

# Chromalox®

## *Installation, Operation* and **RENEWAL PARTS IDENTIFICATION**

### SERVICE REFERENCE

DIVISION 4	SECTION
SALES REFERENCE	PG442
161-025617-001	
DATE	OCTOBER, 2003

## **Type RBC-1 Radiant Heater For Fixed Overhead Installations**

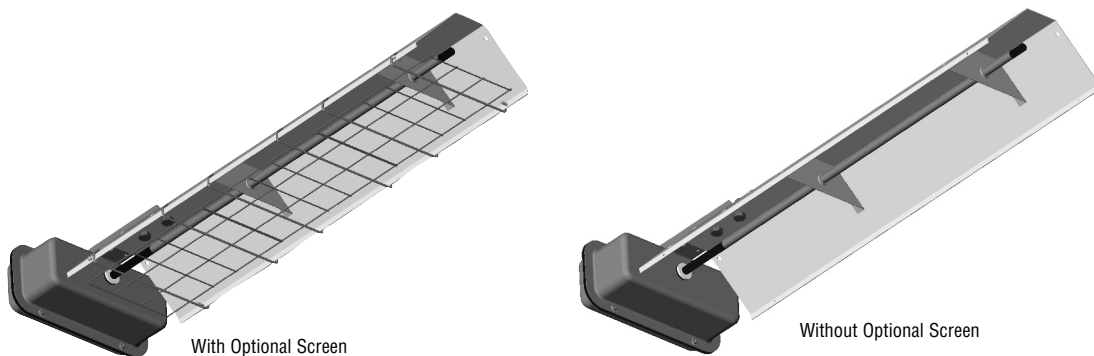


Figure 1

Specifications – Table 1

Model	Volts	Watts	Amperage	BTU	Dimensions			Wire Ga. (Min.)
					A Length	B Width	D Depth	
RBC-1101	120	1000	8.3	3412	27.125" (689 mm)	8.375" (212 mm)	3.5" (88.9)	14 Ga
RBC-1108	208	1000	4.8	3412				
RBC-1102	240	1000	4.2	3412				
RBC-1107	277	1000	3.6	3412				
RBC-11034	347	1000	2.9	3412				
RBC-1151	120	1500	12.5	5118	35.625" (905 mm)	8.375" (212 mm)	3.5" (88.9)	14 Ga
RBC-1158	208	1500	7.2	5118				
RBC-1152	240	1500	6.3	5118				
RBC-1157	277	1500	5.4	5118				
RBC-11534	347	1500	4.3	5118				
RBC-1208	208	2000	9.6	6824	46.625" (1184 mm)	8.375" (212 mm)	3.5" (88.9)	14 Ga
RBC-1202	240	2000	8.3	6824				
RBC-1207	277	2000	7.2	6824				
RBC-12034	347	2000	5.8	6824				
RBC-1258	208	2500	12.0	8530	53.375" (1356 mm)	8.375" (212 mm)	3.5" (88.9)	14 Ga
RBC-1252	240	2500	10.4	8530				
RBC-1257	277	2500	9.0	8530				
RBC-12534	347	2500	7.2	8530				

## 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.**

## INSTALLATION

The Chromalox RBC-1 radiant heater is shipped fully assembled. The heater can be hung from the ceiling by chains or rigid angle brackets attached to the heater brackets located on the back of the heater. (Chromalox offers hanging chain kits for these heaters that will allow for installations to 6 feet from the ceiling.)  
Minimum spacings:

- Ceiling to top of heater is 3 in.
- Wall to sides of heater is 12 in.
- Floor to bottom of heater is 10 feet.

