



**A Report to the
Audit Committee**

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Audit of Metro Nashville Water Services Cash Collections

December 22, 2014

Metropolitan
Nashville
Office of
Internal Audit

EXECUTIVE SUMMARY

December 22, 2014



Why We Did This Audit

The audit was initiated due to the high volume and associated risks of cash collections at Metro Nashville Water Services.

What We Recommend

- Policies and procedures for cash collection processes and cost recovery processes should be documented and enforced.
- Accounts receivable and cost recoveries should be tracked and monitored.
- Depositing and recording of funds should be accomplished in accordance with Treasury Policy #9.
- Computer systems should be monitored and maintained on a regular basis by both internal and external parties.

For more information on this or any of our reports, email Mark.Swann@nashville.gov

AUDIT OF METRO NASHVILLE WATER SERVICES CASH COLLECTIONS

BACKGROUND

The mission of Metro Nashville Water Services is to provide drinking water, wastewater treatment, and stormwater management services to Davidson County and the nearby area. Metro Nashville Water Services has cash collections from both revenue streams and cost recoveries, making strong controls around management of cash and cash equivalents essential.

OBJECTIVES AND SCOPE

The objectives of the Metro Nashville Water Services cash collections audit were to:

- Determine if all inflows were deposited and recorded in the accounting system.
- Determine if controls and procedures were in place to ensure Metro Nashville Water Services received all cost recoveries and revenues due Metro Nashville.
- Determine if controls existed to ensure all receivables were recognized and protected from alteration.
- Determine if previous Office of Internal Audit recommendations were implemented by management.

The audit scope included all cash collections between June 1, 2012, and May 31, 2014. Testing did not cover cash collections within the Stormwater division of Metro Nashville Water Services.

<i>Metro Nashville Water Services (Excluding Stormwater)</i>	Fiscal Year 2013 (Actuals)	Fiscal Year 2014 (Actuals)
Revenues (excluding transfers)		
<i>47335 W&S Ext & Replace Revenue</i>	\$ 6,647,496	\$ 10,449,014
<i>67311 W&S Revenues</i>	209,475,452	213,295,422
Total Revenues	\$216,122,948	\$223,744,436
Cost Recoveries	\$1,100,027	\$1,376,003

Source: Metro Nashville's EnterpriseOne financial system

WHAT WE FOUND

We found that Metro Nashville Water Services had strong controls around cash collections for most areas reviewed. However, areas for improvement exist for documentation, policies and procedures, timeliness of depositing and recording funds, tracking of receivables, segregation of duties, and maintenance and monitoring of information technology systems.

GOVERNANCE

Metro Nashville Water Services is led by the Director of the Water Services Department. Within Metro Nashville Water Services there are seven divisions: Accounting, Human Resources, Customer Service, Engineering, Operations, Stormwater, and System Services. Cash collections are received in three of these divisions: Customer Service, Accounting, and Engineering. However, cost recoveries and revenues can be generated from all areas.

OBJECTIVES AND CONCLUSIONS

1. *Were all cash inflows deposited and entered into the accounting system?*

Yes. Metro Nashville Water Services deposited and recorded all sample selections reviewed. However, the timing of these procedures did not always comply with the Treasury Department's policy. Additionally, there were opportunities for improvement around policies and procedures for cash deposits and recording. Segregation of duties could also be enhanced (see Observations A and B).

2. *Were controls and systems in place to ensure that Metro Nashville Water Services received all cost recoveries and revenues due Metro Nashville?*

Generally yes. Metro Nashville Water Services has sufficient physical controls around the majority of cash received. The Development Services area lacks formal policies and procedures for tracking fees payable to Metro Nashville Water Services. Tracking of cost recoveries and other revenue receivables require enhancement (see Observations C, D, E, and F).

3. *Did controls exist to ensure all receivables were recognized and protected from alteration?*

Yes. Metro Nashville Water Services has an established system in place for recognizing and protecting water and sewer receivables. To enhance the current controls in place, Metro Nashville Water Services could increase areas of monitoring and compliance (see Observation G).

