



# **INTERNAL AUDIT REPORT**

## **Operating and Ridership Reporting**

**R-18-04**

**September 10, 2018**

## Executive Summary

### Introduction

In conjunction with the Board of Trustees' Audit Committee, Internal Audit (IA) developed a risk-based annual audit plan. All of the audits on the audit plan are conducted in accordance with the International Standards for the Professional Practice of Internal Audit, published by the Institute for Internal Auditors (IIA), and provide several benefits:

- Management's continuous improvement efforts are enhanced
- Compliance is verified and shortfalls are identified so that they can be corrected
- Board of Trustee oversight of governance, control and risk management is strengthened

All of these benefits contribute toward the Board of Trustees' strategic plan focus areas of:

- Customer Service – Improve products, services, accessibility, and mobility
- Leadership and Advocacy – Address current and future transportation challenges
- Access to Opportunity – Enrich transit access and quality of life
- Strategic Funding – Be wise stewards of public resources
- Workplace of the Future – Foster dynamic, diverse, and engaged employees

As part of the 2018 audit plan, IA was directed by the Board of Trustees to perform an audit to determine if controls are designed and operating effectively to ensure that Operations and Ridership Reporting is accurate, timely, and complete. The preliminary stage of the audit was concluded in August 2017 and the final audit report was completed in July 2018.

### Background and Functional Overview

The Senior Manager of Operations Analysis and Solutions (OAS) provided a functional overview of the Operations and Ridership Reporting function to provide context to this report. Please note that all of the statements made are assertions by the Senior Manager of OAS and were not assessed by IA.

UTA's Operations Analysis and Solutions (OAS) department is striving for empowering employees to use data for decision-making by improving access of information, provision of business insights and improving data quality. One of the most critical function of OAS is to publish ridership and operations performance reports to management for decision-making on a monthly basis. Since ridership determines the amount of funding the agency obtains from the federal government, it is critical that the ridership data collection process provides accurate and timely information to comply with Federal Transit Administration's National Transit Database requirements.

#### Ridership Reporting

- UTA is currently equipped with Automatic Passenger Counting (APC) equipment in all Rail, a majority of fixed route buses and route deviation vehicles (over 800 vehicles). These sensors are installed around vehicle doors and automatically count passengers getting on and off UTA's vehicles. Advanced technology and processes are in place to ensure there is a flow of high quality data for decision-making.

#### Operating Data Reporting

- Operating data (AKA OCA Scorecard) is critical to the Operation of the agency as it summarizes the key performances of all business units and the contribution of about 2000 employees. It contains critical performance such as safety, efficiency, effectiveness and budget performance deemed critical for UTA Operations.

## Objectives and Scope

The period of the preliminary audit was January 1, 2017 through June 30, 2017 with the completion of the audit work focusing on March 1, 2018 through May 31, 2018.

The primary areas of focus for the Operating and Ridership Reporting audit were:

- Governance
- Ridership Reporting
- Operations, Capital and Asset (OCA) Reporting, formerly Chief Operating Officer (COO) Reporting
- Ad-hoc Reporting
- Mobile Data Computer (MDC), Automated Passenger Counters (APC), and related contracts and monitoring
- System Monitor Validation

The internal audit excluded from the scope of this audit areas such as:

- Source data originating outside of the Operations Analysis and Solution Team's responsibility
- Proposed changes to the COO Report and related processes

## Audit Conclusion

### Audit Report Rating\*

Stronger governance has been designed and implemented for the Operations and Ridership Reporting process due to the adoption of a Corporate policy which assigned ownership, roles and responsibilities, as well as reporting timelines for the process to the OAS staff. In addition, Standard Operating Procedures (SOPs) for the Monthly Ridership Report, ad hoc data requests and system monitoring, and validation were developed and put into place. Management had also conducted a formal risk assessment of OAS operations and developed plans to mitigate or eliminate risks identified.

Management has implemented a system of review and approval for the Ridership Reports and OCA Scorecards that was conducted prior to publishing. The review process implemented included tracing a sample of reported figures to source documentation.

However, some areas for potential improvement remain. The corporate policy established did not include responsibility for individuals outside of OAS for timely and accurate submission of ridership information, nor did the policy define OAS' responsibility for ensuring all data was received. In addition, there was no SOP in place for the monthly OCA Scorecard and no review process for ad hoc reports.

IA also noted that access to the shared department drive where OCA Scorecard Reports were stored was not periodically reviewed and controls to prevent unauthorized report changes, such as file-level passwords or read-only protection, were not in place.

While this report details the results of the audit based on limited sample testing, the responsibility for the maintenance of an effective system of internal control and the prevention and detection of irregularities and fraud rests with management.

