

HEAT TREAT STEELS



HEAT TREAT



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COMPANY OVERVIEW



Steeltech LLC has been a world-class producer of superior heat- and corrosion-resistant products for international and domestic markets since 1929. We achieve maximum customer satisfaction by taking the extra step to develop revolutionary products to help you improve your bottom line. We want to satisfy our customers' needs and exceed their expectations with products and services of superior quality, unmatched performance, and extraordinary value.

Not only do our products have an increased service life, we also supply products that are more energy efficient. We understand the importance of conserving our natural resources, which is why we have developed products such as Alternative Energy Saving Radiant Tube Assemblies, Lightweight Fixtures, Lightweight Baskets, and Advanced Alloys™. All of these products have been proven to reduce energy consumption and improve your bottom line.

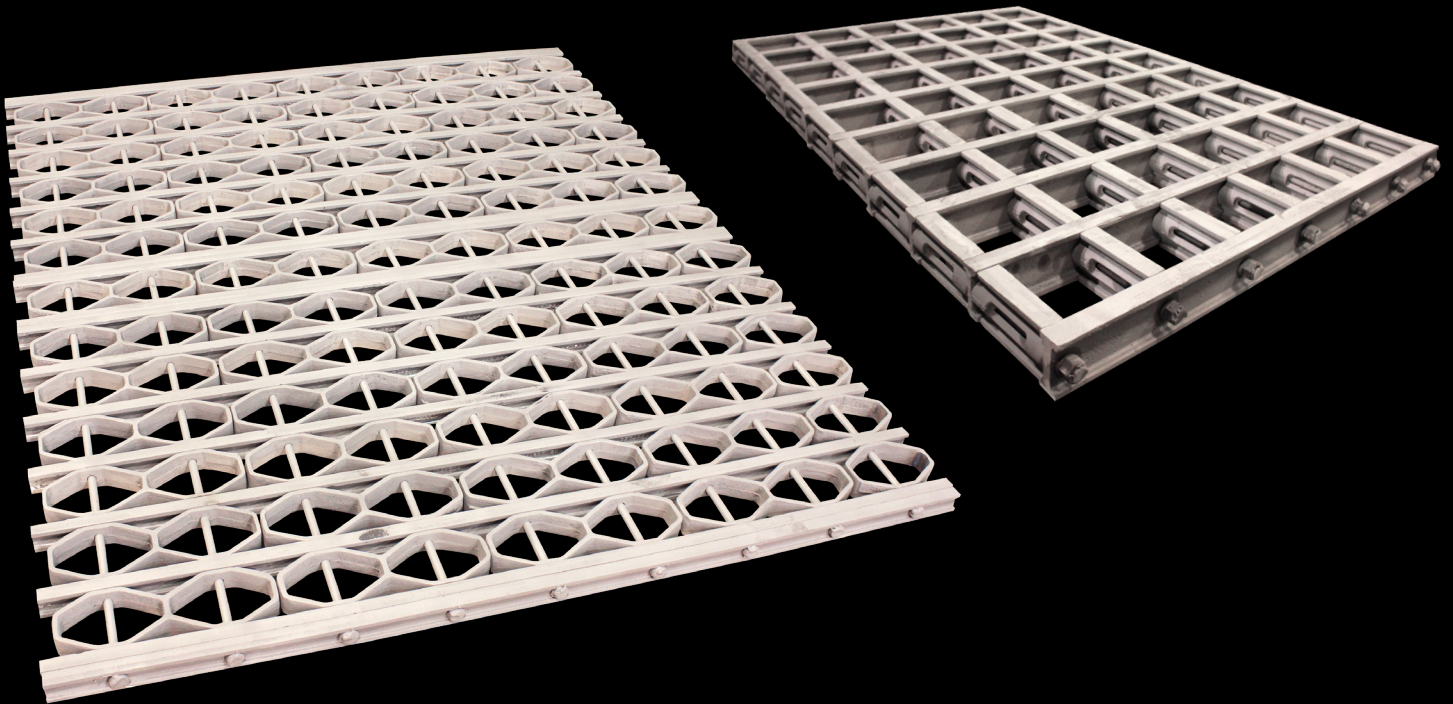
With a well-trained staff, we guarantee you will receive service beyond your expectations. At Steeltech, we strongly believe in building a partnership with our customers that is fun, friendly, and professional. These qualities have earned us the reputation of a hassle-free supplier.

