

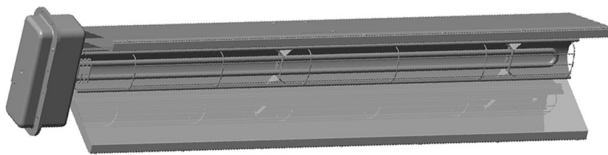
Chromalox®

Installation, Operation and **RENEWAL PARTS IDENTIFICATION**

SERVICE REFERENCE

DIVISION 4	SECTION
SALES REFERENCE (Supersedes PG435)	PG435-1
161-304901-003	
DATE	NOVEMBER, 2003

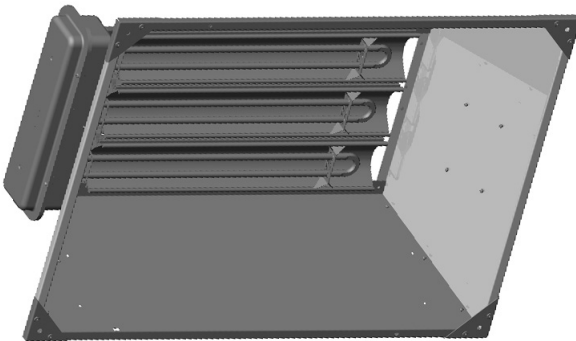
STAR-05A, -06A and -14A Cart Kit For Conversion of Fixed Style to Portable Style



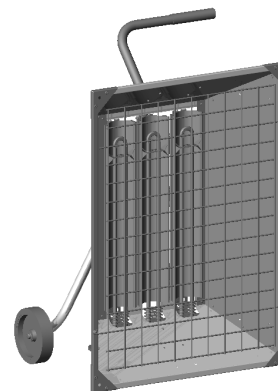
STAR-05A Fixed Heater
Before Conversion
See Page 2 – Fig. 1



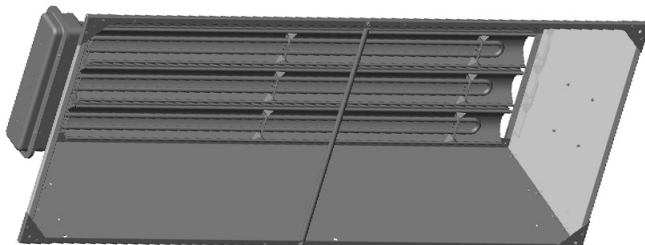
STAR-05 Portable Heater
After Conversion
See Page 2 – Fig. 2



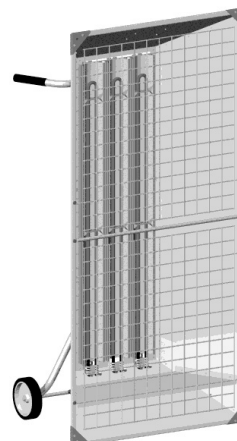
STAR-06A Fixed Heater
Before Conversion
See Page 3 – Fig. 1



STAR-06A Portable Heater
After Conversion
See Page 3 – Fig. 2



STAR-14A Fixed Heater
Before Conversion
See Page 4 – Fig. 1



STAR-14A Portable Heater
After Conversion
See Page 4 – Fig. 2

4.5 kW UNIT CONVERSION INSTRUCTIONS

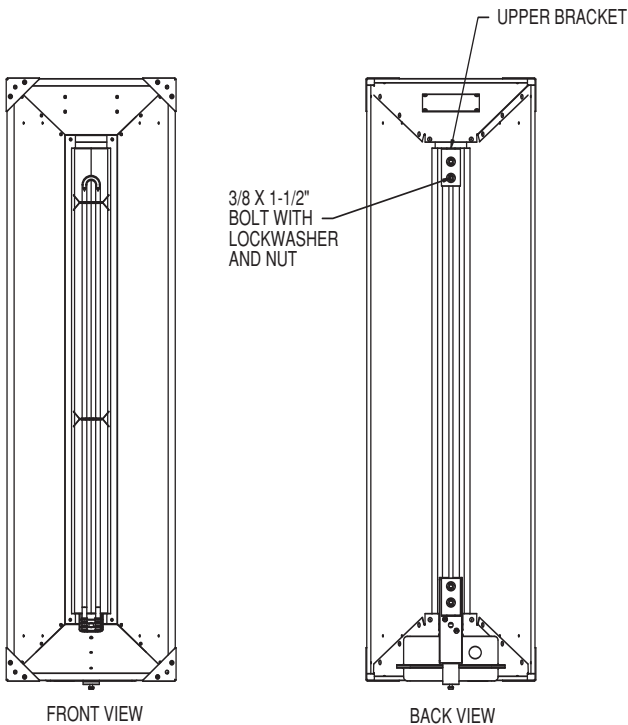
INSTRUCTIONS FOR CONVERTING A FIXED STYLE INTO A PORTABLE STYLE

(Installation of Cart making it a Portable Heater Voids UL Listing)

