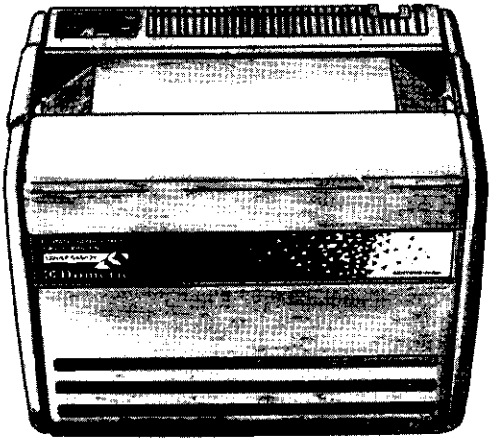
INSTRUCTIONS for INSTALLATION and USE of portable

REFRIGERATOR MODEL RC 2000



BEFORE USING YOUR PORTABLE REFRIGERATOR PLEASE READ THESE INSTRUCTIONS CAREFULLY! AND RETAIN THEM FOR FUTURE REFERENCE!

Dometic

820 950233-250KTL1194

Français au verso

This refrigerator runs on HD-5 Propane Gas and electricity (12 V d.c. and 120 V a.c.), it may be used in adequately ventilated indoor areas just as outdoors.

FOR YOUR SAFETY

If you smell gas:
1. Evacuate enclosure
2. Call for professional help

FOR YOUR SAFETY

Do not store or use gasoline or other flammable vapours and liquids in the vicinity of this or any other appliance.

WARNING!

This refrigerator consumes air (oxygen). Provide ample ventilation especially when sleeping. Do not use this refrigerator in unventilated areas for your own personal safety. Provide more ventilation for any additional fuel burning appliances and additional occupants.

Do not attempt to carry the portable refrigerator with the lid open.

Instructions for installation:

The design of this refrigerator has been certified by the American Gas Association.

Before using your refrigerator, you should wipe it inside and outside with lukewarm water containing a mild detergent. From time to time, the PVC-seal of the lid should be rubbed with a little talcum powder.

1. Installation:

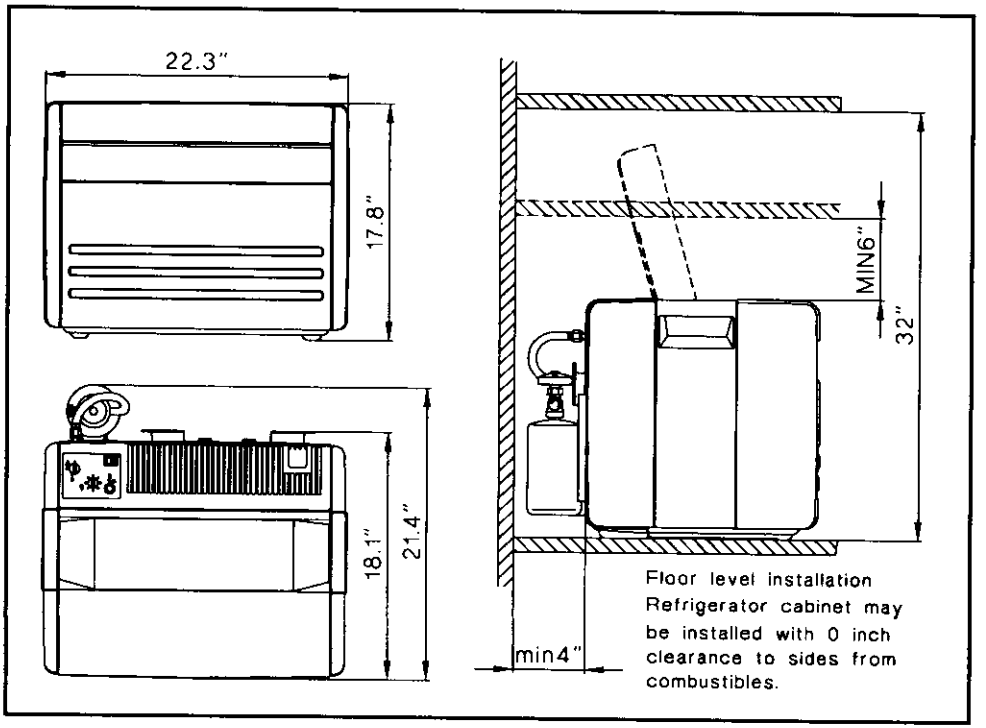
The installation of the refrigerator must conform to the following American National Standards, as applicable: **ANS Z21.74● - 1992** Portable Refrigerator; in Canada: **CAN 1-11.4, CAN 1-2.21.**

