

InfiniBand™ Master List of Additional Capabilities Tests

[Link](#)

Test Number	Test Subsection	Description	2 Gen	Switch Only
C7-033	C07-033	SL on Packets must be Invariant in a Subnet		
C7-042	C07-042-01	LRH Packet Length Check - Min Hdr	DTA	xCA Only
	C07-042-02	LRH Packet Length Check - Big Hdr	DTA	xCA Only
C7-043	C07-043-01	Minimum Packet Length Check - Send	DTA	xCA Only
	C07-043-02	Min PktLen Check - Receive	DTA	xCA Only
C7-045	C07-045-01	Max Packet Length Check - Send	DTA	xCA Only
	C07-045-02	Max Packet Length Check - Receive (xCA Only)	DTA	xCA Only

[Transport](#)

[Legend](#)

- Additional tests for Atomic Operation

Test Number	Test Subsection	Description	2 Gen	Switch Only
C09-027 ACK Pckts Strong Ordering	C9-027#01	Send Only after RDMA Read	DTA	xCA Only
	C9-027#02	Write Only after RDMA Read	DTA	xCA Only
	C9-027#03	Read Only after RDMA Read	DTA	xCA Only
	C9-027#04	Atomic FetchAdd after RDMA Read	DTA	xCA Only
	C9-027#05	Atomic CompSwap after RDMA Read	DTA	xCA Only
	C9-027#06	Atomic CompSwap after Atomic CompSwap	DTA	xCA Only
	C9-027#07	Atomic FetchAdd after Atomic CompSwap	DTA	xCA Only
	C9-027#08	Atomic FetchAdd after Atomic FetchAdd	DTA	xCA Only
	C9-027#09	Atomic CompSwap after Atomic FetchAdd	DTA	xCA Only
	C9-027#10	Send Only after Atomic CompSwap	DTA	xCA Only
	C9-027#11	Write Only after Atomic CompSwap	DTA	xCA Only
	C9-027#12	Send Only after Atomic FetchAdd	DTA	xCA Only
	C9-027#13	Write Only after Atomic FetchAdd	DTA	xCA Only
C09-060 WQE Completion	C9-060#01	RC Completion Rules - Send Case	DTA	xCA Only
	C9-060#03	RC Completion Rules - RDMA Write Case	DTA	xCA Only
	C9-060#05	RC Completion Rules - RDMA Read Case	DTA	xCA Only
C9-103 Err Behaviour for Dupe Requests	C9-103#01	Error Behaviour - Dupe Send Local	DTA	xCA Only
	C9-103#02	Error Behaviour - Dupe RDMA Write	DTA	xCA Only
	C9-103#03	Error Behaviour - Dupe RDMA Read Req	DTA	xCA Only
	C9-103#04	Dupe RDMA Read Req with Res Opcode	DTA	xCA Only
	C9-103#05	Dupe RDMA Read Req with R#Key incr by 1	DTA	xCA Only
C9-116 BTH AckReq	C9-116#01	AckReq In RC Send Only	DTA	xCA Only
	C9-116#02	AckReq In RC Send Only with Immediate	DTA	xCA Only
	C9-116#03	AckReq In RC Send First, Mid, Last	DTA	xCA Only
	C9-116#04	AckReq In RC Send Last with Immediate	DTA	xCA Only
	C9-116#05	AckReq In RC RDMA Write Only	DTA	xCA Only
	C9-116#06	AckReq In RC RDMA Write Only with Immediate	DTA	xCA Only
	C9-116#07	AckReq In RC RDMA Write First, Mid, Last	DTA	xCA Only
	C9-116#08	AckReq In RC RDMA Write Last with Immediate	DTA	xCA Only
	C9-116#09	AckReq In RC RDMA Read Only	DTA	xCA Only
	C9-116#10	AckReq in RC RDMA Read First, Mid, Last	DTA	xCA Only
	C9-116#11	AckReq In RC CmpSwap	DTA	xCA Only
	C9-116#12	AckReq In RC FetchAdd	DTA	xCA Only
C9-148 MSN Calculation	C9-148#01	Initializing the MSN	DTA	xCA Only
	C9-148#02	Incrementing the MSN - RDMA Write and Send	DTA	xCA Only
	C9-148#03	Incrementing the MSN - RDMA Read	DTA	xCA Only
	C9-148#04	Incrementing the MSN - Atomic Operations	DTA	xCA Only
	C9-148#05	Duplicated Requests and MSN Incrementation - RDMA Write	DTA	xCA Only
	C9-148#06	Duplicated Requests and MSN Incrementation - Send	DTA	xCA Only
	C9-148#07	Duplicated Requests and MSN Incrementation - RDMA Read	DTA	xCA Only
	C9-148#08	Duplicated Requests and MSN Incrementation - Atomic	DTA	xCA Only
C09-150	C09-150#1	End-to-End Flow Control Rules	DTA	xCA Only
C09-161	C09-161#1	If EE Credits suported, DUT shall indicate # of WQE on RQ	DTA	xCA Only
	C09-161#2	If EE Cr not supported , then DUT must send the invalid code in its CC	DTA	xCA Only
C09-212	C09-212#1	Decrement retry ctr when retrying an op that resulted in RNR NAK	DTA	xCA Only
	C09-212#2	Decrement retry ctr when retrying an op that resulted in PSN Error	DTA	xCA Only
	C09-212#3	Decrement retry ctr when retrying an op that resulted in Local Ack TO	DTA	xCA Only
	C09-212#4	Decr retry ctr when retrying an op that resulted in ACK PSN > ePSN	DTA	xCA Only
C9-162 Send Queue WQE Limited	C9-162#01	LTD Send Queue - RDMA Read Request	DTA	xCA Only
	C9-162#02	LTD Send Queue - RDMA Write with no immediate	DTA	xCA Only
	C9-162#03	LTD Send Queue - Compare and Swap Types	DTA	xCA Only
	C9-162#04	LTD Send Queue - Fetch Add Types	DTA	xCA Only
	C9-162#05	LTD Send Queue - Send Case	DTA	xCA Only
	C9-162#06	LTD Send Queue - RDMA Write with immediate	DTA	xCA Only

