

MX100e+ Firmware/Software Updates

Software version 1.1.0-2

April 23, 2015

Release Scope:

General availability.

Requires ReVeal MTX 1.6.5 or newer.

New features and improvements:

1. New VeTest option support for line rate HTTP throughput test
2. Added Wifi support for 802.11ac, requires Z99-99-027G USB WiFi 802.11ac/a/b/g/n 2.4G/5G Adaptor
3. Addressed an issue with Wifi Ping test

Known issues or limitations:

1. n/a

Software version 1.0.6

November 4, 2014

Release Scope:

General availability.

Requires ReVeal MTX 1.6.3 or newer.

New features and improvements:

1. New IPG based multiple stream service disruption test (SDT) measurement.
2. Added option control for the IPTV and USB Bluetooth options. Requires ReVeal MTX to enable.
3. Added additional Loopback filtering capabilities to handle SSMTT test traffic.
4. Enhanced the test pattern interoperability between the MX100e+ and SSMTT-28/29 products.
5. Added OAM results savings without having to start a throughput test.

Known issues or limitations:

2. n/a



Software version 1.0.4-8**June 18, 2014****Release Scope:**

General availability.

Requires ReVeal MTX 1.6.0 or newer.

New features and improvements:

1. Added Service Level OAM TX/RX CCM Counters.
2. Added the ability to disable the VLAN tag in Service Level OAM.
3. Added IPTV testing functionality. Requires software option.
4. PDF generation is supported Ethernet BERT, Throughput, RFC2544, and V-SAM test. PDF files are automatically generated when results are transferred to USB memory stick.
5. V-SAM test CBS and EBS parameters configuration has been extended to 1000 kB.
6. V-SAM test now includes a Policing tolerance parameter. This parameter is used to compensate for the effects of large CBS/EBS values in the policing test pass criteria.
7. Addressed an issue with EIR value interfering with CBS/EBS tests, even when EIR was disabled
8. Added support for Huawei E180 WCDMA HSDPA cellular data card. Works with 900/2100MHz HSPA/UMTS and 850/900/1800/1900MHz EDGE/GPRS/GSM (Requires Z77-00-015G USB cellular modem and 499-05-157 USB Data Card Support option. SIM not included).
9. Added support for dual-band Wi-Fi Edimax 802.11a/b/g/n dongle (2.4 & 5 GHz)
10. Added WiFi InSSIDer feature that provides mapping of Wi-Fi Access points strength and channel allocation in graphical format.
11. VoIP Expert Client/Server function enhancements to the VoIP MOS measurements. Requires VX1000 server Software to be upgraded to version 1.3.5-0 or newer for interoperability.
12. Added support for VoIP PESQ test. Requires Software Option.
13. L1 Unframed BERT is now fully supported on the 1000BaseX interface [1555]
14. Added a warning message on Netwiz function about the cable measurement range. The cable measurement range is from 7m to 140m with accuracy of 5m [1895]
15. The VoIP Call expert call trace file is now visible in the saved results file screen [1558]
16. Added XLoop control mode for compatibility - Sends remote Loop Up/Down for layer 2/3 tests or Layer 2 test with VLAN tag to third-party test sets. TX100e+ also responds to Layer 2/3 loop requests from those remote test sets.

Known issues or limitations:

1. Wifi DHCP connectivity may fail on some routers when Edimax 802.11a/b/g/n dual band adapter is used [1894]

Software version 1.0.4-0**Sept 18, 2013****Release Scope:**

General availability.

Requires ReVeal MTX 1.5.6 or newer.

New features and improvements:

1. New threshold configuration option has been added for RFC2544. The Pass/Fail threshold for the throughput test can now be configured as a % of Max Throughput rate or as a % of Line rate.
2. The L2,L3, L4 Loopback function has been updated to discard Spanning Tree Protocol (STP) frames, when STP frames have a length field following the MAC Source Address. Previously only frames without length field were discarded.

Known issues or limitations:

1. Layer 1 Unframed BERT is not supported in this release
2. The Saved test results for Layer 3 Throughput multi-stream test erroneously show Streams 2 to 8 setup as L1 Framed when they are configured as Layer 3.
3. The Pause Frames are not showed in the TX frame pause counter. RX pause frames are properly counted.
4. VoIP Expert Client/Server Saved test results show erroneous measurements in the upstream direction
5. VoIP Call Expert Saved Call Trace is not shown in the list of saved test results, however it can be downloaded using ReVeal.
6. When running an IPv4 test following an IPv6 test, the TTL field in the IP header is reset to 0. This field needs to be manually populated to a greater than 0 value, otherwise test traffic will be discarded by the router.

