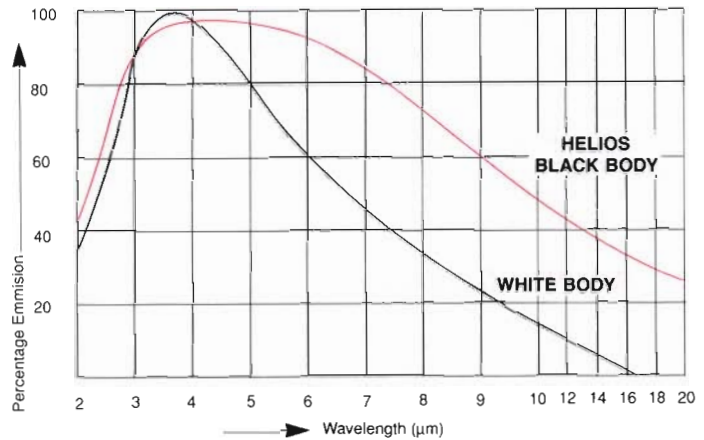


HELIOS INFRARED CERAMIC HEATERS

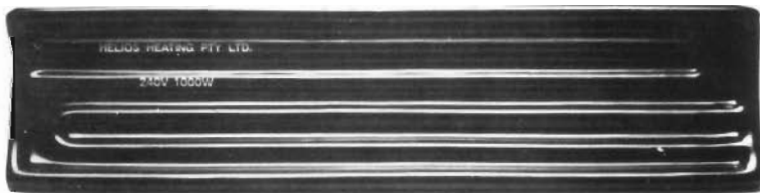
HELIOS BLACK-BODY INFRARED CERAMIC HEATERS.

Established laws of Physics refer to an ideal emissive and absorption body as ideal "Black". In terms of radiation emission (see graph), the figure 1 is given as the optimum unit for element radiation.

It is for this reason Helios black body infrared ceramic heaters are manufactured with a metallic oxide coating which is sintered to form a black crystal emitter surface - offering a near perfect "black" radiation element.



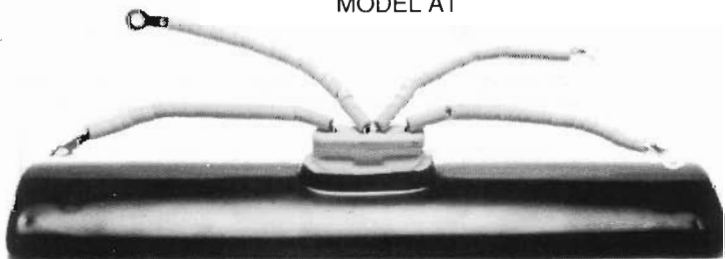
The spectrum comparison shows clearly the greater emissivity of the Helios black body infrared heater when compared to the conventional white ceramic infrared heater.



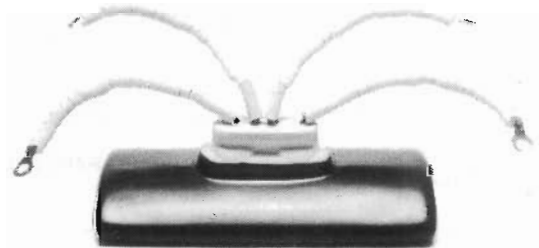
MODEL A1



MODEL A2



A1 WITH THERMOCOUPLE



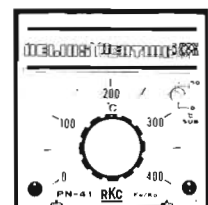
A2 WITH THERMOCOUPLE

CODE	MODEL	SIZE (MM)	VOLTS	WATTS	SURFACE TEMP OF HEATER	PEAK WAVELENGTHS	HEAT UP DEG/MIN
A-1-1000	A-1	245 X 60	240	1000	730° C	2.9 UM	160
A-1-650	A-1	245 X 60	240	650	600° C	3.2 UM	100
A-1-500	A-1	245 X 60	240	500	550° C	3.5 UM	85
A-1-400	A-1	245 X 60	240	400	500° C	3.7 UM	70
A-1-250	A-1	245 X 60	240	250	400° C	4.3 UM	45
A-2-500	A-2	122 X 60	240	500	730° C	2.9 UM	160
A-2-325	A-2	122 X 60	240	325	600° C	3.2 UM	100
A-2-200	A-2	122 X 60	240	200	500° C	3.7 UM	70

All of the above heaters are available with 'K' type thermocouple fitted.

