

# **Star<sup>®</sup>Max<sup>®</sup>**

## **ELECTRIC COUNTER CHAR-BROILER**

MODEL  
5124CD & 5136CD

### **Installation and Operation Instructions**

2M-Z6127 Rev. C 12/27/05



5124CD



## SAFETY SYMBOL



These symbols are intended to alert the user to the presence of important operating and maintenance instructions in the manual accompanying the appliance.

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## RETAIN THIS MANUAL FOR FUTURE REFERENCE NOTICE

Using any part other than genuine Star factory supplied parts relieves the manufacturer of all liability.

Star reserves the right to change specifications and product design without notice. Such revisions do not entitle the buyer to corresponding changes, improvements, additions or replacements for previously purchased equipment.

Due to periodic changes in designs, methods, procedures, policies and regulations, the specifications contained in this sheet are subject to change without notice. While Star International Holdings Inc., Company exercises good faith efforts to provide information that is accurate, we are not responsible for errors or omissions in information provided or conclusions reached as a result of using the specifications. By using the information provided, the user assumes all risks in connection with such use.

## MAINTENANCE AND REPAIRS

Contact your local authorized service agent for service or required maintenance.

Please record the model number, serial number, voltage and purchase date in the area below and have it ready when you call to ensure a faster service.

Model No. \_\_\_\_\_

Serial No. \_\_\_\_\_

Voltage \_\_\_\_\_

Purchase Date \_\_\_\_\_

### Authorized Service Agent Listing

Reference the listing provided with the unit

or

for an updated listing go to:

**Website:** [www.star-mfg.com](http://www.star-mfg.com)  
**E-mail** [Service@star-mfg.com](mailto:Service@star-mfg.com)

### Service Help Desk

**Business Hours:** 8:00 am to 4:30 p.m. Central Standard Time

**Telephone:** (314) 678-6303

**Fax:** (314) 781-2714

**E-mail** [Parts@star-mfg.com](mailto:Parts@star-mfg.com)  
[Service@star-mfg.com](mailto:Service@star-mfg.com)  
[Warranty@star-mfg.com](mailto:Warranty@star-mfg.com)

**Website:** [www.star-mfg.com](http://www.star-mfg.com)

**Mailing Address:** Star International Holdings Inc., Company  
10 Sunnen Drive  
St. Louis, MO 63143  
U.S.A

## SPECIFICATIONS

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### 5124CD

**Type:** Infinite Control, 2 Controls, 6.6 KW, 396 sq. in. (2555 sq. cm) Grid Area  
**Weight:** Installed - 98 lb. (45 kg); Shipping - 145 lb. (66 kg)  
**Dimensions:** 24" W x 25 5/8" D x 14 1/4" H  
(61cm W x 65cm D x 36cm H)  
**Volts:** 240V, 3 PH Amps: x - 18.8 y - 18.8 z - 11.9  
240V, 1 PH Amps: 27.5  
208V, 3 PH Amps: x - 21.8 y - 21.8 z - 13.8  
208V, 1 PH Amps: 31.8

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### 5136CD

**Type:** Infinite Control, 3 Controls, 9.9 KW, 594 sq. in (3832 sq. cm) Grid Area  
**Weight:** Installed - 175 lb (80 kg); Shipping - 215 lb. (98 kg)  
**Dimensions:** 36" W x 25 5/8" D x 14 1/4"H  
(91 cm W x 65 cm D x 36 cm H)  
**Volts:** 240V, 3 PH Amps: x - 23.9 y - 23.9 z - 23.9  
240V, 1 PH Amps: 41.3  
208V, 3 PH Amps: x - 27.6 y - 27.6 z - 27.6  
208V, 1 PH Amps: 47.6

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## GENERAL INSTALLATION INSTRUCTIONS

This equipment is designed and sold for commercial use only by personnel trained and experienced in its operation and is not sold for consumer use in and around the home nor for use directly by the general public in food service locations.

