

Digital Oscilloscope
Waveform Generator
DC Power Supply
Digital Multimeter
Spectrum Analyzer
Handheld Oscilloscope
Probes & Accessories

SIGLENT TECHNOLOGIES PRODUCT CATALOG



SIGLENT TECHNOLOGIES Co., Ltd.

-The Best Value in Electronic Test & Measurement.

SIGLENT

has been providing test & measurement solutions for almost 14 years from its headquarter in Shenzhen, China. There are more than 300 employees, one third of whom are high-educated R&D engineers.

SIGLENT has many patent technologies. We are dedicated to develop sophisticated and high quality digital oscilloscopes, waveform generators, handheld digital oscilloscopes, spectrum analyzers and DC power supplies, digital multimeters. We strive to deliver the highest quality of customer service and satisfaction to our customers.

SIGLENT provides the following instruments:

- Super Phosphor Oscilloscope
- Digital Oscilloscope
- Waveform Generator
- DC Power Supply
- Digital Multimeter
- Spectrum Analyzer
- Handheld Oscilloscope
- Probes & Accessories



SIGLENT sincerely invite you to join

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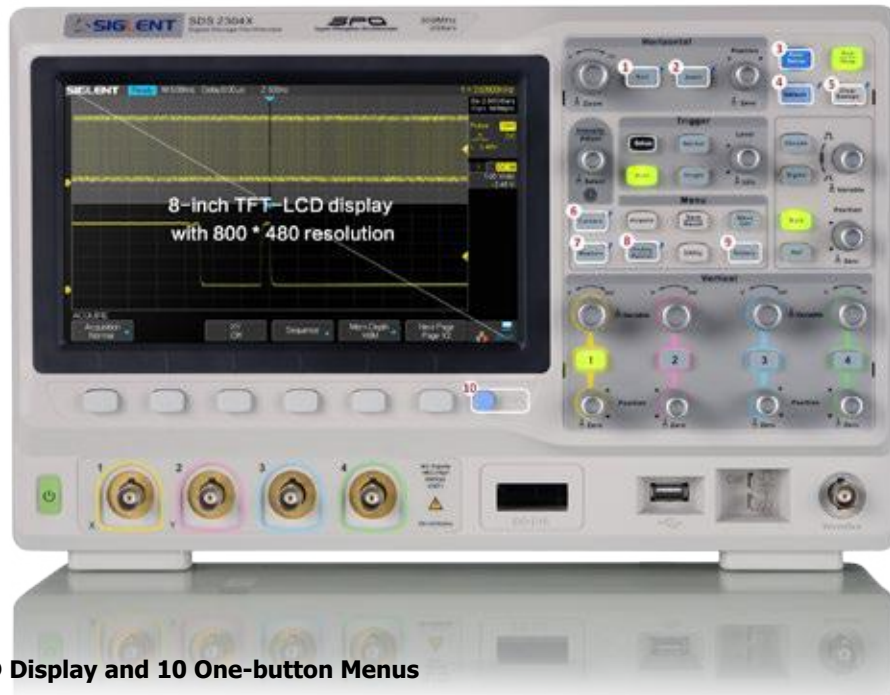


SDS2000X Super Phosphor Oscilloscope

Key Features

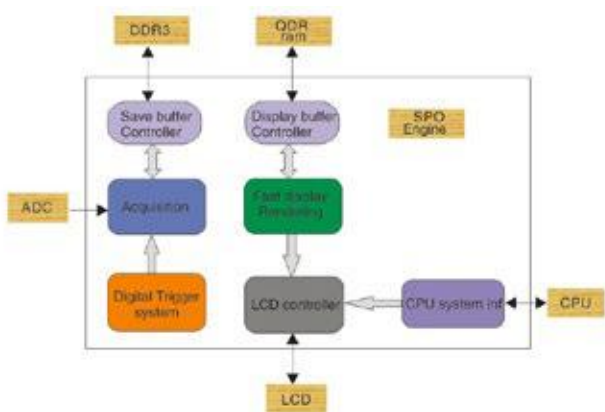
- 70MHz, 100MHz, 200MHz, 300MHz models
- Real-time sampling rate up to 2GSa/s
- New generation of SPO technology
 - Waveform capture rate up to 140,000 wfm/s (normal mode), and 500,000 wfm/s (sequence mode)
 - Supports 256-level intensity grading and color temperature display
 - Record length up to 140Mpts
 - Digital trigger system
- Intelligent trigger: Edge, Slope, Pulse, Window, Runt, Interval, Dropout, Pattern and Video (HDTV supported)
- Serial bus triggering and decoder, supports protocols IIC, SPI, UART, RS232, CAN and LIN
- Low background noise, supports 1mV/div to 10V/div voltage scales
- 10 types of one-button shortcuts, including Auto Setup, Default, Cursors, Measure, Roll, History, Display/Persist, Clear Sweeps, Zoom and Print
- Segmented acquisition (Sequence) mode, dividing the maximum record length into multiple segments (up to 80,000), according to trigger conditions set by the user, with a very small dead time segment to capture the qualifying event
- History waveform record (History) function, the maximum recorded waveform length is 80,000 frames
- Automatic measurement function on 37 parameters, supports statistics, Gating measurement, Math measurement, History measurement and Ref measurement
- Math function (FFT, addition, subtraction, multiplication, division, integration, differential, square root)
- High Speed hardware based Pass/ Fail function
- 16 Digital channels (MSO), Maximum waveform capture rate up to 500 MSa/s, Record length up to 140 Mpt/CH
- 25MHz function/arbitrary waveform generator, built-in 10 types of waveforms
- Large 8 inch TFT-LCD display with 800 * 480 resolution
- Abundant interfaces: USB Host, USB Device (USBTMC), LAN (VXI-11), Pass/Fail, Trigger Out, GPIB (optional)
- Supports SCPI remote control commands
- Supports Multi-language display and embedded online help

Characteristics



• 8 inch TFT-LCD Display and 10 One-button Menus

- 8-inch TFT-LCD display with 800 * 480 resolution
- Most commonly used functions are accessible using 10 different one-button operation keys: Auto Setup, Default, Cursors, Measure, Roll, History, Display/Persist,
- Supports auto detection of 10X probe with read-out port (200 MHz and 300 MHz versions only)



SPO Super Phosphor Oscilloscope

- Waveform capture rate up to 140,000 wfm/s (normal mode), and 500,000 wfm/s (sequence mode)
- Supports 256-level intensity grading and color temperature display
- Record length up to 140Mpts
- Digital trigger system

• Waveform Capture Rate up to 500,000wfm/s



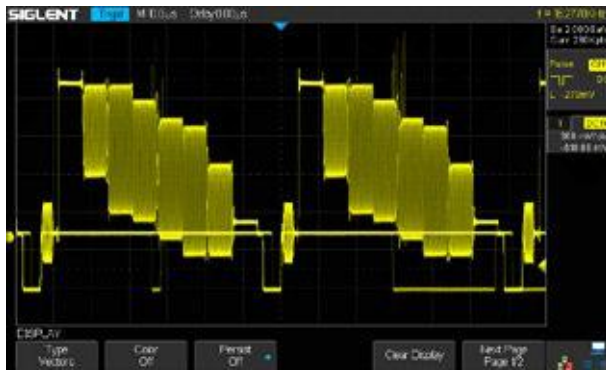
With a waveform capture rate of up to 500,000 wfm/s (sequence mode), the oscilloscope can easily capture the unusual or low-probability events

• Record Length of up to 140Mpts

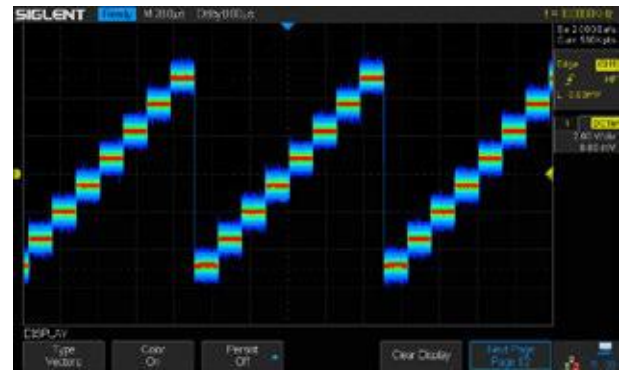


Using hardware-based Zoom technique and record length of up to 140Mpts, users are able to use a higher sampling rate to capture more of the signal, and then quickly zoom in to focus on the area of interest

• 256-level Intensity Grading and Color Temperature Display

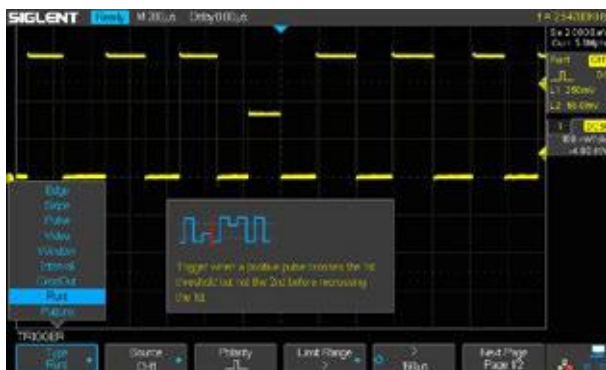


256-level intensity grading display on waveform



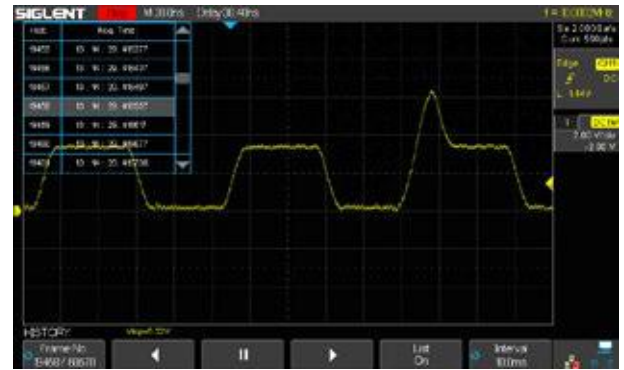
Color temperature display

• Abundant Trigger Functions



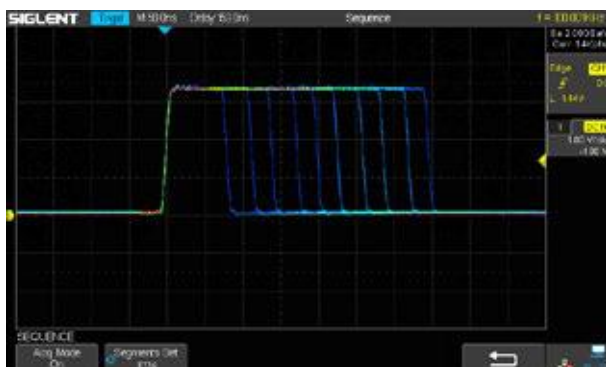
Edge, Slope, Pulse, Video, Windows, Runt, Interval, Dropout, Pattern, IIC, SPI, UART/RS232, LIN and CAN

• History Mode



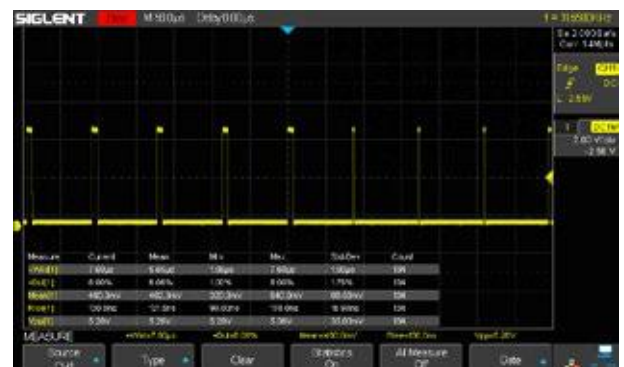
History function can record up to 80,000 frames of waveforms. The recording is executed automatically, so that the customer can play back the history waveforms at any time to observe unusual events, and locate the source quickly through the cursors or measurements. Located on the keyboard Panel, this function is easily accessible

• Sequence Mode



Segmented memory collection will store the waveform into multiple (up to 80,000) memory segments and each segment will store a triggered waveform, as well the dead time information. The dead time between segments could be as small as 2μs. All the segments can be play back using History function.

