

CHESTERTON® INNOVATIONS

AWARD-WINNING PRODUCTS AND SERVICE INDUSTRY-WIDE



Innovation and Excellence

STATE-OF-THE-ART, AWARD-WINNING, CONTINUOUS IMPROVEMENT PRODUCTS AND SERVICES

Chesterton prides itself on providing innovative, value-driven solutions to meet industry needs. Chesterton® products and services have furthered the state-of-the-art in industry, resulting in greater product reliability, lengthening mean time between preventive maintenance, reducing plant maintenance and production costs, and providing more environmentally responsible products.

1892

Chesterton Tool for Cutting Glass Gage-Tubes

Chesterton patents new and useful improvements to tools for cutting glass gage tubes. The tool's added spring tension arms and locking ring provide a secure and accurate means for measuring and cutting glass gage tubes.

1895

Chesterton Steam Packing

Chesterton patents steam packing consisting of a rubber coated inner core surrounded by woven braided packing, which holds the packing in shape, helps prevent matting, and is more cost-effective.

1928

Chesterton 64 Steam Packing

First high-pressure steam packing to retain compressibility and resist hardening at high temperatures.

1939

Chesterton 600 Parachute™ Packing V-Ring Set

First and only V-Ring packing set needing no special top adapter.

1950

Chesterton 322 White-Lon™ Multi-Service Packing

First packing to utilize a method of coating fibers with PTFE suspenoid before and after braiding, resulting in lubrication and increased chemical resistance for the wearing life of the packing.

Chesterton 324/1724 Super-Lon™ Packing

First 100% PTFE braided valve stem packing with PTFE suspenoid treatment to be guaranteed for the life of the valve. Further developed in 1960 into the first non-shrinking, white PTFE fiber packing.

Chesterton 738 Belt-Flo™ Belt Dressing

First industrial maintenance chemical product offered by Chesterton.



1953



Chesterton 706 Rustsolvo™ Penetrating Oil and 730 Spragrip® Belt Dressing

Chesterton releases two new specialty maintenance products, 706 Rustsolvo Penetrating Oil and 730 Spragrip Belt Dressing.

1956

Chesterton 601 Chain Drive Pin and Bushing Lubricant

Chesterton introduces its 601 Chain Drive Pin and Bushing Lubricant, a premium-quality oil formulated to penetrate between the close clearance of chain drive bushings and pins, wire ropes, and cables to provide effective lubrication.

1958

Chesterton Monoseal™ Hydraulic Ram Packing

First single-ring, fully automatic, endless, molded hydraulic sealing ring.

1962

Chesterton 500 Stationary Mechanical Seal

First hydraulically balanced, stationary mechanical seal for general industry aligning at the shaft instead of the stuffing box.

1963

Chesterton 326 Ches-Lon™ Packing

First braided packing to replace cotton with a PTFE fiber carrier, resulting in a stable, low friction, high-grade packing for caustic applications.

1964

Chesterton 329 Stern-Lon™ Packing

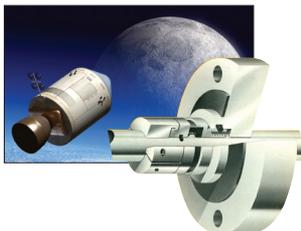
First formable, large cross-section, square braided packing with PTFE lubricant, offering longer life and increased resistance to rot for marine applications.



1967

Chesterton CounterPoise Mechanical Seals

Chesterton designs two CounterPoise mechanical seals for an Apollo spacecraft.



1968

Chesterton wins *Chemical Processing* magazine's Vaaler Award with its **Vanway O-Ring** for chemical sealing applications.

1969

Chesterton becomes the first seal manufacturer to institute a worldwide, in-plant seal maintenance training program.

Chesterton's Technical Products Division releases more than 45 industrial chemical products between 1969 and 1979, offering innovative system solutions to address production process, facility, and maintenance needs.

1970

Chesterton Style ONE Super-Graphite Packing

First 100% pure graphite braided packing with entrapped graphite particles extending ranges in non-oxidizing services to 2760°C (5000°F). A Vaaler Award-winning product.

Chesterton 770 Mechanical Seal



First O-Ring balanced mechanical seal to fit within a standard ANSI pump stuffing box without requiring special machining, offering an economic solution to help the industry convert from packing to seals. A Vaaler Award-winning product.

1971

Chesterton launches its used seal exchange program.

1974

Chesterton Style 7000 SuperCup™ Hydraulic Seal

First polymer cup hydraulic seal with brass disc inserts that guard against cold flow and distortion.

