ConnectX-3 Firmware Archived Bug Fixes

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1 Archived Bug Fixes

The following table describes archived bug fixes in ConnectX-3 firmware releases up to version 2.36.5150.

Table 1 - Fixed Bugs List (Sheet 1 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
1.	Comm Channel	**RM#763946:** Fixed a wrong timeout calculation in get_irpc_response	2.36.5000	2.36.5150
2.	SR-IOV	**RM#827921:** Fixed an issue which caused the firmware to unconditionally set the subnet prefix in the gid0 mgid_Table to the default prefix, and not according to the configured subnet prefix.	2.36.5000	2.36.5150
3.	ECN	**RM#465451:** Fixed a completion error issue when ECN was enabled. The ECN usage caused ordering errors in completion queues (CQ).	2.33.5000	2.36.5000
4.		**RM#648800:** Fixed the length calculation of UDP. The incorrect UDP length in the CNP packet caused miss-calculation of the ICRC.	2.35.5100	2.36.5000
5.	Cable Info MAD	**RM#636203:** Fixed a wrong returned status in cable info MAD when the cable was not connected.	2.35.5100	2.36.5000
6.	FLR device reset	**RM#669201:** Fixed failure instances when initiating FLR in the Physical Function.	2.35.5100	2.36.5000
7.	High rate steering mode	**RM#637490:** Disabled High Rate Steering mode in the INI to enable its compatibility with NC-SI over VLAN.	2.32.5100	2.36.5000
8.	RDP over IPv4	**RM#563136:** Fixed a default hardware configuration issue which caused RDP over IPv4 traffic to be dropped.	2.30.8000	2.35.5100
9.	SR-IOV security	**RM#592507:** Prevented a Virtual Function from injecting pause frames into the network.	2.30.8000	2.35.5100
10.	PRM:SET_PORT.mac_table	**RM#535924:** Fixed a wrong hash index calculation during inbound traffic.	2.33.5100	2.35.5100
11.	RDP over IPv4	**RM#563136:** Fixed a default hardware configuration issue which caused RDP over IPv4 traffic to be dropped.	2.30.8000	2.35.5100
12.	NC-SI	**RM#592428:** Fixed and issue causing MLNX_OEM command GET_TEMP to return a wrong value in the max_temp field	2.34.5000	2.35.5100

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Index	Issue	Description	Discovered in Release	Fixed in Release
13.	MTU exceptions	**RM#556872:** Fixed an issue which caused TX traffic to stop when the message MTU size was larger than QP.mtu.	2.32.5100	2.35.5100
14.	NVCONFIG failure	**RM#554066:** Fixed an issue which caused NVCONFIG to fail when the number of sector was set to 1 and the sector was zeroed.	2.34.5000	2.35.5100
15.	IB/RoCE retransmission	**RM#551732:** Fixed a race in handling a duplicated "read request from middle".	2.34.5000	2.35.5100
16.	IB traffic issues	**RM#549153:** Fixed an issue which caused lack of IB traffic on SR-IOV VPI.	2.33.5000	2.35.5100
17.	NVRAM issues	**RM#548168:** Fixed an issue which caused NVRAM to get stuck when it filled non-valid information in TLV.	2.34.5000	2.35.5100
18.	IB APM	**RM#541877:** Fixed an issue which caused an internal firmware error when APM changed the QPs port mapping.	2.33.5100	2.35.5100
19.	QP alternate context error	**RM#589609:** Fixed an issue which caused a firmware internal error when handling QP alternative context.	2.34.5000	2.35.5100
20.	Flow Control security issue	**RM#431315:** Fixed an issue which caused packet transmission to get stuck when the software tried to send pause frames with dmac equal to one of the device's MAC addresses.	2.32.5100	2.35.5100
21.	Wrong temperature reporting	RM#577076 Wrong temperature reporting when server is in Auxiliary mode after Moonshot AC power cycle.	2.34.5000	2.35.5100
22.	Link down on MCX-349A-XCCN	RM#441539 Fixed a link down issue with 100MbaseT speed.	2.33.5100	2.34.5000
23.	Packet Ethertype	RM#434267 Fixed a mistakenly dropped ETH packet with ethertype 0x600 by the NIC.	2.30.8000	2.34.5000
24.	Broadcast traffic lost	RM#536791 Fixed a case preventing broadcast traffic from arriving to their destination after detaching high priority broadcast rule on a port where NC-SI was enabled.	2.33.5100	2.34.5000
25.	Low link speed	RM#516446 Fixed an issue where the port raised as SDR vs. InfiniScale IV QDR Switch	2.33.5100	2.34.5000

