

Overview

- Our Promise
- What is Infratech Heat
- Infratech's Advantages




Our Promise

Infratech has been a pioneer and leader in Infrared technology for more than 50 years. We offer a wide range of products for comfort heat, automotive curing and industrial commercial heat applications.

Infratech uses the latest in manufacturing technologies to offer you the most efficient infrared systems for the lowest cost in the industry. If you are heating a backyard patio or a complex mega resort, Infratech can provide the design, engineering, controls and infrared equipment your property or facility requires.

Infratech is committed to providing high quality, innovative products that exceed our customers' expectations. We have the technology and we have the people to achieve our promise of quality, delivery and price. We look forward to keeping that promise with you.

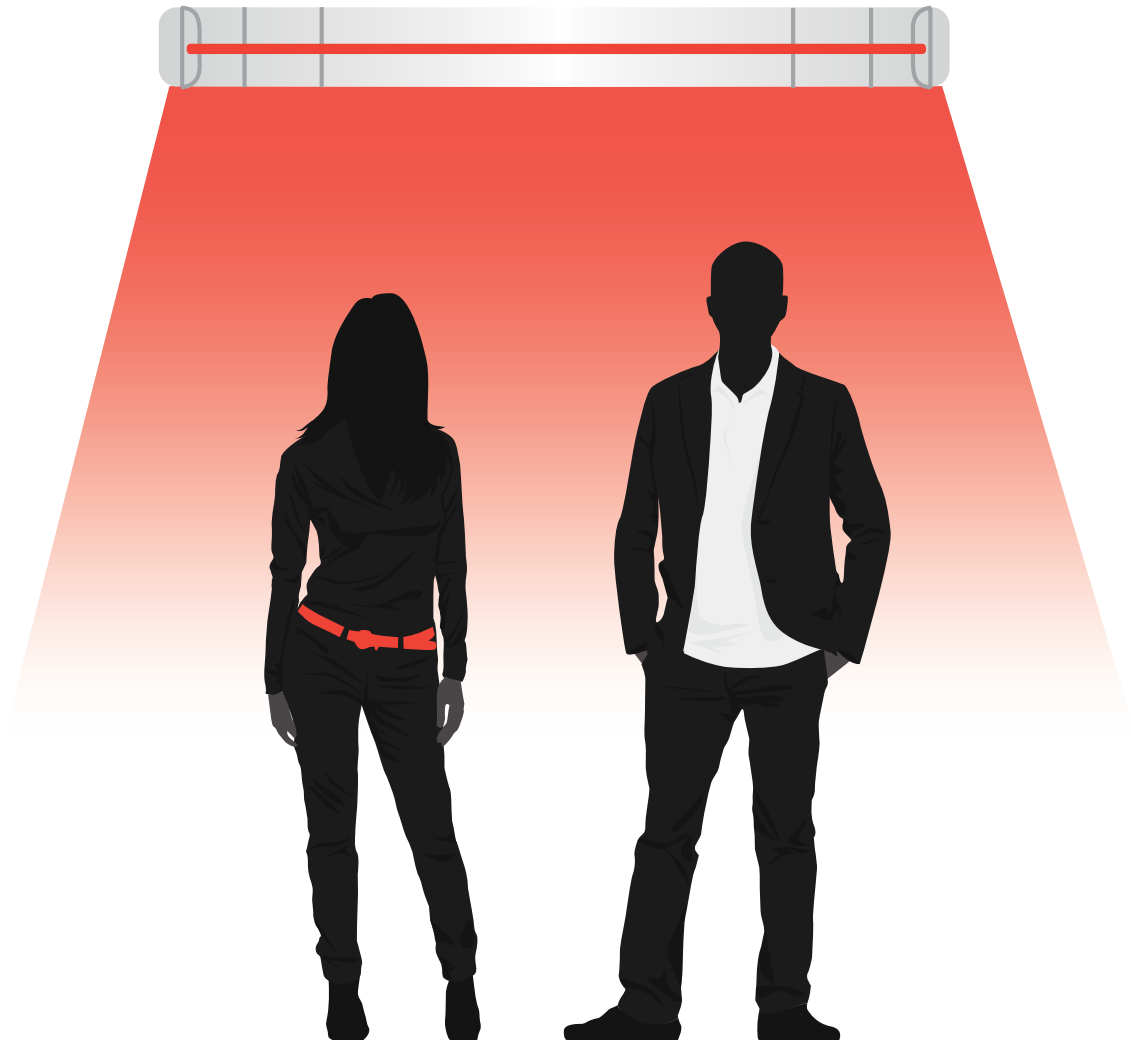


PRESIDENT

What is Infrared Heat?

A heated quartz element emits a safe, clean wavelength of light that is only absorbed by solid objects, transferring heat directly to a person, table or floor rather than heating the air.

For this reason, infrared heat can be distributed very evenly, and will not simply "blow away" in windy or drafty conditions. Infratech medium wave quartz element heaters emit a barely discernible, pleasing glow that will not affect the ambience of your gathering – unlike competitive short-wave or halogen electric heaters that produce a very harsh glare or bright-colored light.



The Infratech Advantage



No matter what space you are heating, Infratech will work with you to create a complete solution. We are the experts with the experience and capabilities to help design your project.

- Two Year Warranty
- UL-listed for indoor and outdoor use
- Proudly Made in USA
- Versatility
- Infinite Control capabilities
- Made from recyclable materials and operate with zero greenhouse emissions, odors or ultraviolet light
- Our unwavering commitment - customer's total satisfaction!

Infratech Heaters

- W-Series Single Element
- WD-Series Dual Element
- SL-Series Slimline Single Element



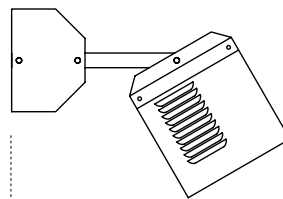
Infratech Heaters

Infratech has been the leader in the use of infrared heating technology for more than 50 years. We apply this expertise to our heating systems for personal, commercial, and industrial applications.

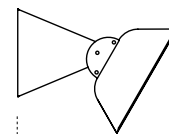
We offer you a wide variety of sizes, wattages, voltages, and color options. No matter what your heating goal is, we have the solution!



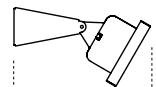
Infratech Heaters have a smaller, sleeker profile than typical gas infrared heaters.



TYPICAL GAS INFRARED HEATER

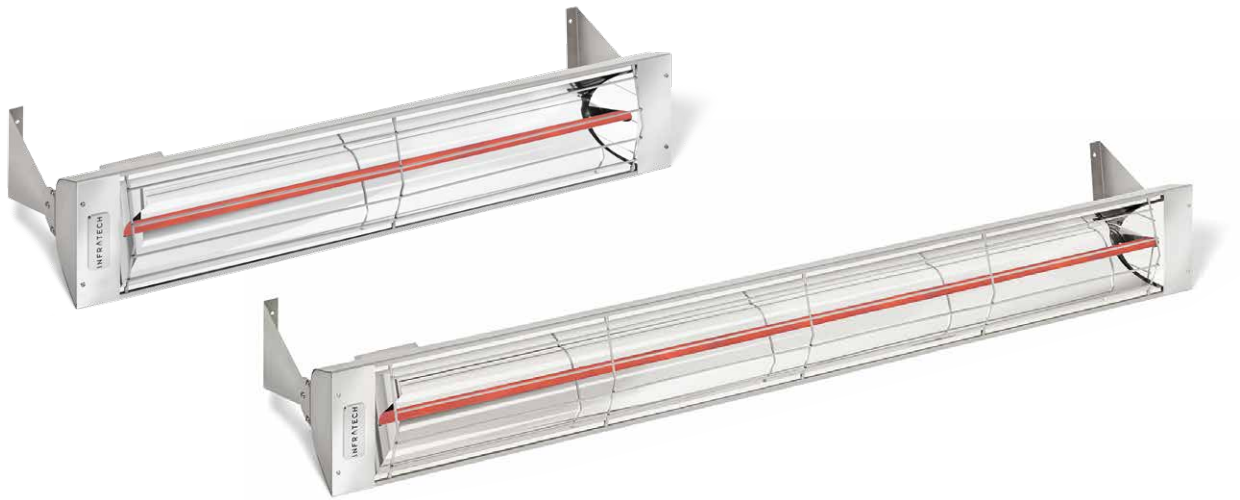


INFRATECH W-SERIES AND WD-SERIES HEATERS

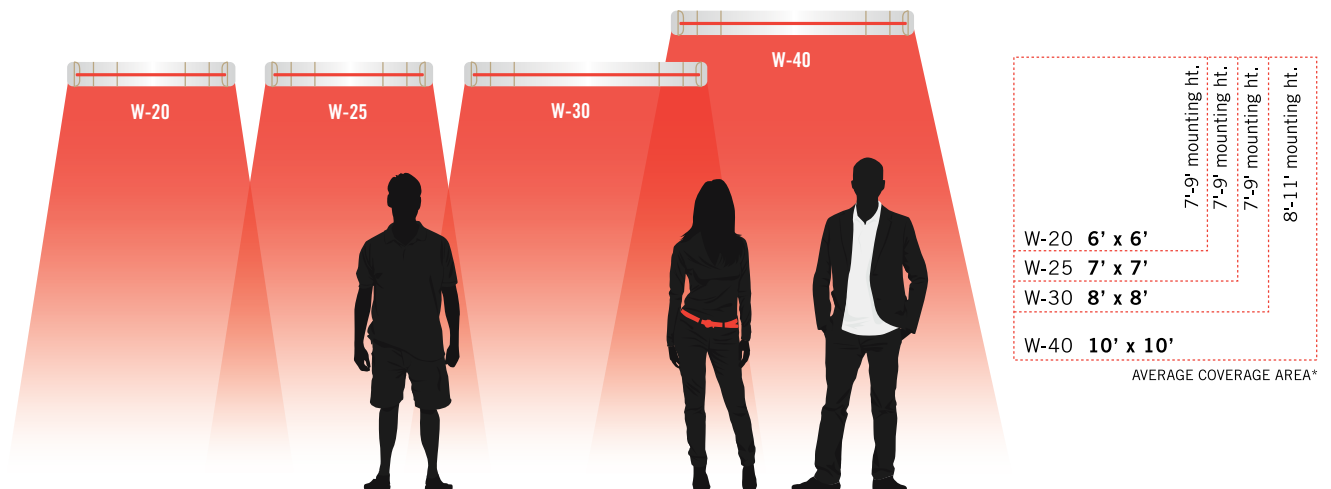


INFRATECH SL-SERIES SLIMLINE HEATER

W-Series Single Element Heaters



- W-Series single element heaters provide the coverage and intensity of heat necessary for optimum comfort.
- Minimal clearance requirements, recessed mounting options, short standoffs and mounting heights up to 11'.
- Fixtures are available in lengths of 39" and 61-1/4".
- W-Series heaters are available in 2000, 2500, 3000, and 4000 watt models.
- Compatible with Solid State Controls for larger-scale residential or commercial use.
- Choose from brushed stainless steel, our standard colors or select a custom color of your choice.



W-Series Single Element Heaters

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	AMPS
21-1055	W-2024 SS	39"	2000	240	8.3
21-1060	W-2028 SS	39"	2000	208	10
21-1065	W-2048 SS	39"	2000	480	4
21-1075	W-2027 SS	39"	2000	277	7
21-1080	W-2524 SS	39"	2500	240	10.4
21-1085	W-2528 SS	39"	2500	208	12
21-1090	W-2548 SS	39"	2500	480	5
21-1095	W-2527 SS	39"	2500	277	9
21-1100	W-3024 SS	61-¼"	3000	240	12.5
21-1105	W-3027 SS	61-¼"	3000	277	11
21-1110	W-3028 SS	61-¼"	3000	208	14
21-1115	W-3048 SS	61-¼"	3000	480	6
21-1125	W-4024 SS	61-¼"	4000	240	16.7
21-1130	W-4027 SS	61-¼"	4000	277	14
21-1135	W-4028 SS	61-¼"	4000	208	19
21-1140	W-4048 SS	61-¼"	4000	480	8.3

- For Bronze Body with Stainless Steel Trim add "BR" to part number above.
- For Black Body add "BL" to part number above.
- For Almond Body add "AL" to part number above.
- For Beige Body add "BE" to part number above.
- For Biscuit Body add "BI" to part number above.
- For White Body add "WI" to part number above.

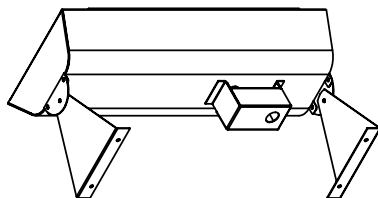
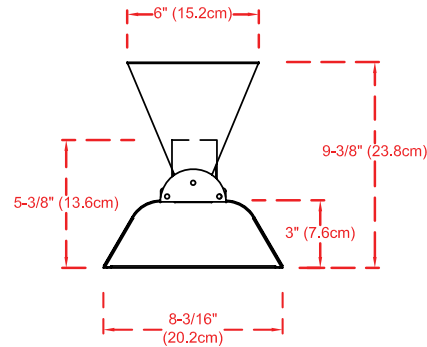
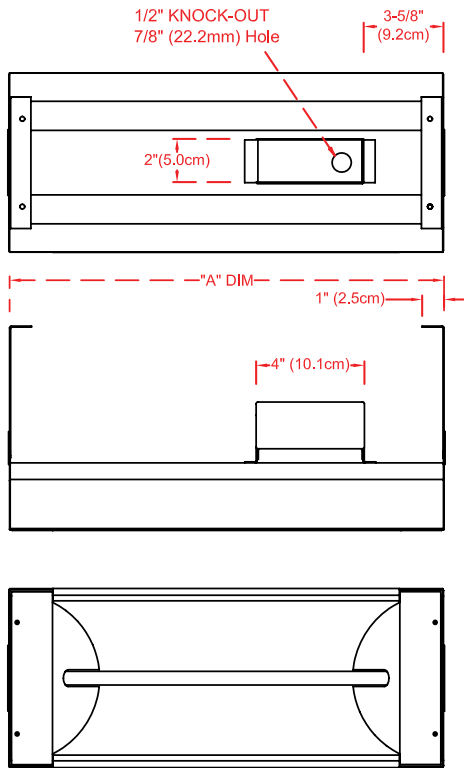
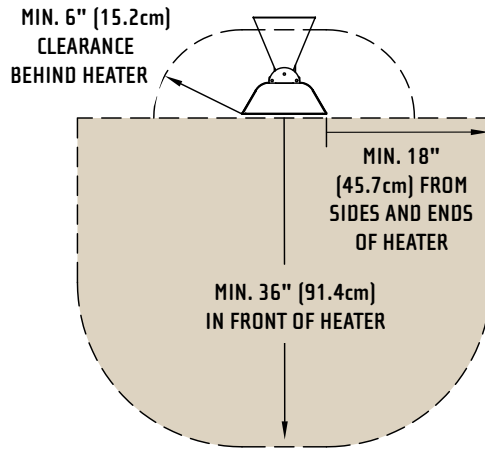
W-Series Replacement Elements

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	FITS
10-1085	E-2024	36"	2000	240	W-2024
10-1090	E-2027	36"	2000	277	W-2027
10-1095	E-2028	36"	2000	208	W-2028
10-2000	E-2048	36"	2000	480	W-2048
10-2010	E-2524	36"	2500	240	W-2524
10-2015	E-2527	36"	2500	277	W-2527
10-2020	E-2528	36"	2500	208	W-2528
10-2025	E-2548	36"	2500	480	W-2548
10-2030	E-3024	58"	3000	240	W-3024
10-2035	E-3027	58"	3000	277	W-3027
10-2040	E-3028	58"	3000	208	W-3028
10-2045	E-3048	58"	3000	480	W-3048
10-2055	E-4024	58"	4000	240	W-4024
10-2060	E-4027	58"	4000	277	W-4027
10-2065	E-4028	58"	4000	208	W-4028
10-2070	E-4048	58"	4000	480	W-4048

For our helpful instruction video, “How to Replace an Infratech Heating Element - W/WD-Series,” please visit www.infratech-usa.com or contact customer service.

