Contamination Control Solutions
for Biomedical Research and Vivariums



Steelco

Miele Group Member

Global manufacturer and supplier of cleaning and sterilization solutions

Born from Steelco and Belimed, SteelcoBelimed pioneers sterile workflow solutions with innovation, reliability, and customer focus. “Innovate with confidence” defines our commitment to high-quality products and services, setting new industry standards in Infection Control and Life Science.

Customer Centricity

Our commitment to fully understand customers’ needs and satisfaction is prioritized.

Our products and services are designed to meet those specific needs, ensuring every decision we make benefits our customers for the best results.

Innovation

Our dedication to progress drives us to constantly seek out and embrace new ideas, technologies and methods.

This commitment ensures our products and services continually evolve and improve.

Efficiency

We strive for peak productivity by optimizing our processes, resources, and operations.

Our goal is to deliver solutions and services swiftly and effectively, without compromise, minimizing waste and maximizing value.

Reliability

We stand by our word, delivering solid and trustworthy solutions every time.

Our aim is to forge long lasting relationships built on trust and mutual respect by consistently meeting our commitments.

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Contamination Control Solutions
for Biomedical Research and Vivariums



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Cabinet cage and bottle washers



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The ultimate generation of cage and bottle washer



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AC 1200/1300/1400
Cabinet Cage and Bottle Washers

These cabinet washers are designed to clean all types of animal cages, feeding bottles and aquatic tanks. The compact design delivers maximum flexibility while minimizing water and energy consumption, reducing overall cycle costs. Available in three models with single or double door configurations, all units ensure excellent cleaning performance with a final rinse temperature up to 85°C and an independent rinsing circuit.

Up to 360 mice cages per hour!







Overall Dimensions

Model	Chamber Volume (l / cu ft)	Single Door (mm / in)			Double Door (mm / in)		
		W	D	H	W	D	H
AC 1200	~ 780 / 27.5	1200 / 47.2	1000 / 39.4	1900 / 74.8	1245 / 49	1030 / 40.5	1900 / 74.8
AC 1300	~ 1275 / 45	1970 / 77.6	830 / 32.7	1900 / 74.8	N/A	N/A	N/A
AC 1400	~ 1575 / 55.6	1970 / 77.6	1050 / 39.4	1900 / 74.8	2015 / 79.3	1080 / 40.6	1900 / 74.8

H with open door: 2265 mm / 89.2 in. For all models, both single and double door versions.

Key Features

- Single or double door configurations
- Vertical-sliding door with inspection window
- AISI 316L stainless steel chamber
- Rotating spray arms on three levels
- Steam or electrical heated
- Separated washing and rinsing circuits
- Water and energy saving system
- Conductivity meter for wash or final rinse
- Up to 3 chemical dosing pumps
- Water discharge cooling down system
- Steam condenser with heat recovery system
- Micro-processor controller with LCD display
- Possibility of up to 40 storable programs
- On board thermal printer and USB port



Easy load. Perfect clean.

The lower tray slides smoothly on rollers, using the door as a convenient loading platform. The upper tray runs on fully extendable telescopic rails for effortless loading and unloading. Three-level rotating spray arms deliver uniform coverage throughout the chamber, ensuring consistently high cleaning performance.



Smart filtering system

A multistage water filtration system with a self-cleaning recirculation filter protects equipment, extends system life and supports the highest safety standards during every washing cycle.



Aquatic tank processing kit

A specialized kit for aquatic tank processing, including three chemical dosing pumps, washing circuit upgrades, flow meters and a conductivity probe, ensuring controlled and validated reprocessing.



Easy maintenance and access to chemicals

The electrical control panel is mounted on sliding rails for easy servicing. Front access to chemical storage accommodates up to two 10 L tanks, complete with level monitoring sensors.

AC 1500
The Ultimate Generation of Cage and Bottle Washer

The AC 1500 cabinet washer is an ideal solution for small to medium facilities or as a backup unit for large vivariums and laboratories. It features a space-saving vertical sliding door made of double tempered glass, allowing full visual monitoring of the process. Available in single or double door versions, it guarantees high cleaning efficacy with a final rinse temperature up to 85°C and an independent rinsing circuit.

Up to 320 mice cages per hour!