- The kit (168-053169-079) that converts a 4.5 kW fixed style radiant heater into a portable includes the following parts. Verify that all parts are included, if not, contact the Chromalox Service Department at 1-800-368-2493.

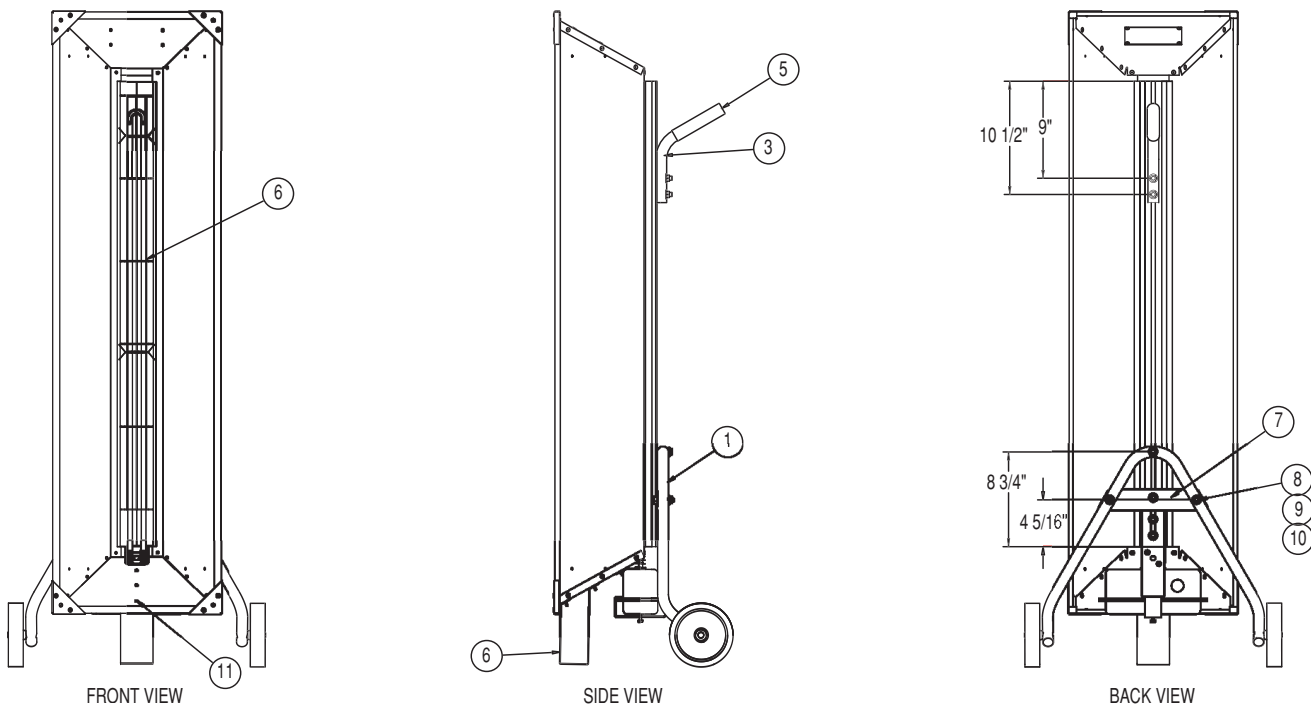
- | | |
|---------------------|---|
| (1) Lower Leg Assy. | (7) 3/8-16 x 1-1/2" Long Bolts (4 Req'd) |
| (2) Upper Handle | (8) 3/8-16 Nuts (2 Req'd) |
| (3) Front Leg | (9) 3/8 Lockwashers (4 Req'd) |
| (4) Grip | (10) 10-32 x 1/2" Long Self Tapping Screw (2 Req'd) |
| (5) Grille | |
| (6) Cross Brace | |