W-Series Heater Clearance and Dimensions

CLEARANCE FROM COMBUSTIBLES:



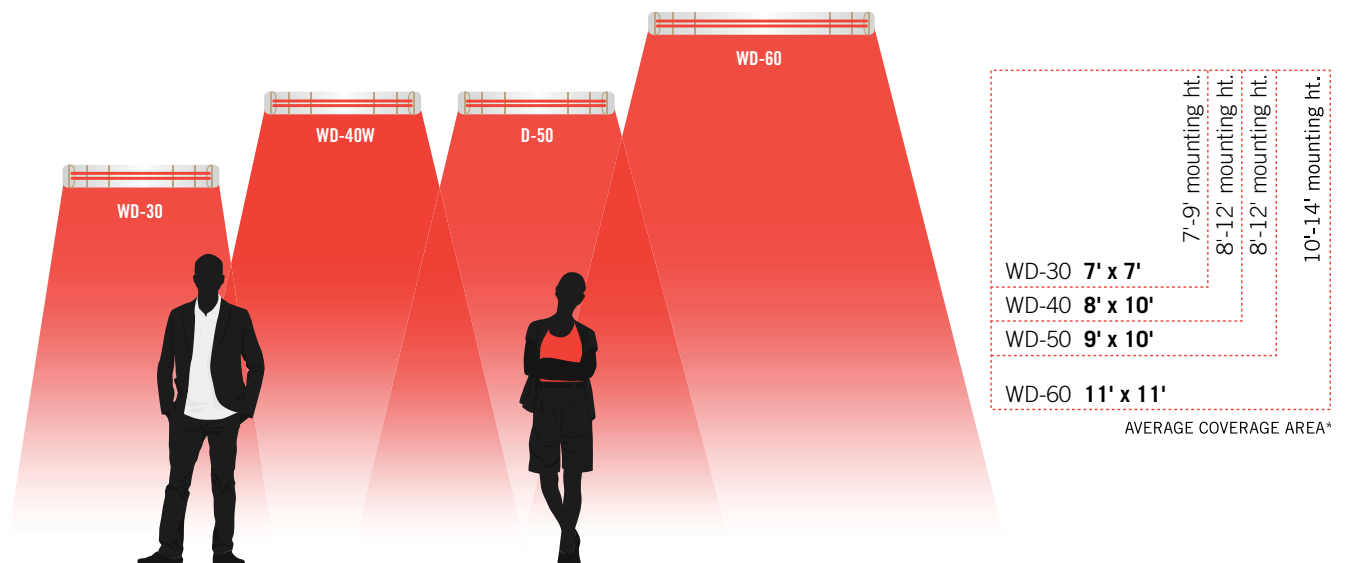
MODEL	"A" DIM.	"A" DIM.	WATTS	VOLTS	AMPS	BTU's
W2024	39"	99.0cm	2000	240	8.3	6824
W2524	39"	99.0cm	2500	240	10.4	8530
WD3024	33"	83.8cm	3000	240	12.5	10236
W3024	61.25"	155.5cm	3000	240	12.5	10236
W4024	61.25"	155.5cm	4000	240	16.7	13648
WD4024	39"	99.0cm	4000	240	16.7	13648
WD5024	39"	99.0cm	5000	240	20.8	17060
WD6024	61.25"	155.5cm	6000	240	25	20472

OTHER VOLTAGES ALSO AVAILABLE: 208, 277, 480 VAC

WD-Series Dual Element Heaters



- WD-Series dual element fixtures produce more intense heat and can be mounted up to 14'.
- Typically installed with solid state controls, to vary the electric load for comfortable heat in a wide range of conditions.
- Fixtures available in lengths of 33", 39" and 61-1/4".
- Dual element heaters are available in 3000, 4000, 5000, and 6000 watt models.
- May also be installed with Duplex/Stack Switches for a half power/full power option.
- Choose from brushed stainless steel, our standard colors, or select a custom color of your choice.



WD-Series Dual Element Heaters

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	AMPS
21-2000	WD-3024 SS	33"	3000	240	12.5
21-2010	WD-3028 SS	33"	3000	208	14
21-2020	WD-3048 SS	33"	3000	480	6
21-2030	WD-3027 SS	33"	3000	277	11
21-2100	WD-4024 SS	39"	4000	240	16.7
21-2110	WD-4028 SS	39"	4000	208	19
21-2120	WD-4048 SS	39"	4000	480	8.3
21-2130	WD-4027 SS	39"	4000	277	14
21-2200	WD-5024 SS	39"	5000	240	20.8
21-2210	WD-5028 SS	39"	5000	208	24
21-2220	WD-5048 SS	39"	5000	480	10.4
21-2230	WD-5027 SS	39"	5000	277	18
21-2300	WD-6024 SS	61-¼"	6000	240	25
21-2310	WD-6028 SS	61-¼"	6000	208	28.8
21-2320	WD-6048 SS	61-¼"	6000	480	12.5
21-2330	WD-6027 SS	61-¼"	6000	277	21.7

- For Bronze Body with Stainless Steel Trim add "BR" to part number above.
- For Black Body add "BL" to part number above.
- For Almond Body add "AL" to part number above.
- For Beige Body add "BE" to part number above.
- For Biscuit Body add "BI" to part number above.
- For White Body add "WI" to part number above.

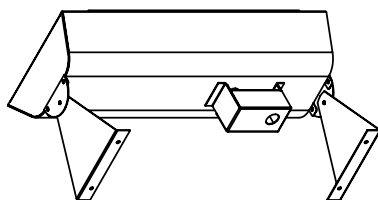
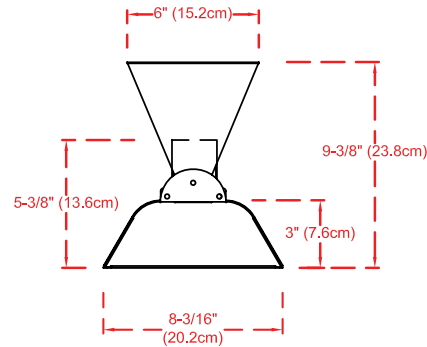
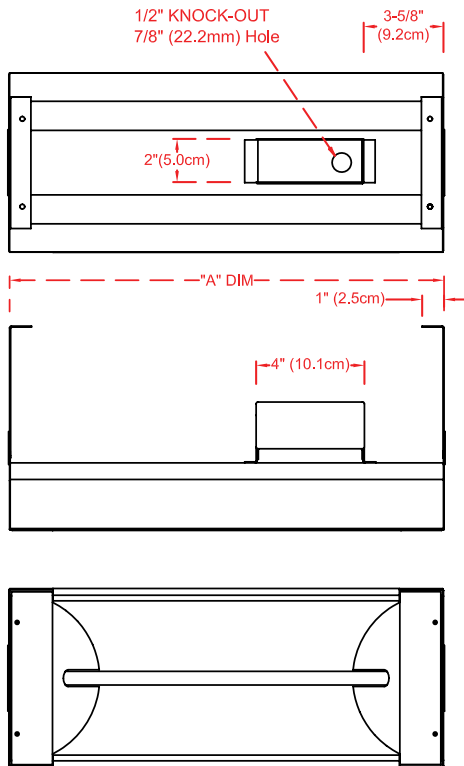
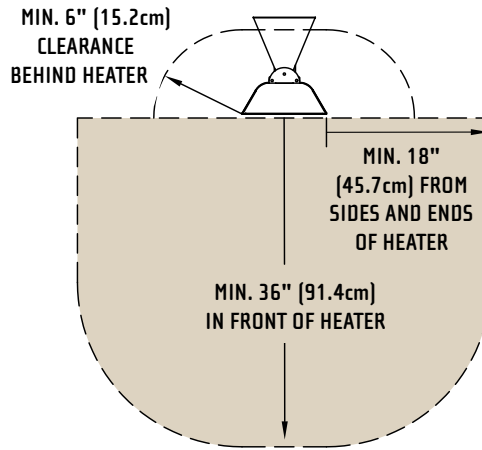
WD-Series Replacement Elements

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	FITS
10-1055	E-1424	30"	1500	240	WD-3024
10-1058	E-1427	30"	1500	277	WD-3027
10-1060	E-1428	30"	1500	208	WD-3028
10-1062	E-1448	30"	1500	480	WD-3048
10-1085	E-2024	36"	2000	240	WD-4024
10-1090	E-2027	36"	2000	277	WD-4027
10-1095	E-2028	36"	2000	208	WD-4028
10-2000	E-2048	36"	2000	480	WD-4048
10-2010	E-2524	36"	2500	240	WD-5024
10-2015	E-2527	36"	2500	277	WD-5027
10-2020	E-2528	36"	2500	208	WD-5028
10-2025	E-2548	36"	2500	480	WD-5048
10-2030	E-3024	58"	3000	240	WD-6024
10-2035	E-3027	58"	3000	277	WD-6027
10-2040	E-3028	58"	3000	208	WD-6028
10-2045	E-3048	58"	3000	480	WD-6048

For our helpful instruction video, "How to Replace an Infratech Heating Element - W/WD-Series," please visit www.infratech-usa.com or contact customer service.

WD-Series Heater Clearance and Dimensions

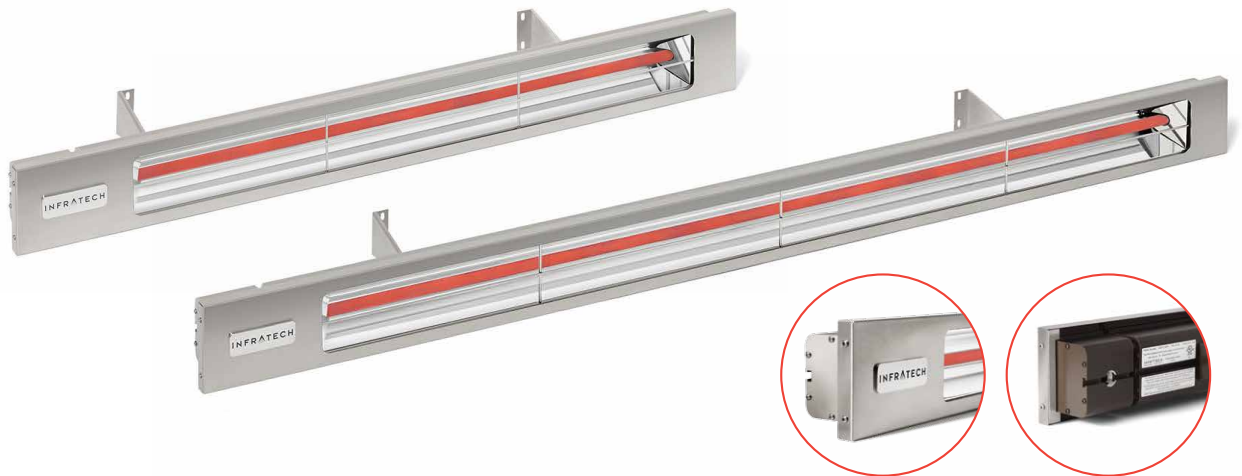
CLEARANCE FROM COMBUSTIBLES:



MODEL	"A" DIM.	"A" DIM.	WATTS	VOLTS	AMPS	BTU's
W2024	39"	99.0cm	2000	240	8.3	6824
W2524	39"	99.0cm	2500	240	10.4	8530
WD3024	33"	83.8cm	3000	240	12.5	10236
W3024	61.25"	155.5cm	3000	240	12.5	10236
W4024	61.25"	155.5cm	4000	240	16.7	13648
WD4024	39"	99.0cm	4000	240	16.7	13648
WD5024	39"	99.0cm	5000	240	20.8	17060
WD6024	61.25"	155.5cm	6000	240	25	20472

OTHER VOLTAGES ALSO AVAILABLE: 208, 277, 480 VAC

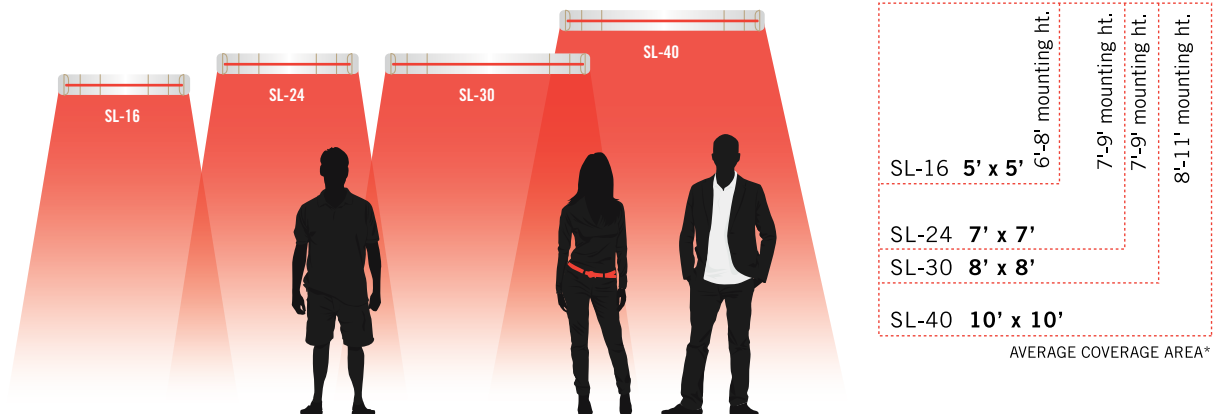
SL- Series Slimline Single Element Heaters



Logo Plate designed to rotate if required

T-Slot on back allows the mounting bracket to slide for flexible mounting options.

- Infratech's SL-Series is designed with a low profile that is suitable for both indoor and outdoor surface mount applications up to 11'.
- Fixtures are available in lengths of 29.5", 42.5", and 63.5".
- SL-Series are available in 1600, 2400, 3000, and 4000 watt models.
- Features include narrow profile and a T-slot for flexible mounting options.
- The SL-Series housing body and mounting brackets come with a stainless hue anodized aluminum finish, are also available in Bronze and our All Black Slimline Shadow™.



SL-Series Slimline Single Element Heaters

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	AMPS
21-4990	SL-1612	29.5"	1600	120	13.3
21-4995	SL-1624	29.5"	1600	240	6.7
21-4997	SL-1628	29.5"	1600	208	7.7
21-5000	SL-2424	42.5"	2400	240	10.0
21-5010	SL-2428	42.5"	2400	208	11.5
21-5020	SL-2448	42.5"	2400	480	5
21-5030	SL-2427	42.5"	2400	277	8.7
21-5040	SL-3024	63.5"	3000	240	12.5
21-5050	SL-3028	63.5"	3000	208	14.4
21-5060	SL-3048	63.5"	3000	480	6.3
21-5070	SL-3027	63.5"	3000	277	10.8
21-5080	SL-4024	63.5"	4000	240	16.7
21-5090	SL-4028	63.5"	4000	208	19.2
21-5100	SL-4048	63.5"	4000	480	6.3
21-5110	SL-4027	63.5"	4000	277	10.8

- Part Numbers listed above are for Infratech's Standard Stainless Steel SL-Slimline Series.
- For Bronze Body with Stainless Steel Trim add "BR" to part number above.
- For the All Black Slimline Shadow™ add "BL" to the above part number.

