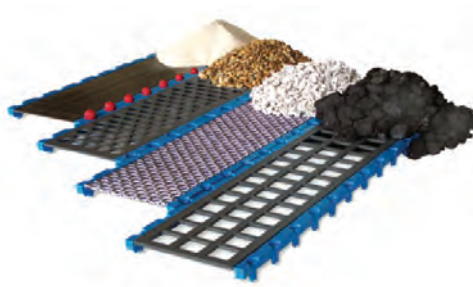




Mining , Aggregate, and Water Solutions



Mining • Minerals • Water • Oil & Gas • Rendering
Trenchless • Renewables • Utilities • Industrials



Founded in 1864 in Elgin, Illinois, Elgin has evolved into a worldwide leader in design, manufacture and service of specialized processing equipment in the Oil & Gas, Mining, Coal, Aggregates, Minerals, Rendering, Dredging, Water, and Pipeline Construction Industries. With vertically integrated manufacturing and design capabilities, Elgin brings to its customers a unique experience that focuses on holistic solutions. Instead of limiting our capabilities to an individual piece of equipment, Elgin specializes in the full integration of solids conveyance systems, sophisticated PLC-driven automation systems, and product life-cycle management repair and remanufacturing services. Elgin is driven to turn the basic capital equipment procurement process into a relationship that extends through the entire life of the products and systems supplied.

Who We Are

Today, Elgin is made of two specialized divisions; Elgin Separation Solutions and Elgin Power Solutions. The brand names represented within Elgin include CCS, Clinch River Manufacturing, CMI, Cook Legacy, CSI, Gilbert Electrical Systems, IPE, Kemtron Technologies, Mining Controls Incorporated, Norris Screen, and Tabor Machine; all widely recognized for their reliability, low maintenance and cost-effectiveness. Elgin Separation Solutions is made of two specialized teams, one that focuses on liquid removal, in which the liquid phase is considered the non-valued product and one that focuses on solids removal, in which the solids phase is considered the non-valued product. Both Elgin Separation Solutions teams manufacture a host of refined solid/liquid separation technologies that include vertical centrifuges, horizontal centrifuges, decanter centrifuges, cyclonic separators, shakers, and screens.



Tabor Machine



Norris Screen



Clinch River Corporation



Centrifugal Services Inc.



Centrifugal & Mechanical Industries



Coal Centrifuge Service



Industrial Process Equipment



Cook Legacy



Mining Controls LLC



Gilbert Electrical Systems



Kemtron Technologies Inc.



Vibrating Screens

Horizontal Screen

The linear motion horizontal screen is the mainstay of the many screens used in coal prep plants and lends itself toward sizing when the cut point is below 1½". It is also used in magnetite recovery and dewatering.



Reverse Incline Screen

Reverse incline screens are often used for dewatering and recovery of fines from effluent. With its high acceleration and upward slopes, this screen is suitable for applications where a dry, conveyable product is needed.



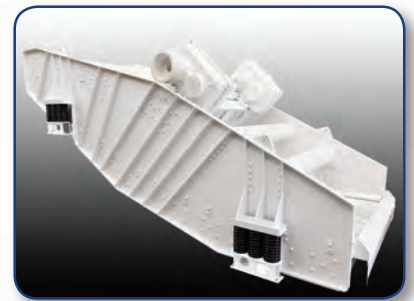
Incline Screen

Linear motion inclined screens are used primarily in the aggregate industry where production volume has increased but space limitations do not allow for larger screens.



Multi-Slope Screen

This screen is used in almost every coal industry application, particularly in raw coal/ deslime and drain/ rinse operations. It increases processed tonnage 30% to 40% over the same footprint of a conventional type screen.



Circular motion inclined screens typically lend themselves to scalping operations. The circular motion causes the material to roll down the deck. This helps reduce "plugging" of the near size material in the openings. Elliptical motion inclined screens operate in much the same way as the circular motion version. Depending on drive placement, this screen can speed up the travel rate on the feed end and slow it down on the discharge end.

The operating principle of the "banana" screen is based on maintaining a thin bed of material from the feed to discharge end. This allows immediate stratification of fines to the bottom of the bed and increases the probability of separation. The TMS Multi-Slope screen has standard 4' modular deck sections and replaceable deck wear liners.