- Loosen nuts on upper bracket and remove bracket. Bolts, lockwashers and nuts will be reused, but upper bracket can be disregarded.
- Using the bolts, lockwashers and nuts removed in step 3, slide one of the bolts in the extrusion groove to the 4-5/16" dimension and one 3/8" bolt to the 8-3/4" dimension.
- Place the cross brace (7) on the bolt and secure in place using the lockwashers and nuts provided.
- Place lower leg assy. (1) onto brace and upper 3/8" bolts. Slide the 3/8-16 x 1-1/2" long bolts through the cross brace (7) and the lower leg (1). Secure in place with lockwashers and nuts provided.
- Slide the two (2) 3/8-16 x 1-1/2" long bolts into the top center extrusion. Locate one at 3/4" and the other at 2-1/4" as shown.
- Place upper handle (3) onto two (2) bolts. Secure in place with washers and nuts provided.
- Slide grip (7) onto end of upper handle (5).
- Stand heater vertically. If heater does not sit evenly, loosen nuts that secure lower leg assy and adjust accordingly.
- Rotate heater back until handle (3) is on floor.
- Install front leg (4) with two 10-32 x 1/2" long self tapping screws (11).
- Snap grille (6) into lip of extrusion.

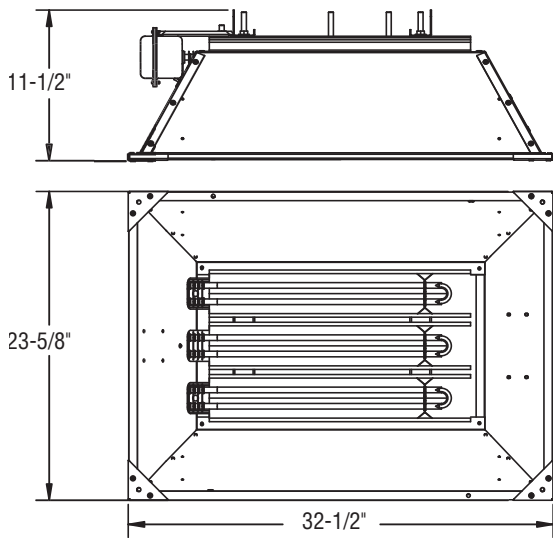


4.5 kW FIXED STYLE HEATER

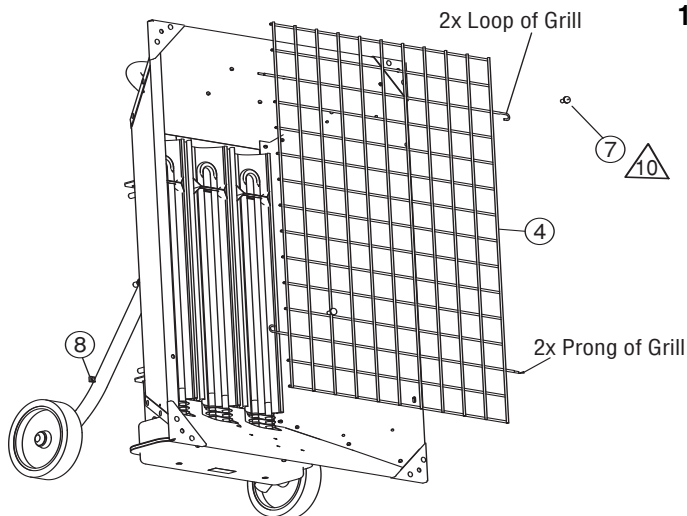
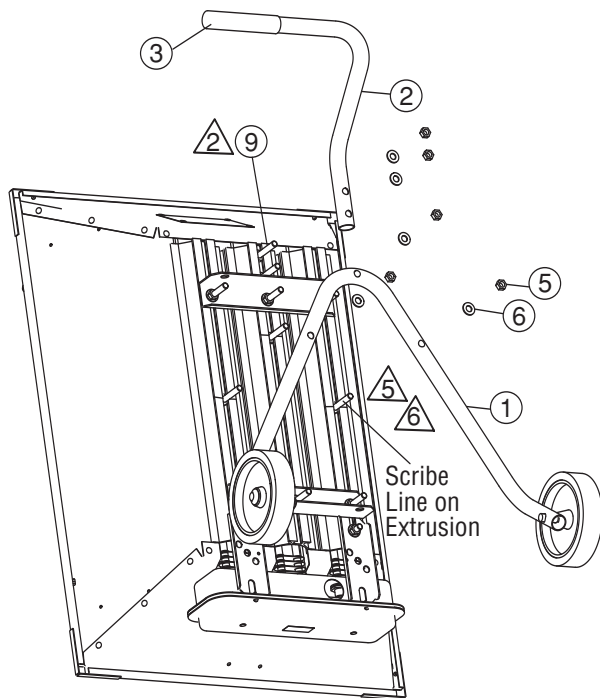
4.5 kW FIXED STYLE HEATER MODIFIED TO ADD CART AND GRILLE



