



SOUTHERN  
CaseArts



# Installation, Maintenance, & Operation Guide

## 200 SERIES

Low Temp Service Merchandisers

Case Family Type:  
SCS-LTS

800.552.6283 | [southerncasearts.com](http://southerncasearts.com)



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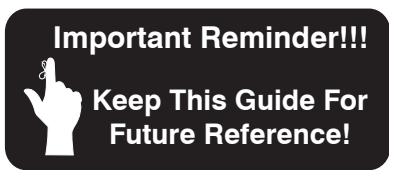
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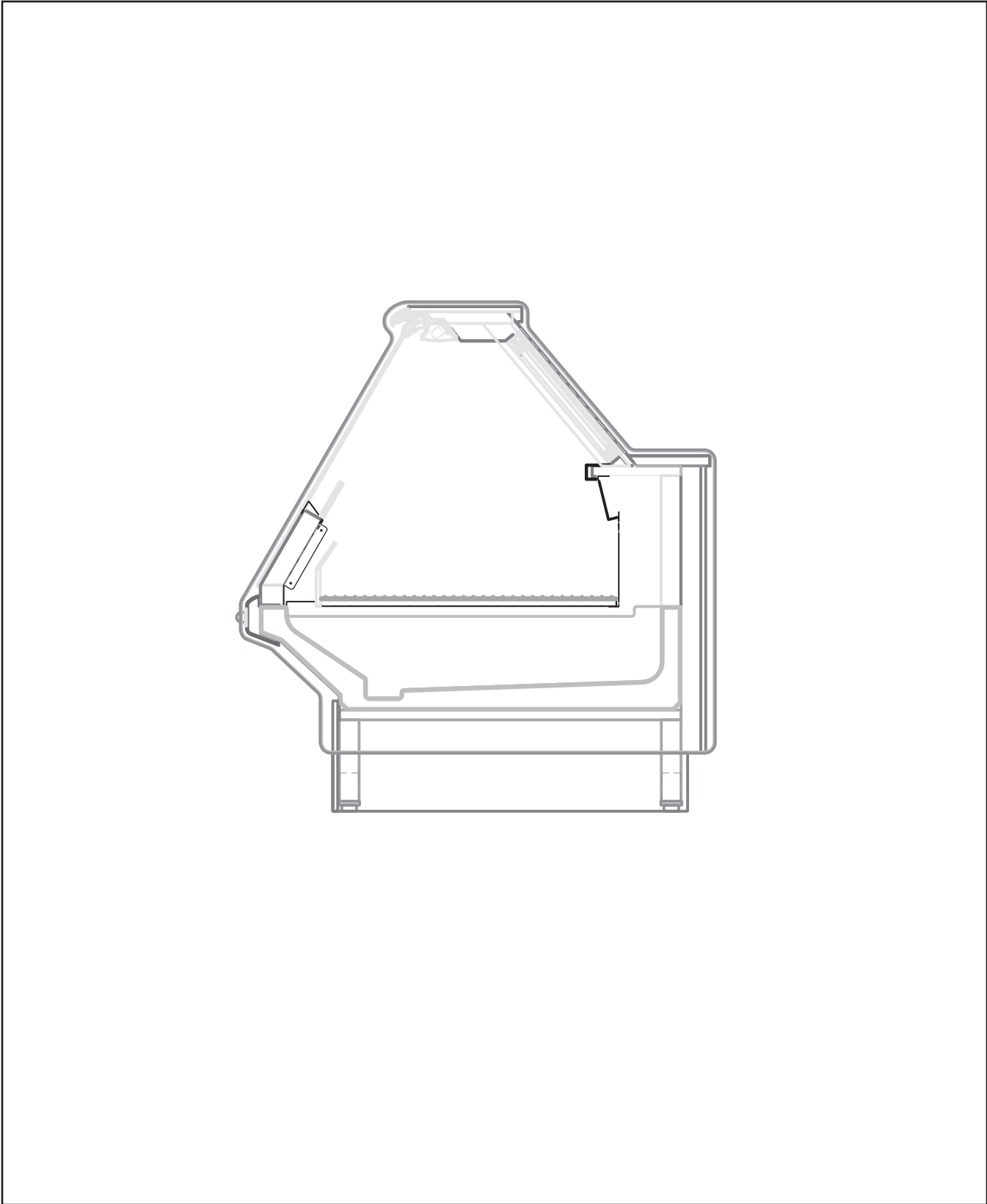
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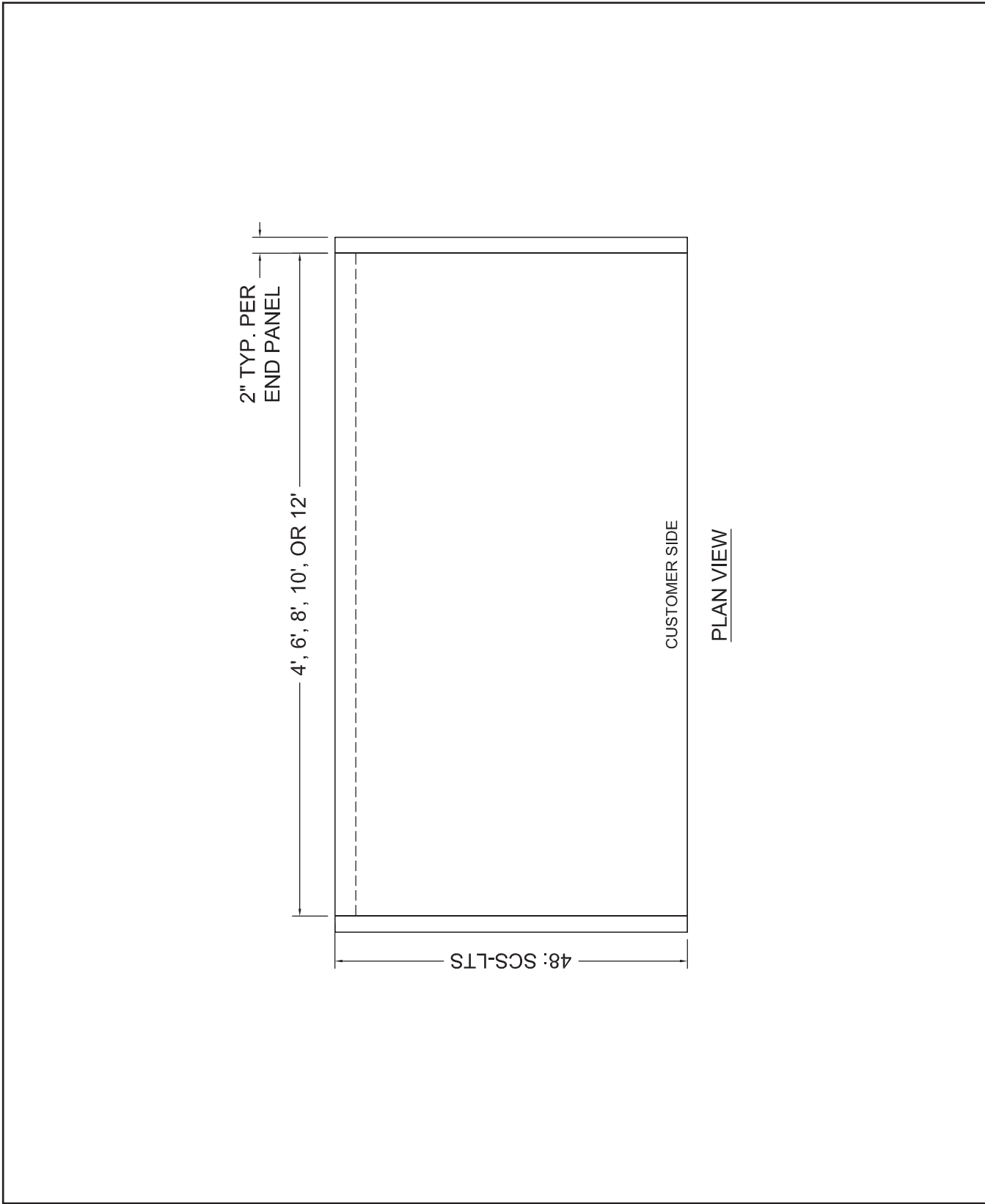
# Case Diagrams & Mechanicals

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**Section Views**

# Case Diagrams & Mechanicals



Plan Views

# General Information

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## Receiving Cases

Transportation companies assume all liability from the time a shipment is received by them until the time it is delivered to the consumer. Southern CaseArts, Inc liability ceases at the time of shipment. All equipment should be thoroughly examined for shipping damage and/or shortages before and during unloading. This equipment has been carefully inspected at our factory. Any claim for loss or damage must be made to the carrier. The carrier will provide any necessary inspection reports and/or claim forms. For information on shortages, please contact the service parts department at 800.552.6283.

