

Keysight Infiniium V-Series Oscilloscopes

Industry-Leading Accuracy that Ensures Greater Clarity in Analysis and Debug of High-Speed Designs



The industry's highest measurement accuracy

- **True analog bandwidth to 33 GHz:**
Hardware performance to full bandwidth, no DSP boosting or frequency interleaving.
- **The industry's lowest noise floor:**
Maximize eye height measurements by ensuring that you get the least amount of noise from your instrument.
- **The industry's lowest intrinsic jitter:**
See your true jitter and not the oscilloscopes, making RJ/DJ separation more accurate.

Full 30 GHz probing system

An oscilloscope is only as good as the system that gets you to the device you are measuring. The InfiniiMax III probing system provides the bandwidth that you need for your probing needs.

The industry's most comprehensive application-specific software

The new user interface and comprehensive compliance software make it easy to debug and validate the device.

Key specifications

| Product | Description |
|----------------|--|
| Bandwidth | 33, 25, 20, 16, 13 and 8 GHz |
| Channels | 4 channels |
| Sample rate | 80 GSa/s 2 ch, 40 GSa/s 4 ch |
| Memory depth | 50 Mpts standard Up to 2 Gpts available |
| Edge trigger | > 20 GHz |
| Mixed signal | 20 GSa/s on 8 ch, 10 GSa/s on 16 ch |
| Serial trigger | 12.5 Gb/s, 160-bit sequence |



Order the Digital Signal Analyzer (DSA) to get 100 Mpts of memory, EZJIT, EZJIT Plus, EZJIT Complete, and Serial Data Analysis software standard.
 Order the Mixed Signal Oscilloscope (MSO) to get 16 digital channels and DDR protocol standard.

Oscilloscope models

| Model | Bandwidth | Sample rate ^{1,2} | Memory depth ^{1,2} | Scope channels |
|----------|-----------|----------------------------|-----------------------------|-----------------------|
| MSOV334A | 33 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV334A | 33 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV334A | 33 GHz | 80 GSa/s | 50 Mpts | 4 analog |
| MSOV254A | 25 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV254A | 25 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV254A | 25 GHz | 80 GSa/s | 50 Mpts | 4 analog |
| MSOV204A | 20 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV204A | 20 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV204A | 20 GHz | 80 GSa/s | 50 Mpts | 4 analog |
| MSOV164A | 16 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV164A | 16 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV164A | 16 GHz | 80 GSa/s | 50 Mpts | 4 analog |
| MSOV134A | 13 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV134A | 13 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV134A | 13 GHz | 80 GSa/s | 50 Mpts | 4 analog |
| MSOV084A | 8 GHz | 80 GSa/s | 50 Mpts | 4 analog + 16 digital |
| DSAV084A | 8 GHz | 80 GSa/s | 100 Mpts | 4 analog |
| DSOV084A | 8 GHz | 80 GSa/s | 50 Mpts | 4 analog |

1. In 4 ch mode, sample rate is 40 GSa/s on all four channels.
2. Up to 2 Gpts available on all four channels.

For more information on this and other Keysight oscilloscope please visit:
www.keysight.com/find/V-Series

Application software

| Model | Description |
|------------|---|
| N8823A-1FP | EZJIT Complete jitter analysis |
| N5400A-1FP | EZJIT Plus jitter analysis |
| E2681A-1FP | EZJIT jitter analysis |
| E2688A-1FP | High-speed SDA and clock recovery |
| N5414B-1FP | InfiniiScan software triggering |
| N5465A-1FP | InfiniiSim advanced signal de-embedding |
| N5465A-3FP | InfiniiSim basic signal de-embedding |
| N2809A-1FP | PrecisionProbe AC calibration |
| N5461A-1FP | Serial data equalization |
| N5430A-1FP | User-defined function |
| N5393D-1FP | PCIe Gen 3 compliance |
| N5399C-1FP | HDMI 2.0 compliance |
| N6462A-1FP | DDR4/LPDDR4 compliance |
| N8829A-1FP | 100 GBase-KR4 compliance |

Options and accessories

| Model | Description |
|-------------|---|
| DSOV000-100 | 100 Mpts/channel memory upgrade |
| DSOV000-200 | 200 Mpts/channel memory upgrade |
| DSOV000-500 | 500 Mpts/channel memory upgrade |
| DSOV000-01G | 1 Gpts/channel memory upgrade |
| DSOV000-02G | 2 Gpts/channel memory upgrade |
| DSOV000-801 | 1 TB removable Solid State Drive (SSD) with Windows 7 |
| DSOV000-805 | GPIO card-interface |
| DSOV000-808 | Performance verification and deskew fixture |
| DSOV000-810 | Hardware serial trigger upgrade |
| DSOV000-A6J | ANSI Z540-1 compliant calibration |
| DSOV000-AMG | ACCLASS Accreditation ANSI-ASQ National Accreditation Board, USA (calibration + uncertainties + guardbanding) |
| N2117A | Stack mount kit option for stacking two frames |
| N5443A | Performance verification and deskew fixture |

InfiniiMax probing options

| Model | Description |
|--------|--|
| N2803A | 30 GHz InfiniiMax III probe amplifier |
| N2802A | 25 GHz InfiniiMax III probe amplifier |
| N2801A | 20 GHz InfiniiMax III probe amplifier |
| N2800A | 16 GHz InfiniiMax III probe amplifier |
| N7000A | 20 GHz InfiniiMax III+ probe amplifier |
| N7001A | 16 GHz InfiniiMax III+ probe amplifier |
| N7002A | 13 GHz InfiniiMax III+ probe amplifier |
| N7003A | 8 GHz InfiniiMax III+ probe amplifier |
| N2848A | QuickTip probe head |
| N2836A | 26 GHz solder-in probe head |
| N5439A | ZIF probe head |
| N5440A | 450 Ω ZIF tip replacement (set of 5) |
| N5447A | 250 Ω ZIF tip replacement (set of 5) |
| N5445A | Browser (hand held) probe head |
| N5444A | 3.5 mm/2.92 mm/SMA probe |
| N7010A | 30 GHz voltage termination adapter |
| N5449A | High impedance probe adapter |

KEYSIGHT SERVICES

Accelerate Technology Adoption. Lower costs.

www.keysight.com/find/services

Keysight Services helps you improve productivity and product quality with our comprehensive service offerings of one-stop calibration, repair, asset management, technology refresh, consulting, training, and more.