6.0 kW UNIT CONVERSION INSTRUCTIONS



6.0kW Fixed Style Heater



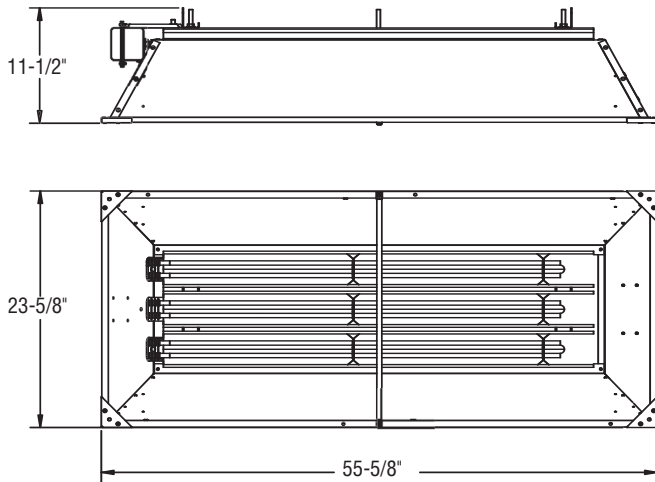
INSTRUCTIONS FOR CONVERTING A FIXED STYLE INTO A PORTABLE STYLE (Installation of Cart making it a Portable Heater Voids UL Listing)

- The kit (168-053169-079) that converts a 6.0 kW fixed style radiant heater includes the following parts. Verify that all parts are included, if not, contact the Chromalox Service Department at 1-800-368-2493.

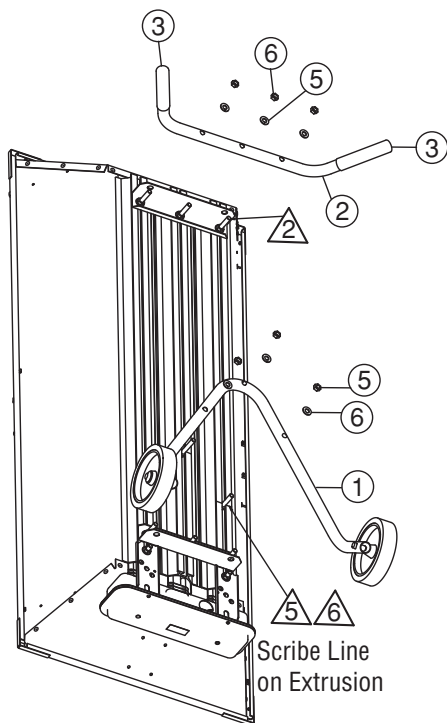
(1) Lower Leg	(10) 1/4-20 x 1/2" Long Bolt (4 Req'd)
(2) Axle	(11) 1/4-20 Square nut (4 Req'd)
(3) Wheel (2 Req'd)	(12) Pop Rivet (4 Req'd)
(4) Cap (2 Req'd)	(13) No. 10 Sheet Metal Screw (Req'd)
(5) Upper Handle	(14) 3/8-16 x 1-1/2" Long Bolts (2 Req'd)
(6) Front Leg	(15) 3/8-16 Nuts (2 Req'd)
(7) Grip	(16) 3/8 Lockwashers (2 Req'd)
(8) Grille	(17) 10-32 x 1/2" Long Self Tapping Screw (2 Req'd)
- Using hammer tap cap (4) onto one end of axle (2). Slide one wheel (3) onto axle. Slide end of axle through both holes of lower leg (1). Slide remaining wheel onto portion of axle protruding through lower leg. Tap cap on axle.
- Remove Lower Bracket by removing nuts and washers.
- Slide the two (2) 3/8" bolts in the outer extrusions to the 4-1/2" dimension and the one (1) 3/8" bolt in the center extrusion to the 8-15/16" dimension.
- Place lower leg assy made in step 2 onto the three (3) bolts. Secure in place with washers and nuts removed in step 3.
- Loosen three nuts on upper bracket and reposition to the 3" dimension shown.
- Slide the two 3/8-16 x 1-1/2" long bolts (14) into the top center extrusion. Locate one at 3/4" and the other at 2-1/4" as shown.
- Place upper handle (5) onto two bolts. Secure in place with washers and nuts provided.
- Slide grip (7) onto end of upper handle (5).
- Stand heater vertically. If heater does not sit evenly, loosen nuts that secure lower leg assy and adjust accordingly.
- Rotate heater back until handle (5) is on floor.
- Install front leg (6) with two 10-32 x 1/2" long self tapping screws (17).
- Install baffle (8) using pop rivets, if pop rivet gun is not available use the No. 10 sheet metal screws.
- Place grille prongs into slots of reflector using a counterclockwise rotation see Detail A. Insert 1/4-20 screws through looped end of grille with 1/4-20 square nut on opposite side. Tighten screws with screw driver.
- If fixed heater is being converted to a portable by the factory, then drill out nameplate rivets and replace nameplate with 196-891789-004.

