# TUTCO SureHeat

# Threaded Inline Heaters

## Designed for Industrial Process Heating

### Temperatures up to 1400°F (760°C)

Threaded in-line air heaters are UL Recognized products designed for industrial process heating applications requiring high heat and high air pressure. Serpentine™ heating elements are installed into a 304 stainless steel housing and threaded at both ends. TUTCO SureHeat threaded in-line heaters offer two styles, Style "A" and Style "B". Style "A" should be used when an absolute leak-proof air system is required. Need a custom solution? We have supplied hundreds of customer-specified variations. Contact us for more information.

## Features and Benefits



#### Style A Threaded In-line

- Max inlet temperatures 900°F (482°C)
- UL Recognized
- High-pressure power feed throughs
- Leak-proof to 150 psi (10 bar)



#### Style B Threaded In-line

- Max inlet temperatures 200°F (93°C)
- UL Recognized
- 12" (305mm) flexible wire power leads
- Not recommended for leak-proof systems due to slight leakage through wire strands

## **Product Specifications**

Maximum Inlet Air Pressure 150 PSI (10 BAR)

Maximum Inlet Air Temperature 900°F (482°C) Style "A" 200°F (93°C) Style "B"

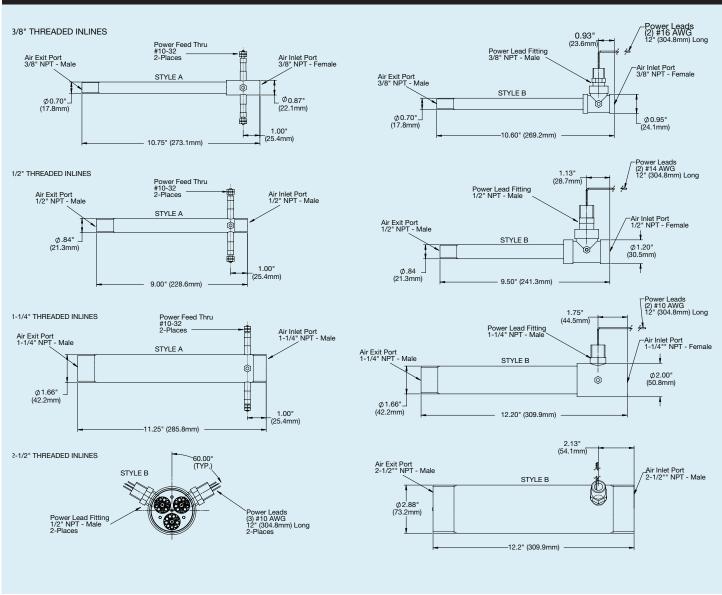
Maximum Exit Air Temperature 1400°F (760°C)

Minimum Air Flow for Best Control 60 SCFM (28 SLPM)



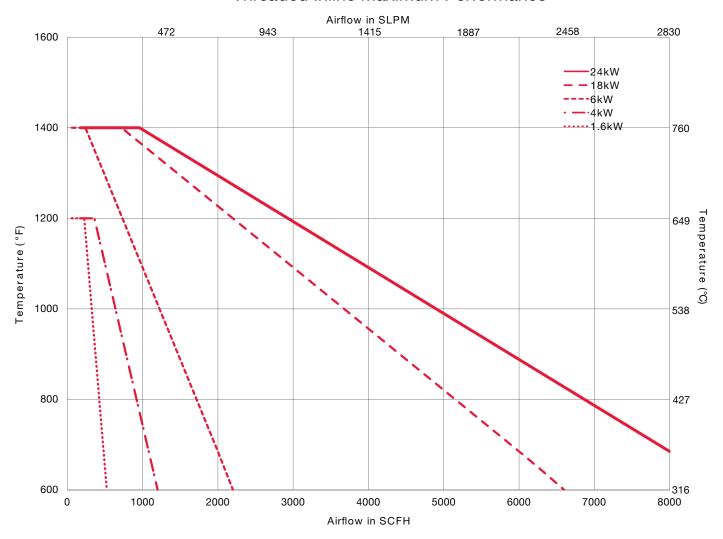
SureHeat® Threaded Inline Products					
Size (NPT)	Max. Power	Max.Volts	Max. Amps	P/N, Style "A"	P/N, Style "B"
3/8"	1.6kW	170	9.4	F038821	F038822
1/2"	4.0kW	220	18.2	F038823	F038824
1-1/4"	6.0kW	220	27.3	F038825	F038826
1-1/4"	8.0kW	240	33.3	F077065	F077028
2-1/2"	18.0kW	240	75.0 (1ø)/44.0 (3ø)	N/A	F063007
2-1/2"	18.0kW	480	21.7 (3ø)	N/A	F076418
2-1/2"	24.0kW	240	100.0 (1ø)/57.8 (3ø)	N/A	F074439

#### **Dimensions / Installation Reference**



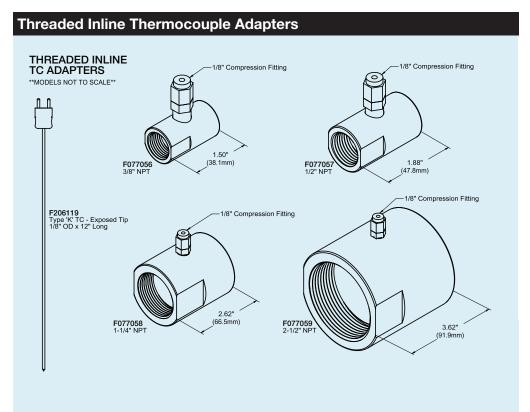
### **Performance Curves**

#### Threaded Inline Maximum Performance

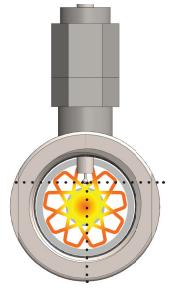


#### Notes:

- Temperatures are measured by 3/16" "K"
- Use of other sensor types and mounting locations can result in heater damage
- Minimum airflow for accurate control is 60 SCFH
- Maximum air temperature is 1400°F (760°C)
- Operating above this curve voids the product warranty



Threaded In-Line Thermocouple Adapters					
Part Number	Description				
F077056	TC Adapter 3/8" Threaded In-Line				
F077057	TC Adapter 1/2" Threaded In-Line				
F077058	TC Adapter 1-1/4" Threaded Inline				
F077059	TC Adapter 2-1/2" Threaded In-Line				
F206119	1/8" TC Type K 12"Probe				



## Thermocouple Installation Reference

Before permanently installing an in-line heater, set the depth of the TC compression fitting to ensure proper temperature control.



Make sure to properly mount the TC coupling so that the TC is slightly above the ceramic rod running through the center of the Serpentine<sup>™</sup> heating element. The open end of the TC should be in the heated air stream as shown.



