METROPOLITAN GOVERNMENT OF NASHVILLE AND DAVIDSON COUNTY

OFFICE OF INTERNAL AUDIT

FINAL REPORT

Audit of the Nashville Metropolitan Transit Authority Procure-to-Pay Process

Date Issued: August 10, 2012

The Metropolitan Nashville Office of Internal Audit is an independent audit agency reporting directly to the Metropolitan Nashville Audit Committee

EXECUTIVE SUMMARY
August 10, 2012

Results in Brief	Background and Recommendations
An audit of the Procurement-to-Pay process at the Nashville Metropolitan Transit Authority was conducted. Key audit objectives and conclusion were as follows: • *Were controls in place to properly manage the Procurement-to-Pay process?* **Generally yes**. Overall determination of the procurement to payment cycle was managed in an acceptable manner. However, suggested process improvements will further enhance the efficiency of the entire process. See Observations A and B. • *Were policies and procedures followed on all purchases, for both contracted and non-contracted purchases?* ***Generally no.*** Several issues with full compliance of stated policies and procedures were observed. See Observations A and D. • *Were vendor invoice payments complete, accurate, and reflective of actual transactions?* ***Generally yes***. However, additional process improvements can be initiated to help enhance assurance that vendor invoice payments are complete, accurate, and reflective of actual transactions. See Observation B.	**Purchasing Transactions** **FY 2010 and FY 20011** <table><tr><th></th><th>Transactions Processed</th><th>Value of Transactions</th></tr><tr><td>Purchase Orders</td><td>14,477</td><td>$76.1 million</td></tr><tr><td>Payment Vouchers</td><td>18,033</td><td>$60.8 million</td></tr></table> Key recommendations of this report specify that the management of the Nashville Metropolitan Transit Authority should: • Initiate measures to ensure that proper approval of purchases and invoice payments are followed. • Institute emergency purchasing procedures that provide adequate documentation when there is a need to expedite the purchase of parts or services. • Provide a conclusive definition of the term "significant purchase" to remove any ambiguity and avoid subjective interpretation of Nashville Metropolitan Transit Authority policies.

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INTRODUCTION

Audit Initiation The audit of Nashville Metropolitan Transit Authority (hereinafter "MTA") was part of the work plan approved by the Metropolitan Nashville Audit Committee. The audit was initiated partly based on the length of time since the last audit and partly based on the amount of monetary transfers they receive from the Metropolitan Nashville Government.
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Background The MTA was created in 1973 with the passage of Article 64 of the Metropolitan Charter. The MTA is overseen by a five member Board of Directors. The Chief Executive Officer of MTA reports directly to the Board of Directors and is charged with the managerial duties of the entire transit system. The Chief Executive Officer position is the only Metropolitan Government held position at MTA; all other employees are employed by the Davidson Transit Organization.

The MTA operation provides transportation services to the citizens of Nashville and Davidson County. Other related entities associated with the MTA are the Davidson Transit Organization and the Federal Transit Authority. The Federal Transit Authority provides regulatory oversight, policy and procedural guidance, as well as federal funding for the MTA.

MTA Procurement-to-Pay Process Functions ***Procurement Department*** – The Procurement Department was established in May 2010 following the historic Nashville Flood. This Department is tasked with assisting the other MTA departments in securing purchases for daily business operations. Prior to the creation of a centralized purchasing function, procurement was performed as necessary by various parties.

The Procurement Department is managed by the General Manager of Administration. The task of the Department is to provide order processing, transaction documentation and receipt and storage of goods. The Procurement Department interfaces with the Finance Department to complete the purchasing and payment cycle. Purchases range from office supplies to commercial buses, with dollar values ranging from tens of dollars to millions of dollars.

The Ron Turley Associates software is the computer system used by the Procurement Department to manage purchasing transactions. Policies and procedures have been developed to ensure the correct procurement process is followed based on the dollar value of the good or service.