• Comprehensive Statistical Functions



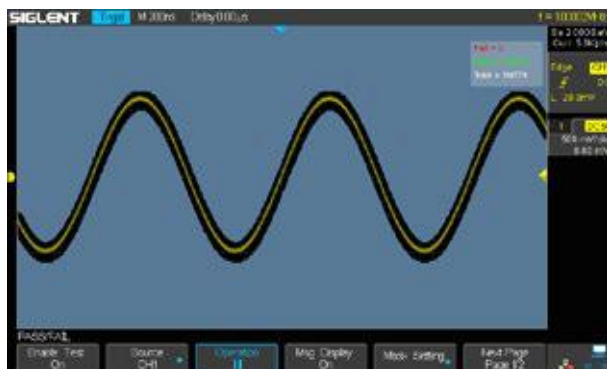
Parametric statistical functions to display 5 parameters of any measurements: current, mean, minimum value, maximum value, and standard deviation. The measurement count is also displayed. The maximum number of measurements that can be run and simultaneously analyzed statistically is five. Supports Gating measurements, Math measurement, History measurement and Ref measurement

• Advanced Math Function



In addition to the traditional (+, -, X, /) operations, FFT, integration, differential, and square root operations are supported. The integration operation supports gating, which uses cursors to define the domain of integration

• Hardware-Based High Speed Pass/Fail Function



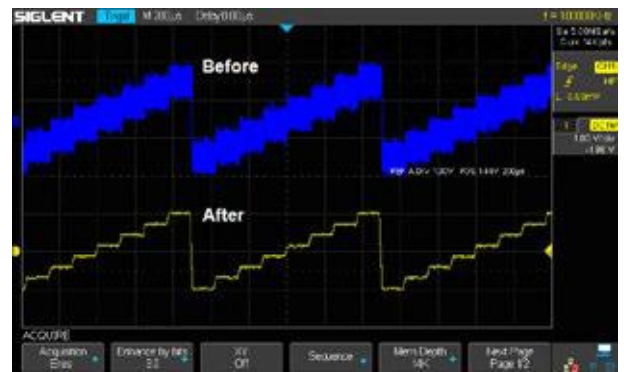
Hardware-based Pass/Fail function performs up to 140,000 Pass/Fail decisions each second. With easy-to-generate user-defined test templates, the SDS2000X compares the current measured trace to the template mask trace, making it suitable for long-term signal monitoring or automated testing.

• Built-in 25MHz Function/Arbitrary Waveform Generator (Optional)



10 built-in waveforms plus 4 ARBs. The arbitrary waveforms can be accessed and edited by the EasyWave PC software

• Eres Mode



Eres mode can improve the SNR effectively, without the dependence on the periodicity of signal and stable triggering

• Serial Bus Decoding Function (Optional)



Displays the decoding through the events list. Bus protocol information can be quickly and intuitively displayed in table form

• Complete Connectivity



USB Host, USB Device (USBTMC), LAN(VXI-11), Pass/Fail, Trigger Out and GPIB (optional)

Specifications

Model	SDS2072X (2CH) SDS2074X (4CH)	SDS2102X (2CH) SDS2104X (4CH)	SDS2202X (2CH) SDS2204X (4CH)	SDS2302X (2CH) SDS2304X (4CH)
Bandwidth	70 MHz	100 MHz	200 MHz	300 MHz
Sampling Rate (Max.)	2 GSa/s			
Channels	2 + EXT 4 + EXT			
Memory Depth (Max.)	140 Mpts (Single-Channel), 70 Mpts (Dual-Channel)			
Waveform Capture Rate (Max.)	140,000 wfm/s (normal mode), 500,000 wfm/s (sequence mode)			
Trigger Type	Edge, Slope, Pulse width, Window, Runt, Interval, Dropout, Pattern, Video			
Serial Trigger	IIC, SPI, UART/RS232, CAN, LIN			
Decoder Type (Optional)	IIC, SPI, UART/RS232, CAN, LIN			
16 Digital Channels (MSO Option)	Maximum waveform capture rate up to 500 MSa/s, Record length up to 140 Mpts/CH			
Waveform Generator (Optional)	Single channel, Max. frequency up to 25MHz, 125MSa/s sampling rate, 16Kpts wave length			
I/O	USB Host, USB Device, LAN, Pass/Fail, Trigger Out, GPIB (Optional)			
Probe (Std)	PB470 70MHz 1 pcs for each channel	PP510 100MHz 1 pcs for each channel	SP2030A 300MHz 1 pcs for each channel	SP2030A 300MHz 1 pcs for each channel
Display	8 inch TFT LCD (800x480)			

Ordering Information

Description	Model
300MHz, 4CH, 2GSa/s (Max.), 140Mpts	SDS2304X
300MHz, 2CH, 2GSa/s (Max.), 140Mpts	SDS2302X
200MHz, 4CH, 2GSa/s (Max.), 140Mpts	SDS2204X
200MHz, 2CH, 2GSa/s (Max.), 140Mpts	SDS2202X
100MHz, 4CH, 2GSa/s (Max.), 140Mpts	SDS2104X
100MHz, 2CH, 2GSa/s (Max.), 140Mpts	SDS2102X
70MHz, 4CH, 2GSa/s (Max.), 140Mpts	SDS2074X
70MHz, 2CH, 2GSa/s (Max.), 140Mpts	SDS2072X
Standard Accessories	
USB Cable -1	
Passive Probe -4	
Power Cord -1	
CD (Including User Manual and EasyScopeX software) -1	
Quick Start -1	
Certification -1	
Certificate of Calibration -1	
Optional Accessories	
SDS-2000X-DC	IIC, SPI, UART/RS232, CAN, LIN Decoder
SDS-2000X-FG	25MHz Function/Arbitrary Waveform Generator
SDS-2000X-PA	Power Analyze Software
SDS-2000X-16LA	16 Digital Channels(Software)
SPL2016	16 Channel Logic Probe
USB-GPIB	USB-GPIB Adapter
ISFE	Isolated Front End
STB	STB Demo Source
DF2001A	Power analysis Deskew Fixture
HPB4010	High Voltage Probe
CP4020/CP4050/CP4070/ CP4070A/CP5030/ CP5030A/CP5150/CP5500	Current Probe
DPB4080/DPB5150/ DPB5150A/DPB5700/ DPB5700A	High Voltage Differential Probe



SDS1000X Super Phosphor Oscilloscope

Key Features

- 200MHz, 100MHz, bandwidth models
- Real-time sampling rate up to 1GSa/s
- Record length of 14Mpts
- Waveform capture rate up to 60,000 wfs/s
- New generation of SPO technology
- Supports 256-level intensity grading and color temperature display
- Intelligent trigger: Edge, Slope, Pulse, Window, Runt, Interval, Time out (Dropout), Pattern
- Serial bus triggering and decode, supports protocols I²C, SPI, UART/RS232, CAN, LIN, Optional
- Video trigger, supports HDTV
- Low background noise, supports 500 μ V / div to 10V / div voltage scales
- 10 types of one-button shortcuts, supports Auto Setup, Default Setup, Cursor, Measure, Roll, History, Persistence, Clear Sweep, Zoom and Print
- Segmented acquisition (Sequence) mode, the maximum record length can be divided into 1000 segments, according to trigger conditions set by the user, with a very small dead time segment to capture qualifying event
- History waveform record (History) function, the maximum recorded waveform length is 80,000 frames
- 36 automatic measurement function, supports statistics calculations, Gating measurement, Math measurement, History measuring, Ref measurement
- Waveform math function (FFT, addition, subtraction, multiplication, division, integration, differentiation, square root)
- High Speed hardware based Pass/ Fail function
- 25MHz DDS arbitrary waveform generator, built-in 10 kinds of waveforms (SDS1000X-S models)
- Large 8 inch TFT-LCD display with 800 * 480 resolution, Abundant interfaces: USB Host, USB Device (USBTMC), LAN (VXI-11), Pass / Fail, Trigger Out
- Supports SCPI remote control commands
- Supports Multi-language display and embedded online help

Characteristics

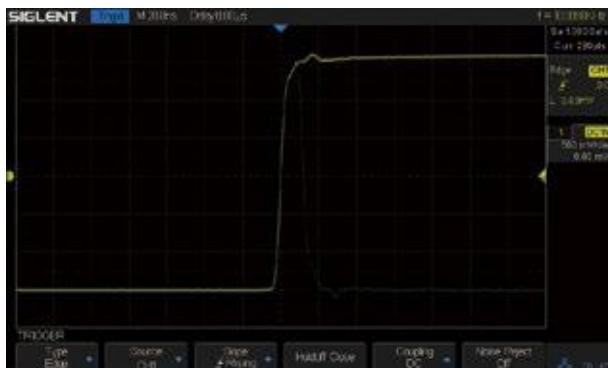
- 8 inch TFT-LCD display and 10 one-button menus



SDS1000X Equipped with 8" TFT-LCD display with a resolution of 800 * 480

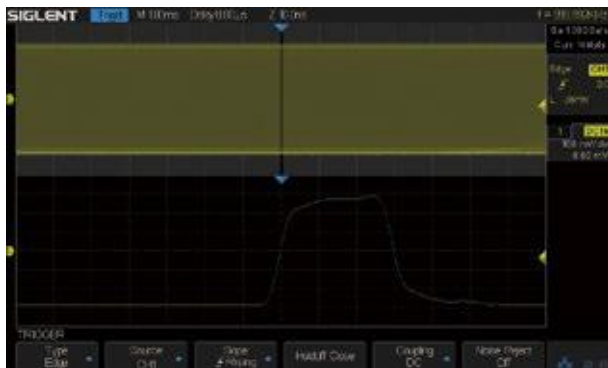
SDS1000X Most commonly used functions are accessible using 10 different one-button operation keys: Auto Setup, Default Setup, Cursor, Measure, Roll, History, Persist, Clear Sweep, Zoom, Print

- Waveform capture rate up to 60,000 wfms/s



Up to 60,000 frames / second waveform capture rate, the oscilloscope can easily capture the unusual event or low-probability event

- Record length of up to 14Mpts



Using hardware-based Zoom technologies and record length of up to 14Mpts, users are able to use a higher sampling rate to capture more of the signal, and then quickly zoom in to focus on the area of interest

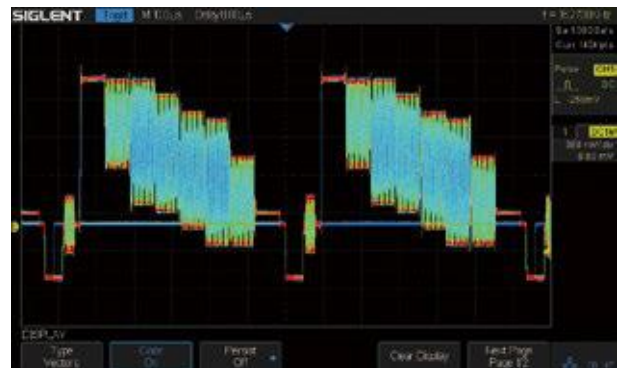
- 256-level intensity grading and color temperature display



SPO display technology provides for fast refresh rates. The resulting intensity-graded trace is brighter for more often-occurring display points and dimmer in less-often-occurring points



Color Temperature Display



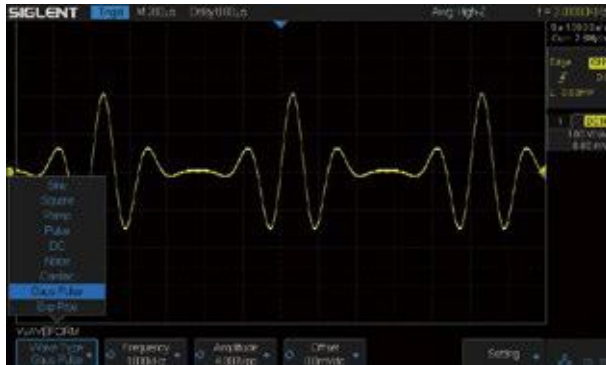
The color temperature display is similar to the intensity-graded trace except that the trace occurrence is represented by different colors (color "temperature") as opposed to changes in the intensity of one color. Red represents the most common occurrences or probabilities while blue are the least common points.

