

RECYCLING/SHREDDING

CLIFTON
STEEL

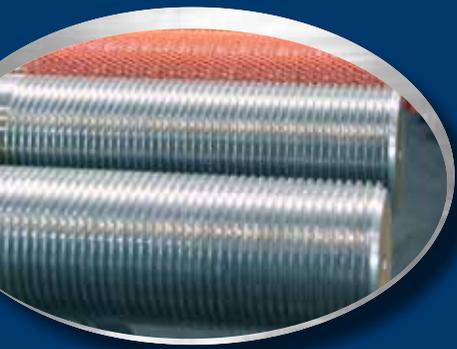
WEAR & IMPACT STEEL

FABRICATION SPECIALISTS



**PRODUCING DEPENDABLE RECYCLING/SHREDDING PRODUCTS
FOR MORE THAN 40 YEARS**

RECYCLING/SHREDDING



TOUGH. RELIABLE. INNOVATIVE.

Clifton Steel provides a complete spectrum of heat-treated, impact resistant, high-strength steel products necessary for excelling in today's recycling and shredding market. We stand behind our quality products, manufactured to meet and exceed the highest standards in the industry. For more than 40 years, we have produced dependable wear products, while working side-by-side with our customers. Count on Clifton Steel to deliver the best solutions to your wear challenges, with excellent results.

NEVER SACRIFICE QUALITY.

Through our finest quality materials and fabrication techniques, we help companies reduce lost time due to worn or inferior parts that fail during peak production. Clifton Steel's hammer pins are the highest quality on the market today, delivering longer service life with lowest cost-per-ton. Made of special high alloy steel, they are heat treated with a proprietary process that gives uniform penetration from surface to core — double that of other pins. Clifton Steel's quality processes are used throughout our shredding and recycling wear products and provide maximum strength to resist flexing and impact shock that causes premature wear. Clifton Steel assures that all of our products will deliver long-lasting service and satisfaction.

WE PROVIDE SOLUTIONS.

Clifton Steel has an in-house engineering team that will work in tandem with your company to help solve your toughest recycle challenges — giving your parts longer life, saving valuable time and money. Our team will design custom parts for your company, provide common wear items such as manganese separator drums, side liners, and hammer pins, or simply provide a better abrasion-resistant plate product that is available and ready to ship. Call us today for your wear part needs!

APPLICATIONS

Hammer Pins	Solid Cutter Bars
Tie Bolts	Grizzly Bars
Manganese Separator Drums	Ripper Bars
Manganese Tooth Rolls	Feeder Through Liners
Manganese Flat Bar & Squares	Side Liners
Abrasion-resistant Flat Bar and Squares	Chute Liners
Front Grate Supports	Bin Liners
Roof Grate Supports	Hopper Liners
Grate Supports	Crusher Main Frame Liners
Top Center Covers	Crusher Liners
Nose Assemblies	Roof Plates
Intake Breaker Bars	Screen Decks
Outer Top Breaker Bars	Punch Plates
	Rotary Breaker Grates



MATERIALS

All of Clifton Steel's abrasion and impact plate products are fabricated to exact specifications for consistent, controlled quality. Our dependable product line delivers superior weldability, formability, and toughness in combination with superior flatness and a clean surface, making Clifton Steel quality and performance the industry benchmark.

ECONALLOY 250

Econalloy 250 is a low-cost, abrasion-resistant steel plate that offers outstanding wear and impact resistance at an economical price.
Hardness: 200 – 280 BHN

TENSALLOY 400

Tensalloy 400 is the everyday plate for applications that call for a long-lasting wear and impact resistant material.
Hardness: 360 – 440 BHN

TENSALLOY 450

Tensalloy 450 provides additional hardness and strength at a modest cost increase over standard Tensalloy 400.
Hardness: 420 – 477 BHN

TENSALLOY BLUE 500

Tensalloy Blue 500 is a premium wear and impact plate that provides the highest level of protection against wear and impact.
Hardness: 477- 550 BHN

TENSALLOY EXTRA

Clifton Steel's Tensalloy Extra (also referred to as HY 80 and HY 100) is a high alloy abrasion and impact resistant steel plate that offers corrosion resistance and heat resistance.