### ⚠ CAUTION

**Installer should consult state and local codes and meet any applicable requirements regarding the installation.**

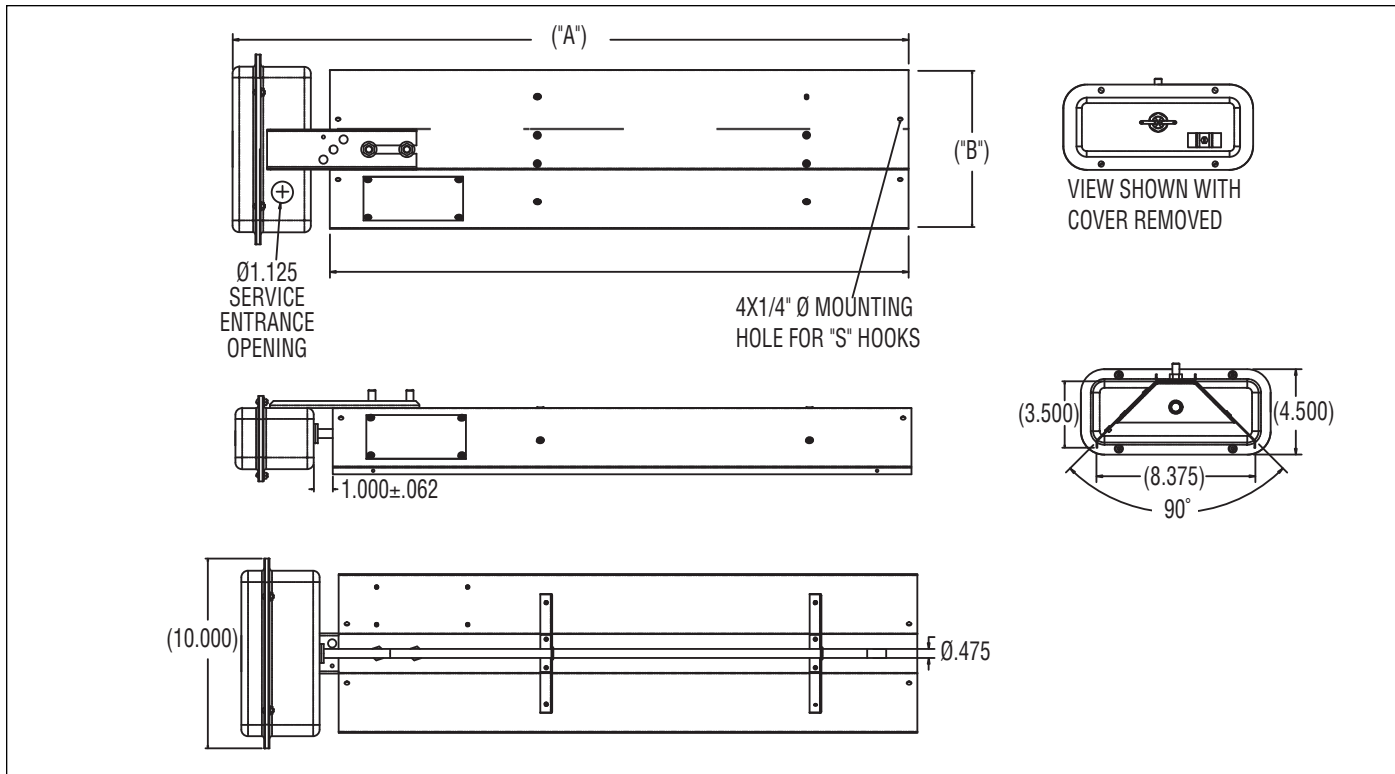


Figure 2

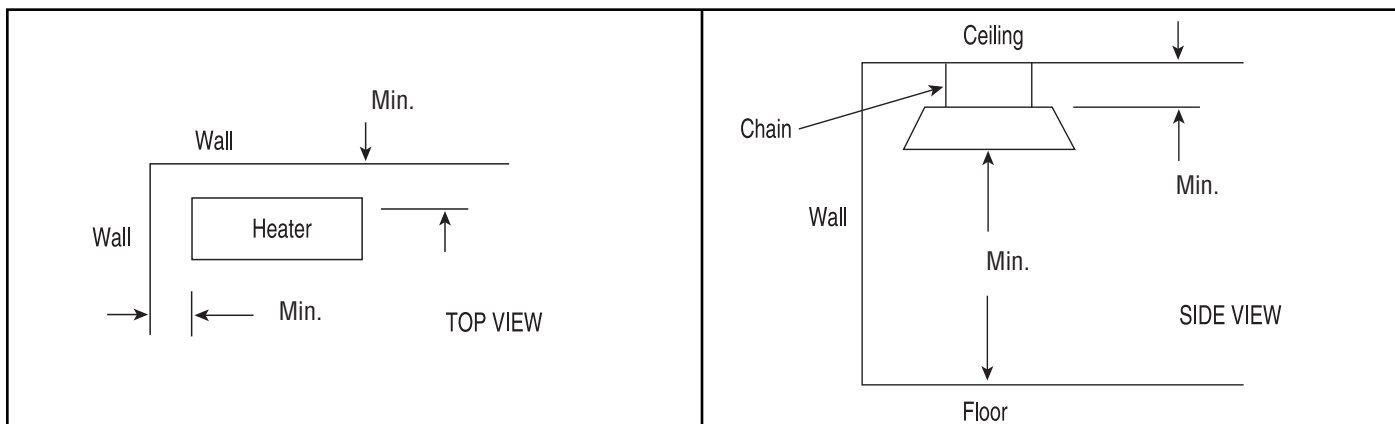


Figure 3

# 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. Always disconnect heater when not in use.
4. Do not use outdoors.

