

Vertical Display and Storage

EB_CC “Cool Choc” Vertical Chocolate Coolers

2 and 3 Door Vertical Chocolate Coolers

ORIGINAL INSTRUCTION



EB30CC-Sn-A



EB36CC-Sn-A



EB45CC-Sn-A

MAN-IO-EBCC-A Rev. 1.0 October 2014 edition

E Series Bottom Mount Vertical Chocolate Coolers Installation and Operation Manual

MAN-IO-EBCC-A Rev.1 October 2014 edition.

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Installation and Operating Manual

Thank you for choosing these high efficiency refrigerators by The Orford Group.

The EB Series Refrigerators have been designed and built for both performance and efficiency using the latest technology in design, manufacturing and high quality materials.

If properly used and maintained to the requirements of this manual it should give you years of trouble free use.

Please take the time to read this manual carefully before installing and starting this appliance.

Please keep this manual in a safe place and refer to it and your Warranty information should it be required.

Please fill out for future reference

This information will be required for Warranty Service work to be authorised.

Purchased from:.....

Delivery Docket:.....

Series Model No.:.....

Item No.

Cabinet Serial Number:.....

Commissioning Date:.....

Place of Installation:.....

Owner of Cabinet:.....

Owners Address:.....

Owners Details: email:..... Phone:.....

This manual should accompany this appliance if it is sold or reinstalled in another location to ensure correct installation, use and maintenance procedures are followed.

Table of Contents

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	Page	Pages
Installation, Operation & Maintenance		1-19
Shipping Damage & Uncrating	5	
Insurance	5	
Warranty Information	5	
Installation	5 & 6	
Cabinet Positioning, Climate Class	7	
Dimension drawings	8	
Safety Information	9	
Electrical Requirements	9	
To Isolate Power & Ventilation	9	
Starting , Shelving & Product Loading	11 & 12	
Lighting & Manual Light Switches	13	
Condenser Fan Switch, How to Maximise Your Energy Savings, Control Setting	14 & 15	
Normal Operation & Alarms	16	
Maintenance & Cleaning	17 & 18	
Relacing Lights	19	
Operating Temperatures and Controls		15
Problem Solving		20
Check Before Calling for a Machine Service	20	
Problem Solving Checklist	20	
General Specifications, Energy Consumption & Disposal	21	21

The information contained within is provided for the benefit of users of these products. Keep this information in a safe place for future reference.

Product specifications enclosed are correct at time of publication. The Orford Group reserves the right to change specifications, in our endeavours for continuous product improvement. The Orford Group cannot be held responsible for errors or omissions in this document.

EB30CC-Sn-A / EB36CC-Sn-A / EB45CC-Sn-A

MAN-IO-EBCC-A Rev. 1.0 October 2014 edition

Shipping Damage & Uncrating

Remove upper packaging, leaving equipment on skid or shipping blocks until placed in desired location. Check for damage so that correct claim forms can be filed. Removal of upper packaging is necessary because damage may not be evident until equipment is unpacked.

Insurance Is Your Responsibility

Inspect packaging and equipment for signs of damage in transit. Notify carrier immediately regarding any damage. Everything leaving our factory is inspected and checked before packing. Everything leaving the factory will be insured by us on your behalf through the transport company's insurance unless notified by you in writing to the contrary. Transit damage is a matter between you and the Transport Company/Your Insurer where you have arranged your own insurance.

NOTE: You should sign "Received Damaged" on the delivery note if applicable.

Warranty

All equipment is tested prior to dispatch from the Factory. After receipt from the Transport Company and before delivery to the End User/Consumer, The Re-Seller (Distributor) should test run the product. Our warranty covers both labor and parts replacement for a period of 12 months (for non-corporate account customers as determined by The Orford Group).

Orford Warranties do not cover service calls resulting from poor maintenance or replacement of consumable part (s). Please refer to additional Warranty Information, or copies of any contracts, supplied with this equipment for more details.

NOTE: Ensure you consult the Problem Solving Checklist before making a Machine Service Call.

Installation

Remove equipment from skid or shipping blocks carefully. Do not use pinch bars on finish. Protect finish with heavy cardboard or similar material. When in position, equipment should be level and the weight evenly distributed over the base of the cabinet, legs or castors. This is necessary for proper door alignment and drainage of the evaporator condensate.

