

Z3

Auto Hematology Analyzer



- Fully automated Dual Chamber, Compact & Cost Effective.
- Throughput 70 tests per hour
- 3-Part Differentiation of WBC: 21 Parameters + 3 Histograms



- 17 Different Flags of abnormal Blood cell Morphology + 8 Different Histogram Flags
- Sample Modes: Whole Blood, Pre-Diluted & Capillary Mode for Whole blood.
- Micro Sample Aspiration – Best option for Pediatric Samples.



- Only 2 Routine Reagents + 1 Maintenance Reagent
- 10.4" TFT touch screen
- 4 USB ports, 1 LAN port, Bi-directional LIS
- ≥ 40,000 results storage with histograms

Z3

Auto Hematology Analyzer

Technical Specifications

Principles

- Impedance method for WBC, RBC and PLT counting
- Cyanide free reagent for hemoglobin test

Parameters

- 21 parameters: WBC, Lymph#, Mid#, Gran#, Lymph%, Mid%, Gran%, RBC, HGB, HCT, MCV, MCH, MCHC, RDW-CV, RDW-SD, PLT, MPV, PDW, PCT, P-LCR, P-LCT
- 3 histograms for WBC, RBC and PLT

Flags

- 17 Different Flags of abnormal Blood cell Morphology
- 8 Different Histogram Flags

Performance

Parameters	Background	Precision		Carry-over	Linearity range
		Detection Limits	CV		
WBC($10^9/L$)	≤ 0.2	(7.00-15.00)	$\leq 2.0\%$	$\leq 0.5\%$	(0-300.00)
		(4.00-6.9)	$\leq 2.5\%$		
RBC($10^{12}/L$)	≤ 0.02	(3.50-6.50)	$\leq 1.5\%$	$\leq 0.5\%$	(0-8.00)
HGB(g/dL)	≤ 0.1	(11-18)	$\leq 1.5\%$	$\leq 0.5\%$	(0-25)
HCT(%)/MCV(fL)	HCT ≤ 0.5	MCV:(70-110)	$\leq 0.5\%$	/	HCT:(0-67)
		(100-149)	$\leq 5.0\%$		
PLT($10^9/L$)	≤ 5	(150-500)	$\leq 4.0\%$	$\leq 1.0\%$	(0-4000)

Sampling Mode

Whole Blood, Pre-diluted & Capillary Mode for Whole blood

Reagent

Z21 DILUENT Z21 CFL LYSE PROBE CLEANSER

Sample Volume

Pre-diluted mode 20 μ L
Whole blood mode 10 μ L

Throughput

70 samples per hour

Display

10.4 inch TFT Touch Screen

Data Storage Capacity

Up to $\geq 40,000$ results including numeric and graphical information

Communication

LAN Port supports HL7 protocol
Support bi-directional LIS

Interface

4 USB ports (for External Printer, Software upgrade, Barcode Scanner, Keyboard and Mouse), LAN port (1)

Printout

Thermal recorder, 50 mm wide paper, various printouts formats
External printer (optional)

Operating Environment

Temperature: 15 $^{\circ}$ C-35 $^{\circ}$ C
Humidity: 10%~90%
Air pressure: 70KPa-106KPa

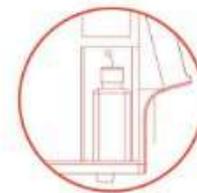
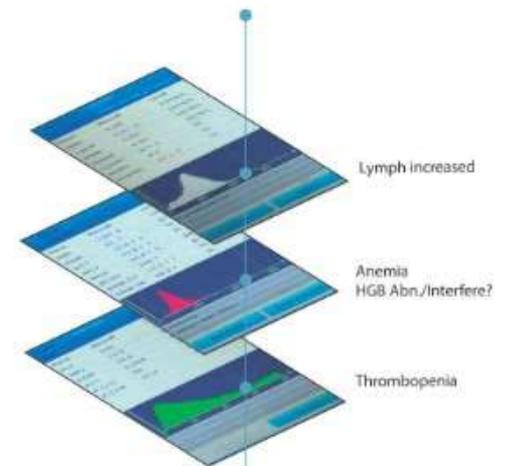
Power Requirement

Voltage (100V-240V~) $\pm 10\%$ **Frequency** (50Hz/60Hz) ± 1 Hz

Dimension and Weight

Dimension: Depth(400 mm) x width(300 mm) x height(410 mm)
Weight: ≤ 18 Kg

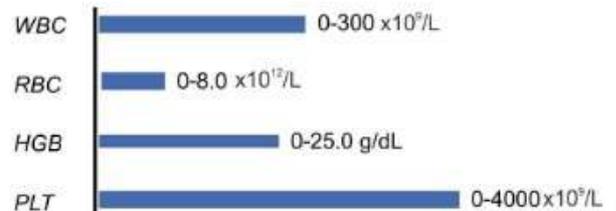
Detailed Flag Message - Pre-diagnosis



Cost saving

- Two reagents, lyse inside the analyzer
- Low reagent consumption

Wide Linearity Range



Improved PLT linearity range for low value accuracy