**6.0 kW Fixed Style Heater
Modified to add cart, baffle and grille**

13.5 kW UNIT CONVERSION INSTRUCTIONS



13.5 kW Fixed Style Heater



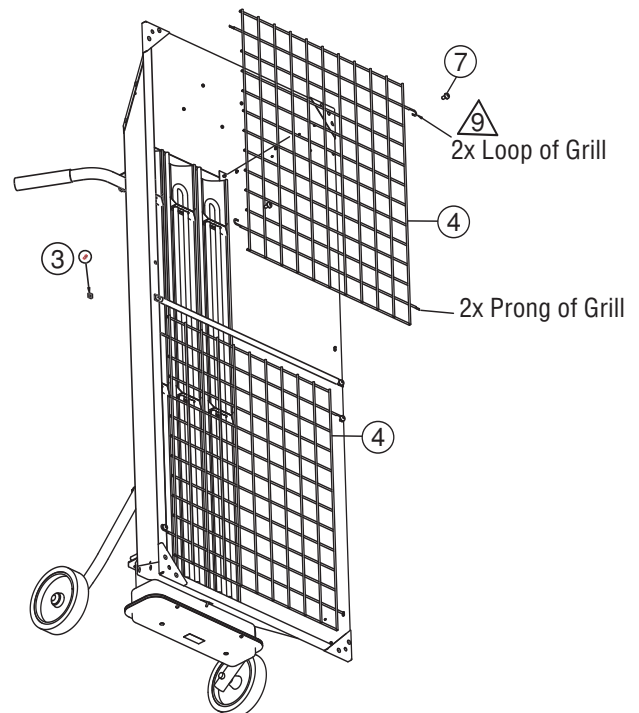
**13.5 kW Fixed Style Heater
Modified to add cart, baffle and grille**

INSTRUCTIONS FOR CONVERTING A FIXED STYLE INTO A PORTABLE STYLE

(Installation of Cart making it a Portable Heater Voids UL Listing)

- The kit (168-053169-057) that converts a 13.5 kW fixed style radiant heater into a portable includes the following parts. Verify that all parts are included, if not, contact the Chromalox Service Department at 1-800-368-2493.

(1) Lower Leg	(7) Grille (2 Req'd)
(2) Axle	(8) Baffle
(3) Wheel (2 Req'd)	(9) 1/4-20 x 1/2" long bolt (4 Req'd)
(4) Cap (2 Req'd)	(10) 1/4-20 Square nut (4 Req'd)
(5) Upper Handle	(11) Pop Rivet (6 Req'd)
(6) Grip (2 Req'd)	(12) No. 10 Sheet Metal Screw (6 Req'd)
- Using hammer tap cap (4) onto one end of axle (2). Slide one wheel (3) onto axle. Slide end of axle through both holes of lower leg (1). Slide remaining wheel onto portion of axle protruding through lower leg. Tap cap on axle.
- Remove Lower Bracket by removing nuts and washers.
- Slide the two 3/8" bolts in the outer extrusions to the 7-3/32" dimension and the one 3/8" bolt in the center extrusion to the 11-17/32" dimension.
- Place lower leg assembly made in step 2 onto the three bolts. Secure in place with washers and nuts removed in step 3.
- Remove upper bracket by removing nuts and washers.
- Place upper handle (5) onto three bolts. Secure in place with washers and nuts removed in step 6.
- Slide grips (6) onto ends of upper handle.
- Stand heater vertically. If heater does not sit evenly, loosen nuts that secure lower leg assembly and adjust accordingly.
- Rotate heater back until handle (5) is on floor.
- Install baffle (8) using pop rivets, if pop rivet gun is not available use the NO. 10 sheet metal screws.
- Place grille prongs into slots of reflector using a counterclockwise rotation see Detail A. Insert 1/4-20 bolts (9) through looped end of grille with 1/4-20 square nut (10) on opposite side. Tighten screws with screw driver.
- Install remaining grille in same manner as step 12.
- If fixed heater is being converted to a portable by the factory, then drill out nameplate rivets and replace nameplate with 196-891789-004.