Feeder

Elgin Feeders are custom designed to offer either a coarse separation or solid plates for conveyance. They are available in various sizes ranging from 4' x 8' wide and up to 30' long. We offer numerous types of liner and grizzly bar material options to suit the toughest applications.

Screen Type	Sizes	Deck Configuration	Surfaces
Horizontal	3'W x 8'L to 12'W x 24'L	Single & Double	Woven Wire
	4'W x 12'L to 8'W x 24' L	Triple	Profile
Incline	4'W x 12'L to 10'W x 24'L	Single & Double	Polyurethane
	4'W x 12'L to 8'W x 24'L	Triple	Rubber
Reverse Incline	3'W x 8'L to 8'W x 12'L	Single	Perforated Plate
Multi-Slope	6'W x 20'L to 14'W x 24'L	Single & Double	Custom Design

Profile Wire and Polyurethane Screens

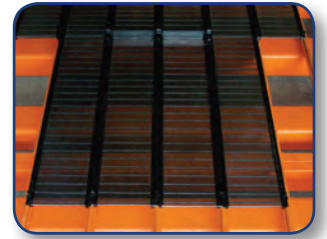
Tabor-Thane Polyurethane

Panels easily install in stringers. Locking pin is then hammered in to double lock panels in place. Dams attach using double locking pins in place of single pins. Optional Pin Strips can be used in place of single pins.



P3P System

P3P user-friendly design provides flexibility, simple installation and ease of maintenance. P3P is designed for maximum user flexibility. The support system can accommodate various screen configurations and hole openings. The P3P system can be installed on most other deck frame designs. Engineered for ease of installation and maintenance, P3P can be quickly installed or changed, reducing operational down time and lost production.



Modular Panels

Our patented polyurethane screen systems can be used on almost all OEM vibrating screen manufacturers for sizing, rinsing and dewatering your product. We also offer hybrid screen decking available in woven wire, perforated plate and profile wire to maximize your screen's efficiency.

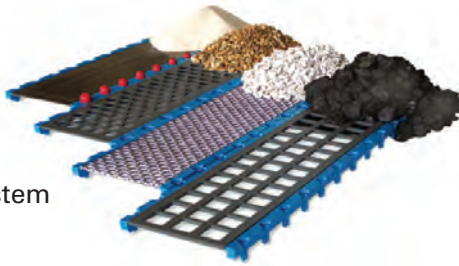


12" x 12" & 1' x 4' Panels

Construction

Features:

- 4 Pin and 6 Pin
- Plug Free Panels
- Square Holes, Slots
- Patented Locking System
- Openings from .25 mm to 3"
- Thickness: Up to 2"

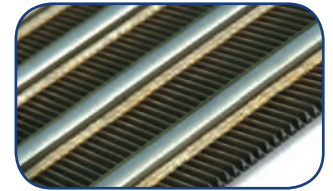


Profile Wire Screens

Unlike punch plate or woven wire, profile wire screens offer 2-point particle contact. The continual slots and inward widening openings allow for less plugging of near size particles.



To ensure the strongest weld possible, we use continuously controlled TIG welding to connect the profile wires to the support bars.

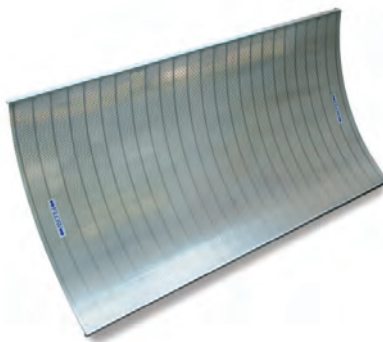


Profile Wire Sizes

NORRIS PROFILE WIRES		
	Angle 13 Degree Profiles	"W" (.030) (.060) (.090) (.120) "H" (.177) (.100) (.156) (.203)
	10 Degree Profiles	"W" (.070) (.105) (.186) "H" (.177) (.324) (.344)
	5 Degree Profiles	"W" (.090) (.120) (.155) (.186) "H" (.170) (.218) (.286) (.344)

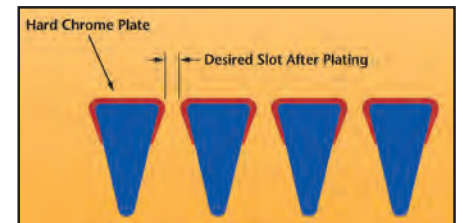
Curved Static Sieve

Curved Sieves efficiently remove debris from incoming flow. The screens utilize the coanda effect to improve efficiency, while using gravity and overflowing water to remain clean during storm events.



