

# \*German Technology in 5 Part Analysis

*its Different...*

## H50

*5 Part Hematology  
Analyzer*

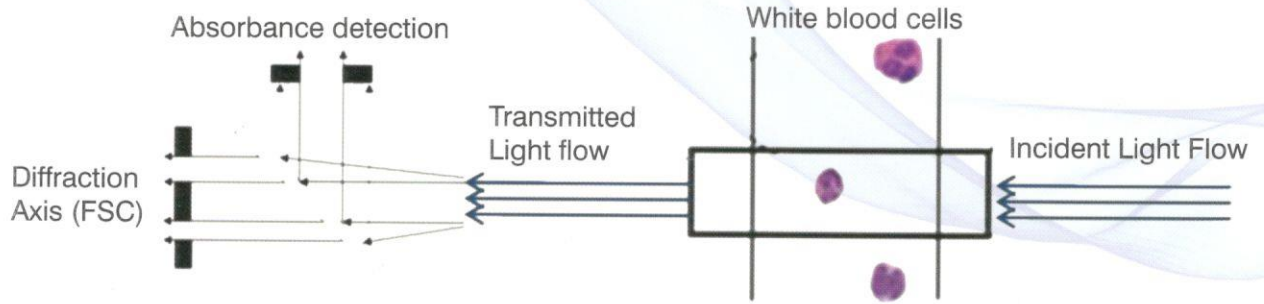
*Delivering  
High Quality  
Results at  
affordable cost  
with very  
low maintenance*



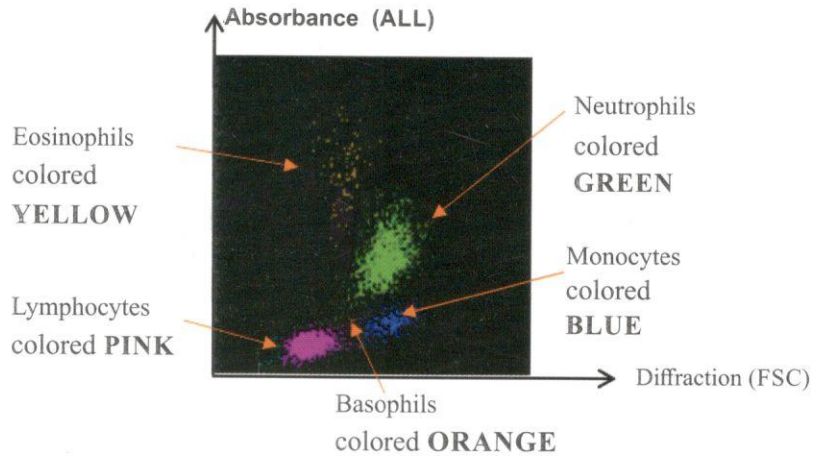


# Five-part Diff Measurement Principle

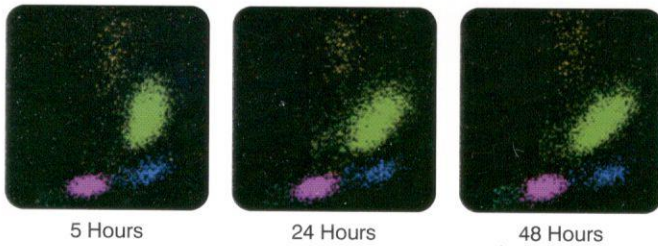
The principal is based on Flow Cytometry Hydrodynamic Focus Free Optical Light Scatter.



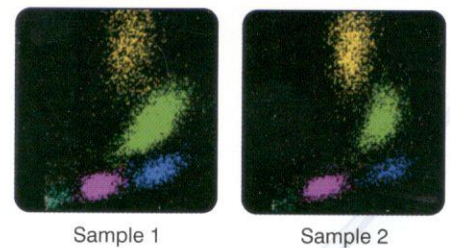
The measured pulse on the two optical channels displayed on Diff plot ALL (Y axis) & FSC (X axis). Each dot on the diff plot represents cell size by way of Forward Scatter (FSC) and internal complexity by way of Axial Light Loss (ALL)



## Excellent Performance on Aging Samples



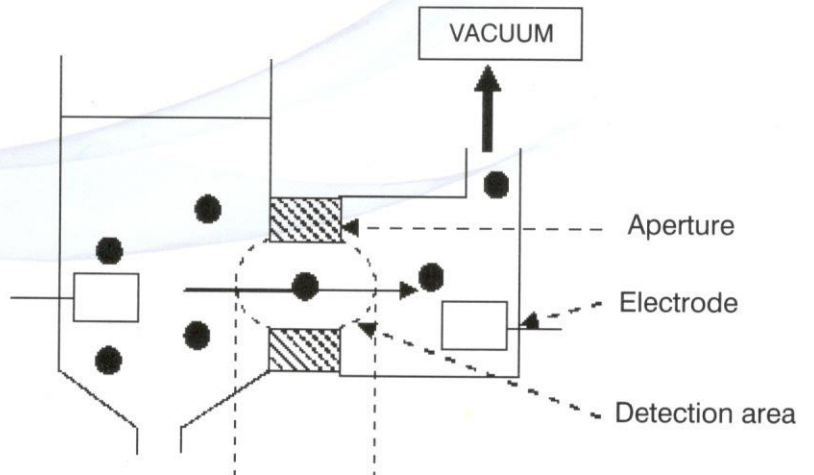
## Excellent Performance on Eosinophilia Samples



	WBC	LYM%	MON%	NEU%	EOS%	BAS%
Sample 1	7.1	21.6	9.0	59.2	10.2 H	0.0
Sample 2	8.1	27.2	5.3	41.0 L	26.3 H	0.1

## Accurate Platelet Count

Smaller sized Aperture (50  $\mu\text{m}$ ) will significantly improve the identification of smaller sized Platelets. Very useful in Dengue.