Chamber Dimensions WxDxH

1380 x 795 x 1110 mm
54.3 x 31.3 x 43.7 in
Chamber volume: ~1220 lt / 43 cu ft

Overall Dimensions WxDxH

Single door version
2050 x 920 x 2050 mm
80.7 x 36.2 x 80.7 in

Double door version
2050 x 965 x 2050 mm
80.7 x 38 x 80.7 in

H with open door: 2450 mm / 96.5 in

Key Features

- Automatic vertical-sliding glass door(s)
- AISI 316L stainless steel chamber
- Oscillating spray arms on three levels
- Two-level loading trays with adjustable inclination system
- Steam or electrical heated
- Separated washing and rinsing circuits
- Water and energy saving system
- Conductivity meter for wash or final rinse
- Up to 3 chemical dosing pumps
- Aquatic tank cycle option
- Water discharge cooling down system
- Steam condenser with heat recovery system
- Detergent cabinet with capacity of up to 4x20 lt / 5.28 US gal containers.
- 7” HMI color touch screen with industrial PLC
- On board thermal printer and USB port
- Tele-service and tablet connectivity ready





Easy loading/unloading

Two levels of loading trays sliding on rollers for convenient loading and unloading procedures. An adjustable inclination system with three different possible angles optimizes load presentation.



Optimal cleaning performance

The washing system, operating with independent washing and rinsing hydraulic circuits, features three-level oscillating spray arms positioned on the top, middle, and bottom levels of the washing chamber. A powerful recirculation pump and washing and rinsing nozzles distributed on the oscillating spray arms guarantee a uniform load coverage and effective cleaning action.



Innovative water filtering

A three-level filtration system protects equipment and supports safety standards. An easily accessible extra-fine, self-cleaning, back-flush filter captures particles larger than 0.5 mm during water recirculation.



Advanced control system

Industrial PLC with touch-screen HM, tele-service and tablet connectivity ready. Morning self-starts to warm up the water at a set time and day. USB port for historical cycle data download and software upgrades. Full cycle data traceability can be printed by the optional built-in thermal printer or alternatively registered in a traceability software.

AC 7500/8500
Cage and Rack Washers

AC 7500 and AC 8500 are heavy-duty, high-capacity hydro-spray washers designed for medium and large facilities requiring high throughput. Multiple configurations are available to suit any layout, including pit or floor loading, single or double door, and various door and technical area options. The hydraulic circuit can be designed with a single process circuit for recirculated wash and rinse phases or with a full wash and rinse circuit separation. Multiple oscillating spray arms ensure complete coverage and excellent results in short cycle times.

Up to 1000 mice
cages per hour!



Chamber Dimensions WxDxH

1170 x 2300 x 2150 mm
46 x 90.5 x 84.6 in

Overall Dimensions WxDxH

AC 7500 - Hinged door version
2500 x 2540 x 2520 mm
98.4 x 100 x 99.2 in

AC 8500 - Sliding door version
2900 x 2600 x 2500 mm
114.2 x 102.4 x 99.2 mm

Configurations

- Single or double door
- Hinged (AC 7500) or sliding door (AC 8500)
- Full glass or stainless-steel door with window
- Layout according to site
- Floor or pit mounted
- Steam or electrical heated
- Single (EZ version) or separated (HE version) washing and rinsing circuits
- Custom dimensions available upon request.

Key Features

- High productivity
- Flexible cycle setting
- Low water and energy consumption
- AISI 316L stainless steel chamber
- Oscillating spraying arms
- Up to 6 chemical dosing pumps
- Aquatic tank cycle option
- Water and energy saving system
- Water discharge cooling down system
- Steam condenser with heat recovery system
- Tool-free inline self-cleaning filter
- Manifold system for trolley docking
- Dedicated IVC-Rack wash cycle
- Automated loading/unloading systems
- 7” HMI color touch screen with industrial PLC
- On board thermal printer and USB port
- Tele-service and tablet connectivity ready

-95% running costs
compared to conventional designs

- 75% time saving
- 95% water saving
- 95% energy saving



Loading and unloading solutions
All you need to wash cages and bottles

Tailor-made presentation racks for cages and bottles or automatic loading solutions to maximize efficiency and decrease work-related injuries.