CAST-FAB GRIDS

Benefits of Steeltech's Cast-Fab Grids:

- Inherent strength of cast structure
- Composed of individual component parts
- Replace only failed components
- Choose different alloys
- Perfect for severe applications such as water quenching
- Maximize efficiency with stackable designs

The inherent strength of our interlocking cast components increases service life. Steeltech's line of Cast-Fab Grids maintain their flatness longer. Fewer replacements equals lower cost.



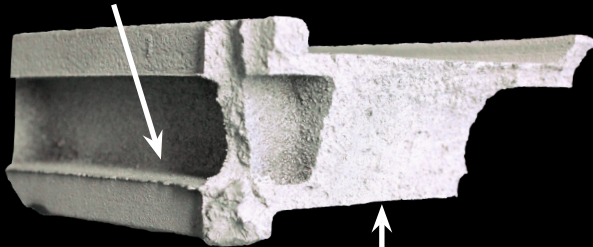
ADVANCED TECH TRAYS

With advanced casting software and production techniques, we have developed a tray that is superior to the competition in the following ways:

- Chemistry consistency
- State-of-the-art parametric and solidification software
- Advanced gating and risering technology
- Exceeding automotive standards for controlled shrink

ADVANCED TECH TRAY

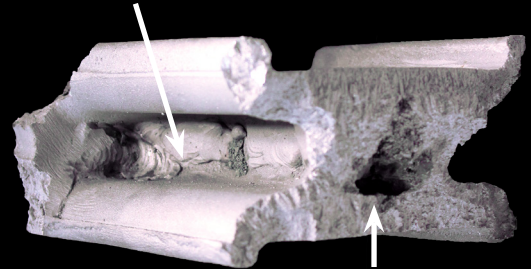
Minimal Weld Repair



Minimal Cast Defects

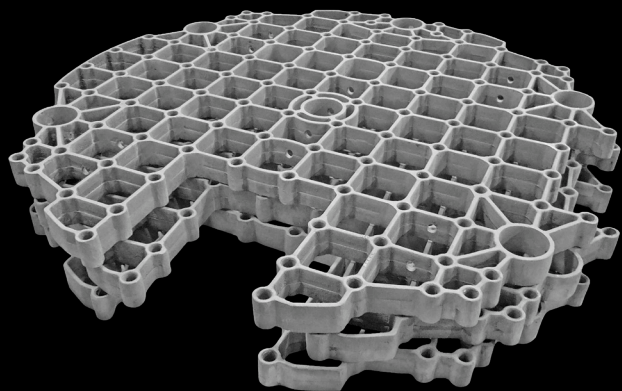
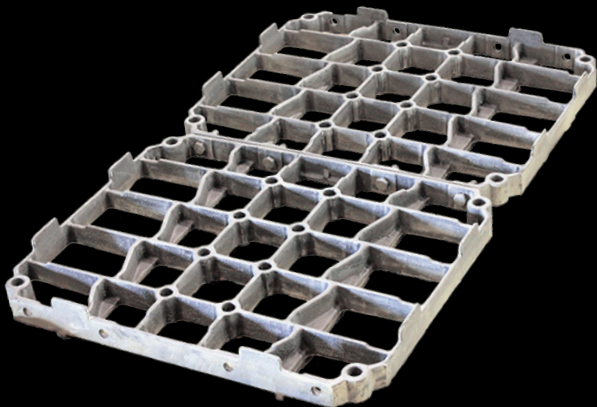
ACTUAL COMPETITOR'S TRAY

Excessive Weld Repair



Casting Defects

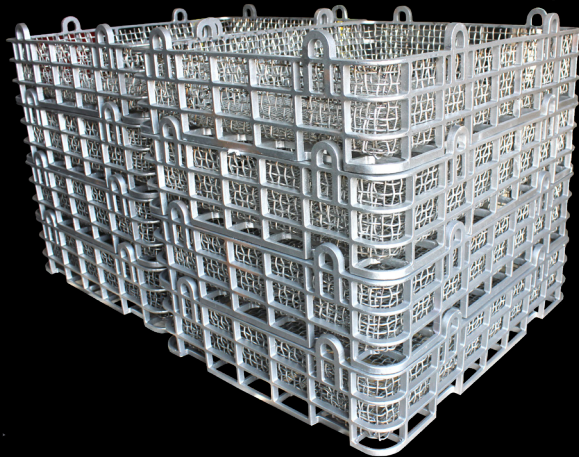
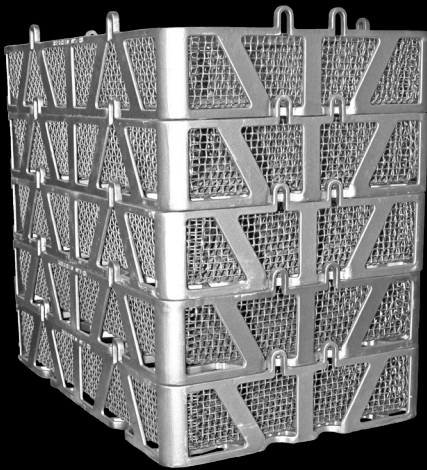
Steeltech LLC produces an assortment of trays and grids in various sizes and styles. With a wide range of customized configurations available, Steeltech can supply a high-quality tray or grid to meet your requirements.



