

Instructions for Use

SteelcoBelimed Protect Cleaning Indicator (PCI)

Product | Art.-No.

Pouch of 200 Indicators– PN: 1108326

Holder, Quantity 1 – PN: 1108327

Application

For routine monitoring of cleaning processes in washer-disinfectors (WDs) with enzymatic detergents.

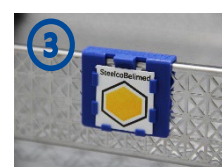
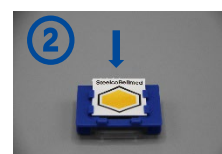
Product Description

The Protect Cleaning Indicator is distinguished by its yellow hexagon, which contains a specially formulated test soil designed to mimic the challenging contamination conditions encountered during medical device cleaning.

The indicator holder is constructed from durable Polyvinylidene fluoride (PVDF) plastic, ensuring it securely holds the indicator throughout processing. Its spring-loaded clip allows easy, reliable attachment to an instrument basket.

Routine Performance Verification Instructions

1. Fold the Protect Cleaning Indicator in half with the yellow hexagon facing outwards. Avoid touching the yellow test area with your hands.
2. Place the Protect Cleaning Indicator into the Protect Cleaning Indicator Holder with the yellow hexagon facing outward, away from the clip.
3. Hang the holder containing the Protect Cleaning Indicator on the basket wall, with the yellow portion of the indicator facing inward toward the chamber.
4. For daily washer cycle performance verification, run the indicator(s) in an empty load to establish a control result.
5. Place one basket containing a testing indicator on each rack level (e.g., top, middle, and bottom) and in varied positions.
6. Ensure each indicator is located within the spray arm coverage area.
7. Load the rack into the automated washer-disinfector chamber.
8. Close the chamber door and start the General Instrument cycle or equivalent program with enzymatic detergent.
9. Upon completion of the cycle, carefully remove the indicator holders from the baskets. Use caution, as items may still be hot.
10. Visually inspect the indicators for any remaining soil residue. The presence of visible soil should be considered a test failure. The removal of all test soil is the desired result and is considered a pass.
11. Evaluate and document test results in accordance with your facility's procedures.
12. If the test fails, troubleshoot and identify the root cause, then repeat the Protect Cleaning Indicator test.



Precautions

Do not reuse the Protect Cleaning Indicator.

Other Applications

For monitoring cleaning processes in high-volume washer-disinfectors (e.g. WD750 and LC80 instrument washers), it is recommended to use at least one indicator per wash spray arm. Depending on the washer's size and configuration, this may require placing more than one indicator on each rack level.

The SteelcoBelimed Protect Cleaning Indicator can also be used in fully loaded instrument cycles. When testing with instruments, ensure the indicator is placed in an unobstructed area with adequate water flow to guarantee accurate results.

Performance Characteristics

Effective cleaning of medical instruments and devices is critical, as the outcome directly impacts the success of subsequent disinfection and/or sterilization processes. Monitoring cleaning performance is particularly crucial in automated washer-disinfectors. Even when process parameters are controlled, variations within the wash cycle can still affect the outcome.

Cleaning efficacy is influenced by several factors, including detergent chemistry, water temperature, exposure time, mechanical action, and wash penetration. An appropriate combination of these variables is necessary to achieve effective cleaning performance.

The SteelcoBelimed Protect Cleaning Indicator (PCI) detects key factors impacting the cleaning process, such as the presence and activity of enzymatic detergents. It is specifically engineered to monitor cleaning performance and verify washing effectiveness in automated washer-disinfectors.

The indicator's performance has been validated by comparing it with the standard test soils performance outlined in the annexes of ISO/TS 15883-5:2005.

Troubleshooting

Variables that may affect Protect Cleaning Indicator results and how to resolve:

Possible Reasons	Recommended Action
Incorrect program selected	Review the washer program setting and confirm that the General Instrument Cycle (or equivalent program) was selected.
Improper indicator placement	Ensure the Protect Cleaning Indicator is positioned correctly within the spray coverage area on each rack level.
Empty, incorrect or expired detergent	Verify that detergent was properly dosed, the correct detergent was used, and the product is within its expiration date.
Spray arm not rotating properly	Confirm the spray arm rotates freely without resistance. Remove and inspect spray arms for clogging or debris.
Reduced water flow conditions	Check for excessive foam formation, pump malfunction, or clogged filters.
Changes in water quality	If facility tap water is used, check water hardness, conductivity (mineral salts content) for any changes.
	If softened or demineralized water is used, verify system performance by testing water pH and conductivity.

Storage and Disposal

Always store Protect Cleaning Indicators in their original packaging. Ensure the pouch is fully resealed after each use.

Improper storage conditions may affect indicator performance, leading to false failures.

1. Store indicators at temperatures between 5–30°C (41–86°F) and at a relative humidity of 5–80% RH.
2. Keep indicators out of direct sunlight
3. Do not store indicators near chemicals or disinfectants. Exposure to chemical vapors may cause polymerization of the indicator material, altering its wash-off characteristics. Even routine exposure to disinfectant vapors from regularly cleaned storage areas may affect indicator performance.
4. Do not use indicators beyond the stated expiration date. Used or expired indicators may be disposed of with normal waste in accordance with local regulations.

For additional technical information, please contact your local SteelcoBelimed representative.

Documentation and Record Keeping

For optimal traceability and record keeping, label each indicator with the following information:

1. After testing, if the result is "Pass," mark the appropriate box and record the technician's initials for documentation purposes.
2. Washer number (Unit #)
3. Rack level (Top, Middle, or Bottom) (Level)
4. Test date (Date)

SteelcoBelimed	
	
Protect Cleaning Indicator	
Pass _____	☐
Unit # _____	
Level _____	
Date _____	
LOT XXXXXXXXXX	