\*Rating is defined in Appendix 2

Internal Audit would like to thank management and staff for their co-operation and assistance during the audit.

**Table of Contents**

APPENDIX 1: Index of Findings..... 4  
APPENDIX 2: Report Rating Matrices ..... 19  
APPENDIX 3: Distribution List ..... 20

# APPENDIX 1

## Index of Findings

1. Policies and Procedures.....	5
2. Data Integrity and Change Controls .....	7
3. Report Classification and Retention .....	9
4. Ad Hoc Reporting.....	11
5. Standardization .....	13
6. Contracts.....	14
7. Risk Assessment.....	16
8. System Monitoring and Validation.....	17

# APPENDIX 1

## 1. Policies and Procedures

Preliminary Finding R-17-9-1	High
<p>Criteria:</p> <p>Best practices dictates that defined corporate-level policies exist to facilitate processes across multiple modes and business units. The following corporate policy supports this best practice: UTA Corporate Policy No. 1.1.2, Creation, Revision, Retention, and Distribution of Policies and Procedures, Definitions section, states that corporate level policies are developed to “<i>provide principles and guidelines that provide corporate-wide direction on the Authority’s decisions, strategies, and actions</i>” and that SOPs, “<i>provide a step-by-step process to follow when carrying out a particular task or function.</i>”</p> <p>Condition:</p> <ul style="list-style-type: none"><li>○ There were no corporate policies regarding operating and ridership data gathering, synthesis, or reporting, including assigning roles and responsibilities by department or position</li><li>○ Ownership of the operating and ridership reporting process was not defined</li><li>○ Although there were many examples of operating procedures and work instructions documented by the users who created and performed the technical tasks required for gathering the data and synthesizing the information in the Ridership and COO Reports, there were no SOPs at a higher level to guide users in acceptable business practices and departmental procedures, including:<ul style="list-style-type: none"><li>• Timelines for data submission and report distribution</li><li>• Guidelines to ensure reporting was consistent</li><li>• Required reviews, approvals, and related documentation</li><li>• Collecting and addressing customer feedback</li><li>• Appropriate and inappropriate uses and distribution of reports</li><li>• Ad-hoc report request process, prioritization and approval as well as retention requirements</li><li>• Ensuring that all passenger trips were counted, including detours and special events</li><li>• Procedures to address data that was not submitted or submitted late</li><li>• Detection and required response to potential data errors (such as deviations between APCs and manual counts greater than 5%)</li><li>• Minimum qualifications of staff and service providers (such as sampling statisticians)</li></ul></li><li>○ There was no process in place to determine what existing work instructions or other procedural documentation remains applicable and what needed to be updated</li></ul> <p>Root/Cause Analysis:</p> <p>Reliance on the expertise of existing staff rather than a set of documented procedures to guide users in the process</p> <p>Effect:</p> <ul style="list-style-type: none"><li>○ Data may be inaccurate or incomplete, resulting in UTA management and stakeholders making decisions based on inaccurate information</li><li>○ Increased risk that loss of key personnel would result in the inability of UTA to carry out Operations and Ridership reporting effectively</li><li>○ Unclear roles and responsibilities for critical ridership tracking, which involves multiple departments as well as third parties</li><li>○ Potential for operating and ridership reporting to become misaligned with corporate objectives</li><li>○ Increased risk of ad hoc practices rather than best practices</li></ul>	

# APPENDIX 1

<ul style="list-style-type: none"> <li>○ Inconsistencies in the performance of Operations and Ridership reporting</li> </ul>		
<b>Recommendations</b>		
<ul style="list-style-type: none"> <li>○ Management should oversee the creation of a corporate level policy that assigns roles and responsibilities for all operations and ridership tracking and reporting functions</li> <li>○ Where responsibilities are shared with other departments or external parties, management should ensure that roles and responsibilities are documented and agreed upon               <ul style="list-style-type: none"> <li>• Documentation may include corporate policies, SOPs, contracts or agreements, as appropriate</li> </ul> </li> <li>○ Management should develop written SOPs that align with the corporate level policy and provide guidance for all operations and ridership reporting functions</li> </ul>		
<b>Management Agreement</b>	<b>Owner</b>	<b>Target Completion Date</b>
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
A corporate level policy and a SOP will be developed to address the findings.		