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Index	Issue	Description	Discovered in Release	Fixed in Release
26.	40GbE Link down	RM#509713 Fixed a failure to read cable parameter which caused link failure on 40GbE dual port OCP devices.	2.33.5100	2.34.5000
27.	RDMA read retrans-mission	RM#517941 Fixed a rare case of comple-tion Error with Bad Opcode sequence status which occurred when retransmitting read requests.	2.33.5100	2.34.5000
28.	VM QoS	RM#523786 Fixed a case where the actual bandwidth did not match the user settings in VM QoS.	2.33.5100	2.34.5000
29.	Sideband communica-tion loss	RM#517351 Fixed a case where on rare cases, communication to BMC was lost during driver initialization.	2.33.5100	2.34.5000
30.	LED behavior	RM#492430 Fixed a wrong LED behavior when the driver is disabled in the following adapter cards: MCX346A-BCQN, MCX-345A-BCQN.	2.33.5100	2.34.5000
31.	Link down on cable plugging	RM#510935 Fixed an issue with cable read-ing, which caused the link not to raise	2.33.5100	2.34.5000
32.	PRM: EQN range	RM#501749 Set the maximum EQN num-ber to 1024.	2.30.8000	2.34.5000
33.	Vital Product Data read failure	RM#514720 Fixed a rare issue with VPD init flow which caused read failures.	2.31.5050	2.34.5000
34.	PRM: Statistic count-ers not reported	RM#519904 Fixed an issue with RX size counter not being reported.	2.30.8000	2.34.5000
35.	RoCE/InfiniBand reli-able connection	RM#486082 The first Read response was not treated as implicit ACK.	2.30.8000	2.33.5100
36.	40GbE Link up time	RM#461970 Reduced a long 40GbE link up time with Cisco Nexus3064 and Arista-7050S	2.32.5100	2.33.5100
37.	Promiscuous mode	Fixed promiscuous mode compatibility with A0-DMFS steering.	2.32.5100	2.33.5000
38.		RM#433344 Fixed promiscuous mode com-patibility when NC-SI is enabled and con-figured.	2.32.5100	2.33.5000
39.	NC-SI OEM com-mands	RM#480037 Fixed sending/receiving OEM temp commands (set/get) with channel ID 0x1f failure.	2.32.5100	2.33.5000
40.	Packet Drops	RM#463613 Fixed an issue which caused packets to drop on a port when changing the interface state of the other port.	2.32.5100	2.33.5000

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Index	Issue	Description	Discovered in Release	Fixed in Release
41.	Side Band Function-ality	RM#462058 Fixed long management com-munication loss and SOL hang during reboot cycles.	2.32.5100	2.33.5000
42.		RM#408615 Fixed wrong processing of inbound traffic towards BMC which caused communication loss.	2.32.5100	2.33.5000
43.		RM#431178 Fixed management link loss upon closing port interface through the driver.	2.32.5100	2.33.5000
44.	NC-SI on SFP+ Adapter Cards	RM#466306/468870 Fixed a false indica-tion in firmware of an expander presence causing delay in EEPROM reading.	2.32.5100	2.33.5000
45.	Port Links	RM#423472 Fixed an issue which caused a link down on a port when the cable was removed from the other port.	2.32.5100	2.33.5000
46.	Inbound Packet Pro-cessing	RM#457685 Fixed a rare case where packet with length zero got stuck in hardware queues.	2.32.5100	2.33.5000
47.		RM#431123 Fixed an issue which caused InfiniBand congestion control packet (CNP) to hang in hardware.	2.32.5100	2.33.5000
48.	Asynchronous Event Notification (AEN)	RM#418910 Fixed an issue which caused AEN to be sent after channel reset.	2.32.5100	2.33.5000
49.	Bandwidth Degrada-tion with QoS	RM#409894 Fixed an issue which pre-vented the restoring of QoS setting to its default consequently causing bandwidth degradation.	2.31.5050	2.33.5000
50.	Port Link Up Time	RM#409894 Fixed an occasional long link up time with 10GbE based devices.	2.32.5100	2.33.5000
51.	SFP Cable Reading	RM#438000 Fixed an issue preventing cable readings from i2c slave address 0x51	2.32.5100	2.33.5000
52.	PCIe Gen3 Equaliza-tion	RM#429495 Fixed a wrong parity bit calcu-lation when transmitting PCIe TS1 packets.	2.32.5100	2.33.5000
53.	PCIe Power Manage-ment	RM#400184 Fixed a possible deadlock in PM turnoff request transmission and ack acceptance flow.	2.32.5100	2.33.5000
54.	PCIe width Degrade	RM#414914 Fixed a rare case with align-ments state machines which caused occa-sional width degradation.	2.32.5100	2.33.5000