5. Connect to properly grounded outlets or building ground.
6. This heater has hot surfaces. Do not use it in areas where gasoline, paint or flammable liquids are used or stored.
7. 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.
8. In order to prevent equipment damage, protect with a ground fault device such as Chromalox STAR-GF series monitor.
9. **SAVE THESE INSTRUCTIONS**

## WIRING

### ⚠ WARNING

**ELECTRIC SHOCK HAZARD. Disconnect all power before installing or servicing heater. Failure to do so could result in personal injury or property damage. Heater must be effectively grounded in accordance with the National Electrical Code, NFPA 70.**

### ⚠ WARNING

**All electrical wiring must be done by a qualified person in accordance with National Electrical Code (NEC) and meet all state and local regulations.**

1. Use heater only at the voltage specified on the nameplate.
2. Branch circuit wire for connection to heater must be at least 90°C wire. Use copper conductors only.
3. The heater connection points are located in the gasketed terminal enclosure. To remove cover, remove 4 screws on the cover. Remove the cover to expose wiring connection points.
4. A green ground terminal is provided in the bottom of the enclosure. The ground wire should be connected before other connections are made.
5. Refer to Table 1 for proper entrance wiring size.
6. Heater can be wired with rigid or flexible conduit.

### Grill Kit Selection Guide

Model	Volts	Watts	Optional Grill Kit
RBC-1101	120	1000	168-053169-085
RBC-1108	208	1000	
RBC-1102	240	1000	
RBC-1107	277	1000	
RBC-11034	347	1000	
RBC-1151	120	1500	68-053169-086
RBC-1158	208	1500	
RBC-1152	240	1500	
RBC-1157	277	1500	
RBC-11534	347	1500	
RBC-1208	208	2000	68-053169-087
RBC-1202	240	2000	
RBC-1207	277	2000	
RBC-12034	347	2000	
RBC-1258	208	2500	68-053169-088
RBC-1252	240	2500	
RBC-1257	277	2500	
RBC-12534	347	2500	

## MAINTENANCE

### ⚠ WARNING

**ELECTRIC SHOCK HAZARD. Disconnect all power before servicing or replacing heating elements.**

The reflectors should be kept clean to obtain the maximum radiant output.

#### Element Replacement

1. Remove Terminal Box Cover.
2. Disconnect lead wires from heater terminals and disengage box from conduit /cable fitting.
3. Remove safety grills (if installed).
4. Loosen (2) 3/8" nuts from the terminal box bracket located on the back of the heater and slide the entire heating element assembly out of the reflector assembly.
5. Remove bulkhead fitting nut and washers.
6. Remove failed element and replace with a new element.
7. Place gasket on the bulkhead fitting and insert terminals and fitting into the element hole in the terminal box.
8. Place washer and nut on the bulkhead fitting and tighten.
9. Reassemble by following the reverse procedures (steps 4 through 1)

### Replacement Parts

Model	Volts	Watts	Element
RBC-1101	120	1000	322-074905-143
RBC-1108	208	1000	322-074905-144
RBC-1102	240	1000	322-074905-145
RBC-1107	277	1000	322-074905-146
RBC-11034	347	1000	322-074905-147
RBC-1151	120	1500	322-074905-148
RBC-1158	208	1500	322-074905-149
RBC-1152	240	1500	322-074905-150
RBC-1157	277	1500	322-074905-151
RBC-11534	347	1500	322-074905-152
RBC-1208	208	2000	322-074905-153
RBC-1202	240	2000	322-074905-154
RBC-1207	277	2000	322-074905-155
RBC-12034	347	2000	322-074905-156
RBC-1258	208	2500	322-074905-157
RBC-1252	240	2500	322-074905-158
RBC-1257	277	2500	322-074905-159
RBC-12534	347	2500	322-074905-160

**Limited Warranty:**

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

**Chromalox<sup>®</sup>**  
**PRECISION HEAT AND CONTROL**

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