1975

Chesterton 880 Mechanical Seal

Chesterton wins a Vaaler Award for the 880 Mechanical Seal, the first O-Ring balanced mechanical seal with the rotary surface exposed to self-washing action all the way to the O-Ring.



Chesterton Self-Aligning Stationary Seal

Chesterton patents the Self-Aligning Stationary Seal (SAS), a sealing solution providing automatic alignment of rotary and stationary faces of a mechanical seal.

1976

Chesterton becomes the first seal manufacturer to build a sealing training center thoroughly equipped for hands-on training and staffed with experienced instructors.

1977

Chesterton 1725 Food Process Packing

First braided packing designed for service in food processing equipment.

Chesterton 370 Multi-Service Packing

First low-friction, multi-service carbon yarn braided packing offering faster break-in and requiring fewer adjustments.

Chesterton 241 Double Cartridge Seal

Chesterton wins a Vaaler Award for the 241 Double Cartridge Seal, the first off-the-shelf, self-aligning, cartridge mounted, double mechanical seal.



1978

Chesterton 478 Universal Gland

First universal gland for component seals featuring a Chesterton mechanical seal with "L" shaped or Self-Aligning Stationaries, eliminating the need for custom glands.

1979

Chesterton 8K Super Parachute™ Spiral Kit

First precision-molded polymer material in spiral coils from which a user can cut various sized hydraulic seal rings as needed.

1980

Chesterton 123 Cartridge Single Seal

First off-the-shelf, cartridge mounted, single seal requiring no special sleeve for balance nor pump modification for installation and providing a complete sealing system with Self-Aligning Stationary and built-in connections for proper environmental control.



Vaaler Award

For over 50 years, *Chemical Processing* magazine has recognized products with this award, named after their long time editor-in-chief, John C. Vaaler. This award recognizes new products and services introduced into the chemical processing industry that dramatically improve plant operations and lower overall operating costs.

The biennial award winners are selected from an independent and impartial panel of judges drawn from the chemical industry. Products are evaluated in 12 categories for technological significance, novelty, or uniqueness, and breadth of applicability. Not all categories are always fulfilled.

1981

Chesterton 2500 ISO Wedge Packing

First graphite packing set compressible in the stuffing box like braided packing, helping to equalize sealing forces throughout the set.

1982

Chesterton GTP Packing Rings

First die-formed, two-piece Graphite Tape Packing (GTP) rings with the sealing ability of non-porous graphite rings and compressibility equal to graphite braided packings.



Chesterton 222 Cartridge Motion Seal

First cartridge mounted, double balanced, double mechanical seal with floating stationaries.



1983

Chesterton 1800 Steam Valve Packing

First next generation, high-temperature steam valve packing.

1984



Chesterton Industrial Process Pump

Chesterton introduces the first industrial process pump to replace existing stuffing boxes with large capacity seal chambers or spiral-wrapped packing chamber. The pump's solid, heavy-duty shaft helped reduce vibration damage to bearings and seals.

Chesterton Metal Repair System (MRS) Coatings

Chesterton launches its Metal Repair System (MRS) line of coatings. Initial product offerings include the 810 Steel Putty Plus, 812 Steel Liquid Plus, 818 Rapid Cure Steel Putty Plus, 835 Underwater Repair Putty, and 858 Abrasion Control Putty.

1985

Chesterton 711, 712, 713 Sealing Devices

First composite mechanical sealing devices providing corrosion resistance of exotic metals.

Chesterton 733 and 735 Composite Seal

First reinforced, precision-made, composite, non-metallic cartridge seal with easy installation.

1986

Chesterton 143/144 Stationary Bellows Seals

First bellows seals to provide increased stability and controlled distortion under elevated temperature and pressure conditions.

Chesterton 221 Split Seal

First split mechanical seal for plant-wide use, eliminating equipment disassembly in various applications and minimizing downtime. A Vaaler Award winning product.



1986 (continued)

Chesterton 5350 EPRI Wedge Packing

Chesterton, in conjunction with Electric Power Research Institutes (EPRI), designs the first die-formed graphite ring wedge mechanical packing with braided end rings, offering a high technology solution for troublesome actuated, modulated valves.

Chesterton 855 Abrasion Control Liquid

Chesterton introduces its 855 Abrasion Control Liquid, an advanced ceramic composite formulated to protect equipment from damage due to light slurry erosion and corrosive conditions.