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Index	Issue	Description	Discovered in Release	Fixed in Release
55.	Rate Limiters Hang with ECN/QCN Enabled	RM#397967 Fixed an issue where the transmit queues hanged while congestion control was enabled and operational (EQC/QCN)	2.32.5100	2.33.5000
56.	Unexpected Completion Syndrome with Status 0x77	RM#425700 Fixed an unexpected work completion syndrome with vendor syndrome 0x77 received when running RDMA SEN/WRITE traffic with retransmissions.	2.30.8000	2.33.5000
57.	IB Spec MADs	RM#432155Fixed an issue which caused `SetPortInfo` to return a good status when receiving invalid `LinkSpeedEnabled` value.	2.32.5100	2.33.5000
58.	GPIO Mapping	RM#468870Fixed an issue which caused dual port SFPP module cards to be automatically mapped with expander	2.32.5100	2.33.5000
59.	Steering Mode	Fixed an issue where firmware overrides the steering mode that was chosen by the driver.	2.32.5100	2.33.5000
60.	Port sensing	RM#463615Fixed invalid return sensing results occurred when the link was up.	2.32.5100	2.33.5000
61.		RM#429579Fixed an issue causing the sensing result to be delayed when cable was unplugged.	2.32.5100	2.33.5000
62.	Wrong link type display	RM#417741Fixed an issue causing the link type to be displayed as ETH when set to AUTO.	2.32.5100	2.33.5000
63.	IBDump performance	Fixed performance degradation when running IBDump	2.30.8000	2.32.5100
64.	PCIe link Disable/Enable	RM#416928Occasionally, a link training timeout occurred in EQ phase0 during disable/enable test.	2.31.5050	2.32.5100
65.	40GbE QoS	Improved strict bandwidth mode functionality	2.30.8000	2.32.5100
66.	Port Counters reporting	RM#417689/RM#417604Fixed an issue with the PortRcvPkts counter always displaying zero value.	2.31.5050	2.32.5100
67.	GMP MADs in SecureHost	RM#418175Fixed an issue with processing GMP MADs with SET method in SecureHost mode.	2.31.5050	2.32.5100
68.	NC-SI over IPv6	RM#417195Fixed an issue causing a wrong usage of MCG size when configuring Global Multicast filter	2.31.5050	2.32.5100

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Index	Issue	Description	Discovered in Release	Fixed in Release
69.	NC SI link failure	RM#396165Disabling the first port occasionally causes second port TX failure.	2.31.5050	2.32.5100
70.	10GbE link failure	RM#389541Fixed a mismatch in links status reported. The adapter reports links as down while the switch perceives them as up	2.31.5050	2.32.5100
71.	Link failure	RM#392288Fixed an occasional 40GbE link failure with SCM5 Switch blade	2.31.5050	2.32.5100
72.	ExtPortInfo MAD	RM#392199Fixed a wrong FDR10 speed reporting in MAD	2.31.5050	2.32.5100
73.	IB link failure	RM#397903Fixed an issue preventing theports to to rise up when set to FDR10 vs QDR	2.31.5050	2.32.5100
74.	40GbE link failure	RM#388327Fixed an occasional link failure vs Arista switch	2.31.5050	2.32.5100
75.	RDMA Write retransmission	RM#412450Retransmission started from the first PSN of message instead of the last acknowledged PSN	2.30.3200	2.32.5100
76.	Firmware burning	RM#401399Firmware hangs when receiving `GeneralInfoMad` during inline firmware burning	2.30.3200	2.32.5100
77.	PCIe PML1	RM#399366,387863L1 flow adjustments and threshold tuning	2.31.5050	2.32.5100
78.	PCIe reset	RM#398004Fixed a rare hanging issue during PERST_ assertion	2.31.5050	2.32.5100
79.	PCIe Gen3 EQ	RM#392933Wrong coefficients were reported during phase3	2.31.5050	2.32.5100
80.	Boot	Fixed an issue causing wrong behavior due to reset timing	2.31.5050	2.32.5100
81.	SMBUS	RM#409011Fixed long timeout issues	2.31.5050	2.32.5100
82.	NVRAM	RM#409998Fixed NVRAM write issues in driver-less mode	2.31.5050	2.32.5100
83.	40GbE Link support	RM#408020Fixed 40GbE link support in aux mode	2.31.5050	2.32.5100
84.	NC-SI	RM#408414Dropped commands with non-existing channel ID	2.31.5050	2.32.5100
85.	PRM PortInfo command	RM#394311/408483Fixed issues in extended speed reporting	2.31.5050	2.32.5100
86.	Trap 257/8(IB)	RM#403705Fixed bad QP reporting in trap 257/8	2.30.8000	2.32.5100

