

MAST URI® CONNECT

The Connected Solution for Urine Microbiology

- Direct Susceptibility Testing Results in 18 hours
- Phenotypic Results Analysis ID, AST and AMR
- End-to-End Sample Traceability
- Integrated EUCAST-aligned Reading Rules
- New Front-End Automation



Urinary Tract Infections (UTIs) are one of the most common conditions presenting in primary healthcare. Traditional methods of urine culturing are labour intensive and slow. Laboratories are often left facing rising sample numbers with the expectation of faster turnaround times, often without additional resources.

The MAST URI® CONNECT system provides a connected solution to Urine Microbiology.





MAST URI® AUTOPREP CONNECT



1. Sample preparation

Mast Uri® CONNECT provides laboratories with the opportunity to select from three sample dispensing options. Consistent with all options is the use of a barcoded template, a Urine Specimen Plate (USP). This bridges the gap in sample traceability, connecting the barcoded patient samples to the barcoded Mast Uri® Plates.

The three dispensing options are:

Mast Uri® Well Connect

A semi-automated dispensing aid that simplifies workflow, initiates end-toend traceability and aids in accurate sample dispensing.

Mast Uri® Prep Connect

Utilising the Mast Uri® Well Connect, this option allows for a user to perform sample preparation while simultaneously freeing up the Mast Uri® Plus Connect for plate reading and result validation.

Mast Uri® Autoprep Connect

A fully-automatic, walkaway dispensing solution that frees up valuable laboratory team members, making this ideal for larger throughput requirements.

2. Sample inoculation

Following the completeion of the dispesning process, the Urine Specimen Plate (USP) is then used to inoculate bespoke Mast Uri® Plate Sets using multipoint inoculation. Mast Uri® Dot Connect utilises barcode readers for both the USP template and Mast Uri® Plates to facilitate end-to-end traceability, and tracks pin sterilisation through audited disinfection cycles.



MAST URI® DOT CONNECT



MAST URI® PLUS CONNECT

3. Sample capture

Once incubated, the Mast Uri® Plates are imaged on the Mast Uri® Plus Connect, with images and sample information being imported into the database for validation. The Mast Uri® Plus Connect saves precious bench space by incorporating a built-in PC, boasts a high-resolution camera for sharper image capture and possesses refined software for seamless sample analysis.

4. Sample validation

The overhauled Mast Uri® Connect software has been built from the ground up, focusing on greater accessibility, streamlining workflow and having a strong focus on traceability. It encompases EUCAST expert reading rules, assisting in the exporting of clincally relevent results. The combination of sharper images and an all-encompassing sample analysis screen, ensures an efficient validation process presenting a complete collection of sensitivity and identification.



Once validated, samples are exported to LIMS and the Mast Uri® Connect can be fully interfaced.

Next Generation Urine Analysis Get CONNECTed

Alcohol decontamination container

MAST URI® CONNECT has intergrated a mandatory sterilisation step between inoculation of plate sets, which aids in preventing cross-contamination

Ability to track samples

End-to-end traceability is a fundamental aspect of the MAST URI® CONNECT with integrated barcode scanners enabling seamless information transfer between the whole suite of instruments

Single samples can be exported

With advanced software, MAST URI® CONNECT can now export single samples providing increased flexibility for an improved validation experience

MAST URI® CONNECT

The enhancements to the user interface on the MAST URI® CONNECT allows for manual entry of typed notes at both sample dispensing and result validation

Ability to add notes to samples

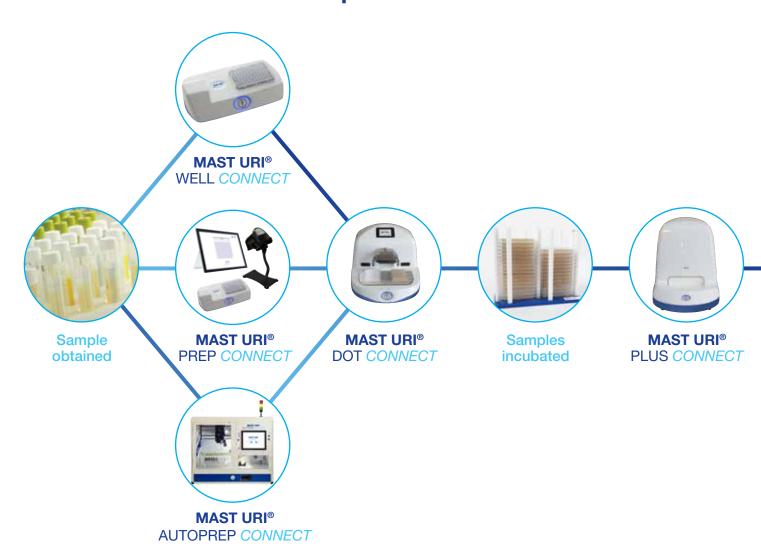
Integrated fail-safes, including an incubation warning signal, decreases likelihood of user error and improves workflow consistency across the whole system