Installation

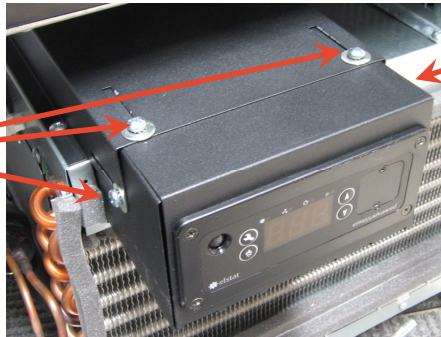
These refrigerators are shipped with the bottom front unit cover (kick panel) packed on top. This is done to protect the cover from damage during the shipment process.

The control is positioned back from the front of the refrigerator for the same reason.

Fitting Unit Cover (Kick Panel)

1. Open the door above the control and loosen the four screws shown below.
2. Slide the controller completely forward as shown below and retighten the four screws.

Control mounting screws



1. Close the door.
2. Place the unit cover at an angle so that the cover fits over the refrigeration package lifting levers.
3. Push the unit cover in at the top under the doors.
4. Fit the cover over the plastic dowels and push down to locate.

Refrigeration Package Lifting Levers

Plastic Mounting Dowels
(2 each end)



EB30CC-Sn-A / EB36CC-Sn-A / EB45CC-Sn-A

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Cabinet Positioning

Caution



This appliance is for indoor use only.

Locating it in a location exposed to rain may result in electrical leakage and electrical shock.

The appliance must be placed in an adequately ventilated location as far as possible away from heat sources, such as direct sunlight, radiators, cooking appliances etc.

Locating the appliance in accordance with its “Climate Class (es)”

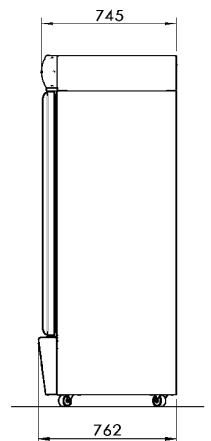
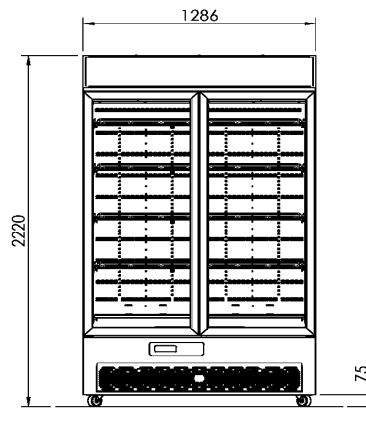
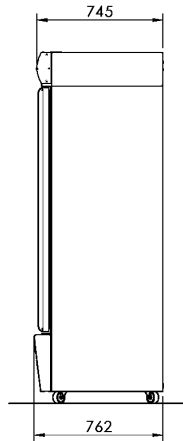
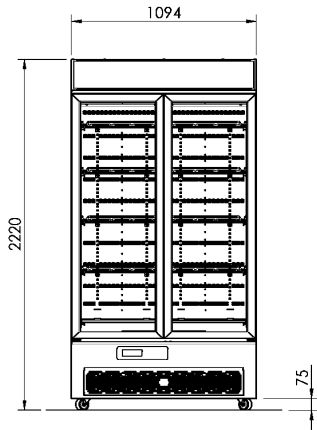
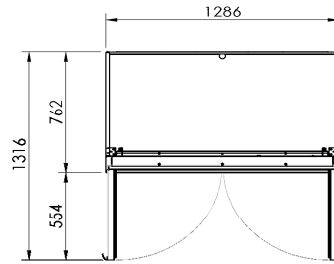
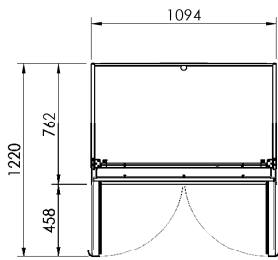
Climate class identifies the climate ambient conditions for which the appliance is suited

Important

TAKE TIME TO READ THE EXPLANATION OF THE MEANING OF “CLIMATE CLASS” BELOW.

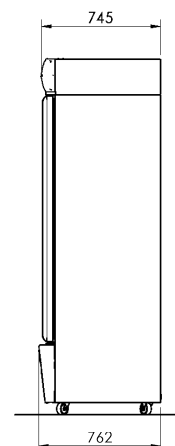
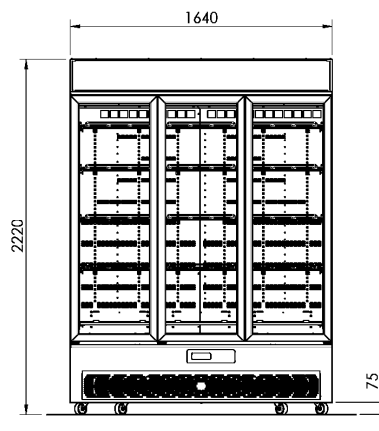
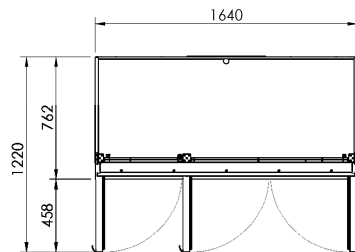
CLIMATE CLASS

