

UREA/BUN

Enzymatic-spectrophotometric
ULTRAVIOLET

Instrument: HITACHI 902

Principle of the method

Urea in the sample consumes, by means of some coupled reactions, NADH that can be measured by spectrophotometry.

Samples

Serum, plasma, urine.

Stable for 7 days at 2-8°C.

Heparin is recommended as anticoagulant.

Reagent preparation

Working Reagent: Transfer the contents of one Reagent B vial into a Reagent A bottle. Mix thoroughly.

Stable for 2 months at 2-8°C.

Performance characteristics

- Interferences: Ammonium salts of the anticoagulants interfere.
- Linearity: Up to 300 mg/dL.

Instrument settings

1 Test Name	UREA	29 Calib. Conc. 4	0
2 Assay Code (Mthd)	2 Point&Rate	30 Calib. Position 4	0
3 Assay Code (2. Test)	0	31 Calib. Conc. 5	0
4 Reaction Time	3	32 Calib. Position 5	0
5 Assay Point 1	3	33 Calib. Conc. 6	0
6 Assay Point 2	7	34 Calib. Position 6	0
7 Assay Point 3	0	35 S1 ABS	
8 Assay Point 4	0	36 K Factor	
9 Wavelength (SUB)	700	37 K2 Factor	0
10 Wavelength (MAIN)	340	38 K3 Factor	0
11 Sample Volume	3	39 K4 Factor	0
12 R1 Volume	350	40 K5 Factor	0
13 R1 Position	...	41 A Factor	0
14 R1 Bottle size	Small	42 B Factor	0
15 R2 Volume	0	43 C Factor	0
16 R2 Position	0	44 SD Limit	0.1
17 R2 Bottle size	Small	45 Duplicate Limit	300
18 R3 Volume	0	46 Sensitivity Limit	0
19 R3 Position	0	47 S1 ABS. Limit (L)	-32000
20 R3 Bottle size	Small	48 S1 ABS. Limit (H)	32000
21 Calib. Type (Type)	Linear	49 ABS. Limit	5000
22 Calib. Type (Weight)	0	50 ABS. Limit (D/I)	Decrease
23 Calib. Conc. 1	0	51 Prozone Limit	0
24 Calib. Position 1	...	52 Prozone Limit (U/D)	Lower limit
25 Calib. Conc. 2	(*)	53 Prozone (End Point)	35
26 Calib. Position 2	...	54 Expected Value (L)	10
27 Calib. Conc. 3	0	55 Expected Value (H)	50
28 Calib. Position 3	0	56 Instrument Factor (a)	1.0
... Data entered by the operator		57 Instrument Factor (b)	0.0
* Assigned value		58 Key Setting	...