• Serial bus decoding Function (optional)



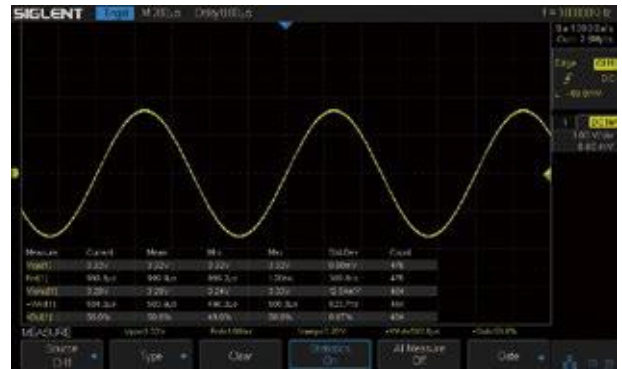
SDS1000X displays the decoding through the events list. Bus protocol information can be quickly and intuitively displayed in table form

• Built-in 25MHz function/arbitrary waveform generator (SDS1000X-S model)



The SDS1000X-S has a built-in 25MHz function / arbitrary waveform generator, including 10 built-in waveforms plus 4 ARBs. The EasyWave PC software (included) to enter and edit arbitrary waveforms

• Comprehensive statistical functions



Parametric statistical functions to display any parameters of the five measurements: current, average, Minimum value, Maximum value, and the standard deviation. The measurement count is also displayed. The maximum number of parameters that can be measured and simultaneously analyzed statistically is five. Support Gating measurements, Math measurement, History measurement, Ref measurement.

• Hardware-Based High Speed Pass/Fail Function



The SDS1000X utilizes a hardware-based Pass / Fail function, performing up to 60,000 Pass / Fail decisions each second. With easy to generate user-defined test templates, the SDS1000X compares the current measured trace to the template mask trace making it suitable for long-term signal monitoring or automated production line testing.

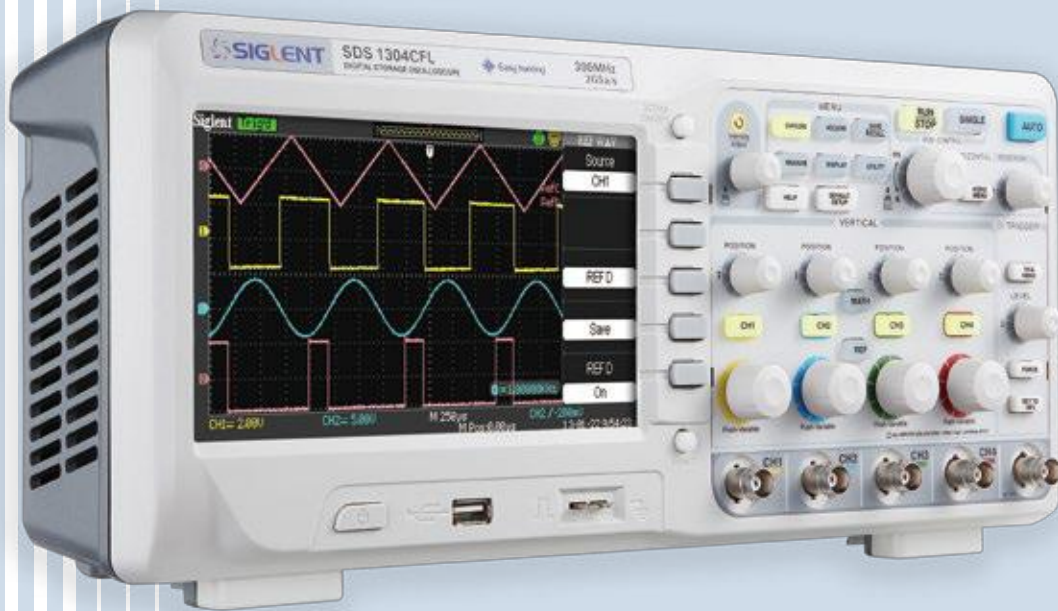
Specifications

Model	SDS1102X	SDS1102X-S	SDS1202X	SDS1202X-S
Bandwidth	100MHz		200MHz	
Sample Rate(Max)	1GSa/s			
Channels	2+EXT			
Memory Depth(Max)	7Mpts/CH (Dual-Channel); 14Mpts/CH (Single-Channel)			
Waveform Capture Rate	60,000 wfms/s			
Trigger Type	Edge, Slope, Pulse width, Window, Runt, Interval, Dropout, Pattern, Video			
Serial Trigger (Optional)	I ² C, SPI, UART/RS232, CAN, LIN			
Decode Type (Optional)	I ² C, SPI, UART/RS232, CAN, LIN			
DDS Waveform Generator	No	Yes	No	Yes
	Single Channel, Max Frequency up to 25MHz, 125 MS/s waveform generation Capabilities, wave length 16Kpts			
I/O	USB Host, USB Device, LAN, Pass/Fail, Trigger Out, 1KHz Cal			
Probe(Std)	2 pcs passive probe PP510		2 pcs passive probe PP215	
Display	8 inch TFT LCD (800x480)			
Weight	Net weight 3.26 Kg, Gross weight 4.25Kg			

Ordering Information

Product Description	Product Name
100MHz Two Channels	SDS1102X
200MHz Two Channels	SDS1202X
100MHz Two Channels Built-In Waveform Generator	SDS1102X-S
200MHz Two Channels Built-In Waveform Generator	SDS1202X-S
Standard Accessories	
USB Cable -1	
Quick Start-1	
Certificate-1	
Passive Probe-2	
Power Cord -1	
CD (Included User Manual and EasyScopeX software-1)	
Optional Accessories	
I ² C,SPI,UART/RS232,CAN,LIN Decode key	SDS-1000X-DC
USB-GPIB Adapter	USB-GPIB
Isolated Front End	ISFE
High Voltage Probe	HPB4010
Current Probe	CP4020/ CP4050/ CP4070A/ CP5030/ CP5030A/ CP5150/ CP5500
Differential Probe	DPB4080/ DPB5150/ DPB5150A/ DPB5700/ DPB5700A





SDS1000CFL Digital Storage Oscilloscope

Application

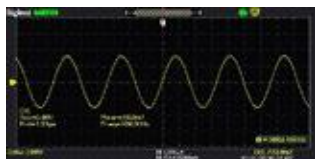
- Embedded electronic circuit design and test
- Mechanical and electrical products design and analysis
- Education and research
- Product quality control
- Real-time signal display
- Product test, circuit function test

Key Features

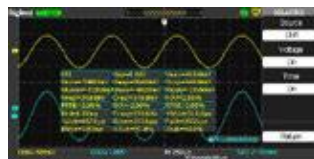
- Up to 300MHz bandwidth, 2GSa/s real time sampling rate
- Channels: 2/4CH + 1 EXT
- 7 inches(8*18div) color TFT-LCD
- 6 digits hardware frequency counter, real time counting display
- Waveform record and play back function
- Unique digital filter and data recorder function
- Embedded 12 languages, online help, one key storing and one key printing
- Interface: Double USB Host, USB Device, LAN, Pass/Fail
- Support USB-TMC and VXI-11 protocol, support SCPI programming command control

Specifications

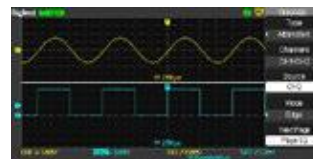
Model	SDS1302CFL (2 CH) SDS1304CFL (4 CH)	SDS1202CFL (2 CH) SDS1204CFL (4 CH)	SDS1104CFL (4 CH)	SDS1074CFL (4 CH)
Bandwidth	300MHz	200MHz	100MHz	70MHz
Channels	4CH +1 EXT/2CH +1 EXT		4CH+1 EXT	
Real time sampling rate	2GSa/s(half channel),1GSa/s(each channel)			
Equivalent sampling rate	50GSa/s			
Memory depth	24Kpts(half channel),12Kpts(each channel)			
Rise time	<1.2ns	<1.7ns	<3.5ns	<5.0ns
Input impedance	1MΩ 13pF, 50Ω		1MΩ 13pF	
Time base range	1.0ns/div-50s/div Scan:100ms-50s/div	2.5ns/div-50s/div	2.5ns/div-50s/div	5ns/div-50s/div
Vertical sensitivity	2mv-5v/div(1-2-5 order)			
Vertical resolution	8bit			
Trigger source	CH1, CH2, CH3, CH4, Ext, Ext/5, AC Line			
Trigger types	Edge, Pulse, Video, Slope, Alternative			
Math operation	+, -, *, / , FFT			
Digital filter	High pass, Low pass, Band pass, Band stop			
Max input voltage	±400 V (DC+AC Pk-Pk) CATI CAT II			
Internal storage	2/4 groups of reference waveform, 20 groups of settings,20 groups of waveforms			
External storage	Bitmap save, CSV save, Waveform save, Setting save			
Language	English, French, German, Russian, Spanish, Simplified Chinese, Traditional Chinese, Portuguese, Japanese, Korean, Italian, Arabic			
Interface	Double USB Host, USB Device, LAN, Pass/Fail			
Display	7 inches color TFT- LCD			



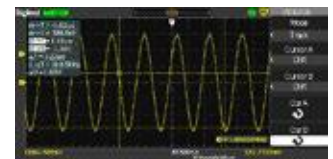
8×18 div widescreen



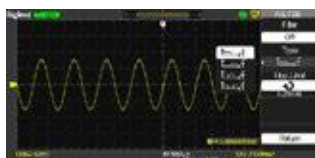
32 types of auto measurements



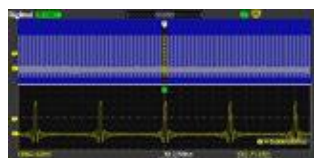
Alternative-trigger



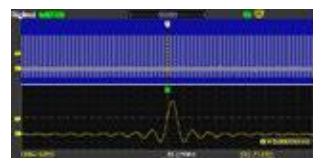
Cursor-measurement



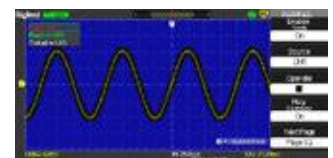
Digital-filter



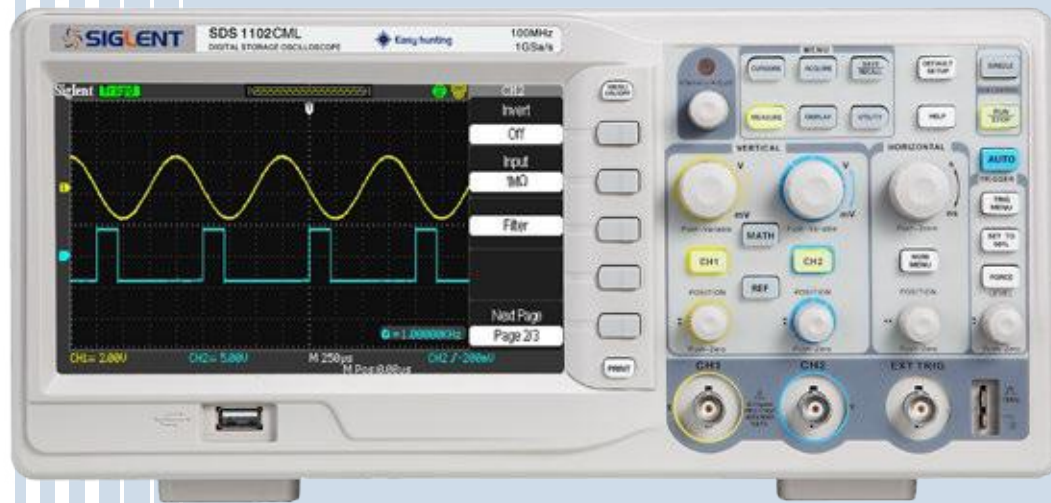
Onekey Zoom-1



Onekey Zoom-2



Pass-fail



SDS1000DL/CML Digital Storage Oscilloscope

Application

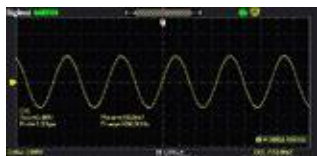
- Electronic circuit design and debugging
- Electrical circuit function test
- Inspect instantaneous signal
- Industrial control and measuring
- Products quality control
- Education and training