Climate Class	Ambient Temperature °C	Ambient Humidity % RH.
0	20	50
1	16	80
2	22	65
3	25	60
4	30	55
5	40	40
6	27	70
7	35	75
8	23.9	55
* T	18 - 43	



EB30CC-Sn-A

EB36CC-Sn-A



EB45CC-Sn-A

EB30CC-Sn-A / EB36CC-Sn-A / EB45CC-Sn-A

MAN-IO-EBCC-A Rev. 1.0 October 2014 edition

Safety Information

- Do **NOT** use this appliance for other than its intended use.
- Do **NOT** probe any openings.
- Do **NOT** block or obstruct any openings or vents. (refer ventilation)
- Do **NOT** use double adaptors or extension leads.
- Do **NOT** overload the shelving. (refer Loading)
- Do **NOT** store explosive substances such as aerosol cans with a flammable propellant in this appliance.
- Allow adequate ventilation for the refrigeration unit. (Refer ventilation)
- These appliances are not designed to be stable when moving. Exercise caution when moving these appliances.
- Be careful not to touch moving parts and hot surfaces.
- Ensure the appliance is installed in a stable condition with the front castors locked.

Warning!	The Orford Group does not authorize the use of flammable refrigerants for servicing these refrigerators and freezers as injury, loss of life and/or property may result.
Warning!	This appliance is for indoor use only. Locating in a location exposed to rain may result in electrical leakage and electrical shock.
	Non qualified people must not attempt to work with electrical connections or attempt to adapt cables or leads. If the supply cord is damaged, the appliance must be repaired by an authorised person.
	Do NOT overload the power supply. Refer cabinet rating label for power requirements.

Electrical Requirements

- Make sure the cabinet wiring is connected to the correct source of power. Maximum current draw is printed on the unit rating tag and where equipment can be plugged into a General Purpose Outlet (GPO).
- The correct plug top for the required GPO will be supplied as part of the equipment main power cord.
- Always check line voltage on incoming power to make certain of proper voltage. The voltage should be within 5% of the voltage printed on the unit rating tag. The appliance should be connected to a dedicated outlet.

Power Requirements	Standard 10 Amp. Power Point	220V-240V	50Hz.
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EB30CC-Sn-A / EB36CC-Sn-A / EB45CC-Sn-A

MAN-IO-EBCC-A Rev. 1.0 October 2014 edition

To Isolate Power

- ◆ It is recommended that power be isolated by switching power off and unplugging the appliance from the power outlet.
- ◆ If the power outlet isn't accessible the power can be switched off at the green illuminated switch located in the unit compartment at the bottom of the appliance.
- ◆ **Warning:** Switching power off at this switch does not completely isolate the power to the cabinet but is sufficient for general maintenance.

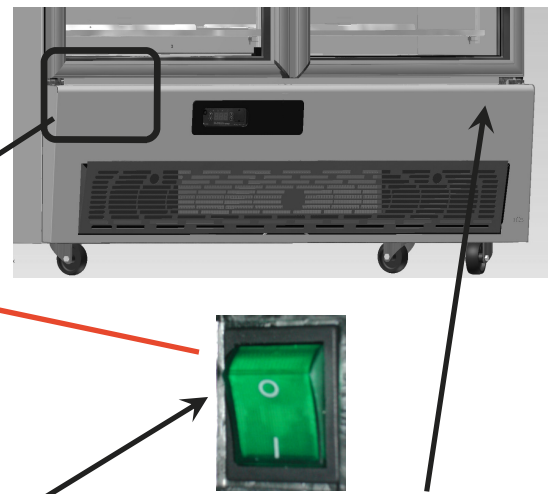
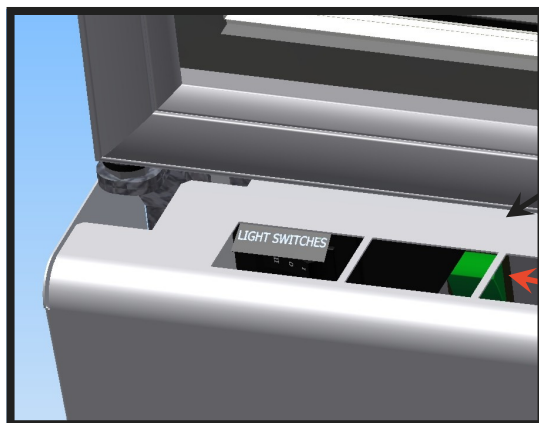
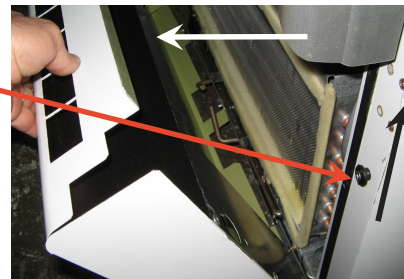
a) Remove the unit cover