## Apparent Loss or Damage

If there is an obvious loss or damage, it must be 1) noted on either the freight bill or the express receipt and 2) signed by the carrier's agent; otherwise, the carrier may refuse the claim.

## Concealed Loss or Damage

When loss or damage is not apparent until after the equipment is unpacked or uncrated, retain all packing materials and submit a written request to the carrier for inspection within 15 days of receipt of equipment.

## Exterior Loading

**DO NOT WALK OR STAND ON TOP OF DECKS, SHELVES, OR CASES FOR ANY REASON** or damage to the cases and serious personal injury could occur. THEY ARE NOT STRUCTURALLY DESIGNED TO SUPPORT EXCESSIVE EXTERNAL LOADING such as the weight of a person. **DO NOT PLACE HEAVY OBJECTS ON THE CASE.** If work is to be done above the fixture then ladders and/or scaffolding must be used.

## Handling of Cases

Southern CaseArts' remote series of cases are shipped to stores with dollies on casters placed beneath the base frame. From loading to unloading and placement to installation, we strive to ensure that moving our cases is easy for everyone involved. In most instances, one or two persons can move the cases with ease. Our self-contained series of cases, unless otherwise specified when ordering, are generally manufactured with heavy-duty casters mounted permanently to the base frame for ease of mobility when unloading and when moving around for placement in the store. If a forklift or pallet jack is used to move the case, use a spotter to guide forks in place to prevent damage to electrical, plumbing, and refrigeration lines. **DO NOT PUSH OR PULL ON ANY GLASS COMPONENTS OF THE CASE.** Glass breakage may result in serious injury.

## Store Conditions

Southern CaseArts' refrigerated standard display cases are designed for use in Class 1 air-conditioned stores, where the temperature does not exceed 75° F and the relative humidity does not exceed 55%.

Air conditioning, fans, ovens, drafts, direct sunlight or anything that could disturb the air inside the case could result in poor performance.

# General Information

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## General Information

Display cases described in this operation guide are part of the 200 series of product displays provided by Southern CaseArts, Inc. This guide covers the following product display models: SCS. These cases are not designed to cool down products but are designed to maintain the safe temperature of the product once placed in the case.

- Keep products at food safe temperature prior to loading them into the case.
- Allow the case to operate a minimum of 4 hours before loading with product.
- Do not place any product into a display case until it is at operating temperature.
- Discharge air plenum and return air grill must not be blocked or restricted - the case may not operate properly. Overloading the case may impair the proper operation of the case.
- For self-contained models, the air intake grill and discharge vent must be clear of obstructions or the case will not operate properly. The air intake grill has an air filter that needs to be cleaned monthly or more frequently if required.
- For cases equipped with an electric condensate dissipater pan. Electric dissipater pans are meant solely for the purpose of evaporating condensate water released from the refrigeration coil during the defrost cycle. Dust, food products, grease, caustic liquids, flammable materials, wash water and/or cleaning chemicals should not be allowed to accumulate in the pan. Regular monthly maintenance should be performed to make sure the pan is clean and the float switch moves up and down freely. Failure to follow these guidelines could result in flooding, overheating, and/or a fire hazard, all of which will void the warranty.
- These cases require a dedicated circuit with proper sized wire for the distance from the electric panel.
- Cases equipped with electric dissipater pans should **never** have food products washed or poured into the case tub drain, as it will result in damage to the heating element.
- **DO NOT WASH OUT THE CASE WITH CAUSTIC CHEMICALS** unless the case is attached to a floor drain. Many cleaning chemicals will dissolve the heater elements in the electric evaporator pans.
- Southern CaseArts' refrigerated standard display cases are designed for use in air conditioned stores, where the temperature and relative humidity do not exceed 75° F and 55% RH.
- When utilizing refrigerated self-service or open case merchandising, the following should be considered: 1) Air conditioning ducts that are positioned or blowing directly into an open case will impair case performance. Also, any air current from prep areas or ceiling fans can impair the performance of a case. 2) Ovens or other forced-air heating systems placed near the case can affect the case air curtain and impair the temperature performance of the case.
- **DO NOT WALK ON TOP OF THE CASE.** These cases are not designed or built in standard models to support extra weight on top. Heavy weight placed on top of the case may cause damage to the case as well as personal injury.
- **DO NOT TILT SELF-CONTAINED CASES** more than 15° from vertical when setting in place. Compressors may be damaged. Compressor warranty may be voided. If the self-contained case has been tilted, wait at least 24 hours before turning the case on.
- **DO NOT USE RUNNING WATER ON CASES EQUIPPED WITH A CONDENSATE PUMP.** It is important to not introduce more water than the case condensate pump can handle. The case must be routinely wiped out and cleaned by hand or the pump can be damaged and cause flooding or personal injury. See care instructions for these pumps in optional equipment.

# General Information



These cases, unless otherwise specified are shipped on dollies for ease of unloading. If the loading dock is level with the truck, the cases can be rolled off the truck and into the store.



## WARNING

Use caution and keep hands out of the way when lifting the case to remove dolly! FAILURE TO DO SO COULD RESULT IN SERIOUS INJURY!



## CAUTION

Be careful around pinch points they can cause bodily harm!



When moving a case without casters into position, it is recommended to only use a jack bar and dollies. Cases have a wide variety of electrical, drain and refrigerant connections under the case and may be damaged by moving the cases.

## Case Industry Standards

The 200 Family of cases conform to the following standards:



Intertek



Intertek

# Installation Instructions



## WARNING

Do not push or pull on any glass components of the case. Glass breakage may result in serious injury!

## IMPORTANT

If forklifts or pallet jacks are used to move cases, use a spotter to guide forks into place to prevent damage to electrical, plumbing, and refrigeration lines.

Southern CaseArts' remote series of cases are shipped to stores with dollies on casters placed beneath the base frame. From loading to unloading and placement to installation, we strive to ensure that moving the cases is easy for everyone involved. In most instances, one or two people may move the cases with ease. Our self-contained series of cases, unless otherwise specified when ordering, are generally always manufactured with heavy-duty casters mounted permanently to the base frame for ease of mobility when unloading and when moving around for placement in the store. If a forklift or pallet jack is used to move cases use a spotter to guide forks into place to prevent damage to electrical, plumbing, and refrigeration lines. **DO NOT PUSH OR PULL ON ANY GLASS COMPONENTS OF THE CASE.** Glass breakage may result in serious injury.



# Installation Instructions



## WARNING

**Do not place self-contained version of this unit equipped with an electric evaporator pan near or under any flammable structure or flammable merchandise! This could result in a fire hazard !**

Southern CaseArts' refrigerated standard display cases are designed for use in air-conditioned stores, where the temperature does not exceed 75° F and the relative humidity does not exceed 55%.

Air conditioning, fans, ovens, spot lights, direct sunlight or anything that could disturb the air-flow inside the case could result in poor performance.



## CAUTION

**Do NOT walk on top of the case.** These cases are not designed or built in standard models to support extra weight on top. Heavy weight placed on top of the case may cause damage to the case as well as personal injury.

**DO NOT WALK OR STAND ON TOP OF DECKS, SHELVES, OR CASES FOR ANY REASON** and serious personal injury could occur. **THEY ARE NOT STRUCTURALLY DESIGNED TO SUPPORT EXCESSIVE EXTERNAL LOADING** such as the weight of a person. **DO NOT PLACE HEAVY OBJECTS ON THE CASE.** If work is to be done above the fixture then ladders and/or scaffolding must be used.