This Department processed 14,477 purchase orders totaling $76.1 million for fiscal years 2010 and 2011.

Finance Department – The Finance Department includes both Accounting and Customer Information functions and is managed by the Chief Financial Officer. The Accounting function provides payment

services which were examined in this audit.

The Accounting function is ultimately managed by the Chief Financial Officer; however, day to day operations are handled by the Controller. Invoice payments for Procurement Department purchases are processed using the Sage ACCPAC accounting system. Payment documentation is forwarded to the Accounting function from the Procurement Department to complete the process. A two-way or three-way match is carried out by processing staff before authorization is verified and payment is made.

The Finance Department processed 18,033 payments totaling $60.8 million for fiscal years 2010 and 2011.

The table below shows the ten largest vendors that the MTA utilizes to perform the services they provide to the citizens of Nashville and Davidson County.

Exhibit A - Top Ten Vendors/Contractors of the Metropolitan Transit Authority for Fiscal Years 2010 and 2011

Vendor or Contractor	Amounts	Purpose
NABI, Inc.	$12,719,127	Buses/Parts
Gillig Corporation	10,697,044	Buses/Parts
Key Oil	3,839,806	Fuel
Bus Group	3,529,055	Para transit vans
Nashville Cab	3,045,256	Para transit contract
Mansfield Oil Company	2,964,348	Fuel
Diamond Detective Agency	1,374,015	Security
RLI Transportation	1,262,128	Supply Insurance
ACS Transport Solutions	1,121,534	GPS/Radio System
Nashville Electric Service	956,114	Utility

Source: MTA Check Register

Financial Highlights

Exhibit B below highlights the MTA's financial activity for the past two years.

Exhibit B – Revenues and Expenditures for Fiscal Years 2010 and 2011

Account	2010	2011
Total Expenditures & Transfers	$50,312,169	$87,393,676
Total Revenues	45,800,630	$49,712,968

Source: Metro Nashville's EnterpriseOne Financial System and MTA Sage ACCPAC System

Organizational Structure

The organizational charts below depict both the MTA Purchasing Department and Finance Department.

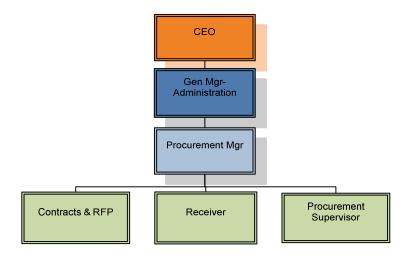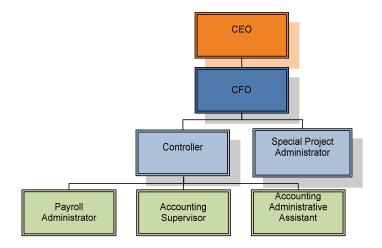**Exhibit C – Metropolitan Transit Authority Purchasing Department**

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                    CEO
                     |
              Gen Mgr-
              Administration
                     |
              Procurement Mgr
                     |
        ┌────────────┼────────────┐
   Contracts & RFP  Receiver   Procurement
                                Supervisor
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Exhibit D – Metropolitan Transit Authority Finance Department

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                    CEO
                     |
                    CFO
                     |
        ┌────────────┴──────────────┐
     Controller              Special Project
                             Administrator
        ┌──────────┬──────────────┐
   Payroll      Accounting     Accounting
   Administrator Supervisor    Administrative
                               Assistant
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OBJECTIVES AND CONCLUSIONS

1. *Were controls and procedures in place to properly manage the Procurement-to-Pay process?*

Generally yes. Results of the audit work performed have determined that the Procurement-to-Payment process was managed in a generally acceptable manner. However, improvements in documentation and improved communication interface between the Procurement and Accounting activities will help to enhance the overall efficiency of the process (see Observation A).

