

Effective surveillance for Food and Pharma

NRS II Transwab[®]

Polywipes[™]

Steriswab[™] & SteriKit[™]

Isolation Transwab[®]



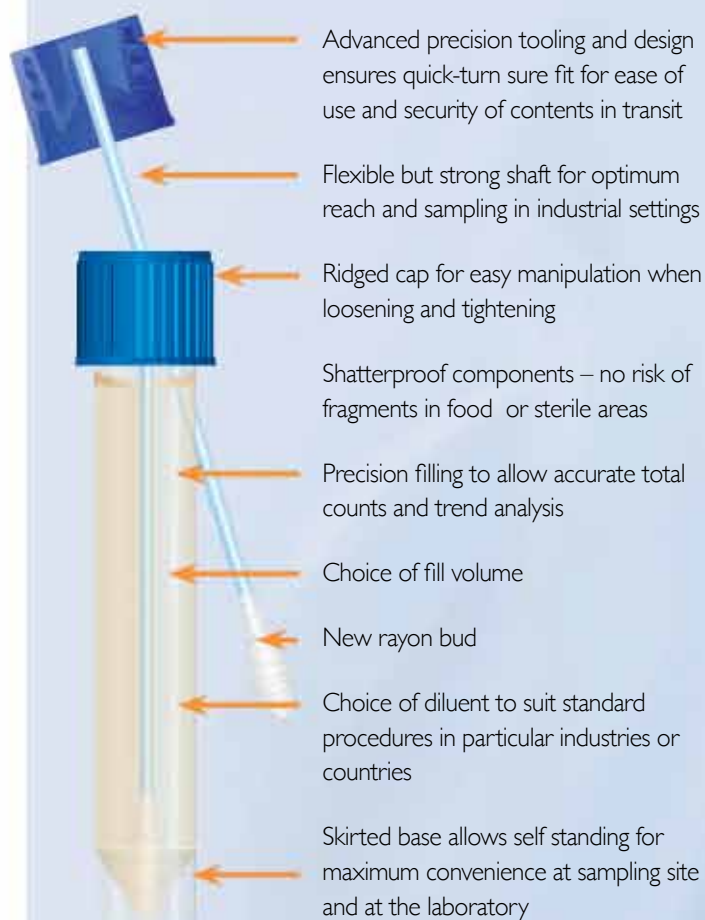
Reliable microbiological sampling of critical surfaces

NRSII Transwab®

Neutralises trace disinfectant

NRS II Transwab® is MWE's name for its range of swab based environmental sampling devices for the food, pharmaceutical, biotechnology and cosmetic industries. There can also be applications in healthcare including the monitoring of infection control measures.

All NRS II Transwab® devices feature MWE's leak proof labelled self standing screw-cap tube made from shatterproof polypropylene, with a high visibility blue shaft swab attached to the cap. The swab features a rayon bud that can remain immersed in liquid, yet retains MWE's high standard for absorption, survival and release of microorganisms. The tubes are prefilled with the specified volume of solution and there is a choice of NRS, MWE's classic neutralising rinse solution, and a range of alternative buffers and media appropriate for particular applications.



NRS (Neutralising Rinse Solution)

NRS Medium contains lecithin, polysorbate 80, and sodium thiosulphate in a peptone phosphate buffer. The formulation conforms to ISO 18593 and will neutralise most disinfectants used in the food industry, including those based on chlorine, peroxygen compounds, amphoteric, biguanides, and glutaraldehyde. This is a universal neutralising solution suitable for testing most disinfected areas within the food, cosmetic and pharmaceutical industries. Precise fill volumes allow accurate quantitative assessment of contamination levels.

Buffered Peptone Water

Buffered Peptone Water contains peptone and sodium chloride, with a phosphate buffer, and is used for the recovery of *Salmonella*, especially in environments where they may have been sub-lethally injured.

Butterfield Buffer

Butterfield Buffer (also called Butterfield's Solution or Butterfield's phosphate buffered dilution water) contains potassium phosphate as specified by APHA and FDA, and is used in standard methods for the enumeration of bacteria and fungi in foods, water and pharmaceutical products. The standard formulation has been modified by the inclusion of a low level of peptone to reduce osmotic shock, and polysorbate 80 as a surfactant to assist the sampling process.

Lethen Broth

Lethen media are used to determine the bactericidal efficacy of quaternary ammonium based disinfectants.



Effective sampling of food contact surfaces after cleaning



Letheen broth is a growth medium recommended by the FDA for use in the microbiological testing of cosmetics, and the formulation is as described in the FDA Bacteriological Analytical Manual. Polysorbate 80 and lecithin are included to partially neutralise the preservatives commonly found in cosmetics.