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Index	Issue	Description	Discovered in Release	Fixed in Release
87.	Bad Q_KEY errors	RM#402793Fixed an issue causing false bad q_key error messages	2.30.8000	2.32.5100
88.	PFC	RM#404640Fixed Pause Frame opcode mismatch	2.30.8000	2.32.5100
89.	Sideband Communication	RM#400883Fixed communication loss upon PCIe error detection	2.31.5050	2.32.5100
90.	NC-SI	RM#348276Fixed wrong channel value in the SELECT/DESELECT PACKAGE commands	2.30.8000	2.31.5050
91.		RM#355833Fixed an issue caused response packet to include 4 extra bytes	2.30.8000	2.31.5050
92.		RM#352300Fixed wrong reason code value returned when using Set Link command with unsupported speed.	2.30.8000	2.31.5050
93.		RM#372909Added protection from bad MAC address given by BMC	2.30.8000	2.31.5050
94.	False Link Indication	Fixed an issue causing the device to report false link up when no cable is connected.	2.30.8000	2.31.5050
95.	PCIe	RM#333854Removed false TX pulse after PERST_ de-assertion	2.30.8000	2.31.5050
96.		RM#347082Fixed FLR capability bit inconsistency when SR-IOV is enabled.	2.30.3200	2.31.5050
97.		RM#126811Fixed an issue with the device not reporting PCIe related errors.	2.30.8000	2.31.5050
98.	SDR instead of DDR ConnectX-3 to SX6036	RM#360360When a link is configured to DDR in a setup of ConnectX-3 to SX6036, SDR link is established instead.	2.30.8000	2.31.5050
99.	VXLAN	VXLAN used the wrong default UDP port. the UDP port number was changed to 4789.	2.30.8000	2.31.5050
100.		RM#383099Fixed wrong setting of the UDP destination port for VXLAN.	2.30.8000	2.31.5050
101.	Flow Steering	Fixed an internal error caused when moving to the DMS mode with IPMI/NC-SI enabled.	2.30.8000	2.31.5050
102.	FDR speed degradation with 0.5m cables	In a back-to-back setup of FDR cards connected with a 0.5m FDR cable, a link may be established as FDR10 instead of FDR.	2.30.3200	2.31.5050
103.	PCI interrupt	Fixed issues related to working with PCI legacy interrupts.	2.30.8000	2.31.5050

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Index	Issue	Description	Discovered in Release	Fixed in Release
104.	TCP/UDP Checksum	Fixed wrong checksum calculation for short packets which were padded by the software.	2.30.8000	2.31.5050
105.	MFT tool deadlock	RM#371530Reading PCIe configuration space after using the MFT flint tool caused the device to crash.	2.10.0000	2.31.5050
106.	Side band packet loss	RM#378750Fixed occasional packet loss over IPMI	2.30.8000	2.31.5050
107.	Eye opening MAD	RM#378178Fixed wrong values reported in the Eye opening MAD.	2.30.8000	2.31.5050
108.	PCIe Link width	RM#372794/383729Fixed occasional link width degrades during link negotiation and link transitions from L1 state.	2.30.8000	2.31.5050
109.	PCIe signal detect	RM#372794Fixed adjust signal detect thresholds	2.30.8000	2.31.5050
110.	Error counters	RM#354360PortExtendedSpeedsCounters MAD counters were mistakenly increased while LLR was active	2.30.8000	2.31.5050
111.	PCIe Gen3 Equalization	RM#354125Lane reversal was not considered when configured TX parameters	2.30.8000	2.31.5050
112.	Reset On LAN (ROL)	RM#359319Fixed ROL factory MAC usage when a FlexBoot address was given.	2.30.8000	2.31.5050
113.	Flow Control	RM#359354Fixed Pause frames factory MAC usage when a FlexBoot address was given.	2.30.3200	2.31.5050
114.	WOL/ROL	RM#336331The device did not different between WOL/ROL packets.	2.30.8000	2.31.5050
115.	PortInfo MAD	RM#13401Fixed a set of extended fields in PortInfo MAD which did not function.	2.10.0000	2.31.5050
116.	LLR cell size	RM#342184Adjusted LLR cell size according to the MLPN negotiation of ib_128b_llr	2.30.8000	2.31.5050
117.	Link max speed	RM#367756The max speed restriction was active in full power mode instead of standby mode only.	2.30.8000	2.31.5050
118.	InfiniBand Automatic Path Migration	RM#362812The InfiniBand Path migration did not work with GRH. http://webdev01:8080/commit/ConnectX.git/ a9c37ee4c31038f2c1179d4d9e79c9337e0ab5c7	2.10.0000	2.31.5050
119.	Packet steering	RM#362468Reading MGM after writing it returned wrong members count.	2.30.8000	2.31.5050