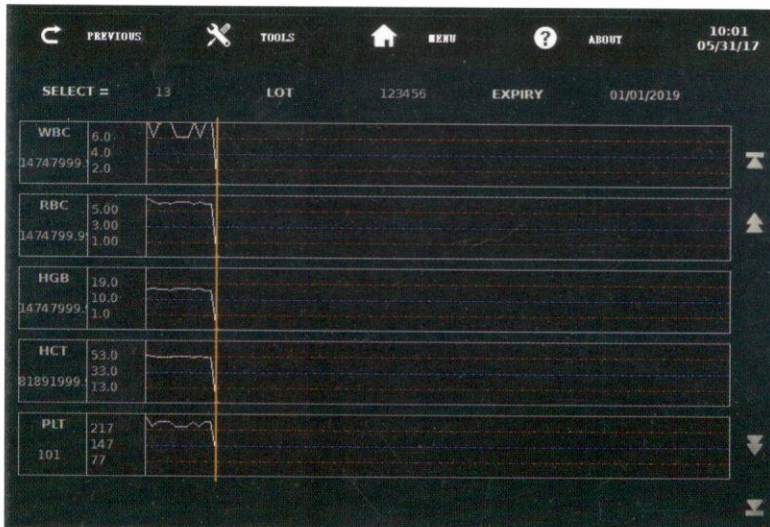




## Calibration :

- Auto and manual calibration option available
- Possible to import calibration data via USB drive

LAST CALIBRATION		CALIBRATED ON		MODIFIED	
LOT	1234567889	BY	SAS	02/07/2014 14:25	
EXPIRY	01/01/1900				
TARGET		Limits		COEFFICIENTS	
WBC	5.0	WBC	5.0	+/-	1.0
RBC	6.00	RBC	6.00	+/-	1.00
HGB	11.0	HGB	11.0	+/-	1.0
MCV	80.0	MCV	80.0	+/-	1.0
PLT	222	PLT	222	+/-	1
MPV	9.0	MPV	9.0	+/-	1.0



## QC :

- 12 Lots QC file can be added
- 100 data per lot
- Import/Export data via USB drive
- Levy Jennings graph

## Key Features & Benefits :

- 29 Parameters with one scatter gram for 5 part differential & 3 Histograms for RBC, PLT, WBC
- Low reagent consumption and very low maintenance
- Life time warranty for internal tubing
- A large colour touch screen allows easy & efficient operation
- Requiring minimal bench space
- Reporting Modes : CBC & CBC+5 Part Diff

## Pathological alarms

RBC	WBC	PLT
Erythrocytosis	Leukocytosis	Thrombopenia
Anemia	Leukopenia	Thrombocytosis
Anisocytosis	Lymphocytosis	Giant platelets
Microcytes / Microcytosis (R1)	Lymphopenia	Small platelets
Macrocytes / Macrocytosis (R2)	Neutrophilia	Microcytes (P3)
Hypochromia	Neutropenia	Schistocytes (P2)
Erythroblast	Eosinophilia	PLT Debris
Cold Agglutinins	Monocytosis	
	Basophilia	
	Large Immature Cells (L5, IMM)	
	Atypical Lymphocytes (RL, ALY)	



# Specifications

**Principles** Impedance method for WBC, RBC and PLT counting  
Cyanide free reagent for hemoglobin test  
Hydrodynamic Focus Free optical light scatter for WBC differential analysis

## Parameters

29 reportable parameters: WBC, Lym%, Mon%, Neu%, Bas%, Eos%, Lym#, Mon#, Neu#, Eos#, Bas#, IMM%, IMM#, ALY%, ALY#, RBC, HGB, HCT, MCV, MCH, MCHC, RDW-CV, RDW-SD, PLT, MPV, PDW, PCT, P-LCR, P-LCC.

3 histograms for WBC, RBC and PLT / 1 scattergram for 5 Part differential  
4 Research parameters

Reagent	HD500 Diluent, HL500 Lyse, HC500 Cleaner, HB300 Bleach	Performance	Parameter	Linearity Range	Precision
Control and Calibrator	ED-50D, ED-CAL PLUS		WBC( $10^9/l$ )	0.0-100	3.0% (3.5~6)
			RBC( $10^{12}/l$ )	0.0-8	2.5% (6.1~15)
			HGB(g/dl)	0.0-25.0	1.5% (3.5~6.5)
			PLT( $10^9/l$ )	0.0-2000	1.5% (11.0~18.0)
					4.0% (100~500)

## Sample Modes & Volume

Whole Blood (WB) 15.6  $\mu$ l  
Capillary (CAP) 15.6  $\mu$ l  
Pre-diluted (PD) 20.0  $\mu$ l

## Throughput

60 samples per hour

## Display

10.4 inch TFT Touch Screen

## Data Storage Capacity

Up to 35,000 results including numeric and graphical information  
12 QC files (100 data per file)

## Communication

Bi-directional LIS/HIS connectivity

## Input Device

Built-in virtual keyboard, external barcode reader

## Interface

5 USB, LAN, COM

## Printout

External laser printer / Inkjet printer

## Operating Environment

Temperature: 18°C~32°C  
Humidity: 80%

## Power requirement

100V-240V, 50Hz/60Hz, 160 W

## Dimension and Weight

430mm(H) x 275mm(W) x 406mm(D), 13kg

*\*Manufactured by Edan in technical collaboration with BIT Germany*

Marketed by :



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**Note** : Features and Specifications are subject to change without prior notice due to continuous development.