

Automated Urinalysis Solution

UN-Series™

The Complete
Urinalysis Solution



Together for a better
healthcare journey

A photograph of a male scientist with grey hair and a beard, wearing glasses and a white lab coat over a blue shirt. He is focused on operating a piece of laboratory equipment, likely a Sysmex UN-Series analyzer. The background is a blurred laboratory setting with various pieces of equipment. A large, semi-transparent white circle is overlaid on the left side of the image, framing the text.

This is the art of **Urinalysis**

At Sysmex, we believe that creating scalable and modular analyzers — customized for each laboratory's needs — is an art form. The Sysmex UN-Series is a fully scalable solution, delivering a comprehensive assessment of urinalysis results. With fluorescent flow cytometry technology at its core, the Sysmex UN-Series offers an innovative solution for any laboratory.

Picture perfect: A scalable workflow for your lab

First-pass accuracy and new workflow efficiencies built around the unique needs of your lab

- Modular instrument configurations offer flexibility to manage a wide range of workflow needs for your changing lab
- Customizable reflex rules ensure seamless urinalysis workflow and reduced manual microscopies
- Minimize risk of procedural errors through standardization and reduction of manual processes

Craft the perfect solution for your lab



Siemens CLINITEK Novus® Automated Urine Chemistry Analyzer

The CLINITEK Novus analyzer combines proven dry-pad urine chemistry technology, easy-to-load, radio frequency identification (RFID) labeled test card cassettes and a throughput of up to 240 samples/hour to help ensure standardized urinalysis test results and maximum productivity in busy laboratories. Offering nine chemistry tests plus specific gravity, color and clarity, as well as new software and system features like automatic color correction and test card humidity checks, the Novus delivers consistent, high-quality results.



Sysmex UF-5000™ Fully Automated Urine Particle Analyzer

Using fluorescent flow cytometry, the UF-5000 delivers accurate, precise and reliable urine particle counts for rapid screening and auto-validation of samples. The UF-5000's powerful blue laser, along with four different optical measurements, provides greater sensitivity and specificity to aid in particle detection and identification which provides users a completely automated 5-part microscopic.



Sysmex UD-10™ Fully Automated Urine Particle Digital Imaging Device

The UD-10 captures particle images from urine samples with fully automated digital imaging. Using stage scanning technology, the UD-10 can help you confidently confirm the presence of abnormalities and verify flagging from the UF-5000. The microscope quality images provide a clear view of urine particles and reduce the need for manual sediment microscopy.



Sysmex Urinalysis Data Manager (UDM)

The UDM is an intelligent data management program, providing users with an intuitive and streamlined interface for urinalysis test results from the UF-5000, UD-10 and Siemens CLINITEK Novus devices. The UDM supports auto-validation of results through rule-based judgments, as well as quality control management and the manual classification of urine particle images captured with the UD-10.



BeyondCareSM Quality Monitor for Urinalysis (BCQM)

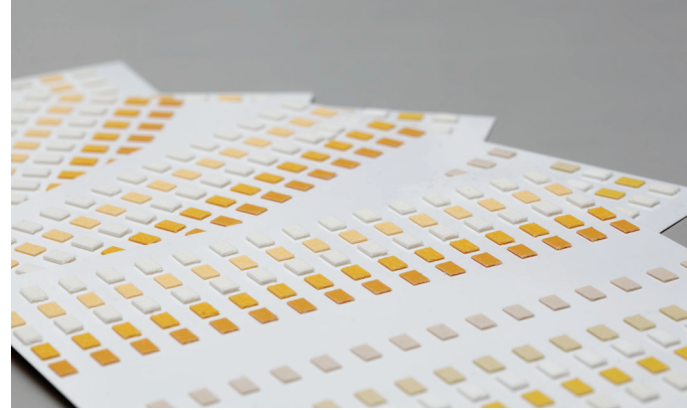
In everyday operation, the BCQM program increases laboratory efficiency with automated urinalysis quality control management. Quality control (QC) interpretation is simplified through an intuitive, color-coded dashboard and operator alerts when QC needs to be performed or has exceeded acceptable limits. Shift activity and QC statistical reports support and enhance regulatory compliance activities, providing your laboratory confidence in urinalysis result quality.