## IMPORTANT

**IT IS THE INSTALLERS RESPONSIBILITY TO INSTALL CASE TO MEET ALL LOCAL BUILDING AND HEALTH CODES.**

## IMPORTANT

**If the correct lift points are not identified prior to removal. Look for the supports under the unit before removing pallet. If not removed, it will damage the finished metal.**

## IMPORTANT

**BEFORE STARTING THE UP THE CASE, CHECK ALL ELECTRICAL CONNECTIONS.**

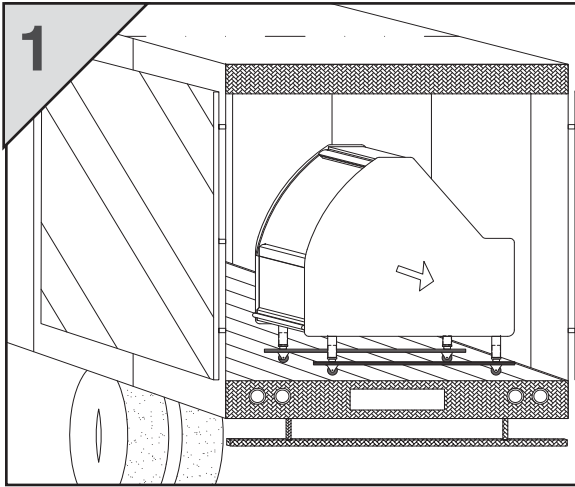
## IMPORTANT

**Installation of 3rd-party material may result in improper case performance**

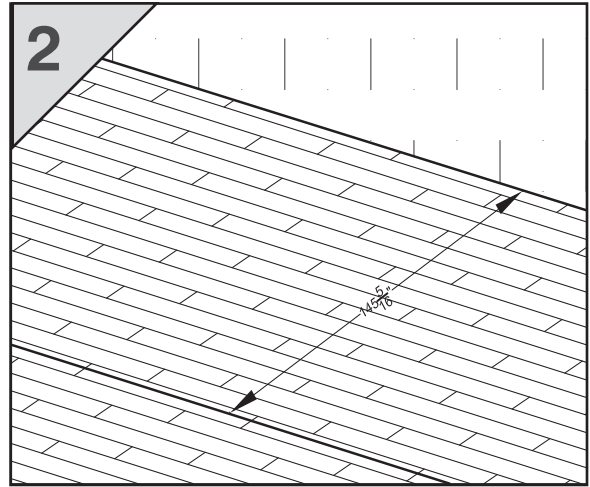
## IMPORTANT

**Remove all styrofoam shipping blocks from case. Failure could result in case damage.**

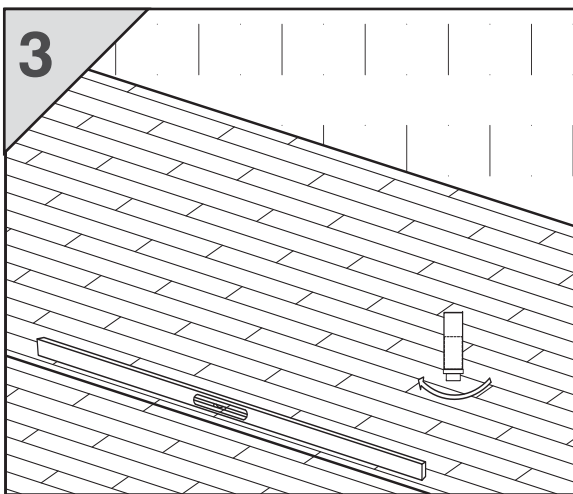
# Installation Instructions



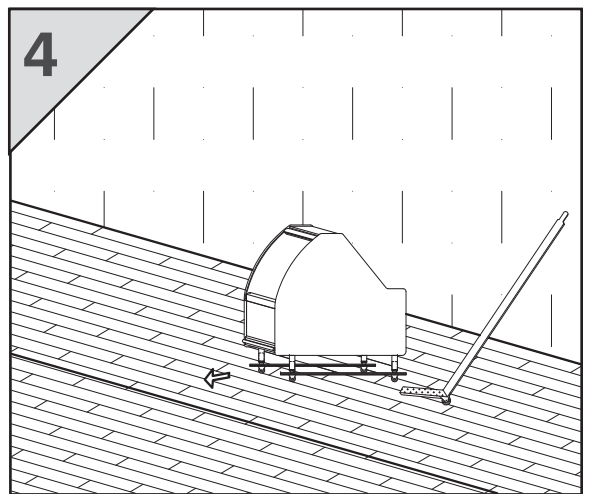
1  
Locate and verify placement of cases inside the store building. Unload and move cases as close as possible to their final location. Verify that no changes have been made to area and that blueprints are still current. Find points of reference to take dimensions to help locate the cases.



2  
Mark the floor where cases are to be located for the entire lineup.

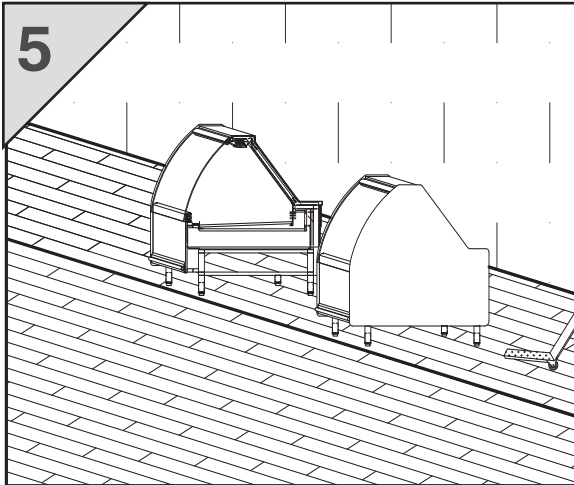


3  
Leveling is very important and necessary to ensure proper case alignment when installing. **Improper leveling can affect the refrigeration systems and lead to improper drainage of defrost water.** To ensure proper leveling, locate the highest point on the chalk line as a reference to determine the height the leveler legs need adjusting.

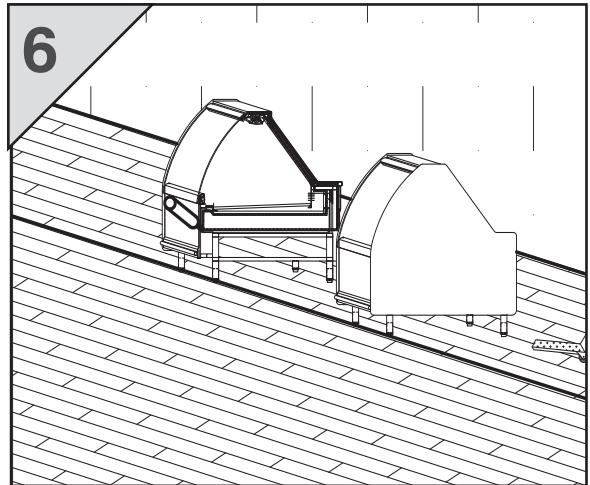


4  
Roll the first case into position. Use a jack bar and place it on the underside of the heavy-duty steel frame to lift the case and remove all dollies. **CAUTION - KEEP HANDS OUT OF THE WAY AT ALL TIMES TO AVOID INJURY.**

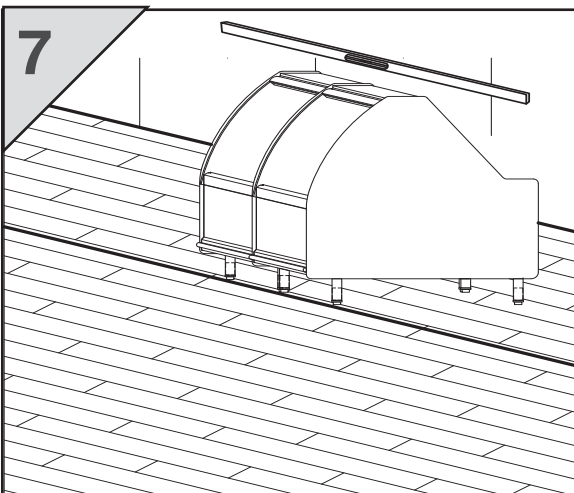
# Installation Instructions



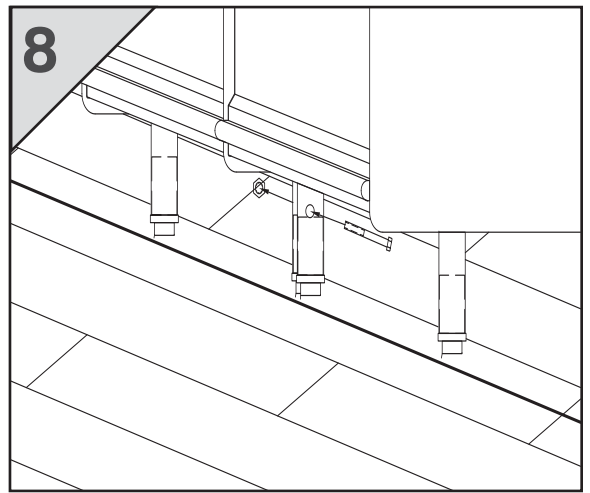
Roll the next case into position leaving a few feet in between from the adjoining case for maneuvering. Repeat **step 4** for removing dollies from beneath the case. **CAUTION - KEEP HANDS OUT OF THE WAY AT ALL TIMES TO AVOID INJURY.**



Remove anything from the case that could interfere with the case joining. Run a bead of sealant around the entire end before pushing cases together tightly. Make sure all alignment pins are in place before running a bead of sealant and pushing the case together.