Key Features

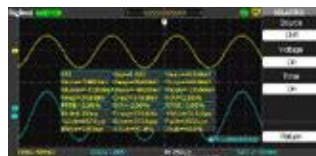
- 50MHz to 100MHz Bandwidth
- 500MSa/s~1GSa/s sampling rate, 32Kpts~2Mpts memory depth
- 7 inches (8*18div) color TFT-LCD display
- 6 digits hardware frequency counter, real time counting display
- Waveform record and play back function
- Unique digital filter and data recorder function
- Embedded 12 languages, online help, one key storing and one key printing
- Interface: USB Device, USB Host, RS-232, Pass/Fail
- Supports USB-TMC protocol and SCPI programming command control

Specifications

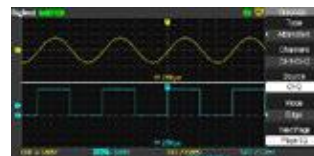
Model	SDS1052DL	SDS1072CML	SDS1102CML
Bandwidth	50MHz	70MHz	100MHz
Channels	2CH +1EXT		
Real time sampling rate	500MSa/s	1GSa/s	1GSa/s
Equivalent sampling rate	50GSa/s		
Memory depth	32Kpts	2Mpts	2Mpts
Input impedance	1M Ω 17pF	1M Ω 17pF	1M Ω 17pF
Vertical sensitivity	2mv~10v/div	2mv~10v/div	2mv~10v/div
Vertical resolution	8bit		
Trigger source	CH1, CH2, Ext, Ext/5, AC Line		
Trigger types	Edge, Pulse, Video, Slope, Alternative		
Math operation	+, -, *, / , FFT		
Digital filter	High pass, Low pass, Band pass, Band stop		
Data recorder function	√	√	√
Max input voltage	± 400 V (DC+AC Pk-Pk) CAT I CAT II		
Internal storage	2 groups of reference waveform, 20 groups of setting,10 groups of waveform		
External storage	Bitmap save, CSV save, Waveform save, Setting save		
Lasting	Turn off, 1s, 2s, 5s, infinite		
Language	English, French, German, Russian, Spanish, SimplifiedChinese, TraditionalChinese, Portuguese, Japanese, Korean, Italian, Arabic		
Interface	USB Host, USB Device, RS-232, Pass/Fail		
Display	7 inches color TFT-LCD		
Power	AC 100-240V, 45Hz-440Hz, 50VA Max		



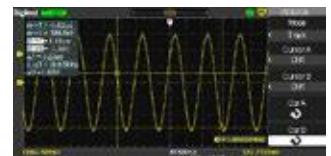
8×18 div widescreen



32 types of auto measurements



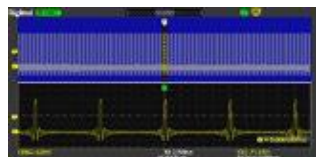
Alternative-trigger



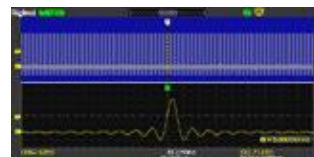
Cursor-measurement



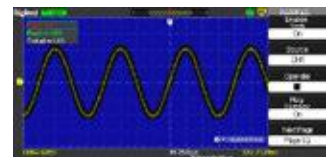
Digital-filter



Onekey Zoom-1



Onekey Zoom-2



Pass-fail

Standard Accessories



SDG5000 Function/Arbitrary Waveform Generator



Application

- IC test
- Simulate sensor
- Simulate environment signals
- Electrical circuit function test
- Education and training

Key Features

- DDS technology, double channels output, phase adjustable
- Output frequency up to 160MHz, 500MSa/s sampling rate, 14bit vertical resolution, 512Kpts max wave length
- 2ppm high frequency stability, -116dBc/Hz low phase noise
- Abundant modulation functions, sweep-frequency output, burst output
- Built-in high precision frequency counter, frequency range: 100mHz - 200MHz
- Unique EasyPulse technology, can output the pulse signal which have low jitter, fast rising and falling edge, very small duty cycle. Edge and pulse width can be a wide range of adjustment.
- Seamless work with siglent Digital Storage Oscilloscope
- Supports USB-TMC protocol and SCPI programming command control

Specifications

Model	SDG5162
Maximum output frequency	160MHz
Output channels	2
Sampling rate	500MSa/s
Wave length	CH1:16Kpts,CH2:512Kpts
Frequency resolution	1μHz
Vertical resolution	14bit
Waveform	Sine, Square, Ramp, Pulse, Gaussian white noise, Arb
Modulation function	AM, DSB-AM, FM, PM, FSK, ASK, PWM, Sweep, Burst
Amplitude	CH1/CH2≤40MHz: 1mVpp~10Vpp(50Ω), 2mVpp~20Vpp(high impedance) 40MHz~100MHz: 1mVpp~5Vpp(50Ω), 2mVpp~10Vpp(high impedance) 100MHz~160MHz: 1mVpp~1.5Vpp(50Ω), 2mVpp~3Vpp(high impedance)
Frequency counter	Frequency range: 100 mHz ~ 200 MHz
Interface	USB Host, USB Device
Optional interface	USB-GPIB Adapter
Dimension	261mm*104.85mm*343.8mm



Burst



DSB-AM



PSK



PWM



Sweep



Up to 160MHz

SDG2000X Series Function/Arbitrary Waveform Generator

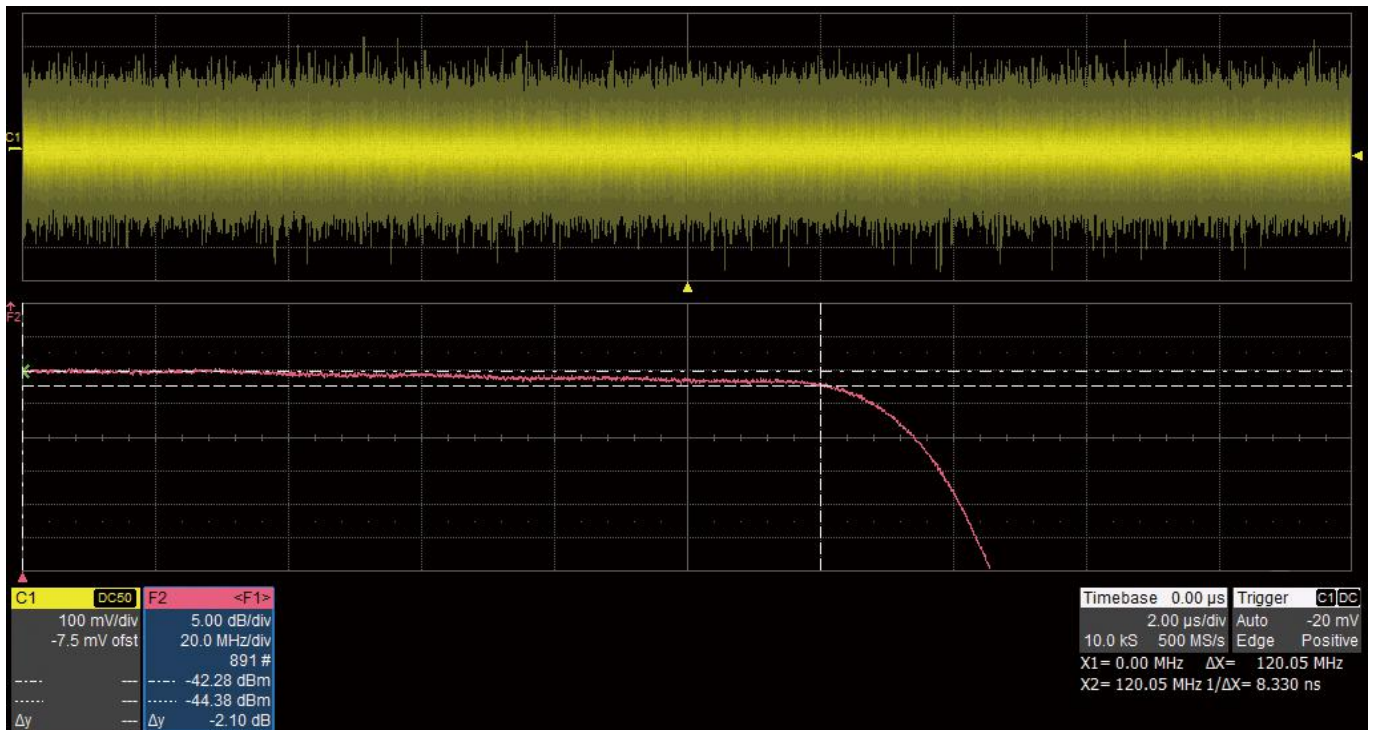


Key Features

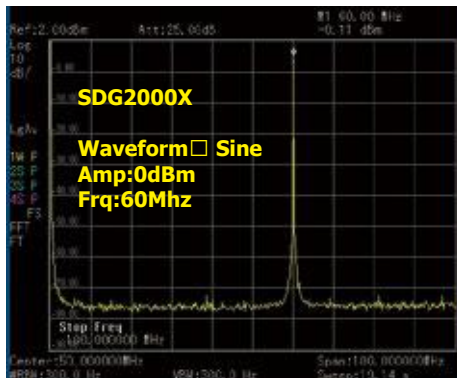
- Dual-channel, 120MHz maximum bandwidth, 20Vpp maximum output amplitude, high fidelity output with 80dB dynamic range
- High-performance sampling system with 1.2GSa/s sampling rate and 16-bit vertical resolution. No detail in the waveforms will be lost
- Innovative TrueArb technology, based on a point-by-point architecture, supports any 8pts~8Mpts Arb waveform with a sampling rate in range of 1 μ Sa/s~75MSa/s
- Innovative EasyPulse technology, capable of generating lower jitter Square or Pulse waveforms, brings a wide range and extremely high precision in pulse width and rise/fall times adjustment
- Plenty of analog and digital modulation types: AM、DSB-AM、FM、PM、PSK、FSK、ASK and PWM
- Practical functions: Channel Copy, Channel Coupling, Channel Track, harmonic generator, overvoltage protection function
- Sweep and Burst function, Harmonics mode supported
- High precision Frequency Counter
- Standard interfaces: USB Host, USB Device (USBTMC) , LAN (VXI-11)
- Optional interface: USB-GPIB
- 4.3" touch screen display for easier operation

Characteristics

• Excellent Analog Channel Performance

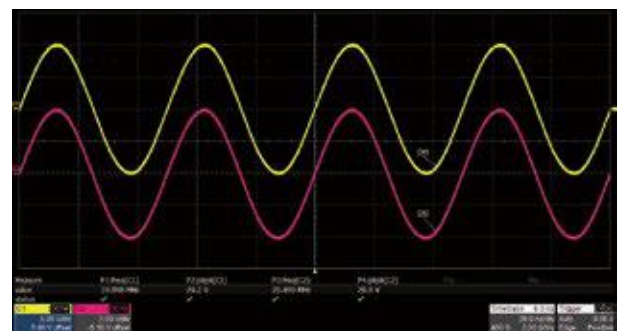


▶ The bandwidth of analog channels proves to be greater than 120MHz, via doing a frequency response test with white noise.

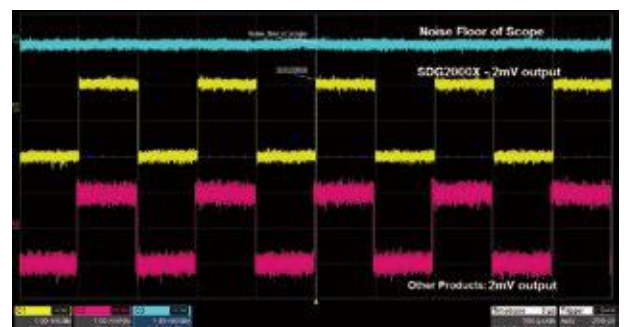


◀ High fidelity sine output. Almost no spurious observed @60MHz, 0dBm.

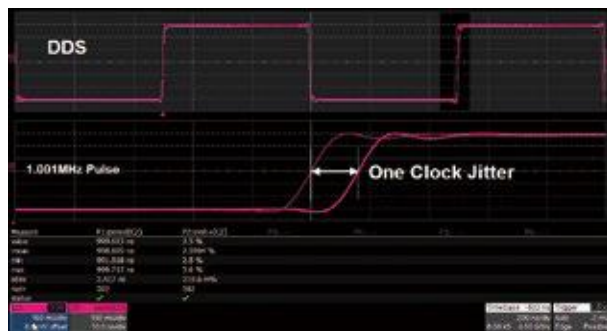
▶ Capacity of outputting large signal at high frequency. Dual-channel, 20 Vpp amplitude can be guaranteed even @20 MHz.