TEMPERATURE CONTROL

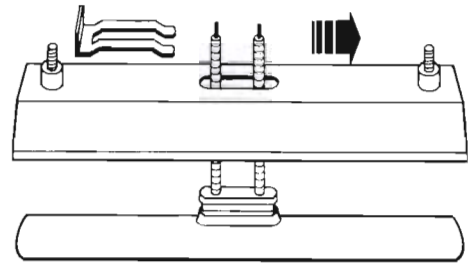
As the temperature of an infrared heater is directly proportional to the wave length emitted, perfect wave length control is achieved by connecting a heater with an embedded thermocouple to a solid state temperature controller. Using this control, it is possible to achieve a range of wave lengths from the one emitter. Consult our technical staff for advice.



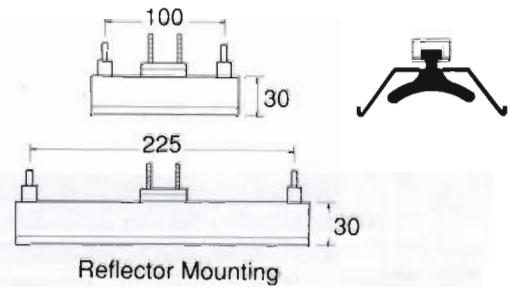
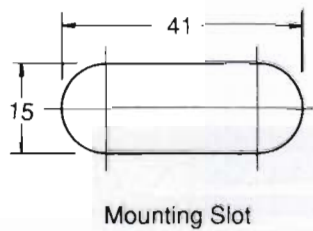
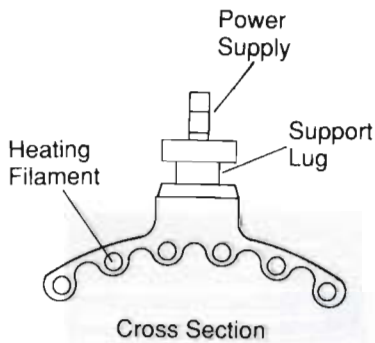
HELIOS INFRARED CERAMIC HEATERS

ALUMINUM REFLECTOR MOUNTS

Polished Aluminum reflectors are designed to reflect all the emitted infrared rays in a controlled direction. Simply insert the heater mounting lug through the slot provided and secure using the spring steel retainer. Each reflector is supplied with sturdy mounting studs for single or multiple frame or chassis installations.



MOUNTING DETAILS



APPLICATION - HEATER SELECTION GUIDE

PROCESS	MODEL A-1					MODEL A-2		
	250W	400W	500W	650W	1000W	200W	325W	500W
Pre Heating foil for vacuum forming								
Quick drying of gummed and sized paper								
Water evaporation								
Drying of skins and sprayed leather								
Heating paper pulp prior to pressing								
Setting PVC paste on fabrics								
Quick drying of laquered paper								
Drying plastic and latex coatings								
Drying washed, dyed and finished textiles								
Drying protective coatings in cans								
Fixing - Stress relieving synthetic threads								
Heating and drying adhesives - shoe trade								
Pre - Heating rubber prior to extrusion								
Pre - Heating and drying glued wooden furniture								
Drying sprayed on glazes to ceramics								
Drying and setting laquered sheet metals								
Manufacturing sealed bubble packs								

NOTE:

As can be seen in the above shown guide, there are often several infrared ceramic heaters suitable to a particular application. It is for this reason we recommend a practical test be performed on a sample of the material proposed.