CAST-LITE BASKETS

Cast-Lite baskets are the smart alternative to rod frame baskets. The one-piece design of our baskets provides the following advantages:

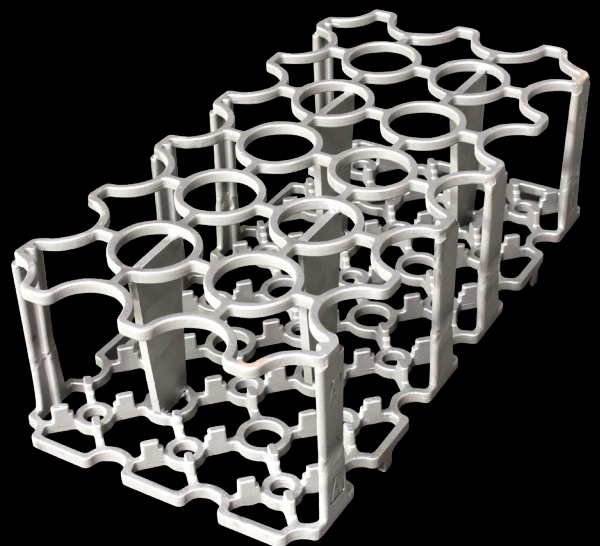
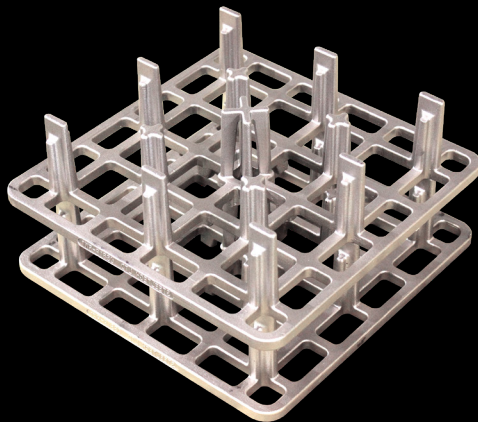
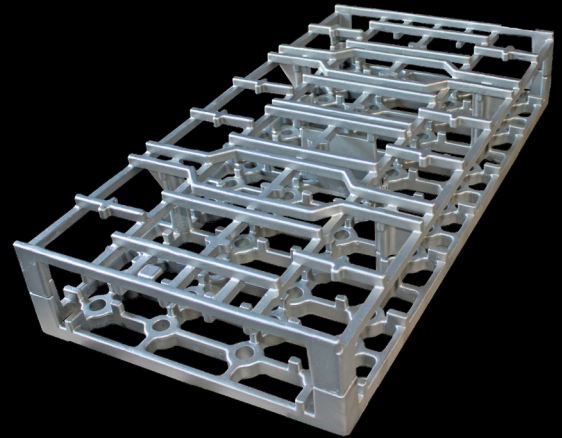
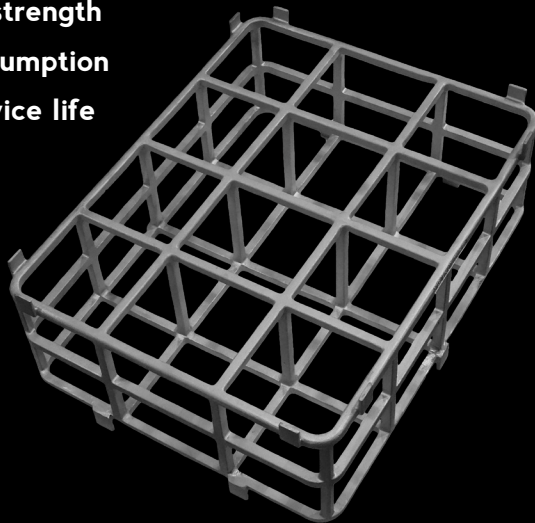
- Superior structural strength = Longer service life, fewer replacements
- Less material = Less weight = Reduced energy consumption
- Save time wasted on reshaping rod frame baskets