Software version 1.0.3-11

Aug 14, 2013

Release Scope:

General availability.

Requires ReVeal MTX 1.5.4 or newer.

New features and improvements:

1. Added Throughput Test Round Trip Delay threshold configuration and threshold crossing event generation in log.
2. Enhancements to the VoIP MOS measurements, added capability to change the number of calls and the dial style without unregistering first, and simplified the connection process for peer to peer calls.
3. VoIP Expert Client/Server function enhancements to the VoIP MOS measurements. Requires VX1000 server Software to be upgraded to version 1.3.3-0 or newer for interoperability.
4. Added sorting for the profile list.
5. Addressed an issue of incorrect link speed setting when using auto-neg/user-defined configuration.
6. Addressed an issue with the locked status of saved profiles.
7. Changed the default web test URL to dedicated web page: v100.veexinc.com for fast loading.
8. Help files have been updated to reflect the latest software features.

Known issues or limitations:

1. On rare occasions the unit might freeze when switching from 1000BaseT copper to 1000BaseX fiber ports. To address the problem the unit needs to be rebooted.

Software version 1.0.3-5

May 24, 2013

Release Scope:

General availability.

Requires ReVeal MTX 1.5.4 or newer.

New features and improvements:

1. V-SAM Test (ITU-T Y.1564) now support EMIX traffic generation and CBS/EBS buffer tests
2. Added Wifi Wiz support for WPA and WPA2 encryption
3. The minimum frame size in IPv6 BERT test is now 64 bytes
4. The RFC2544 throughput test now supports a frame loss limit parameter. This parameter defines the frame loss tolerance in the throughput rate binary search algorithm.
5. A User Interface crash in Japanese language for the VoIP master mode is now addressed.

Software version 1.0.3-0

February 08, 2013

Release Scope:

General availability.

Requires ReVeal MTX 1.5.0 or newer.

New features and improvements:

1. The latency measurement in RFC2544 has been improved to use the received throughput test rate instead of the transmitted rate.

Software version 1.0.2-6

Dec.14, 2012

Release Scope:

General availability.

Requires ReVeal MTX 1.4.7 or newer.

New features and improvements:

1. Entering the 1000BaseX L1 unframed BERT previously caused the unit to reset, this has been addressed.
2. L1 Unframed test requires 1000Base X auto-negotiation to be disabled, a warning message has been added on the User Interface.
3. VoIP SIP and H.323 Call expert as well as VoIP Expert client/server functions are now functional on the Ethernet test port.

4. V-SAM FDV results mismatch between measured values and saved is now addressed. Previously the saved measurements were not reporting the correct value.
5. Traffic switching between uniform frame size and ramp mode traffic caused the unit to reset. This has been addressed.
6. Enhanced the display of graphics in RFC2544 and addressed text overlap issues.
7. Traffic switching between Ipv4 and Ipv6 in RFC2544 previously caused the unit to reset. This has been addressed.
8. The Throughput test configured with uniform frame size from 68 to 1518 bytes can now be set at 12.00% bandwidth.
9. The stability of RFC2544 Asymmetric test has been improved.

Known issues or limitations:

1. VoIP SIP calls without a valid DNS address will take around 2 minutes to get successful registration.
2. VoIP multi-call hang-up only clears 5 calls at a time. The Hang-up key has to be pressed multiple times to clear all calls.
3. The Auto and Manual unit discovery functions are not supported for IPv6.
4. The asymmetric and peer to peer modes are not supported for IPv6.
5. The User Interface has stability issue on the IP address editing screen of the multi-stream throughput test. When editing the IPv6 address it is recommended to close the address editing screen before switching to another stream.

Software version 1.0.2-2

Nov.2, 2012

Release Scope:

General availability.

New features and improvements:

1. The management port now has auto MDI/MDIX enabled for crossover cable detection.
2. Added support for Bluetooth file transfer.
3. The Throughput test Restart function now properly uses the configured data rates.
4. Added User defined signature fields in data pattern for the Throughput test. For interoperability with VeEX units, use the VeEX signature field. The VeEX signature field is the default setting.
5. ARP GW, NDP GW are now fully function with VLAN tagged traffic.
6. The Round trip delay is now accurate with multiple streams.
7. Switching from Ethernet copper to fiber port does not reset the unit anymore.
8. PPPoE auto DNS in now supported on the test port.
9. Extended display accuracy for RTD and FDV measurements.
10. Added display for Ethernet real frame size, including VLAN and MPLS tags
11. Added more precision to V-SAM FLR threshold.
12. An issue where occasionally the TX direction was not working properly on the Throughput test after unit boot up has been addressed.