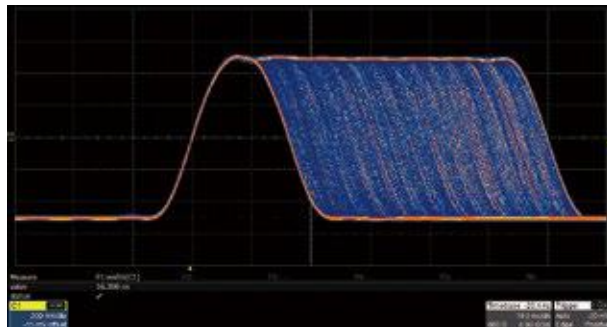
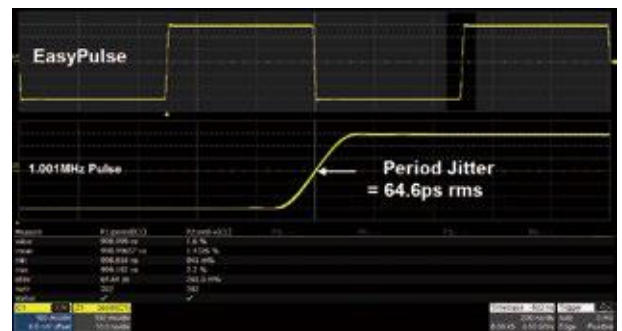
▶ Low noise floor, improves signal-noise ratio.



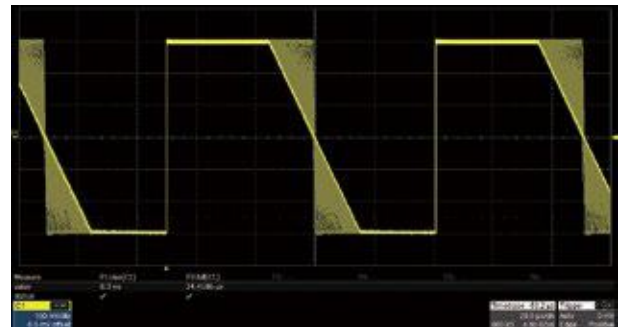
• Innovative EasyPulse Technology



When a Square/Pulse waveform is generated by DDS, there will be a one-clock-jitter if the sampling rate is not an integer-related multiple of the output frequency. SDG2000X EasyPulse technology successfully overcomes this weakness in DDS designs and helps to produce low jitter Square/Pulse waveforms.



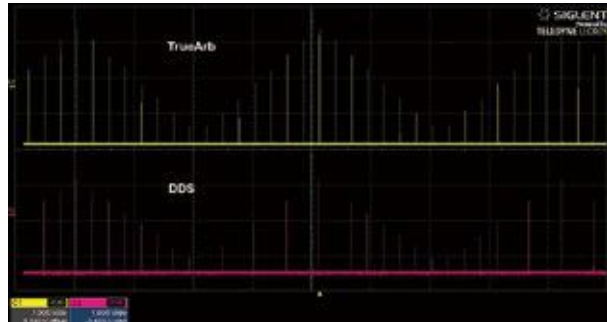
The Pulse width can be fine-tuned to the minimum of 16.3ns with the adjustment step as small as 100ps.



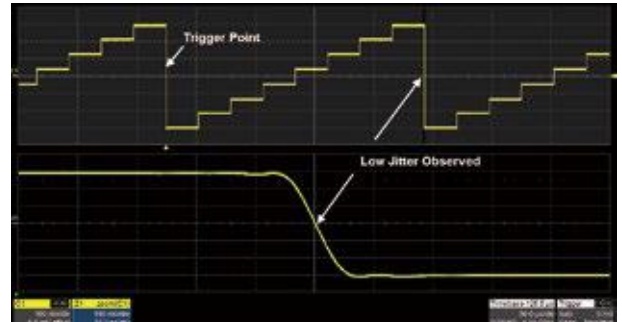
The rise/fall times can be set independently to the minimum of 8.4ns at any frequency and to the maximum of 22.4s. The adjustment step is as small as 100 ps.

• Innovative TrueArb Technology

For arbitrary waveforms, TrueArb not only has all the advantages of traditional DDS, but also eliminates the probability that DDS may cause serious jitter and distortion.

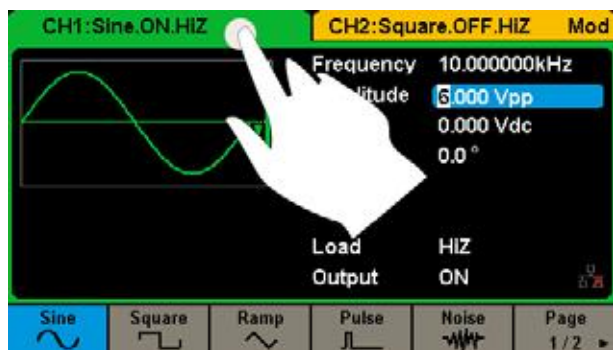


TrueArb generates arbitrary waveforms point by point, never skips any point so that it can reconstruct all the details of the waveform as defined.



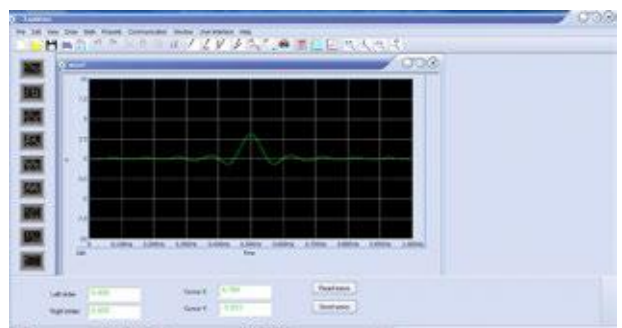
As with EasyPulse, TrueArb effectively overcomes the defect that DDS may cause the one-clock-jitter in arbitrary waveforms.

• 4.3" Touch Screen Display



4.3" touch screen display, makes operation much more convenient.

• Arbitrary Waveform Software EasyWave

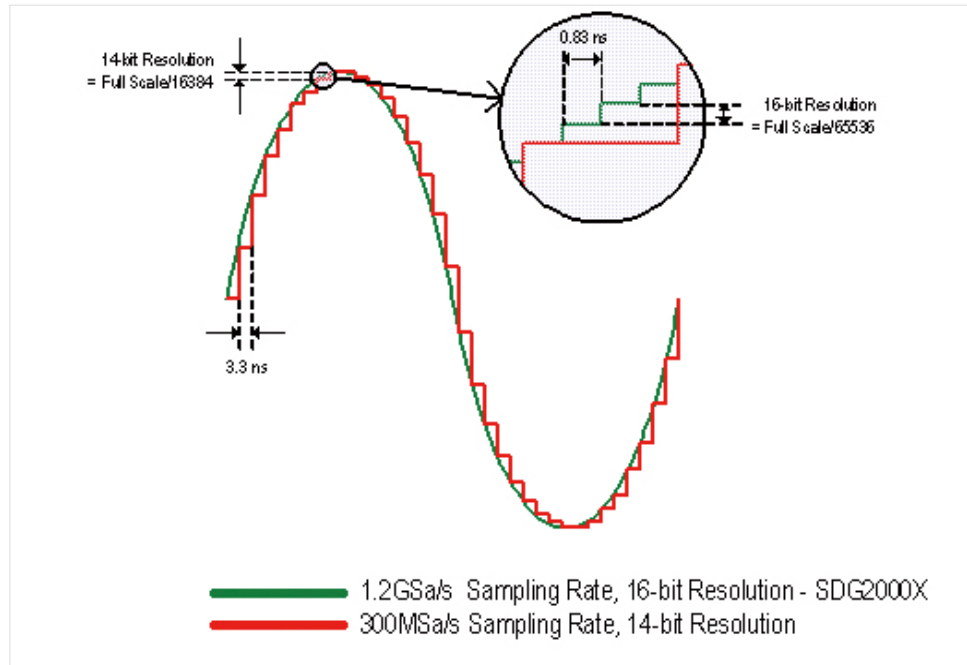


EasyWave is a powerful arbitrary waveform editing software that supports several ways to generate arbitrary waveform such as manual drawing, line-drawing, equation-drawing, coordinate-drawing, etc. It is quite convenient for users to edit their own arbitrary waveforms through EasyWave.

Characteristics

• High-performance Sampling System

Benefiting from a 1.2GSa/s and 16-bit sampling system, SDG2000X achieves extremely high accuracy performance in both time domain and amplitude, which results in more accurately reconstructed waveforms and lower distortion.



Specifications

Product Model	SDG2042X		SDG2082X		SDG2122X
Bandwidth	40MHz		80 MHz		120 MHz
Sampling rate	1.2 GSa/s (4X Interpolation)				
Vertical resolution	16 bit				
Num. of channels	2				
Max. amplitude	±10V				
Display	4.3" touch screen display, 480 x 272 x RGB				
Interface	Standard: USB Host, USB Device, LAN Optional: GPIB (USB-GPIB adaptor)				
Frequency Characteristics					
Parameter	Min.	Typ.	Max.	Unit	Condition
Resolution			1μ	Hz	
Initial accuracy	-1		+1	ppm	25℃
	-2		+2	ppm	0~40℃
1 st -year aging	-1		+1	ppm	25℃
10-year aging	-3.5		+3.5	ppm	25℃
Sine Characteristics					
Parameter	Min.	Typ.	Max.	Unit	Condition
Frequency	1μ		120M	Hz	
Harmonic distortion			-65	dBc	0 dBm, 0~10 MHz (Included)
			-60	dBc	0 dBm, 10~20 MHz (Included)
			-55	dBc	0 dBm, 20~40 MHz (Included)
			-50	dBc	0 dBm, 40~60 MHz (Included)
			-45	dBc	0 dBm, 60~80 MHz (Included)
			-40	dBc	0 dBm, 80~100 MHz (Included)
			-38	dBc	0 dBm, 100~120 MHz (Included)
Total Harmonic Distortion			0.075	%	0 dBm, 10 Hz ~ 20 kHz
Non-harmonic spurious			-70	dBc	≤50 MHz
			-65	dBc	>50 MHz

Waveform Generator

Square Characteristics

Parameter	Min.	Typ.	Max.	Unit	Condition
Frequency	1μ		25M	Hz	
Rise/fall times			9	ns	10% ~ 90%, 1 Vpp, 50ΩLoad
Overshoot			3	%	100 kHz, 1 Vpp, 50ΩLoad
Duty cycle	0.001		99.999	%	Limited by frequency setting
Jitter (rms), Cycle to cycle			150	ps	1 Vpp, 50Ω Load

Pulse Characteristics

Parameter	Min.	Typ.	Max.	Unit	Condition
Frequency	1μ		25M	Hz	
Pulse width	16.3			ns	
Pulse width accuracy			±(0.01%+0.3ns)		
Rise/fall times	8.4n		22.4	s	10% ~ 90%, 1 Vpp, 50Ω Load, Subject to pulse width limits
Overshoot			3	%	100 kHz, 1 Vpp
Duty cycle	0.001		99.999	%	Limited by frequency setting
Duty cycle resolution	0.001			%	
Jitter (rms) cycle to cycle			150	ps	1 Vpp, 50Ω Load

Arbitrary Wave characteristics

Parameter	Min.	Typ.	Max.	Unit	Condition
Frequency	1μ		20M	Hz	
Waveform length	8		8M	pts	
Sampling rate	1μ		75M	Sa/s	TrueArb mode
	300			MSa/s	DDS mode
Vertical solution	16			bit	
jitter (rms)			150	ps	1 Vpp, 50Ω Load, TrueArb mode

Output Characteristics

Parameter	Min.	Typ.	Max.	Unit	Condition
Range	2m		20	Vpp	≤20MHz, HiZ load
(Note 1)	2m		10	Vpp	>20MHz, HiZ load
	1m		10	vpp	≤20MHz, 50Ω load
	1m		5	vpp	>20MHz, 50Ω load
Accuracy	±(1%+1mVpp)				10 kHz sine, 0 V offset
Amplitude flatness	-0.3		+0.3	dB	0~100 MHz (Included), 50Ω load, 2.5Vpp, compare to 10kHz Sine
	-0.4		+0.4	dB	100~120 MHz (Included), 50Ω load, 2.5Vpp, compare to 10kHz Sine
Output impedance	49.5	50	50.5	Ω	10kHz sine
Output current	-200		200	mA	
Crosstalk			-60	dBc	CH1 - CH2/CH2 - CH1

Note 1: The specification will be divided by 2 while applied to a 50Ω load.