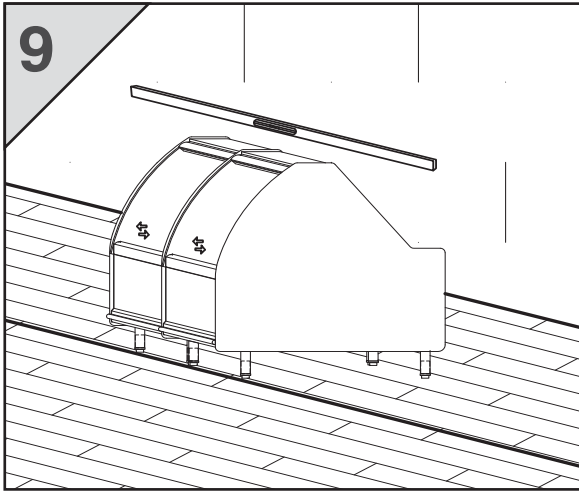


**MAKE SURE AND LEVEL ALL CASES.** For shipment, the leveler legs on the cases are run all the way out. **IT IS VERY IMPORTANT TO SCREW THE LEVELER LEGS ALL THE WAY IN BEFORE LEVELING THE CASE.** WHEN THE CASE IS LEVEL MAKE SURE ALL THE LEVELER LEGS ARE SECURE TO THE FLOOR.

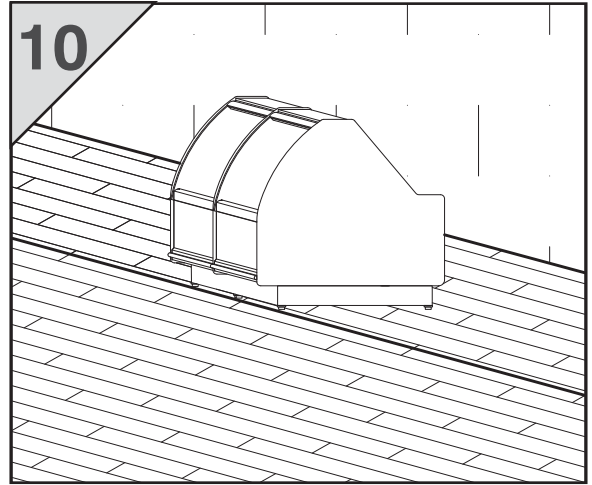


Push cases tightly together and bolt them through the holes provided. Tighten until all margins are equal. **DO NOT OVER TIGHTEN.** Repeat **steps 4-8** until entire line-up is set.

# Installation Instructions



Make sure all the glass opens and closes correctly. If the glass binds or overlaps each other the case may not be level. Make sure all the shelves are securely in position and the plugs for the shelf lights are plugged in all the way. Install any joint caps sent with the case.



After the mechanical connections are made all penetrations must be sealed and all panels and kick plates must be installed. If 90% of the floor under case cannot be accessed by a 1.5" diameter rod for cleaning then silicone kickplate to floor.



## WARNING

Make sure all shelves with lights are plugged in all the way and seated completely. Unused receptacles must have the cover pushed all the way in and seated completely! Failure to do this could result in arcing, possible fire, or safety hazards!

## IMPORTANT

ON CASES EQUIPPED WITH RADUIS HARDWARE, YOU CAN ONLY OPEN ONE PIECE OF FRONT SERVICE GLASS AT A TIME ON THE CURVES IN THE LINEUP! FAILURE TO DO SO WILL DAMAGE THE HARDWARE!

## IMPORTANT

AFTER INSTALLATION IS COMPLETE, RUN THE CASE AT NORMAL OPERATING TEMPERATURE BEFORE TIGHTENING THE SCREWS IN THE GLASS CLAMP. THERMAL EXPANSION CAN CAUSE THESE TO LOOSEN.


## IMPORTANT

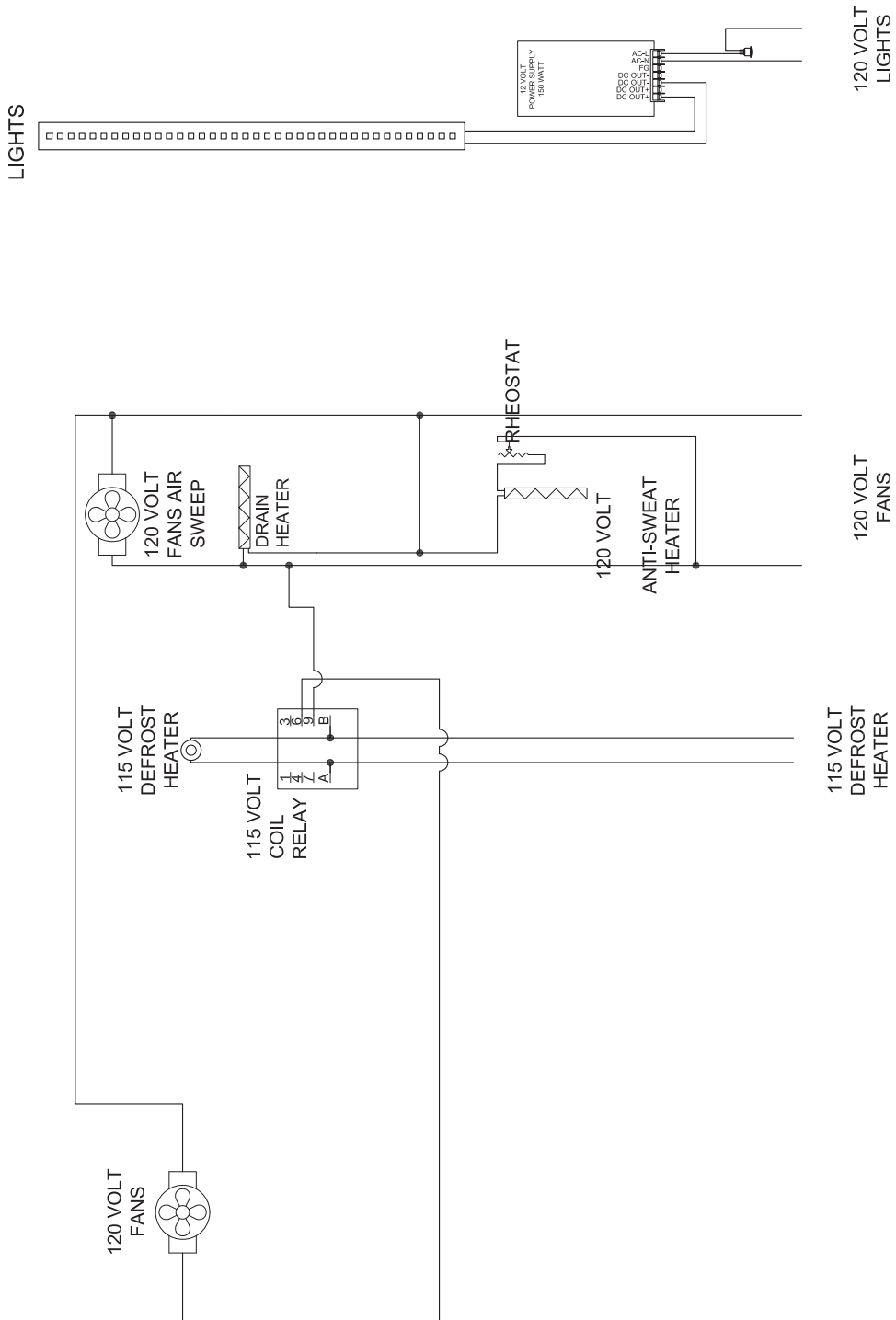
That all the piping connections are compliant with local codes.