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Index	Issue	Description	Discovered in Release	Fixed in Release
120.	RSS QP context	RM#372480Fixed corruption of the RSS hash key given by the driver.	2.30.8000	2.31.5050
121.	10Gb/s QoS	RM#193130Fixed QoS rate limit bandwidth offset.	2.30.3200	2.31.5050
122.	ExtendedPortInfo MAD	RM#365884Fixed FDR10 speed_en reporting.	2.30.8000	2.31.5050
123.	Management link	RM#354487Fixed long management link com loss.	2.30.8000	2.31.5050
124.	PRM Query_Port Command	RM#358772The command results reported both link types active at the same time.	2.30.3200	2.31.5050
125.	Link not raising	RM#376157Fixed collision between forcing phy type and port sensing.	2.30.8000	2.31.5050
126.	Core clock reporting	RM#372353Fixed a wrong core clock freq reporting in QUERY_HCA command.	2.30.3200	2.31.5050
127.	56GbE link issues	RM#379940Fixeds occasional link failure when 56GbE is enabled	2.30.8000	2.31.5050
128.	RX calibration	RM#359331Fixed max eye margins to be per protocol.	2.30.8000	2.31.5050
129.	VPI symbol errors	RM#354443perfquery reported wrong error symbol on ConnectX©-3 VPI mode: IB, ETH.	2.30.8000	2.31.5050
130.	Symbol error on ConnectX-3 dual-port QDR with MC2207312-030 AOCs	RM#197609On ConnectX-3dual-port QDR and FDR/FDR10 switch setups, symbol errors may occur with MC2207312-030 AOCs.	2.30.8000	2.31.5050
131.	Symbol error on Falcon QDR against FDR switches with MC2207126-004 copper cables	RM#197612Symbol errors occur on ConnectX-3dual-port QDR connected to FDR switches with MC2207126-004 copper cables.	2.30.8000	2.31.5050
132.	PCIe correctable errors in speed change	When PCIe Gen3 is enabled, temporary correctable errors might occur when changing speed between PCIe Gen1 and PCIe Gen2.	2.10.0000	2.30.8000
133.	Incompatibility between Device managed Flow steering and NC-SI	Device managed Flow steering and NC-SI cannot be enabled simultaneously.	2.11.0500	2.30.8000
134.	40GbE is not supported in Auto-Sensing	Auto-Sensing is not supported with 40GbE connections in VPI cards	2.10.0000	2.30.8000

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Index	Issue	Description	Discovered in Release	Fixed in Release
135.	InfiniBand port_rcv_pkts counter	RM#219993InfiniBand port_rcv_pkts counter over counts when LLR is enabled on the port. The port_rcv_pkts counter continues to count packets even when no traffic is received.	2.10.0000	2.30.8000
136.	PXE	PXE is currently not supported in 40GbE in VPI cards	2.10.0000	2.30.8000
137.		PXE is currently not supported in QSFP to SFP+ hybrid cable	2.10.0000	2.30.8000
138.	sense_port failure	Ethernet cards failed to work with MLNX_OFED unless the do_sense was disabled in the INI	RH6.4 driver	MLNX_OFED 2.0-3.0.0
139.	Link errors	RM#348501BER of 10-^{11} with 7M copper SFP+ 10GbE cable against Arista switch	2.30.3200	2.30.8000
140.	Linkup Failure vs SwitchX®-2 based switch	RM#350852Port failed to link up in 10GbE if it was previously linked up in 40GbE vs. SwitchX®-2 based switch	2.30.3200	2.30.8000
141.	NC-SI 40GbE report-ing	RM#197996Added 40GbE reporting in get_link_status NC-SI command	2.30.3000	2.30.8000
142.	Packets drop in receive when DMFS enabled	RM#292045Steering entries overlapping caused packets to drop in the receive due to wrong hash size calculation of QP hash folding.	2.30.3000	2.30.8000
143.	PCIe speed degrade	RM#207866Occasionally, PCIe speed degraded during speed change test	2.30.3000	2.30.8000
144.	Link failure vs Cisco	RM#301956Device failed to raise the link against Cisco b-22 Blade switch	2.30.3000	2.30.8000
145.	False RX drops indi-cation	RM#301956Fixed an issue causing RX drop counters to falsely increase when using MLNX_OFED 2.0.-3.0.0	2.30.3000	2.30.8000
146.	NC-SI wrong com-mand info	RM#307087Wrong port information pro-vided in get link status command.	2.30.3000	2.30.8000
147.	Port interfaces stay down	RM#303426After firmware upgrade, the device failed to raise port interface.	2.30.3000	2.30.8000
148.	SR-IOV guest failure	RM#270160Guest VM failed to execute firmware commands operations and crashed.	2.30.3000	2.30.8000
149.	ConnectX®-3 Pro: MCG write timeout	RM#294397PRM WRITE_MCG com-mand caused the device to hang.	2.30.3000	2.30.8000