The overall dimensions of the refrigerator are given in Fig. 1.

For installation: for maintaining proper clearances between combustible material and the refrigerator, the following minimum clearances must be observed:

clearance from rear edge to outer casing of refrigerator:	4 inches
clearance above top of refrigerator lid:	min.6 inches
clearance at sides of refrigerator casing:	0 inches

Fig. 1. illustrates these minimum clearances.



The absorption cooling unit is cooled by convection and it is therefore vitally important that the air circulates freely over the unit and the air vent openings of the refrigerator are always kept open. The more ventilation you provide, the better the performance you can expect from the refrigerator.

Notes: Keep appliance area clear and free from combustible materials, gasoline and other liquids with flammable vapours.
Do not obstruct the flow of combustion and ventilation air.

Use a spirit level or a water-filled vessel to check that the refrigerator is standing level in both directions. This is important for satisfactory operation of the cooling unit.

2. Liquid Gas Operation:

This refrigerator is designed for a self-contained fuel cylinder of not more than 75 cubic inches (2 1/2 pounds nominal water capacity). The cylinder(s) must be made and marked in accordance with the specifications for LP-gas cylinders of the US Department of Transportation (DOT), DOT SPEC. 39 (49CFR 178.65). In Canada, with the Ministry of Transport and Communication.

The refrigerator may only be operated using a self-contained 14 or 16,4 oz. propane HD 5 gas bottle, which is to be connected to the refrigerator by means of the supplied manual control valve and the pressure regulator with hose. The gas burner is fitted with a jet No. 21 which is suitable for use with Propane gas at a supply pressure of 11 inches water gauge.

2.1 Connection of gas supply: (see Fig. 2 + 4, page 9 + 10)

a: fix the cylinder holder
b: fit the manual control valve (Fig. 2.2) with pressure regulator (Fig. 2.3) and hose to the self-contained gas cylinder (Fig. 2.4) finger tight.
c: connect the gas hose to the inlet (Fig. 2.5).
d: insert the gas bottle assembly into the gas cylinder holder.

Once connected all gas connections must be checked for leaks. This is done by placing a soapy solution on all gas connections, turn on the gas cylinder manual valve and watch for bubbles.

For the detection of leaks never use an open flame.

If the gas bottle is empty remove it from the bottle holder, unscrew the manual control valve/pressure regulator-assembly from the bottle and fit a new one.

3. Electrical operation:

When running on electricity the cooling unit operates by means of two separate 75 W heating elements, one for 120 V a.c., the other for 12 V d.c..

a) 120 V a.c.:
Warning: Electrical earthing instructions:

This appliance is equipped with a three-pin (earthing) plug to protect you from shock hazards and should be plugged directly into a properly earthed three-pin socket. Do not cut or remove the earthing pin from this plug.

The lead is approximately 5 feet long and an earthed three-pin socket should be installed in an accessible position within reach of the plug. Do not use any extension leads!

b) 12 Volts d.c.:
The current drawn is 7,0 amps. If the box is run on the car battery it is recommended that the refrigerator be operated only when the car engine is running. If the engine is stopped, the car battery will lose power and become flat.