LIGHTWEIGHT FIXTURES

Looking for more ways to boost your efficiency and increase throughput? Look no further than Steeltech's line of lightweight fixtures. With our technology and engineering expertise, Steeltech can redesign existing fixtures or create new designs to better meet your needs. Lightweight fixturing will:

- Increase load capacity
- Maintain structural strength
- Reduce energy consumption
- Increase fixture service life

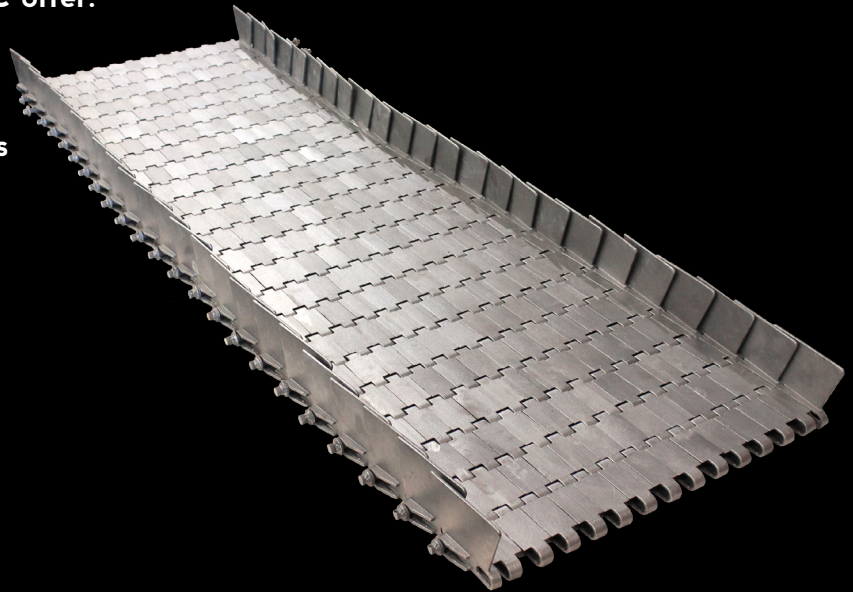
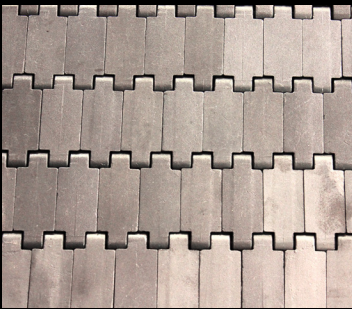


CAST LINK BELTS

Steeltech's geometrically correct cast link belts extend service life and reduce binding and twisting.

Cast link belt options from Steeltech LLC offer:

- A vast range of belt assemblies
- Multiple pitch sizes
- A variety of pin diameters and materials
- Standard and trunnion-type assemblies



SUPPORT ROLLS

Steeltech LLC carries a large variety of rolls to fit nearly every application.



CAST BASKETS

Steeltech also offers an extensive variety of cast baskets designed for the heat treat industry. With custom engineering available, we can always find a solution to meet your needs. In order to maximize throughput, Steeltech offers both a standard, and heavy duty design.

Available accessories:

- Clips
- Hangers
- Horizontal load bars
- Mesh liners
- Base trays



ALL FURNACE REPLACEMENT PARTS ARE AVAILABLE IN STANDARD AND ADVANCED ALLOYS™

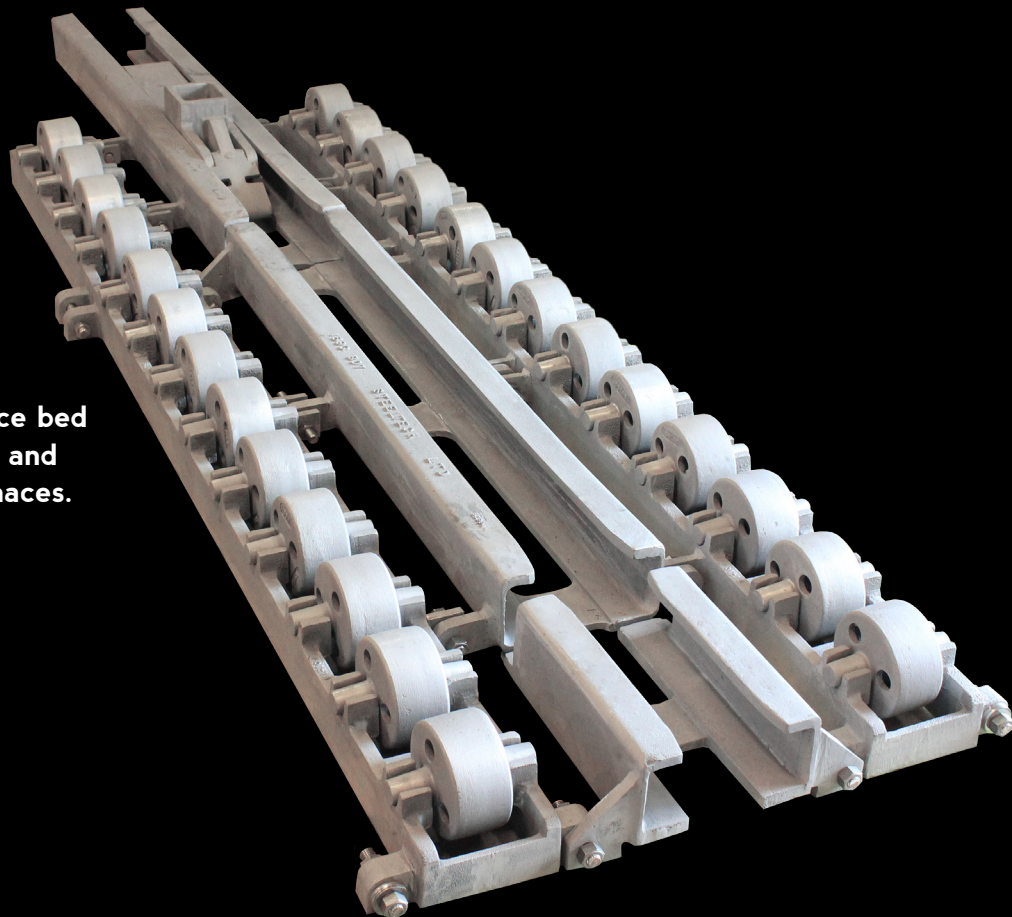
ADVANCED ALLOYS

Steeltech's Advanced Alloys are an improved generation of alloys designed specifically for the heat-treating industry. Advanced Alloys outperform traditional heat-resistant alloys in the following operations:

- Normalizing
- Annealing
- Carburizing atmospheres
- Nitriding atmospheres
- Carbo-nitriding atmospheres