Before using your new equipment, read and understand all the instructions & labels associated with the unit prior to putting it into operation. Make sure all people associated with its use understand the units operation & safety before they use the unit.

All shipping containers should be checked for freight damage both visible and concealed. This unit has been tested and carefully packaged to insure delivery of your unit in perfect condition. If equipment is received in damaged condition, either apparent or concealed, a claim must be made with the delivering carrier.

Concealed damage or loss - if damage or loss is not apparent until after equipment is unpacked, a request for inspection of concealed damage must be made with carrier within 15 days. Be certain to retain all contents plus external and internal packaging materials for inspection. The carrier will make an inspection and will supply necessary claim forms.

These Electric Char-broilers are equipped for the voltage and wattage indicated on the nameplate mounted on the front panel. These units are designed to operate on alternating current (AC) only. **DO NOT CONNECT TO DIRECT CURRENT (DC).**

## INSTALLATION

The installation of this appliance should conform to the national electric code and local electric codes and ordinances and the local electric company rules and regulations.

For your protection, we recommend that a qualified electrician install this appliance. The electrician should be familiar with electrical installations and local electrical requirements. The external wiring should be in conduit or an approved type of flexible cable suitable for operation at 90° C and sized to carry the load. Use copper wire only. The supply circuit should be properly fused and equipped with a means of disconnecting as required by local electrical code. The body of the appliance should be grounded (**Do not ground to a gas supply pipe**).

1. Locate the unit: Do not install the unit closer than 12 inches from a side wall and/or closer than 9 inches from a rear wall.
2. Level the char-broiler by adjusting the feet, which have provision for 1 inch of adjustment. This adjustment also allows a perfect alignment to be achieved with other Star-Max™ units.
3. The pigtail leads can be accessed by removing the cover plate from the back of the broiler.
4. Fill the water pan on the broiler prior to use. Water should be flush with the bottom of the splash baffles. Make sure water is present in the pan at all times.

**Note: The pan is easily removable for cleaning.**



**CAUTION**

## CAUTION

### CARE MUST BE TAKEN WHEN OPENING PAN TO PREVENT SPILLING.

5. The charbroiler is equipped with modular grates that are readily removable for cleaning. Each heated section is controlled by a separate heat control switch.
6. Seasoning - Set the heat control switch to the low position and preheat for about 15 to 20 minutes. Using a cloth, spread a thin film of cooking oil over the top of the grate surface. Allow the film to remain on the grate for about 5 minutes. Wipe the surface clean and apply another film of cooking oil. Wipe the surface clean again. The broiler is now ready for use. The oil may tend to smoke - this is normal.
7. Approximate grilling temperatures range from 350° F (with no product on the grill) on low setting to 570° F on high.

## **CLEANING**

1. Clean with a clean soft cloth daily. Any discoloration can be removed with a non-abrasive cleaner.
2. Remove the water pan and cooking grates. Wash them in a sink.
3. To clean heating element, first remove the grates. Swing the element housing to a vertical position and lock it in place with the support located in the center. Clean the elements with a stiff wire brush or equivalent.
4. Heat baffles are located directly below the heating elements and are removable for cleaning in a sink.

Visit our Website at: [www.star-mfg.com](http://www.star-mfg.com)

Email: [service@star-mfg.com](mailto:service@star-mfg.com)

### THOROUGHLY INSPECT YOUR UNIT ON ARRIVAL

This unit has been tested for proper operation before leaving our plant to insure delivery of your unit in perfect condition. However, there are instances in which the unit may be damaged in transit. In the event you discover any type of damage to your product upon receipt, you must immediately contact the transportation company who delivered the item to you and initiate your claim with same. If this procedure is not followed, it may affect the warranty status of the unit.