2. *Were MTA procurement policies and procedures followed on all purchases, for both contracted and non-contracted purchases?*

Generally no. Tests indicated several compliance issues for purchases of contracted and non-contracted purchases. Items of issue included (see Observation A):

- Purchase requests not approved at the appropriate level.
- Documentation was not always available in purchase order-invoice process.
- Invoice approval was missing on several sample items.
- Discrepancies in purchase order and invoice matching on some sample items.
- Purchase orders were generated after the invoice was paid.

To determine whether the procurement policies and procedures were being carried out, the MTA's Procurement Policy Manual was reviewed and current operational workflows pertaining to procurement activities was studied. Finally, a vendor transaction list that contained 14,477 records covering the audit period was obtained. A sample of 85 records were extracted and tested for 11 different attributes. The results of the tests can be seen in Exhibit E.

Exhibit E – Control Compliance Audit Test Results

Control Description	Percentage
Valid purchase order?	100.0
Packing slip quantities and prices agree with file?	98.1
Payments classified to appropriate object account?	97.6
Purchase order quantities and prices agree with file?	97.6
Packing slip signed?	94.5
Do invoice quantities and prices agree with the purchase order?	88.2
Request for procurement/Information checklist completed?	85.7
Purchase requisition signed at appropriate level?	81.9
Was payment approval indicated on the invoice?	63.5
Sufficient quotes?	62.5
Purchase order was created before the invoice date?	54.2

Source: Office of Internal Audit Attribute Testing

Procurement policies and procedures were not consistently carried out in accordance with existing procurement policies; operational areas that can ultimately be improved.

The Metropolitan Nashville Office of Internal Audit understands that the Procurement-to-Pay process is occasionally circumvented to meet the pressing need of keeping transportation equipment operational. In cases such as those, the procurement should follow procedures outlined for emergency purchases; otherwise, it is best to follow stated policies and procedures (see Observation A).

3. *Were MTA policies and procedures up to date with Federal Transit Authority requirements and in line with industry practices?*

Yes. The Federal Transit Authority provides requirements and guidelines which MTA follows and was reflected in their policies and procedures. Copies were obtained of the Federal Transit Authority and MTA documents related to procurement policies and procedures. The Federal Transit Authority's manual was compared to MTA's procurement manual and no material variances were found, on significant and relevant sections, between the two. No other issues arose or were observed.

4. *Were vendor invoice payments complete, accurate, and reflective of actual transactions?*

Generally yes. To provide assurance that vendor payment were complete, accurate and reflective of actual transactions five distinct tests on MTA's check register file were conducted. The file consisted of 18,033 records, and the evaluation comprised of five evaluative parameters, namely:

- Checking for duplicate invoices.

- Evaluating multiple entries from the same vendor.

- Analysis of late payments and discounts.

- Performing a Benford Analysis.

- Evaluating unexplained payee names.

Payments for duplicate invoices were not observed, MTA's invoice amounts were aligned with the Benford's law of expected leading digits distribution frequency, and no unexplained payee names were observed. However, vendor payments were not consistently paid within payment terms and early payment discounts were missed (see Observation A).

Also, the accounting system and the procurement system contained multiple vendor entries for the same vendor. The main issue at hand was the disparate maintenance of each vendor file. Management of MTA stated that the cause of the discrepancies originated from the fact that the systems had been established at different times and in different departments (see Observation B).

5. Were security roles properly setup to provide segregation of incompatible duties in the procurement and payment process?

Generally yes. Security privileges were reviewed for the Ron Turley Associates and Sage ACCPAC computer systems. Mostly, appropriate segregation of duties existed between the two systems. However, it was noted that the temporary Accounts Payable Manager was utilizing the user account of the recently retired Accounts Payable Manager to gain access to the Sage ACCPAC system (see Observation C). The following roles and personnel were being used.