Lift unit cover off mounting dowels

Pull forward at the top

Lift cover off.

Reverse to replace.



b). Switch power off at the green rocker switch

Ventilation

These refrigerators require proper ventilation of the refrigeration unit (Motor).

The EB series refrigerators are ventilated at the front. The front ventilation grill must be kept free on any obstructions at all times.

The EB series refrigerators will operate satisfactorily when ventilated only from the front but it is recommended that the cabinet be kept 50mm or greater from a rear wall for maximum performance and energy saving.

Self-Contained equipment should only be installed in rooms that are well ventilated or are of sufficient size to dissipate the heat generated by such equipment.

EB30CC-Sn-A / EB36CC-Sn-A / EB45CC-Sn-A

MAN-IO-EBCC-A Rev. 1.0 October 2014 edition

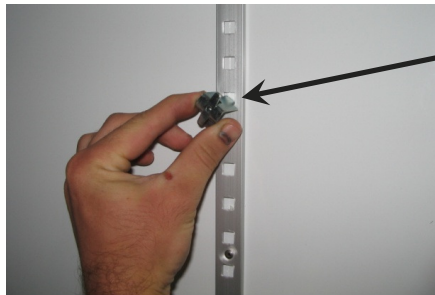
Starting

It is recommended that competent service people start up and check the equipment for correct installation and proper operation. All Self-Contained equipment is run tested in the Factory for proper temperature and operation, but it is possible that during transport or shipping damage, loosening of screws, shifting of control setting, etc, may have occurred.

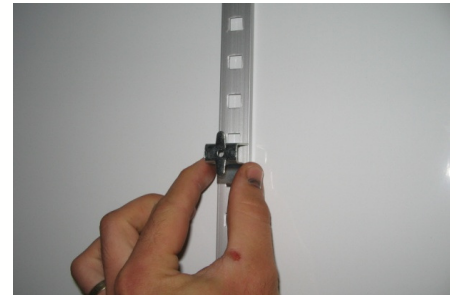
Shelving

The cabinets are supplied with wire shelving. Each shelf requires 4 shelf clips.

1. Insert the top of the shelf at an angle.
2. Turn and locate the bottoms as shown.

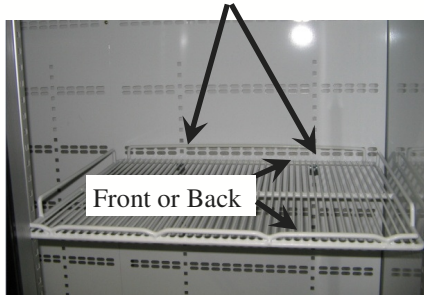


Shelf Clip



The shelves can be sloped forward to maximise display.

Fit the rear shelf clips to a higher level depending on the angle required.



Front or Back

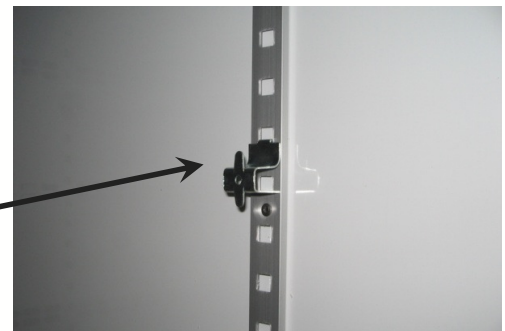
Shelves are provided with product stops on the front and back in two styles depending on the product to be displayed.