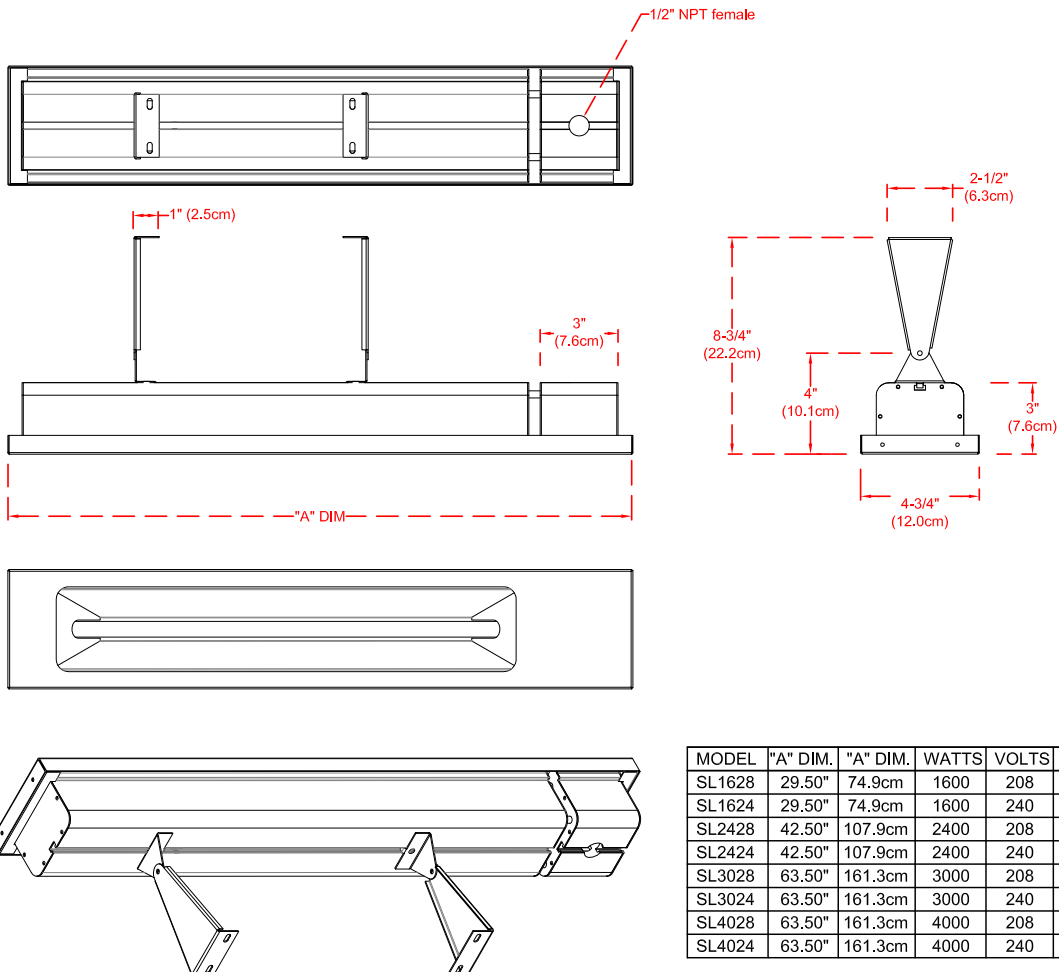
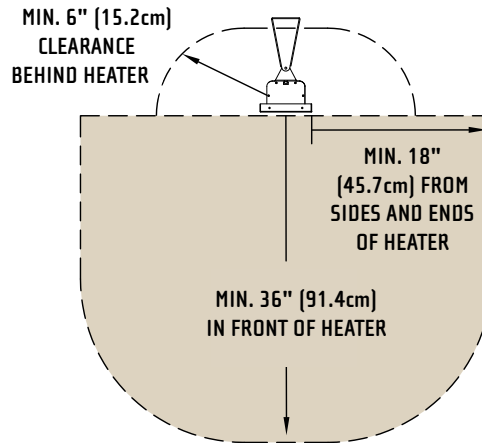
SL-Series Slimline Replacement Elements

PART NUMBER	MODEL	LENGTH	WATTS	VOLTS	FITS
10-7025	E-1612-SL	22-3/8"	1600	120	SL-1612
10-7030	E-1624-SL	22-3/8"	1600	240	SL-1624
10-7032	E-1628-SL	22-3/8"	1600	208	SL-1628
10-7035	E-2424-SL	35-3/8"	2400	240	SL-2424
10-7050	E-2427-SL	35-3/8"	2400	277	SL-2427
10-7040	E-2428-SL	35-3/8"	2400	208	SL-2428
10-7045	E-2448-SL	35-3/8"	2400	480	SL-2448
10-7055	E-3024-SL	56-3/8"	3000	240	SL-3024
10-7070	E-3027-SL	56-3/8"	3000	277	SL-3027
10-7060	E-3028-SL	56-3/8"	3000	208	SL-3028
10-7065	E-3048-SL	56-3/8"	3000	480	SL-3048
10-7075	E-4024-SL	56-3/8"	4000	240	SL-4024
10-7090	E-4027-SL	56-3/8"	4000	277	SL-4027
10-7080	E-4028-SL	56-3/8"	4000	208	SL-4028
10-7085	E-4028-SL	56-3/8"	4000	480	SL-4048

For our helpful instruction video, “How to Replace an Infratech Heating Element - SL-Series,” please visit www.infratech-usa.com or contact customer service.

SL-Series Heater Clearance and Dimensions

CLEARANCE FROM COMBUSTIBLES:

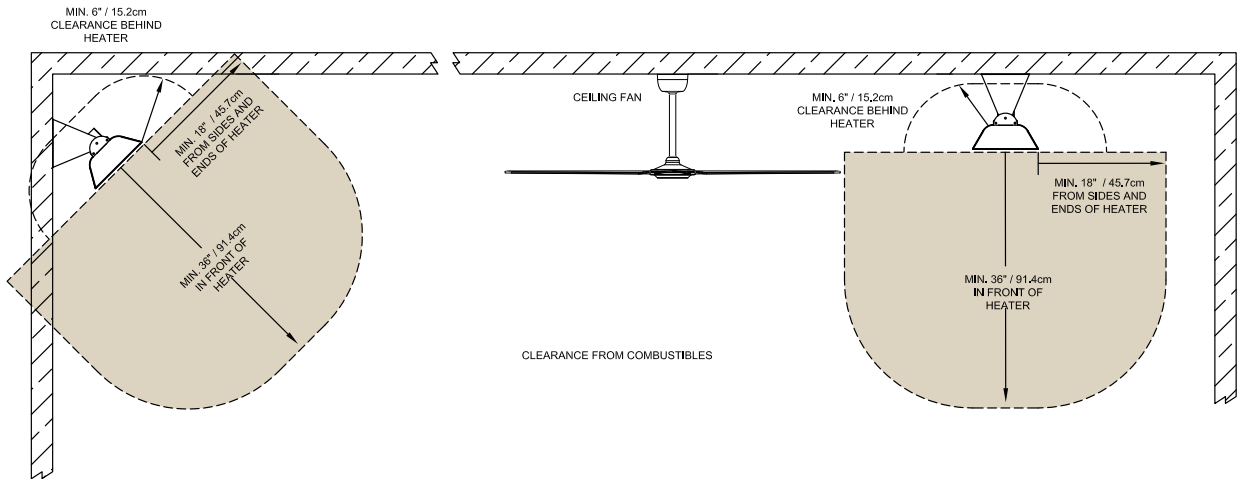


MODEL	"A" DIM.	"A" DIM.	WATTS	VOLTS	AMPS	BTU's
SL1628	29.50"	74.9cm	1600	208	7.7	5460
SL1624	29.50"	74.9cm	1600	240	6.7	5460
SL2428	42.50"	107.9cm	2400	208	11.5	8190
SL2424	42.50"	107.9cm	2400	240	10	8190
SL3028	63.50"	161.3cm	3000	208	14.4	10239
SL3024	63.50"	161.3cm	3000	240	12.5	10239
SL4028	63.50"	161.3cm	4000	208	19.2	13652
SL4024	63.50"	161.3cm	4000	240	16.7	13652

OTHER VOLTAGES ALSO AVAILABLE: 277, 480 VAC

Clearance and Dimensions

CLEARANCE FROM COMBUSTIBLES:



■ Low clearance from combustibles.

■ 6" brackets conform to clearance requirements.

Control Options

- Simple On/Off Switch
- Duplex/Stack Switch
- INF Input Regulator
- Solid State Relay Control Package
- Home Management Relay Panel



Infratech Control Options

Infratech is a UL 508 Listed Control Manufacturer with a proven track record in engineering, design, and manufacturing.

- On/Off Switch Assemblies offer a simple, low cost control option compatible with all single element heaters.
- Duplex/Stack Switches are designed for all dual element heaters (max 20 amps per switch).
- The INF Input Regulators are designed for single element heaters (max 15 amps).
- Solid State Relay Control Packages include a Solid State Relay Panel used in tandem with our Zone Analog Controllers (shown below).
- Home Management Relay Panels offer the ability to integrate Infratech's heaters directly into your home management system, so you can get the most automation control out of your living space.



Simple On/Off Switch Assemblies

On/Off Switches are designed for use with all single element heaters.

■ Low cost control option for all single element heaters.

■ Range 120/277 VAC (20 amps max per switch).



Part# 14-4400
Single SS Wall Plate w/Gang Box



Part# 14-4410
Single Flush Mount
w/ Weatherproof Cover



Part# 14-4420
Single Surface Mount
w/ Weatherproof Box



Part# 14-4405
Dual SS Wall Plate w/Gang Box



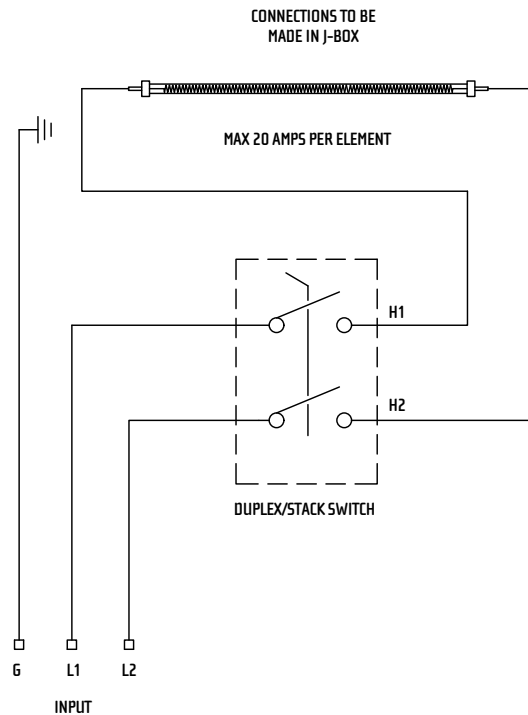
Part# 14-4415
Dual Flush Mount
w/ Weatherproof Cover



Part# 14-4425
Dual Surface Mount
w/ Weatherproof Box

Simple On/Off Switch Sample Wiring Diagram

Range: 120/277, VAC 20 Amps Per Switch



Decora Switch
DPST Double Pole Single Throw
Range: 120/277 VAC
Recommended not to Exceed
120 VAC = 1800 Watts Max
208/220 VAC = 3000 Watts Max
240/277 VAC = 4000 Watts Max
20 Amps Max

NOTE: Replace L2 with Neutral for 120 & 277 VAC Applications

Duplex/Stack Switch

- Low cost control option for all dual element heaters.
- All assemblies are available in different configurations, including In-Wall or Surface Mount options with or without weatherproof covers.
- The Duplex/Stack Switch offers the ability to turn on and off each element independently, providing half power/ full power capabilities.
- Range 120/277 VAC (20 amps max per switch).



Part# 14-4300
Single SS Wall Plate w/Gang Box



Part# 14-4310
Single Flush Mount
w/ Weatherproof Cover



Part# 14-4320
Single Surface Mount
w/Weatherproof Box



Part# 14-4305
Dual SS Wall Plate w/Gang Box



Part# 14-4315
Dual Flush Mount
w/ Weatherproof Cover



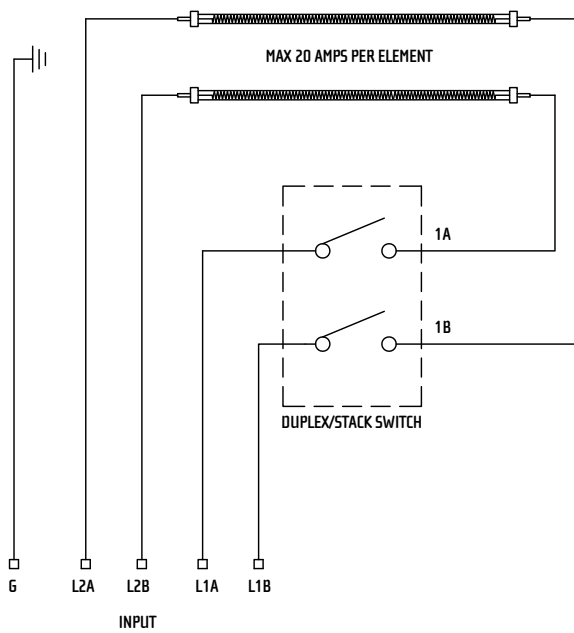
Part# 14-4325
Dual Surface Mount
w/ Weatherproof Box

Duplex/Stack Switch Sample Wiring Diagram

Range: 120/277, VAC 20 Amps Per Switch

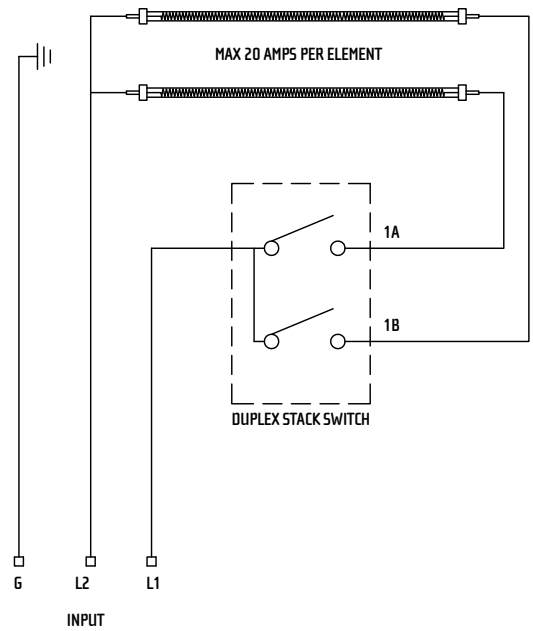
5 WIRE APPLICATION

CONNECTIONS TO BE
MADE IN J-BOX



3 WIRE APPLICATION

CONNECTIONS TO BE
MADE IN J-BOX



Duplex/Stack Switch
Two Single Pole Single
Throw Switches Range:
120/277 VAC
Recommended not to Exceed
120 VAC = 1800 Watts Max
208/220 VAC = 3000 Watts Max
240/277 VAC = 4000 Watts Max
20 Amps Max

NOTE: Replace L2 with Neutral for 120 & 277 VAC Applications

INF Input Regulator

- Low cost control option for single element heaters up to 3000 watts (maximum 15 amps).
- Not a dimmer – the INF gently cycles the heater on and off at regular intervals when not on full power.
- Each heater must have its own INF Input Regulator.
- All assemblies are available in different configurations, including In-Wall or Surface Mount options with or without weatherproof covers.



Part# 14-4200
Single SS Wall Plate
w/ Deep Gang Box



Part# 14-4210
Single Flush Mount
w/ Weatherproof Cover



Part# 14-4220
Single Surface Mount
w/ Weatherproof Box



Part# 14-4205
Dual SS Wall Plate
w/ Deep Gang Box



Part# 14-4215
Dual Flush Mount
w/ Weatherproof Cover

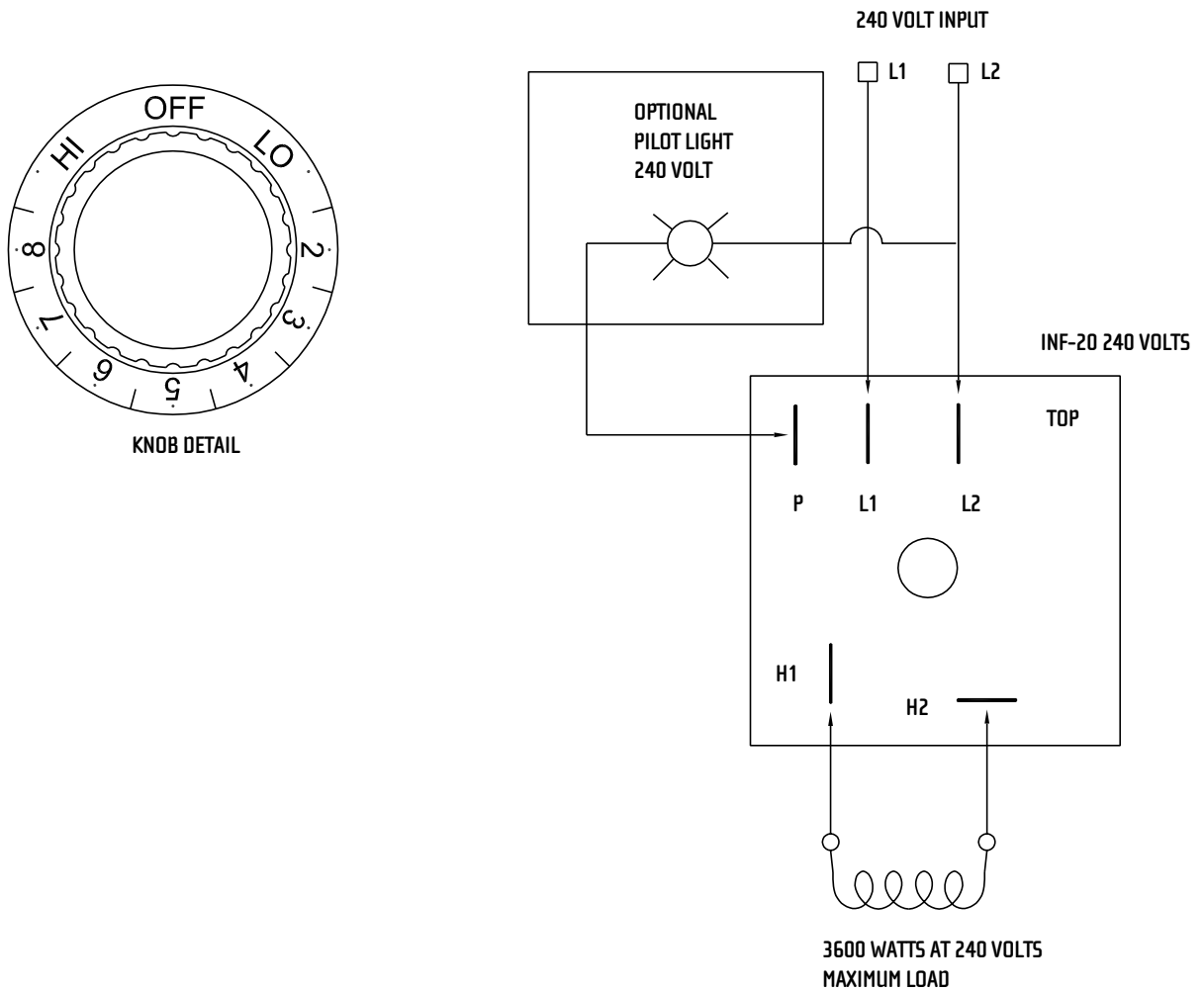


Part# 14-4225
Dual Surface Mount
w/ Weatherproof Box

Regulator Part Numbers listed above are for 240V (also available in 120V).

