

Information Technology Board Report

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April 18, 2006

Highlights:

- Software Development Life Cycle processes finalized
- Data storage plan completed
- Unplanned outage review completed
- Finalized retail service availability targets & outage windows
- Proposing IT services to the Regional Entity

Application Services:

Software development lifecycle standards and procedures are finalized and being approved, kickoff to begin in May.

Significant time and resources were spent troubleshooting and researching the cause of the MID problem and also implementing capital projects.

Based on analysis of options and risks, the decision whether to replace all HP Tru 64 hardware was mitigated by having HP provide the same level of support for that environment until the beginning of 2009 at an estimated cost of 200k per year.

Infrastructure and Operations:

A data storage plan has been developed, key milestones include:

- Disk based backup for online recovery
 - Project 50027 has moved into the planning phase and is expected to move to execution by 4/3/06.
- Proper tiering of applications to storage requirements
- Move iTEST environment to Austin Data Center
 - Project 40070 requested funding approval for \$1,367,245. The board approved funding for the project minus 15%. Project has moved into the execution phase and hardware orders are placed.
- Replacement of Powderhorn Tape Library system with much smaller backup solution
- Space and Power reclamation where possible
 - Identified 181 Dell standalone systems in Taylor and 80 in Austin that are planned to be either retired or migrated to blades to reduce space and power requirements.

Unplanned Retail Outages:

The Retail transaction processing system reliability is 99.55% year to date through March. While February showed a reliability rate of 98.84%, March unplanned outage performance was above expectations at 100%. Below are degradations that impacted performance but did not cause an outage to the retail services.

- Paperfree: Wednesday, 3/15/2006 - (46 minute degradation)
 - PRWP014I lost connectivity to the SAN
 - A control card failed on DIR 4
 - Customized alerts detected the issue
 - Ran on 4 of the 5 Paperfree WLM servers without issue
 - 11:15am to 12:01pm
- Report Explorer/MID: Saturday, 3/25/2006 – MID implementation to production (Degradation 9pm to present)
 - Connections between API and TIBCO MID are hanging
 - Search against API returned all reports; fix caused a bigger problem resulting in no reports returned
 - API connection issue initially caused disconnects and intermittent unavailability of FIND ESIID and FIND Transaction functionality
 - Separated connectors between TomCat and IIS to prevent API issues from causing intermittent failures to other TML functionality
 - Problem caused by a bug in Java software, an upgrade to the version of Java in production has fixed the problem.

Unplanned EMMS Outages:

- SCADA restart with set-points in flat line: Wednesday, 3/8/2006 - 124 minutes of frequency control (64 minutes flat-line and 60 minutes of degraded state in frequency control)
 - Root cause problem related to memory leak in the SMP front-end
 - Incident related to the one on 2/21 --SCADA restart incident
 - Received code patch from AREVA for the memory leak. Patch implemented in the production system on 3/13
- EMS unscheduled failover March 28 at 16:25. Lost 2 minutes of Frequency Control unavailability due to EMS Local failover

IT Account Management:

Retail transaction processing maintenance, release windows and service availability percentage targets have been negotiated with retail market participants and will be maintained in a service availability agreement document posted on the ERCOT.com website. The negotiation process is complete and the results and targets will be presented to RMS in April.

ERCOT Information Technology will be proposing service cost estimates to the Regional Entity as they prepare their budget for NERC filing in May. This process will begin with requirements gathering and end with a statement of work that can also be used by the organization to bid IT costs with external providers.

Critical upcoming tasks (next 30 days):

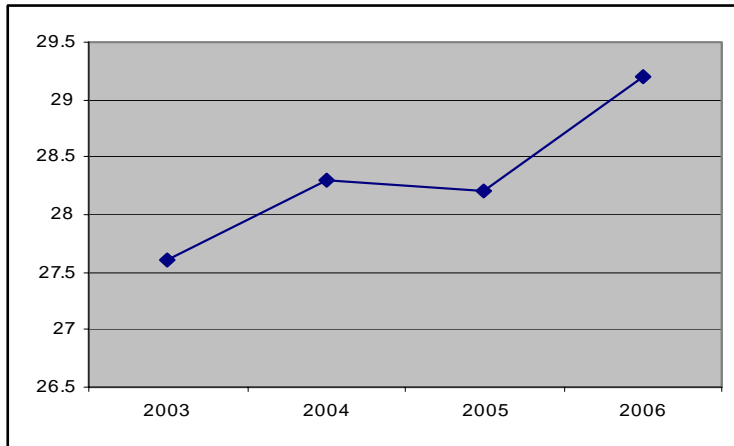
- Continue execution of the Data Center plan
- Execution of SDLC initial phase
- Execution of the Storage Plan