Ordering Information

Product Description

SDG2000X Series Function/Arbitrary Waveform Generator

Product code	SDG2122X	120MHz
	SDG2082X	80MHz
	SDG2042X	40MHz
Standard configurations	A Quick Start, A Quality Certification, A Power Cord, A USB Cable, A CD (Including Quick Start, data sheet, and Application Software Package), A Calibration Certificate, A BNC Coaxial Cable	
Optional configurations	USB-GPIB adapter	

SDG1000

Function/Arbitrary Waveform Generator



Application

- IC test
- Simulate sensor
- Simulate environment signals
- Electrical circuit function test
- Education and training

Key Features

- Apply DDS technology, double channels output, phase adjustable
- Output frequency up to 50MHz, 125MSa/s sampling rate, 14bit vertical resolution, 16Kpts wave length
- 5 types of standard waveforms, built-in 46 types of arbitrary waveforms
- Abundant modulation functions, sweep-frequency output, burst output
- Built-in high precision frequency counter, frequency up to 200MHz
- Interfaces: USB Device, USB Host, USB-GPIB Adapter(optional)
- Seamlessly work with siglent Digital Storage Oscilloscope
- Support USB-TMC protocol and SCPI programming command control

Specifications

Model	SDG1050	SDG1025	SDG1010
Maximum output frequency	50MHz	25MHz	10MHz
Output channels	2		
Sampling rate	125MSa/s		
Wave length	16Kpts		
Frequency resolution	1μHz		
Vertical resolution	14bit		
Waveform	Sine, Square, Ramp, Pulse, Gaussian white noise, 48 types of built-in function waveforms, Arb		
Modulation function	AM, DSB-AM, FM, PM, FSK, ASK, PWM, Sweep, Burst		
Amplitude	CH1: 2mVpp~10Vpp(50Ω), 4mVpp~20Vpp(high impedance) ≤10MHz 2mVpp~5Vpp(50Ω), 4mVpp~10Vpp(high impedance) >10MHz CH2: 2mVpp~3Vpp(50Ω), 4mVpp~6Vpp(high impedance)		
Frequency counter	Frequency range: 100 mHz ~ 200 MHz		
Interface	USB Host, USB Device		
Optional interface	USB-GPIB adapter		
Dimension	229mm*105mm*281mm		





SDG800 Function/Arbitrary Waveform Generator

Application

- Simulate sensor
- Simulate environmental signal
- Circuit function test
- IC chip test
- Research and education

Key Features

- Advanced DDS technology, 125MSa/s sampling rate, 14bit vertical resolution
- Single channel output, 5 kinds of standard waveforms, built-in 46 kinds of arbitrary waveforms (including DC)
- Complete modulation functions: AM, DSB-AM, FM, PM, FSK, ASK, PWM, linear/logarithmic sweep and burst
- Innovative EasyPulse technology, can output pulse of low jitter, quick rising/falling edge
- Standard interfaces: USB Device, USB Host, support U-Disk storage and software update
- Provide 10 nonvolatile storage spaces for user's arbitrary waveforms
- Be capable of seamlessly connected to SIGLENT Digital Storage Oscilloscope
- Configurable with powerful arbitrary waveform editing software EasyWave

Specifications

Model	SDG805	SDG810	SDG830
Maximum output frequency	5MHz	10MHz	30MHz
Output channels	1		
Sampling rate	125 MSa/s		
Wave length	16 kpts		
Frequency resolution	1 μ Hz		
Vertical resolution	14bit		
Waveform	Sine, Square, Ramp, Pulse, Gaussian white noise, Arbitrary waveform, 46 types of built-in arbitrary waveforms		
Sine wave	1 μ Hz ~ 5MHz	1 μ Hz ~ 10MHz	1 μ Hz ~30MHz
Square wave	1 μ Hz ~ 5MHz	1 μ Hz ~ 10MHz	1 μ Hz ~10MHz
Pulse	500 μ Hz ~ 5MHz	500 μ Hz ~ 5MHz	500 μ Hz ~5MHz
Ramp/Triangular	1 μ Hz ~ 300KHz	1 μ Hz ~ 300KHz	1 μ Hz ~ 300KHz
Gaussian white noise	>5MHz bandwidth(-3dB)	>10MHz bandwidth(-3dB)	>30MHz bandwidth(-3dB)
Arbitrary waveform	1 μ Hz ~ 5MHz	1 μ Hz ~ 5MHz	1 μ Hz ~ 5MHz
Modulation function	AM, FM, PM, DSB-AM, FSK, ASK, PWM, Sweep, Burst		
Standard configuration	USB Host & USB Device		
Amplitude(high impedance)	4mVpp~20Vpp(\leq 10MHz) 4mVpp~10Vpp(>10MHz)		

SPD3303

Programmable Linear DC Power Supply



Application

- R&D lab general purpose testing
- Teaching lab experiment
- Automotive electronic test
- Production testing and quality assessment inspection

Key Features (SPD3303X/SPD3303X-E)

- 3 independent controlled and isolated output, 32V/3.2A×2, 2.5V/3.3V/5V/3.2A×1, total 220W
- Max 5 digits Voltage, 4 digits Current Display, Minimum Resolution: 1mV/1mA
- Supports panel timing output functions
- 4.3 inch true color TFT- LCD 480x272 display
- 3 types of output modes: independent, series, parallel
- 100V/120V/220V/230V compatible design to meet the needs of different power grids.
- Intelligent temperature-controlled fan , effectively reducing noise
- Clear graphical interface, with the waveform display function
- Internal 5 groups of system parameter save/recall, supports data storage space expansion
- Provides PC software: Easypower , supports SCPI , LabView driver

Key Features (SPD3303C)

- 3 independent high precision output: 32V/3.2A×2, 2.5V/3.3V/5V/3.2A×1, total 220W
- 4 digits voltage and 3 digits current display, min resolution: 10mV, 10mA
- Three output modes: independent, series and parallel
- 100V/120V/220V/230V compatible design, to meet the need of different power grids
- Smart temperature controlled fan, effectively reduce the noise
- Save/Recall 5 group system specifications, support data storage expansion
- Connected to PC via USB Device, support SCPI command, to meet the control and communication needs

Specifications

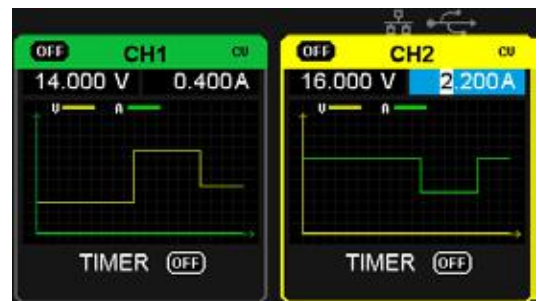
Model	SPD3303C	SPD3303X-E	SPD3303X
Channels	CH1: DC voltage range: 0-32V, DC current range: 0-3.2A		
	CH2: DC voltage range: 0-32V, DC current range: 0-3.2A		
	CH3: DC voltage range: 2.5/3.3/5.0V, DC current range: 0-3.2A		
Max output power	220W		
Resolution	10mV / 10mA		1mV / 1mA
Display digits	LED display 4 digits voltage 3 digits current	4.3 inches TFT-LCD display 4 digits voltage 3 digits current	4.3 inches TFT-LCD display 5 digits voltage 4 digits current
Ripple noise	CV/CH3: $\leq 1\text{mVrms}(5\text{Hz}\sim 1\text{MHz})$ CC: $\leq 3\text{mArms}$		
Standard interface	USB Device		
Dimension	225mm(W) \times 136mm(H) \times 275mm(D)		
Weight	7.5kg(SPD3303C) 8kg(SPD3303D/S/X/X-E)		

• Panel displays the timing output

Through front panel operation, 5 groups of timing settings and output control can be displayed, which provides users a simple power programming function. Also a connection can be made with Siglent's EasyPower PC software providing a full range of communication and control requirements.



Panel timing output



Real time wave display

• Save/Recall setting parameters

SPD3000X series programmable power supply can save or recall 5 groups of setting parameter in internal storage, also supports external storage expansion. You can easily obtain the settings you needed.



Internal Storage



PC Timer



SDM3000 Digital Multimeter

Application

- Research & Development Laboratory
- Detection and Maintenance
- Calibration Laboratory
- Automatic Production Test

Key Features

- Real 5½ digits readings resolution
- Up to 150 rdgs/s measurement speed
- True-RMS AC Voltage and AC Current measuring
- 1Gb Nand flash size, Mass storage configuration files and data files
- Built-in cold terminal compensation for thermocouple
- Standard interface: USB Device, USB Host, LAN, GPIB (only for SDM3055A)
- Support remote control via commands and compatible with commands of main stream multimeters

Specifications

DC Characteristic

Accuracy± (% of Reading + % of Range) ^[1]

Function	Range ^[2]	Test current or Load voltage	1 Year 23°C±5°C	Temperature coefficient 0°C~18°C 28°C~50°C
DC Voltage	200 mV		0.015+0.004	0.0015+0.0005
	2 V		0.015+0.003	0.0010+0.0005
	20 V		0.015+0.004	0.0020+0.0005
	200 V		0.015+0.003	0.0015+0.0005
	1000 V ^[4]		0.015+0.003	0.0015+0.0005
DC Current	200 µA	<8 mV	0.055+0.005	0.003+0.001
	2 mA	<80 mV	0.055+0.005	0.002+0.001
	20 mA	<0.05 V	0.095+0.020	0.008+0.001
	200 mA	<0.5 V	0.070+0.008	0.005+0.001
	2A	<0.1 V	0.170+0.020	0.013+0.001
Resistance ^[3]	10 A ^[5]	<0.3 V	0.250+0.010	0.008+0.001
	200 Ω	1 mA	0.030+0.005	0.0030+0.0006
	2 KΩ	1 mA	0.020+0.003	0.0030+0.0005
	20 KΩ	100 µA	0.020+0.003	0.0030+0.0005
	200 KΩ	10 µA	0.020+0.010	0.0030+0.0005
Diode Test	2 MΩ	1 µA	0.040+0.004	0.0040+0.0005
	10 MΩ	200 nA	0.250+0.003	0.0100+0.0005
	100 MΩ	200 nA 10MΩ	1.75+0.004	0.2000+0.0005
	2.0 V ^[6]	1 mA	0.05+0.01	0.0050+0.0005
	Continuity Test	1 mA	0.05+0.01	0.0050+0.0005

Remarks:

[1]Specifications are for 0.5 hour warm-up, "Slow" measurement rate and calibration temperature 18 °C ~ 28 °C.

[2]20% over range on all ranges except for DCV 1000V, ACV 750V, DCI 10A and ACI 10A.

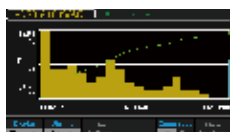
[3]Specifications are for 4-wire measure or 2-wire measure under "REF" operation. ±0.2Ω of extra errors will be generated if perform 2-wire measure without "REF" operation.

[4]Plus 0.02mV of error per 1V after the first ±500 VDC.

[5]30 seconds OFF after 30 seconds ON is recommend for the continuous current that higher than DC 7A or AC RMS 7A.

[6]Accuracy specifications are only for voltage measuring at input terminal. The typical value of current under measure is 1mA. Voltage drop at diode junction may vary with current supply.