### LIMITED EQUIPMENT WARRANTY

All workmanship and material in Star products have a one (1) year limited warranty on parts & labor in the United States and Canada. Such warranty is limited to the original purchaser only and shall be effective from the date the equipment is placed in service. Star's obligation under this warranty is limited to the repair of defects without charge, by the factory authorized service agency or one of its sub-agencies. Models that are considered portable (*see below*) should be taken to the closest Star service agency, transportation prepaid.

- > Star will not assume any responsibility for loss of revenue.
- > On all shipments outside the United States and Canada, see International Warranty.
- \* The warranty period for the JetStar six (6) ounce & Super JetStar eight (8) ounce series popcorn machines is two (2) years.
- \* The warranty period for the Chrome-Max Griddles is five (5) years on the griddle surface. See detailed warranty provided with unit.
- \* The warranty period for Teflon/Dura-Tec coatings is one year under normal use and reasonable care. This warranty does not apply if damage occurs to Teflon/Dura-Tec coatings from improper cleaning, maintenance, use of metallic utensils, or abrasive cleaners, abrasive pads, product identifiers and point-of-sale attachments, or any other non-food object that comes in continuous contact with the roller coating. This warranty does not apply to the "non-stick" properties of such materials.
- > This warranty does not apply to "Special Products" but to regular catalog items only. Star's warranty on "Special Products" is six (6) months on parts and ninety (90) days on labor.
- > This warranty does not apply to any item that is disassembled or tampered with for any purpose other than repair by a Star Authorized Service Center or the Service Center's sub-agency.
- > This warranty does not apply if damage occurs from improper installation, misuse, wrong voltage, wrong gas or operated contrary to the Installation and Operating instructions.
- > This warranty is not valid on Conveyor Ovens *unless* a "start-up/check-out" has been performed by a Factory Authorized Technician.

### PARTS WARRANTY

Parts that are sold to repair out of warranty equipment are warranted for ninety (90) days. The part only is warranted. Labor to replace the part is chargeable to the customer.

### SERVICES NOT COVERED BY WARRANTY

1. Travel time and mileage rendered beyond the 50 mile radius limit
2. Mileage and travel time on portable equipment (*see below*)
3. Labor to replace such items that can be replaced easily during a daily cleaning routine, ie; removable kettles on fryers, knobs, grease drawers on griddles, etc.
4. Installation of equipment
5. Damages due to improper installation
6. Damages from abuse or misuse
7. Operated contrary to the Operating and Installation Instructions
8. Cleaning of equipment
9. Seasoning of griddle plates
10. Voltage conversions
11. Gas conversions
12. Pilot light adjustment
13. Miscellaneous adjustments
14. Thermostat calibration and by-pass adjustment
15. Resetting of circuit breakers or safety controls or reset buttons
16. Replacement of bulbs
17. Replacement of fuses
18. Repair of damage created during transit, delivery, & installation OR created by acts of God

### PORTABLE EQUIPMENT

Star will not honor service bills that include travel time and mileage charges for servicing any products considered "Portable" including items listed below. These products should be taken to the Service Agency for repair:

- \* The Model 510FD Fryer.
- \* The Model 526TOA Toaster Oven.
- \* The Model J4R, 4 oz. Popcorn Machine.
- \* The Model 518CMA & 526CMA Cheese Melter.
- \* The Model 12MC & 15MC & 18MCP Hot Food Merchandisers.
- \* The Model 12NCPW & 15NCPW Nacho Chip/Popcorn Warmer.
- \* All Hot Dog Equipment **except Roller Grills & Drawer Bun Warmers.**
- \* All Nacho Cheese Warmers **except Model 11WLA Series Nacho Cheese Warmer.**
- \* All Condiment Dispensers **except the Model HPD & SPD Series Dispenser.**
- \* All Specialty Food Warmers **except Model 130R, 11RW Series, and 11WSA Series.**
- \* All QCS/RCS Series Toasters **except Model QCS3 & RCS3 Series.**
- \* All Fast Steamer Models **except Direct Connect Series.**