INF Input Regulator Sample Wiring Diagram

240 VAC, 15 Amps Max



Mechanical Bi-Metal Operation
Double Pole Single Throw (DPST) snap action 240 VAC
3600 watts max
15 amps max

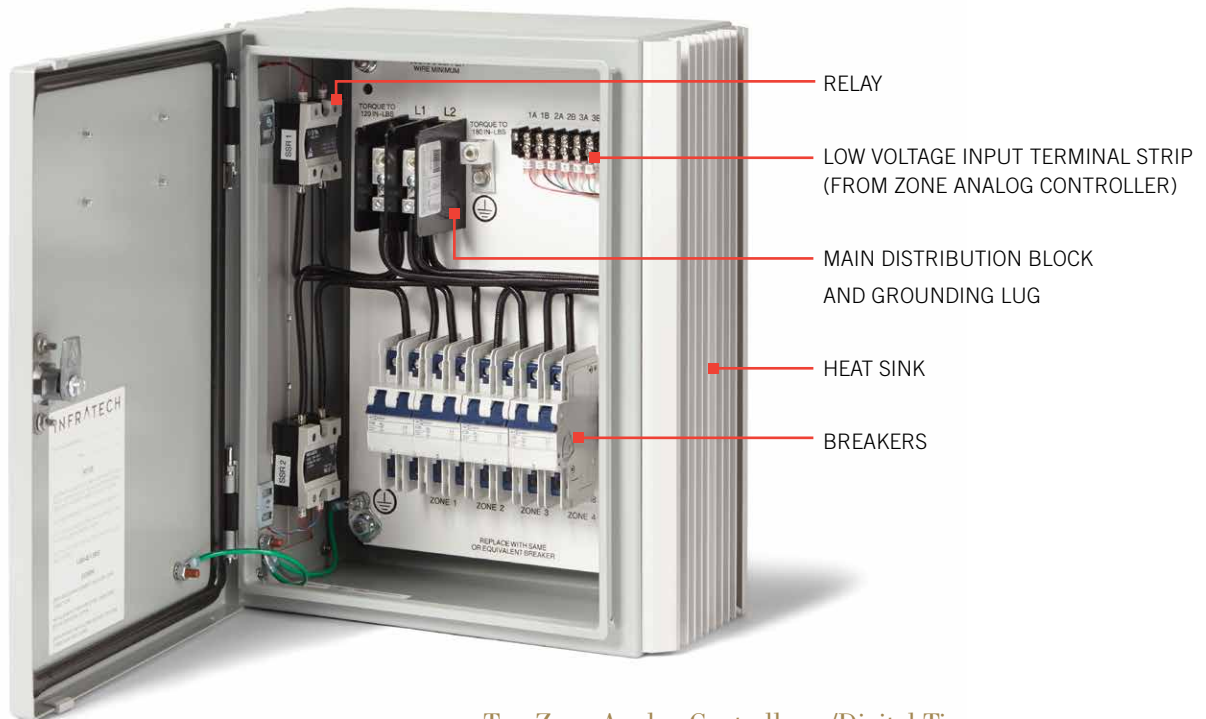
NOTE: Supplied with 4 Insulated Female Connectors Mechanical Bi-Metal Operation

Solid State Relay Control Package

Consists of a Solid State Relay Panel and Zone Analog Controllers

- Infratech's Solid State Controls are engineered for your individual project and suitable for commercial or residential installations of any size.
- Controls are built to UL 508 listing, which is a higher safety standard than the National Electric Code (NEC).
- Multiple zoning capabilities.
- Heaters are hard wired directly to the Solid State Relay Panel.
- Allows for the option to adjust the intensity of heat of one or more heaters in a specified target area.
- Tested before leaving the factory, and provided with wiring diagrams for each installation.
- Available with optional timers.

Solid State Relay Panel



Two Zone Analog Controller w/Digital Timer



Solid State Relay Panel

For use in conjunction with Zone Analog Controllers

- Infratech's Solid State Panels are UL/CUL Listed and are engineered for your individual project and suitable for commercial or residential installations of any size.
- The Solid State Relay Panel will be fed from the facility's main panel at 125% (includes safety factor) of the full amperage of all heaters.
- There is a maximum of 9000 watts at 240V (max. of 8000 watts at 208V per each Relay in the Panel (50 amps max).
- 5,000 watt and 6,000 watt heaters must be on their own relay.
- Multiple heaters on a single relay are required to be the same wattage.
- Solid State Relay Panels can be built to accept Single Phase or Three Phase power.
- Solid State Relay Panels are designed project specific, tested before leaving the factory, and assigned a UL/CUL Listed Job Number.
- Electrical wiring diagrams are provided for each installation.



Solid State Relay Panel

Surface Mount Relay Panels



PART#	DESCRIPTION	EXTERIOR DIMENSIONS
30-4051	1 Relay Panel	16" x 14" x 7"
30-4052	2 Relay Panel	16" x 14" x 7"
30-4053	3 Relay Panel	16" x 14" x 7"
30-4054	4 Relay Panel	16" x 14" x 7"
30-4055	5 Relay Panel	20" x 18" x 7"
30-4056	6 Relay Panel	20" x 18" x 7"

Above dimensions include 1" heat sinks on each side of the relay panel.

Relay Panels requiring more than six relays are also available by special order. Please contact customer service for details.

Zone Analog Controller

For use in conjunction with the Solid State Relay Panel

- Zone Analog Controllers offer the ability to control one or more heaters in a specified target area.
- All heaters in each zone will be controlled simultaneously.
- Each Zone Analog Intensity Control Knob can control a maximum of three relays from the Solid State Relay Panel.
- The Zone Analog Control is wired to the Solid State Relay Control Panel with a low voltage wire (CAT 5 or comparable).
- The Zone Analog Control also requires 1 amp of 120V from a local circuit.
- Optional Digital Timers include intervals of 15 min, 30 min, 60 min, 2 hours, and 4 hours.



Two Zone Analog Controller w/Digital Timer

PART#	DESCRIPTION	EXTERIOR DIMENSIONS	FACE PLATE DIMENSIONS
30-4032	One Zone Analog Controller	4-11/16" x 4-11/16" x 2-1/2"	5-11/16" x 5-11/16"
30-4033	Two Zone Analog Controller	4-1/2" x 8-5/8" x 2-1/2"	5-1/2" x 9-1/2"
30-4034	Three Zone Analog Controller	4-1/2" x 12-1/4" x 2-1/2"	5-1/2" x 13-3/16"
30-4035	Four Zone Analog Controller	4-1/2" x 14-3/16" x 2-1/2"	5-1/2" x 15"
30-4045	One Zone Analog Controller w/ Digital Timer	4-1/2" x 6-3/4" x 2-1/2"	5-1/2" x 7-3/4"
30-4046	Two Zone Analog Controller w/ Digital Timer	4-1/2" x 12-1/4" x 2-1/2"	5-1/2" x 13-3/16"
30-4047	Three Zone Analog Controller w/ Digital Timer	4-1/2" x 14-3/16" x 2-1/2"	5-1/2" x 15"
30-4048	Four Zone Analog Controller w/ Digital Timer	4-1/2" x 17-3/4" x 2-1/2"	5-1/2" x 18-3/4"

Relay Panels requiring more than six relays are also available by special order. Please contact customer service for details.

Zone Analog Controllers

In-Wall Assemblies For Indoor Or Outdoor Protected Areas



30-4032
1 Zone Analog Controller



30-4033
2 Zone Analog Controller



30-4034
3 Zone Analog Controller



30-4035
4 Zone Analog Controller



30-4045
1 Zone Analog Controller w/ Digital Timer



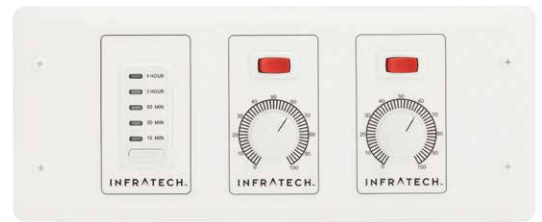
30-4046
2 Zone Analog Controller w/ Digital Timer



30-4047
3 Zone Analog Controller w/ Digital Timer



30-4048
4 Zone Analog Controller w/ Digital Timer



All Zone Analog Controllers also available in white (Special Order)

Solid State Relay Control Package Placement

Solid State Relay Placement

- Surface Mount in a well ventilated area.
- Heat Sinks are the 1" deep Aluminum Extrusions on the left and right sides of the panel. It is suggested the power be brought in through the top or bottom of the panel (not from the back).
- Minimum clearance is 6" on each side, 12" from the top and bottom. Additional clearance will be needed if placed in a poorly ventilated area.
- NEMA 4 Rated, which is completely weather resistant.
- Must be accessible per National Electric Code (NEC).



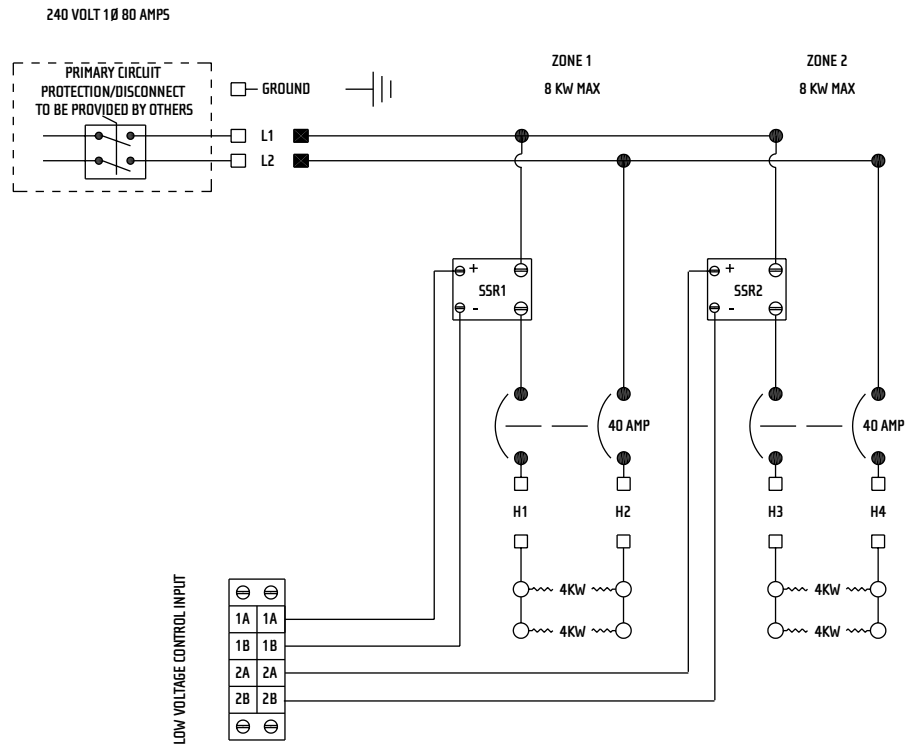
Zone Analog Controller Placement

- NEMA 12 Rated, will need to be mounted in a well-protected covered area.
- Zone Analog Controllers can be installed in any suitable location that will make it convenient to control the heater(s).
- Custom NEMA 4 housing also available upon special order.

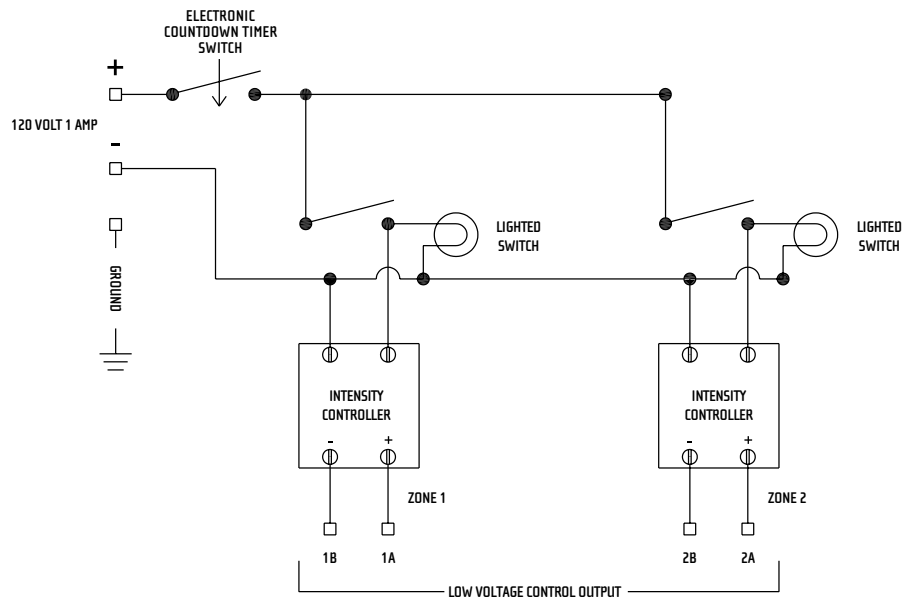


Solid State Relay Control Package Sample Wiring Diagrams

Two Relay Panel



Two Zone Analog Controller



NOTE: USE TWISTED PAIR OR SHIELDED WIRE FOR LOW VOLTAGE HOOK-UP.

Home Management Relay Panel

For use in conjunction with your Home Management System

- Infratech's Home Management Control is compatible with top selling systems like Lutron™, Crestron™, Control 4™, and others.
- Interface requires a 0-10V DC Input for streamlined integration and control.
- Choose from a range of programming options through your home management system, including the ability to save preferred heating settings for off-site control via mobile device, and more.