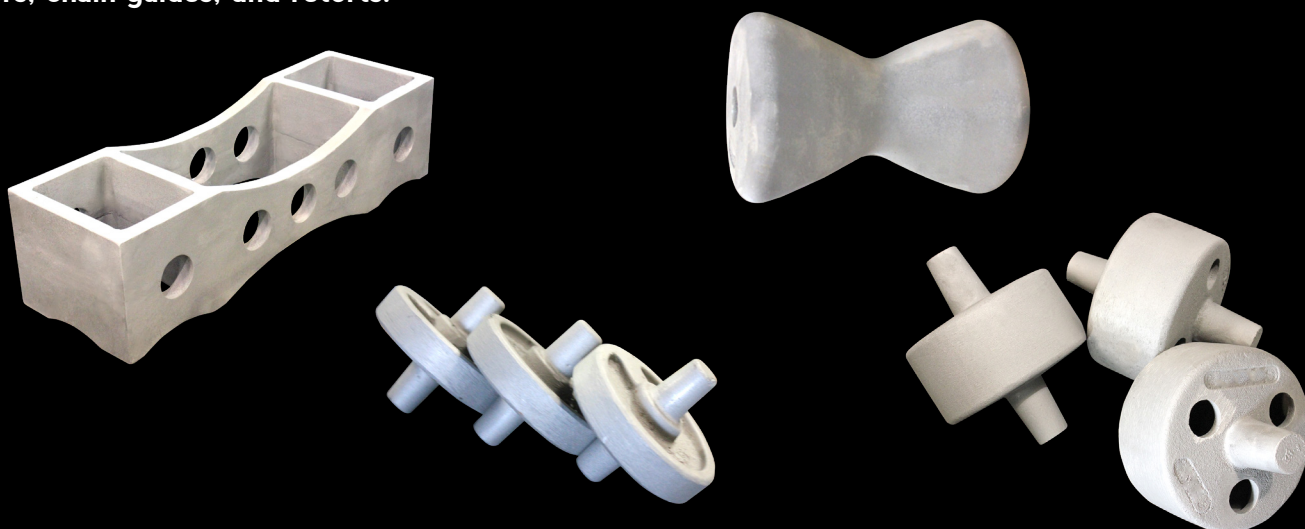
FURNACE BED ASSEMBLIES

Steeltech LLC offers complete furnace bed assemblies made for easy installation and compatibility with all major OEM furnaces.

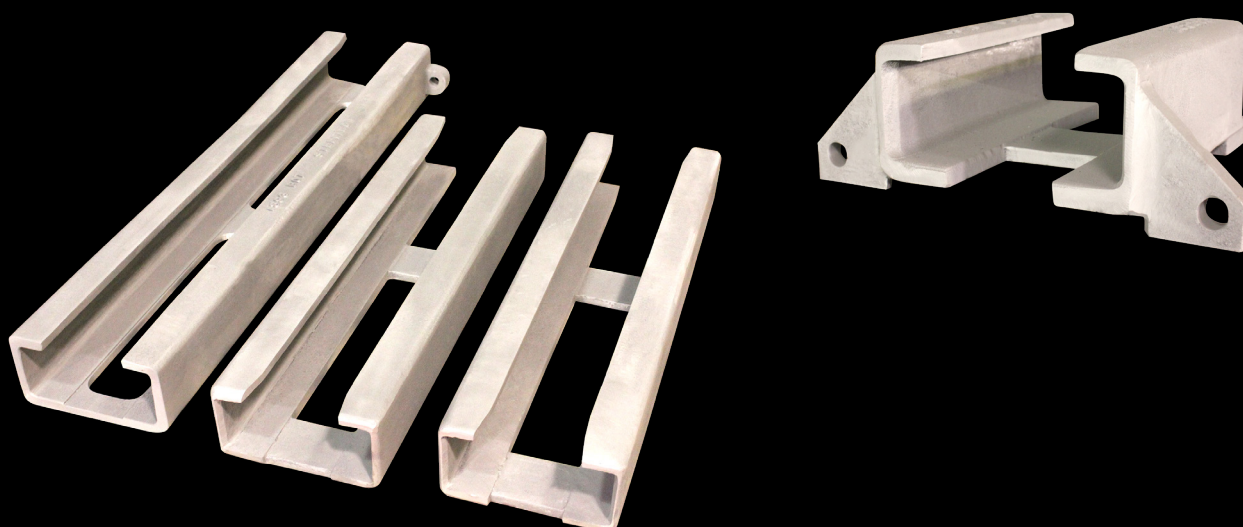


ROLLER RAILS, ROLLERS, & PIERS

Steeltech LLC is a world-class producer of furnace replacement parts. We stock a large selection of roller rails, rollers, chain guides, and retorts.