#### ALL:

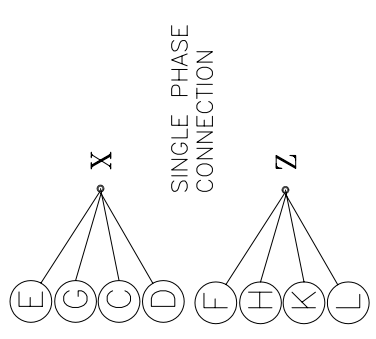
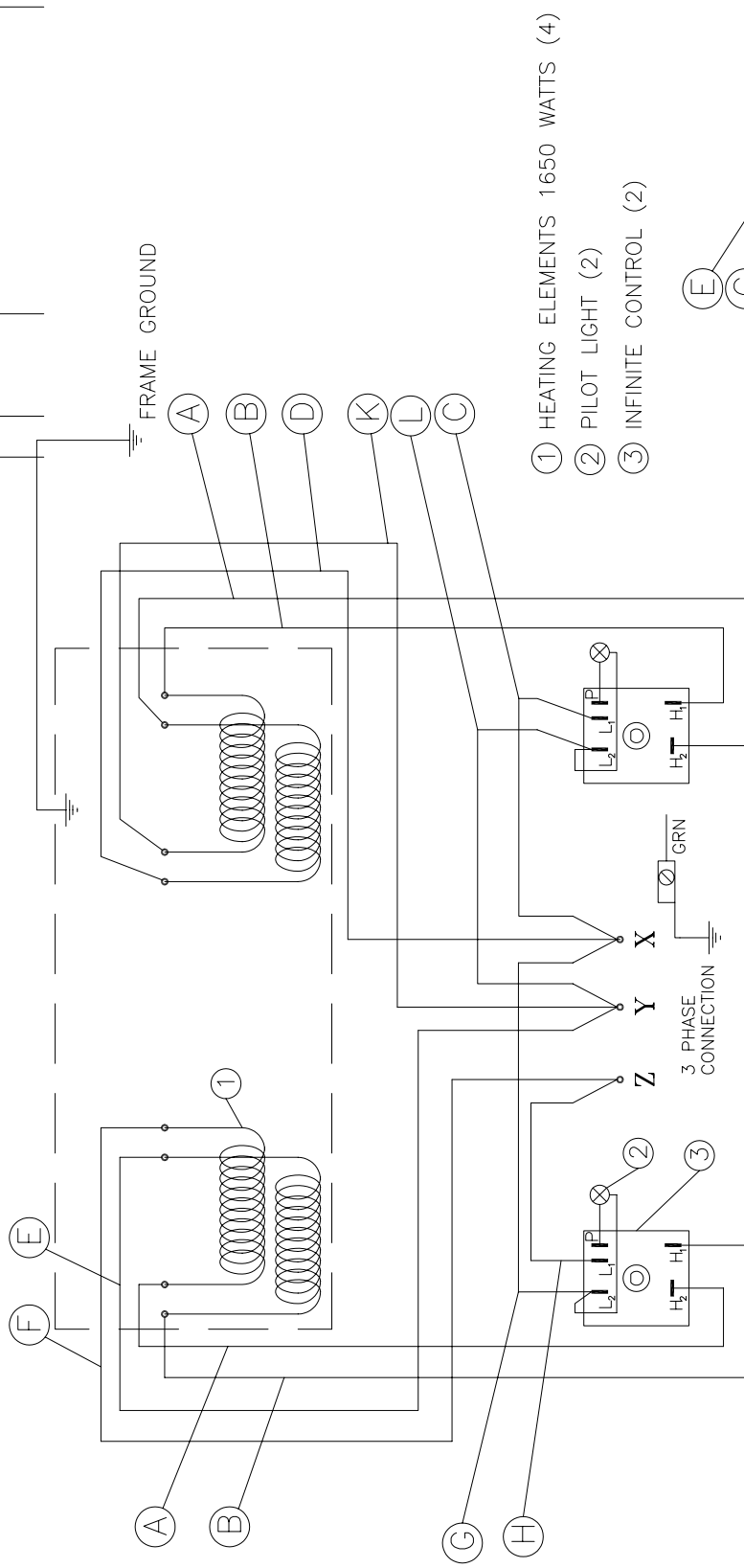
- \* Pop-Up Toasters
- \* Butter Dispensers
- \* Pretzel Merchandisers  
(Model 16PD-A Only)
- \* Pastry Display Cabinets
- \* Nacho Chip Merchandisers
- \* Accessories of any kind
- \* Sneeze Guards
- \* Pizza Ovens  
(Model PO12 Only)
- \* Heat Lamps
- \* Pumps-Manual