Hard Chrome Plating

For high wear problems, hard chrome plating can be added to increase your screen's wear life.



Mining and Aggregate Industry Products

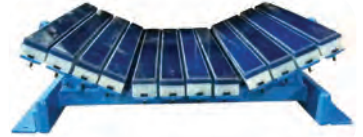
Belt Wiper

Elgin belt wipers are made of polyurethane offering advantages such as abrasive, tear and impact resistant. Belt wipers come in solid or segmented design that are easy to replace. Blades are water, oil and grease resistant.



Impact Bed

Impact beds are designed to provide maximum protection to the conveyor belt. Our impact beds are adjustable from 5° up to 35°. The bars are made of an impact resistance rubber, with 3/8" UHMW with metal insert. Bar inserts can be customized with steel or aluminum inserts.



Moon Slider

Moon sliders are available in any transition degree and are designed using a three bolt UHMW replacement system. Strong tubular construction provides for durability and strength. Moon sliders have no moving parts and will cause no moving violations. Ideal for smaller materials being conveyed with a lower density.



Chute Work

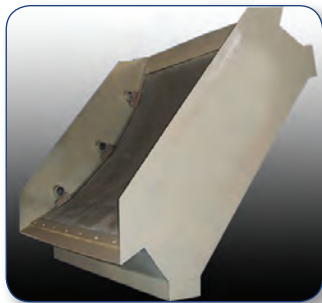
Elgin can design and manufacture chutes to fit your needs. Built using A36 steel or stainless steel and designed for durable long-life performance. Our pre-engineered chute lining protects and cushions the chute from the material being handled. Ceramic liners deliver ultimate performance where extreme heat and abrasion is a problem.



Liners Available: 550 Brinell, AR400, Tri-Braze, Stainless Steel, Tivar 88 (1/4" up to 1" thickness)

Sieve Bend

Elgin's Sieve Bend combines unique features with durability that generates one of the lowest cost per ton processed feed available on the market today. Sieve screens are made of stainless steel for corrosion and wear resistance.



Industrial Heater

Elgin manufactures industrial heavy duty forced air electrical heaters in 30 kw and 50 kw configurations. Constructed from galvanized steel or stainless steel with helical wound elements using chrome resistance wire.



Feed Box

Improved box and feed chute design permits full utilization of screens and controls splashing and flooding of the screen. Includes ceramic liners for extended wear life.



Full Service Custom Fabrication and Repair

Clinch River Corporation has become known for its ability to provide high quality industrial metal fabrication and vacuum pump repair. Our versatile production capabilities enable us to meet the needs of customers in a wide range of industries. Clinch River Corporation also is a certified distribution and service center for Howden Roots Vacuum Pumps to keep your operation up & running



Mining and Aggregate Industry Products

EBR/EBW Vertical Screen-Scroll

Elgin Model EBR/EBW Vertical Screen-Scroll Centrifuges are designed for small particles and will provide efficient and consistent moisture reduction even with fluctuating feed rates.



Available in 36", 40", 40"HTS, 42" & 48"

HVC Vibratory Centrifuge

Available in either a 1000, 1400 or 1500 configuration, the HVC Horizontal Vibratory Centrifuge is easily installed in nearly every coarse particle circuit. With its cartridge style drive assembly allowing for quick field replacement and its economical low G operation, the HVC is designed with ease of operation in mind. Available with a two-piece screen configuration for replacement cost savings.



HSC Horizontal Scroll

The HSC is designed to be user-friendly while lowering the cost of installation, operation, maintenance and repair. With its sealed, nearly maintenance-free drive unit, simplified lubricating system, sealed oil-filled planetary gearbox and self-contained construction, the HSC is rugged and reliable yet cost-effective. The HSC Horizontal Scroll comes with a unique I-Beam and Chain Hoist system, which allows maintenance without need of an overhead crane.



