Areca SAS/SATA Controllers HDD Compatibility Matrix

As of May-10-2012

The Enterprise RAID-ready SATA drive goes beyond desktop-class disc drives to address the unique needs of nearline applications with higher reliability and smoother integration into multi-disc nearline applications.

The following table is the list of current qualified and supported SATA drives

Brand	Model Name	Capacity	Firmware	SATA RAID Cards		SAS RAID Cards		Remark
				Simple Test	Stress Test	Simple Test	Stress Test	
Hitachi	HUA723030ALA640	3TB	580	Pass	Pass	Pass	Pass	
Hitachi	HUA722020ALA330	2TB	JKAOA20N	Pass	Pass	Pass *12	Pass *12	
Hitachi	HDE721010SLA330	1000.2GB	ST60A31B	Pass	Pass	Pass *12	Pass *12	
Hitachi	HDT721010SLA360	1000.2GB	ST60A31B	Pass*10	Pass*10	Pass*10,12	Pass*10,12	
Hitachi	HDS721010KLA330	1000.2GB	GKAOA70M	Pass	Pass	Pass*10	Pass*10	
Hitachi	HDS721075KLA330	750.2GB	GK8OA70M	Pass	Pass	Pass*10	Pass*10	
Hitachi	HDS725050KLA360*4	500.1GB	K2AOA51A	Pass	Pass	Pass*10	Pass*10	
Hitachi	HDT725040VLA360	400GB	V5COA52A	Pass	Pass	Pass*10	Pass*10	
Hitachi	HDT725025VLA380	250GB	V5DOA52A	Pass	Pass	Pass*10	Pass*10	
Hitachi	HDS724040KLSA80	400.1GB	KFAOA30A	Pass*6	Pass*6	--	--	
Hitachi	HDS722580VLSA80	82.3GB	V320A60A	Pass*6	Pass*6	--	--	
Hitachi	HDS722525VLSA80	250GB	V360A60A	Pass	Pass	--	--	
Hitachi	HDS722516VLSA80	160GB	V360A60A	Pass	Pass	--	--	
Hitachi	HDS722512VLSA80	123.5GB	V330A60A	Pass	Pass	--	--	
Seagate	ST2000NM0001	2TB	0002	--	--	Pass	--	5 HDD tested
Seagate	ST2000NM0011	2TB	SN02	--	--	Pass	--	5 HDD tested
Seagate	ST33000650NS	3TB	0001	Pass	--	Pass	--	5 HDD tested
Seagate	ST91000640NS	1TB	SN01	Pass	--	Pass	--	5 HDD tested

Simple Test : No Error found in 1 week   **Stress Test : No Error found in 1 month**

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				Simple Test	Stress Test	Simple Test	Stress Test	
Seagate	ST32000644NS	2TB	SN11	Pass	Pass	Pass	Pass	5 HDD tested
Seagate	ST31000524NS	1TB	SN11	Pass	Pass	Pass	Pass	5 HDD tested
Seagate	ST31000340NS	1000.2GB	SN05	Pass	Pass	Pass *11	Pass *11	
Seagate	ST31000340AS	1000.2GB	SD01	Pass*10	Pass*10	Not Compatible	Not Compatible	
Seagate	ST3750330NS	750GB	SN05	Pass	Pass	Pass *11	Pass *11	
Seagate	ST3750330AS	750GB	SD15	Pass*10	Pass*10	Not Compatible	Not Compatible	
Seagate	ST3750640NS	750.2GB	3.AEE	Pass	Pass	--	--	
Seagate	ST3750640AS	750.2GB	3.AAC	Pass*10	Pass*10	--	--	
Seagate	ST3500320NS	500GB	SN05	Pass	Pass	Pass *11	Pass *11	
Seagate	ST3500320AS	500GB	SD15	Pass*10	Pass*10	Not Compatible	Not Compatible	
Seagate	ST3500641NS	500.1GB	3.AEH	Pass	Pass	--	--	
Seagate	ST3500641AS	500.1GB	3.AAE/2.AAA	Pass*10	Pass*10	--	--	
Seagate	ST3400832AS	400GB	3.01	Pass*10	Pass*10	--	--	
Seagate	ST3250824NS	250GB	3.AEH	Pass	Pass	--	--	
Seagate	ST3250823NS	250GB	5.01	Pass	Pass	--	--	
Seagate	ST3160023AS	160GB	3.04	Pass	Pass	--	--	
Seagate	ST3120026AS	120GB	3.05	Pass	Pass	--	--	
Seagate	ST380023AS	80GB	3.01	Pass	Pass	--	--	
Seagate	ST380013AS	80GB	3.18	Pass	Pass	--	--	
WD	WD6000HLHX	600GB	04.05G04	Pass	Pass	Pass	Pass	
WD	WD2003FYYS-	2.0TB	01.01D01	Pass	Pass	Pass	Pass	
WD	WD1003FBYX	1.0TB	01.01V01	Pass	--	Pass	--	5 HDD tested

