



FLAME PHOTOMETRE

SPEED, PRECISION AND SECURITY IN THE AUTOMATIC DETERMINATION OF THE ELECTROLYTES

The **flame photometry** makes it possible to determine in the laboratory, with great precision and simplicity, **the sodium, potassium and lithium** concentration in every biological liquids. The flame photometer **FP20** is a very compact system with **built-in dilutor** for the standard and samples dilutions execution. **4 different programs** are included in the software: two for the Na and K serum and urine determination, one for the Lithium serum determination and one OPEN for the Na and K determination in other biological liquids or chemical solutions or soils samples; **FP20** is an **open system** that allows different standardizations for different determinations. The **liquid crystal display** drives the operator in the test execution and the results are visualized and printed out by the **built-in thermal printer**.

- MAIN CHARACTERISTICS:**
- Automatic start up
 - Autonomous air supply system
 - Double Gas line security system
 - Built-in dilutor
 - Automatic standardization with memorization of the reference values
 - Simultaneous reading of Na and K with internal Lithium standard
 - Automatic reading of Lithium with internal K standard
 - Sound and picture signals for alarms and warnings
 - Results on liquid crystal display
 - Built-in printer



TECHNICAL CHARACTERISTICS	
Wavelengths:	- 766 nm for K 589 nm for Na 670 nm for Li
Reading field:	- Serum: Na 0-250 mEq/L K 0-25 mEq/L Li 0-2.5 mEq/L - Urine: Na 0-250 mEq/L K 0-250 mEq/L
Zeroing:	- Automatic zero setting with Blank insertion
Gas supply:	- Commercial propane Gas
Working volumes:	- Aspirated sample volume: 50 µL - Eroged diluent volume: 10 mL
Dilution ratios:	- 1:200 for Na and K 1:20 for Li
Results time:	- <15 sec.
Precision:	- Na CV ≤ 0,5% - K CV ≤ 2% - Li CV ≤ 2%
Accuracy:	- Li: ±0,03 mEq/L, Na: ±2 mEq/L, - K (serum): ±0,2mEq/L, K (urine): ±2 mEq/L
Display:	- LCD; 4 lines x 20 columns
Printer:	- Thermal, 20 columns
Paper size:	- 58 mm
Operative conditions:	- Temperature: 15-32°C (in function) 0-50°C (off) - Relative humidity: 20-80% (in function) 0-90% (off) - Altitude: <3000 mt (in function)
Security:	- DIRECTIVE 73/23/CEE NORMS CEI-EN 61010-1, CLASS I
Electromagnetic compatibility:	- DIRECTIVE 89/336 CEE
Power supply:	- 230/115VAC, 50-60 Hz, 310 VA
Dimensions:	- L.31 cm x W.43 cm x H.38 cm
Weight:	- 16 Kg