Siemens CLINITEK Novus

State-of-the-art automation

Trusted results, ease of use and reliability

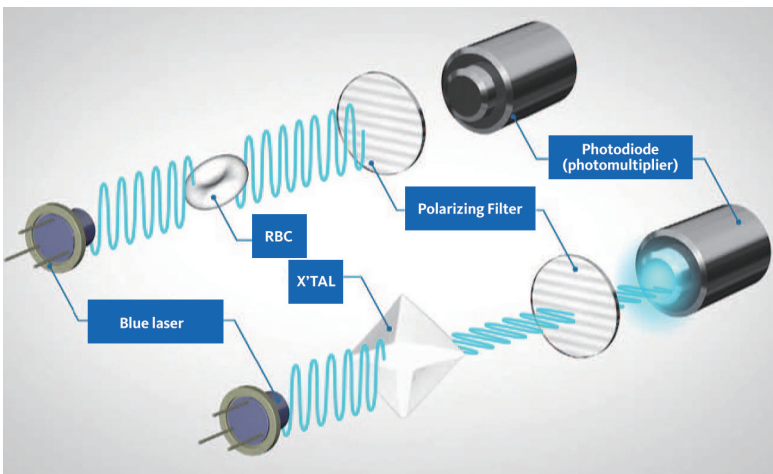
The Siemens CLINITEK Novus is an automated urine chemistry analyzer employing robust automation and innovative technology that provides extended on-board stability of reagent cards. The Novus automatically corrects for abnormal sample color and protects the accuracy and integrity of test results by performing a humidity check on the reagent test card prior to each patient test. The CLINITEK Novus can be configured and integrated with the Sysmex UN-Series, a customized and scalable urinalysis testing solution. Additionally, CLINITEK Novus uses common dry pad analytes, providing standardized results throughout your laboratory network regardless of testing volumes. Chek-Stix® Urinalysis Liquid Quality Control*, a liquid-ready urinalysis solution, is validated for the CLINITEK Novus for QC.



Sysmex UF-5000 — Enhanced detection

The UF-5000's advanced technology offers sensitivity and specificity in particle detection and identification. The powerful, 488nm blue laser and Depolarized Side Scatter (DSS) detector offer enhanced discrimination of crystals and RBCs. When combined with additional light scatter patterns from the flow cell, the resulting scattergrams provide enhanced flagging and abnormal population detection. The UF-5000 can provide a completely automated 5-part microscopic on all urinalysis samples, or be performed as a reflex based on the results of the CLINITEK Novus.

With increased workflow standardization, labs can analyze native urine without centrifugation or pre-treatment, avoiding common sources of errors and extensive hands-on processing.



*Not available in Canada

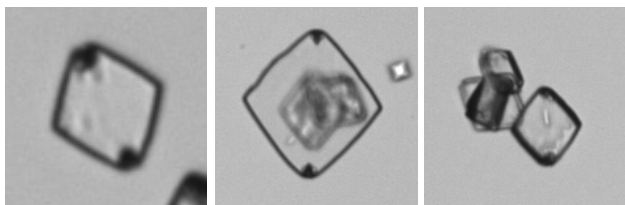
Sysmex UD-10 — Images worth a thousand words

Free your staff from time-consuming manual sediment microscopies by automating the capture of urine particle digital images. As an integral part of the UN-Series Automated Urinalysis Solution, the UD-10 employs a high-performance digital camera to capture microscope-quality images from samples flagged by the UF-5000. The UD-10 images are organized and displayed by particle size, which allows the operator to efficiently identify the particle type without the need to spend additional time correcting and reclassifying particles. Gentle sedimentation by gravity helps preserve fragile elements and decreases processing time, while the ability to view individual particles and whole field images instills greater confidence in result interpretation.

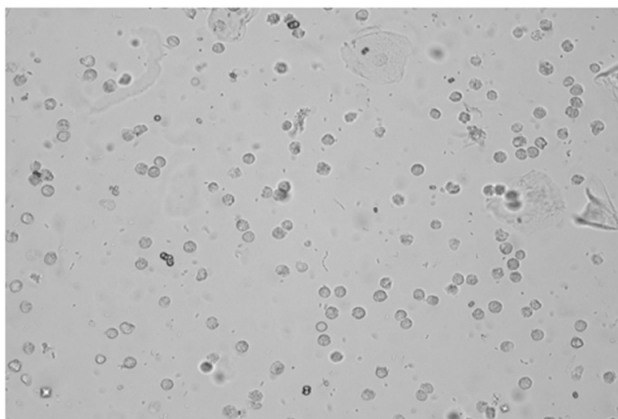
Microscope-quality images with particle grouping by size streamlines review of abnormal elements and simplifies start-to-finish urine sample processing.