1987

Chesterton Live Loading Program

First comprehensive valve live loading program with individual computerized designed packing set and gland torque specifications to provide leak-free valve sealing.

Chesterton Pump Improvement Program

First pump improvement kits to upgrade existing pumps with larger seal chambers or spiral-wrapped packing chambers and more durable power ends.



Chesterton 890 Wear Resistant Compound

Chesterton releases its 890 Wear Resistant Compound, an advanced beaded ceramic composite formulated to protect surfaces against moderate to severe abrasion under both corrosive wet slurry flow and dry abrasive flow.

1988

Chesterton Split Labyrinth Seal

First split labyrinth bearing seal, eliminating the need for equipment teardown and reducing shaft wear in various applications.



Chesterton 1727 Multi-Lon™ Packing

First thermoset synthetic fiber packing with superior chemical and tensile strength characteristics offering users a packing useful in a wide variety of applications.

Chesterton 798 Polymer Quartz Compound

Chesterton launches its 798 Polymer Quartz Compound to repair and resurface concrete surfaces damaged by chemical and mechanical forces.

1991

Chesterton 15K Gland

First one-piece polymer gland designed with an integrated wiper and seal.

Chesterton ARC Industrial Coatings

Chesterton launches its ARC line of industrial coatings.



1992

Chesterton 155 Cartridge Single Seal and 255 Cartridge Double Seal

The Chesterton 155 Cartridge Single Seal and 255 Cartridge Dual Seal are named 1992 Product of the Year winners by *Plant Engineering* magazine.



ISO 9001 Certification for Quality Systems

Chesterton becomes the first seal manufacturer in the United States to achieve ISO 9001 certification for quality systems.

Chesterton 1400 Pump and Valve Graphite Tape Packing

First braided graphite tape packing.

1993

Chesterton 620 Multi-Lube Lubricant

First Chesterton product to incorporate replenishable raw materials in formulation, offering an environmentally responsible and multi-functional lubricant.

1994

Chesterton Split InterLocking Turbine Blade Sealing System

First hydraulic split interlocking turbine blade sealing system used in hydropower generation.

Chesterton 153 Cartridge Single Seal

First cartridge mounted, high-temperature bellows seal with the shaft seal on the inboard end of the sleeve.

Chesterton 156 Heavy Duty Slurry Seal

First slurry seal to use a convoluted diaphragm to eliminate secondary seal hysteresis.

Chesterton 442 Split Seal

First split mechanical seal with resiliently mounted faces offering the ability to handle positive pressure and vacuum. A *Plant Engineering* magazine's Product of the Year finalist.



Chesterton 5800

WedgeSeal™ Packing

Chesterton introduces its second-generation die-formed, graphite ring packing.

1995

Chesterton CMS 2000 Injectible Pump Sealant

Chesterton develops CMS 2000 Injectible Pump Sealant, a high-technology composite that outperforms conventional packings.



1996

ISO 14001 Environmental Standard

Chesterton is the first in our industry to be registered to ISO 14001 environmental standard.

Chesterton ARC MX1 Coating

Chesterton introduces ARC MX1, an ultra-high abrasion-resistant coating designed for extreme abrasion control applications.

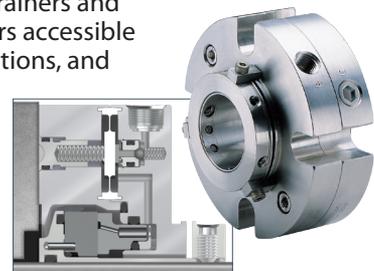
1997

Chesterton becomes an *American Society of Machinery Manufactures Association (ASMMMA) Eagle Award Winner* for its A Basic Understanding of Chesterton and Our Product Lines employee training program. This outstanding program is still used today to train Chesterton employees.

1998

Chesterton Global Training receives the Processing Magazine Breakthrough Product of 1998 Award for online interactive courses.

The training program offers students the ability to participate in courses tailored to the student's learning style with real-time feedback from trainers and makes professional trainers accessible for plant managers, operations, and maintenance staff.



Chesterton 4400 TwinHybrid™ Gas Seal

First gas seal with a gas regulation built into the gland.

Chesterton ARC S4 Acid Resistant Coating

Chesterton releases ARC S4 Acid Resistant Coating, an industrial coating designed to protect structures against chemical attack.

1999

Chesterton 610 HT Synthetic Lubricating Fluid

Chesterton introduces 610 HT Synthetic Lubricating Fluid, a premium quality, 100% synthetic fluid that cleans as it lubricates.