Features



Histogram



Trend Chart

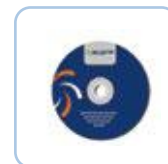


Bar Chart



Interface

Standard Accessories





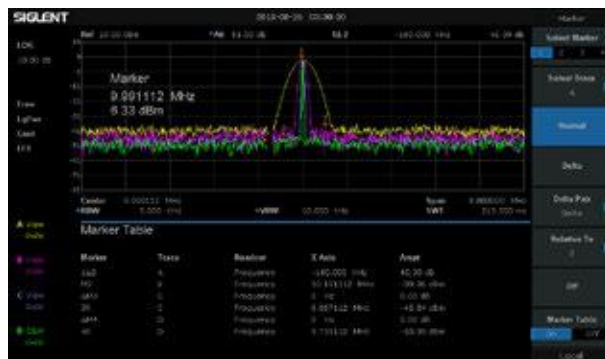
SSA3000X Spectrum Analyzer

Key Features

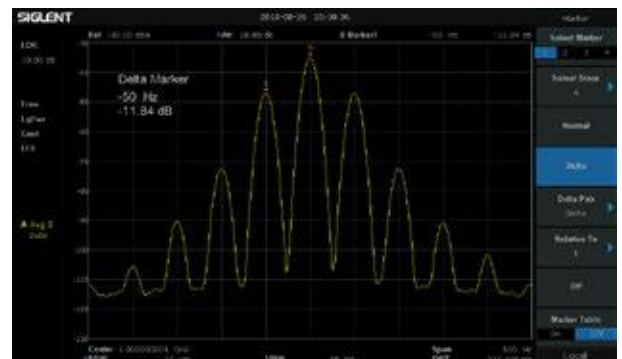
- All-Digital IF Technology
- Frequency Range from 9 kHz up to 3.2 GHz
- -161 dBm/Hz Displayed Average Noise Level (Typ.)
- -98 dBc/Hz @10 kHz Offset Phase Noise (1 GHz, Typ.)
- Total Amplitude Accuracy < 0.7 dB
- 10 Hz Minimum Resolution Bandwidth (RBW)
- Standard Preamplifier
- Up to 3.2 GHz Tracking Generator Kit (Opt.)
- Reflection Measurement Kit (Opt.)
- Advanced Measurement Kit (Opt.)
- EMI Pre-compliance Measurements Kit (Opt.)
- 10.1 Inch WVGA (1024x600) Display

Characteristics

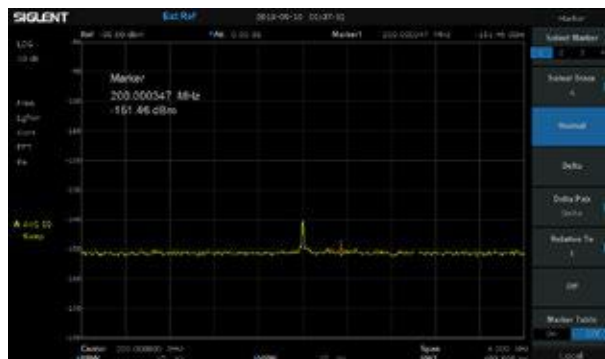
- Support four traces and cursors independently



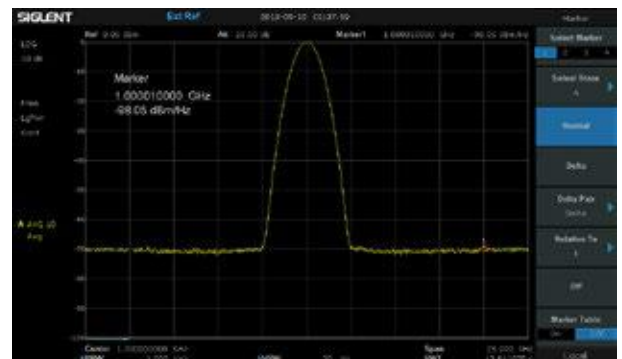
- 10 Hz Minimum Resolution Bandwidth (RBW)



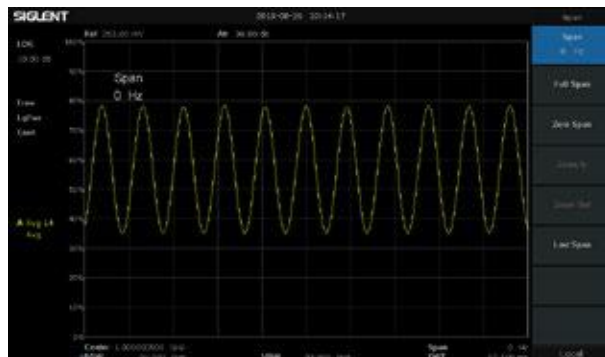
- 151 dBm Displayed Average Noise Level (RBW=10 Hz)



- Phase noise -98 dBc/Hz@1 GHz, offset 10 kHz



- Demodulation at the zero span



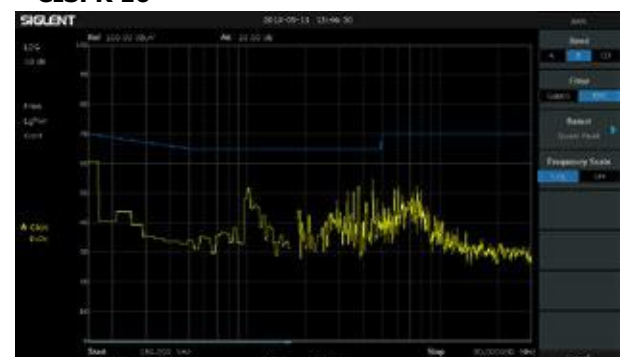
- Advanced power measurement, calculate the ACPR parameters



- Reflection measurement, acquire characteristic curve of the Return Loss



- EMI filter, Quasi-Peak detector following CISPR 16



Specifications

Model	SSA3032X	SSA3021X
Frequency Range	9 kHz~3.2 GHz	9 kHz~2.1 GHz
Resolution Bandwidth	10 Hz~1 MHz, in 1-3-10 sequence	10 Hz~1 MHz, in 1-3-10 sequence
Displayed Average Noise Level	-161 dBm/Hz, Normalize to 1 Hz (typ.)	-161 dBm/Hz, Normalize to 1 Hz (typ.)
Phase Noise	<-98 dBc/Hz@1 GHz, 10 kHz offset	<-98 dBc/Hz@1 GHz, 10 kHz offset
Amplitude Precision	< 0.7 dB	< 0.7 dB

Ordering Information

Product Description	SSA3000X Spectrum Analyzer	Order Number
Product code	Spectrum Analyzer, 9 kHz~3.2 GHz	SSA3032X
	Spectrum Analyzer, 9 kHz~2.1 GHz	SSA3021X
Standard configurations	A Quick Start, A Product Certification, A Product Certification, A USB Cable, A CD (Including Quick Start, Data Sheet and Application Software) , A Calibration Certificate	QG-SSA3000X
Options	EMI measurement kit	EMI-SSA3000X
	Advanced measurement kit	AMK-SSA3000X
	Reflect measurement kit	Refl-SSA3000X
	Tracking Generator Kit	TG-SSA3000X
Optional accessories	Utility Kit: N (M) -SMA (M) cable N (M) -N (M) cable N (M) -BNC (F) adaptor (2 pcs) N (M) -SMA (F) adaptor (2 pcs) 10 dB attenuator	UKitSSA3X
	Refl-SSA3000X RB (1 MHz~2 GHz) N (M) -N (M) adaptor (2 pcs)	RBSSA3X20
	Near Field Probe: H field probe (4 pcs) N (M) -SMA (M) cable N (M) -BNC (F) probe	SRP5030
	N (M) -SMA (M) cable	N-SMA-6L
	N (M) -N (M) cable	N-N-6L
	N (M) -BNC (M) cable	N-BNC-6L
	Soft carrying bag	BAG-SCC



SHS1000 Handheld Digital Oscilloscope

Application

- Embedded electronic circuit design and test
- Mechanical and electrical products design and analysis
- Manufacturing and circuit function test
- Differential signal analysis
- Floating signal measurements

Key Features

- Combines the functions of oscilloscope, multimeter and recorder in one
- Isolated oscilloscope channels, isolation level: CAT II 1000V and CAT III 600V
- 60MHz/100MHz bandwidth, 1G sampling rate, 2M memory depth, 7M recording length
- Built-in lithium battery
- 5.7 inches color TFT-LCD

Specification

Model	SHS1102	SHS1062
Bandwidth	100MHz	60MHz
Rise time	≤3.5ns	≤5.8ns
Real time sampling rate	1GSa/s	
Equivalent sampling rate	50GSa/s	
Vertical sensitivity	5mV – 100V/div	
Time base range	2.5ns – 50ns/div Scan:100ms – 50s/div	5ns – 50s/div
Memory depth	2Mpts	
Triggering	Edge, Pulse, Video, Slope, Alternative	
Vertical resolution	8bit	
Triggering frequency counter	6 digits	
Data recorder	7M points	
Trend plot	800K/CH	
Interface	USB Device, USB Host	
Math operation	+, -, *, / , FFT	

Multimeter Specification

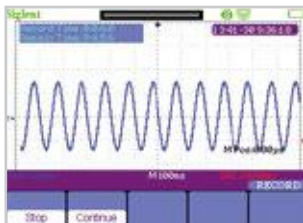
Maximum resolution	6000 Counts	
Item	Range	Accuracy
DC voltage	60mV	±1%±15digit
	600mV – 1000V	±1%±5digit
AC voltage	60mV	±1%±15digit
	600mV – 750V	±1%±5digit
DC current	60mA – 600mA	±1%±5digit
	6A – 10A	±1.5%±5digit
AC current	60mA – 600mA	±1%±5digit
	6A – 10A	±1.5%±5digit
Capacitance	40nF	±3%±10digit
	400nF – 400uF	±4%±5digit
Resistance	600Ω-60MΩ	±1%±5digit
Continuity	<50Ω Buzzer sounds	
Diode	0V – 2V	
Trend plot	1.2M points	
Measuring mode	Manual/Auto	

Isolation Level

Max input Voltage	
Input by input port directly	CATII 300V
Input by 10: 1 probe	CATII 1000V, CAT III 600V
The Max input voltage of Multimeter	DC 1000V, AC 750V
Max floating voltage	
Float voltage between BNC reference and earth ground	CATII 1000V, CAT III 600V
Float voltage between BNC reference	CATII 1000V, CAT III 600V
Float voltage between multimeter reference and earth ground	CATII 600V, CAT III 300V
Security: Isolated Handheld Digital Oscilloscope should be designed according to the standard of level II and pollution degree level II which apply to measure 1000V. Or according to the standard of level III and pollution degree level III which apply to measure 600V.	

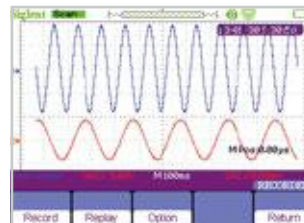
Multimeter Specification

Display	5.7 inches color TFT-LCD, 320*234
Power supply	With battery or apply DC adapter to get power from outside
Power mode	Lithium battery: 7.4V 4500mAh, Battery persisting > 4 hours DC adapter: 100-240V 50/60Hz input 9V 4A output.
Net Weight	1.5 Kg
Dimension	259.5mm*163.2mm*53.3mm
Accessories	Two Passive Probes, Multimeter pen, USB data cable, DC adapter, Manual, CD, Toolbox.



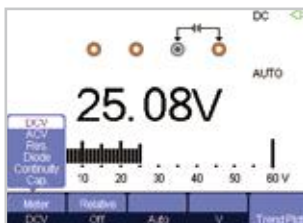
High-performance oscilloscope

- Bandwidth: 100MHz, 60MHz
- Real-time sampling rate: 1GSa/s
- Memory depth: 2Mpts.



Data recorder function

- 7M internal storage, up to 18 hours recording time
- USB port, up to 3000 hours recording time
- Record, replay function supported



High precision multimeter

- 6000 counts display
- Accurate measurement of DCV, ACV, DCI, ACI
- Accurate measurement of Resistance, Diode, Capacitance, Continuity



Trend Plot

- 32 measurement trend plot analyzer
- Scope: 800k/CH points capacity, more than 24 hours recording
- Meter: 1.2M points capacity 6000 hours recording time at 0.05Sa/s

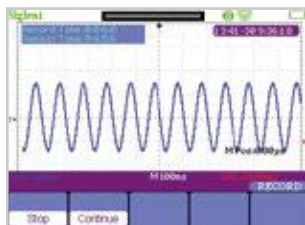




SHS800 Handheld Digital Oscilloscope

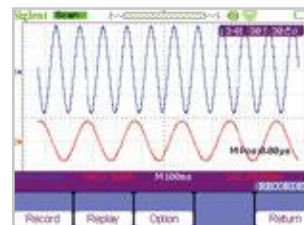
Application

- Automotive electronics, electric automobile test
- Power system strong electricity test
- Plant automation control system



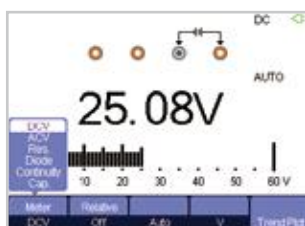
High-performance oscilloscope

- Bandwidth:100MHz,60MHz
- Real-time sampling rate:1GSa/s
- Memory depth:2Mpts.