CHAIN GUIDES



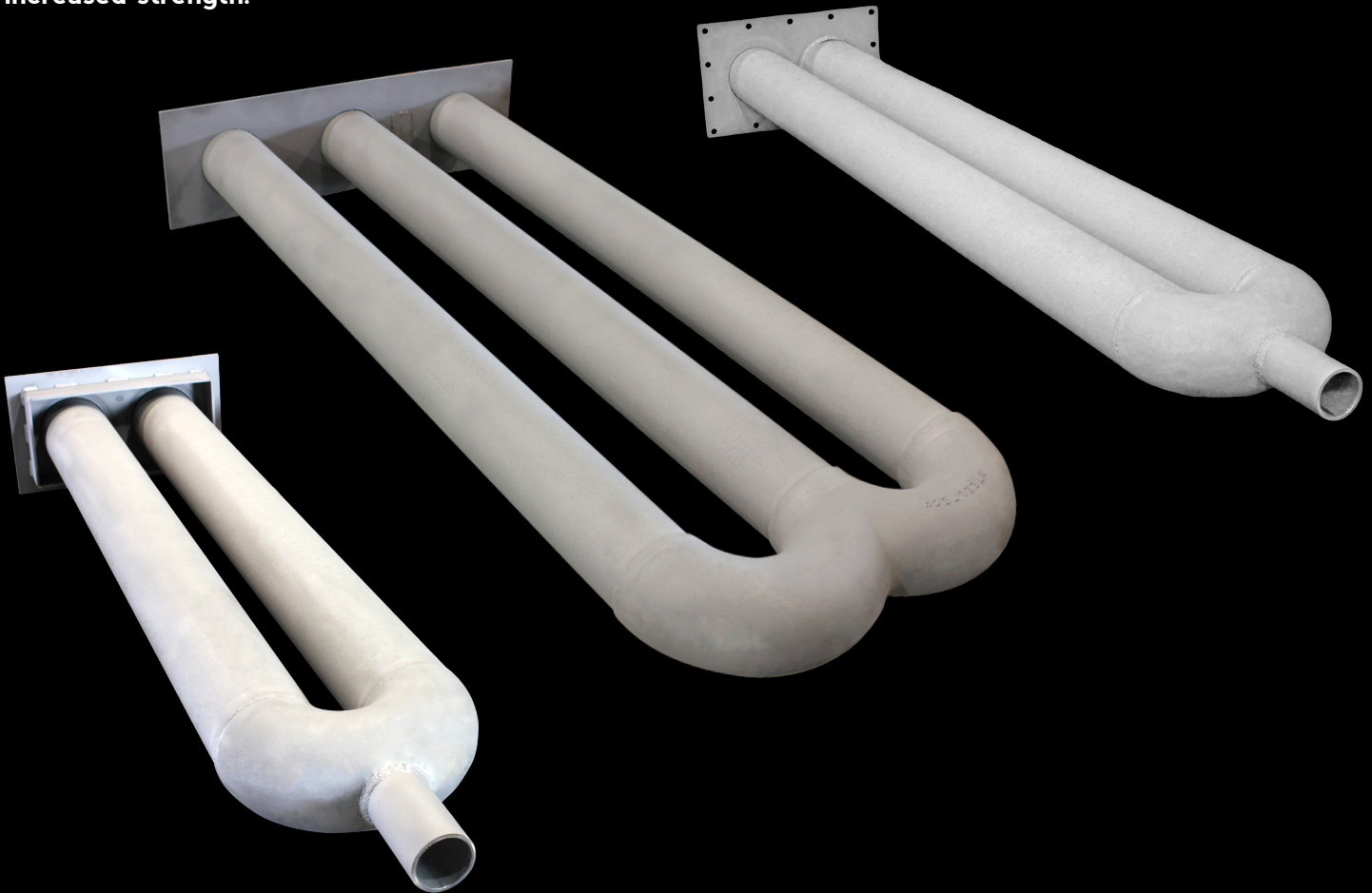
ALTERNATIVE ENERGY SAVING (AES) TUBES

HOW LONG DO YOUR RADIANT TUBES LAST?

AES radiant tubes include:

- 5 year life guarantee*
- Up to 20% fuel savings

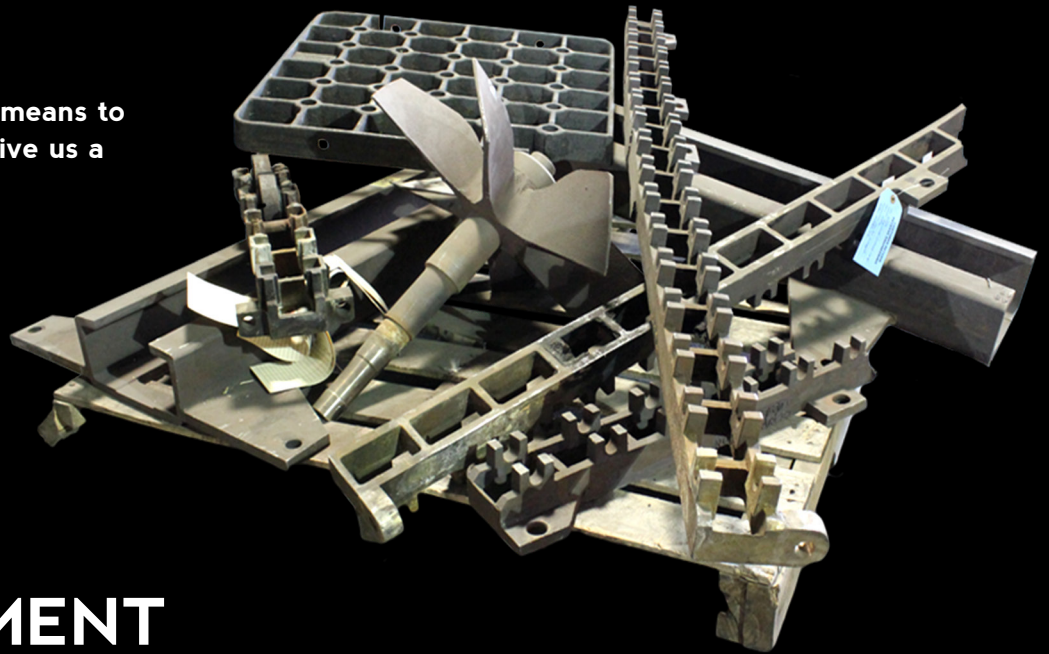
Steeltech offers rapid delivery on custom-manufactured radiant tubes and retorts in various alloys. All tube assemblies are composed of centrifugally cast tubes to ensure uniformity and increased strength.