The 12 V supply is protected by a fuse of maximum 16 amps.

The fuse is fitted into the carplug mounted on the connecting cable. The carplug is equipped with an adapter. This adapter can be removed to correspond to the various plug connectors: click off by turning in the opposite direction to the arrow and pull off axially.

4. Starting the refrigerator:

Do not operate the unit on two or more power sources (i.e. gas and 120 V or 12 V) **simultaneously.** The cooling unit will not operate properly in this case and damage may be caused.

4.1 Propane gas operation - lighting the burner: (Fig. 2 see page 9)

The gas system equipment consists of a multiple regulator unit (**B**): regulator with built - in - thermoelectric ignition control and the burner. The regulator knob (**B**) has three positions:

CLOSED - MAXIMUM - MINIMUM

a: open gas cylinder valve (**A**);
b: turn regulator knob (**B**) in anticlockwise direction to MAX. position;
c: depress knob (**B**) - ignition control - and keep it pressed down for about 20-30 seconds. The gas pipe to the burner is thus vented.
d: Keep knob (**B**) pressed down and ignite the burner by pressing the piezo gas lighter button (**C**) several times.

e: When the burner is lit, the red pointer of the flame indicator (**D**) is going from the white into the green field. When the pointer is in the green field, keep knob (**B**) pushed for another 20-30 seconds, then release it. Check that the pointer remains in the green field. Check the flame visually through the opening (**E**). If the flame is not burning, repeat ignition procedure.

f: If, for any reason, the gas flame goes out, the flame safety device works automatically and shuts off the gas supply. While the button (**B**) is depressed, this device is temporarily inoperative.

g: When a sufficient low temperature has been reached, the temperature can be diminished by turning the regulator knob (**B**) to MIN. position.

h: When the refrigerator is no longer run on gas, turn off the gas cylinder valve (**A**)

4.2 Electric operation: (Fig. 2 see page 9)

a: check that the gas cylinder valve (**A**) is turned off.

b: connect to the electricity supply with the correct voltage;
for 120 V a.c. operation turn electric thermostat knob (**F**) in the clockwise direction to pos.7
The 12 V circuit is not thermostatically regulated.
The knob (**F**) is useless for this energy source.

Note: To stop the electrical 120 V a.c. operation, turn electric thermostatknob (**F**) in the anti-clockwise direction beyond the point where a slight resistance is felt,to 0 setting. For safety reasons disconnect it as well. To stop the electrical 12 V d.c. operation, disconnect voltage supply.

After a sufficient period of maximum cooling set the electric thermostatknob to the middle position. The cabinet will now automatically maintain a suitable temperature for ordinary food storage. Usually, no further adjustment will be necessary, but in hot weather, or when more cooling is required, the knob must be turned to a higher position. If less cooling is required, the knob should be turned to a lower position.

5. Storing food in the refrigerator:

To prevent food drying out and flavours being transferred from one food to another, foods should always be stored in covered dishes, plastic bags or wrapped in foil or greaseproof paper. **Never put hot food into the refrigerator!** Avoid using large dishes and do not store food containers too closely together as this interferes with the circulation of cold air within the cabinet.

Under no circumstances should inflammable liquids and /or gases be stored in the cooler. Explosion hazard!

6. Defrosting and measures for prolonged periods of disuse:

A build up of too much ice on the evaporator hinders cooling of the unit and thus reduces effectiveness. Therefore, it is recommended to defrost the mobile cooler as soon as an approximately 5 mm thick layer of ice has formed. This is done by turning off the unit and removing any food or drink therein. Never use heated appliances, heaters, etc. to speed up the defrosting process! If necessary, a cloth dipped in warm water can be placed on the evaporator to help the defrosting process. After defrosting, clean up the defrosted water with a clean cloth and clean the cooler containers as described in chapter 7.

Should the unit be out of operation for a prolonged period, turn off unit and remove contents. After defrosting, the cooler should be cleaned carefully and dried.

