

BS-600M

Chemistry Analyzer

Technical Specifications

System Function:

Throughput: 600 photometric tests per hour, up to 800 tests per hour with ISE

Measuring principles: Absorbance Photometry, Turbidimetry

On-board tests: up to 77 photometric tests + 3 ISEs+ 3 serum indices

Methodology: End-point, Fixed-time, Kinetic, ISE

Sample Handling:

SDM: 120 samples by 12 racks, sample continuous loading, STAT in priority

Sample volume: 1.5~45 μ L, step at 0.1 μ L

HbA1c sample: Whole blood for HbA1c test

Sample probe: Liquid level detection, clot detection and collision protection

Reagent Handling:

Reagent tray: 80 positions with cooling system (2~8 $^{\circ}$ C)

Reagent volume: 10~200 μ L, step at 0.5 μ L

Reagent probe: Liquid level detection, bubble detection and collision protection

Built-in Bar Code Reader:

Sample and reagent bar code readers support Codabar, ITF (Interleaved Two of five), Code 128, Code 39, UPC/EAN and Code 93;

Capable to connect with LIS in the bi-directional mode

Reaction System:

Reaction volume: 70~300 μ L

Reaction temperature: 37 $^{\circ}$ C with 0.1 $^{\circ}$ C fluctuation

Reaction cuvettes: 124 reusable cuvettes with 8-step auto wash

Optical System:

Light source: Tungsten-halogen lamp

Photometer: Grating photometer

Wavelength: 16 wavelengths (340nm, 380nm, 412nm, 450nm, 480nm, 505nm, 546nm, 570nm, 605nm, 630nm, 660nm, 700nm, 740nm, 770nm, 800nm, 850nm)

Absorbance range: 0~3.5Abs(10mm conversion)

Control and Calibration:

Calibration mode: Linear(one-point, two point and multi-point), Logit-Log 4P, Logit-Log 5P, Spline, Exponential, Polynomial, Parabola

Control rules: Westgard multi-rule, Twin plot

Operation Unit:

Operation system: Touch screen(optional), Windows 10(64bit)

Interface: RS-232, Network Port, USB/ parallel port

Working Conditions:

Power Supply: 200~240V, 50/60Hz, 1700VA or 110/115V, 60Hz, 1700VA

Temperature: 15~30 $^{\circ}$ C

Humidity: 35~85%

Dimension: 1380mm(length)*860mm(width)*1200mm(high)

Weight: 350kg



www.mindray.com

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BS-600M

Chemistry Analyzer

Powerful yet Efficient



BS-600M

Powerful yet Efficient

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BS-600M



Flexible Sample Management

- Sample batch transfer
- Continuous sample loading by racks
- STAT Priority
- Quick rerun



HbA1c Tests with Whole Blood

- NGSP certified and IFCC traceable
- Onboard hemolysis without sample preparation
- No significant interference from Hb variants
- Lower detection limit of Hb, less rerun rate



Integrated ISE Module

- 1 blood tube for electrolytes and photometric chemistry tests
- long-life of ISE electrodes
- Easy operation and maintenance



Reliable Testing System

- World-class and excellent sigma metric performance with original reagent
- Intelligent abnormal reaction detection, alarming and auto-rerun to minimize erroneous results

Small Footprint :

1.2m²

Photometric 600T/H
up to 800T/H with ISE



HbA1c Tests with Whole Blood



Onboard hemolysis with whole blood to improve working efficiency

No manual pretreatment to reduce biohazardous risks and human errors

120 T/H for HbA1c test to shorten turn-around-time

Flexible Sample Management

Continuous Sample Loading

Sample continuous loading by racks
Up to 120 sample positions
long walk-away time