4. *Were previous Office of Internal Audit recommendations implemented by Metro Nashville Water Services?*

Yes. A review of changes made after the last audit indicate that all accepted recommendations were implemented. Implemented recommendations were also functioning as intended.

AUDIT OBSERVATIONS

Internal control helps entities achieve important objectives and sustain and improve performance. The Committee of Sponsoring Organizations of the Treadway Commission, *Internal Control – Integrated Framework (2013 Framework)*, (“*COSO*”), enables organizations to effectively and efficiently develop systems of internal control that adapt to changing business and operating environment, mitigate risks to acceptable levels, and support sound decision making and governance of the organization. The audit observations listed are offered to assist management in fulfilling their internal control responsibilities.

Observation A – Segregation of Duties

Some cash handling duties were not effectively segregated. Segregation of duties includes separating the authorization, custody, and recording of assets. The following observations were made during testing:

- Of tested cash collections within Metro Nashville Water Services, 58 of 100 deposits (58 percent) had the same deposit slip preparer and cash receipt recorder (indicating both custody and recording functions).
- In 24 of 47 Customer Service Center cash collection selections (51 percent), the iNovah batch owner opened and closed the batch without additional review. Batch processing capabilities include update privileges by the batch owner.
- Deposit slips prepared within Metro Nashville Water Services Accounting were not compared to the check log to ensure completeness.
- Scrap metal receipts are not reviewed or documented by an informed party prior to the sale of items or after the sale of items. Employees delivering scrap metal to the appropriate vendor were charged with delivering checks (by hand or via Metro Mail) to Metro Nashville Water Services Accounting without oversight.

Criteria:

COSO, Control Activities – Principle 10

Recommendations for management of Metro Nashville Water Services:

- 1) Determine designated roles and responsibilities for employees to ensure that depositing and recording of funds is segregated.
- 2) Ensure that all iNovah batches are opened and closed by different individuals.
- 3) Implement a review process within the Accounting area whereby the deposit slips are compared to the manual check log.
- 4) Implement formal policies and procedures around scrap metal sales which include oversight by knowledgeable supervisors, elimination of hand delivery of checks, prior notification of incoming funds, and verification of scrap amounts sold.

Observation B – Treasury Policy Compliance

Deposits and their recording in the accounting system were not made timely in accordance with Metro Nashville Finance Department policies. Note: all cash collections sampled were found to have been deposited and recorded.

- Of the 277 applicable cash collection selections, 62 deposits (22 percent) were made more than one business day after receipt of funds. Timing of late deposits ranged from 2 days to 10 days after receipt.
- Of the 277 applicable cash collection selections, 160 deposits (58 percent) were recorded in the EnterpriseOne system more than two business days after deposit of funds. Timing of late recording ranged from 3 days to 25 days after deposit.

Criteria:

- COSO, Control Activities – Principle 12
- Metro Nashville Government, Finance Department Policy – Treasury Policy #9

Recommendation for management of Metro Nashville Water Services:

Ensure all remittances are deposited within one business day and recorded in the EnterpriseOne accounting system within two business days.

Observation C – Permitting Area Documentation

Submitted KIVA reports from Permitting to the Customer Service Center contained only payments received and did not include transfer slips, developer’s equity, or cancellations. The reports also did not contain the time of day the report was run to ensure close of business reporting. Additionally, reports were not submitted if there were no funds collected for the day, making future research and assurance more difficult.

Criteria:

COSO, Control Activities – Principle 13

Recommendations for management of Metro Nashville Water Services:

- 1) Adjust the KIVA report to include pertinent information about all transactions made throughout the day. The reviewer of the report should ensure the report includes all transactions including those transactions where no money changes hands.
- 2) Ensure the KIVA report is included with supporting documentation every day so that the reviewer may determine if collections were omitted.

