

FX5 Explosion-Proof Electric Air Heaters

Ruffneck™ FX5 heaters are **cUL_{US}** certified for use in hazardous locations. They are designed for the harshest environments such as: dry indoor industrial applications, oil refineries, petrochemical plants, pulp and paper mills, grain elevators, hazardous waste storage facilities, wastewater treatment plants, etc., where specific explosive gases or dusts may be present.

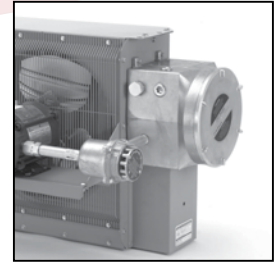


The FX5 offers a larger junction box for easier installation, additional limit controls and a heavy duty core.

The heater core assembly is contained in a sturdy, epoxy-coated 14-gauge steel cabinet, which also carries the motor and fan assembly. Adjustable louvres allow directional control of the airflow. A narrow gap, two-piece fan guard is provided to shield all moving parts. All fasteners

are zinc plated for corrosion protection.

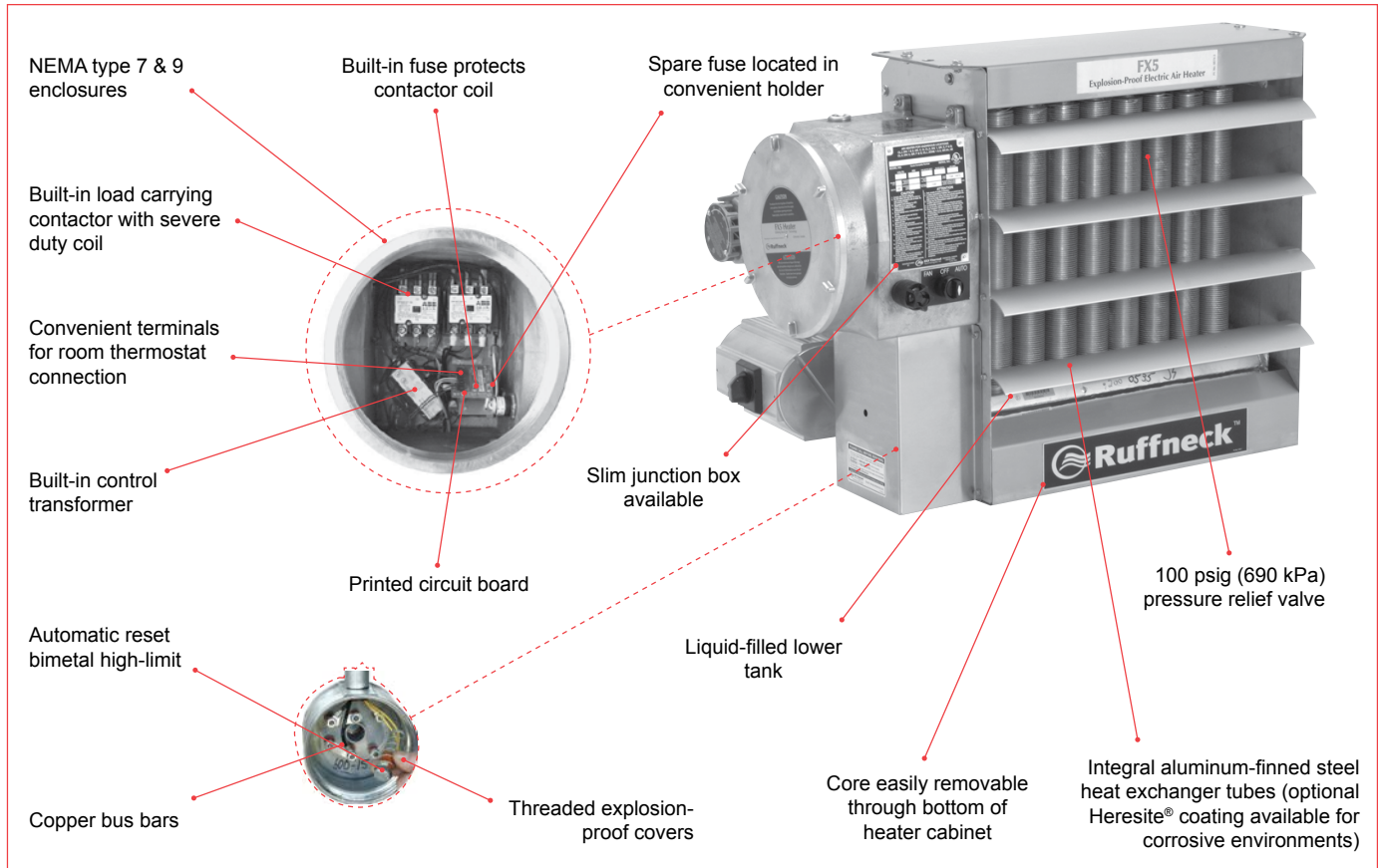
Ruffneck™ heaters are built to last. All Ruffneck™ products are subjected to exhaustive technical analysis and testing during design and development, and are manufactured under a registered quality assurance program. As a result, they have consistently proven their safety and reliability.



