

LECROY (TELEDYNE LECROY)

WaveJet 354A

The Teledyne LeCroy WaveJet 354A is a 4-channel, 500 MHz portable digital storage oscilloscope. It features a 2 GS/s maximum sampling rate, a 500 kpts/Ch memory depth, and a vibrant 7.5-inch color display, delivering efficient debugging capabilities in a compact footprint with rapid 3-second boot time and Replay history mode.

SPECIFICATIONS

General

Interfaces	USB Host (front and rear panels), USB Device, Optional LAN (via WJ-LAN module), Optional GPIB (via WJ-GPIB module)
Display	7.5" Color TFT-LCD, 640 x 480 VGA resolution
Power-up Time	< 3 seconds
Kensington Security Slot	Yes
Supported Languages	English, French, German, Italian, Japanese, Korean, Russian, Simplified Chinese, Spanish, Traditional Chinese

Physical

Power Supply	100 to 240 V AC ($\pm 10\%$), 50/60 Hz ($\pm 10\%$), power consumption < 80 VA
Operating Temperature	5 to 40 °C °C
Dimensions (W×H×D)	310 mm × 188 mm × 132 mm mm
Weight	3.2 kg kg

Vertical System

Analog Bandwidth (-3 dB)	500 MHz
Number of Input Channels	4
Calculated Rise Time (10% to 90%)	750 ps (typical)
Input Coupling	AC, DC, GND
Input Impedance	1 M Ω $\pm$ 1.5% 16 pF $\pm$ 3 pF, or 50 Ω $\pm$ 1.0% (selectable)
Vertical Resolution	8 bits
Vertical Sensitivity Range	2 mV/div - 10 V/div (1 M Ω), 2 mV/div - 2 V/div (50 Ω)
Maximum Input Voltage (1 M Ω)	400 V max (DC + peak AC $\leq$ 10 kHz)
Maximum Input Voltage (50 Ω)	5 V rms
DC Gain Accuracy	$\pm$ 1.5% of full scale ($\pm$ 2% for 2 mV/div to 4.9 mV/div)
Bandwidth Limit Filters	20 MHz, 100 MHz
Channel Input Capacitance	16 pF $\pm$ 3 pF
DC Vertical Offset Accuracy (2 mV - 50 mV/div)	$\pm$ (1.5% of offset + 0.5% of full scale + 1 mV)
DC Vertical Offset Accuracy (100 mV - 10 V/div)	$\pm$ (1.5% of offset + 0.5% of full scale + 10 mV)
Channel-to-Channel Isolation	> 100:1 at 100 MHz

Horizontal System

Maximum Real-Time Sampling Rate	2 GS/s (interleaved), 1 GS/s (all channels)
Maximum Record Length	500 kpts per channel
Timebase Range	500 ps/div - 50 s/div
Timebase Accuracy	$\pm$ 10 ppm
Horizontal Zoom Capabilities	Yes
Sampling Rate (Single-Channel Active)	2 GS/s
Sampling Rate (All Channels Active)	1 GS/s
Post-trigger Delay Range	0 to 1000 divisions

Trigger System

Trigger Modes	Auto, Normal, Single
Trigger Coupling	AC, DC, LF Reject, HF Reject
Trigger Sources	Ch 1, Ch 2, Ch 3, Ch 4, Ext, Ext/10, Line
Trigger Types	Edge, Pulse Width, Video, Period, Delay, Dropout
Trigger Sensitivity (Edge)	DC to 100 MHz: 0.5 div, 100 MHz to 500 MHz: 1.0 div
Trigger Range (Internal)	$\pm$ 8 divisions from center
External Trigger Input Impedance	1 M Ω $\pm$ 1.5% 16 pF $\pm$ 3 pF
External Trigger Maximum Input Voltage	N/A (no external trigger input on 4-channel models)

Acquisition System

Acquisition Modes	Sample, Peak Detect, Average
Peak Detect Resolution	1 ns
Replay History Mode	Up to 1024 waveforms

Waveform Measurements and Analysis

Automatic Voltage & Time Measurements	26 parameters
Cursor Measurements	Voltage, Time, Frequency
Waveform Math Operations	Add, Subtract, Multiply, FFT
FFT Window Types	Hanning, Hamming, Blackman-Harris, Rectangular
Autoset Functionality	Single-button automatic configuration

Environmental and Safety Compliance

Storage Temperature Range	-20 to +60 °C
Operating Humidity Range	Up to 80% RH (non-condensing) at 30 °C
Operating Altitude	Up to 3000 m

Standard Accessories and Warranty

Standard Warranty Period	3 years
--------------------------	---------

Probes

Standard Probe Model	PP010
Standard Probe Quantity	4
Standard Probe Attenuation	10:1

Auxiliary Outputs

Probe Calibration Output Frequency	1 kHz
Probe Calibration Output Level	1 Vp-p

Performance

Maximum Waveform Capture Rate	3,600 waveforms/s
-------------------------------	-------------------

Acquisition

Maximum Replay History Frames	1024
-------------------------------	------

Display

Display Resolution	640 x 480 pixels (VGA)
Display Type	7.5 inch Color TFT-LCD
Display Graticule	8 x 10 divisions

Measurement & Analysis

Pass/Fail Testing	Standard (built-in mask testing)
-------------------	----------------------------------

Compliance & Safety

Safety Compliance	UL 61010-1, CAN/CSA C22.2 No. 61010-1, EN 61010-1
EMC Compliance	EN 61326-1

Interfaces

USB Ports	1 x USB Host (front panel), 1 x USB Device (rear panel)
Optional Interfaces	GPIB (WJ-A-GPIB), LAN (WJ-A-LAN)

Waveform Math & Analysis

FFT Record Length	8000 points
Built-in Frequency Counter Resolution	6 digits
Built-in Frequency Counter Range	10 Hz to 500 MHz

Storage & Connectivity

Internal Setup Storage	5 setups
Internal Waveform Storage	5 reference waveforms
Optional LAN Interface Module Model	WJ-A-LAN
Optional GPIB Interface Module Model	WJ-A-GPIB

TECHNOLOGY

Digital Storage Oscilloscope (DSO)

APPLICATIONS

Electronic design, embedded debugging, educational laboratories, and field testing

Generated by SpecAtlasHub (specatlashub.com). Specifications are compiled from available sources and are subject to change — verify critical values against the manufacturer before purchase.