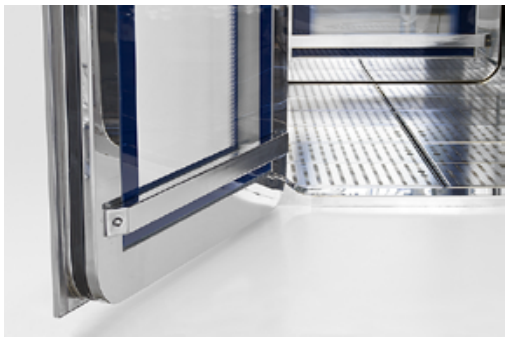
Flexible solutions

A wide range of configurations accommodates different load capacities, dimensions and layout requirements. All components are accessible from both the front and rear, simplifying maintenance and service operations.



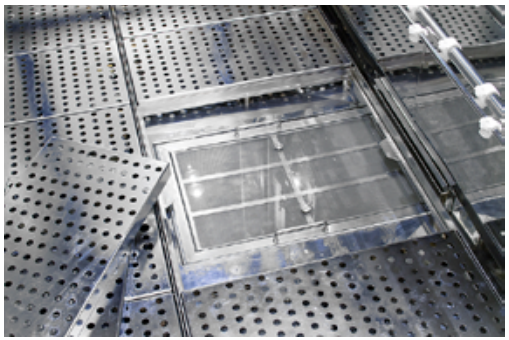
Higienic design

The chamber and doors are manufactured from AISI 316L stainless steel, with an AISI 304 external body, ensuring high hygiene standards, corrosion resistance and long-term durability.



Pit installation down to 100mm

Designed for installation with a pit depth of only 100 mm, enabling direct floor loading of large or heavy items. Custom chamber sizes can adapt to existing pits, or units can be floor-mounted using a loading ramp.



Innovative water filtering

A three-stage filtration system includes two sump filters and an inline self-cleaning filter in the recirculation circuit. It captures residues, protects pumps from debris and allows easy filter removal for cleaning.





NHP option

Designed for large cages and racks in medium to large facilities. Includes three preheating water tanks and two dosing pumps for flexible cycle settings, plus a protected inspection window for process monitoring.



Decontamination options

The air-tight design enables decontamination of heat-sensitive loads using hydrogen peroxide or chlorine dioxide. Cycles can be run with an onboard vapor generator or by connection to an external system.



Advance control system

Industrial PLC with touchscreen HMI, USB port and remote connectivity readiness. Provides full visibility of cycle status, time, temperature, chemical dosing, water usage, utilities consumption and drying, with data export and software updates.



Complete traceability

Optional thermal printer enables cycle data output for documentation. Dedicated data management software collects, records and visualizes real-time process information, supporting monitoring, traceability and compliance requirements.

AC 3500
Automated Tunnel Washer

The AC 3500 tunnel washer is designed for the cleaning, sanitization and drying of cages and utensils used in animal research laboratories. It delivers high throughput, effective waste separation and optimized water and energy consumption. Each chamber features a hinged glass door for visual inspection. High pressure and flow rates ensure outstanding performance, with productivity of up to 750 cages per hour and optional robotic integration.

Up to 750
cages per hour!



Modular System

The tunnel washer can be configured with modular units for loading, pre-wash, acid/alkaline wash, rinsing, standard or long drying, and unloading.

The system is available in 3 conveyor belt widths:
- 900 mm / 36 in
- 1100 mm / 44 in
- 1200 mm / 48 in

Configurations and Dimensions

	Loading	Pre-wash	Washing	Rinse	Std Drying	Long Drying	Unloading	Total length
	1000 / 43.3	1500 / 59.1	1500 / 59.1	1000 / 43.3	1500 / 59.1	2500 / 98.4	1000 / 43.3	mm / in
AC 3500/A	•		•	•			•	4500 / 177.1
AC 3500/B	•		•	•	•		•	6000 / 236.2
AC 3500/C	•		•	•		•	•	7000 / 275.6
AC 3500/D	•	•	•	•	•		•	7500 / 295.3
AC 3500/E	•	•	•	•		•	•	8500 / 334.6