Shelf Clips



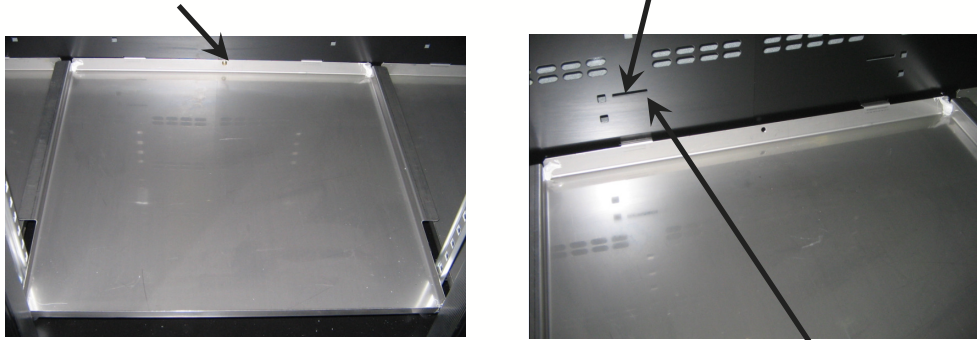
3. Sit the shelf over the shelf clips.

Note! The Shelf Clip Can Be Rotated 180 Degrees As Shown, To Have An Increment of 12mm.



Bottom shelf removal

1. Isolate power *Refer "To Isolate Power"*
2. Undo the screws and remove bottom shelf(ves) from the slots in the vertical rear duct.



3. Lift bottom shelf up, twist it at an angle and take it out.



Note: Multiple slots are provided in the rear duct to enable the bottom shelves to be angled forward.

4. Reverse steps to replace bottom shelves

Important

The bottom shelves **MUST** be fitted in their correct position as shown above, while the refrigerator is in use. The shelves are required for maintaining correct product temperatures and for catching breakage and spillage. Refer above for the correct fitting of the bottom shelves. **These shelves MUST never be placed directly on the floor while the refrigerator is in use.**

Product Loading

- **Never** overload the shelving. *Maximum 40kg. per shelf evenly distributed.*
- **Do Not** exceed the load limit as indicated.
- Product **must** remain within the confines of the shelving.
- Product **must** never be loaded on the cabinet floor or restrict the return air.
- Product **must** never be tightly packed on the shelving. Allow spacing between product for refrigerated air to circulate.
- Product **must** never be stacked tightly under the shelf above.

Lighting

Manual Light Switches are provided to change the lighting operation to suit your circumstances.



Control Light Switch

This switch will switch the lighting on and off depending on the position of the switches below.

This allow you to have the switches below set to your most frequent usage. The control light switch can then be used to switch the interior and sign lighting at the same time.

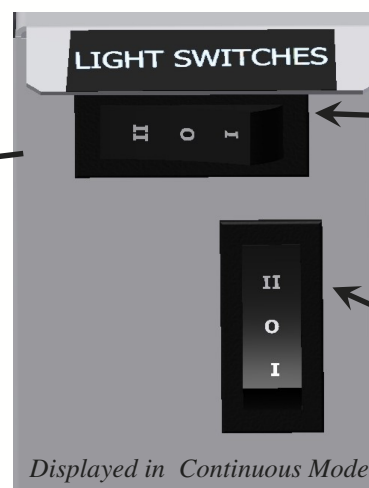
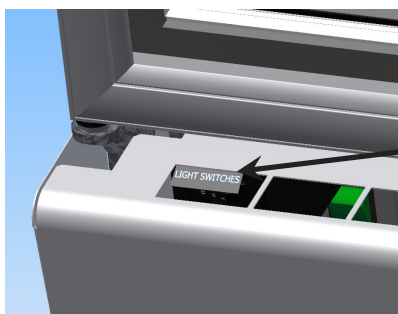
There are **three switches**, First is the **Control Switch**, Second for **interior lighting** and Third for the **sign** giving separate Switch

Operation:

I = On Continuously

O = Off

II = On Continuously



Sign Light Switch

Interior Light Switch


Note: If the Control Light

Switch is off, All lighting will be off.

Note: In low ambient temperatures and high humidity situations running the interior light will help keep the humidity inside the cooler lower.