For hazardous location heating, rely on the Ruffneck™ FX5 heater for the most dependable, trouble-free service available.

Suitable for the following hazardous location classifications:

- Class I, Divisions 1 & 2, Groups C & D
- Class II, Division 1, Groups E, F & G
- Class II, Division 2, Groups F & G
- Class I, Zones 1 & 2, Groups IIA & IIB
- Temperature Code T3B 329°F (165°C)



Heresite® is a registered trademark of Heresite® Protective Coatings Inc.

FX5



Explosion-Proof Electric Unit Heaters

Performance Data for 60 Hertz FX5
UL_{us} Temperature Code T3B 165°C (329°F)

NOMINAL WATTAGE (kW)	MODEL	VOLTAGE	PHASE	TOTAL CURRENT (A)	OPTIONAL BUILT- IN DISCONNECT SWITCH	AIR TEMPERATURE RISE		Btu/hr
						°F	°C	
3	FX5-208160-030	208	1	14.4	DS5	19.0	10.5	10,250
	FX5-208360-030	208	3	8.3				
	FX5-240160-030	240	1	12.5				
	FX5-240360-030	240	3	7.2				
	FX5-480160-030 °	480	1	6.3				
	FX5-480360-030	480	3	3.6				
	FX5-600360-030	600	3	2.9				
5	FX5-208160-050	208	1	24.0	DS5	31.6	17.6	17,050
	FX5-208360-050	208	3	13.9				
	FX5-240160-050	240	1	20.8				
	FX5-240360-050	240	3	12.0				
	FX5-480160-050 °	480	1	10.4				
	FX5-480360-050	480	3	6.0				
	FX5-600360-050	600	3	4.8				
7.5	FX5-208160-075	208	1	36.1	DS5	27.9	15.5	25,600
	FX5-208360-075	208	3	20.8				
	FX5-240160-075	240	1	31.3				
	FX5-240360-075	240	3	18.0				
	FX5-480160-075 °	480	1	15.6				
	FX5-480360-075	480	3	9.0				
	FX5-600360-075	600	3	7.2				
10	FX5-208160-100*	208	1	48.1	Not Available	37.2	20.6	34,100
	FX5-208360-100	208	3	27.8	DS5			
	FX5-240160-100	240	1	41.7	DS5			
	FX5-240360-100	240	3	24.1	DS5			
	FX5-480160-100 °	480	1	20.8	DS5			
	FX5-480360-100	480	3	12.0	DS5			
	FX5-600360-100	600	3	9.6	DS5			
15	FX5-208360-150	208	3	41.6	DS5	27.1	15.1	51,200
	FX5-240160-150*	240	1	62.5	Not Available			
	FX5-240360-150	240	3	36.1	DS5			
	FX5-480160-150 °	480	1	31.3	DS5			
	FX5-480360-150	480	3	18.0	DS5			
	FX5-600360-150	600	3	14.4	DS5			
20	FX5-480160-200 °	480	1	41.7	DS5	36.1	20.1	68,250
	FX5-480360-200	480	3	24.1	DS5			
	FX5-600360-200	600	3	19.2	DS5			
25	FX5-480360-250	480	3	30.1	DS5	22.0	12.2	85,300
	FX5-600360-250	600	3	24.1	DS5			
30	FX5-480360-300	480	3	36.1	DS5	26.4	14.6	102,350
	FX5-600360-300	600	3	28.9				
35	FX5-480360-350	480	3	42.1	DS5	30.7	17.1	119,450
	FX5-600360-350	600	3	33.7				

Consult Terms & Conditions of Sale (or the FX5-SD Owner's Manual) for warranty information.

Note: (*) Exceeds the 48 amp circuit limit of NEC 424-22

(°) 480V 1 Phase units are certified Class I, Div. 1, Group D and Class II, Div.1, Groups F and G.

1. Minimum conductor size for 86°F (30°C) ambient. Derate conductor for ambient temperature. Use minimum 194°F (90°C) insulation.
2. Heater is functioning normally if at rated voltage the amp draw is within 10% of the value in this table.
3. Operation at lower voltage will result in reduced heat output and amp draw.
4. Add "T" to model number when adding a built-in thermostat.
5. Add "D" to model number when adding a built-in disconnect switch.
6. Add "P" to model number when adding a built-in pilot light.
7. Add "S" to model number when adding a 3-way switch.
8. Add "H" to model number for units with high "off" (deenergized) ambient temperatures.
9. Add "C" to model number for units with Heresite® coating.
10. Add "A" to model number for units with stainless-steel cabinet.
11. Add "SL" to model number for units with slim junction box. Option not available with disconnect switch, 3-way switch, or built-in pilot light.