MRD (Maximum Recovery Diluent)

Also called Peptone Saline. Maximum Recovery Diluent is an isotonic and protective medium for maximum recovery of microorganisms from environmental and food sources. It is also the recommended diluent for the sampling of carcasses in the European Union.

Tryptic Soy Broth

Tryptic Soy Broth is a general purpose recovery medium with excellent growth properties for aerobes, anaerobes, and some fungi. It is widely used for sterility testing, particularly in pharmaceutical manufacturing.

NRS without Sodium Thiosulphate

Some testing methods (such as Petrifilm®) require medium without thiosulphate.

Choice of fill

NRS medium and variants are available in a choice of 3 fill sizes

- 10ml and 5ml are used with standard and filtration methods.
- 1ml can be used directly with Petrifilm®, and other direct pour plating techniques



Polywipes™

Premoistened sponge swabs for sampling large areas



Polywipes™ are sterile premoistened blue sponge swabs, ready to use and highly effective for the sampling and microbiological assessment of a wide variety of surfaces.

Polywipes™ are manufactured from a special sponge material containing no inhibitory substances, so that maximum recovery and detection of microorganisms is assured. The sponge format is convenient for sampling larger flat or irregular surfaces, such as conveyor belts and machine parts, as well as floors, walls, drains and ceilings .

Polywipes™ are premoistened with phosphate buffer, or any of a selection of other buffers, and individually sealed in a easy-to-open tamper evident peel pouch. The bright blue colour ensures they cannot be easily lost in critical areas, while the structure within the sponge prevents shedding of fragments due to abrasion.

Polywipes™ are also convenient to store at room temperature, and can be carried individually to the sites for testing. They are triple packed, and terminally sterilised by gamma irradiation.

Using sterile gloves, which can be supplied, the sponge is used to sample the surface being tested. Any traces of disinfectant are quickly neutralised, either by simple dilution, or by direct interaction with the neutralising components of the liquid. After use and transportation, they are readily processed in the laboratory by any of a number of standard techniques.

Polywipes™ have been the subject of many studies, including recovery performance with *Salmonella*, *Listeria*, MRSA, *Acinetobacter*, and *Clostridium difficile*.

New

- Range of premoistening buffers.
- Standard (Phosphate buffer)
- NRS - neutralising rinse solution
- Lethen Broth
- BPW- Buffered Peptone Water
- Peptone Saline (for carcass swabbing)

Key features

- Sterile - guaranteed by irradiation
- Triple packed for controlled handling
- Bright blue sponge (highly visible - does not get lost)
- Resistant to abrasion
- Non-inhibitory - optimum recovery of target microorganisms
- Premoistened with choice of buffers
- Room temperature storage
- Individually wrapped - tamper evident packaging
- Variety of formats (gloves, bags, etc)
- Scientifically attested



Effective sampling of larger food contact surfaces and carcasses

Wide range of applications throughout food and pharmaceutical manufacturing and processing

Food & Pharmaceutical Manufacturing

Sponge swabs are especially recommended for the sampling of larger areas for the detection of controlled pathogens such as *Listeria*, *Salmonella* and coliforms. They are very useful for sampling irregular surfaces such as drains and machine casings, and also for larger areas such as conveyor belts and preparation benches.

Polywipes™ with standard phosphate buffer has been widely used for many years, and is the most suitable formulation for most applications. There are some situations, whether specified by regulations, or the requirements of particular retailers, where alternative wetting solutions are required. To meet these requirements, Polywipes™ are now also available with Neutralising Rinse Solution (NRS™), Buffered Peptone Water (BPW) or Letheen Broth. NRS™ is a peptone solution containing the neutralisers sodium thiosulphate, polysorbate 80, and lecithin, and is often specified for standard swab sampling. Buffered Peptone Water is recommended where *Salmonella* is a particular target on food contact surfaces. Letheen Broth is a growth medium which also contains the neutralisers lecithin and polysorbate 80, and is recommended by the FDA for environmental testing for the cosmetic industry. Peptone Saline (also called Maximum Recovery Diluent – MRD) is available as the wetting solution with Polywipes™ Carcass Swabs (see below).



Carcass swabs

European and international standards (including (EC) No. 2073/2005) require the regular sampling of the carcasses of cattle, sheep, pigs, goats and horses using sponge swabs. Polywipes™ Carcass Swabs are premoistened with Peptone Saline specially formulated (ISO 17604 & ISO 6887) to comply with these regulations. They can be supplied complete with gloves, resealable bags, and preprinted label for recording required details such as Farm, Species, Length and Reference Number.