Condenser Fan Switch

Setting and operation



CAUTION
HAZARDOUS VOLTAGE

DISCONNECT POWER
SUPPLY BEFORE
SERVICING


CONDENSER FAN OPERATION

"CON" - CONDENSER CLEANING
Reversing Fan
Use with or without filter

"CYC" - CYCLE WITH COMPRESSOR
Non-Reversing Fan
Use with condenser filter

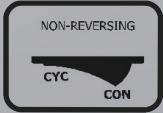
Refer Installation & Operation Manual
for details

REVERSING

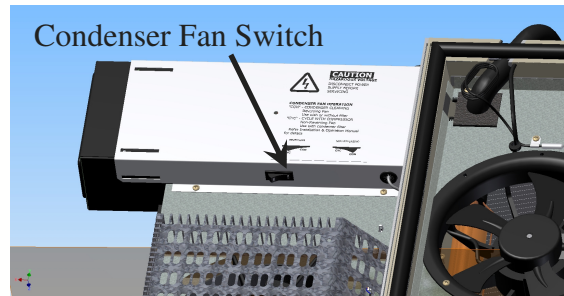


CYC CON

NON-REVERSING



CYC CON



Factory Setting

- “CYC” It is **recommended** that this switch be set to this setting (factory setting) and the condenser filter be in place whenever this refrigerator is in use.

This gives **maximum energy saving** (Lower running cost) and ensures the condenser is kept clean at all times.

The condenser filter MUST be cleaned regularly.

Refer Cleaning.

- “CON” This setting can be used with or without the condenser filter. This setting reduces the frequency of cleaning. The condenser fan reverses direction for 3 minutes at the start of every compressor off cycle blowing dust, dirt etc from the condenser and filter (if fitted).
- ⇒ **Note:-** If you choose this setting the **Condenser and Filter (if fitted) MUST be kept clean.**
- ⇒ **Note:-** This setting does not eliminate the need for cleaning only reduces its frequency.
- ⇒ **Note:-** If the filter is used eventually the condenser will require cleaning also.
- ⇒ **Note:-** With this setting energy use is increased. Higher running cost.

Refer Cleaning

Warning!	Isolate Power before removing any covers for Maintenance
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How to Maximise Your Energy Savings





- Take the time to read this manual and understand the operation of your refrigerator.
- 1. Ensure the condenser fan switch is set to “**CYC**” Refer “Condenser Fan Switch”
- 2. The condenser filter is in place and is cleaned regularly.
- 3. Operate lighting only when required. “Manual Light Switches”.
- 4. Never use the interior lighting for security lighting.
- 5. Open the door(s) for the shortest time possible for loading etc.
- 6. Reload during the coolest part of the day or night.
- 7. Position your non-perishable product in a cool location prior to loading.
- 8. Observe all product loading requirements. Refer “Product Loading”
- 9. Ensure the refrigerator is in a well ventilated location. Refer “Product Positioning” and “Ventilation”.
- 10. Observe all maintenance and cleaning requirements in this manual. (Refer “Maintenance” and “Cleaning”).

CONTROL SETTINGS

Temperature Adjustment: [How to access the set point](#) Factory Set Point 15.5 °C










Temperature Set-Point (Cut-Out Temperature) can be adjusted between Maximum and Minimum Set-Points (14 °C to 17 °C).

To alter temperature Set-Point, observe the following instructions:

1. Depress  button for 1 second: the set point value will appear on the display; after a moment, the value will begin to flash.
2. Increase or decrease the set-point by using the   buttons until you reach the desired value.
3. Press the  button again to confirm the new value.





Alarm

ALARM CODE	ICON ON DISPLAY	BUZZER	CAUSE	RESPONSE
rE	 FLASHING	ACTIVE	Virtual probe fault	Call service tech
EO	 FLASHING	OFF	Cabinet probe error	Call service tech
E1	 FLASHING	OFF	Defrost probe error	Call service tech
E2	 FLASHING	OFF	Condenser probe error	Call service tech
LO	 FLASHING	ACTIVE	Low temperature alarm	Check that the ambient temperature isn't below 9°C before calling service tech.
HI	 FLASHING	ACTIVE	High temperature alarm	Check for possible cause ie. Door left open etc. before calling service tech.
EE	 FLASHING	OFF	EEPROM error, unit parameters	Call service tech
EF	 FLASHING	OFF	EEPROM error, operating parameters	Call service tech
Cht	NO	ACTIVE (Slow)	High condenser temperature Pre-alarm	Refer cleaning & maintenance – Clean condenser. (If alarm continues call service tech)
CHT	 FLASHING	ACTIVE (Fast)	High condenser temperature. Alarm	Refer cleaning & maintenance – Clean condenser. (If alarm continues call service tech)

Note: Press the “Mute” button on the control to silence the alarm.

Control Codes during normal operation

CODE	ICON ON DISPLAY	BUZZER	CAUSE
	 ON	OFF	Defrost in progress
	 ON	OFF	Cabinet/Sign light on

Maintenance

Suitably qualified personnel only are to maintain and service this appliance in order to reduce the risk of damage that may cause refrigerant to be lost to the atmosphere.