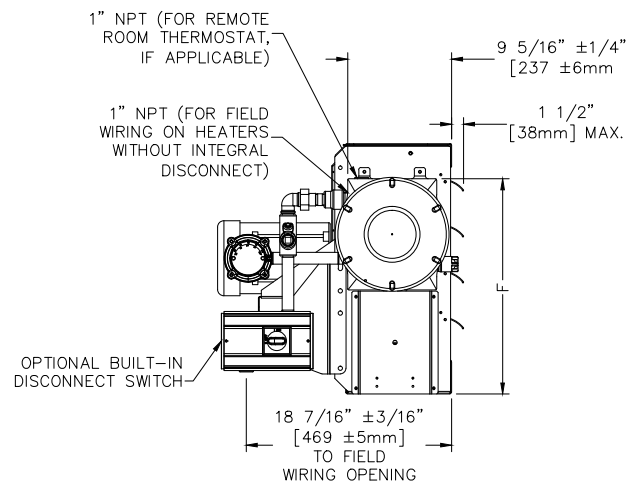
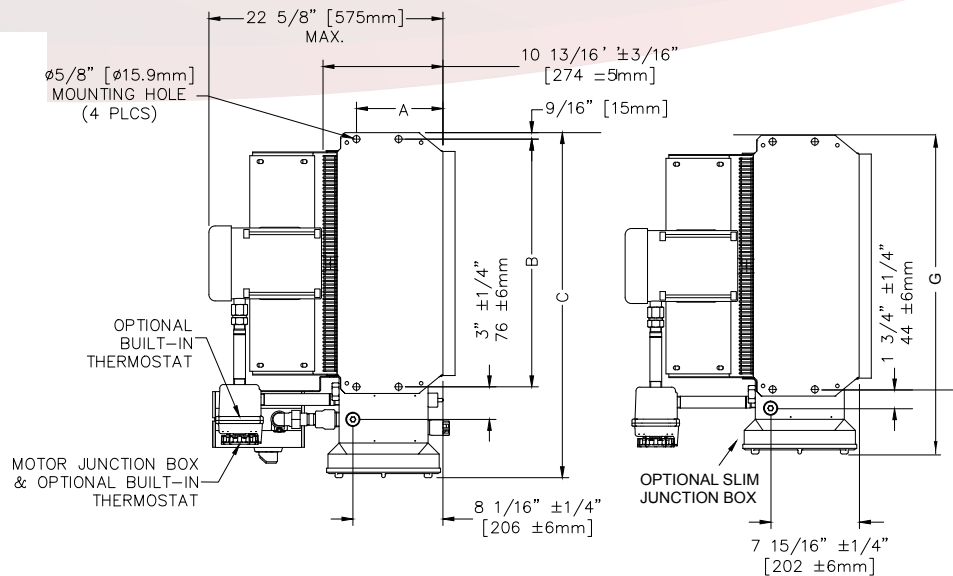
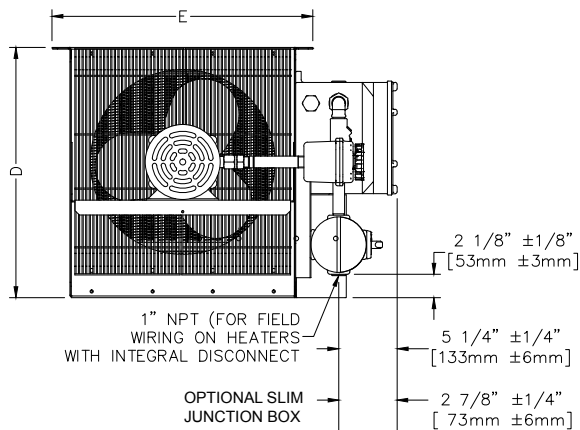
See page 10 for
model coding.

See page 8
for installation
conditions.

FX5

kW		2.5-10	12.5-20	20.9-35	DIM. TOL. ±
DIM.	in.	7-3/4	7-3/4	7-3/4	1/8
	mm	198	198	198	3
A	in.	18-3/16	22-5/16	26-1/4	1/8
	mm	462	566	667	3
B	in.	27	31	35	3/16
	mm	686	787	889	4
C	in.	18-1/2	22-1/2	26-1/2	1/8
	mm	470	572	674	3
D	in.	19-7/16	23-7/16	27-7/16	3/8
	mm	494	596	697	10
E	in.	17-1/2	19-1/2	21-13/16	5/16
	mm	444	495	554	8
F	in.	24-5/8	28-5/8	32-5/8	3/16
	mm	625	727	828	4

DIMENSIONAL TOLERANCES $\pm 1/8"$ [$\pm 3\text{mm}$]
UNLESS OTHERWISE SPECIFIED.



Model Coding

FX5 - 480 3 60 - 350 - W T, D, P, S, H, C, A, U, SL

MODEL SERIES	HEATER VOLTAGE	PHASE	HERTZ	HEATER KILOWATTS	WELDED CORE	OPTIONS
5th GENERATION	208V 240V 480V 600V	1 3	50 60			T - Built-in thermostat D - Built-in disconnect switch P - Built-in pilot light S - 3-way switch H - Unit with high "off" (deenergized) ambient temperatures C - Heresite® coating A - Stainless-steel cabinet U - Continuous fan SL - Slim junction box

Reminder: This nomenclature illustration is intended primarily to explain how a product part number is defined. Not all voltage and/or wattage combinations are available - please consult the Performance Data chart(s) for product availability.

FX5



Explosion-Proof Electric Unit Heaters