To avoid any unpleasant smells forming in the cooler, the lid should be left slightly open.

7. Cleaning:

Clean the refrigerator thoroughly, as necessary, particularly when it is not going to be used for any length of time.
First defrost the cabinet as described in the previous item, then clean the cabinet interior and lid with a clean cloth wrung out in warm water to which mild, scentless washing-up liquid has been added. Wipe over with a clean cloth, dry thoroughly.
Do not place any plastic parts in water that is more than hand hot and do not expose them to dry heat.
The outside of the cabinet should be wiped with a clean, damp cloth and polished with a clean soft duster.

Never use strong chemicals or abrasive cleaning materials on any part of the refrigerator.

8. Measure after prolonged periods of disuse:

Should the mobile cooler not function correctly after being switched on, place the unit upside down without any connecting power supply. After a few minutes return the mobile cooler to its correct position and switch on again.
Should the unit still not function correctly, repeat the process several times.

Points to remember!

* If the refrigerator has been out of use for a length of time, check connections for gas leaks using soapy water - see item 2. Liquid Gas Operation.
* Never cover the air vents with cardboard or anything else.
* Remember to level the refrigerator otherwise the cooling unit will not perform and could be permanently damaged.
* If possible pre-cool the refrigerator some hours before putting food in it.

9. Maintenance:

Caution: Risk of electric shock. More than one power supply. Disconnect all power supplies before servicing.

L.P. gas equipment:

The burner (Fig. 3) is fitted with a jet No. 21 which is suitable for use with Propane gas at a supply pressure of 11 inches, water gauge. The orifice in the jet is very small and must never be cleaned by means of a pin or a similar instrument, as this could damage the orifice . Should the jet require cleaning for some reason, it should be washed in alcohol and blow through with air.

9.1 Cleaning gas burner and jet:

Once or twice a year, or depending on use, check whether the flame is blue-coloured. For this inspect the flame through burner flame opening (Fig. 2.E) a yellow flame is sign of a bad combustion. The procedure for cleaning the flue and the burner assembly, is as follows:

a: unscrew rear cover of refrigerator box.
b: Disconnect and remove gas pipe from the burner. For this operation you need a 13/32" (10 mm) spanner for the union nut (Fig. 3.1)
c: Unscrew the counter nut (Fig. 3.2) of the jet (Fig 3.3) with a 1/2" (12 mm) spanner and remove guard (Fig. 3.4).
d: Unscrew security plate (Fig. 3.5) of the burner pipe (Fig. 3.6) which is fastened by a screw, push the burner pipe from the jet and remove the jet from the boring.
e: Wash the jet with alcohol and blow through with air to check that the opening is quite clean. Do not use a probe.
f: Clean the burner pipe ensuring its combustion- and aeration openings are free from dust.
g: Refit all parts, ensuring the burner is properly retained. Gas connections should be tight, but not too tight. After replacing, check all gas joints for tightness as described in the next item.

All instructions under item 9.1 must only be made by an expert, preferably by a licensed gas fitter.

9.2 Checking for gas leaks:

Periodically, and after each service the entire gas installation should be checked for leaks. Test all pipe connections with soapy water (not with a flame), watching for bubbles - see item 2. Liquid Gas Operation.

9.3 Heaters:

Heat is supplied to the boiler of the cooling unit by two separate 75 W heaters, one for 12 V d.c. and one for 120 V a.c.. If a new heater has to be fitted, the procedure is as follows:

a: unscrew rear cover of refrigerator box.
b: Disconnect the 2 heater leads from the terminal block, make a written note of their respective positions and be careful not to disturb other connections.
c: Open the sheet metal case of the boiler insulation at the back of the refrigerator, free the heating element by removing the insulation from the tubes, then release the screw below the heating tube and pull it out (upwards).
d: Check that the new heater is the correct type, then place the heating element completely into the heating tube and tighten the screw.
e: Replace the boiler insulation, packing it around the tubes and close the boiler casing.
f: Connect the leads to the terminal block and replace the rear cover of refrigerator box, reconnect the refrigerator and test.