The foregoing warranty is in lieu of any and all other warranties expressed or implied and constitutes the entire warranty.

### FOR ASSISTANCE

Should you need any assistance regarding the Operation or Maintenance of any Star equipment; write, phone, fax or email our Service Department. In all correspondence mention the Model number and the Serial number of your unit, and the voltage or type of gas you are using.

 STAR MANUFACTURING INTERNATIONAL INC. #10 SUNNEN DRIVE, ST. LOUIS, MO. 63143, USA			MATERIAL		MODEL NO. <b>5124CD</b>		PART NO. <b>SK-1924</b>	
DR. TH	CK.	DATE	FINISH		TITLE <b>WIRING DIAGRAM</b>			
		<b>2-20-03</b>	~		REVISIONS	LTR	DATE	DESCRIPTION OF CHANGE
TOLERANCES UNLESS OTHERWISE NOTED FRACTIONS ± 1/64 DECIMALS ± .005			THIS DRAWING CONTAINS INFORMATION CONFIDENTIAL TO STAR MFG. INT'L. INC. NO REPRODUCTION OR DISCLOSURE OF ITS CONTENTS IS PERMITTED.		DR			
					A	5-8-03	PICTORIAL CHANGE	TH

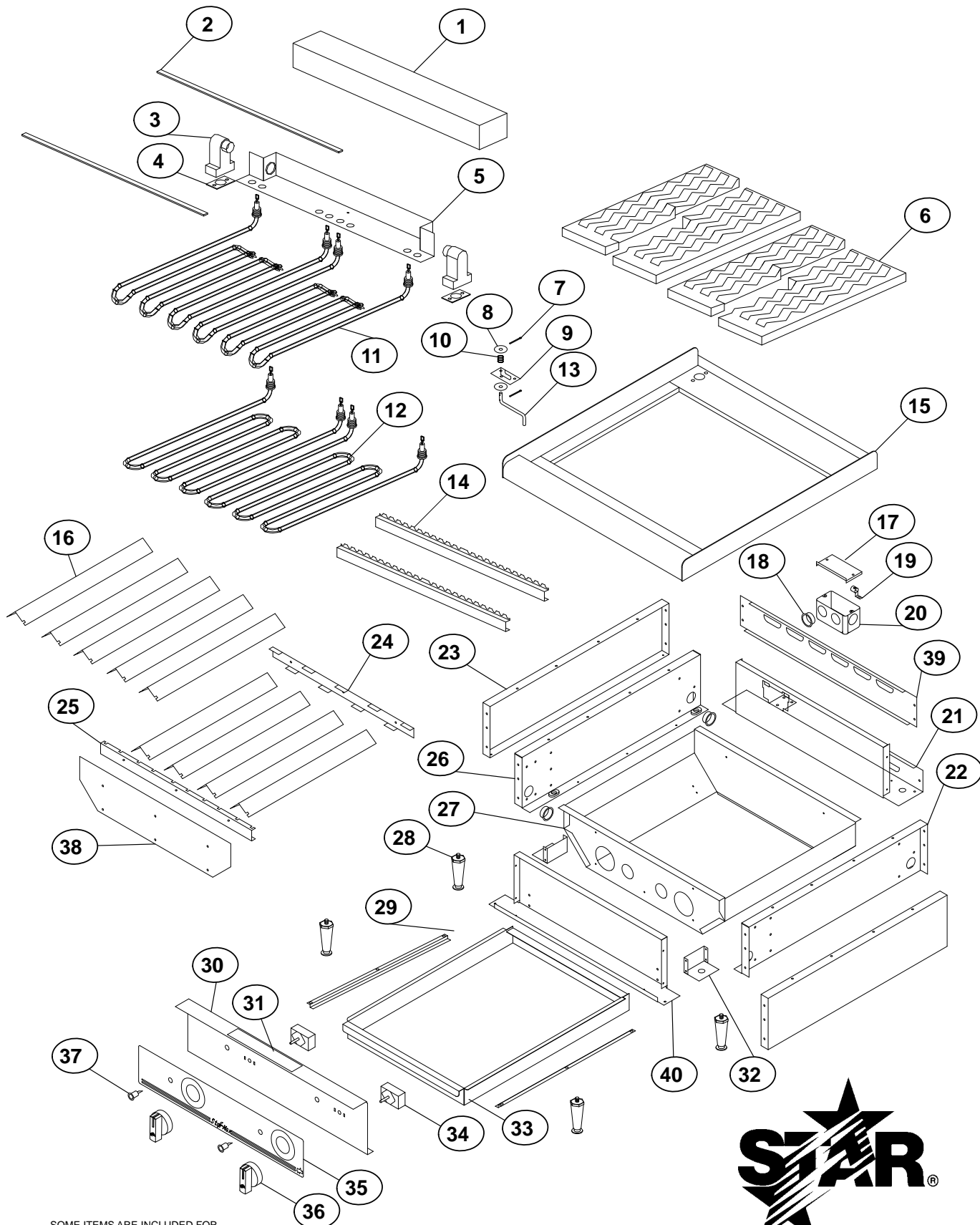


INTERNAL WIRES: 14GA AWG

FOR SUPPLY CONNECTIONS USE COPPER WIRE ONLY 90°C

3 PHASE LOADING KW PER PHASE		NOMINAL AMPERES PER LINE					
		208V 3 PH		240V 3 PH		SINGLE PHASE	
RATED WATTAGE 6600W	X-Y	Y-Z	X-Z	X	Y	Z	240V
	3.3	1.65	1.65	21.8	18.8	11.9	240V
FOR SUPPLY CONNECTIONS USE GA SHOWN OR LARGER		AWG		AWG	AWG	AWG	AWG
		# 10		# 10	# 10	# 12	# 8





SOME ITEMS ARE INCLUDED FOR  
ILLUSTRATIVE PURPOSES ONLY AND IN  
CERTAIN INSTANCES MAY NOT BE AVAILABLE

MODEL - 5124CD

STAR MANUFACTURING INTERNATIONAL, INC.