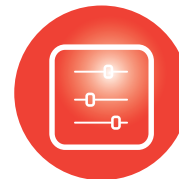
Three simple steps for Infratech + Smart Home setup



STEP 1 | Select the Home Management System that provides the best functionality for your lifestyle.*

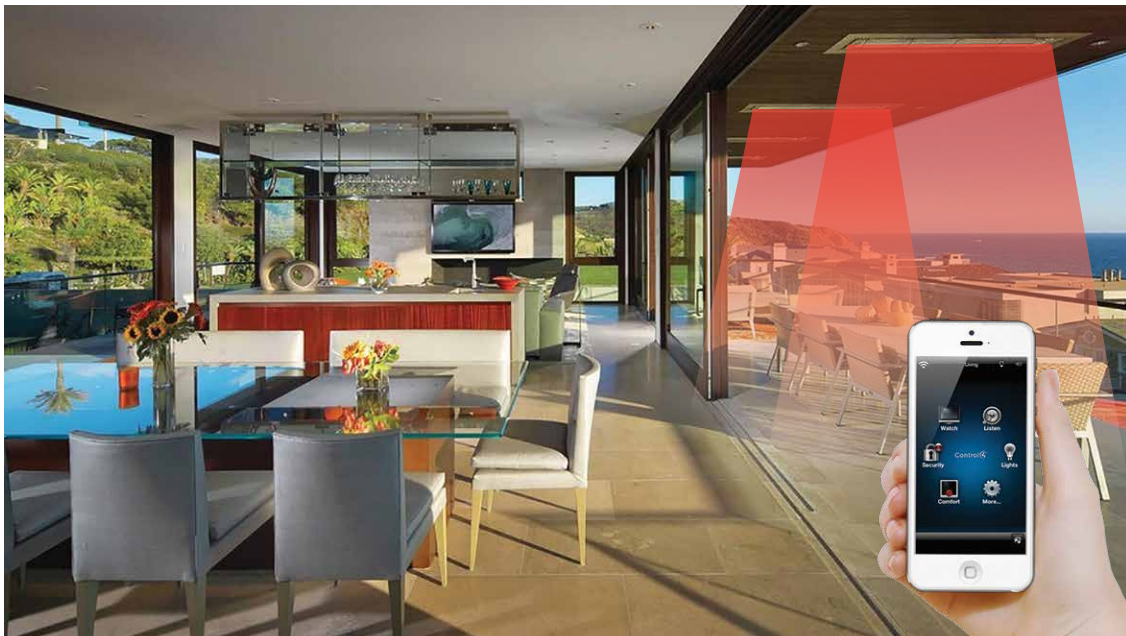


STEP 2 | Install the Infratech heater or heating system that best complements the needs of your space.

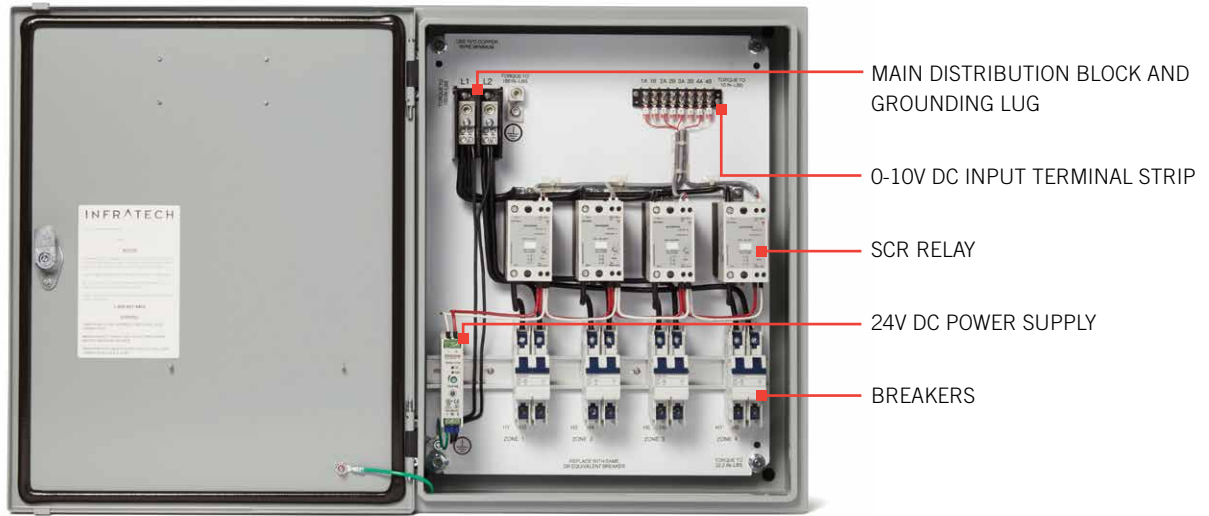


STEP 3 | Connect your Infratech heating control to the Smart control panel, with the assistance of a licensed electrician.

*Contact us to check compatibility



Home Management Relay Panel

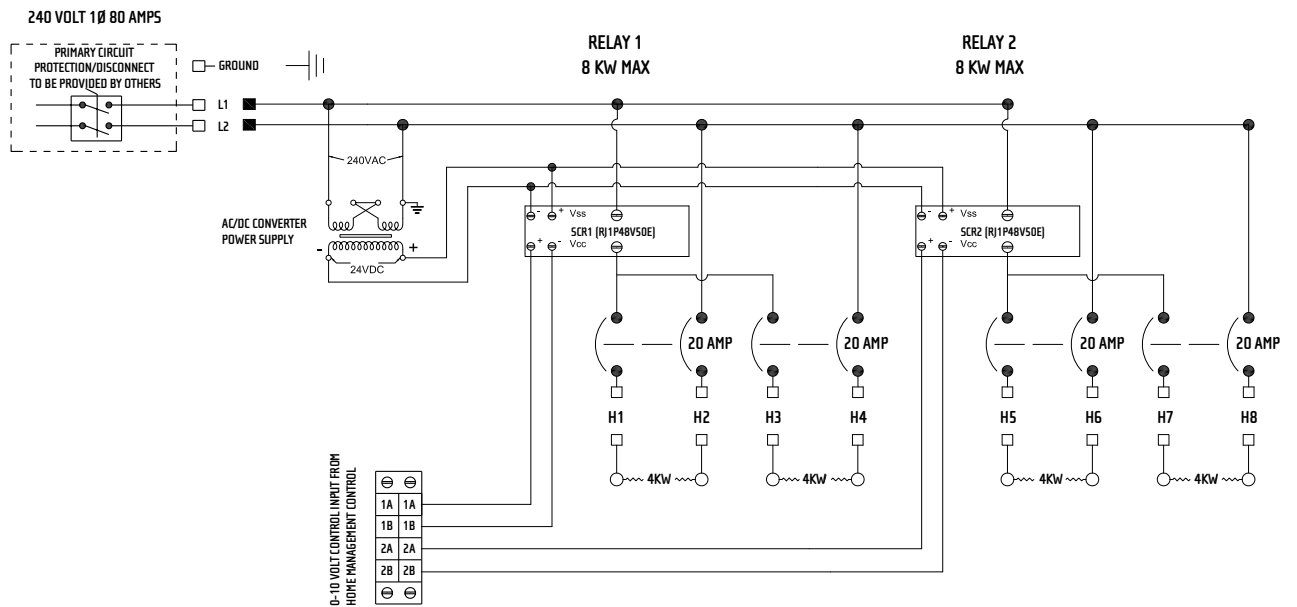


PART#	DESCRIPTION	EXTERIOR DIMENSIONS
30-4061	1 Relay Home Management Panel	20" X 17" X 7"
30-4062	2 Relay Home Management Panel	20" X 17" X 7"
30-4063	3 Relay Home Management Panel	20" X 17" X 7"
30-4064	4 Relay Home Management Panel	20" X 17" X 7"
30-4065	5 Relay Home Management Panel	24" X 21" X 7"
30-4066	6 Relay Home Management Panel	24" X 21" X 7"

Above dimensions include 1/2" lowers on each side of the relay panel.

Home Management Relay Panels requiring more than six relays are also available by special order. Please contact customer service for details.

Home Management Relay Panel Sample Wiring Diagram



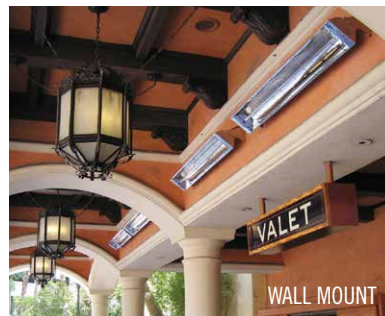
Mounting Options

- Flush Mount
- Ceiling Mount & Wall Mount
- Pole Mount



Mounting Options

Infratech's heaters can be flush mounted, ceiling mounted, wall mounted, or pole mounted with minimal clearance requirements. UL Listed for as low as 6 feet (minimum 7' suggested) and CUL Listed for as low as 8 feet.

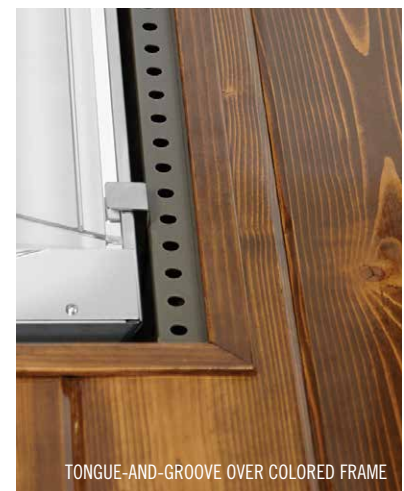


Flush Mount Installation

Applicable for the W-Series and WD-Series

- Frames are compatible with the W-Series and WD-Series fitting 33", 39", or 61-¼" heaters.
- Select an area with a flat ceiling and minimum 2" x 8" studs, where the heater can face straight down when recessed (see warning below).
- The Flush Mount Application requires a 5-sided 5/8" drywall lined pocket with a (1) hour fire rating.
- Infratech's Flush Mount Frames are furnished with a 4' Whip and Hi-Temp Wire Nuts for proper installation.
- The 4' Whip connects to the Heater (inside of the pocket) to a junction box outside of the pocket.
- The provided Hi-Temp Wire Nuts are used to connect the Whip (elbow side) to the J-Box on the back of the heater.
- The Flush Mount Frames can be installed with the edges exposed, or can be covered by a drywall, plaster, stucco or tongue-and-groove ceiling treatment. (½" clearance required from ventilation holes).
- Heater/Frame must always be permanently installed and hard wired by a licensed electrician.
- All electrical connections must be in compliance with the National Electric Code (NEC) and or local building codes.

Installation Examples

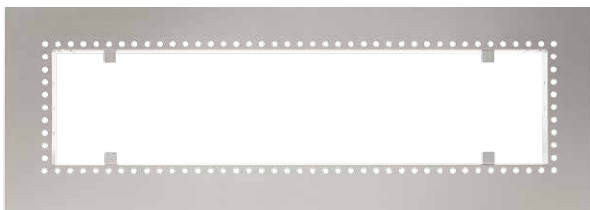


NOTE: FRAME AND HEATERS CANNOT BE MOUNTED ON A SLOPED/PITCHED CEILING. FRAME IS ONLY TO BE USED ON A FLAT, NON-SLOPED CEILING. FLUSH MOUNT APPLICATIONS MUST ALWAYS BE INSTALLED WITH HEATERS HORIZONTAL TO THE FLOOR.

Flush Mount Frames



18-2305 W-61 Flush Mount Frame



18-2300 W-39 Flush Mount Frame



18-2295 W-33 Flush Mount Frame

MODELS	HEATER LENGTH	FLUSH MOUNT FRAME
W-30	61- ¹ / ₄ "	W-61
W-40	61- ¹ / ₄ "	W-61
WD-60	61- ¹ / ₄ "	W-61
W-20	39"	W-39
W-25	39"	W-39
WD-40	39"	W-39
WD-50	39"	W-39
WD-30	33"	W-33

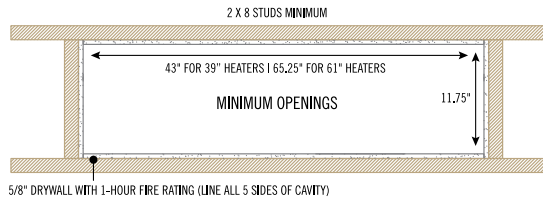
- For Bronze Body with Stainless Steel Trim add "BR" to part number above.
- For Black Body add "BL" to part number above.
- For Almond Body add "AL" to part number above.
- For Beige Body add "BE" to part number above.
- For Biscuit Body add "BI" to part number above.
- For White Body add "WI" to part number above.

NOTE: Frames supplied with Hi-Temp Fixture Whip and High Temp Wire Nuts.

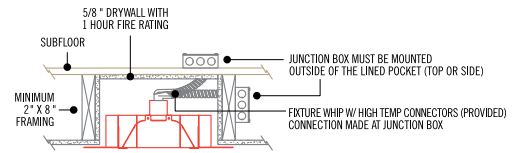
Proper Flush Mount Installation

Flush mount your heater in four simple steps

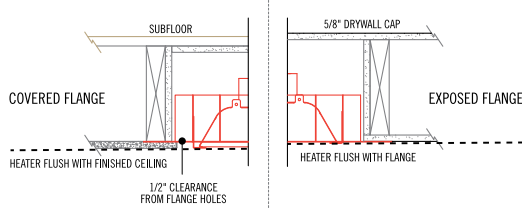
STEP 1 Frame the pocket that will house the heater with a one hour-rated fire containment box.



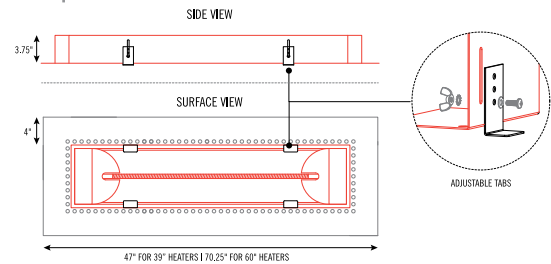
STEP 2 The junction box must be mounted outside of the lined pocket. You can choose to mount the junction box in a variety of locations, depending upon where you'll be accessing it.



STEP 3 Install the frame into the finished pocket. You may choose to leave all four inches of the trim exposed, or partially cover it with a decorative ceiling ($1/2$ " clearance is required from ventilation holes).



STEP 4 Install the heater (heater must face horizontal to the floor) and adjust the tabs to set the heater height appropriately.



WARNING: FRAME AND HEATERS CANNOT BE MOUNTED ON A SLOPED/PITCHED CEILING. FLUSH MOUNT APPLICATIONS MUST ALWAYS BE INSTALLED WITH HEATERS HORIZONTAL TO THE FLOOR ON A FLAT, NON-SLOPED CEILING.

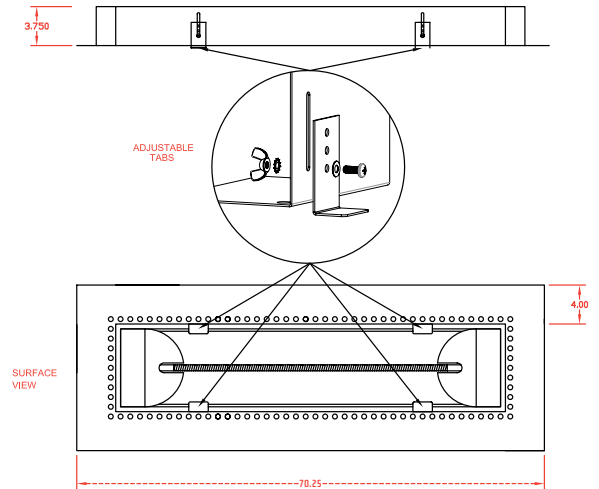
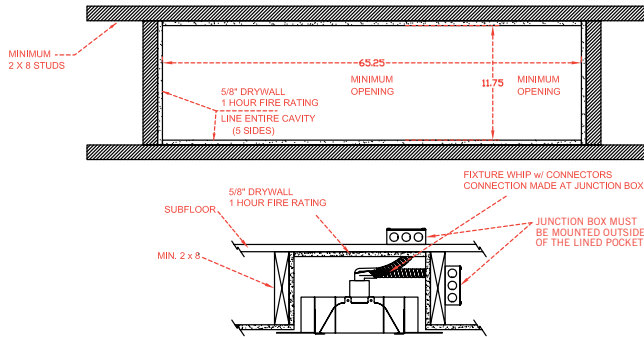


For video instructions of proper flush mount installation, visit www.infratech-usa.com or scan.