Communication Management

Test Number	Test Subsection	Description		
C12-005#01	C12-005#01	MRA rec'd for preceding REP with RTU to complete connection	DTA	xCA Only
C12-005#02	C12-005#02	MRA rec'd for preceding REP with REJ to reject connection	DTA	xCA Only
C12-005#03	C12-005#03	MRA rec'd for initial REP only	DTA	xCA Only
C12-005#04	C12-005#04	MRA rec'd for REP indicates message MRA'ed is other than REP	DTA	xCA Only
C12-005#05	C12-005#05	MRA rec'd for preceding REP with retries	DTA	xCA Only
C12-005#06	C12-005#06	MRA rec'd for preceding REP with retries except REJ last one	DTA	xCA Only
C12-005#07	C12-005#07	MRA rec'd for preceding REP with retries except RTU last one	DTA	xCA Only
C12-005#08	C12-005#08	MRA rec'd for REP w/retries except data pkt rec'd on QP on last one	DTA	xCA Only
C12-005#09	C12-005#09	MRA rec'd for REP w/retries followed by RTU receipt on last one	DTA	xCA Only
C12-004#01	C12-004#01	REJ component validation when rejecting REQ	DTA	xCA Only
C12-004#03	C12-004#03	REJ due to timeout on REP sent	DTA	xCA Only
C12-004#04	C12-004#04	REJ due to invalid transport service type in REQ	DTA	xCA Only
C12-004#06	C12-004#06	REJ due to invalid primary remote port GID in REQ	DTA	xCA Only
C12-004#07	C12-004#07	REJ due to invalid primary remote port LID in REQ	DTA	xCA Only
C12-004#08	C12-004#08	REJ due to invalid primary SL in REQ	DTA	xCA Only
C12-004#09	C12-004#09	REJ due to invalid path MTU in REQ	DTA	xCA Only
C12-004#10	C12-004#10	REJ due to insufficient responder resources in REQ	DTA	xCA Only
C12-004#11	C12-004#11	REJ due to RNR retry count in REQ	DTA	xCA Only
C12-004#13	C12-004#13	REJ due to invalid class version in REQ	DTA	xCA Only
C12-004#14	C12-004#14	REJ LocalCommID is RemoteCommID of rejected REP and	DTA	xCA Only
C12-004#15	C12-004#15	REJ LocalCommID is not RemoteCommID of rejected REP	DTA	xCA Only
C12-004#16	C12-004#16	REJ RemoteCommID is not LocalCommID of rejected REP	DTA	xCA Only
C12-003#02	C12-003#02	REP component validation	DTA	xCA Only
C12-003#09	C12-003#09	REP failover accepted	DTA	xCA Only
C12-003#10	C12-003#10	REP local CA GUID	DTA	xCA Only
C12-003#11	C12-003#11	Sender of REP receives REQ for same connection	DTA	xCA Only
C12-008#27	C12-008#27	RTU local and remote CommIDs based on preceding REP	DTA	xCA Only
C12-008#28	C12-008#28	RTU LocalCommID is not RemoteCommID of preceding REP	DTA	xCA Only
C12-008#29	C12-008#29	RTU RemoteCommID is not LocalCommID of preceding REP	DTA	xCA Only
C12-008#30	C12-008#30	Data packet received on QP but no RTU received	DTA	xCA Only
C12-008#31	C12-008#31	Data packet received on QP followed by receipt of RTU	DTA	xCA Only
C12-007#11	C12-007#11	DREQ received for non existent LocalCommID	DTA	xCA Only
C12-007#12	C12-007#12	DREQ received for non existent RemoteCommID	DTA	xCA Only
C12-007#13	C12-007#13	DREQ received for non existent remote QPN	DTA	xCA Only
C12-006#01	C12-006#01	DREP local and remote CommIDs	DTA	xCA Only
C12-005.1.2#01	C12-005.1.2#01	MRA with wrong sequence # received for preceding REP with retries	DTA	xCA Only
C12-005.1.2#02	C12-005.1.2#02	RTU with wrong sequence # received for preceding REP with retries	DTA	xCA Only

