FOLLOW-UP OF RISK ASSESSMENT FOR CAPS PAYROLL APPLICATION

AS OF MAY 4, 2004

REPORT DATE: SEPTEMBER 20, 2004

Audit Number 2422 for 2247

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INTERNAL AUDIT DEPARTMENT

COUNTY OF ORANGE

FOLLOW-UP OF RISK ASSESSMENT FOR CAPS PAYROLL APPLICATION

AS OF MAY 4, 2004

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COUNTY OF ORANGE
INTERNAL AUDIT DEPARTMENT

OFFICE OF THE DIRECTOR

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TRANSMITTAL LETTER

Audit No. 2422

September 20, 2004

TO: David E. Sundstrom, Auditor-Controller
Daniel Hatton, Deputy CEO/Chief Information Officer
Marcel Turner, Director, Human Resources

FROM: Peter Hughes, Ph.D., CPA, Director
Internal Audit Department

SUBJECT: Follow-Up of Risk Assessment for CAPS Payroll Application, Audit No. 2422 for 2247

We have completed our review of the Follow-Up of Risk Assessment for CAPS Payroll Application, Audit No. 2422 for 2247, as of May 4, 2004. The final report is attached and includes your planned action responses. We appreciate the courtesy and cooperation of your staff during our review.

Attachment

Other recipients of this report:
- Members, Board of Supervisors
- Members, Audit Oversight Committee
- James D. Ruth, County Executive Officer
- Foreman, Grand Jury
- Darlene J. Bloom, Clerk of the Board of Supervisors
- John Nakane, Chief Assistant Auditor-Controller
- Jim McConnell, Assistant Auditor-Controller, Central Operations
- Mahesh Patel, Assistant Auditor-Controller, Information Technology
- Larry Chanda, Manager CAPS Administration, Auditor-Controller
- Jim Berch, Accounting Systems Manager, Auditor-Controller
- Ray Stephens, Payroll Systems Lead, Auditor-Controller
- Reza Khayyami, Chief Technology Officer, CEO/IT
- John Wheeler, Information Systems Manager, CEO/IT
- Patty Cahill, Corporate HR Services Manager, Human Resources
- Lawrence McCabe, Operations Manager, ACS
- Phil Paker, Financial and Human Resource Systems Manager, ACS

The Internal Audit Department is an independent audit function reporting directly to the Orange County Board of Supervisors.

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INTERNAL AUDITOR'S REPORT

Audit No. 2422

September 20, 2004

TO: David E. Sundstrom, Auditor-Controller
Daniel Hatton, Deputy CEO/Chief Information Officer
Marcel Turner, Director, Human Resources

We have completed a follow-up examination of the Risk Assessment for the CAPS Payroll Application. Our examination was limited to reviewing, as of May 4, 2004, actions taken to implement the recommendations made in our audit report dated March 27, 2003.

The original audit report contained thirteen recommendations, eleven of which required action and therefore were reviewed as part of this examination. Our follow-up examination indicated four recommendations have been fully implemented, four recommendations have been partially implemented, and three recommendations have not been implemented as they are dependent on the determination of the strategic direction for CAPS.

We believe the original report's recommendations are still appropriate and further efforts should be made to fully implement them.

The audit report recommendations that have not been fully implemented are noted below along with a comment on current status. The item number from the March 27, 2003 report is shown in parentheses after each heading.

We appreciate the cooperation and assistance extended to us by the staff of Auditor-Controller, CEO/IT, Human Resources Department, Resources & Development Management Department, and ACS. If we can be of further assistance, please contact me directly or Eli Littner, Deputy Director at (714) 834-5899 or Autumn McKinney, Audit Manager at (714) 834-6106.

Respectfully submitted,

Peter Hughes

Peter Hughes, Ph.D., CPA
Director, Internal Audit

Distribution: Pursuant to Audit Oversight Committee Procedure No. 1
Members, Board of Supervisors
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OBSERVATIONS, RECOMMENDATIONS AND MANAGEMENT RESPONSES

1. Application Recovery Plan for CAPS and CAPS Payroll (No. 1)

Recommendation: The County needs to enhance its application recovery plan and evaluate its risks from a significant CAPS outage. It should also be pointed out that the current application recovery plan addresses only the mainframe environment. Restoring communications, obtaining access to system documentation at the Civic Center facility, and agency/department records needed to process CAPS payroll also need to be addressed in a comprehensive recovery plan.

Current Status: **Partially Implemented.** In their response to the original audit, the Auditor-Controller, Chief Information Officer, and Director of Human Resources stated they evaluated having an identified backup data center or "hot site." However, they determined "the costs are too great and cannot be justified given the level of risk and the current budget situation." They also stated they would evaluate possible lower cost options, such as a backup site provided by a major outsourcer (ACS) or a partnership with other counties, to be completed by June 2004. As of May 4, 2004, we were informed that a sub-committee of the County IT Operations Council had been formed to work on this issue. However, because of scheduling conflicts, the sub-committee had not met yet. We were informed the head of the sub-committee has been working on this difficult issue, but no conclusion has been reached nor has an alternate back-up site arrangement for the data center been established. Therefore, this portion of the recommendation is still in process and is partially implemented.