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Index	Issue	Description	Discovered in Release	Fixed in Release
150.	ConnectX®-3 Pro: Driver start failure	RM#322721Driver could not start when NIC was configured for NC-SI SNP.	2.30.3000	2.30.8000
151.	SR-IOV command timeouts	RM#326715Guest MSIX vectors were not assigned properly.	2.30.3000	2.30.8000
152.	PCIe speed degrade/ link down	RM#299251Occasionally, the PCIe link experienced speed degrading or link falling in driver restart/reboot	2.30.3000	2.30.8000
153.	QP Sniffer issue	Fixed a hash fold issue for sniffer QPs	2.30.3000	2.30.8000
154.	Long link up time	RM #216687A long link up time is experienced in the HCA connected to a 10GbE cable against the MSX1012 switch	2.30.3000	2.30.8000
155.	PCIe TS parity bit	RM#213219/208709In recovery.EQLZ state TSs used incorrect parity bit calculation	2.30.3000	2.30.8000
156.	PRM Init_port failure	RM#230457Init port command may fail on a system with NC-SI	2.30.3000	2.30.8000
157.	PortInfo MAD link width support	RM#203632Wrong link_width_support is reported occasionally in PORT_INFO MAD	2.30.3000	2.30.8000
158.	Wrong Virtual Function completer ID	RM#228422In SR-IOV a wrong completer ID is added in some of the VF completion packets	2.30.3000	2.30.8000
159.	PCIe PML1 failures	RM#206369Fixed occasional failures upon entering and exiting L1 state in PCIe Gen1 & 2 speeds	2.30.3000	2.30.8000
160.	IB: APM failures in ConnectX-3 Pro	RM#229255Occasional FSM transition timeouts are seen on APM requests	2.30.3000	2.30.8000
161.	ipmitool OOB commands	On rare occasions, ipmitool OOB commands failed upon send payload.	2.30.3000	2.30.8000
162.	Sideband communication	On rare occasions, after stress of power cycles, side- band communication might disconnect.	2.30.3000	2.30.8000
163.	Expansion ROM partition	Expansion ROM partition not found	2.30.3000	2.30.8000
164.	AC power cycle issue	In certain servers, AC power cycle may cause BMC connectivity loss.	2.30.3000	2.30.8000
165.	PXE issue	Occasionally, during DC cycle stress, failure occurred in PXE due to race condition	2.30.3000	2.30.8000
166.	SMBUS communication	SMBUS communication lost during AC/DC cycle	2.30.3000	2.30.8000

Table 1 - Fixed Bugs List (Sheet 12 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
167.	MTU configuration	Temporal wrong MTU configuration during initialization may cause Serial over LAN disconnection	2.30.3000	2.30.8000
168.	IPMI connectivity	IPMI OOB communication lost during stress	2.30.3000	2.30.8000
169.	iperf stress test	Packet drops during iperf stress w/ different MSS	2.30.3000	2.30.8000
170.	Loss of connection to BMC upon firmware upgrade	Upgrading from firmware v2.10.3898 may cause loss of connection to BMC.	2.30.3000	2.30.8000
171.	Running rmmod may cause unexpected behavior	Removing the mlx4_en driver using the "rmmod" command, may cause unexpected behavior	2.30.3000	2.30.8000
172.	IPMI connectivity	On rare occasions, after stress of BMC cold reset, link failure might occur	2.30.3000	2.30.8000
173.	Flexboot 3.4.100-UEFI-4.0.410 BIOS menu	Enter the BIOS menu while using FlexBoot 3.4.100- UEFI-4.0.410 may cause the server to stop responding (hang)	2.30.3000	2.30.8000
174.	ROL failure	ROL failure after disassembling the driver on the SUT	2.30.3000	2.30.8000
175.	IPMI link failure	IPMI link failure after disabling the WoL or disassembling the driver	2.30.3000	2.30.8000
176.	WoL and RoL issues	WoL and RoL issues caused when the IPMI is disabled	2.30.3000	2.30.8000
177.	A link flapping issue	Alignment marker arrival can no longer drop the link.	2.30.3000	2.30.8000
178.	IPMI - SOL traffic performance improvement	SOL with multiple data streams occasionally hang	2.30.3000	2.30.8000
179.	RoCE	RoCE does not function properly after running "ethtool ethX"	2.30.3000	2.30.8000
180.	PCI link errors	PCI link errors false indication. Cleared errors during PCIe link retraining	2.30.3000	2.30.8000
181.	PCIe speed change	RM#209199Fixed a false indication for incoming PCIe speed change request	2.30.3000	2.30.8000
182.	No NC-SI after PXE teardown	Management transport was not supported, after PXE driver teardown (unload). Fixed the flow to issue software reset, after the driver was stopped	2.30.3000	2.30.8000
183.	Ports PLL calibration issue	RM #199503PLL calibration were affected by operating point configuration	2.30.3000	2.30.8000