Tensalloy Extra contains high levels of chrome and nickel which allow it to resist corrosion. This chemistry also provides greater resistance to heat. When other AR plates become soft at 400 degrees Fahrenheit, Clifton Steel's Tensalloy Extra remains stable at atmospheric temperatures up to 1,000 degrees Fahrenheit.

TENSALLOY AND TENSALLOY BLUE ALLOY BARS

Tensalloy and Tensalloy Blue are quenched and tempered bars with the right alloy content to deliver dependable performance in the most demanding conditions. Clifton provides alloy round bars as hot rolled and as turned, ground, and polished. Clifton's bars meet the tough demands of the mining industry for linkage and bucket pins.

CLIF-CLAD® CHROMIUM CARBIDE OVERLAY PLATE

Clif-Clad® is a bimetallic plate consisting of a mild steel base plate overlaid with a high chrome/high carbon composite. This composite contains 30% chrome and 5% carbon that form the chromium carbide particles that make the surface extremely hard and resistant to wear. The overlay layer has a metallurgical bond with the base plate and will not separate. Clif-Clad® is impact resistant, will not corrode and is resistant to high heat.
Hardness to 600 BHN

TENSAMANG – 11-14% HADFIELD GRADE MANGANESE STEEL

Clifton Steel's 11-14% Hadfield Grade manganese steel is a special work hardening grade designed to become increasingly harder with impact. Tensamang will work harden to 550 BHN, making it ideal for high impact applications.

SERVICES

WELDING

Our expansive capabilities encompass an entire range of manual and automated welding technologies, including TIG and MIG for manganese and other steel alloys. At Clifton Steel, pre-heating, full-edge preparation and post-weld stress relieving are standard processes—not expensive options.

DRILLING

Clifton Steel drills and countersinks holes from 1/4 inch to 5 inches in diameter ... even through 15 inch thick plate. Using leading-edge technology, we deliver fast, efficient, and exact drilling finishes, even in hard-to-machine, wear-resistant materials.

MILLING

Put Clifton Steel milling capacity to the test. We manage it all: Mill slots, thread holes, bevel, and chamfer—even in tough, wear-resistant materials.

FORMING

At Clifton Steel, precision work is our specialty: Our experienced team forms our full line of abrasion and impact-resistant materials to meet exact customer specifications.

SAWING

Clifton Steel employs rugged band and hack saw capacity with cutting capacity up to 24 inches in diameter. Rotary carbide saw capability handles all manganese rounds up to 4 inches in diameter.

FLAME CUTTING

Our team at Clifton Steel flame-cuts plate to any desired length up to 15 inches in thickness and 120 inches in width. When necessary, we apply pre-heating and controlled post-cooling processes to assure clean cuts without stress cracking at the edges. When working with heavy plate, pre-heating and post-heating processing are standard procedure to ensure product integrity.

LASER AND WATER JET CUTTING

Clifton Steel offers high-tech laser and water jet cutting to meet the express needs of our customers. These processes deliver close tolerances with a clean-edge finish for optimum quality and performance.

**COMMITTED TO QUALITY, PRECISION AND PERFORMANCE,
CLIFTON STEEL OFFERS A FULL RANGE OF MATERIALS AND
LEADING-EDGE FABRICATION PROCESSES TO PRODUCE LONG-
LASTING, INNOVATIVE SOLUTIONS TO YOUR WEAR PROBLEMS.**

**CONTACT A CLIFTON STEEL
REPRESENTATIVE TODAY!**

1-800-745-3962

INFO@CLIFTONSTEEL.COM

Since 1971, Clifton Steel has operated as a full-service specialty steel distributor and manufacturer, specializing in abrasion-resistant, high-impact, high-strength steel fabrications. We serve our loyal customers in a host of industries, from aggregate and mining, to military and railroad, as well as a variety of other industrial applications. Clifton Steel delivers a level of seasoned experience, proven expertise and personal service that is unmatched.

PUT CLIFTON STEEL'S INNOVATION TO WORK FOR YOUR BUSINESS TODAY!

FABRICATION SPECIALISTS



WEAR & IMPACT STEELS

SOLVING WEAR PROBLEMS



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