM WEIGHT ON COMPONENTS							
Doors	26 lbs, 8 oz.						
Shelves	17 lbs., 10 oz.						
Vegetable drawer cover (glass)	2 lbs., ¾ oz.						
Vegetable drawer	17 lbs., 10 oz.						
Freezer	33 lbs.						

GAS SPECIFICATIONS							
Gas type LP-Gas (propane)							
Gas pressure	11" WC to 13" WC						
Consumption (high flame)	1600 BTU/hr.						
Consumption (low flame)	700 BTU/hr.						

ELECTRICITY CONSUMPTION							
Electrical kit 5.35 kWh/24hr.							

Low performance	Excessive refrigeration	No refrigeration	Sweat on the tube that leaves the cabinet rear	Electrical shock	Slow to make ice cubes	Yellow flame	Excessive energy consumption	Burner does not go on	Flame goes out when releasing selector switch	tce build up in evaporator	Remains in the pilot flame (by-pass)	POSSIBLE DEFECTS PROBABLE CAUSES
												Voltage below tolerance
5												Refrigerator not leveled
1							_					Not enough air circulation (at rear)
					1							Too low a thermostat setting
												Poor gasket sealing
-									·			Partial leaking
												Door excessively opened
								-				Injector partially blocked
											4	Deflector and strangler missing
				.,								Too high a thermostat setting
											·	Buib not properly placed in tube
												Too high a flame
												No power supply at the wall outlet
												Too thick an ice layer
				,								Blocked system
				-		,						Broken thermostat bulb
	,											Current leakage at the heater
												Air inlet blocked
				-								Flue partially blocked
												No refrigerant gas
												Air in the tubes
												Electrode away from burner
												Defective piezoelectric igniter
												Gas leakage at connections
												Burnt out heater