Observation D – Engineering Cash Handling Policies and Procedures

The Engineering area lacked formal policies and procedures around most cash collection functions resulting in ad-hoc processes. Specifically, mail opening procedures, check logging procedures, deposit procedures, receivables tracking procedures, and review procedures were not in place. Engineering was responsible for inspection fees, availability study fees, and plan review fees. All selections reviewed were appropriately recorded; however, with no formal tracking procedures, completeness of the collections could not be determined.

Criteria:

COSO, Control Activities – Principle 12

Recommendation for management of Metro Nashville Water Services:

Establish and document formal procedures for cash handling in the Development Services area to ensure proper tracking and recording of cash payments.

Observation E – Accounts Receivable and Cost Recovery Tracking and Monitoring

Tracking and monitoring of various smaller revenue streams require enhancement. While Metro Nashville Water Services has a robust system for tracking and monitoring water, sewer, and stormwater billing receivables, the same control level doesn't exist for smaller revenue streams.

- Biosolid receivables were not actively monitored. Three invoices were paid between two and twelve months after delivery and invoice issuance.
- Cell phone tower rent payments were not being recorded as receivables or monitored to ensure receipt.
- Third party cost recovery claims were not being tracked or monitored by Metro Nashville Water Services. Additionally, no formal procedures were in place to ensure proper communication to appropriate parties. The completeness of third party cost recoveries could not be determined due to a lack of centralized tracking.
- Cost recovery claims were not sent to the Department of Law in three of six cost recovery sample selections (50 percent). Supporting documentation was not maintained for five of the six selections made (83 percent).

Criteria:

COSO, Control Activities – Principle 12, Information and Communication – Principle 13

Recommendations for management of Metro Nashville Water Services:

- 1) Establish receivable accounts for cell tower rent payments and other known revenues.
- 2) Implement monitoring procedures for all receivables to ensure prompt receipt of payments.
- 3) Establish formal policies and procedures for documenting and reporting third party claims and recoveries to the appropriate party.
- 4) Create a central repository for all recoveries from third parties that is actively monitored.

Observation F – Safeguarding of Assets

Control weaknesses were noted in some areas surrounding cash and cash equivalents received:

- The Customer Service Center night drop box key was kept in the lock of the cabinet where an employee could empty the box at any time.
- The safe in the Metro Nashville Water Services Accounting area was left unlocked. At the time, the safe contained the petty cash box and prepaid phone cards.
- One-Stop-Shop employees were required to drop all payments into a central safe throughout the day; thus, comingling payments from multiple employees before verifying drawer collection amounts.
- Third parties (other counties sewerage services, cell phone rents, etc.) addressed payments to various individuals within Metro Nashville Water Services.

Criteria:

COSO, Control Activities – Principle 10

Recommendations for management of Metro Nashville Water Services:

1. Establish procedures for the timing and responsibility of emptying the night drop box.
2. Ensure all safes are locked at all times.
3. Implement controls to keep One-Stop-Shop payments segregated and secured.
4. Require all non-Development Services payments be mailed to the Customer Service Center. The Customer Service Center should record all payments into iNovah and alert other areas of the receipts.

Observation G – Technology Monitoring and Maintenance

Controls surrounding the two primary billing, receivable, and cash handling systems, enQuesta and iNovah, require enhancement. While both systems are working as intended, some control weaknesses were present.

- The contracted vendor to maintain the enQuesta system, System & Software, Inc. did not perform systematic updates or patches as specified in the contract. At the time of the audit, multiple information security vulnerabilities existed when an enQuesta database health check was performed.
- Metro Nashville Water Services does not have procedures established for Metro Nashville Information Technology Services information security policies. These policies include, but are not limited to, information classification, information labeling and handling, risk assessment and treatment, and information technology contingency/disaster recovery planning.
- Metro Nashville Water Services does not have documented business purposes for all user groups and permissions for both enQuesta and iNovah.
- Of the 257 user accounts within enQuesta, 22 accounts (9 percent) were generic accounts, and 47 accounts (18 percent) were for terminated employees, vendors, or contractors.
- According to Metro Nashville Water Services Billing, 17 employees were authorized to make changes to water consumption in enQuesta; however, from January 1, 2012, through May 31, 2014, 70 user accounts had performed consumption changes, including 12 authorized accounts and 58 accounts not on the authorization list.