Additionally, in their response to the original audit, the Auditor-Controller stated they developed a stand-alone plan (separate from a data center disaster recovery plan) for the generation of payroll checks should a disaster occur. They indicated the process would be developed and tested as part of the CAPS Upgrade project.

As of May 4, 2004, the Auditor-Controller is in the process of developing a recovery plan for the Claims and Disbursing Unit that includes payroll processing during a disaster. The written plan is in a draft stage and has not been completed. Therefore, this portion of the recommendation is still in process and is partially implemented. Once finished, the written plan should be approved by Auditor-Controller management, distributed to applicable Auditor-Controller employees and external departmental payroll representatives, and tested as necessary.

Auditor-Controller Planned Action:

Auditor-Controller concurs with the recommendation. We have successfully tested a standalone process for printing payroll checks using standard software such as Microsoft Access. This allows for the greatest flexibility in the event of a catastrophic disaster. We are now in the process of defining requirements regarding withholding and will incorporate the rules into the logic of the program. We expect to have the system along with the appropriate procedural documentation in place by the end of the March 2005.

CEO/IT Planned Action:

CEO/IT concurs with the recommendation and a Hot-Site Committee, made up of department/agency IT managers, was formed and met in May 2004. Two hot-site proposals were discussed, one from ACS and one from IBM. It was decided that a third proposal would be solicited as a due diligence initiative and one was obtained from Sungard. Currently, the three proposals are still being studied and we are in the process of normalizing the proposals from a hardware and software perspective to allow an "apples-to-apples" comparison of the proposals. A decision on this issue should be made by November 1, 2004.

2. Functional Analyst Access to Production Dataset (No. 3)

Recommendation: We recommend that access privileges to production datasets be evaluated to determine if access is appropriate for functional analysts. We anticipate that the CAPS Upgrade will help to address this issue because it is table-driven by design allowing tables to be updated through application processes rather than system access.

Current Status: **Partially Implemented.** Based on our review, the Auditor-Controller did evaluate the appropriate level of access for the functional analysts. However, we noted one of the eleven functional analysts identified in the original report continued to have update access to a production dataset when it was determined such access was not required. Additionally, we noted two obsolete datasets that should be deleted.

Auditor-Controller Planned Action:

Auditor-Controller concurs with the recommendation. The Planning and Development Services/Fiscal and Program Services Division analyst referred to above was originally given update access to her department's production timesheet file, as part of PDSD's VTI implementation, to provide backup support to the department's single payroll clerk. These privileges were removed on August 5, 2004, after we found that RDMD payroll staff now provides this backup support.

The two obsolete dataset profiles referred to separately above were deleted on May 19, 2004.

3. Premium Pay Input Decentralized and Prone to Error (No. 5)

Recommendation: Since premium pay has a contractual basis, we would recommend that Human Resources conduct a study of all premium pay to ensure conformance with the MOU.

Current Status: **Partially Implemented.** In their response to the original audit, the Human Resources Department stated that in Fall 2002, they began to audit premium pay. Based on our review, only bilingual premium pay is currently being validated by Human Resources. Other forms of premium pay (e.g., jail, confidential, etc.) are not being reviewed. Additionally, we observed the worksheet supporting their validation work for bilingual premium pay did not indicate who prepared or reviewed the worksheet, responsibility for updating it was not assigned, and reports used for the validation were not retained. A written procedure for this task should be developed and then approved by management.

Human Resources Department Planned Action:

Human Resources concurs with the recommendation and has developed the following process to add premium pays, other than bilingual, to our audit process:

- Research MOU's and create a list of all premium pays and the amounts.
- Generate a report of all employees who are receiving any kind of premium pay.
- Verify that these employees are receiving the correct amount based on the MOU language.
- After establishing that all employees currently being paid a premium pay are being paid correctly, a report of all employees who begin receiving a premium pay will be generated every pay period.
- The amounts of the new premium pays will be verified against the MOU language, departments will be notified and corrections made, if necessary.
- A written procedure and retention schedule for reports will be developed documenting this process.

We expect to have to have our process and associated documentation in place by November 30, 2004.

4. Recommendations Dependent on the Progression of the CAPS Replacement Project

There are three recommendations made in the original report that have not been implemented and are dependent on the determination of the strategic direction for CAPS:

- We recommended that security monitoring be a defined task within the CAPS Upgrade project (No. 4).
- We recommended that the CAPS Upgrade project consider premium pay and the opportunity to improve control and streamline workflow for establishing or changing an employee's status (No. 5).
- We believe there are opportunities for creating additional efficiencies within the application security group by evaluating the need for so many user profiles. We recognize this is a not a trivial task and suggest it be accomplished during the CAPS Upgrade project rather than undertaken within the current environment (No. 9).

An assessment for determining the strategic direction for CAPS is underway. We will follow-up on the above recommendations at a future date, depending on the direction selected by the County for CAPS.