13. Improved FDV measurement accuracy in Y.1564 V-SAM test.
14. Added support for color mode testing in Y.1564 V-SAM test. Color mode uses the DEI flag in the VLAN tag.
15. Added configurable auto-saving mode.
16. Addressed remote control issue.
17. Improvements to VoIP configuration.

Known issues or limitations:

6. The Auto and Manual unit discovery functions are not supported for IPv6.
7. The asymmetric and peer to peer modes are not supported for IPv6.
8. The User Interface has stability issue on the IP address editing screen of the multi-stream throughput test. When editing the IPv6 address it is recommended to close the address editing screen before switching to another stream.
9. The Throughput test configured with uniform frame size from 68 to 1518 bytes can't be set at 12.00% bandwidth. Other throughput rates are supported.
10. Occasionally the RFC2544 Asymmetric test will fail if it was interrupted before completion. The test sets needs to be restarted. Using RFC2544 Asymmetric test is not recommended in this release. Contact customer support for guidance.



Software version 1.0.1-6

Apr. 30, 2011

Release Scope:

General availability.

New features and improvements:

1. Added Network Discovery short cut in BERT, Throughput, V-SAM, and RFC2544 MAC Header menu
2. Fixed the IPv6 routed environment limitation in previous releases.

Known issues or limitations:

1. The Auto discovery function does not work when the units are configured with an IPv6 address
2. The Discovery manual mode is not supported for IPv6
3. The asymmetric and peer to peer modes are not supported for IPv6
4. The User Interface has stability issue on the IP address editing screen of the multi-stream throughput test. When editing the IPv6 address it is recommended to close the address editing screen before switching to another stream.
5. The remote control function with ReVeal MTX has connection drop and slow response issues. This will be addressed in a feature release.

Software version 1.0.1-5

March 20, 2012

Release Scope:

Temporary Release.

New features and improvements:

1. Added the VLAN Scan feature
2. Added IPv6 network discovery
3. Added IPv6 DNS setup
4. Added IPv6 ARPWiz
5. Added IPv6 Trace Route
6. Added IPv6 DNS Ping.

Known issues or limitations:

1. IPv6 cannot be tested in an IPv6 routed environment at this time.

Software version 1.0.1-4**Jan. 18, 2012****Release Scope:**

Temporary Release.

New features and improvements:

1. Fixed an Frame per Second Graphic bug in BERT and throughput where it cannot display zero

Known issues or limitations:

1. IPv6 cannot be tested in an IPv6 routed environment at this time.

Software version 5.0.29-19**Dec 13, 2011****Release Scope:**

Initial Release. General availability

New features and improvements:

1. This hardware version of the MX100-series supports the following features and options:
 - a. Single 10/100/1000BaseT Copper interface
 - b. Single 100BaseFX/1000BaseX Fiber interface
 - c. The following Ethernet test functions are supported: RFC2544, BERT, V-SAM, multi-stream throughput test
 - d. Traffic Loopback
 - e. Introduces new Link Level OAM 802.3ah feature
 - f. Introduces new Service Level OAM 802.1ag and Y.1731
 - g. IP Testing
 - h. VoIP Testing
 - i. IPTV Testing
 - j. NetWiz
 - k. Wifi Wiz
 - l. Compatible with ReVeal MTX

Known issues or limitations:

1. Limited functionality of IPv6 features in routed environments. The source and destination IPv6 addresses must be in the same network.
2. Occasionally when selection PPPoE IP connection the unit may become un-responsive. If this occurs, it is recommended to re-install the test set software.
3. The IPTV probe function does not work with VLAN tag and if the probe function is started all subsequent IPTV measurements and viewer are not functional. The work around is to disconnect and reconnect the IP configuration. The probe function should be avoided when VLAN tagging is used.
4. The Netwiz function is not functional when VLAN tagging is enabled
5. The following are limitations in the V-SAM function:
 - a. V-SAM results can't be exported using the USB transfer function
 - b. During the performance test, the service availability criterion is properly evaluated, however it is not highlighted in red in the results screen when failing
 - c. A mix of IPv4 and IPv6 streams cannot be generated. All the streams generated have an IPv4 or IPv6 header.
 - d. On a Layer 4 test the FTD and FDV fields measurements are not reported at the end of the test
6. User defined pattern is not yet available in the throughput test
7. When running asymmetric test, if the test is stopped before completion, the remote unit may freeze and need to be reset.