## IMPORTANT

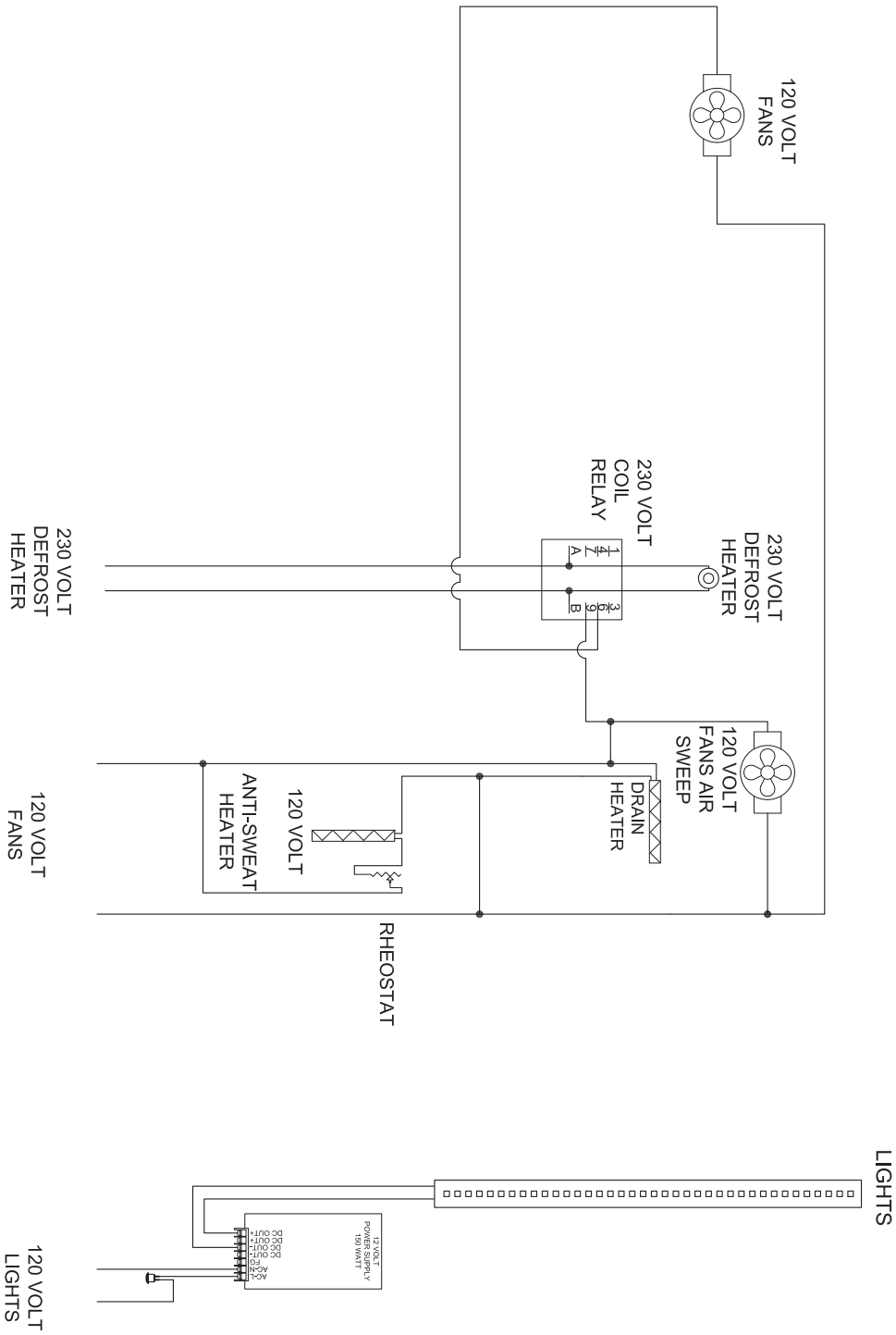
Necessary when brazing wet rag around the area to avoid any damage.


# Electrical Information

A	WITH 120 VOLT DEFROST HEATER	MODEL #:	WIRING DIAGRAM	SCS-LTS	 <small>THIS DRAWING IS THE PROPERTY OF SOUTHERN CASEARTS, INC. AND IS NOT TO BE REPRODUCED OR EXCHANGED WITH ANY OTHER PERSON OR COMPANY WITHOUT THE EXPRESS WRITTEN CONSENT OF SOUTHERN CASEARTS, INC.</small>
		DRAWN BY: C SALTER	DATE: 04/12/13	1"=1'-0"	



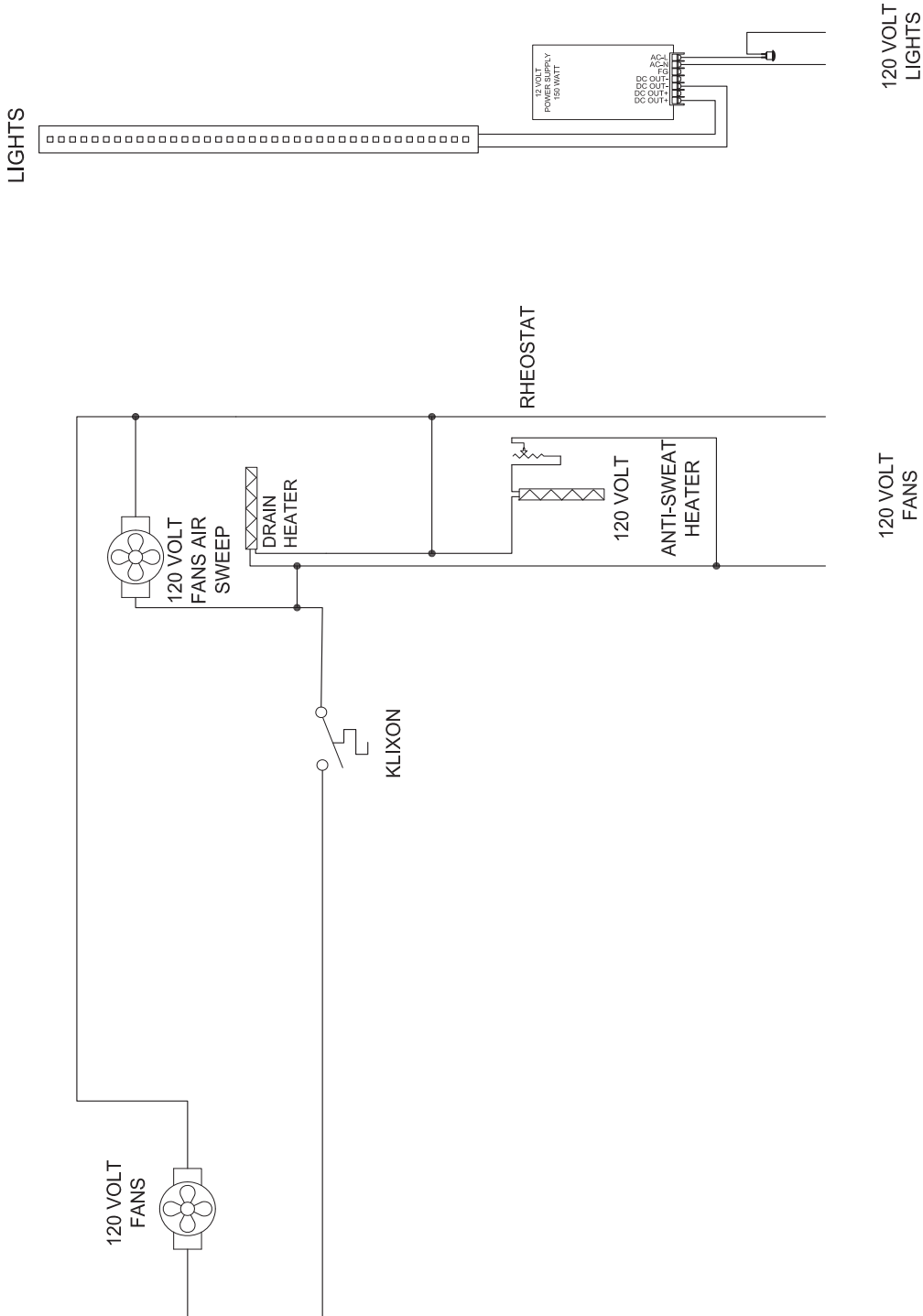
# Electrical Information



	SCS-LTS	MODEL #: WIRING DIAGRAM	WITH 230 VOLT DEFROST HEATER	A
	<small>THIS DRAWING IS THE PROPERTY OF SOUTHERN CASEARTS, INC. AND IS NOT TO BE REPRODUCED OR EXCHANGED WITH ANY OTHER PERSON OR COMPANY WITHOUT THE EXPRESS WRITTEN CONSENT OF SOUTHERN CASEARTS, INC.</small>		DRAWN BY: C. SALTER      SO #: DATE: 04/12/13              1"=1'-0"	

# Electrical Information

SCS-LTS		MODEL #:	WIRING DIAGRAM	HOT GAS DEFFROST	
DATE: 04/12/13		DRAWN BY: C SALTER		SO #:	
1"=1'-0"		THIS DRAWING IS THE PROPERTY OF SOUTHERN CASEARTS, INC. AND IS NOT TO BE REPRODUCED OR EXCHANGED WITH ANY OTHER PERSON OR COMPANY WITHOUT THE EXPRESS WRITTEN CONSENT OF SOUTHERN CASEARTS, INC.			