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				Simple Test	Stress Test	Simple Test	Stress Test	
WD	WD5003ABYX	500GB	01.01S01	Pass	--	Pass	--	5 HDD tested
WD	WD2002FYPS-	2.0TB	04.05G04	Pass	Pass	Pass *13	Pass *13	
WD	WD1000FYPS-	1.0TB	02.01B01	Pass	Pass	Pass *12	Pass *12	
WD	WD1002FBYS-	1.0TB	03.00C05	Pass	Pass	Pass *12	Pass *12	
WD	WD7502ABYS-	750GB	03.00C05	Pass	Pass	Pass *12	Pass *12	
WD	WD7500AYPS-	750.2GB	02.01B01	Pass	Pass	Pass *12	Pass *12	
WD	WD7500AYYS-	750.2GB	30.04G30	Pass	Pass	Pass *12	Pass *12	
WD	WD5002ABYS-	500.1GB	02.03B02	Pass	Pass	Pass *12	Pass *12	
WD	WD5001ABYS-	500.1GB	59.01D01	Pass	Pass	Pass *12	Pass *12	
WD	WD5000ABPS-	500.1GB	02.01B01	Pass	Pass	Pass *12	Pass *12	
WD	WD5000ABYS-01TNA0	500GB	11.02N11	Pass	Pass	Pass *12	Pass *12	
WD	WD5000YS-01MPB0	500GB	07.02E07 *9	Pass	Pass	--	--	
WD	WD4000YR-01PLB0	400GB	01.PLB0	Pass*8	Pass*8	--	--	
WD	WD4000KD-00NAB0	400GB	01.06A01	Pass*2	Pass*2	--	--	
WD	WD3000HLFS-	300GB	04.04V01	Pass	Pass	Pass *12	Pass *12	
WD	WD2500YD*7	250GB	10.02E01	Pass	Pass	--	--	
WD	WD2500SD	250GB	02.05D02	Pass	Pass	--	--	
WD	WD2500JD-22HBB0	250GB	08.02D08	Pass	Pass	--	--	
WD	WD2000JD-22HBB0	200GB	08.02D08	Pass	Pass	--	--	
WD	WD1200JD	120GB	02.05D02	Pass	Pass	--	--	
WD	WD800JD-00HKA0	80GB	13.03G13	Pass	Pass	--	--	
WD	WD1500ADFD-00NLR0	150GB	19.06P19	Pass *3	Pass *3	--	--	

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Brand	Model Name	Capacity	Firmware	SATA RAID Cards		SAS RAID Cards		Remark
				Simple Test	Stress Test	Simple Test	Stress Test	
WD	WD360GD-00FNA0	36GB	35.06K35	Pass	Pass	--	--	
Fujitsu	MHT2060BH	60GB	00000043	Pass	Pass	--	--	
Maxtor	6H500F0	500GB	0601A01	Pass *1	Pass *1	--	--	
Maxtor	7H500F0	500GB	YAR51BW0	Pass *1	Pass *1	--	--	
Maxtor	6B300S0	300.1GB	BANC1980	Pass *1	Pass *1	--	--	
Maxtor	7B300S0	300GB	BANC1980	Pass *1	Pass *1	--	--	
Maxtor	6V300F0	300.1GB	VA111610	Pass *1	Pass *1	--	--	
Maxtor	6Y250M0	250GB	YAR51BW0	Pass *1	Pass *1	--	--	
Maxtor	7Y250M0	250GB	YAR51BW0	Pass *1	Pass *1	--	--	
Maxtor	6Y120M0	120GB	YAR51BW0	Pass *1	Pass *1	--	--	
Maxtor	6Y080M0	80GB	YAR51BW0	Pass *1	Pass *1	--	--	
Samsung	HD103UJ	1.0TB		PossibleProblem**	PossibleProblem**	Not Compatible	Not Compatible	
Samsung	HD753LJ	750.2GB	1AA01107	PossibleProblem**	PossibleProblem**	Not Compatible	Not Compatible	
Samsung	SP2004C	200GB	VM100-32	Pass *5	Pass *5	--	--	

*** PossibleProblem ***

We had got some usage problem reports by customers, but not all problems are reproducible.

If you already use this drive, please disable NCQ for better compatibility.

1. We recommend running with " Read Ahead Cache Disable" & Disable NCQ when finding any compatibility. Although we had certified this drive, but some customer got problem still. So if you hadn't bought this drive yet, we will not recommend you used this driv

2. Update controller firmware to version 1.41 & disable NCQ for solving the compatibility issue with this drive.

3. Update controller firmware to version 1.41 or later for solving the compatibility issue with this drive.

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4. NCQ is currently has problem for this drive model. Please check with Hitachi Technical Support for updated microcode November, 2005. We recommend running with 'Queuing Disabled' when using this drive or update Areca firmware to 1.39 to solve the NCQ problem

5. SMART failure might be seen on this drive due to a drive firmware problem. NCQ is not recommended for this drive. Please check with Samsung for a firmware update to fix the bugs mentioned above.

6. Disable NCQ for solving the compatibility issue with this drive.

7. Please get new version firmware from WD.

8. We recommend running with NCQ Disabled when finding any compatibility. Although we had certified this drive, but some customer got problem still.

9. WD had releasd a new firmware for array application issue. Please visit WD official site to download the updated firmware

http://support.wdc.com/download/index.asp?cxml=n&pid=15&swid=57

10. We recommend Enterprise drives instead Desktop one, because enterprise drives are much more reliable for array applications.

11. The hard drive firmware must be SN06 or later

12. The SAS controller firmware must be V1.45 80915 or later.

13. For directly connections such as ARC-1680i or ARC1212/22, the hard drive must configured to SATA150 mode to avoid the compatible problem.

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