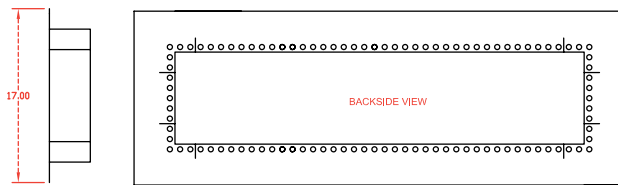
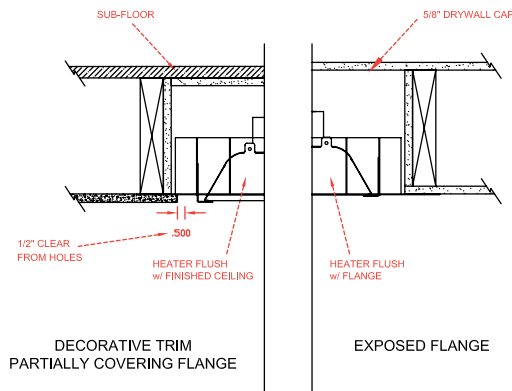


W-61 Flush Mount Frame Installation Diagram

Applicable for Infratech's W-Series and WD-Series 61-1/4" Heaters



Installation Types



WARNINGS:

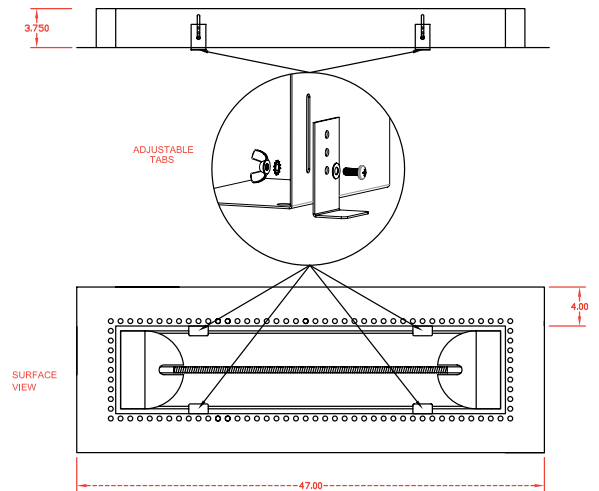
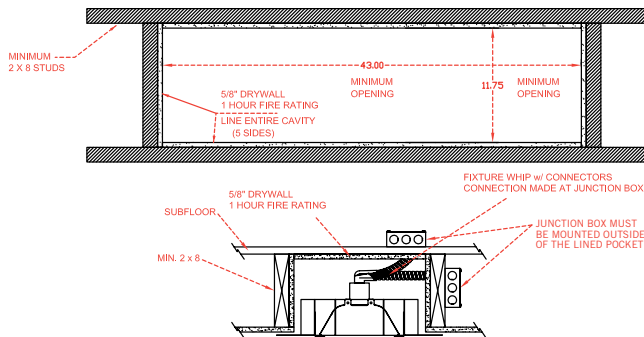
- This frame is **ONLY** to be used on a flat non-sloped ceiling.
- Heater must face straight down.
- Frame and Heater cannot be installed on a pitched angle.

NOTES:

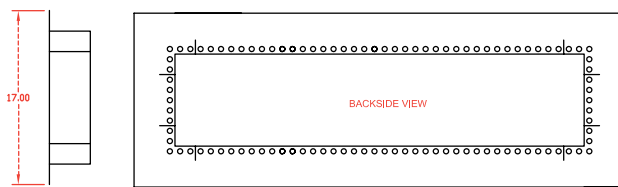
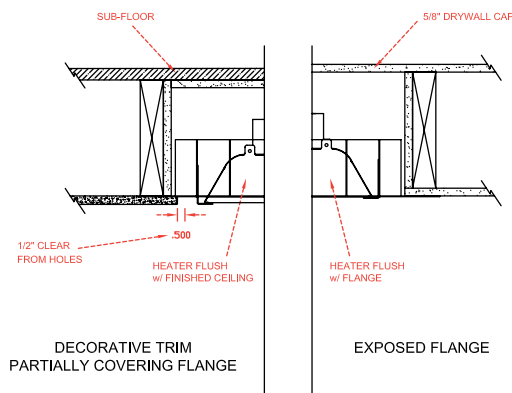
- Heater suspends (Gravity) by resting on adjustable tabs in flush mount fixture.
- Mounting holes on Surface Flange to be determined and drilled by Contractor/Installer.
- Supplied with Hi-Temp Fixture Whip and Hi-Temp Wire Nuts.
- Coil excess flex into heater cavity.
- **Use Licensed Electrician ONLY**

W-39 Flush Mount Frame Installation Diagram

Applicable for Infratech's W-Series and WD-Series 39" Heaters



Installation Types



WARNINGS:

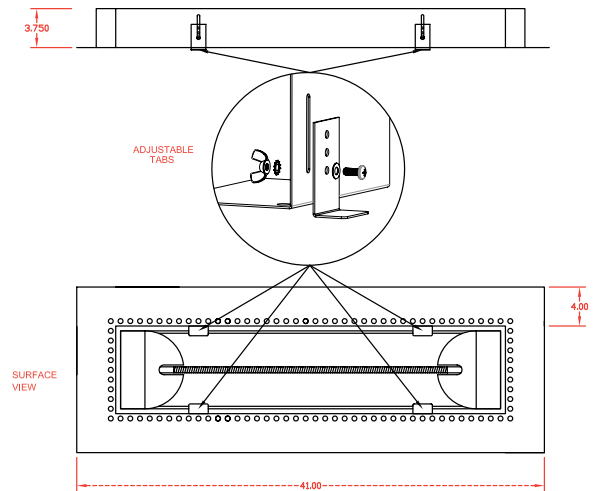
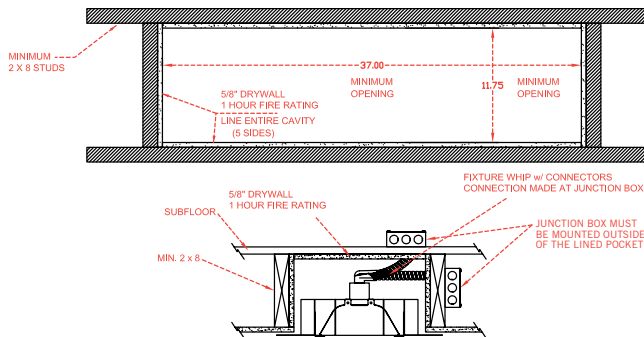
- This frame is **ONLY** to be used on a flat non-sloped ceiling.
- Heater must face straight down.
- Frame and Heater cannot be installed on a pitched angle.

NOTES:

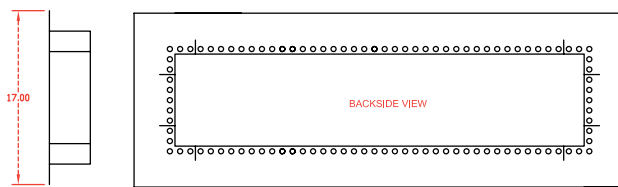
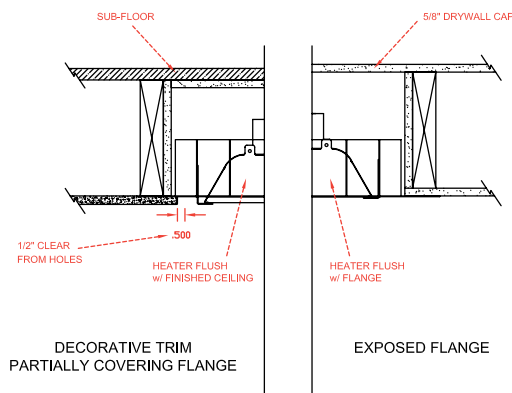
- Heater suspends (Gravity) by resting on adjustable tabs in flush mount fixture.
- Mounting holes on Surface Flange to be determined and drilled by Contractor/Installer.
- Supplied with Hi-Temp Fixture Whip and Hi-Temp Wire Nuts.
- Coil excess flex into heater cavity.
- **Use Licensed Electrician ONLY**

W-33 Flush Mount Frame Installation Diagram

Applicable for Infratech's WD-Series 33" Heaters



Installation Types



WARNINGS:

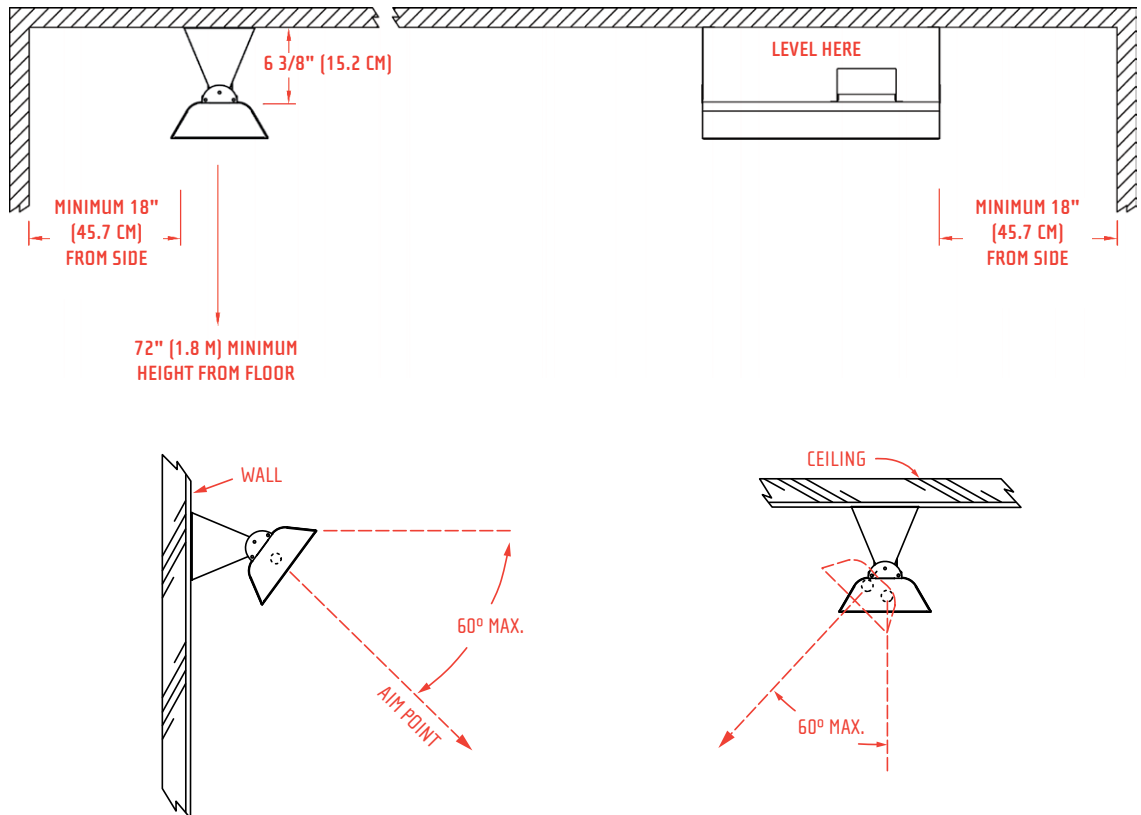
- This frame is **ONLY** to be used on a flat non-sloped ceiling.
- Heater must face straight down.
- Frame and Heater cannot be installed on a pitched angle.

NOTES:

- Heater suspends (Gravity) by resting on adjustable tabs in flush mount fixture.
- Mounting holes on Surface Flange to be determined and drilled by Contractor/Installer.
- Supplied with Hi-Temp Fixture Whip and Hi-Temp Wire Nuts.
- Coil excess flex into heater cavity.
- **Use Licensed Electrician ONLY**

Ceiling and Wall Mount Applications for W-Series and WD-Series Heaters

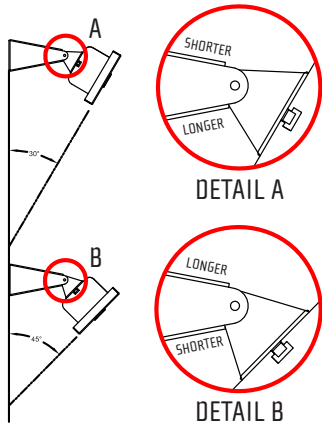
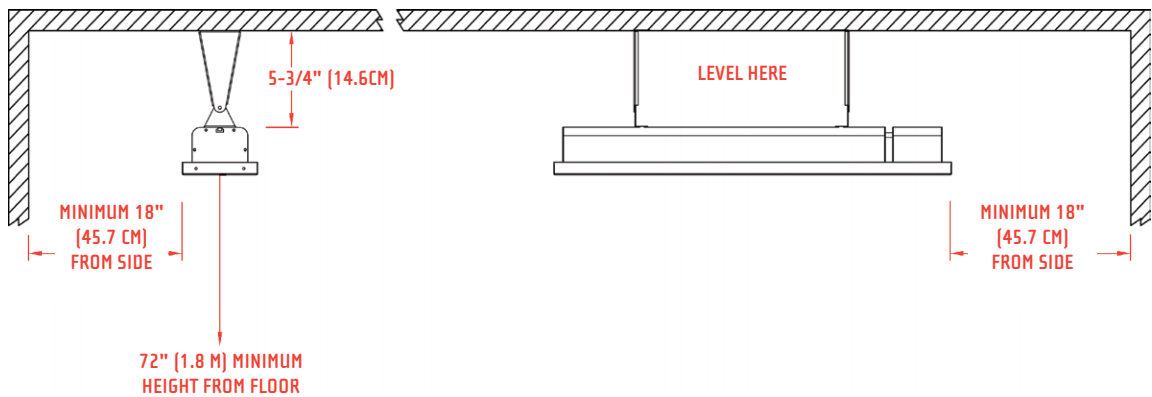
Our low profile heaters are suitable for indoor and outdoor installations, and offer a pleasing, streamlined look due to low clearance requirements.



Mounting Brackets are included with all Infratech Heaters

Ceiling and Wall Mount Applications for SL-Series Slimline Heaters

The SL-Series Brackets are designed for two positive stop positions.



SHALLOW ANGLE

For a Shallow Angle Installation (30° off the wall) mount both brackets with the "longer length stop" positioned on the bottom.

STEEPER ANGLE

For a Steeper Angle Installation (45° off the wall) mount both brackets with the "shorter length stop" positioned on the bottom.

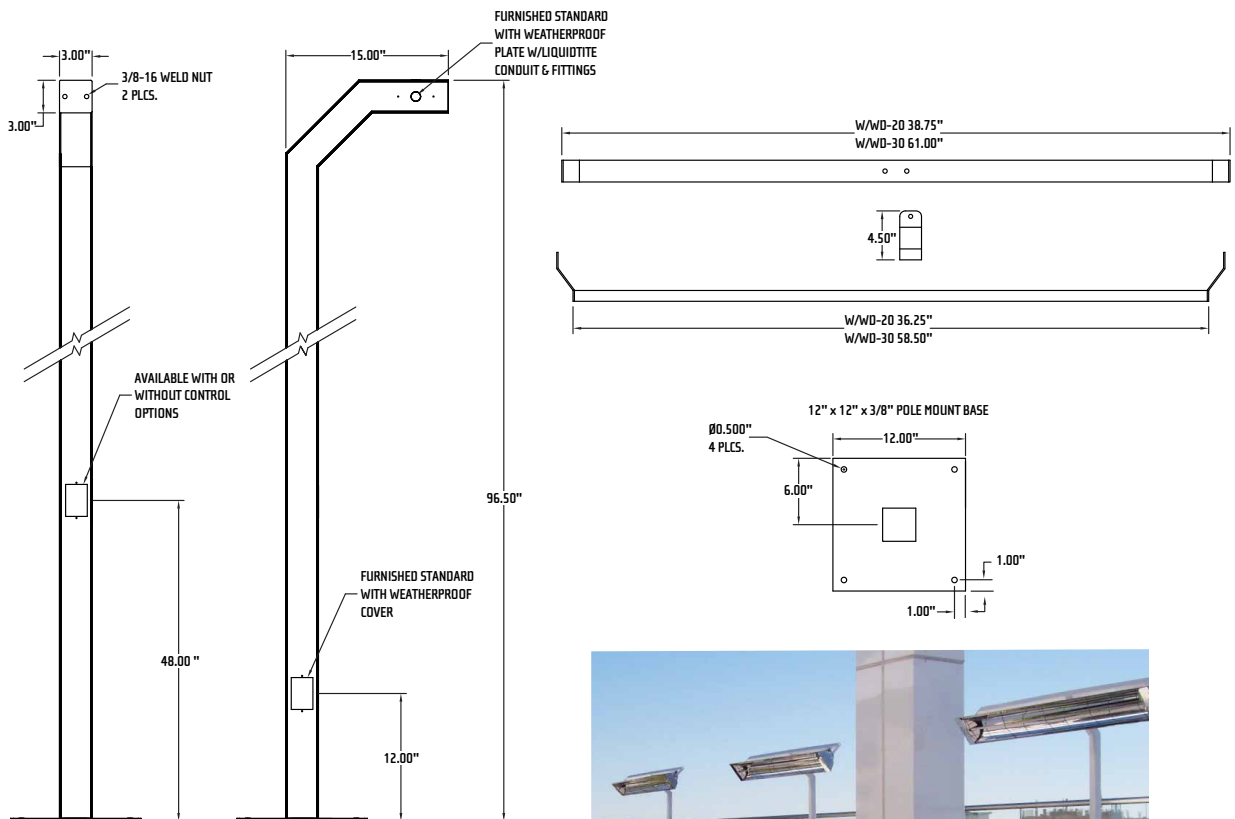


Mounting Brackets are included with all Infratech Heaters

Pole Mount Installation

8' Pole with 12" X 12" Base. Includes both Pole Mount and Cross Bar.
Available with or without Cutout Switch for Control Options.