Warning signals for plates incubated less than 18 hours MAST URI® CONNECT boasts a higher resolution camera providing high quality images allowing for more enlarged well images during result validation

Improved imaging

The MAST URI® CONNECT reduces staff processing time by up to 70%¹

MAST URI® CONNECT process > 18 - 24 hours



Traditional process > 36 - 48 hours



MAST URI® CONNECT is a sustainable alternative to the traditional process with an 85% reduction in plastic + 96% reduction in agar waste.²

Our MAST URI® PLATES are produced according to current EUCAST breakpoint guidelines with an average 100% sensitivity and 93.3% specificity.3

The new MAST URI® CONNECT builds on its renowned predecessor the MAST URI® SYSTEM.

By using fewer consumables
MAST URI® CONNECT streamlines
urine AST and saves on
storage space.



Organism ID and AST sensitivity



Introducing MAST URI® AUTOPREP CONNECT



Specimen tube compatibility

A range of different sample tubes can be processed, including: BD vacutainers®, Sterilin™ Monovettes and ISS Urine Containers.



Easy Setup

Internal deck layout is desgined for rapid loading and easy cleaning for a faster workflow.



Front-end Automation



Barcode recognition

Integrated barcode readers allow the device to maintain full end-to-end traceability for tracking of samples.



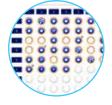
Automatic Decapping

Decaps all samples reducing the likelihood of crosscontamination from manual handling and reduces risk of RSI



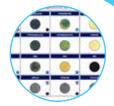
Vortexing and Pipetting

Automatic vortexing and liquid level detection of each sample occurs before sample aspiration and dispensing.



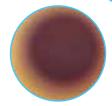
Improved user interface

Upgraded software technology and a new LED touch screen monitor provides customers with improved accessibility.



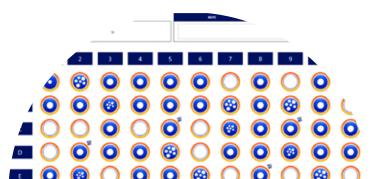
Simplified workflow process

Simultaneously display ID, sensitivity data, patient demographics, EUCAST reading rules and manual typed notes.



High quality well images

Higher resolution images with the new zoom function greatly enhances efficiency for validation, further reducing reporting times.



New MAST URI® Connect Interface

Product Specifications

MAST URI® CONNECT full machine product range.

MAST URI® AUTOPREP CONNECT



MAST URI® WELL CONNECT



MAST URI® PREP CONNECT



Weight	

200 kg

1.2 kg

Tablet: 0.80 kg USB Hub: 0.52 kg Well Connect: 1.2kg

Dimensions

1450W × 650D × 1088H mm

300W x 150D x80H mm

Tablet: 292W x 8.5D x 201H mm

Power requirements

240 VAC, 50/60 Hz, 500 W

URIAUTOPREPCONNECT

USB powered

USB Hub: 130W x 30D x 70H mm

Connectivity

Product code

Ethernet, USB

240 VAC, 50/60 Hz, 199 W

URIWELLCONNECT

Ethernet, USB URIPREPCONNECT

MAST URI® DOT CONNECT



MAST URI® PLUS CONNECT



MAST URI®

PLUS CONNECT Hardware



11.5 kg 380W × 415D x 290H mm 100-240 VAC, 47-63 Hz URIDOTCONNECT

21.5 kg 522W × 522D × 671H mm 100-240 VAC, 50-60 Hz, 4.0A USB, Ethernet, Display Port URIPLUSCONNECT



3.9 kg $565W \times 175D \times 433H \text{ mm}$ 90-264 VAC, 50-60 Hz, 25 W USB, Ethernet, Display Port URIPLUSCONNECT

Flexible. Traceable. Sustainable. The connected solution to Urine Microbiology.

MAST URI® CONNECT

References:

- 1. Pathology in Practice. Streamlining urine microbiology: the Northampton experience. Vol 13(3) 2012.
- 2. Mast Group Ltd. Study conducted comparing 14 MPM plate set to 96 Petri dishes. 2023.
- 3. Microbe 2022. Comparative clinical performance of MAST URI Plates and Disc Diffusion. 2022.



IVD solutions through partnership

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