Key Features

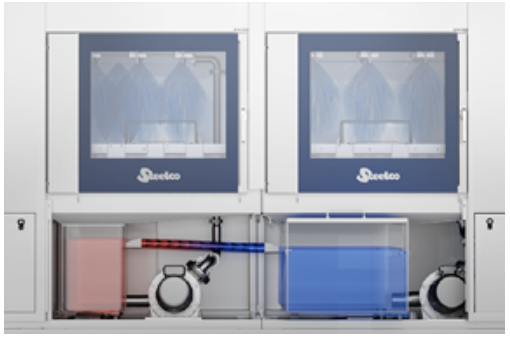
- Right-to-left as well as left-to-right workflow
- Step or continuous operation versions
- Separated washing and rinsing circuits
- Dedicated water jets for high-temperature final rinse
- Even hot-air distribution
- Visual inspection of each chamber
- Water filtering system for easy maintenance
- Suitable for robotic integration
- On-board thermal printer and USB port
- Tele-service and tablet connectivity ready





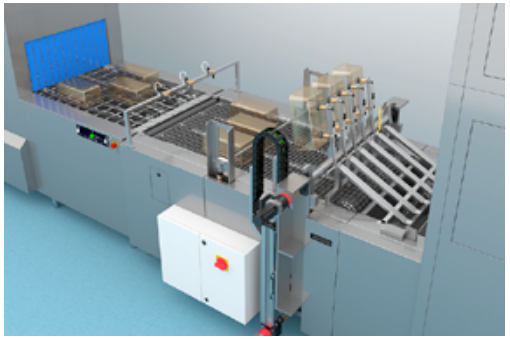
Smart water filtration system

Clogged filters can disrupt cage processing. The system allows fast, easy access for maintenance. The main prewash filter is flushed with flowing water to stay clean and efficient.



Water saving features

Water consumption is reduced by recovering warm, clean water from the final rinse for reuse in the wash or prewash phase, depending on configuration and installed modules.



Automatic inline cage inverter and bedding dispenser

Automatic inline bedding dispenser for cages on the unloading side of a tunnel washer. Can operate with a centralized vacuum system or an onboard loading funnel for accurate feeding.



Integration with robots

To support the growing demand for a compact system for the automatized handling of cages, the system can be integrated with robot technology for loading and unloading procedures.

Mito FBS/Mito 2B
Semi-Automatic Feeding Bottles' Washer

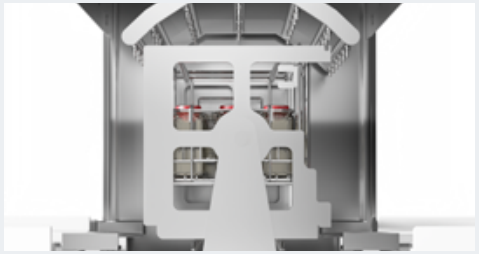
The MITO range provides compact and efficient bottle washing solutions for small animal research facilities. **MITO FBS** combines bottle washing and filling in a single unit, processing up to 18 bottles per cycle, while the modular **MITO 2B** offers flexible bottle and cap washing with a capacity of up to 2 × 18 bottle baskets per cycle. Both models deliver reliable performance, a compact footprint, and low operating costs.





Mito FBS workflow sequence

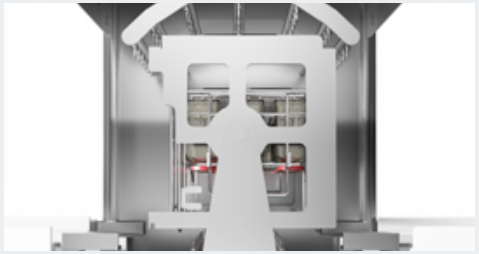
Loading



Emptying, washing, rinsing



Filling



Unloading



Overall Dimensions WxDxH

MITO FBS
1x18 bottle crate per cycle
650 x 700 x 1465 mm
25.6 x 27.6 x 57.7 in
H with open hood: 1865 mm / 73.4 in

MITO 2B
2x18 bottle crates per cycle
650 x 700 x 1465 mm
25.6 x 27.6 x 57.7 in
H with open hood: 1865 mm / 73.4 in

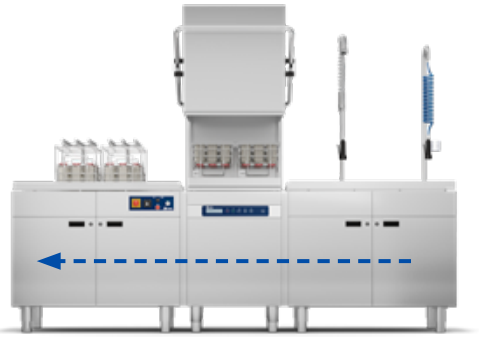
Key Features

- LCD Display control panel with up to 40 programs capacity
- Independent washing and rinsing system
- Automatic detergent dosing
- Full bottle coverage with individual nozzles
- Separate PT1000 temperature probes and water level sensor
- Easy access to the water filtration system
- Drinking water acidification unit option