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Table 1 - Fixed Bugs List (Sheet 13 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
184.	Cable Info MAD issue	RM #208874Wrong cable info was received when using the MC2210411-SR4 module	2.30.3000	2.30.8000
185.	Revision ID	Updated the Revision ID of Node Info and General Info MADs to reflect HW Rev ID instead of 0	2.30.3000	2.30.8000
186.	Port Error counters reset	RM #190185Port error counters were not cleared upon XAUI/SGMII link up	2.30.3000	2.30.8000
187.	RDMA retransmission on ConnectX®-3 Pro	RM #211404RDMA retransmission failed in specific scenario of receiving NAKs on ConnectX®-3 Pro due to bad static configuration	2.30.3000	2.30.8000
188.	NMI on PCIe Gen2 server	RM #107249Fixed a PCIe Gen2 firmware flow to prevent NMI during hibernation on PCIe Gen2 server	2.30.3000	2.30.8000
189.	Access to closed resources	RM#203944Fixed a possible access to unmapped resource memory	2.30.3000	2.30.8000
190.	Slow link establishment in NC-SI	Slow link establishment in NC-SI caused due to slow cable reading in boot	2.30.3000	2.30.8000
191.	PCIe speed change	RM#193971Occasionally, a failure occurred in speed when changing to Gen2	2.30.3000	2.30.8000
192.	PXE teardown issue	PXE might halt during teardown	2.30.3000	2.30.8000
193.	InfiniBand loopback	InfiniBand loopback was blocked during link negotiation on the same port	2.11.0500	2.30.8000
194.	Voltage scaling	Fixed process voltage scaling issue	2.30.3000	2.30.8000
195.	DMA address 0x0	Fixed a possible read access to DMA address 0x0	2.11.0500	2.30.8000
196.	cqe issue	Fixed miss cqe issue due to interrupt moderation	2.11.0500	2.30.8000
197.	Cable reading issue	Fixed a rare cable reading issue upon cable insertion	2.30.3000	2.30.8000
198.	Linkup issue	Fixed a linkup issue against MSX60XX FDR switch	2.30.3000	2.30.8000
199.	LLR Vendor Specific MAD	LLR Dropped cell counter reported CSN error	2.11.0500	2.30.8000
200.	PXE boot failure	On rare occasions, PXE boot fails due to a firmware issue interfering with the PXE load from the card's flash. Upon failure, the following message is received: "Payload inaccessible - cannot continue"	2.30.3000	2.30.8000

Table 1 - Fixed Bugs List (Sheet 14 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
201.	MLNX_OFED v2.0-2.0.3 reports ETH RX errors	MLNX_OFED v2.0-2.0.3 reported RX errors when the driver operated in the ETH only mode.	MLNX-_OFED v2.0.2.0.3	2.30.3200
202.	SR-IOV guest com-munication channel error	RM#270160Under certain conditions, SR-IOV guest experienced request timeouts and got stuck.	2.11.0500	2.30.3200
203.	No NC-SI after PXE teardown	Management transport was not supported, after PXE driver teardown (unload). Fixed the flow to issue software reset, after the driver was stopped.	2.11.0500	2.30.3000
204.	Revision ID	Updated the Revision ID of Node Info and General Info MADs to reflect hardware Rev ID instead of 0	2.11.0500	2.30.3000
205.	Ports PLL calibration issue	RM #199503PLL calibration were affected by operating point configuration	2.11.0500	2.30.3000
206.	Port Error counters reset	RM #190185Port error counters were not cleared upon XAUI/SGMII link up	2.11.0500	2.30.3000
207.	Receiver SerDes tun-ing	Enhanced the receiver SerDes tuning for 10GE, to support specific 10GbE QSFP to SFP+ splitter cables	2.11.0500	2.30.3000
208.	Access to closed resources	RM#203944Fixed a possible access to unmapped resource memory	2.11.0500	2.30.3000
209.	Slow link establish-ment in NC-SI	Slow link establishment in NC-SI caused due to slow cable reading in boot	2.11.0500	2.30.3000
210.	PCIe speed change	RM#193971Occasionally, a failure occurred in speed when changing to Gen2	2.11.0500	2.30.3000
211.	PXE teardown issue	PXE might halt during teardown	2.11.0500	2.30.3000
212.	InfiniBand loopback	InfiniBand loopback was blocked during link negotiation on the same port	2.11.0500	2.30.3000
213.	Voltage scaling	Fixed process voltage scaling issue	2.11.0500	2.30.3000
214.	DMA address 0x0	Fixed a possible read access to DMA address 0x0	2.11.0500	2.30.3000
215.	cqe issue	Fixed miss cqe issue due to interrupt moder-ation	2.11.0500	2.30.3000
216.	Cable reading issue	Fixed a rare cable reading issue upon cable insertion	2.11.0500	2.30.3000

Table 1 - Fixed Bugs List (Sheet 15 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
217.	PXE boot failure	On rare occasions, PXE boot fails due to a firmware issue interfering with the PXE load from the card's flash. Upon failure, the following message is received: "Payload inaccessible - cannot continue"	2.11.0500	2.30.3000
218.	Momentarily packet drop on one port while the other port goes down	When the same VLAN is configured for both ports and one port goes down, the second port may suffer a momentarily packet drop	2.11.0500	2.30.3000
219.	Advanced Error Reporting	Fixes to Advanced Error Reporting according to the PTC (PCIe compliancy) Test failures	2.11.0500	2.30.3000
220.	10GbE link remains down after changing to a 40GbE link	When changing link connection between 40Gbe to 10Gbe, the port might stay down until the next driver restart.	2.11.0500	2.30.3000
221.	Race in PCIe L1 flow	The device may enter an L1 power state before completing an incoming configuration request if it arrived before the power state change ack for Root Complex	2.11.0500	2.30.3000
222.	Wrong link speed after several cable re-insertions	During repeated cable reinsertion, the link may raise in a lower speed than expected/	2.11.0500	2.30.3000
223.	Changing port protocol from ETH to IB requires driver restart	Bad configuration of `ib_protocol` when setting the port to InfiniBand after exchanging it from Ethernet/RoCE on the same port	2.11.0500	2.30.3000
224.	Rare NMI error on HP servers when using PXE	On rare occasions, an NMI error is received when stopping PXE boot in the middle of an action on HP servers	2.11.0500	2.30.3000
225.	Race in PCI configuration handling	The system was unresponsive when a race between PCI configuration cycles handling in hardware and firmware occurred.	2.11.0500	2.30.3000
226.	RoCE breaks IPv6 traffic	IPv6 packets dropped while RoCE was enabled	2.11.0500	2.30.3000
227.	Link reset, HCA to SwitchX®	On rare link reset occasions, an HCA to SwitchX® link may remain in ARM state after SwitchX reboot, and not reach the Active state.	2.11.0500	2.30.3000
228.	40GbE switches link down upon repeated insertion and removing of cables	When repeatedly plugging out and plugging in cables to/from a 40GbE switch, the link remains down.	2.10.0800	2.11.0500