- Create an order/requisition – Requestor

- Approve an order/requisition – Department Head or Backup

- Enter an order/requisition – Purchasing Supervisor or Backup

- Receive goods/services – Requestor

- Enter invoice – Accounting Clerk

- Approve Invoice (if applicable) – MTA management based on dollar amount

- Approve payment voucher – MTA management based on dollar amount

- Maintain (create, update, delete) vendor/supplier master list – Purchasing Supervisor (Ron Turley Associates), Accounting Manager (Sage ACCPAC)

For the Ron Turley Associates system, the General Manager of Administration was the role administrator, for the Sage ACCPAC system, the Controller was the role administrator; no other issues were noted.

OBSERVATIONS AND RECOMMENDATIONS

A – Procurement-to-Payment Cycle Enhancements

In reviewing the overall procurement–to-payment cycle, there were several observations that require management's attention; correcting which could help improve the entity's control structure and positively impact operations. The observations noted are as follows:

Invoice payment preceded purchase orders
In reviewing sampled transactions, 46 percent of the purchase orders reviewed were issued after the invoice was paid. In this case the invoice was the main document which initiated the transaction after an MTA staff member ordered a part or service. Purchase orders and the corresponding approval cycle were generated and initiated after the vendor invoice was presented.

Purchase requests are not signed at the appropriate level
A review showed that on 15 of 85 sampled items, requiring signatures were missing on purchase requisitions for all dollar amounts evaluated. MTA policy states that dual sign offs are required for purchases exceeding $100,000. In some transactions, only one signature could be discerned. When reviewing transactions for smaller amounts, several instances occurred where the departments head's signature was missing. Policy dictates a department head's review and sign off for purchases that are below $100,000.

Signoffs for packing slips are missing
Transactional review showed that required signatures were missing on the packing slips. This occurred in 28 of 85 invoices evaluated. Without the proper verification for receiving purchased merchandise, the MTA may not be receiving all the goods they ordered and eventually pay for.

Insufficient supporting documentation for emergency purchases
When reviewing details of purchases, 46 percent of the purchase orders reviewed were issued after the invoice was paid. The supporting data lacked adequate documentation to determine if these purchases were made because of an operational emergency.

Invoices are not paid by the due date and discounts were not taken
Data analysis conducted on 6,183 invoice listings indicated that 4,004 invoices were not paid on time per the invoice due date. Additionally, a review of the check register list indicated that only 11 of 208 invoices were paid prior to the expiration of the discount date.

Criteria:
- MTA Procurement Policies and Procedures
- Prudent business practice

Risk:

- The potential for fraudulent or unauthorized purchases are increased when instituted control procedures for purchasing are not followed.

- Invoices from unapproved purchase orders may be paid.

- Late payments may likely violate Tennessee's Prompt Pay Act.

Recommendations:
Management of the Metropolitan Transit Authority should perform the following:

1. Ensure that proper approval of purchases is taking place before an item is ordered.

2. Utilize emergency purchasing procedures, including proper authorizations, to obtain parts/services expeditiously.

3. MTA should confirm that purchase orders and invoices are signed off by the appropriate approving authority.

4. Ensure the packing slip is matched to the invoice in the Accounting department.

5. Investigate the features of the Ron Turley Associates software to determine how to indicate whether a purchase order is an emergency transaction.

B – Accounting and Purchasing Systems Conflicting Vendor Files

Vendors included in the Sage ACCPAC accounting system were not in the Ron Turley Associates procurement system and vice versa. The disparate treatment of the vendor files could potentially affect the business flow for the purchasing and payments process.

Criteria:
Prudent business practices

Risk:

- Transactions to vendors may be incorrectly paid.

- Managing vendors may be confusing and difficult.

- Unauthorized vendors may be setup and used.

Recommendation:
Management of the Office of the Metropolitan Transit Authority should:

1. In the short term, match the vendor numbers in the two systems.

2. In the long term, combine the Sage ACCPAC and Ron Turley Associates vendor file into a unified table.

C – Former Employee Computer User ID Reused

The temporary Accounts Payable Manager was utilizing the user account of the recently retired Accounts Payable Manager to gain access to the Sage ACCPAC system. It is difficult to retain accountability for computer usage when unique User Ids are not assigned to users.