Typical "Inline" Configuration

Both systems allow for an in-line configuration to better meet your needs. This specific solution is composed of:

- Manual de-capper
- Ultrasonic bath for cap treatment
- MITO FBS or MITO 2B
- Dripping station (for MITO FBS) or Filling module (for MITO 2B)



Mito FB Combi

The Ultimate Approach to Feeding Bottles' Treatment

MITO FB COMBI is a compact, fully integrated solution for the automated handling of bottles and caps. Within a footprint of less than 4 m², it performs decapping, emptying, washing, sanitizing, filling and recapping. Compatible with bottles and caps from multiple brands, it features AISI 316L stainless steel chambers, sump, and pre-heating tanks, ensuring durability, hygiene and long-term reliability.

Up to 1,440 bottles and caps per hour!



Complete automation

The MITO FB COMBI can be equipped with an automation system, either from initial installation or as a future upgrade. Compatible with Cartesian or anthropomorphic robots, it automatically handles bottle crates between transport trolleys and the machine conveyors, ensuring efficient and reliable operation.



Drinking water acidification unit

Designed for laboratory animal facilities, the Drinking Water Acidification Unit reduces bacterial growth by acidifying drinking water before bottle filling. Compatible with bottle filling modules, it can be installed as a standalone solution or seamlessly integrated into the loading or unloading conveyors of the MITO FB COMBI, ensuring an efficient and automated workflow.



Overall Dimensions WxDxH

3395 x 1165 x 2490 mm
134 x 46 x 98 in

Key Features

- Compact solution: less than 4 m² footprint
- Independent washing and rinsing systems avoid cross-contamination
- Customized crates and trolleys
- Individual nozzles guarantee perfect cleaning of the outer and inner surfaces of the bottles
- Suitable for inline and conventional barrier pass-through applications
- 7" HMI color touch-screen with industrial PLC
- On-board thermal printer and USB port
- Tele-service and tablet connectivity ready

All-in-One Solution

Five different phases are organically handled by the same automated system:

- Automatic loading table
- Decapping and emptying
- Washing phase
- Sanitization phase
- Filling phase
- Recapping phase



VS L Series
Steam Sterilizers for any Size of Facility

A comprehensive range of small, medium, and high-capacity autoclaves delivering outstanding performance, reliability, and versatility. Available in up to 23 standard chamber sizes, with capacities from 110 to 9,070 litres (4 to 320 cu ft), VS L sterilizers are designed to minimize energy and water consumption, ensuring low operating costs per load. Advanced Eco Options can reduce water consumption to nearly zero, depending on the selected model and configuration.

Up to 23
standard chamber sizes



Chamber Volume

from 110 litres / 4 cu ft
to 9,070 litres / 320 cu ft

Note: Custom dimensions available upon request.
Feature and option availability may vary depending on the machine model and configuration.

Configurations

- Single or double door
- Sliding or hinged door
- Layout according to site
- Floor or pit mounted
- Air Differential Seal or Bioseal
- Integrated or remoted electrical cabinet

Key Features

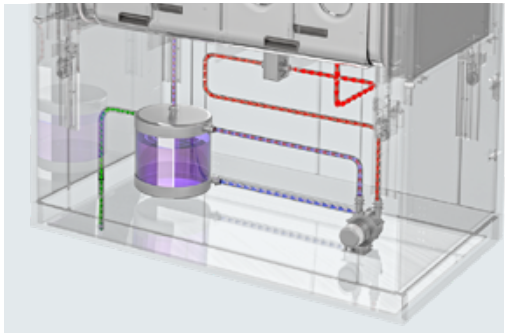
- Chamber made of AISI 316L stainless steel
- Pressure vessel according to PED or ASME
- Chamber jacket heating and cooling
- Piping and valves in copper-brass, AISI 316L stainless steel available as option
- Pneumatic or solenoid valves
- Vacuum Pump or Water Ejector
- CD Cool Down system
- 7” HMI color touch screen with industrial PLC
- On board thermal printer
- Direct clean steam supply from the building
- Onboard steam generators available
- Load Control Probe
- EN 285 (applicable requirements)





Flexible Configuration

Single or double doors, hinged or sliding. Electrical cabinets can be integrated or remote. Technical areas can be left, right, or shared for inline installation of paired units.