SK1983

REV. A

5/8/03



# PARTS LIST

December 27, 2005, Rev. C

## MODELS 5124CD and 5136CD Electric Counter Char-Broilers

Key Number	Part Number	Number Per Unit	Description and Model Designation
1	H1-Z6117	1	ELEMENT HOUSING COVER 5124CD
	H1-Z6118	1	ELEMENT HOUSING COVER 5136CD
2	H1-Y3115	2	ELEMENT STRAP 5124CD
	H1-Y3266	2	ELEMENT STRAP 5136CD
3	2F-Z6858	2	SUPPORT WITH BUSHING
4	2I-7370	2	GASKET
5	H1-Z6115	1	ELEMENT HOUSING 5124CD
	H1-Z6116	1	ELEMENT HOUSING 5136CD
6	2F-Y3107	4	TOP GRATE 5124CD
	2F-Y3107	6	TOP GRATE 5136CD
7	2A-5401	2	COTTER PIN
8	2C-1811	2	WASHER
9	H1-Z6122	1	PROP ROD BRACKET
10	2P-7969	1	SPRING
11	2N-Y3083	2/3	HEATING ELEMENT BENT 240V 5124CD / 5136CD
	2N-Y3084	2/3	HEATING ELEMENT BENT 208V 5124CD / 5136CD
12	2N-Y3085	2/3	HEATING ELEMENT 240V 5124CD / 5136CD
	2N-Y3086	2/3	HEATING ELEMENT 208V 5124CD / 5136CD
13	2A-Z6121	1	PROP ROD
14	H1-Z6119	2	ELEMENT CLAMP 5124CD
	H1-Z6120	2	ELEMENT CLAMP 5136CD
15	512400	1	TOP ASSEMBLY 5124CD
	513600	1	TOP ASSEMBLY 5136CD
16	H1-Z6086	9	BAFFLE 5124CD
	H1-Z6086	15	BAFFLE 5136CD
17	G3-Y7788	1	BOX COVER
18	2K-Z6183	3	BUSHING 5124CD
	2K-Z6183	5	BUSHING 5136CD
19	2C-Y2344	1	GROUND LUG
20	2E-Y7327	1	ELECTRICAL BOX
21	H1-Z6059	1	REAR ENCLOSURE 5124CD
	H1-Z6060	1	REAR ENCLOSURE 5136CD
22	G3-624303	1	SIDE LINER ASSEMBLY RIGHT
23	G3-Z5945	2	SIDE PANEL
24	H1-Z6173	1	BAFFLE FRAME REAR 5124CD
	H1-Z6085	1	BAFFLE FRAME REAR 5136CD
25	H1-Z6084	1	BAFFLE FRAME FRONT 5124CD
	H1-Z6533	1	BAFFLE FRAME FRONT 5136CD
26	G3-624302	1	SIDE LINER ASSEMBLY LEFT
27	H3-612400	1	LINER ASSEMBLY 5124CD
	H3-613600	1	LINER ASSEMBLY 5136CD
28	2A-Z5942	4	FOOT
29	G3-Z6036	2	DRAWER SLIDE
30	G3-Z5911	1	FRONT PANEL 5124CD
	G3-Z5921	1	FRONT PANEL 5136CD
31	VARIOUS	1	NAMEPLATE
32	H1-Z6123	2	FOOT SUPPORT
33	H3-Z6482	1	GREASE DRAWER 5124CD
	H3-Z6483	1	GREASE DRAWER 5136CD
34	2J-6403	2/3	INFINITE CONTROL 5124CD / 5136CD
35	2M-Z6038	1	GRAPHIC PANEL 5124CD
	2M-Z6040	1	GRAPHIC PANEL 5136CD

**IMPORTANT: WHEN ORDERING, SPECIFY VOLTAGE OR TYPE GAS DESIRED  
INCLUDE MODEL AND SERIAL NUMBER**

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OF 2

Some items are included for illustrative purposes only and in certain instances may not be available.



**Star Manufacturing International, Inc.**

# PARTS LIST

December 27, 2005, Rev C

MODELS 5124CD and 5136CD Electric Counter Char-Broilers

Key Number	Part Number	Number Per Unit	Description and Model Designation
36	2R-Z3436	2/3	KNOB 5124CD / 5136CD
37	2J-Y6690	2/3	PILOT LIGHT 5124CD / 5136CD
38	H1-Z6082	1	LINER COVER 5124CD
	H1-Z6083	1	LINER COVER 5136CD
39	H1-Z6054	1	REAR PANEL 5124CD
	H1-Z6056	1	REAR PANEL 5136CD
40	H1-Z6059	1	FRONT ENCLOSURE 5124CD
	H1-Z6060	1	FRONT ENCLOSURE 5136CD
NA	2E-Z6113	1	WIRE SET 5124CD
	2E-Z6114	1	WIRE SET 5136CD

**IMPORTANT: WHEN ORDERING, SPECIFY VOLTAGE OR TYPE GAS DESIRED  
INCLUDE MODEL AND SERIAL NUMBER**

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OF 2

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