SteriKit™

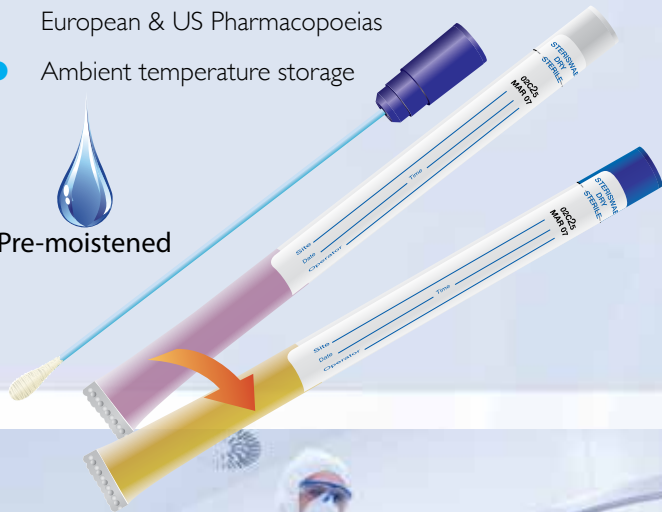
For sterile manufacturing areas

SteriKit™ is a swab based system for the detection of microbial contamination in sterile production facilities.

Samples are collected using Steriswab™ premoistened swabs, and inserted into the SteriKit™ tubes containing an enriched semi-solid medium with colour change growth indicator. Upon incubation any bacteria will grow and cause the colour of the medium to change from purple to yellow within 48 hours.

The time taken will depend on the number of organisms, but in the event of any colour development, the swab and medium can be used for further investigation by conventional or molecular microbiological techniques.

- The product is triple wrapped to allow sterile handling in controlled areas, and sterilised by irradiation.
- Colour-change indication of microbial growth
- Enriched growth medium for enhanced detection for low numbers
- Premoistened swab for effective sampling
- Formulated and tested in accordance with UK, European & US Pharmacopoeias
- Ambient temperature storage



Steriswab™

Sampling for critical surfaces

Steriswabs™ are designed for sampling of critical surfaces including nozzles and equipment in sterile production units in hospitals and in the pharmaceutical industries. They are also particularly useful for surveillance of clean and food contact surfaces in the food manufacturing industry.

Steriswabs™ have a rayon bud on a blue plastic shaft, and are premoistened with a sterile phosphate buffer. The moistened bud improves the recovery of any microorganisms from the test surface, even if present in low numbers. The swabs have a 45mm breakpoint allowing them to be readily transferred into other test systems.

Steriswabs™ are triple wrapped for sterile handling in controlled premises, and are sterilised by irradiation.



Pre-moistened

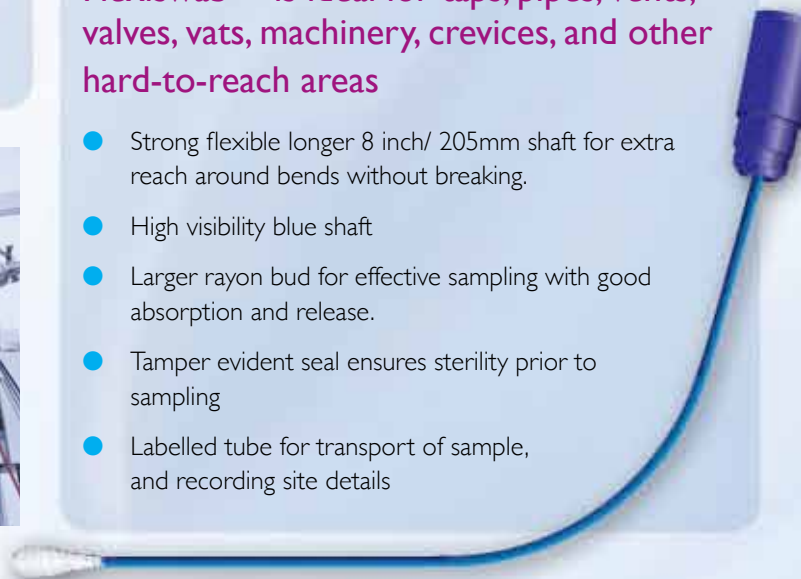


Flexiswab™

Longer flexible-shafted swab

Flexiswab™ is ideal for taps, pipes, vents, valves, vats, machinery, crevices, and other hard-to-reach areas

- Strong flexible longer 8 inch/ 205mm shaft for extra reach around bends without breaking.
- High visibility blue shaft
- Larger rayon bud for effective sampling with good absorption and release.
- Tamper evident seal ensures sterility prior to sampling
- Labelled tube for transport of sample, and recording site details



Effective sampling of critical surfaces in sterile production

Isolation Transwab®

Active surveillance for *Listeria*, *Salmonella* & Coliforms with Isolation Transwab®

MWE's Isolation Transwabs® are a unique, convenient and cost-effective range of self-contained environmental sampling swabs.