Service metrics:

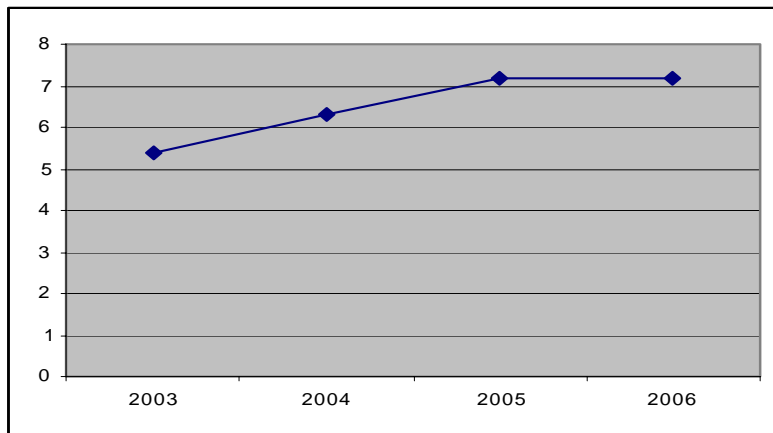
A series of charts showing service metrics are included in the Board materials. Retail transaction processing systems were available 100% during March and year-to-date availability is 99.55%.

General comments:

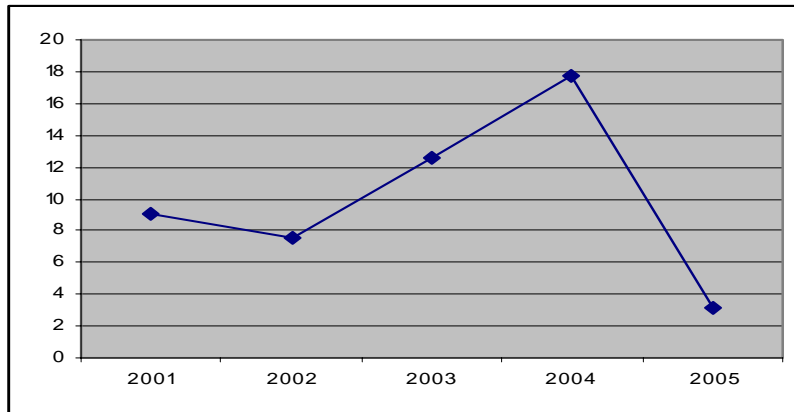
A question was asked at the March Board meeting regarding historical spending trends for hardware and software. Following are for graphs attempting to reply to that question.



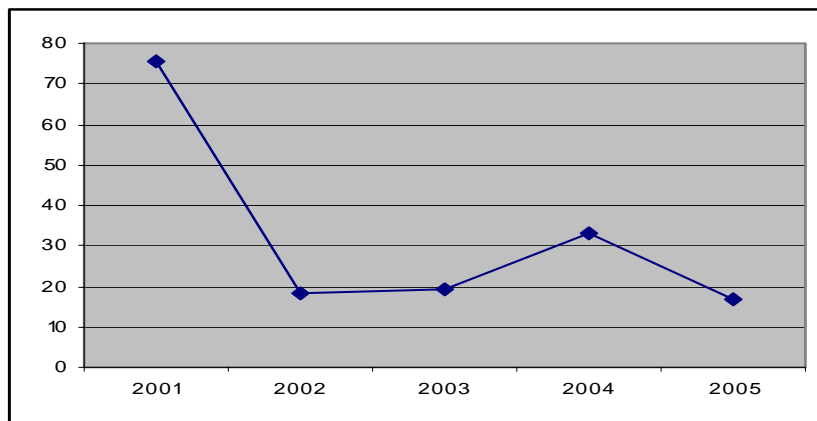
1. Total O&M spend for IT from 2003-2006. Spending for 2006 is budgeted while previous years are actual. Please note that total expense increase from 2005 to 2006 is 3.42%.



2. Total hardware and software expense 2003-2006. Spending for 2006 is budgeted while previous years are actual.



3. Capital hardware expense 2001-2005. Capital for 2006 was not available.



4: Capital software expense 2001-2005.