POLE MOUNT INSTALLATION FOR W/WD-SERIES HEATERS



PART#	DESCRIPTION
22-1250	W-39 Pole Mount - White
22-1255	W-61 Pole Mount - White

Also available in custom sizes and custom colors.
Please contact customer service for details.

Color Options

- Color and Finish Options
- Custom Colors

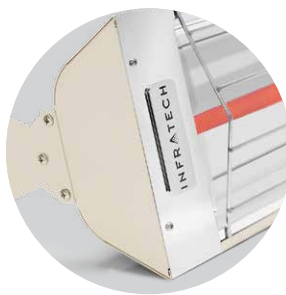


W-Series/WD-Series Color and Finish Options

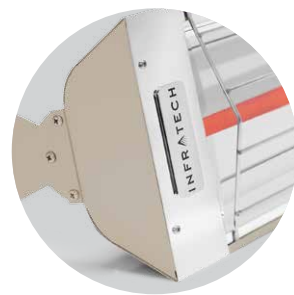
- Infratech's heaters and flush mount frames are available in a brushed stainless steel finish, along with the six (6) standard color options shown.
- You may also choose your own custom finish color, that complements your wall or ceiling treatments (see page 3).
- The Standard Colors are powder coated over the stainless steel and baked to achieve a long lasting, fade and corrosion resistant finish.



WHITE



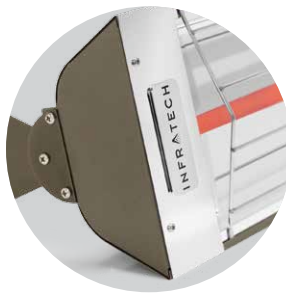
ALMOND



BEIGE



BISCUIT

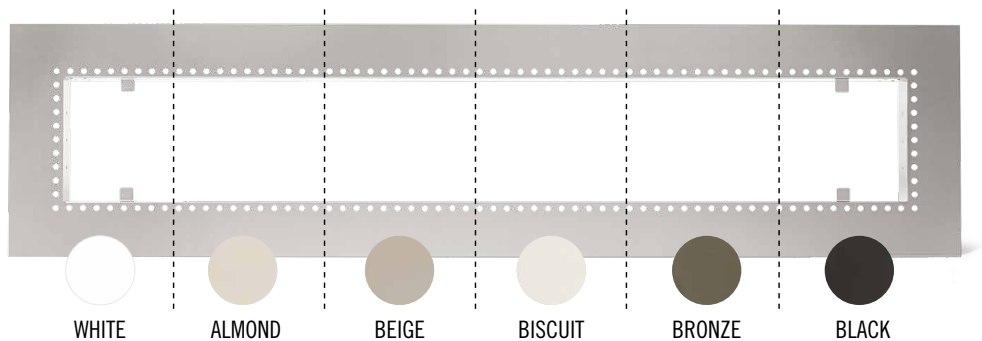


BRONZE



BLACK

NOTE: Flush Mount Installations require powder coating the frame, rather than the heater itself to achieve the desired look.



(ADDITIONAL CHARGES APPLY)

SL-Series Color and Finish Options

Slimline Heaters can be ordered in the following configurations to better coordinate with your environment.



SILVER

Stainless Steel

The Slimline SL-Series comes with a stainless steel trim over a stainless hue anodized aluminum body/mounting brackets.



BRONZE

Anodized Bronze

Available with a Stainless steel trim over bronze anodized aluminum body/mounting brackets. To order the bronze body and brackets, add "BR" to the end of the model part number.



ALL BLACK SLIMLINE
SHADOW™

All Black Slimline Shadow™

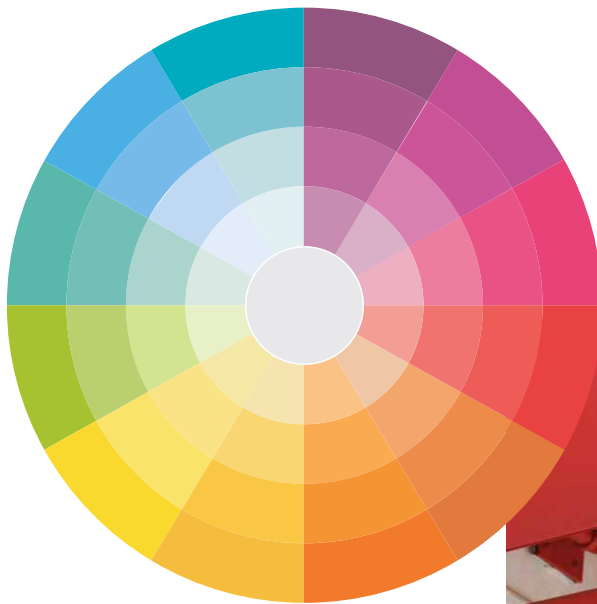
Infratech's All Black Slimline Shadow™ has a powder coated black trim over black anodized aluminum body/mounting brackets. To order the All Black Slimline Shadow™ add "BL" to the end of the model part number.

Pricing is the same for all SL-Slimline Series.

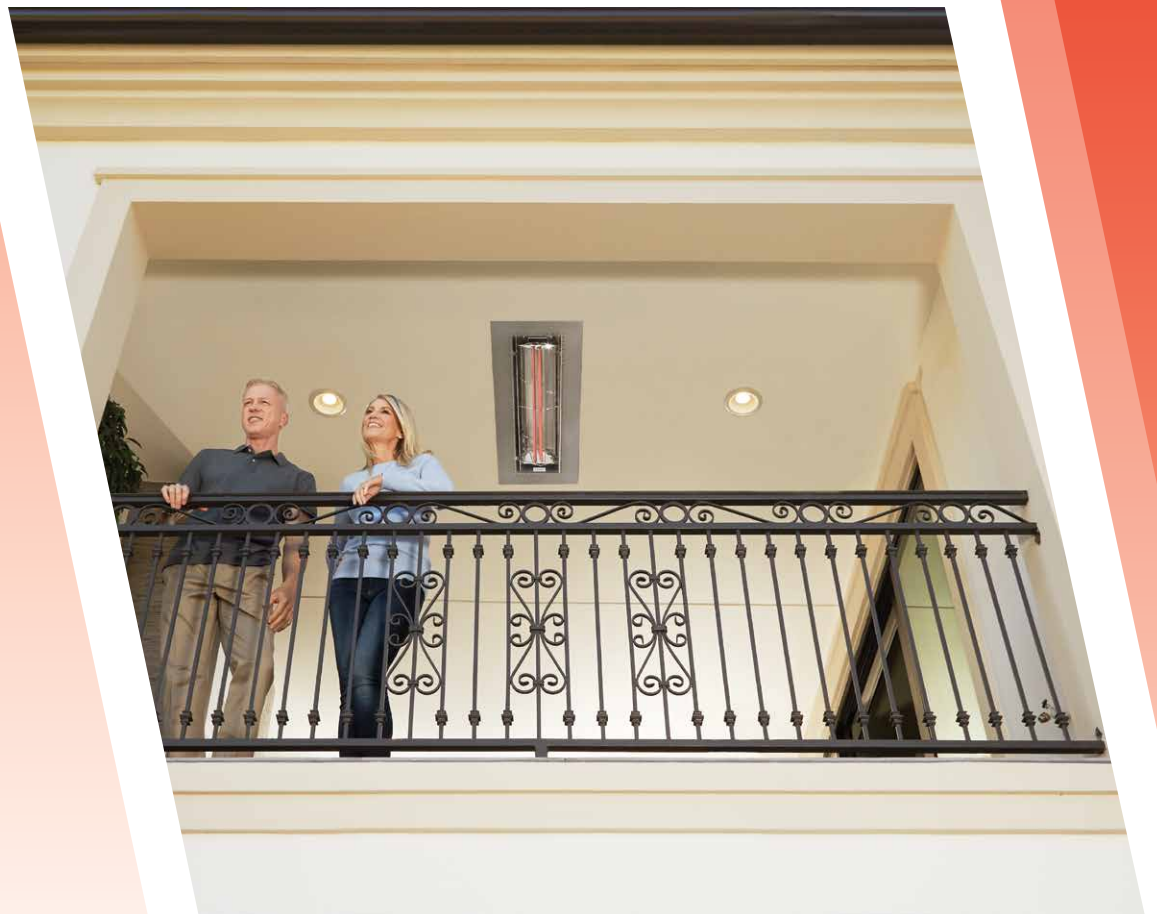
Custom Colors

Virtually Any Custom Color Available

- Applicable for the W-Series and WD-Series Heaters and Infratech's Flush Mount Frames.
- Wide spectrum of colors, textures, and finishes available. Contact Infratech for a copy of Tiger Drylac's color chart to make your selection.
- Once selecting a Tiger Drylac's RAL Number, please contact customer service for a custom quote.
- All custom color orders are non-refundable, and have an approximate lead time of 3-4 weeks.



Getting Started



Heat Your Space in 3 Easy Steps

Infratech offers the widest range of fixtures, installation and control capabilities to create comfortable spaces.

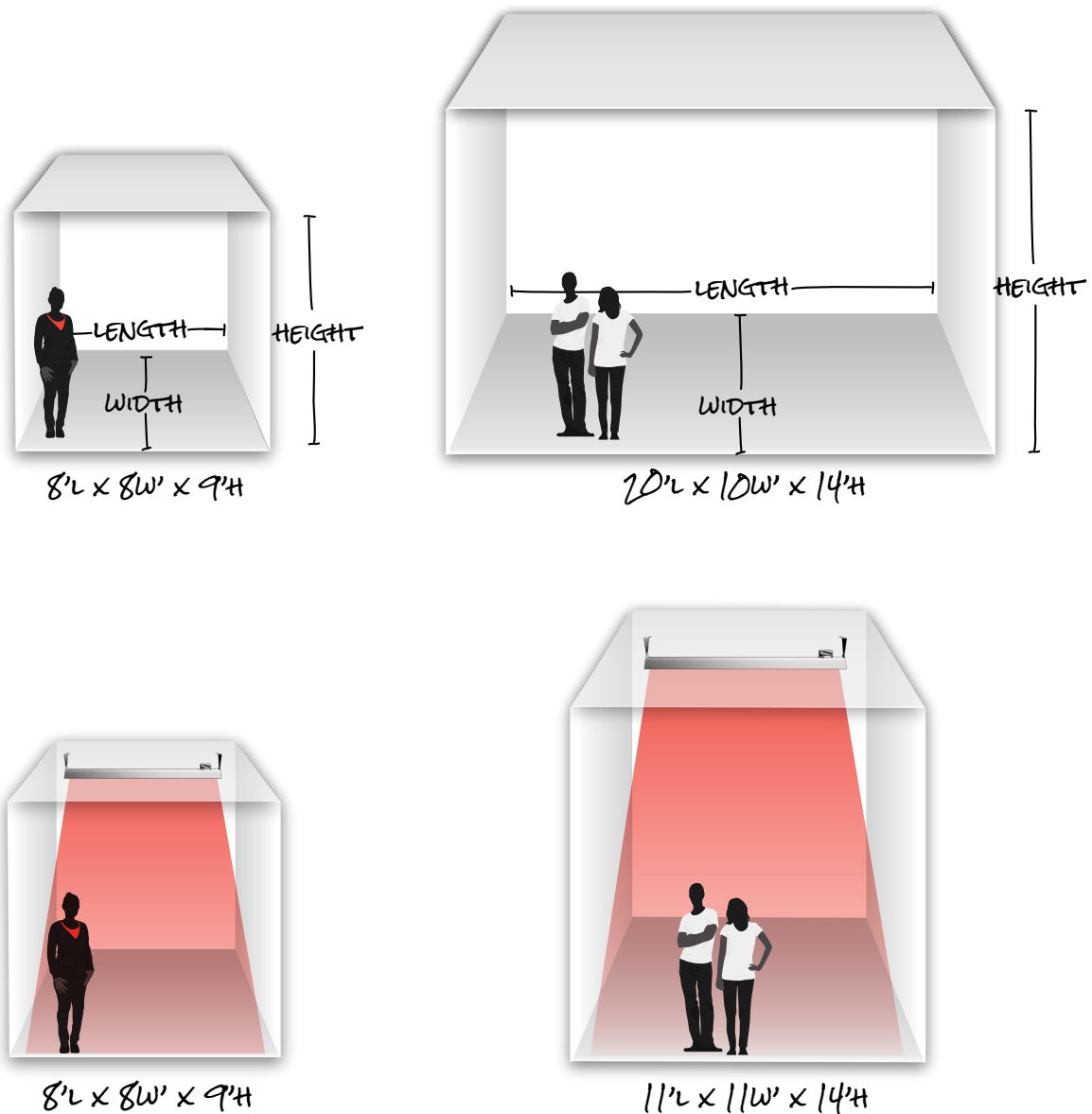
STEP
1 | Measure the Area

STEP
2 | Select the Heaters

STEP
3 | Choose the Controls

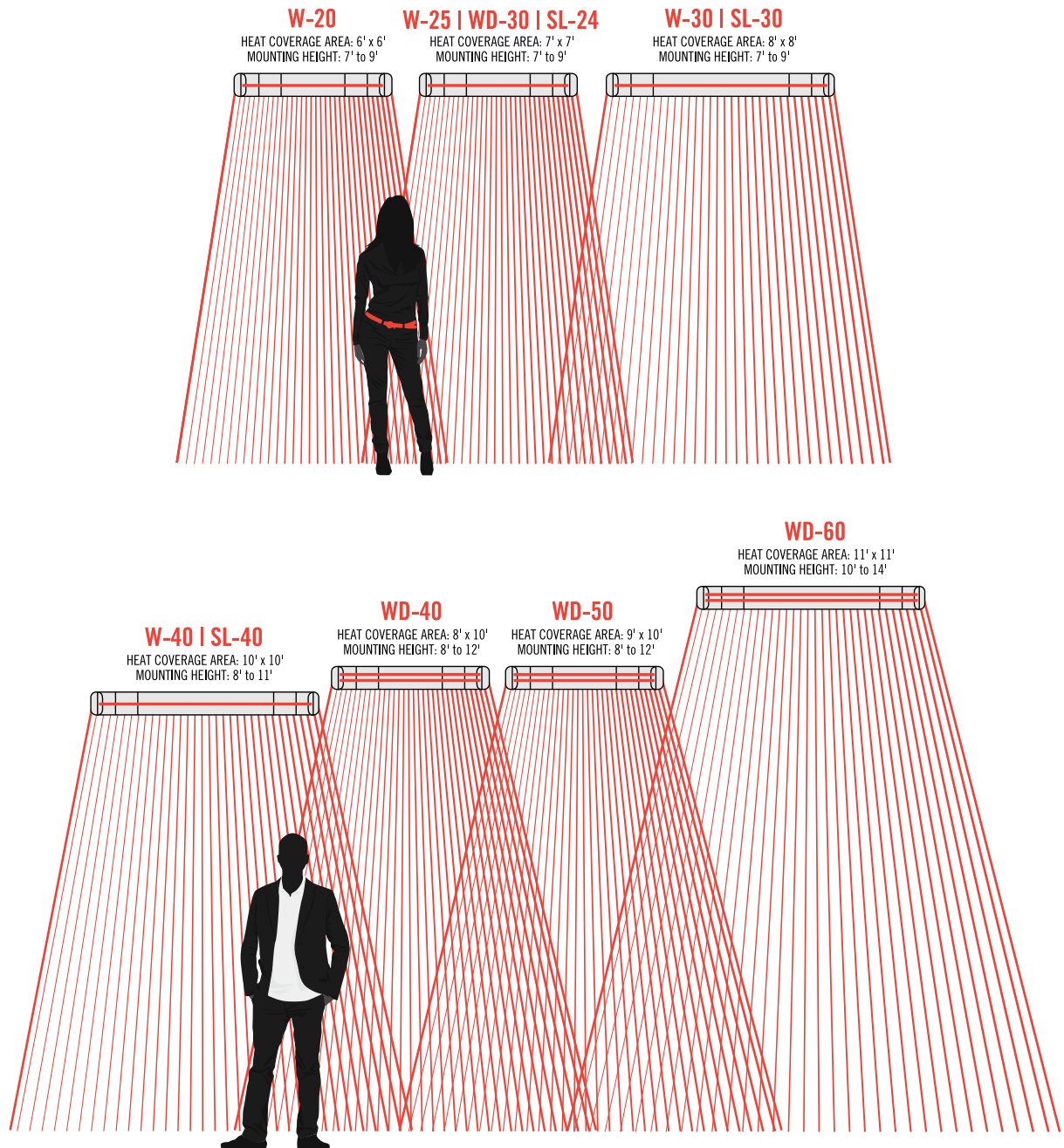
STEP 1: Measure The Area

Determine the approximate measurements and mounting heights of the area you want to heat (include length, width, and height).