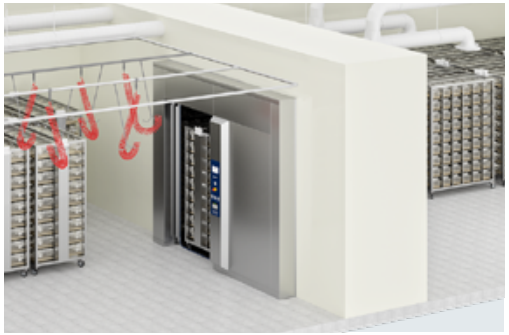
Advanced Eco Option

Engineered for minimal water and energy use, these sterilizers provide best-in-class efficiency, reducing operating costs per load and supporting sustainability goals in lab operations.



Effluent Decontamination Feature

For biohazardous waste (BSL-3/4), condensate is decontaminated before drain discharge to prevent harmful pathogens or viruses from escaping during exhaust and vacuum phases.



Biocontainment Solutions

Double-door sterilizers can be sealed to walls to prevent cross-contamination. Barrier options include air differential seals and bioseal systems for enhanced BSL lab containment.

Decontamination Lock
Multiple Decontamination Method Chamber

The Decontamination Lock is a validated solution for the safe decontamination of heat-sensitive equipment, such as electronic devices, prior to facility entry. Available in single or double door pass-through configurations with glass or stainless steel doors, it supports hydrogen peroxide vapor cycles via onboard or external generators, and can alternatively be connected to a chlorine dioxide generator.



Chamber Dimensions WxDxH

1170 x 2300 x 2150 mm
46 x 90.5 x 84.6 in

Overall Dimensions WxDxH

2400 x 2540 x 2520 mm
94.5 x 100 x 99.2 in

Overall dimensions may vary according to machine configuration and customer requirements.

Key Features

- Single or double door
- Chamber made of corrosion-resistant AISI 316L stainless steel
- Integral inflatable door gasket ensures complete chamber tightness
- Decontamination with SteelcoBelimed H_2O_2 on-board generator
- Sensors for H_2O_2 concentration in chamber and leakage detection
- Catalyzer filter for H_2O_2 with fast aeration
- Changing station or IVC air handling units can be power supply during the cycle thanks to the socket installed in chamber
- 7” HMI color touch screen with industrial PLC
- On-board thermal printer and USB port
- Tele-service and tablet connectivity ready

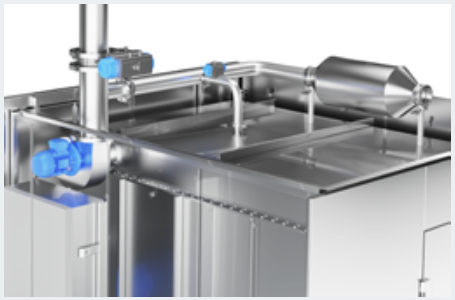
On-board H_2O_2 generator

Fully integrated hydrogen peroxide vapor system shares the main PLC and HMI. Positioned for easy access from the loading side, enabling seamless biodecontamination cycles.



Fast and safe aeration phase

After decontamination, fresh filtered air is injected into the chamber, piping, and generator to quickly reduce H_2O_2 concentration below safe levels for rapid, secure aeration.



Maximized performance
with SteelcoBelimed's experts

Global service support

With a global network of certified service technicians and trusted partners, SteelcoBelimed delivers fast, reliable, and locally available technical support to ensure uninterrupted performance of your critical equipment. Whether it's routine maintenance, emergency service, or performance optimization, we respond with precision and speed.

Certified technical training

Our certified technical training held in our Academies worldwide combines classroom and hands-on learning to equip your team with the skills to operate, maintain, and troubleshoot equipment. Small class sizes ensure personalized instruction, and participants receive a certificate upon completion - boosting capabilities and minimizing downtime.

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Innovate with confidence

DC-PD-02-Steelco BMR Range EN Rev.01.pdf
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The products and technical specifications are subjected to change without prior notice. Please consult your Steelco dealer for the latest information.

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