# Factory Settings

REFRIGERATION DATA						
(THESE SETTING ARE SUBJECT TO CHANGE WITHOUT NOTICE)						
MODEL	Btuh/Ft*	EVAP	SUCTION	SUPERHEAT	DEF. TERM, FAIL-SAFE	# PER DAY
SCS-LT	535	-20°	-22°	5°-7°	55°, 40 MIN.	4

\*WILL CHANGE DEPENDING ON LIGHTS, ANTI-SWEATS, AND APPLICATION (THESE ARE FOR A DELI APPLICATION).

ELECTRICAL DATA							
115 VOLT REMOTE							
MODEL	LIGHTS 3'	FANS 3'	LIGHTS 4'	FANS 4'	LIGHTS 5'	FANS 5'	ANTI-SWEAT
SCS-LT	0.18	0.34	0.23	0.34	0.29	0.34	1.54
MODEL	LIGHTS 6'	FANS 6'	LIGHTS 8'	FANS 8'	LIGHTS 12'	FANS 12'	ANTI-SWEAT
SCS-LT	0.36	0.51	0.46	0.68	0.69	1.02	2

LIGHT AMPERAGES MAY VARY DEPENDING ON AVAILABLE OPTIONS

ELECTRIC DEFROST AMPS (IF USED)		
CASE LEGNTH	115 VOLT	230 VOLT
3'	N/A	N/A
4'	3.26	6
5'	3.26	6
6'	3.6	7.1
8'	4.5	8.9
12'	7.2	14.2

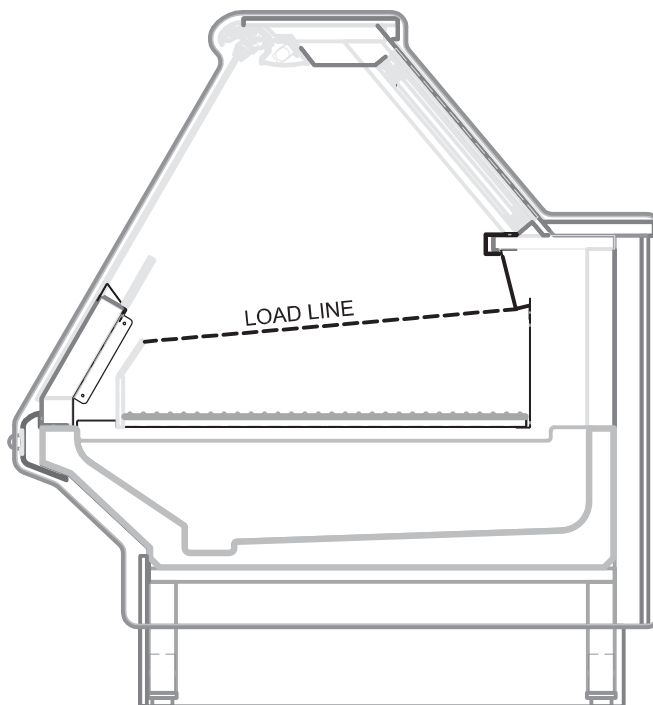


# Air Flow & Product Loading

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## General Information and Diagram

Cases have been designed with an air delivery system to provide maximum product capacity. It is important that you **DO NOT OVERLOAD THE FOOD PRODUCT DISPLAY** so that it disrupts the air delivery system. Overloading will cause the loss of proper temperature levels and will result in a malfunction of the case, particularly when the discharge and return air sections are covered. Please keep products within the load limits shown on this diagram.



**Case Diagram - *Informational***

# Maintenance & Care Information

## General Care and Cleaning

Long life and the satisfactory performance of any equipment is dependent upon the care it receives. To ensure a long life, proper sanitation, and minimum maintenance costs, these cases should be thoroughly cleaned, all debris removed, and the interiors wiped down weekly, at a minimum.

### Exterior Surfaces

The exterior surfaces may be cleaned with a mild detergent and warm water to protect and maintain their attractive finish. **NEVER USE ABRASIVE CLEANSERS OR SCOURING PADS.** We recommend Murphy's Oil Soap used per manufacturer's directions for the cleaning of wood veneer surfaces on refrigerated cases.

### Interior Surfaces

The interior surfaces may be cleaned with most domestic detergents, ammonia based cleaners and sanitizing solutions with no harm to the surface.

## IMPORTANT

### Case Cleaning and Maintenance

- **DO NOT** use abrasive cleansers and scouring pads, as these will mar the finish.
- **DO NOT** use solvent, oil or acidic-based cleaners on any interior surfaces.
- Remove all product and all loose debris to avoid clogging the waste outlet.
- Next, turn off refrigeration, then disconnect electrical power.
- Thoroughly clean all surfaces with soap, hot water and a cleaning cloth or sponge. **DO NOT USE STEAM OR HIGH WATER PRESSURE HOSES TO WASH THE INTERIOR. THESE WILL DESTROY THE CASES' SEALING, CAUSING LEAKS AND POOR PERFORMANCE.**
- Take care to minimize direct contact between fan motors and cleaning or rinse water.
- Rinse with hot water and a cleaning cloth or sponge, but do **NOT** flood.
- **NEVER INTRODUCE WATER TO SELF-CONTAINED CASES, CASES WITH EVAPORATOR PAN OR CONDENSATE PUMP, OR FASTER THAN THE DRAIN OUTLET CAN REMOVE IT.**
- Allow cases to dry before resuming operation. Then power can be restored to case.

### Cleaning Honeycomb Assembly

Honeycombs should be cleaned when necessary. Dirty honeycombs will cause merchandisers to perform poorly. The honeycombs may be cleaned with a vacuum cleaner. Soap and water may be used if all water is removed from the honeycomb cells before replacing. Be careful not to damage the honeycombs.

### Plexiglass Cleaning

It is very important to utilize only the recommended method and products for cleaning plexiglass. Improper cleaning not only degrades the quality of the surface but also accelerates the frequency of required cleanings. Incorrect cleansers have a tendency of causing small scratches in the surface which, over time, will appear as a haze in the plastic. We recommend using soft cotton cloths.



## CAUTION

**Fluorescent lamps contain mercury vapor which can be harmful if exposed. Make sure and replace all lamps with the approved shatter shields. Visit <http://www.epa.gov/osw/hazard/wastetypes/universal/lamps/index.htm> for more info.**

# Maintenance & Care Information

## Cleaning Non-glare Glass

Our non-glare glass receives a special coating on the glass surface. The special coating is applied in a manner to ensure that the high optical clarity of the glass is maintained. To protect this special coating and optical clarity, it is essential that the glass be kept clean. Glass Plus® or Windex® are the only solutions recommended for use on non-glare glass. You should only clean with a micro fiber cleaning cloth. Scotch-Brite and Spontex are two common manufacturers of these cloths. A micro fiber cloth can clean the glass without the use of the solutions. Cleaning solutions should only be used for tough jobs.

- **NOTE** - Once the glass has been damaged with improper solutions, it is irreparable.
- **Special Directions** - Certain precautions should be taken before cleaning the inside portion of the lift up glass. We recommend that the glass be fully opened to prevent cleaning solution from splashing onto the food products. While cleaning the cases we recommend that the non-glare glass be fully opened and covered so that no cleaning solution will splash onto the non-glare glass coating.

### IMPORTANT

UNDER NO CIRCUMSTANCE should you use coarse paper towels, scouring pads, powders, steel wool, steel fiber materials, blades, acidic detergents, highly alkaline detergents, or fluorine based detergents to clean non-glare glass.

## Air Sweep Fan Assembly

The fans are located on the bottom of the tub. These fans must be checked every three months to make sure air can pass through them. If they are clogged remove any dust or debris. If proper air-flow is not maintained then it could cause sweating glass and poor product visibility.



### WARNING

**Electric dissipater pans are meant solely for the purpose of evaporating condensate water released from the refrigeration coil during the defrost cycle. Dust, food products, grease, caustic liquids, flammable materials, wash water and/or cleaning chemicals should not be allowed to accumulate in the pan. Regular monthly maintenance should be performed to make sure the pan is clean and the float switch moves up and down freely. Failure to follow these guidelines could result in flooding, overheating and/or a fire hazard, and will void the warranty.**

To keep your Southern CaseArts case operating at its best we suggest the following maintenance schedule. The yearly service should be performed by a qualified service technician. Before doing monthly or yearly servicing **BE SURE TO DISCONNECT ALL POWER SUPPLIES TO THE CASE!**

**The coil cover only lift out for an inspector or trained service provider. May result in damage of the refrigerant system if removed by a untrained person.**



### WARNING

**DISCONNECT POWER BEFORE CLEANING OR SERVICING THIS UNIT! FAILURE TO DO SO COULD RESULT IN SERIOUS INJURY OR DEATH**

1. The cases should be wiped down daily and cleared of all debris.
2. The product placement within the cases should be checked to ensure proper air flow to all products.
3. Be sure the air return grill is not blocked and the discharge air is at a normal velocity.
4. Be sure the air filter on the condensing unit is not clogged or dirty.