VC Vertical Vibratory

The VC Centrifuge uses vibratory dewatering technology and centrifugal force to provide reliable dewatering of coarse particle applications. A large feed hopper eliminates the need for a feed chute, and a catch in the center increases part life. The VC features an accelerating wear plate which allows for even screen wear. The drive assembly consists of the main working parts enclosed in a steel cast housing which can then be removed as a single unit for easy replacement or repair.



Rotary Breaker

Featuring dual or single end drives, Elgin's Rotary Breakers lift and drop feed material several times as it traverses through the drum, to size the material and scalp undesirable material. Desirable sized material passes through screen perforations and into a product hopper. Undesirable material traverses through the breaker and out the discharge end for disposal. The simple design of a rotary breaker requires little maintenance, making it economical & easy to operate.



Sizes Available:

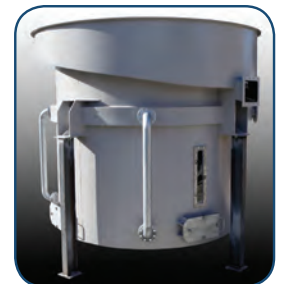
12' Diameter x 16', 20', 24' and 27' Length

10' Diameter x 16', 20' and 24' Length

9' Diameter x 16', 18', 20' and 24' Length

Teeter Bed Separator

Elgin's Teeter Bed Separator (TBS), also known as a hindered settling classifier, uses a continuous upward current of water to provide separation by specific gravity. The computerized electronic control system automatically monitors the TBS operating conditions and makes necessary adjustments to maintain efficiency in separation.



The TBS is available in sizes ranging from 2 ft. in diameter (TBS 600) to 13ft. in diameter (TBS 4000). Regardless of the application or the tonnage requirements, Elgin can offer a TBS Model to accommodate your needs.

Water Intake Solutions

Coanda Screens

Coanda screens use tilted wedge wire to provide water to hydro, municipal water, and other facilities. Clean water falls through while fish and debris pass over. A Coanda screen allows operators to simplify the intake structure.



AirBurst Systems

Designed to deliver a powerful burst of air to the screen to eliminate debris. The system can include control system to detect clogging or can be simplified to allow for manual operation.



Cylindrical Screens

Cylindrical screens use a combination of physical and hydrodynamic exclusion so that the screens do not clog or kill fish. The screens can include AirBurst systems to remove any debris, and a suite of other technologies to prevent ice, silting, and biofouling.



Jacquelyn Coating

Jacquelyn coating (U.S. Patent #5,945,171) is a permanent metal coating to prevent bio fouling. Jacquelyn is non-ablative and does not rely on copper leach, and as a result is NSF certified. When compared to equivalent products constructed of similar copper-nickel alloys, Jacquelyn provides a superior product by utilizing a more robust substrate.



Flat Panel Screens

Elgin flat panel screens use TIG welded wedge wire to provide the best relationship between cost and performance. The screens are manufactured to exceed all typical tolerances.



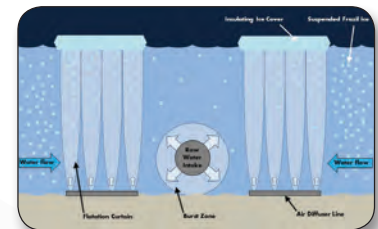
NSF Certification

Elgin Water Solutions has earned NSF certification for Jacquelyn Coating which was the result of extensive testing and an audit of our quality control procedures.

