

quantex A-1-ANTITRYPSIN (A1AT)



Kit Configuration

P/N 3000-2306	1 x 35 mL A1-AT R1
	2 x 4 mL A1-AT R2

Reagent Preparation

P/N 3000-2306 A1-AT R1: Ready to use
 A1-AT R2: Ready to use.
 Place the bottles into reagent tray.

In Use Stability

For optimal stability remove reagents from the system and store them at 2-8°C in the original vial securely closed.

Specimen

Serum.

Calibration

Use *quantex* Proteins standard multipoint Cat. No 300-2128. See calibrator chart for lot specific concentrations. Recalibrate every 90 days or when a new lot of reagent is used.

Quality Control

Use *quantex* Proteins Control I/II Cat. No. 3000-2122.

Calculation of Analytical Results

The results concentration is automatically calculated by the instrument against the Calibration curve. For detailed description, refer to the Instrument settings and to the ILab 600/650 Operator's Manual.

Reference Interval

The reported expected range for alpha1-antitrypsin in adults is 90-200 mg/dL (0.9-2.0 g/L).

References / Literatur / Bibliografia / Bibliographie / Bibliografia /

See package insert enclosed in the kit

Performance Characteristics

Limitation/Interfering Substances

No significant interference from triglycerides up to concentrations of 2000 mg/dL (22.6 mmol/L), bilirubin up to concentrations of 20 mg/dL (342 μmol/L) and hemoglobin up to concentrations of 500 mg/dL (0.3 mmol/L).

For a comprehensive review of interfering substances, refer to the publication by Young *et al.*¹

Precision

Serum	Samples/Runs	Mean (mg/dL)	CV(%)	Mean (mg/dL)	CV(%)
Within run	3/10	76	1.8	224	1.3
Total	3/10	76	4.0	224	2.4

Linearity

no rerun 20 - 330 mg/dL ; with rerun 20 - 3300 mg/dL



Instrument Settings

Photometric Test Parameters		Serum
Test No.		**
Test Name, Test Code		A1-AT, A1-AT
Sample Type		Serum
Reporting Unit, Decimal Points		mg/dL, 1
Reaction Cycle		Standard
Twin Analysis		OFF
Methodology Type, Measuring Point		End Point, 17/33
Photometric Methodology		1 Wavelength
Primary/Secondary Wavelength		600
Sampling Conditions		
<i>Sampling 1</i>	Sample Vol.	2
	Sample/Diluent Vol.	0/0
<i>Sampling 2</i>	Sample Vol.	2
	Sample/Diluent Vol.	15/135
<i>Sampling 3</i>	Sample Vol.	***
	Sample/Diluent Vol.	0/0
<i>Sampling 4</i>		***
Diluent Code		Saline
Diluent Warning Limit		N/A
First Run		Sampling 1
Below/Above Normal Range		***
Panic L		***
Panic H		Sampling 2
Noise		***
Prozone		N/A
High!, ABS!		Sampling 2
Sample Volume Reduction		**
Reagent Volumes		
R1	Code	01791
	Rgt/Dil. Vol. Stirring	190/0, ON
	Low Vol. Warning Limit	***
	Stability (days)	**
R2	Code	01792
	Rgt/Dil. Vol. Stirring	50/10, ON
	Low Vol. Warning Limit	***
	Stability (days)	**

Ranges and Evaluation Criteria	Serum
Normal Range-Male	**
Normal Range-Female	**
Normal Range-Other	**
Valid Range	0 - 330
Hemolysis/Icterus/Lipemia Limit	***
Reaction Slope	Positive
Absorbance Limit	Above, 3200
Prozone Limit	N/A
Non Linear Limit	N/A
Slope/Intercept Correction	1/0
Qualitative Report	OFF
Calibration Conditions	
Calibration	5 Points, point to point, 2 Reps
Stability (days)	90
Calibrator, Concentration	Proteins Std*
R-Blank Limit (mAbs)	400
Cal. Reps Range (%)	***
Min Cal. Response (mAbs)	***
Cal. Factor Change (%)	***
M-Point Curve Fit (%)	***
Reagent Blank	ON
Auto R-Blank by Bottle	ON

- * Lot dependent
- ** operator definable
- *** optional
- N/A not applicable to this test