Subnet Management

Test Number	Test Subsection	Description		
C14-006	C14-006	Basic Directed Route SMP Request	SM/SA	
C14-009#01	C14-009#01	Basic Directed Route SMP Through a Switch	2 Gen	Switch Only
C14-009#02	C14-009#02	Basic DR SMP Through a Switch with DrDLID Known	2 Gen	Switch Only
C14-009#03	C14-009#03	Basic DR SMP Through a Switch with DrSLID Known	2 Gen	Switch Only
C14-013 Directed Route	C14-013-01	SMP Request with Invalid Port # in the Initial Path	2 Gen	Switch Only
	C14-013-02	SMP Request with Hop Ptr = Hop Count + 2	2 Gen	Switch Only
	C14-013-03	SMP Response - invalid port number in return path	2 Gen	Switch Only
	C14-013-04	SMP Response with Hop Ptr = Hop Count + 2	2 Gen	Switch Only
C14-024#04 SwitchInfo	C14-024#04-04	SwitchInfo - Down-to-Initialize and Initialize-to-Down Transitions	2 Gen	Switch Only
	C14-024#04-05	SwitchInfo - Armed-to-Down Transition	2 Gen	Switch Only
	C14-024#04-06	SwitchInfo - Active-to-Down Transition	2 Gen	Switch Only
C14-024#13 SMInfo	C14-024#13-01	SMInfo - Supported - Part 1	SM/SA	
	C14-024#13-03	SMInfo - Unsupported	SM/SA	
C14-041.1.1	C14-041.1.1	SM Yield Part 1	SM/SA	
	C14-041.1.1	SM Yield Part 2	SM/SA	
	C14-041.1.1	SM Yield Part 3	SM/SA	
	C14-041.1.1	SM Yield Part 4	SM/SA	

Subnet Administration

Test Number	Test Subsection	Description		
C15-0.1.012#15	C15-0.1.012#15	SubnAdmGet(ServiceRecord)	SM/SA	
C15-0.1.012#17.01	v1c15-0.1.012#17.01	SubnAdmGet(PathRecord)	SM/SA	
C15-0.1.012#17.02	C15-0.1.012#17.02-Part1	SubnAdmGetTable(PathRecord) Part 1	SM/SA	
	C15-0.1.012#17.02-Part2	SubnAdmGetTable(PathRecord) Part 2	SM/SA	
	C15-0.1.012#17.02-Part3	SubnAdmGetTable(PathRecord) Part 3	SM/SA	