2000

Chesterton ARC FR1 and FR2 Marine Foul Release Coatings

Chesterton develops two new industrial coatings for marine applications.

2001

Chesterton Global SpeedSeal™ Program

Chesterton launches the Global SpeedSeal Program with integrated facilities for machining made-to-order, high-quality polymer seals around the world with turnaround times as low as 24 hours.



2002

Chesterton 292 Precision Degreaser

Chesterton expands its aerosol line of chemical maintenance offerings with the introduction of its 292 Precision Degreaser.

Chesterton ARC 855 HT Coating

Chesterton launches ARC 855 HT, its first high-temperature coating capable of immersion in aqueous corrosion and erosive exposures up to 130°C (265°F).

Chesterton ARC SD4i Coating

Chesterton introduces ARC SD4i, its highest ceramic-reinforced, sprayable coating.

2004

Chesterton KPC 820N Water-Based Degreaser

Chesterton releases its KPC 820N Water-Based Degreaser, a water-based, environmentally responsible, alkaline cleaner.



2005

Chesterton ARC S7 and ARC NVE Coatings

Chesterton introduces its first novolac vinyl ester-based industrial coatings to help protect concrete and steel surfaces from highly oxidizing exposures at elevated temperatures.

Chesterton 783 ACR Corrosion-Resistant Anti-Seize

Chesterton releases 783 ACR Corrosion-Resistant Anti-Seize, a metal-free, high-performance industrial anti-seize with extreme corrosion protection and water washout resistance.

2007

Chesterton introduces 2:1 and 4:1 cartridge packaging for its **ARC S1**, **ARC S2**, **ARC SD4i**, **ARC S4+**, **ARC 10**, and **ARC 858** industrial coatings.

2009

Chesterton ARC HT-T and ARC HT-S Coatings

Chesterton develops two new coatings to help protect separators, vessels, and heat exchangers exposed to high temperature, immersion, and erosion.



2010

Chesterton wins the **Global Trade Award** from the Massachusetts International Business Council for demonstrated creativity and leadership in international trade-related activities.

Chesterton is recognized as a leader in toxic use reduction—one of only 12 facilities featured on the TURA Program's 20th Anniversary Leadership Tour.

2011

Chesterton ARC I BX1 High Impact Protective Coating

Chesterton launches ARC I BX1 High Impact Protective Coating to help restore and protect slurry pumps and other equipment exposed to severe abrasive wear.

Chesterton 1622 Low E Valve Packing

Chesterton 1622 Low E Valve Packing wins a Vaaler Award in the environmental category for new products reducing pollutants in the chemical and petrochemical industries.



2012

Chesterton 615 HTG #2-460 Grease

Chesterton releases its 615 HTG #2-460 grease, a QBT™ Quiet Bearing Technology lubricant designed for large, low-speed bearings.

2013

Chesterton undertakes its first, extensive abrasion benchmarking study.

NSF61 Drinking Water System Components Certification

Chesterton achieves the requirements for NSF61 certification for its 442 Split Seal, becoming the first major seal manufacturer to receive this certification for a mechanical seal. It is the first of many subsequent certifications for cartridge seals, packing, and ARC coatings.



2014

Chesterton 442C Cartridge Split Mechanical Seal

Chesterton introduces the 442C Cartridge Split Mechanical Seal, a solution offering superior seal performance with the ease-of-installation of a cartridge seal.



2015

Chesterton acquires Ceramic Polymers GmbH to establish manufacturing and stocking position in the EU region.

2016

Chesterton DualPac® Technology

Chesterton introduces its patented DualPac technology with the release of DualPac 2211 Severe Service Slurry packing and DualPac 2212 High-performance packing. DualPac technology produces an innovative braided pump packing that combines two distinct materials to maximize packing performance.



DualPac®
Technology

2018

Chesterton ViewIn™ Technology

Utilizing Radio Frequency Identification (RFID) tags installed in the seal gland, Chesterton ViewIn technology is the first in the industry to provide wireless seal identification and record keeping via a mobile app.

2019

Chesterton ARC S5 Coating

Chesterton introduces ARC S5, its highest temperature epoxy-based coating for elevated temperature aqueous corrosive exposures up to 180°C (375°F).

Chesterton ARC S1 HB Coating

Chesterton globally launches ARC S1 HB, its first edge-retentive coating with fluorescent pigments incorporated for aid in inspection.