Warning! Isolate Power before removing any covers for Maintenance.
Refer To Isolate Power

Note:

The front unit cover can be removed to gain access to the Power Switch.



Cleaning

♦ **CAUTION:-** Isolate power before performing any maintenance or cleaning.
Refer To Isolate Power

Check that all vents are clean and clear of dust, dirt, lint, paper, plastic etc. that may cause an obstruction to proper ventilation.

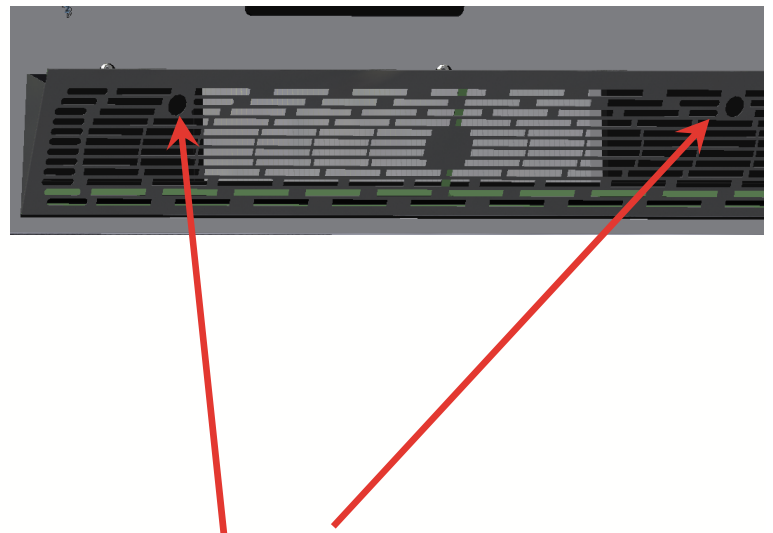
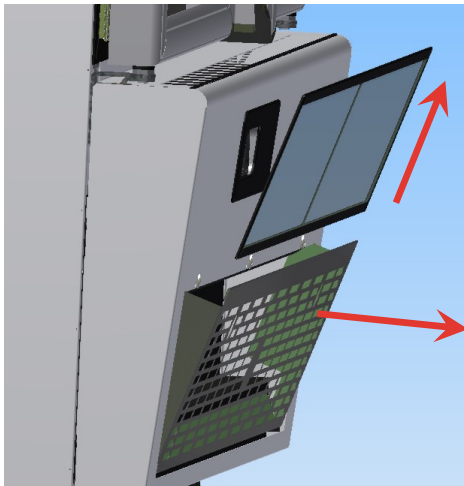
It is of the utmost importance that the refrigeration unit condenser filter be kept clean of dust, dirt and lint. The refrigeration unit fan will continually draw dust and lint on to the condenser filter and collect to form a “blanket”. This seriously restricts the passing of air for adequate ventilation and cooling of the refrigeration unit.

Note:- This condition reduces the life of the fan motor and compressor and is one of the major causes of motor and compressor failure. If the condenser filter is not cleaned regularly it will increase your running costs for the cabinet and severely reduce its operating life span.

Note:- If the reversing fan option is used the condenser will also require cleaning. *Refer Condenser Fan Switch.*

Cleaning

To clean the condenser filter



1. Pull grill forward using the finger holes provided.
2. Lift filter out of the grill.
3. Brush or vacuum dust and dirt off the filter.
4. Wash the filter with clean water.

Detergent and warm water may be required to clear grease build up from cooking oil etc.

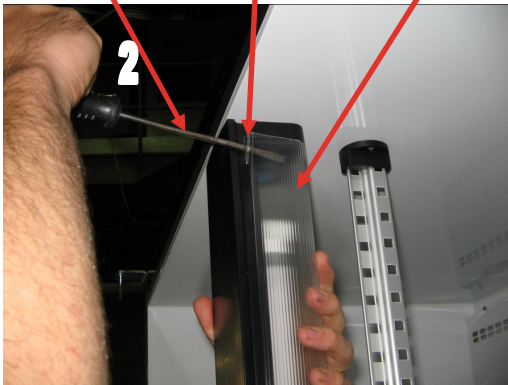
5. Shake and wipe filter so it is drip dry.
6. Refit filter. (Reverse to steps 1 & 2)

- We can not recommend how often the condenser should be cleaned as this is dependent upon particular location and surrounding conditions. Clean the condenser as often as necessary to keep the air passage clear.
- Door gaskets will remain in best condition if washed weekly with mild soap and water followed by a fresh water rinse.
- Keep inside of the cabinet clean by washing weekly. Do not use abrasive pads to clean cabinet finish inside or out.
- If the appliance is to be left inactive for long periods, unplug the appliance, empty the shelves, clean thoroughly and prop the door open to prevent odours.

