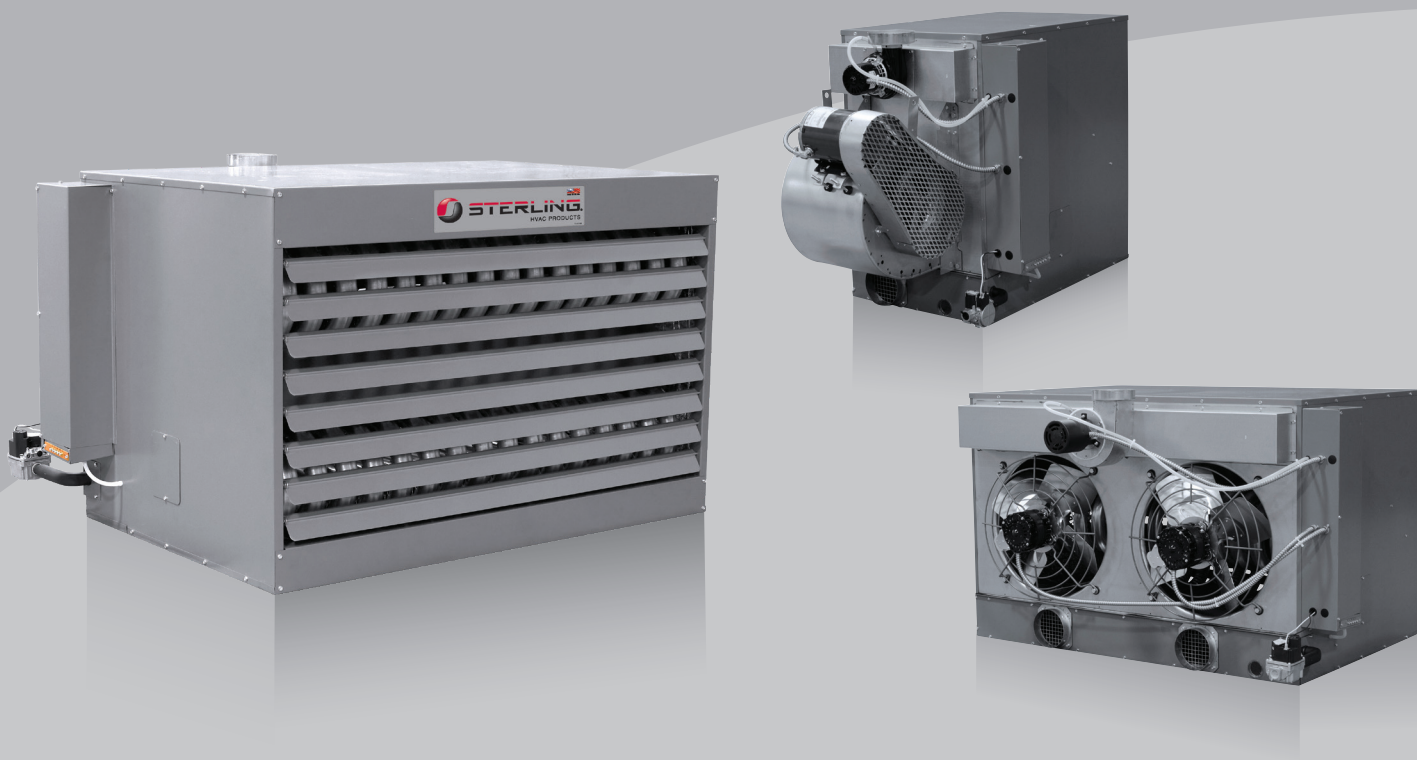




# XF/XC SERIES

## Commercial/Light Commercial Unit Heaters



### STANDARD FEATURES

- Standard or separated combustion all-in-one units
- 20-gauge aluminized steel tubular heat exchanger
- 83% thermal efficiency
- Power venter
- 20-gauge steel cabinetry with baked enamel finish
- Direct spark ignition system
- Redundant single stage gas valve
- Rear burner access for ease of service
- Individually adjustable and removable horizontal louvers
- 10-year heat exchanger, flue collector and burner warranty

### OPTIONAL FEATURES

- Stainless steel heat exchanger, burners, and/or flue collector
- Two stage and various electronic modulation gas controls
- Discharge nozzles (30°, 60° & 90°)
- Combustion air inlet kits (concentric vent)
- Supply voltages: 208 & 230/1/60 and 208, 230, 460, 575/3/60



# XF/XC SERIES

## DESCRIPTION

The Sterling "XF/XC" Series Convertible Venting Type Tubular Gas-Fired Unit Heater offers a highly efficient, extremely durable alternative to the traditional clam shell design. These propeller and blower type units combine the latest tubular heat exchanger and in-shot burner technology with the quality and reliability you have come to know from Sterling. Units are available in sizes 100 to 400 MBH and have been certified by ETL as providing 83% thermal (combustion) efficiency.

## CONVERTIBLE VENTING - STANDARD OR SEPARATED COMBUSTION

Notably, the Sterling "XF/XC" unit heater is designed so it can be installed in either standard or separated combustion venting configurations without requiring modification to the unit itself. Located on the rear cover panel of each unit, combustion air inlet collars are left open in a standard combustion venting configuration. When set up for separated combustion, combustion air piping is connected to the inlet collars so that the burners, spark ignitor, and flue system are enclosed within the unit, allowing the entire combustion process to remain unaffected by the atmosphere in the space where the heater is located. Separated combustion venting configurations should be used where dusty, dirty or mildly corrosive conditions exist, or where high humidity or slightly negative pressures prevail.