Chesterton 1810 and 2810 Cartridge Seals

Chesterton introduces the 1810 Heavy Duty Modular Single Cartridge Seal and 2810 Heavy Duty Modular Double Cartridge Seal. Built on the



Chesterton's AXIUS™ Modular Platform, the seals are simple to configure for a variety of applications—allowing plants to have a common selection, installation, and operating procedure throughout their facility.

2020

Chesterton Matrix Rotary Seal

Chesterton launches the innovative, patented Split Matrix Rotary Seal for worn equipment and large run-out shafts, eliminating cumbersome equipment teardown in various applications and minimizing downtime.

Chesterton ARC MX FG Coating

Chesterton introduces ARC MX FG, its first food-grade, FDA compliant, wear-resistant coating.

Chesterton Connect™ System

Chesterton launches the Chesterton Connect System, providing a simple-to-use, cloud-based, continuous condition monitoring solution with real-time 24/7 remote monitoring and notification capabilities focusing on seal health and pump efficiency.



Chesterton 650 AML Lubricant

Chesterton releases 650 AML Lubricant, its most biodegradable lubricant designed to creep into internal workings of chains, cables, pneumatics, needle bearings, and sliding mechanisms.

2021

Chesterton 720 CCG (Chain, Cable, and Gear) Lubricant

Chesterton develops 720 CCG, a lubricant with anti-corrosion action and water resistance to help protect chains, wire ropes, and gears exposed to moisture and corrosive liquids and vapors.

2022

Chesterton Split Polymer Labyrinth Seal

Chesterton launches the non-contact Split Polymer Labyrinth Seal for splash lubricated bearing protection in large pumps, gearboxes, and other rotating equipment.



Chesterton 1510 Single Cartridge Seal

Chesterton releases the 1510 General Duty Single Cartridge Seal, designed with a compact cartridge profile to fit and install easily on process equipment throughout the industry.



2023

Chesterton AMPS™ Technology

Chesterton introduces the AMPS (Automated Mechanical Packing System) technology, offering a unique approach to automatic loading of braided packing in rotating equipment. This technology helps keep leakage low, reduces maintenance, and improves sealing performance. It also enhances operator safety by allowing for remote gland load management.

Chesterton ARC S3 Coating

Chesterton releases ARC S3, its second food grade, FDA compliant, thin film, sprayable coating suited for corrosive and erosion applications.

Chesterton ARC SL-E Coating

Chesterton adds ARC SL-E, a self-leveling epoxy floor coating with four color selections, to its ARC product line.





Global Solutions, Local Service

Since its founding in 1884, the A.W. Chesterton Company has successfully met the critical needs of its diverse customer base. Today, as always, customers count on Chesterton solutions to increase equipment reliability, optimize energy consumption, and provide local technical support and service wherever they are in the world.

Chesterton’s global capabilities include:

- Servicing plants in over 113 countries
- Global manufacturing operations
- More than 500 Service Centers and Sales Offices worldwide
- Over 1200 trained local Service Specialists and Technicians

140 Years of Excellence

We pride ourselves in providing Global Solutions Local Service. Our vision is to be at the top of our customer’s minds for innovation and excellence.

Visit our website at chesterton.com



Chesterton Connect™, AMPS™, AXIUS™, ViewIn™, QBT™, SpeedSeal™, TwinHybrid™, WedgeSeal™, System One™, Super-Cup™, Stern-Lon™, Ches-Lon™, Super-Lon™, Belt-Flo™, Rustsolvo™, Monoseal™, White-Lon™, and Parachute™ are trademarks of A.W. Chesterton Company.

The NFS name and logo are trademarks of NFS International.

Chesterton ISO certificates available on chesterton.com/corporate/iso

Distributed by:

Technical data reflects results of laboratory tests and is intended to indicate general characteristics only. A.W. Chesterton Company disclaims all warranties expressed, or implied, including warranties of merchantability and fitness for a particular purpose or use. Liability, if any, is limited to product replacement only. Any images contained herein are for general illustrative or aesthetic purposes only and are not intended to convey any instructional, safety, handling or usage information or advice respecting any product or equipment. Please refer to relevant Safety Data Sheets, Product Data Sheets, and/or Product Labels for safe use, storage, handling, and disposal of products, or consult with your local Chesterton sales representative.

© 2023 A.W. Chesterton Company.

® Registered trademark owned by A.W. Chesterton Company in USA and other countries, unless otherwise noted.



A.W. Chesterton Company
860 Salem Street
Groveland, MA 01834 USA

Telephone: 781-438-7000
Fax: 978-469-6528
chesterton.com

Form No. EN601696
Innovation Brochure
10/23