STEP 2: Select The Heaters

Select the heater(s) that will work both functionally and aesthetically for your space. Consider factors such as size, number of heaters, colors, and mounting options.



NOTE: Indoor or well-protected environments will generally exceed average coverage. Heaters may provide less than average coverage in extremely cold or windy conditions.

STEP 3: Choose The Controls

Choose the control option that works best for your desired control capabilities or budget. Options include value control installations or infinite adjustment with solid-state controls.

Solid State Relay Control Package



Solid State Relay Panel



Zone Analog Controller w/Digital Timer

Value Controls



Simple On/Off Switch

INF Regulator

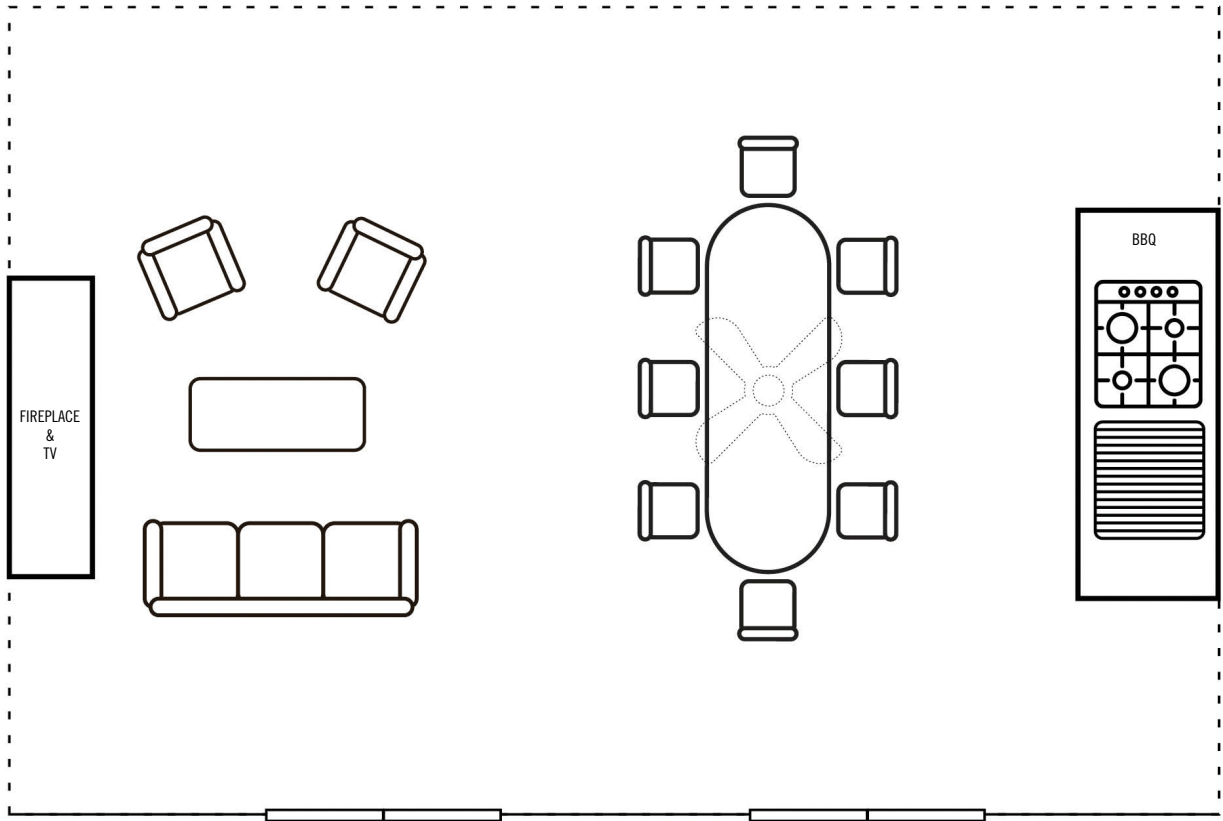
Duplex/Stack Switch

Home Management Relay Panel



Example of Heater and Control Layout

20' x 30' room with 10' ceilings (WITH CEILING FAN OVER DINING AREA)



■ Which heater(s)? _____

• Quantity: _____

• Mounting Options _____

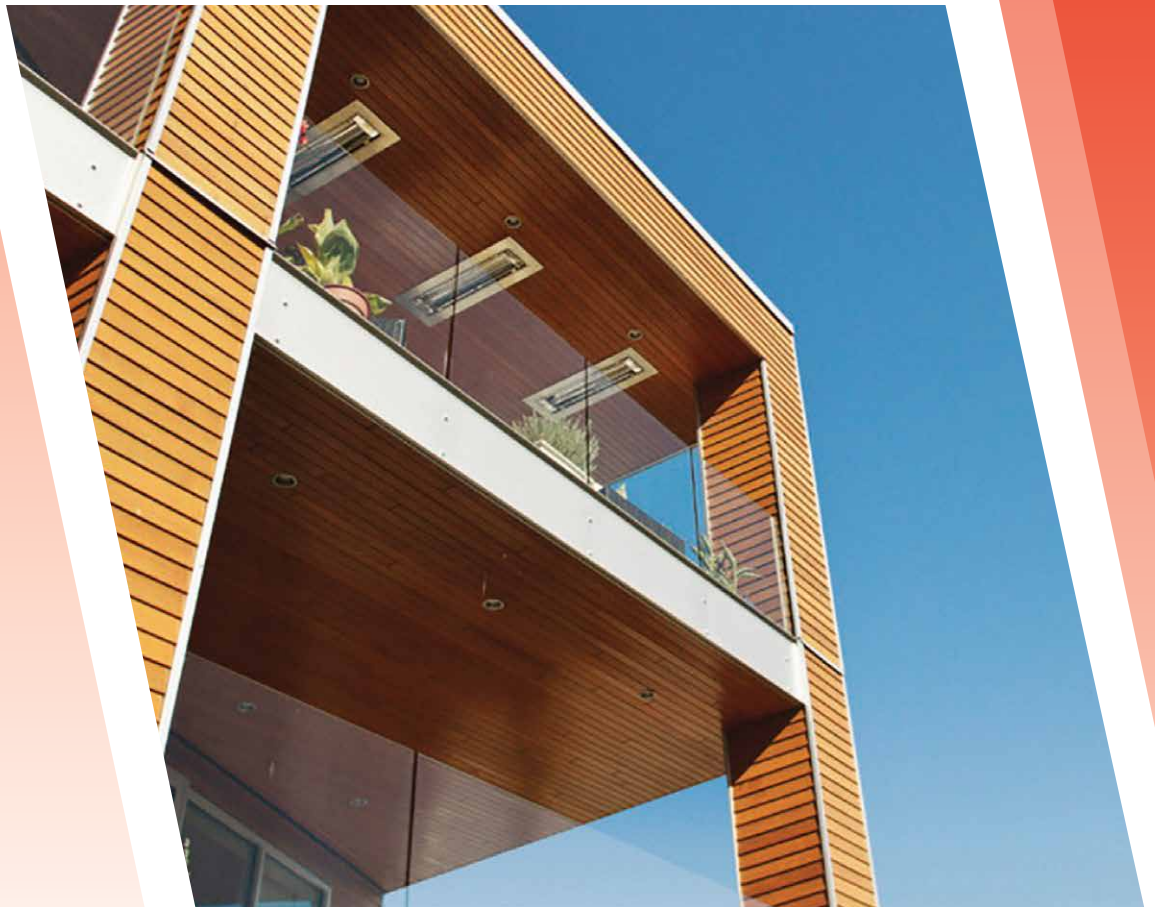
■ Total amps required _____

■ Controls? _____

■ Color? _____

■ If Solid State, how would you set up the zones?

Frequently Asked Questions



Frequently Asked Questions

Why choose an electric heater, rather than a gas heater?

Simply put, electric heaters look better, are more efficient and are easier to operate and maintain. Electric heaters are over 90% efficient and are perfectly safe for use indoors or outdoors. They are also economical to operate and require little maintenance beyond periodic cleaning. Unlike gas heaters, there are no valves, ignition components, moving parts or burners to maintain or repair. In addition, electric heaters produce no sound, odors or toxic emissions.

Electric heaters also offer added mounting and installation options. They may be flush mounted into a standard 8' ceiling using our flush mount frame. When surface mounted, they hang less than 9-1/2' from the ceiling. The most commonly used overhead gas heater requires a minimum ceiling height of almost 10' and, when mounted properly, will hang almost 24' below it.

An electric heater is also easier to use. Enjoying electric comfort heat is as easy as flipping a switch. You can adjust the intensity of an electric heater infinitely from zero to 100% of power. By contrast, gas heaters only produce infrared energy on their highest possible settings.

How can I estimate my cost of operation?

Electric heaters are economical to operate. It is easy to estimate your operating cost by multiplying the total kilowatts by your local power rate for a "kilowatt hour" (kwh). Standard power rates vary from market to market. Your rate should appear on any monthly utility statement. For example, a typical 3,000 watt (3 KW) heater, at full power, would cost 39¢ per hour based on a utility rate of 13¢ per kwh. Also keep in mind that your electric heater has a lower acquisition cost than a standard gas heater.

How do I determine how many heaters I will need?

Please visit the "Getting Started" page for simple steps to help you select the right heaters and control options for your space. For professional assistance, you may be required to submit some basic information about your area to be heated. We are happy to help you design a system that will satisfy your needs and your budget.

How small of a heater can I use?

Always choose a heater size with the appropriate heat output for the mounting height and area to cover. By selecting a smaller unit, you may require more heaters to get the same amount of heat output. If you are choosing a dual element unit for aesthetic purposes, you will be concentrating more heat into a tighter space. Again, this may mean that you will possibly require more fixtures to provide total coverage of your area. Patio heating is often a compromise between functionality and finding the desired look.

How much heat should I expect?

At their Food Services Testing Center, Pacific Gas & Electric has determined that a good patio heat installation (gas or electric) will provide between 3-7° of perceived heat at 60° F ambient conditions. Test results determined that more than 7° is too warm to sit in for extended periods. Colder or draftier areas may require more heat; protected or warmer areas may require less. Every installation will vary, along with our customers' expectations.

Does an electric heater cost more than a gas unit to operate?

Operating costs vary by region. Nationwide, electric heaters are less expensive than propane, and are competitive with natural gas. Depending upon the total hours of usage, electric heaters normally have a much lower cost of ownership when factoring in purchase price and maintenance needs. Basically, this means that while it can cost more per hour to operate an electric unit in some areas, it typically takes 7-10 years to save enough money operating on gas to recover the substantially higher purchase price-not to mention cost of regular maintenance for a gas heater.

Frequently Asked Questions

Electrical

Can I run my heaters on only 120 volts of power?

Using a 110/120-volt heater (1,500 watts maximum) is fine for enclosed areas like garages, indoor work areas or outdoor spaces no larger than 5' x 5'. When heating larger areas, running a dedicated 110/120-volt circuit is not practical or economical. A 240-volt circuit will require the same amount of wiring, will heat substantially larger areas with greater comfort, and will simply require two spaces in the breaker panel, rather than one.

What's the difference between 208-volt and 240-volt power?

Many new homes and businesses are supplied with 208-volt power, as opposed to the more familiar 240-volt option. It is very important to determine your power voltage before ordering and installing a heater. A 240-volt heater on 208 volts of power will only produce about 60% of the desired infrared energy. Contact the marketing department of your local utility or consult a licensed electrician to determine the actual voltage at your property location. Infratech heaters are available in single and dual element 120, 208, 240, 277 and 480-volt models.

What are your safety certificates?

All Infratech W-Series heaters are Underwriters Laboratories (UL) and Canadian Underwriters Laboratories (cUL) Listed under File E 29825. We are NZ/Australia and CE Listed under Wakefield Laboratories File NSW 21732. All Infratech fixtures are also certified IP X4 rated.

Product

Should I purchase Infratech solid-state controls?

Infratech solid-state controls give you the most efficient and versatile form of control for your heaters. While other lower cost controls are available, if your space calls for larger heaters or multiple heaters, solid-state controls quickly become your best choice for a quality installation. Contact us and let our qualified staff help you configure the best heaters and controls for your project.

How long can I expect an Infratech quartz element to last?

Infratech elements are rated for 5,000 hours of continuous use. In many installations you may enjoy your heater for years before a replacement would be needed. Always refer to the W-Series manual for specific instructions, and be sure to disconnect the power to your heater before attempting to change an element.

Are quartz elements better than "short wave" halogen elements?

If you are concerned about ambience, the appearance of your décor and creating a more relaxing environment, Infratech infrared quartz elements are always the best choice. Infratech quartz elements provide comfortable medium wave heat. Competitive products with short wave halogen elements produce more intense heat while emitting very bright and harsh-colored light. By contrast, Infratech medium wave elements effectively heat your space, while providing a soft, warm glow that is practically unnoticeable.

Frequently Asked Questions

Smart Home Installation

Can I operate Infratech heaters from home lighting controls or home management systems?

Yes. There are two ways to integrate our solid-state controls into your home management system. One permits on/off and timer functionality only, by switching the 120-volt power to the analog remote. The second way allows for full integration with our controls designed to accept a 0-10-volt DC signal from the home management system, to vary the intensity of the heaters. Contact us for a complete consultation.

Slimline

Can I recess a SL series heater?

No. The SL series heater housing operates at a significantly higher temperature than the W series fixtures due to the narrow profile and tight clearances to the heating element. The SL housing would exceed safe operating temperatures for wiring with restricted air circulation.

Can the SL series heater be painted or powder coated?

No. The SL series heater housing is anodized aluminum. It is available in a silver, stainless colored finish or a dark bronze, almost black anodized finish. Paint or powder coating interferes with the T slot, and reduces heat dissipation. This layer of paint "insulation" increases the operating temperature of the housing beyond acceptable limits.

Why has my Slimline reflector distorted or warped?

There are two possible reasons. First and most common would be because the safety grill is not properly installed in the channel, between the reflector returns, and under the stainless trim ring. The grill needs to be in the channel to hold the reflector properly placed.

The reflector is designed to expand and contract as the housing heats and cools at a different rate. The reflector has slotted holes on each end. If the screws securing the end are over tightened (tight to the bottom) the reflector can deform with the grill in place. During assembly the end screws are backed out, from ½ to 1 full turn to allow room for expansion. This is important to know should you need to replace a reflector for damage or maintenance.

Will the SL series heater generate the same heat as a comparably rated W series heater?

Yes, they will have the same heat output. A watt = watt. The difference is in the styling, and construction, but with the narrower design of the SL units, the heat pattern is slightly more concentrated towards the center.

Do I need to use the supplied mounting brackets?

No. The installer can use any desired bracket that meets the minimum clearance requirements. You can use a ¼" hex bolt head in the T slot if attaching to structural tubing.