

L LABORATORY

P PROCESS

S SOFTWARE

A AUTOMATION



**SCHMIDT
HAENSCH**
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ATR V/VT

Compact refractometer with
intuitive touchscreen



SPECIFICATIONS	ATR V 301	ATR VT 301	ATR VT 401	ATR VT 501
Light source, wavelength	LED, Interference filter 589 nm			
Measuring scales	Refractive Index (RI), Sucrose (Brix), Standard scales included			
Measuring range	1.3200 - 1.5800 RI / 0 - 100 Brix	1.3200 - 1.5800 RI / 0 - 100 Brix	1.30000 - 1.66000 RI / 0 - 100 Brix	1.27000 - 1.71000 RI / 0 - 100 Brix
Accuracy	± 0.0001 RI / ± 0.05 Brix	± 0.0001 RI / ± 0.05 Brix	± 0.00003 RI / ± 0.02 Brix	± 0.00002 RI / ± 0.015 Brix
Reproducibility (Precision)	± 0.0001 RI / ± 0.05 Brix	± 0.0001 RI / ± 0.05 Brix	± 0.00001 RI / ± 0.01 Brix	± 0.00001 RI / ± 0.01 Brix
Resolution	0.0001 RI / 0.05 Brix	0.0001 RI / 0.05 Brix	0.00001 RI / 0.01 Brix	0.00001 RI / 0.01 Brix
Temperature control	-	Integrated peltier sample temperature control system		
Temperature control range	-	10 °C to 60 °C	5 °C to 80 °C	5 °C to 100 °C (- 5 °C to + 105 °C on request)
Temperature stabilization time	-	25 °C to 20 °C, ± 0.1 °C, in 1 minute (valid for ambient temp. = 20 °C)		
Automatic temperature compensation	Automatic temperature compensation for Brix according to ICUMSA and other measuring scales with temperature compensation			
Temperature sensor	4-wire Pt1000 sensor for measurement of sample temperature placed inside the prism			
Temperature sensor accuracy / resolution	0.1 °C / 0.01 °C			
Ambient temperature	5 °C to 40 °C			
Minimum sample volume	600 µL, with insert for micro volume: < 10 µL			
Sample compartment / wetted parts	Sapphire, FFKM, 1.4404 Stainless Steel (Hastelloy on request)			
Housing material	Aluminium			
Interfaces / Communication	Ethernet, RS232, USB (Type A), WLAN (by WLAN adapter)			
Dimensions	230 x 320 x 150 mm (w x d x h)			
Weight	3.5 kg			
Software	Aquisys3 Core			
Display	7" TFT Touchscreen, 800 x 480 Pixel, 16 Bit colors			
Conformity / Standards	ASTM, AOAC, DIN, ICUMSA and others			
Peripherals / Operation	Optional: Keyboard, Mouse, Barcode Reader, Remote via PC/Tablet/Smartphone			
Power supply	VAC 80 - 264, 47 - 63 Hz, max. 77 W			