Criteria:
- Metro Security Policy Acceptance Use Policy, Part 3.1
- International Standards Organization 27002, Part 11
- Information security best practices

Risk:
Terminated employees may gain access to MTA systems due to an active credential. Additionally, temporary or substitute employees may gain access to files and data that is not authorized.

Recommendation:
Management of the Metropolitan Transit Authority should provide unique logon credentials for each required person to access the Sage ACCPAC software. Conversely, system access for employees no longer affiliated with the MTA should be deactivated or closed.

D – Improve "Significant Purchase" Definition

The Accounts Payable procedure was not definitive on approval process for maintenance related purchases. According to current practice, staff employees have the discretionary ability to decide if approval for a purchase should be submitted for approval. The wording in the MTA's manual states that, *"Nashville MTA has no definition of a significant purchase; however, employees generally seek approval for purchases which are non-routine or are of high dollar amounts (over $200 or $300)".*

Criteria:
- Nashville Metropolitan Transit Authority, Davidson Transit Organization, and Regional Transportation Authority, Accounts Payable Process and Procedures
- Prudent business practices

Risk:
Purchases may not be adequately approved or fraud may occur if the employee does not decide to obtain approval.

Recommendation:
Management of the Office of the Metropolitan Transit Authority should provide a conclusive definition of the term significant purchase to avoid subjective interpretation of policies.

GENERAL AUDIT INFORMATION

Statement of Compliance with GAGAS
We conducted this audit from November 2011 to April 2012 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our observations and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our observations and conclusions based on our audit objectives.

Scope and Methodology
The audit period focused primarily on the period July 1, 2009, through June 30, 2011. The methodology employed throughout this audit was one of objectively reviewing various forms of documentation including financial information, written policies and procedures, contracts and data in various forms.

The Davidson Transit Organization and Regional Transit Authority was excluded from the scope of this audit.

Criteria
In conducting this audit, the existing processes were compared with:

- Federal Transit Authority Circular 4220 1F
- Nashville Metropolitan Transit Authority Procurement Policy
- The Metropolitan Nashville Charter, Article 64, Transit Authority
- ISO 27002, Information technology—Security techniques—Code of practice for information security management
- Prudent Business Practices

Audit Project Staff
Joe McGinley, In-Charge Auditor
Roxanne Caruso, CIA, Staff Auditor
Mel Marcella, CPA, CMA, CIA, CISA, CFE, Project Quality Assurance

APPENDIX A - Procurement Purchasing Segments

DEFINED APPROVAL LEVELS			
Contract Threshold	**Procurement Levels**	**Required Approval Level**	**Notes**
Up to $3,000 (FTA)	Micro Purchases	Manager or Designee	With signed requisition form
Up to $5,000 (local funds)	Micro Purchases	Manager or Designee	With signed requisition form
$5,001 to $100,000	Small Purchases	Department Head/Directors	With signed requisition form and include three competitive quotes
Up to $100,000 not within current budget authorization (example: Emergency Procurement)		Senior Directors or General Managers and Chief Financial Officer	Can sign requisitions for purchases not included in current budget authorizations
$101,000 - $200,000	Competitively Procured must be formally advertised	Senior Directors or General Manager and Chief Financial Officer	Can sign and approve requisitions included in the current budget authorization
$200,001 - $300,000	Competitively Procured must be formally advertised	Chief Executive Officer	
$300,000 or greater	Competitively Procured must be formally advertised	Board of Directors	
Sole Source up to $25,000		General Managers and Senior Directors	Sole Source Justification must be pre-approved by the Procurement Manager
Sole Source up to $100,000		Chief Executive Officer	
Sole Source greater than $100,000		Board of Directors	

APPENDIX B. MANAGEMENT RESPONSES

- Management's Responses Starts on Next Page -

August 3, 2012

Office of Internal Audit
Mr. Mark Swann, Metropolitan Auditor
222 3rd Avenue North, Suite 401
Nashville, TN 37201

Mr. Swann,

Re: MTA's Response to the Audit of the Nashville Metropolitan Transit Authority Procure-to Pay Process Corrective Action Report.