Mullion Fluorescent, LED, Tube Replacement

1. Isolate power. *Refer To Isolate Power.*
2. Remove the plastic light diffuser, insert a screwdriver into the gap at the top and lift the diffuser.

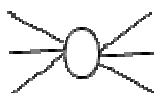
Screw driver Gap at the top Plastic light diffuser



3. Slide it out of the mullion
4. Repeat for the other side.
5. Turn the diffuser and remove.
6. Twist the LED tube 90 degrees and slide out to remove.
7. Reverse to replace.
8. Be sure to rotate tube as to shine the light across the door opening as shown.



Two door



Three



Note!

LED lamps must be replaced with identical lamps.

Problem Solving

Check before calling for machine service

Note: Routine adjustments and maintenance procedures are not covered by warranty, refer to Warranty information supplied with your equipment, for conditions and responsibilities.

If after following the checklist your equipment fails to operate correctly, please have the Series Model Number, Item Number and Cabinet Serial Number ready **before** calling for service.

Problem	Possible Cause (s)	Corrective Action (s)
Cabinet does not operate	No electrical power to machine. Cabinet on/off switch is "off" No power to outlet. Blown fuse, circuit breaker.	Check cord is plugged into outlet. Turn switch to "on". Check another appliance can operate from the outlet. If outlet is not working, change blown fuse or reset tripped circuit breaker.
Light (s) not working	Light switch in "OFF" position. Problem with tube connection. Blown tube.	Turn light switch "On" <i>Refer to Light Switch Operation</i> Slightly rotate tube in its fittings tube may have been bumped. Replace Note: This action for the optional illuminated display (Mini / Maxi) sign <u>MUST</u> be performed by Suitably Qualified Service Personal.
Alarm sounding	Blocked condenser Blocked condenser filter Ambient temperature too high	Turn cabinet off, clean condenser filter and condenser. <i>Refer Cleaning & Maintenance</i>
Cabinet noisy	Unit cover not fitted correctly	Ensure cover is installed correctly.
Cabinet doors do not close properly	Cabinet not level.	Reposition cabinet.
Cabinet not maintaining temperature	Refrigeration unit overheating. Door not closing.	Turn cabinet off. Clear filter and all vents, grills, louvers of dust etc. <i>Refer cleaning instructions.</i> <i>Refer cabinet doors do not close properly.</i>
Odour from cabinet interior	Interior not cleaned before use. Some foods produce odours.	Carefully clean interior with mild solution of bicarbonate of soda and warm water. Ensure foods are covered.
Water Inside/Outside cabinet	Check for spills. Check Ambient conditions Check water source Door not closing.	Carefully clean interior/exterior Ensure operating in correct Climate Check the cabinet is level. <i>Refer cabinet doors do not close properly.</i>

General Specifications				
Model		EB30CC-(Sn)-A	EB36CC-(Sn)-A	EB45CC-(Sn)-A
Power Requirements		220 - 240V 50Hz.	220 - 240V 50Hz.	220 - 240V 50Hz.
	Standard 10 Amp Power Point			
Total Amps		2.8	2.9	3.2
Gross Volume (L)		895	1071	1384
Refrigerated Shelf Area (m ²)		2.17	2.62	3.38
Total Display Area (m ²)		0.99	1.20	1.48
Interior Lighting	LED			
Illuminated Sign Panel (Sn) Models	LED			
Climate Classes	0, 1, 2, 3, 4, 5, 6, 7, 8 & T			
Power Surge Protection	Yes			
Light Switches	Yes			
Condenser Filter	Yes			
Reversing Condenser Fan	Yes			
Low Energy Glass Doors	Yes			
Refrigerant	R134a (500g)			

Energy Consumption

EB30CC-Sn-A		EB36CC-Sn-A		EB45CC-Sn-A	
Sign Off	Sign On	Sign Off	Sign On	Sign Off	Sign On
3.6	4.06	4.08	4.54	5.18	5.76

Energy measured @ Climate Class 4 (30°C - 55% Rh.) as per AS1731

**For even lower energy consumption (running cost)
Refer to “How to Maximize Your Energy Savings”.**

Disposal: Note:- These refrigerators use flammable blowing agents for their insulation and must be disposed of in accordance with Government regulations pertaining to your area.

By ensuring this product is disposed of correctly, you will help prevent potential negative consequences such as personal injury, property damage or damage to the environment