Data recorder function

- 7M internal storage, up to 18 hours recording time
- USB port, up to 3000 hours recording time
- Record, replay function supported



High precision multimeter

- 6000 counts display
- Accurate measurement of DCV, ACV, DCI, ACI
- Accurate measurement of Resistance, Diode, Capacitance, Continuity



Trend Plot

- 32 measurement trend plot analyzer
- Scope: 800k/CH points capacity, more than 24 hours recording
- Meter: 1.2M points capacity 6000 hours recording time at 0.05Sa/s

Handheld Oscilloscope

Oscilloscope Specification












Model	SHS820	SHS810	SHS806
Bandwidth	200MHz	100MHz	60MHz
Rise time	≤1.75ns	≤3.5ns	≤5.8ns
Real time sampling rate	500MSa/s	1GSa/s	
Equivalent sampling rate	50GSa/s		
Vertical sensitivity	2mV – 100V/div		
Time base range	2.5ns – 50ns/div Scan:100ms – 50s/div		5ns – 50s/div
Memory depth	32Kpts	2Mpts	
Triggering	Edge, Pulse, Video, Slope, Alternative		
Vertical resolution	8bit		
Triggering frequency counter	6 digits		
Data Recorder	7M points		
Trend plot	800K/CH		
Interface	USB Device, USB Host		
Math operation	+, -, *, / , FFT		

Multimeter Specification














Maximum resolution	6000 Counts	
Item	Range	Accuracy
DC Voltage	60mv 60mv – 1000v	±1%±15digit ±1%±5digit
AC Voltage	60mv 600mV – 750V	±1%±15digit ±1%±5digit
DC Current	60 mA 6A – 10A	±1%±5digit ±1.5%±5digit
AC Current	60 mA 6A – 10A	±1%±5digit ±1.5%±5digit
Capacitance	40nF 400nF – 400μF	±3%±10digit ±4%±5digit
Resistance	600Ω – 60MΩ	±1%±5digit
Continuity	<50Ω Buzzer sounds	
Diode	0V – 2V	
Trend plot	1.2M points	
Measuring mode	Manual/Auto	

General Feature

Display	5.7 inches color TFT-LCD, 320*234
Power supply	Charging/Battery
Power mode	Lithium battery: 7.4V 5000mAh, Battery lasts >5 hours; DC adapter, 100-240V 50/60Hz input, 9V 4A output
Net weight	1.5 Kg
Dimension	259.5mm*163.2mm*53.3mm
Accessories	Two passive probes, multimeter pen, USB data cable, DC adapter, manual, CD.

Type	Model	Picture	Specifications
Passive Probe	PB470 PP510 PP215 PP430		PB470,70M bandwidth PP510,100 MHz bandwidth PP215,200 MHz bandwidth PP430,300 MHz bandwidth 1X/10X decay, 1M/10Mohm, 300V/600V
	PB925		Bandwidth 250MHz, fixed 10X decay, the rise time of about 1.2ns, input capacitance: 16pF, compensation range: 10pF-35pF, input impedance 10M Ω , length 120cm, safe voltage levels: CAT II 1000V, CAT III 600V
	PB830		Bandwidth 300MHz, fixed 10X decay, the rise time of about 1ns, input capacitance: 16pF, compensation range: 10pF-20pF, input impedance 10M Ω , length 140cm, safe voltage levels: CAT II 1000V, CAT III 600V
Current Probe	CP4020		Bandwidth: 100KHz; Maximum continuous current 20Arms; Peak current 60A; Switching ratio: 50mV/A; 5mV/A; DC measurement accuracy: 50mV/A (0.4A-10ApK) \pm 2%; 5mV/A (1A-60ApK) \pm 2%; 9V battery-powered
	CP4050		Bandwidth: 1MHz; Maximum continuous current 50Arms; Peak current 140A; Switching ratio: 500mV/A; 50mV/A; DC measurement accuracy: 500mV/A (20mA-14ApK) \pm 3% \pm 20mA; 50mV/A (200mA-100ApK) \pm 4% \pm 200mA; 50mV/A (100A-140ApK) \pm 15% max; 9V battery-powered
	CP4070		Bandwidth: 150KHz; Maximum continuous current 70Arms; Peak current 200A; Switching ratio: 50mV/A; 5mV/A; DC measurement accuracy: 50mV/A (0.4A-10ApK) \pm 2%, 5mV/A (1A-200ApK) \pm 2%;9V battery-powered
	CP4070A		Bandwidth: 300KHz; Maximum continuous current 70Arms; Peak current 200A; Switching ratio: 100mV/A; 10mV/A; DC measurement accuracy: 100mV/A(50mA-10ApK) \pm 3% \pm 50mA; 10mV/A (500mA-40ApK) \pm 4% \pm 50mA; 10mV/A (40A-200ApK) \pm 15%max; 9V battery-powered
	CP5030		Bandwidth: 50MHz; Maximum continuous current 30Arms; Peak current 50A; Switching ratio: 100mV/A; 1V/A; AC/DC measurement accuracy: 1A(\pm 1% \pm 1mA); 100mV/A(\pm 1% \pm 10mA); Standard DC12V/1.2A power adapter
	CP5030A		Bandwidth: 100MHz; Maximum continuous current 30Arms; Peak current 50A; Switching ratio: 100mV/A; 1V/A; AC/DC measurement accuracy: 1A(\pm 1% \pm 1mA); 100mV/A(\pm 1% \pm 10mA); Standard DC12V/1.2A power adapter
	CP5150		Bandwidth: 12MHz; Maximum continuous current 150Arms; Peak current 300A; Switching ratio: 100mV/A; 1V/A; AC/DC measurement accuracy: 100mV/A(\pm 1% \pm 1mA); 10mV/A(\pm 1% \pm 10mA); Standard DC12V/1.2A power adapter
	CP5500		Bandwidth: 5MHz; Maximum continuous current 500Arms; Peak current 750A; Switching ratio: 100mV/A; 10mV/A; AC/DC measurement accuracy: 100mV/A(\pm 1% \pm 1mA); 10mV/A(\pm 1% \pm 10mA); Standard DC12V/1.2A power adapter

Probes & Accessories

Type	Model	Picture	Specifications
High Voltage Differential Probe	DPB4080		Bandwidth: 50MHz; Maximum input differential voltage 800V (DC + Peak AC); Range selection (attenuation ratio):10X/100X; Accuracy: $\pm 1\%$; Standard DC 9V/1A power adapter
	DPB5150		Bandwidth: 70MHz; Maximum input differential voltage 1500V (DC + Peak AC); Range selection (attenuation ratio): 50X/500X; Accuracy: $\pm 2\%$; Standard 5V/1A USB power adapter
	DPB5150A		Bandwidth: 100MHz; Maximum input differential voltage 1500V (DC + Peak AC); Range selection (attenuation ratio): 50X/500X; Accuracy: $\pm 2\%$; Standard 5V/1A USB power adapter
	DPB5700		Bandwidth: 70MHz; Maximum input differential voltage 7000V (DC + Peak AC); Range selection (attenuation ratio): 100X/1000X; Accuracy: $\pm 2\%$; Standard 5V/1A USB power adapter
	DPB5700A		Bandwidth: 100MHz; Maximum input differential voltage 7000V (DC + Peak AC); Range selection (attenuation ratio): 100X/1000X; Accuracy: $\pm 2\%$; Standard 5V/1A USB power adapter
High Voltage Probe	HPB4010		Bandwidth: 40MHz; Maximum measurement voltage DC: 10KV; AC(rms): 7KV (sine); AC (Vpp): 20KV (Pulse); attenuation ratio1:1000; Accuracy: $\leq 3\%$
Logic Probe	SPL1008		Logic Probe for SDS2000 series , 8-channel, 500MSa/s
	SPL2016		Logic Probe for SDS2000X series , 16-channel, 500MSa/s
Near-field probe	SRF5030		Four near-field probes; Frequency range: 30MHz ~ 3GHz; resolution 25mm; distinguished within 10cm range of the magnetic field; for EMI radiation interference and the intensity detector
Preamplifier	EM5020		Maximum linear output power 10dBm; Frequency range: 9KHz ~ 3GHz; typical gain of about 20dB ~ 30dB; Maximum input power 13dBm ~ 15dBm
Isolated front end	ISFE		Realize isolation among ordinary oscilloscope channels, isolation between the measured signal and ground, use USB 5V power supply, plug and play, the maximum input voltage of up to $\pm 600\text{Vpk}$
GPIB	USB-GPIB		The USB Device interface extends into the GPIB interface, USB-GPIB adapter can more easily complete the task of the operation command through the GPIB, USB follow the USB2.0 specification, GPIB follow the IEEE488.2 standard
Demo board	STB Test Board		Output signals include square waves, sine, random, pulse, BURST, fast edge signal and amplitude modulation signal, 10 kinds of signals

Deskew fixture	DF2001A		Supporting power analysis software for calibration phase voltage and current probes generated during transmission
Cable	N-BNC-6L		N-BNC cable for SSA3000X Series; 6GHz bandwidth
	N-N-6L		N-N cable for SSA3000X Series; 6GHz bandwidth
	N-SMA-6L		N-SMA cable for SSA3000X Series; 6GHz bandwidth
Reflection Bridge	RBSSA3X20		Reflection bridge for SSA3000X Series; Refl-SSA3000X, RB (1 MHz~2 GHz), N (M) -N (M) adaptor (2 pcs)
SSA3000X Utility Kit	UKitSSA3X		Utility Kit for SSA3000X Series: N (M) -SMA (M) cable, N (M) -N (M) cable, N (M) -BNC (F) adaptor (2 pcs), N (M) -SMA (F) adaptor (2 pcs), 10 dB attenuator;

Service Promise:

Since the date of purchase, we offer three year's warranty for the main unit:

- During the warranty period, if the products cause any hardware or software failure because of the quality, Siglent's after-sales service center or Siglent's designated maintenance points will offer the maintenance of the fault products for the user.
- Because of improper use or any other artificial reason, the damage won't be included in the free maintenance.

1. Extension after-sales service

Extension service is based on the main unit (not including accessories) as an object. During the extension service, Siglent still offer free maintenance after the standard warranty period.

1.1 Three advantages:

- Guarantee investment. To extend the life cycle of the products
- Save money. To prevent the high cost of maintenance after the warranty period.
- Avoid the repeated investment. To prevent buying new equipments because it can't be repaired after the warranty period.

1.2 The content of the extension service

You can buy the following extension service according to your demand:

Solution	Viability	Instruction
ES4	One year after the warranty period	According to the service terms, Siglent will offer another one year for the after-sales maintenance service
ES5	Two years after the warranty period	According to the service terms, Siglent will offer another two years for the after-sales maintenance service

2. Calibration services

After long-term use, oscilloscope will cause the deviation of measured value and waveform display, because of its work temperature and humidity. Siglent will restore the original performance and accuracy of factory setting to calibrate the deviation.

- Eliminate the error of measurement
- Restore the original performance and accuracy of the factory setting to the "new" state
- The upgrade of the firmware and the software
- Make the instruments comply with the standard of the ISO9001 quality management process
- Traceable calibration certificates



About SIGLENT

SIGLENT is an international high-tech company, concentrating on R&D, sales, production and services of test & measurement instruments.

SIGLENT began developing Digital Oscilloscope independently in 2002. After more than a decade of development, SIGLENT has extended its products to include digital oscilloscopes, function/arbitrary waveform generators, digital multimeters, DC power supplies, spectrum analyzers, isolated handheld oscilloscopes and other general purpose test instrumentation. Since its first oscilloscope ADS7000 series launched in 2005, SIGLENT has become the fastest growing manufacturer of digital oscilloscope over the past 14 years. Today, SIGLENT is the best value in electronic test & measurement.