10. Trouble shooting:

If the refrigerator does not work satisfactorily:

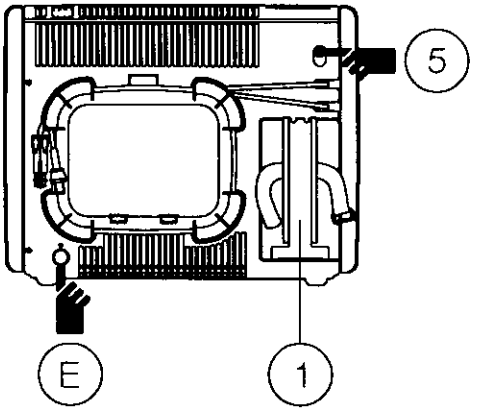
a: check that the refrigerator is level in both directions and that the correct clearances for air circulation at the back and above the top of casing have been allowed for - see item 1.
b: Regulatorknob (**B**) respectively thermostatknob (**F**) is incorrectly used - see item 4.1 + 4.2.
c: Evaporator heavily covered with ice - see item 6.
d: Air circulation around cooling unit restricted - see item 1.
e: Flame has gone out:
- Connection between thermocouple and flame failure device loose. Tighten union, but do not too tighten.
- Burner assembly loose ... refit.
- Jet orifice or combustion - and aeration openings of burner pipe clogged - see item 9.
- Faulty operation of the multiple regulator unit ... it will have to be replaced by a new one.

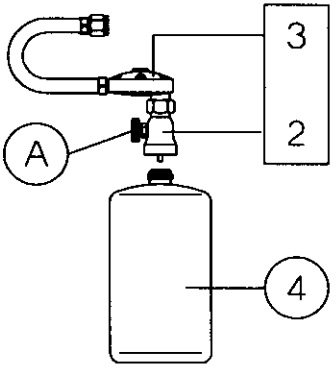
f: No performance on electric operation:
- defective heater - see item 9.3.
- Thermostat incorrectly used - see item 4.2.
- Faulty operation of the thermostat - to be replaced by a new one.
- Voltage drop due to a defective battery (12 V operation).

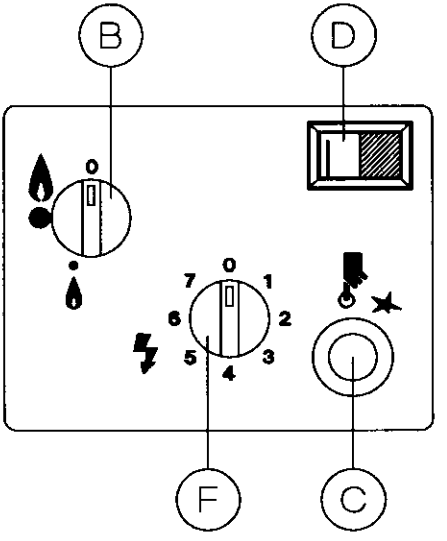
11. Spare Parts:

All spare parts such as burner, heating element, multiple regulator unit, thermostat and so on are available at your service center. The address of your nearest service center can be found in the enclosed booklet "Factory Authorized Service Centers For Dometic Refrigerators".

