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HITACHI エンタープライズサーバEP8000 シリーズ マシンコード更新手順

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SCSI RAID カード(2チャネル) ファームウェア変更内容と来歴

ファームウェア変更内容と来歴	
070D000c	-iSeries enhancement for all U320 SCSI Controllers. Enhancement to recognize Hot Spare (RAID 0) DASD. -GA microcode level necessary for SCSI RAID AUX Cache Card Support.
050D0090	-Fix for a system hang at 0255/0266 after a SCSI Cable Pull test. -Improve error logging for 9010 errors by including the Bats status area. -Change handling of the Handle Query Resource State Command with the sync override bit set.
050D007f	-Dual-Initiator (HA) mode fixes: A) Adapter transition timing window shortened for non-SCSI RAID adapters (fix for CCIN 5702, 571A) B) Modification to cache flushing algorithm, fix for the below. 1) A Stand Alone SCSI RAID adapter (that is not the preferred Primary) is full of cache data that will take a long time to flush. 2) Power on a second SCSI RAID that is the preferred Primary. 3) When the failover happens the first SCSI RAID will not have finished flushing cache data before the second IOA starts talking to the drives that the first IOA is still flushing data to (CCIN 5703 & 571B) -Added NACA support (all U320 SCSI Controllers/Adapters)
050D0075	-AIX Location code fix
050D006e	-Error log entry w/ PRC 14005060 can appear in pSeries SCSI RAID HA environments during random system boots. -SCSI Target Mode fix for possible hung I/O operation -Fix for FC 5703 and U320 Cheetah 73LP-X15 drives -SCSI RAID rebuild fix for varying DASD vendor/product IDs -Added support for vendor unique “c0” command used in Atape & 3590 configurations w/ HVD/LVD converter and created workaround to prevent SCSI bus hang resulting in reset condition -Enhancement to RAID 10 read performance -Fix to prevent the following: Data may exist in the cache marked for the same section of disk. The older data was in the process of being destaged when power was lost on the adapter while the newer data was just written. The older data has a chance to be written back to disk upon power on rather than the newer. This problem was seen sporadically in test w/ the IBM Hitachi 15K Rpm DASD.
050D0067	-New revision level of microcode. -Ported 20MBps SE fix to new revision level. -Fixed FCode bus which caused sysplanar errors to be logged during boot of system. **NOTE: Some sysplanar errors may get logged after downloading this level of microcode. Review of the timestamp will reveal that these errors are from a prior boot. Clear the errorlog ("errclear 0") after downloading the microcode to prevent future improper logging of this error.**

030D0059	Resolves Error code BA090003 in "sysplanar" error upon System Boot
030D0058	-Added detection for invalid DMA's. This DMA issue represents a potential data error. IBM recommends that you install this fix immediately. -Cache Data Boundary modifications -For 64MB, 40MB effective, SCSI RAID Enablement Card cache modules the full cache size can now be utilized
030D0056	-Minimum support level for HV products -Increased BATs speed (Adapter/Controller comes available faster on bringup) -Added support for HV products -Alterations to the SCSI RAID cache page tables -Alterations to SCSI RAID cache flushing routine including increased drain speed -Support for increased cache size from 16MB to 40MB in SCSI RAID Enablement Card
030D004f	Prior to microcode update, a shutdown is performed to the I2C bus to acquiesce activity. This prevents the I2C bus from getting hung and the Virtual SES devices from coming up "defined".
030D004d	-Virtual SES code fix (SF2, L4). 1) (SF2, L4) I2C bus may hang when adapter reset occurs while the adapter is reading the EEPROM on the I2C bus. Reduce window of occurrence. 2) (L4). I2C bus timeout when adapter is reset and running diagnostics. -SCSI RAID fix. 1) Fix for Adapter Unit Check when Fast/Write Cache not operational (e.g. bad battery, bad NVRAM stick). 2) Added Notification of battery/charger not working. 3) Enhanced error log for Read Cache error . 4) Change in cache implementation from Stack (LIFO) to Queue (FIFO).
030D004b	-Virtual SES fixes: a) LED fix for L4 system and b) PCI-X Quad Channel Ultra320 SCSI RAID Adapter fix for all systems -Error log changes: a) Differentiated a error condition. Adapter now logs a specific error instead of generic for a given situation. b) Return the correct error information to the pSeries Adapter Device Driver (ADD) so a SCSI adapter detected CRC error is logged instead of a program error microcode problem. Problem was seen on L4, SF2 and SF4. -Added Linux support features and fixed Linux drive replacement problem -Force SE mode to 20MBps when an SE device is connected to the 7029-6C3/6E3 new feature backplane. This backplane expands the Integrated SCSI Controller adding an external port.
030D0047	External SE device fix; external SE devices are limited to 20MBps. Added support for unique vendor command on 3580/3583 LTO tape device. Modification to run Ultra320 speeds using Linux kernel 2.6. Various performance enhancements.

030D003b	Enhanced SCSI signal path validation. Removed extended Target Mode delays. Removed erroneous AIX errors logged during drive microcode download. Added unique RAID array identifiers for Linux support. Removed erroneous SCSI bus reset error logged when a device reports an error condition. Corrected extended SCSI bus reset that may occur when running HACMP.
030D0031	Installing two 4-pack backplanes in a p615 may cause the second backplane (sesX) to boot in the defined state or not be seen. Microcode 0031 corrects this problem.
030D0020	GA level

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