*Some restrictions apply

RECYCLING & EXCHANGE

We happily accept scrap as a means to help you control your costs. Give us a call and we'll do the rest.



REFURBISHMENT

Steeltech offers refurbishment as one of our many services. Our customers have the option to send in parts in need of repair so we can replace just the necessary components to get you up and running again. Contact Steeltech today if you have components that may be salvageable through our refurbishment program.



DON'T JUST TAKE OUR WORD FOR IT.

SEE WHAT CUSTOMERS HAVE TO SAY ABOUT STEELTECH LLC.

"In the many years of working with Steeltech, we have recieved exceptional products and outstanding customer service...we know we can rely on Steeltech to keep us up and running."

Mike Galligan, Fox Valley Heat Treat

"Our mission here at Braddock is to help our customers succeed. And I believe Steeltech's mission is to help us succeed. Steeltech has improved our bottom line, imagine what they will do to yours."

Al Verpault, Braddock Metallurgical

"The AES radiant tubes we purchased from Steeltech have already exceeded twice the life of tubes we purchased in the past. The AES tubes currently show no distortion as compared to standard HT alloy tubes. More importantly we have seen in excess of a 20% reduction in natural gas consumption. In the future we will replace our tubes with Steeltech's AES energy efficient tubes due to both the extended life and fuel savings."

Brian Hunter, Hansen Balk Steel Treating

SUMMARY OF PROPERTIES

Heat Resistant Type	Chemical Composition - Percent									
	C	Mn	Si	P	S	Mo	N	Cr	Ni	Fe
HA	0.20 max	0.35-0.65	1.00 max	0.04 max	0.04 max	0.90-1.20	–	8-10	–	balance
HC	0.50 max	1.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	26-30	4	balance
HD	0.50 max	1.50 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	26-30	4-7	balance
HE	0.20-0.50	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	26-30	8-11	balance
HF	0.20-0.40	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	19-23	9-12	balance
HH	0.20-0.50	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	0.2 max	24-28	11-14	balance
HI	0.20-0.50	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	26-30	14-18	balance
HK	0.20-0.60	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	24-28	18-22	balance
HL	0.20-0.60	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	28-32	18-22	balance
HN	0.20-0.50	2.00 max	2.00 max	0.04 max	0.04 max	0.5 ^a max	–	19-23	23-27	balance
HT	0.35-0.75	2.00 max	2.50 max	0.04 max	0.04 max	0.5 ^a max	–	13-17	33-37	balance
HU	0.35-0.75	2.00 max	2.50 max	0.04 max	0.04 max	0.5 ^a max	–	17-21	37-41	balance
HW	0.35-0.75	2.00 max	2.50 max	0.04 max	0.04 max	0.5 ^a max	–	10-14	58-62	balance
HX	0.35-0.75	2.00 max	2.50 max	0.04 max	0.04 max	0.5 ^a max	–	15-19	64-68	balance

^a Molybdenum not intentionally added.

WE ARE PROUD TO BE ACTIVE IN THESE ORGANIZATIONS:



At Steeltech, we put great emphasis on personal contact with our customers. For this reason, you will find we have no voicemail or automated phone system. To take customer service to the next level, we offer our 24-hour, seven-days-a-week, telephone number where you can talk to a human being any time of the day or night. Simply dial 616.243.7920 to contact our highly trained customer service team today.



STEELTECH

Improve your bottom line.TM

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