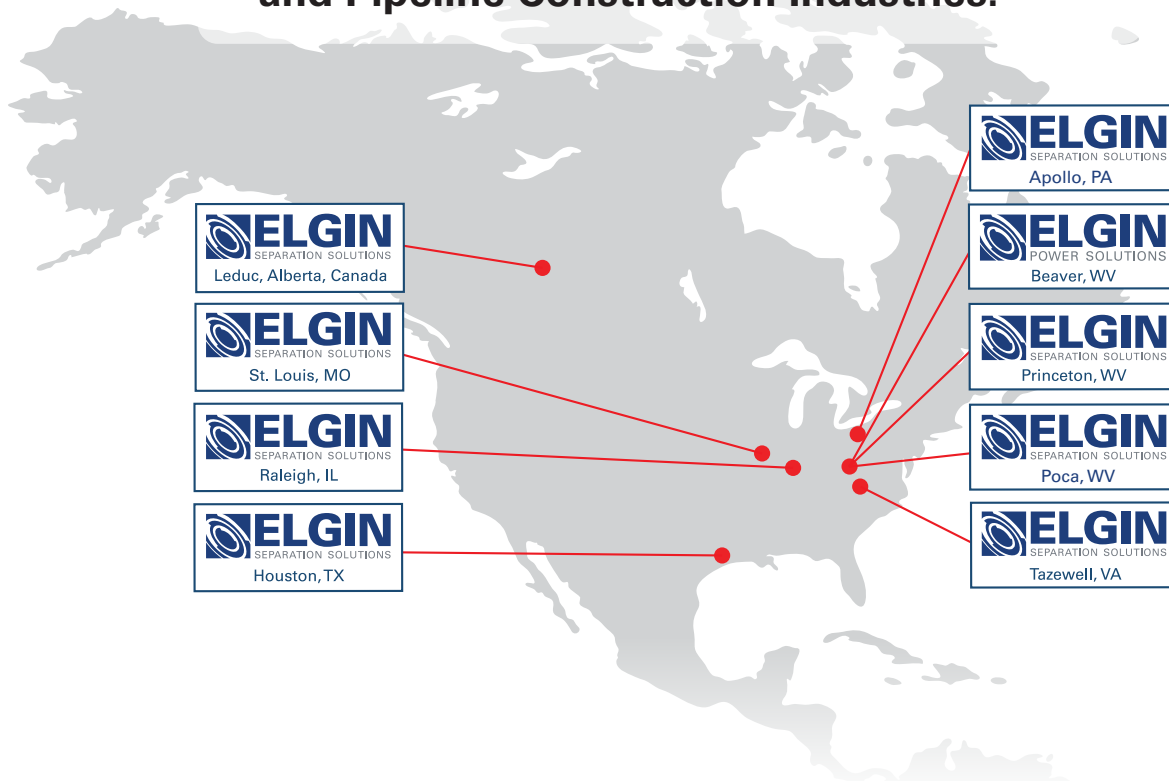


IceBreak Systems

Designed to work in tandem with an AirBurst system, IceBreak works to prevent and eliminate frazil ice. The system is designed to detect conditions that lead to frazil ice formation.



Elgin is a Worldwide Leader in the Design, Manufacture and Service of Industrial Equipment for the Oil & Gas, Rendering, Dredging, Power, Mining, Water Intake, and Pipeline Construction Industries.



Manufacturer of Vibrating Machines, Profile & Wedge-Wire Screens, Rotary Breakers, and Vibratory Centrifuges for the Minerals, Coals, and Aggregates Processing Industry. In addition, ESS manufactures Intake Manifolds, HemiScreen, Coarse Filtration, Mini Hydro Solutions, Wire-to-Wire Systems for the Water & Wastewater Industry, Solids Control and Waste Management Systems, including Full Equipment Life-Cycle Service and Remanufacturing Services.



Manufacturer of Explosion Proof Lighting and Camera Systems, Modular Power Substations, Switchgears, Electrical Control Systems, and Power Distribution Equipment for the Mining & Utilities Industry.

Tabor Machine Company is a division of Elgin Separation Solutions.
1176 Shelter Road • Princeton, WV 24739 • Ph. 304-431-4100 • Fx. 304-431-4138

Norris Screen is a division of Elgin Separation Solutions.
21405 Gov. G.C. Peery Hwy. Tazewell, VA 24651 • Phone: 276-988-8901

Clinch River Corporation is a division of Elgin Separation Solutions.
1176 Shelter Road • Princeton, WV 24739 • Ph. 304-431-4100 • Fx. 304-431-4138

CSI, CMI, CCS is a division of Elgin Separation Solutions.
5595 Highway 34 North, Raleigh, IL 62977
Ph. 618-268-4850 (CSI), 314-776-2848 (CMI), 630-434-7231 (CCS)

Elgin Water Solutions is a division of Elgin Separation Solutions.
235 N High Street, Canal Winchester, OH 43110 • Ph. 614.524.4588 or Fax. 614.524.4586

www.elginseparation.com