The kits includes a swab for sampling the surface, which is then placed in the provided tube of coloured gel medium, which in turn changes colour if positive.

- Easy read colour change
- Positive results generally available within 24 hrs*
- Self – contained
- Individually packed – easy to carry to test areas
- Ambient storage
- 12 months shelf-life

**Allow further 24 hrs to confirm negative results*

Listeria Isolation Transwab®

Result can be available within
24 hrs (max 48 hrs)

Colour change for positive:
STRAW to BLACK



Salmonella Isolation Transwab®

Result can be available within
24 hrs (max 48 hrs)

Colour change for positive:
RED to BLACK



Coliform Isolation Transwab®

Result can be available within
24 hrs (max 48 hrs)

Colour change for positive:
PURPLE to YELLOW



Hygiene Swab™

Similar to Isolation Transwab® but used as indicator for gross microbial contamination.

Result available within 8 - 12 hrs

Colour change for positive: RED to YELLOW



Effective surveillance for key pathogens

NRS II Transwab®

Code	Diluent	Volume in Tube	Pack Size
MW784	NRS Neutralising Rinse Solution	5ml	50
MW785	NRS Neutralising Rinse Solution	10ml	50
MW786	NRS Neutralising Rinse Solution	1ml	50
MW782	NRS without Sodium Thiosulphate	1ml	50
MW783	NRS without Sodium Thiosulphate	10ml	50
MW776	Buffered Peptone Water	10ml	50
MW777	Buffered Peptone Water	5ml	50
MW778	Tryptic Soy Broth	5ml	50
MW779	Tryptic Soy Broth	10ml	50
MW780	Butterfield Buffer	10ml	50
MW781	Butterfield Buffer	5ml	50
MW792	Lethen Broth	10ml	50
MW793	Lethen Broth	5ml	50
MW794	Lethen Broth	1ml	50
MW796	MRD (Maximum Recovery Diluent)	10ml	50
MW797	MRD (Maximum Recovery Diluent)	5ml	50
MW798	NRSII Tube, Dry No Swab, screw cap vial	Empty	50
MW799	NRSII Tube, Dry with blue swab, screw cap vial	Empty	50

Polywipes™ Pre-moistened sponge swab

Code	Format	Formats	Pack Size
MW723	In peel pouch with NRS,	A, B	50
MW724	In peel pouch with Lethen Broth,	A, B, TB	50
MW728	In 110ml Polycarbonate container		50
MW729	Standard with phosphate buffer in peel pouch	A, B, C, TB	50
MW727	With cord in peel pouch	A, B, TB	50
MW726	With Peptone Saline for Carcass sampling	A, B, TB	50

Additional formats available:

- A** with sterile resealable bags (50) **B** with sterile resealable bags & gloves (50 of each)
C with sterile resealable bags (50) & gloves (100) **TB** with sterile re-sealable twistbags & gloves (50 of each)

Flexiswab™

Code	Pack Size
MW159	Flexiswab™, 8 inch (205mm) strong flexible blue shaft with larger rayon bud, labelled tube 100

Isolation Transwabs®

Code	Pack Size
MW504125	Hygiene Swab 125
MW50425	Hygiene Swab 25
MW503125	Coliform Isolation Transwab® 125
MW50325	Coliform Isolation Transwab® 25
MW570125	Listeria Isolation Transwab® 125
MW57025	Listeria Isolation Transwab® 25
MW572M125	Salmonella Isolation Transwab® 125
MW572M25	Salmonella Isolation Transwab® 25

Steriswab™

Code	Pack Size
MW720/100	Individual pre-moistened blue, breakpoint swab, labelled tube 100
MW720	Individual pre-moistened blue, breakpoint swab, labelled tube 250
MW730	Individual blue, breakpoint swab, labelled tube 250
MW735/I	Single blue, breakpoint swab in peel pouch 100

SteriKit™

Code	Pack Size
MW750	Sterikit™ Indicator swab system for sterility testing of surfaces in Pharmaceuticals (Triple Wrapped) 50