## ADDITIONAL VENTING FLEXIBILITY

The Sterling "XF/XC" unit heater is ETL certified in accordance with categories I and III venting requirements. This certification allows units to be vented both vertically and horizontally using either single wall or double wall venting materials. Available as an accessory option, Sterling offers a Combustion Air Inlet Kit that allows for concentric venting of both combustion and exhaust air systems through one termination.

## TUBULAR HEAT EXCHANGER

The Sterling tubular heat exchanger has been designed to provide maximum and uniform heat transfer. The low pressure drop associated with this design enables heated air to be evenly distributed to the conditioned space. This curved, non-welded serpentine design experiences less thermally induced stress making it highly durable for significantly longer service life. All Sterling tubular heat exchangers are constructed of heavy duty 20-gauge aluminized steel. Optional 409 stainless steel heat exchangers are also available.

## DIRECT SPARK IGNITION SYSTEM & CONTROL ACCESSIBILITY

Sterling "XF/XC" units utilize a direct spark pilotless ignition of the burner, providing fast heat delivery. This highly reliable and efficient ignition system incorporates an integrated electronic control board to regulate the system sequence of operation, including an externally mounted LED indicator for simple troubleshooting. Designed with the service person in mind, ignition and fan controls are located in one centrally located control panel.

	XF & XC								
Unit Size	100	125	150	175	200	250	300	350	400
<b>PERFORMANCE DATA†</b>									
Input - BTU/Hr.	100,000	125,000	150,000	175,000	200,000	250,000	300,000	350,000	400,000
Output - BTU/Hr.	83,000	103,750	124,500	145,250	166,000	207,500	249,000	290,500	332,000
Flue Size Diameter* - in	5	5	5	5	5	5	6	6	6
Gas Inlet, Natural/LP Gas - in	1/2	1/2	1/2	1/2	1/2	3/4	3/4	3/4	3/4
<b>XF PERFORMANCE/DIMENSIONAL DATA</b>									
Free Air Delivery - CFM	1,600	2,200	2,400	2,850	3,200	3,450	5,000	5,600	5,800
Air Temperature Rise	47°F	42°F	47°F	46°F	47°F	54°F	45°F	47°F	51°F
Full Load Amps at 120V	6.4	6.9	6.9	8	8	8	11.6	13.8	13.8
<b>MOTOR DATA:</b> Motor HP	1/10	1/4	1/4	1/3	1/3	1/3	1/4 (2)	1/3 (2)	1/3 (2)
Motor Type (ODP)	SP	PSC	PSC	PSC	PSC	PSC	PSC	PSC	PSC
RPM	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050	1,050
Amps @ 115V	4.2	4.7	4.7	5.8	5.8	5.8	9.4	11.6	11.6
<b>DIMENSIONAL DATA - inches</b>									
Overall Unit Height	33-3/4	33-3/4	33-3/4	33-3/4	33-3/4	33-3/4	34	34	34
Overall Unit Width	25-1/4	25-1/4	25-1/4	37-1/4	37-1/4	37-1/4	55-1/4	55-1/4	55-1/4
Overall Unit Depth	43-1/2	43-1/2	43-1/2	43-1/2	43-1/2	43-1/2	44-3/4	44-3/4	44-3/4
<b>XC PERFORMANCE/DIMENSIONAL DATA</b>									
Free Air Delivery - CFM	1,181	1,476	1,771	2,067	2,362	2,953	3,501	4,134	4,724
Air Temperature Rise	65°F	65°F	65°F	65°F	65°F	65°F	65°F	65°F	65°F
Outlet Velocity - FPM	370	463	555	395	451	564	422	498	570
<b>MOTOR DATA:</b> Motor HP	1/4	1/2	1/2	3/4	3/4	1	1	1-1/2	1-1/2
Motor Type ODP**	SPH	SPH	SPH	SPH	SPH	Cap. Start	Cap. Start	Cap. Start	Cap. Start
RPM	1,725	1,725	1,725	1,725	1,725	1,725	1,725	1,725	1,725
Amps @ 115V††	5.1	7.2	7.2	11.6	11.6	13	13	18.2	18.2
<b>DIMENSIONAL DATA - inches</b>									
Overall Unit Height	33-3/4	33-3/4	33-3/4	33-3/4	33-3/4	33-3/4	34	34	34
Overall Unit Width	25-1/4	25-1/4	25-1/4	37-1/4	37-1/4	37-1/4	55-1/4	55-1/4	55-1/4
Overall Unit Depth	49-3/4	49-3/8	49-3/8	56-1/8	56-1/8	56-1/8	53-3/8	56-1/8	56-1/8

† Ratings shown are for unit installations at elevations between 0 and 2,000 ft (0 to 610m). For unit installations in U.S.A. above 2,000 ft. (610m), the unit input must be field derated 4% for each 1,000 ft. (305m) above sea level; refer to local codes, or in absence of local codes, refer to the latest edition of the National Fuel Gas Code, ANSI Standard Z223.1 (N.F.P.A. No. 54).

For installations in Canada, any reference to deration at altitudes in excess of 2,000 ft. (610m) are to be ignored. At altitudes of 2,000 ft. to 4,500 ft. (610 to 1372m), the unit must be field derated to 90% of the normal altitude rating, and be so marked in accordance with the ETL certification. See unit installation manual for field deration information.

†† See installation manual for ODP motor full load amp values at non-standard voltages.

\* Flue collar is factory supplied with unit; to be field installed per included instructions.

\*\* LEGEND: SPH = SPLIT PHASE      CAP. START = CAPACITOR START      ODP = OPEN DRIP PROOF



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