Fig. 2







① Gas cylinder holder
② Gas valve
③ Pressure regulator with hose
④ Gas cylinder
⑤ Gas connection inlet
Ⓐ Gas cylinder valve
Ⓑ Multiple regulator unit
Ⓒ Piezo gas lighter
Ⓓ Flame indicator
Ⓔ Flame control opening
Ⓕ Electric thermostat knob (120V/AC)

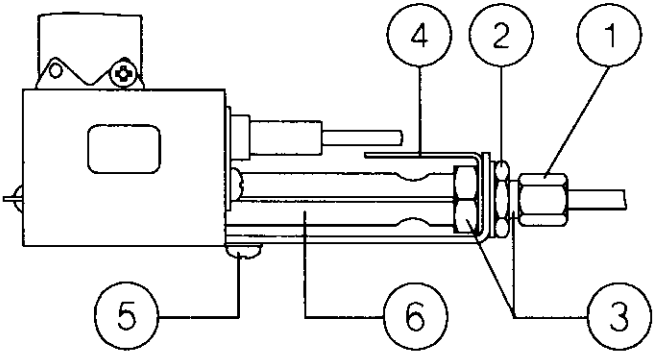
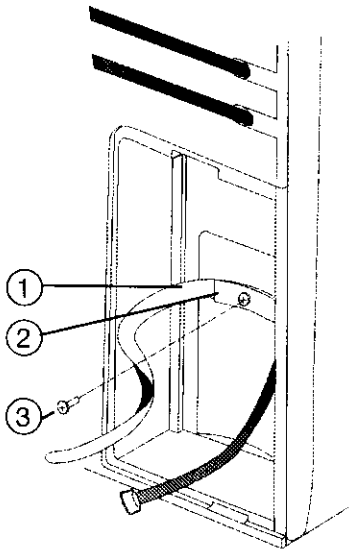
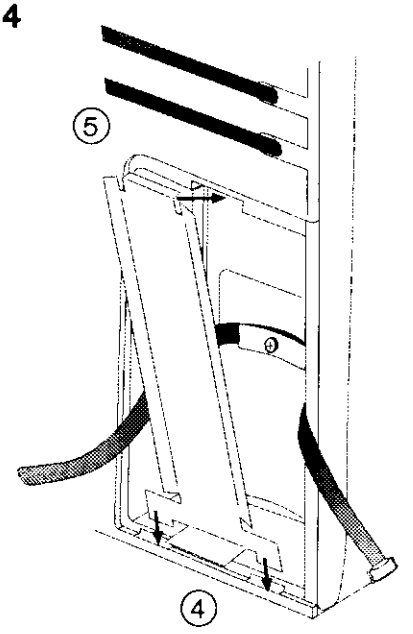
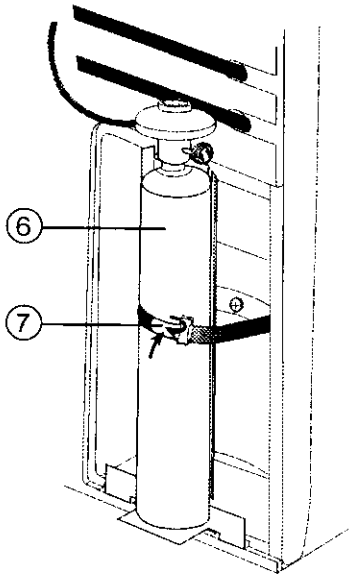


Fig. 3

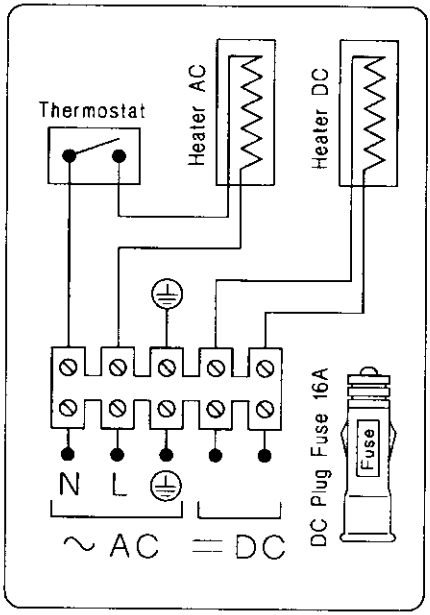
Fig. 4







Wiring Diagram



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