Table 1 - Fixed Bugs List (Sheet 16 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
229.	FDR/QDR vs DDR switch	The link is raised as SDR rather than DDR	2.10.0800	2.11.0500
230.	0.5M, 1M Copper FDR cable support	0.5M, 1M Copper FDR cables (Paralink11, Paralink14) are not supported in back to back connection.	2.10.0800	2.11.0500
231.	Changing FDR cables from Fiber to Copper	Changing FDR cables from Fiber to Copper and vice versa might cause link speed degradation from FDR to FDR10 or FDR10 to QDR.	2.10.0800	2.11.0500
232.	Changing 40GbE connection	Changing 40GbE connection from back to back to a switch port and vice versa might cause the link to stay down in the ConnectX®-3 side.	2.10.0800	2.11.0500
233.	SDR vs QDR switch	InfiniBand link vs QDR switch rises as DDR or SDR	2.10.0800	2.11.0500
234.	QDR link up time	On rare occasions, the QDR link up time between an FDR card and a QDR device was up to 4 minutes	2.10.0800	2.11.0500
235.	QDR Link stability	QDR Link stability between ConnectX®-3 and InfiniScale® IV	2.10.0800	2.11.0500
236.	Signal integrity issues	Signal integrity issues in all speeds	2.10.0800	2.11.0500
237.	PCI correctable error	Fixed bad PCI reporting	2.10.0800	2.11.0500
238.	RoCE re-transmission	Not re-transmitting from the beginning of the message but from PSN NAK.	2.10.0800	2.11.0500
239.	RoCE	R-RoCE ignored SMAC check	2.10.0800	2.11.0500
240.	Function Level Reset (FLR)	FLR to PPF in SRIOV	2.10.0800	2.11.0500
241.		FLR in no-driver mode	2.10.0800	2.11.0500
242.	SR-IOV	Comchannel bug fix	2.10.0800	2.11.0500
243.	40GbE performance	40GbE full wire speed was not reached with former cards configuration for MCX314 and MCX313 40GbE cards. **Fix:** Increased core frequency to support 40GbE full wire speed. This change requires 1V input. **Affected cards:** MCX313A-BCB, MCX-314A-BCB	2.10.0700	2.10.0800
244.		The ConnectX® card was not receiving frames with minimum IPG when configured to 40GbE. Fix: Updated firmware configuration. Affected cards: All cards capable of 40GbE speed	2.10.0700	2.10.0800

Table 1 - Fixed Bugs List (Sheet 17 of 17)

Index	Issue	Description	Discovered in Release	Fixed in Release
245.	GUIDs for RoCE	Ethernet only cards did not have GUIDs flashed on the device. This caused RoCE to fail once two or more cards were active on the same machine. **Fix:** The firmware generates the GUIDs from the flashed MACs for ETH only cards. **Affected cards:** All ETH only cards.	2.10.0700	2.10.0800
246. 247.	40GbE signal integrity	Signal integrity improved in 40GbE speed.	2.10.0000	2.10.0700
248.	PCIe Gen3 receiver sensitivity due to BIOS changes	Due to BIOS changes required by latest Intel guidelines for PCIe Gen3, a sensitivity in PCIe eye_centering algorithm caused link degradation on some platforms.	2.10.0600	2.10.0620
249. 250.	FDR, FDR10, 10GbE XFI/SFI signal integrity	Signal integrity improved for the following speeds: FDR, FDR10, 10GbE XFI/SFI.	2.10.0000	2.10.0600
251.	VDD_MODE GPIO changed after reset	In boards with VDD_MODE GPIO, the GPIO was dropped after reset hence, causing voltage to be reduced to 0.9v. **Fix:** The GPIO in boards with VDD_MODE GPIO is no longer dropped across resets.	2.10.0000	2.10.0600
252.	PCIe configuration type1 requests were dropped after a PCIe hot reset	After a PCIe hot reset, PCIe configuration type1 requests were dropped instead of being replied as unsupported. **Fix:** A proper notification is sent every time PCIe configuration type1 requests are dropped.	2.10.0000	2.10.0600