

Nexenta Solutions Certification

Certification Testing Requirements (CTR)

Certification: <<CR Identifier>>

Version: 1.1

Revision History

Revision Number	Revision Date	Revision Purpose	Reviewer(s)/Approver(s)
1.0	4/26/12	First draft in-progress	Nexenta Certified Solutions Program Team
1.1	4/24/14	Updated the document to adhere to the latest template style	Certification Team

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Certification Testing Pre-Requisites

Certification Testing Pre-Requisite	Status (Met / Unmet)	Remediation Planned	Target Date
Certification Technical Lead or Contact Identified <i>(Partner or Direct Customer has identified a Technical Lead or Contact Person for all certification-related communications and activities).</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Certification Testing Technical Resources Identified and Assigned <i>(Any Partner or Direct Customer resources that are planned to participate in the certification process have been identified and assigned).</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Licensing Requirements <i>(Any requirements that may apply for Partner or Direct Customer hardware or software to be used by Nexenta as part of the certification process have been fulfilled.)</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Code Base or Target Code <i>(Any required code base and/or target code that may be required for certification testing has been supplied to the Nexenta Certification Team.)</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Approved Target Testing Configuration(s) <i>(The/All target testing configurations for multi-component certifications and any specific configuration(s) desired for certification testing have been either catalogued/specified and/or clearly-diagrammed and supplied to the Nexenta Certification Team.)</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Testing Topology <i>(Any baseline topology to be used for certification testing has been clearly-diagrammed and supplied to the Nexenta Certification Team.)</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		
Standardized Testing Category Detailed Assumptions <i>(All detailed assumptions, if any, about all applicable standardized testing categories regarding certification testing have been provided to Nexenta Certification Team.)</i>	<input type="checkbox"/> Met <input type="checkbox"/> Unmet		

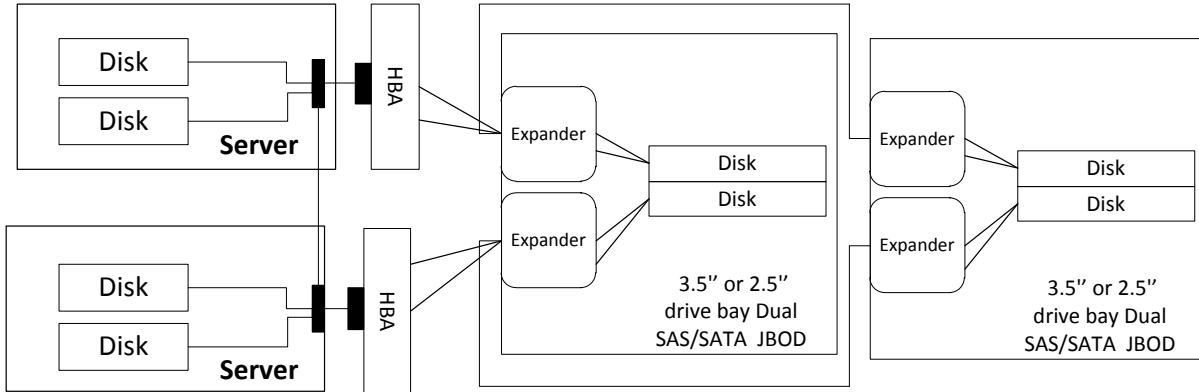
Appendix 1.0 – CTR Pre-requisites

1.0 Certification Customer OR Partner Contact Information

Name(s)	Title(s)	Email Address(es)	Phone Number(s)

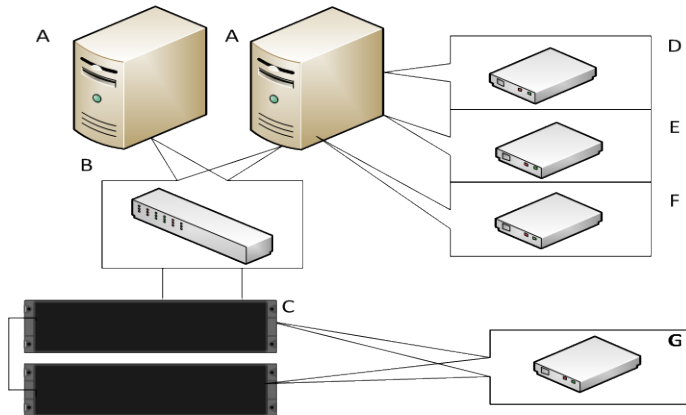
2.0 Code Base or Target Code

3.0 Approved Target Testing Configuration – Logical



Target Configuration Revision and Revision Date	1.0,			
Target Configuration Type				
Diagram Type				
Configuration Detail	Expander Requirement	HBA Requirement	Interconnect Standard	Total Interconnects

4.0 Approved Target Testing Configuration – Physical



Target Configuration Revision	1.0,						
Target Configuration Type							
Diagram Type	Physical						
BOM Component	Component /Sub Component Type	Quantity	Component Name	Component Model Number	BIOS Revision Level	Firmware Revision Level	Re-branded Component
A - System (Quantity 2)	Motherboard						
	Processor						
	Memory						
	Networking						
	D - OS - HDD						
	E - SSD – Zil Cache						
	F - SSD – L2ARC						
B	SAS Dual-Port HBA						
C	JBOD						
	G - HDD						

5.0 Standardized Testing Category Detailed Assumptions

Standardized Testing Category Test	Test Definition	Detailed Assumptions
Appliance Cold-Start Test	This test verifies that the system can cold boot and all devices are visible and all pools are online. The Appliance must be fully loaded (ie disks in every slot)	
Controller Card Location Independence Test	This test verifies that the card(SAS/SATA controller, and NIC and HBA cards) can operate in every suitable PCI slot of the server. If some slots are not compatible, the user has to report it in the test result document.	
Chassis Management Tests	These test verify the compatibility of a JBOD with NexentaStor NMC and NMV.	
Disk Failure Test	This test verifies that the storage handles data disk failures and continues to function. Specifically, the test writes to the mirror volume and has the user unplug the power of one of the disks from the mirror pair. The test then verifies that the designated hot spare disk has properly taken over the failed disk.	
Cold and Hot Swap Disk Test	This test verifies that a disk can be replaced while appliance is powered on and also performs the verification after appliance is power-cycled.	
Disk Performance Test	This test provides performance characterization of the disk.	
Disk Stress Test	This stress test is designed to create a random read/write workload that needs to get the device at 95% busy for at least 20 hours without error.	

Standardized Testing Category Test	Test Definition	Detailed Assumptions
File system Performance Test	This test provides performance characterization of the filesystem.	
Disk Relocation Test	This test verifies that the physical disks can operate in every suitable slot of the server/JBOD.	
Multi-path Data Disk Failure Test	This test is identical to Data Disk Failure test, except that it is done in a multi-path environment. This test should be run on the specific wiring configuration that the user has provided.	
Networking Performance Test	This test runs iperf benchmark tests to check the networking performance and shows the results to the user.	
Storage Performance Test	This test runs IOzone benchmark tests to check the storage performance read and write speeds.	

6.0 CTR Review

Review Date	Reviewer	Function	Title