# Maintenance & Care Information

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**MONTHLY** cleaning should consist of:

1. The cases should be broken down and cleaned thoroughly.
2. Remove honeycomb holder and wash honeycomb.
3. Wipe fan blades and fan guards.
4. Vacuum tub, fan shrouds (top and bottom), and coils where possible.
5. Remove debris from drain and clean evaporator pan.
6. Take out the air filter for the condensing unit and wash thoroughly and replace.

**ANNUAL** system check-up and adjustment:

Compressor:

1. Check compressor for indications of flooding. Check and log suction, discharge, and saturated liquid line temperatures.
2. Check temperature differential across liquid line drier.
3. Check operations pressures of refrigeration cycle, verify full sight glass during normal operation.
4. Check unit for excessive noise, vibration, and short cycling.

Electrical:

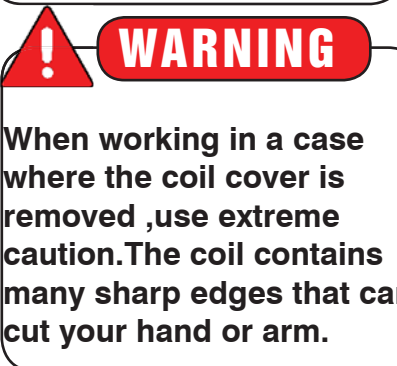
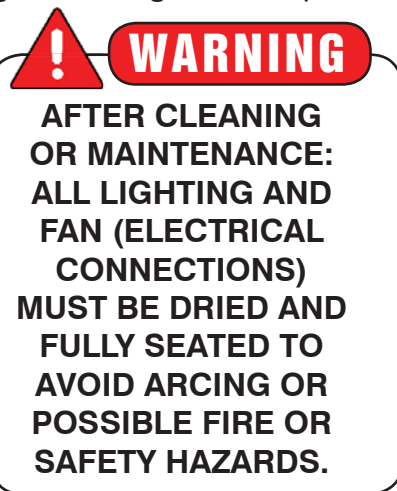
1. Inspect, clean, and tighten all electrical components.
2. Check and document amp draw for the following:
  - A. Compressor.
  - B. Line voltage.
  - C. Condensing fan motor amperage.
  - D. Inspect disconnect and fuses.
3. Check contactor for signs of burnt contacts.

Condenser and evaporator fan motors:

1. Check for proper rotation and operation.
2. Check fan blades for damage.
3. Check motor mounts for damage.
4. Clean all dirt and debris from fan blades.
5. Check for proper operation during both refrigeration and defrost.
6. Check bearing for vibration and noise.
7. Check fan motors for abnormal vibration and noise.

General:

1. Perform coil cleaning on evaporator and condenser coils.
2. Remove and clean honeycomb diffusers.
3. Check and adjust controls, defrost time clocks, and thermostats.
4. Check superheat and adjust to proper setting if necessary.
5. Check for refrigeration leaks on all equipment. Leak check inside the cabinet.
6. Inspect and check operation of all safety controls.
7. Make sure all panels are secure and secure with screws where necessary.
8. Check and clean condensate drain lines and pans.
9. Check drain for proper trap installation and that trap is holding water.
10. Check for proper draining. Verify that all debris is clear and drain is working properly.
11. Check condensate pump for proper operation and clean by flushing with bleach.
12. Check for proper temperatures on all levels and sections of case, log temperatures.
13. Blow out dust from screens in plenums.



# Trouble Shooting Remote Cases

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## Trouble Shooting Remote Cases

We have prepared a listing of potential case problems and how to diagnose performance issues.

1. Is the expansion valve superheat set correctly at 5° - 7° Fahrenheit?
2. Is the product at proper temperature when it is received from the cooler for merchandising? These cases are designed to maintain safe temperature once the product is placed in the case. However, the cases are not designed to cool down the products from unsafe temperatures.
3. Always allow the cases to operate for a minimum of four hours before loading with product.
4. Regarding the actual merchandising of the products in the case:
  - A. Is the product or case decoration obstructing the air discharge or return air?
  - B. Is the product exceeding the load limit of the case?
  - C. Good judgement should be utilized concerning rotation of product.
  - D. On most cases (other than multi-level service cases) the load line or refrigerated zone can be determined by drawing a line from the rear of the discharge air grill to the return air intake. Everything under this line is considered within the refrigerated zone.
5. All deck pans should be seated properly in the base of the case with all fan plenums securely in place. All fans must be operational.
6. For self-service open case merchandising please consider the following:
  - A. Air conditioning ducts blowing directly into an open case will impair the performance. Any air current from prep areas or ceiling fans can also impair the performance of the cases.
  - B. Spotlights, ovens, or forced air heat systems placed near the cases can affect the case air curtain and the temperature performance of the case.
7. **Do NOT walk on top of the case.**
8. Remote system problems that potentially impair case performance:
  - A. Evaporator temperatures should be maintained at settings specified for each case in our technical manual.
  - B. Variations in liquid temperature affect the expansion valve performance. Are all of the sub-cooled liquids maintained at a constant temperature?
  - C. Does the system have enough refrigerant to maintain all of the remote case applications?
  - D. It is essential that the specified defrost requirement for each case is followed to ensure product integrity while at the same time defrosting the case efficiently.
  - E. It is recommended that liquid and suction lines are sized correctly for each case lineup.
  - F. If other cases are connected in combination, this could affect suction pressure.
  - G. EPR's at the case or at the system must be set to maintain the proper evaporator temperatures. Case temperatures are to be controlled by the factory T-stat or suction solenoid.



**CAUTION**

**Do NOT walk on top of the case.** These cases are not designed or built in standard models to support extra weight on top. Heavy weight placed on top of the case may cause damage to the case as well as personal injury.

# Trouble Shooting Self-Contained Cases

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## Trouble Shooting Self-Contained Refrigerated Cases

### PROBLEM: WILL NOT HOLD TEMPERATURE

- Check the electronic thermostat setting.
- Is the air filter clogged or dirty?
- Are any air conditioner vents blowing into or toward the case? Are any spotlights shining into the case?
- Is the case near a door?
- Is the case in direct sunlight?
- Is there cooking equipment or hood vent causing air currents?
- Is the ambient air above 75° F or 55% relative humidity?
- Is the condensing coil clean?
- Is the evaporator coil clean?
- Are the discharge or return air vents blocked?