Criteria:

COSO, Control Activities – Principle 11, Monitoring Activities – Principle 16

Recommendation for management of Metro Nashville Water Services:

- 1) Establish an internal monitoring system and remediation program to ensure that the vendor is maintaining enQuesta in accordance with the service agreement. Monitoring methods should include both random and systematic spot checks of the items listed in the agreement, and results of the reviews should be documented.
- 2) Establish formal departmental procedures for Metro Nashville Government Information Security policies.
- 3) Review and document business needs for all users in enQuesta and iNovah before establishing user groups and assigning appropriate permissions to each group.

- 4) Establish procedures to promptly remove access from terminated employees and to periodically review activities of system administrators. Reviews should be documented.

GOVERNMENT AUDITING STANDARDS COMPLIANCE

We conducted this performance audit 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 findings 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.

METHODOLOGY

To accomplish our audit objectives, we performed the following steps:

- Interviewed key personnel within various departments.
- Reviewed and analyzed documentation for compliance with the Tennessee Code Annotated, Metropolitan Nashville Code of Laws, and other applicable laws, regulations, and policies.
- Evaluated internal controls currently in place.
- Reviewed sample selections to determine the effectiveness of internal controls.
- Reviewed financial related transaction files using audit analytic software.
- Considered risk of fraud, waste, and abuse.
- Considered information technology risks.

AUDIT TEAM

Carlos L. Holt, CPA, CFF, CFE, CIA, CGAP, Audit Manager

Lauren Riley, CPA, ACDA, Auditor-in-Charge

Qian Yuan, CISA, ACDA, Senior Auditor

KARL F. DEAN
MAYOR



METROPOLITAN GOVERNMENT OF NASHVILLE AND DAVIDSON COUNTY

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December 16, 2014

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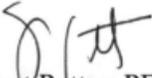
RE: Audit of Metro Water Services' Cash Collections

Dear Mr. Swann:

This letter acknowledges that Metro Water Services received the cash collections audit report and has reviewed the audit comments and recommendations. Metro Water Services implemented improvements prior to the completion of fieldwork by your staff and will continue to implement the agreed upon recommended process improvements as appropriate.

It was a pleasure working with you and your team on this project and we appreciate the opportunity to make improvements to our internal control environment.

Sincerely,


Scott Potter, PE
Director, Metro Water Services

APPENDIX A – MANAGEMENT RESPONSE AND CORRECTIVE ACTION PLAN

We believe that operational management is in a unique position to best understand their operations and may be able to identify more innovative and effective approaches and we encourage them to do so when providing their response to our recommendations.

Recommendations	Concurrence and Corrective Action Plan	Proposed Completion Date
Management of Metro Nashville Water Services should:		
A1. Determine designated roles and responsibilities for employees to ensure that depositing and recording of funds is segregated.	Partially Agree - MWS has designated roles which include segregation of duties. We have strengthened our current process to address the specific audit concerns.	Implemented during fieldwork; N/A
A2. Ensure that all iNovah batches are opened and closed by different individuals.	Agree – MWS will develop procedures to address the iNovah import batches.	February 2015
A3. Implement a review process within the Accounting area whereby the deposit slips are compared to the manual check log.	Agree - Process was amended prior to the completion of fieldwork that included an additional level of review comparing the deposits to the manual check log.	Implemented during fieldwork; N/A
A4. Implement formal policies and procedures around scrap metal sales which include oversight by knowledgeable supervisors, elimination of hand delivery of checks, prior notification of incoming funds, and verification of scrap amounts sold.	Agree - MWS will work on procedures that include supervisor knowledge and reporting. This will include eliminating the hand delivery of checks. We will attempt to have all payments made to MWS either by check or ACH.	December 2015
B. Ensure all remittances are deposited within one business day and recorded in the <i>EnterpriseOne</i> accounting system within two business days.	Agree - MWS will improve management involvement to improve deposit compliance with applicable rules and regulations.	Implemented during fieldwork; N/A
C1. Adjust the KIVA report to include pertinent information about all transactions made throughout the day. The reviewer of the report should ensure the report includes all transactions including those transactions where no money changes hands.	Agree - As of January 1, 2015, development of new system will begin to replace KIVA. We will include discussions of these process weaknesses in the development of the new system.	December 2015
C2. Ensure the KIVA report is included with supporting documentation every day so that the reviewer may determine if collections were omitted.	Agree - MWS will ensure that supporting documents are submitted on a daily basis.	February 2015