The Metropolitan Government of Nashville and Davidson County Office of Internal Audit completed the Procure-to-Pay Process in June 2012.

The letter acknowledges that Nashville MTA received the Procure-to Pay Process report and has reviewed the audit comments and recommendations.

It is important to acknowledge that the two fiscal years examined were the very years impacted by the historic Flood of 2010, and the revised Procurement Policy.

We respectfully submit the corrective action response plan and schedule for the Procure-to-Pay Process. Enclosed is a copy of the Procure-to-Pay corrective action response report.

If you have any questions, please contact Mr. Robert Baulsir of my staff at (615) 862-6178. Thank you.

Sincerely,

Paul J. Ballard
CEO

Enclosure

cc: Robert Baulsir, General Manager of Administration
    Edward Oliphant, CFO
    Greta Beard, Procurement Manager
    file

Metropolitan Transit Authority
Management Response to Audit Recommendations – August 2012

Report Item and Description	Response to Recommendation / Action Plan	Assigned Responsibility	Estimated Completion
A. Management of the Metropolitan Transit Authority should perform the following: 1. Ensure that proper approval of purchases is taking place before an item is ordered.	**Accept** - Effective immediately staff will adhere to the approval guidelines in accordance to the 2012 Board approved procurement policy.	Procurement Department	December 2012
2. Utilize emergency purchasing procedures, including proper authorizations, to obtain parts/services expeditiously.	**Accept** - Effective immediately staff will adhere to the Emergency Procurement guidelines in accordance to the 2012 Board approved procurement policy.	Procurement Department	December 2012
3. MTA should confirm that purchase orders and invoices are signed off by the appropriate approving authority.	**Accept** - Purchase Orders approval will adhere to the guidelines in accordance to the 2012 Board approved procurement policy.	Procurement Department and Accounting Department	December 2012
4. Ensure the packing slip is matched to the Purchase Order in the Accounting department.	**Partially Accept** - Some items are purchased in Kits form. Kits can contain twenty or more parts. Issuing a Purchase Order as a kit instead of twenty line items is a time management tool.	Procurement Department and Accounting Department	December 2012
5. Investigate the features of the Ron Turley Associates software to determine how to indicate whether a purchase order is an emergency transaction.	**Accept** - We experienced a Flood in 2010 and staff member had to react due to unusual circumstance. Staff will adhere to the guidelines in accordance to the 2012 Board approved procurement policy	Management of the MTA	December 2012
B. Management of the Office of the Metropolitan Transit Authority should: 1. In the short term, match the vendor numbers in the two systems.	**Accept** - The obsolete vendors located in the Sage ACCPAC system will be purged	Management of the MTA	December 2012
2. In the long term, combine the Sage ACCPAC and Ron Turley Associates vendor file into a unified table.	**Accept** - Going forward the two systems will be matched for new vendors and will ultimately be merged when the two systems are interfaced.	Accounting and Procurement Departments	
C. Management of the Metropolitan Transit Authority should provide unique logon credentials for each required person to access the Sage ACCPAC software.	**Accep**t - Effective immediately MTA management will provide unique logon credentials for each required person to access the Sage ACCPAC	MTA Management	December 2012

Report Item and Description	Response to Recommendation / Action Plan	Assigned Responsibility	Estimated Completion
Conversely, system access for employees no longer affiliated with the MTA should be deactivated or closed.	software.		
D. Management of the Office of the Metropolitan Transit Authority should provide a conclusive definition of the term significant purchase to avoid subjective interpretation of policies.	**Accept** - We are currently working on additional purchasing policy issues related to new Federal Transit Administration procurement regulations. We will incorporate a definitions for significant purchases into these amendments	MTA Management	December 2012