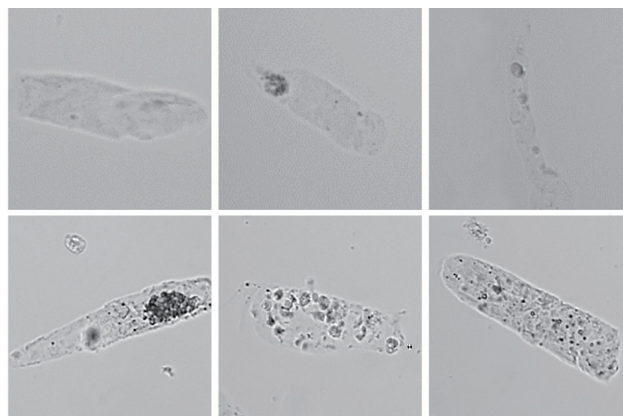
Fungal forms



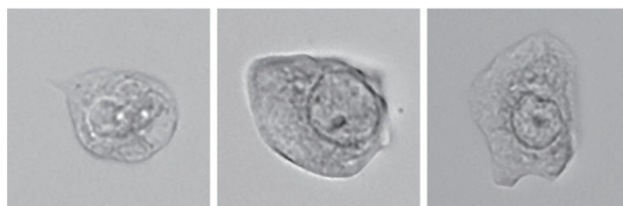
Crystals



Full field



Casts



Epithelial cells



Sysmex UD-10™



Sysmex UF-5000™



Siemens CLINITEK Novus®

Compose the distinctive, scalable solution for your lab

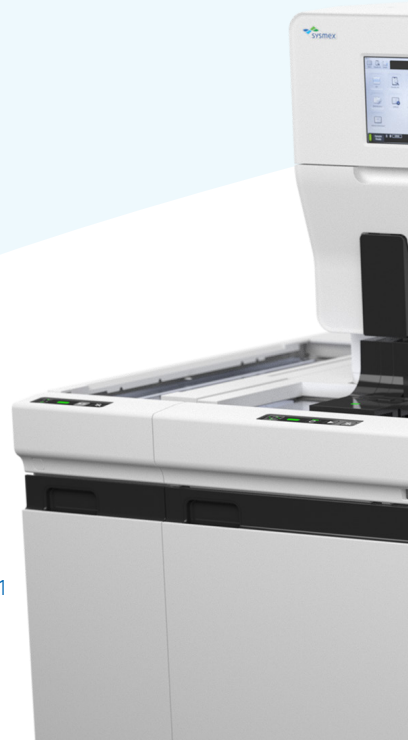
Create the workflow you want. The UN-Series offers the freedom of start-to-finish urinalysis workflow with maximum flexibility. As your laboratory's needs change, upsizing or downsizing is simple. Modular configurations efficiently allow for increased or decreased throughput.



UN-3000N-111



UN-9000N-121



UN-9000N-221



Siemens
CLINITEK
Novus



UN-2000N-011



UF-5000



Attention to the details

Siemens CLINITEK Novus®

Technology

- LED light source and digital camera increase optical system longevity and overall uptime
- Digital camera determines sample color for automatic color correction feature
- Proven dry-pad technology provides standardization across Siemens urine chemistry analyzers

Aspiration volume

- 0.5 mL in sampler mode

Minimum required volume

- 2.0 mL per sample

Throughput

- Up to 240 samples/hour

Reagents

- CLINITEK Novus 10 urinalysis cassette

Calibrator and controls

- CLINITEK Novus Calibrators
- Chek-Stix® Urinalysis Liquid Quality Control (Not available in Canada)

Parameters

Test strip parameters:

- Glucose
- Bilirubin
- Ketone
- Blood
- pH
- Protein
- Urobilinogen
- Nitrite
- Leukocytes
- Color

System parameters:

- Specific Gravity (S.G.) and clarity

Sysmex UF-5000™

Technology

- Fluorescence flow cytometry with 488nm semiconductor laser and hydrodynamic focusing classifies cells by analyzing forward scatter light (FSC), side scatter light (SSC), side fluorescent light (SFL) and depolarized side scattered light (DSS)

Aspiration volumes

- 0.45 mL in sampler mode
- 0.45 mL in STAT mode

Minimum required volumes

- 2 mL in sampler mode
- 0.6 mL in STAT mode

Throughput

- Up to 105 samples/hour

Reagents

- UF-CELLSHEATH™
- UF-CELLPACK SF™
- UF-CELLPACK CR™
- UF-Fluorocell SF™
- UF-Fluorocell CR™

Controls

- UF CONTROL™ (2 levels)

Parameters

Five reportable parameters:

- RBC
 - WBC
 - Epithelial Cells (EC)
 - Casts (CAST)
 - Bacteria (BACT)
- #### Five flagged parameters:
- Sperm
 - Yeast like cells (YLC)
 - Pathologic casts (Path.CAST)
 - Crystals (X'TAL)
 - Mucus

Sysmex UD-10™

Technology

- Stage scanning with CCD camera image capture capability

Aspiration volumes

- 0.3 mL in sampler mode
- 0.3 mL in STAT mode

Minimum required volumes

- 1.6 mL in sampler mode
- 0.6 mL in STAT mode

Throughput

- 50 samples/hour (normal mode)

Reagents

- UF-CELLSHEATH™

Controls

- UF CONTROL™ (2 levels)

Parameters

- 8 particle classes based on size

Sysmex Corporation

1-5-1 Wakinohama-Kaigandori Chuo-ku, Kobe 651-0073, Japan · Phone +81 78 265-0521 · www.sysmex.co.jp

Sysmex America, Inc.

577 Aptakisic Road, Lincolnshire, IL 60069, U.S.A. · Phone +1 800 379-7639 · www.sysmex.com/us

Sysmex Canada, Inc.

5700 Explorer Drive Suite 200, Mississauga, ON L4W0C6 Canada · Phone +1 905 366-7900 · www.sysmex.ca

Sysmex Latin America and the Caribbean

Rua Joaquim Nabuco 615 - Bairro Cidade Jardim, São José dos Pinhais Paraná - Brasil - CEP 83040-210 · Phone +55 41 2104-1314 · www.sysmex.com.br