APPENDIX A – MANAGEMENT RESPONSE AND CORRECTIVE ACTION PLAN

Recommendations	Concurrence and Corrective Action Plan	Proposed Completion Date
D. Establish and document formal procedures for cash handling in the Development Services area to ensure proper tracking and recording of cash payments.	Agree – MWS will develop and implement procedures for cash handling.	December 2015
E1. Establish receivable accounts for cell tower rent payments and other known revenues.	Agree - MWS will implement recording of all applicable receivables.	June 2015
E2. Implement monitoring procedures for all receivables to ensure prompt receipt of payments.	Agree - MWS will develop procedures to monitor all receivable balances.	June 2015
E3. Establish formal policies and procedures for documenting and reporting third party claims and recoveries to the appropriate party.	Agree - MWS will create procedures for implementing a formal tracking of third-party damage claims.	June 2015
E4. Create a central repository for all recoveries from third parties that is actively monitored.	Agree - MWS will create procedures for implementing a formal tracking of third party claims.	June 2015
F1. Establish procedures for the timing and responsibility of emptying the night drop box.	Agree – Prior to the completion of audit fieldwork, procedures have been implemented to strengthen weaknesses that were identified.	Implemented during fieldwork; N/A
F2. Ensure all safes are locked at all times.	Agree - Corrective action was implemented prior to the completion of audit fieldwork.	Implemented during fieldwork; N/A
F3. Implement controls to keep One-Stop-Shop payments segregated and secured.	Agree - MWS will implement appropriate controls at the One Stop Shop location.	June 2015
F4. Require all non-Development Services payments be mailed to the Customer Service Center. The Customer Service Center should record all payments into iNovah and alert other areas of the receipts.	Agree - MWS will develop appropriate processes for consolidating payments and having them delivered to and processed at Customer Service.	June 2015
G1. Establish an internal monitoring system and remediation program to ensure that the vendor is maintaining enQuesta in accordance with the service agreement. Monitoring methods should include both random and systematic spot checks of the items listed in the agreement, and results of the reviews should be documented.	Partially Agree – MWS/IS recognizes that proper procedures have not been established and will create procedures to insure that vulnerability scans are performed by Metro ITS and communicated to our software vendor on a regular schedule.	June 2015

APPENDIX A – MANAGEMENT RESPONSE AND CORRECTIVE ACTION PLAN

Recommendations	Concurrence and Corrective Action Plan	Proposed Completion Date
<p>G2. Establish formal departmental procedures for Metro Nashville Government Information Security policies.</p>	<p>Agree – MWS/IS will work to document formal procedures complying with Metro ITS security policies. The full implementation plan is contingent on filling current MWS/IS vacancies.</p>	<p>December 2015</p>
<p>G3. Review and document business needs for all users in enQuesta and iNovah before establishing user groups and assigning appropriate permissions to each group.</p>	<p>Partially Agree – MWS/IS has documented business needs for all enQuesta users. MWS/IS will work on creating a similar type document for the iNovah security groups.</p>	<p>June 2015</p>
<p>G4. Establish procedures to promptly remove access from terminated employees and to periodically review activities of system administrators. Reviews should be documented.</p>	<p>Disagree – MWS/IS believes that system access is adequately safeguarded and no further steps are necessary.</p>	<p>None</p>