GENERAL

IMPORTANT: SAVE THESE INSTRUCTIONS

⚠ WARNING

FIRE HAZARD. Do not use as a residential or household heater. Keep combustible material away from heater. Do not operate heater where flammable vapors, gases or liquids are present.

To avoid personal injury read “IMPORTANT INSTRUCTIONS” on this page before installation or operation of heater.

IMPORTANT INSTRUCTIONS

When using electrical appliances, basic precautions should always be followed to reduce risk of fire, electric shock and injury to persons, including the following:

1. Read all instructions before using this heater.
2. This heater is hot when in use. To avoid burns, do not let bare skin touch hot surfaces. Keep combustible materials, such as furniture and papers at least 7 feet from the front of the heater.
3. **Do not leave heater unattended while in operation.**
4. Always disconnect heater when not in use.
5. Do not use outdoors in areas subject to wind.
6. Connect to properly grounded outlets or building ground.

7. This heater has hot surfaces. Do not use it in areas where gasoline, paint or flammable liquids are used or stored.
8. Use this heater only as described in this manual. Any other use not recommended by the manufacturer may cause fire, electric shock or injury to persons.
9. In order to prevent equipment damage, protect with a ground fault device such as Chromalox STAR-TG series monitor.
10. **These instructions amend the fixed instructions that came with the original heater.**

SAVE THESE INSTRUCTIONS

WIRING

Use type “SO” or equal power cord. Refer to table 1 for proper wire gage and number of conductors.

Table 1

Model	Volts	KW	Amperage		Cord Ga./No. cond.	
			1 Phase	3 Phase	1 Phase	3 Phase
STAR-05-81-P	208	4.5	21.6	NA	12/3	NA
STAR-05-21-P	240	4.5	18.8	NA	12/3	NA
STAR-05-71-P	277	4.5	16.2	NA	14/3	NA
STAR-05-41-P	480	4.5	9.4	NA	14/3	NA
STAR-05-61-P	600	4.5	7.5	NA	14/3	NA
STAR-06-83-P	208	6	28.8	16.7	10/3	12/4
STAR-06-23-P	240	6	25.0	14.4	10/3	12/4
STAR-06-71-P	277	6	21.7	—	10/3	—
STAR-06-43-P	480	6	12.5	7.2	12/3	12/4
STAR-06-63-P	600	6	10.0	5.8	12/3	12/4
STAR-14-83-P	208	13.5	NR	37.5	NR	6/4
STAR-14-23-P	240	13.5	NR	32.5	NR	8/4
STAR-14-71-P	277	13.2	47.7	—	6/3	—
STAR-14-43-P	480	13.5	28.1	16.2	10/3	12/4
STAR-14-63-P	600	13.5	22.5	13.0	10/3	12/4

NA - Not Available
NR - Not Recommended

RENEWAL PARTS IDENTIFICATION

Wheel 333-557518-001
End Cap 039-510848-001
Vinyl Grip 024-304894-001
Grill for STAR-06 143-304892-001

Grills for STAR-14 (2) 134-304892-003
Hardware for Mounting Grills GR14TW
Screw 248-075512-123
Square Nut 200-048688-007

Limited Warranty:
Please refer to the Chromalox limited warranty applicable to this product at
<http://www.chromalox.com/customer-service/policies/termsofsale.aspx>.

Chromalox[®]
PRECISION HEAT AND CONTROL
2150 N. RULON WHITE BLVD., OGDEN, UT 84404
Phone: 1-800-368-2493 www.chromalox.com