Quick Start for Sample Rerun

Auto start for sample test
Automatic priority for STAT and rerun

STAT Priority

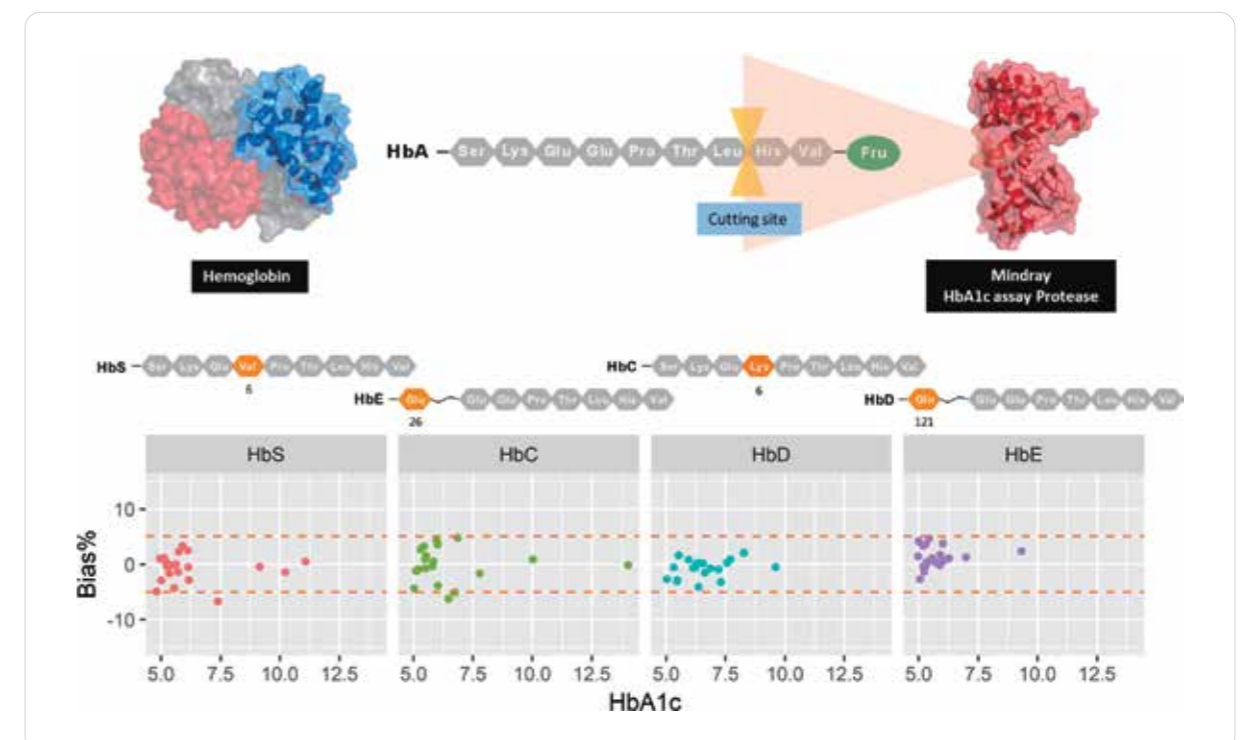
Dedicated STAT position, 1 minute aspiration
Quick report ISE+CO2 results in 7 minutes

Smart Dilution

Patented smart dilution function
Faster report

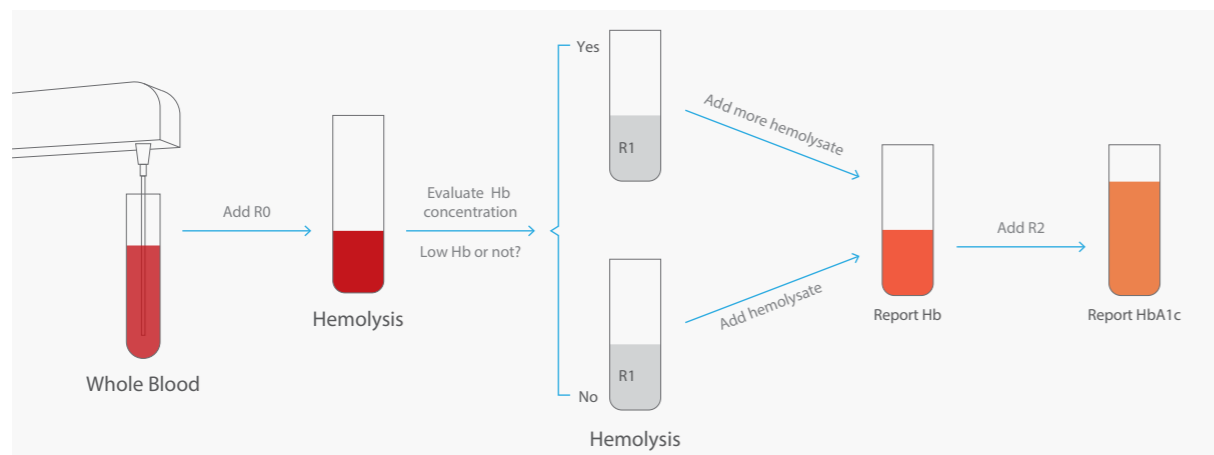
Mindray HbA1c reagent with enzymatic method can specifically detect glycated N-terminal amino acids from the hemoglobin beta-chains, which can effectively avoid interference from Hb variants (HbS, HbC, HbE and HbD) and other Hb derivatives (labile HbA1c, carbamylated Hb, and acetylated Hb).

Mindray enzymatic HbA1c gives reliable and cost efficient result with the first measurement and reduce further confirmations.



Lower Hb Detection Limit for HbA1c Test

Evaluate the Hb concentration in the process of hemolysis and start sample increasement tests in advance for low Hb concentration samples. This function can lower the detection limit and expand linearity range Hb to reduce the rerun rate and reagent waste for anemia samples.



Integrated ISE Module

Built-in ISE Module

- Report Na⁺, K⁺, Cl⁻
- 1 blood tube for electrolytes and photometric chemistry tests



Efficient and Easy operation

- Up to 300 tests per hour
- Up to 9 months of Na/K/Ref electrodes service time
- Automatic calibration
- Low consumption
- Easy operation and maintenance

Reliable Testing System



High Level Sigma Metric Performance

Original reagents and validated application protocol lower the inaccuracy and imprecision which contributes to achieving world-class and excellent sigma metric performance. Higher sigma level system can help laboratories offer high level of quality at reduced cost and enhance clinician confidence and satisfaction.

Intelligent Abnormal Reaction Detection

Powerful software with in-built algorithms that can monitor the reaction for abnormality, provide flags, and trigger auto-reruns to specimens with abnormal situations in test, such as substrate depletion, oxygen shortage, and hook effects, etc. This intelligent approach with detection, alarming and auto-rerun functions minimizes false results and the risk of a wrong diagnosis, and make reported test result accurate and reliable.