### PROBLEM: CASE LEAKS WATER ON FLOOR

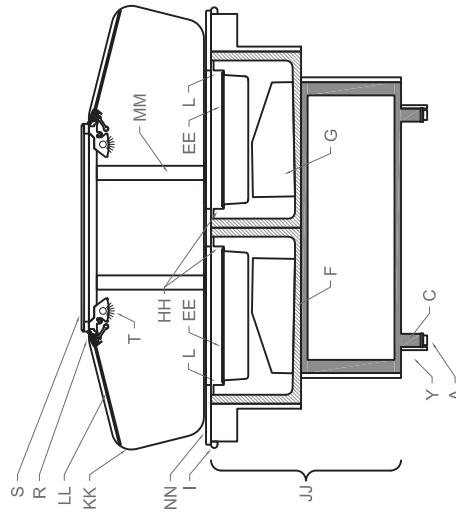
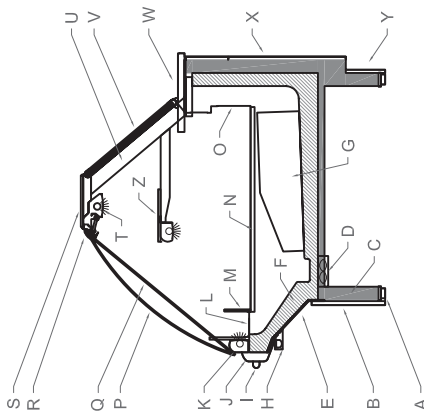
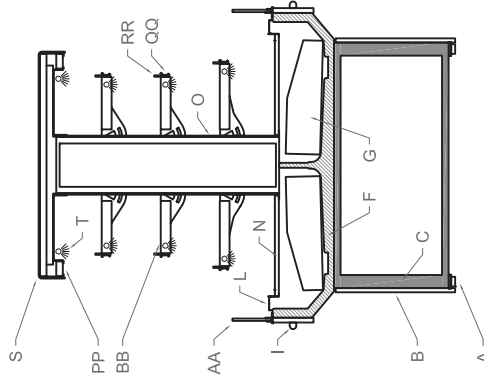
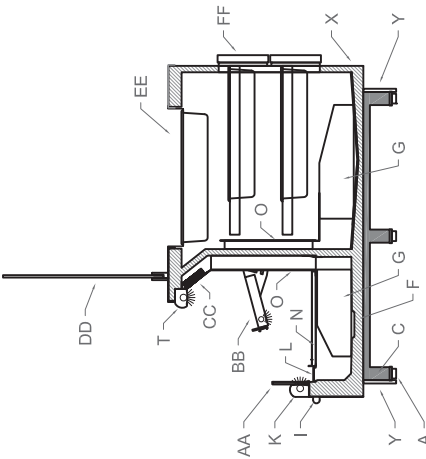
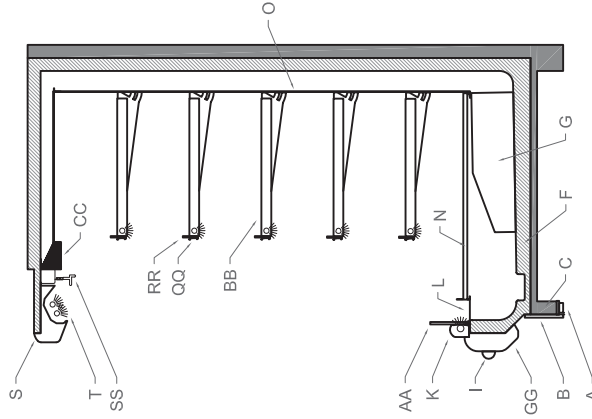
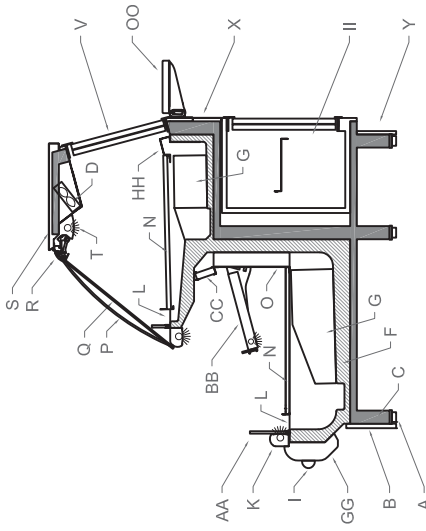
- Is the ambient air above 55% relative humidity?
- Is case drain clogged?
- Is evaporator pan (or condensate pump) overflowing?
- The electric dissipater pan cannot handle being flushed with water from cleaning.
- Cases equipped with electric dissipater pans should **never** have food products washed or poured into the drain as it will result in damage to the heating element.
- Make sure all case joints and penetrations are sealed.

### PROBLEM: CASE SWEATING

- Is the relative humidity above 55% and 75° F?
- Is the case near an open door or window?
- Is the air sweep working?

**FOR SERVICE, PARTS AND WARRANTY INFORMATION CALL 800-552-6283**  
**(Please have model and serial numbers ready. This information can be found on the name plate of the case.)**

# PARTS LEGEND



- KK - End Glass
- LL - Food Shield
- MM - Canopy Support
- NN - Customer Ledge
- OO - Flip-up Rear Ledge
- PP - Perimeter Air Discharge
- QQ - Tag Mold
- RR - Product Stop
- SS - Night Curtain

- Y - Kickplate
- Z - Mezzanine Shelf
- AA - Air Dam
- BB - Adjustable Shelf
- CC - Honey Comb
- DD - Vertical Food Shield
- EE - Refrigerated Pan Rail
- FF - Pull-out Rear Refrigerated Drawers
- GG - "Classic" Architectural Aluminum Nosing
- HH - Discharge Air Grill
- II - Open / Closed, Refrigerated / Dry Rear Storage
- JJ - Case Facade

- M - Internal Air Dam
- N - Deck Pan
- O - Plenum
- P - Curved Front Glass
- Q - Flat Front Glass
- R - Lift Glass Hardware
- S - Top Ledge
- T - Canopy Light
- U - Strut
- V - Rear Doors
- W - Rear Ledge
- X - Exterior Case Back

- A - NSF Leveler Leg
- B - Front Panel
- C - Structural Frame
- D - Front Glass Air Sweep
- E - Basin Cover
- F - Basin
- G - Coil / Fan Shroud
- H - Down Light
- I - Bumper Mold
- J - "Stealth" Architectural Aluminum Nosing
- K - Front Deck Light
- L - Return Air Grill







# Warranty & Compliance

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## Limited Warranty

TWELVE MONTH WARRANTY - SOUTHERN CASEARTS, INC.'S PRODUCTS ARE WARRANTED TO BE FREE FROM DEFECTS IN MATERIAL AND WORKMANSHIP UNDER NORMAL USE AND MAINTENANCE FOR A PERIOD OF TWELVE MONTHS FROM THE DATE OF ORIGINAL SHIPMENT. A NEW OR REBUILT PART TO REPLACE ANY DEFECTIVE PART WILL BE PROVIDED WITHOUT CHARGE, PROVIDED THE DEFECTIVE PART IS RETURNED TO SOUTHERN CASEARTS, INC. THE REPLACEMENT PART ASSUMES THE UNUSED PORTION OF THE WARRANTY.

This warranty does not include labor or other costs incurred for repairing, removing, installing, shipping, servicing, or handling of either defective parts or replacement parts.

The twelve month warranty shall not apply to any of the following:

1. To any product or any part thereof which has been subject to accident, alteration, negligence, misuse or abuse, operation on improper voltage, or which has not been operated or maintained in accordance with the Southern CaseArts, Inc.'s recommendations, or if the serial number of the unit has been altered, defaced, or removed.
2. When the product, or any part thereof, is damaged by fire, flood, or other act of God.
3. Outside the continental United States.
4. To labor cost for replacement of parts, or for freight, shipping expenses, sales tax or upgrading.
5. When the operation is impaired due to improper installation.

THIS PLAN DOES NOT COVER CONSEQUENTIAL DAMAGES. Southern CaseArts, Inc. shall not be liable under any circumstances for any consequential damages of any kind, including without limitation, loss of profit, use or revenue or additional labor cost, loss of refrigerant or food products, or injury to person(s) or property caused by or resulting from any defective products, material or parts, or for any delay in its performance hereunder due to causes beyond its control.

This warranty is expressly in lieu of all other warranties, express or implied and all other obligations or liabilities on Southern CaseArts, Inc.'s part. The obligation to repair or replace parts or components determined to be defective in material or workmanship shall be Southern CaseArts, Inc.'s only and entire liability whether based on tort, contract, warranty or any other theory. Southern CaseArts, Inc. neither assumes nor authorizes any other person or entity to assume for it any other liability in connection with any product(s). The foregoing shall constitute the sole and exclusive liability of Southern CaseArts, Inc.

Customer's acceptance and/or use of any Southern CaseArts, Inc. product(s) constitutes customer's acceptance of and agreement with all terms and provisions of this limited warranty.

MAIL CLAIM TO:  
SOUTHERN CASEARTS, INC.  
275 DREXEL ROAD S.E.  
BESSEMER, AL. 35022

# Liabilty Notice

## Shelf Lighting System

Southern CaseArts,inc will not be liable for any direct or indirect exposure to water or other liquids on the shelf lighting system. The use of a water hose or misting system on a display case with shelf lighting can lead to a number of serious issue.This could cause electrical failures, electric shock,fire and mold which could lead to injury death sickness and property damage.**Do not use water hoses misting systems or any device that sprays liquid, on a display case with lighted shelves.**The lighting on the case is not designed to be exposed to water or other liquids. If a water hose or misting system is used or installed Southern CaseArts will not be subject to any liabilities or obligations. Any personal injury, death or property damage resulting from an electrical failure, fire ,electric shock or mold.South-ern casearts shall not be subject to any obligation or liabilities from the above notice.



### WARNING

**Improper voltage on the DC power supplies may damage the LED lamp.**



### WARNING

**LED 12v DC power supply needs to be replaced with a 12v DC power supply. Led 24v DC power supply need to be replaced with a 24v DC power supply. Never use a T5/T8 ballast of any kind to replace 12v DC or 24v DC power supply. T5 /T8 ballasts are much higher voltage and operate on AC not DC current. If a T5/T8 ballast is used for replacement to a DC power supply it will damage the LED system and could cause injuries fire, or damage to case.**



SOUTHERN  
CaseArts

275 Drexel Road S.E.  
Bessemer, AL 35022

Phone: 800.552.6283  
Fax: 205.428.2552

Your Exclusive Source for Innovative Food Displays

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## Installation, Maintenance, & Operation Guide



**P/N: LD-MN-0056-0413**