<b>Final Status</b>		<b>Medium</b>
<p>Utah Transit Authority Corporate Policy, No. 2.1.14, "Ridership and Operating Data Reporting" was established in March 2018. The Policy defines OAS staff ownership, roles and responsibilities for publishing the monthly ridership report and the OCA scorecard. In addition, SOP G.05.01.01 "Monthly Ridership Reporting" and SOP G.05.01 "Ad Hoc Data Requests Procedure" were established as well as SOP G.05.01.02 "System Monitoring and Validation."</p> <p>However, the Corporate Policy did not include responsibility for ensuring all data was received that should have been received and did not include assignment of responsibility for timely and accurate reporting for individuals outside of OAS. There was also no SOP for the monthly OCA Scorecard.</p> <p>IA recommends that the Corporate Policy be revised to include procedures to ensure all data is received and responsibilities for individuals outside OAS and that an SOP be developed for the OCA Scorecard.</p>		
<b>Management Agreement</b>	<b>Owner</b>	<b>Target Completion Date</b>
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
<p>The ridership and operating data corporate policy will be revised to include wordings "all groups reporting data will have the responsibility to report their data accurately to OAS by the designated deadline.</p> <p>The SOP regarding the OCA Scorecard is being reviewed and will be published in August 2018. The SOP will contain the process for updating and publishing the OCA Scorecard including Assignment of Responsibilities.</p>		

# APPENDIX 1

## 2. Data Integrity and Change Controls

Preliminary Finding R-17-9-2	High
<p>Criteria: Best practices include implementing technical and physical safeguards to ensure the integrity of reported information. Version control should be in place to regulate and track report changes after publishing and over time as services and report methodologies and objectives change.</p> <p>Condition: The audit revealed the following anomalies:</p> <ul style="list-style-type: none"><li>○ No process was in place to monitor the integrity of the COO, Ridership, or ad hoc reports, including:<ul style="list-style-type: none"><li>• A system of review to ensure reports were complete, accurate, timely, and valid</li><li>• Monitoring for data entry errors due to manual processing</li></ul></li><li>○ For both the COO reports and the ridership reports, there were no controls in place to track report changes after publishing or over time as reports change e.g. version control</li><li>○ The following issues were noted specific to the Ridership Report:<ul style="list-style-type: none"><li>• No process to ensure that all ridership figures were submitted and included in the report</li><li>• No independent review of the Ridership Report</li><li>• The sampled ridership reports for March 2017 and May 2017 were modified after their initial intranet posting with no explanation in the modified file or on the intranet posting</li></ul></li><li>○ The following issues were noted specific to the COO Report:<ul style="list-style-type: none"><li>• Although Business Analysts were invited to perform a review of the COO report prior to completion, the standard of review required was not documented and evidence of the review and approval was not retained</li><li>• Source data was not retained for support of COO Reports</li><li>• The shared department drive where COO Reports was stored was not reviewed for appropriate access</li><li>• Changes to the COO report could only be made by the 25 department users since the report was stored on a shared departmental drive. However, other controls such as file-level passwords, protected or locked cells, were not in place to further prevent unauthorized changes after report publication</li><li>• COO reports are identified as preliminary although no final report is issued</li></ul></li><li>○ The following issue was noted specific to the system monitoring and validation process:<ul style="list-style-type: none"><li>• There was no control in place to address variances between APCs and manual counts of greater than 5% YTD</li></ul></li></ul> <p>Root/Cause Analysis: Governance for the ridership, COO, and ad-hoc reporting processes has not been defined by management, including assignment of a process owner</p> <p>Effect:</p> <ul style="list-style-type: none"><li>○ Reports may be inaccurate</li><li>○ Management and other stakeholders may not receive appropriate information necessary to make decisions</li><li>○ Reports may not be consistent over time, leading to invalid comparisons and inaccurate conclusions</li></ul>	



# APPENDIX 1

<ul style="list-style-type: none"> <li>○ Federal funds could be impacted by the data integrity of ridership reporting</li> </ul>		
<b>Recommendations</b>		
<ul style="list-style-type: none"> <li>○ Management should oversee the creation of a corporate level policy that assigns roles and responsibilities for all operations and ridership tracking and reporting functions, including data ownership and retention responsibilities which spans multiple departments and operating modes</li> <li>○ Where responsibilities are shared with other departments or external parties, management should ensure that roles and responsibilities are documented and agreed upon               <ul style="list-style-type: none"> <li>• Documentation may include corporate policies, SOPs, contracts or agreements, as appropriate</li> </ul> </li> <li>○ The owner of the operating and ridership reporting function should oversee the creation of an SOP that includes technical and physical safeguards to ensure the integrity of reported information</li> </ul>		
<b>Management Agreement</b>	<b>Owner</b>	<b>Target Completion Date</b>
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
A corporate level policy and a SOP will be developed to address the findings.		

<b>Final Status</b>	<b>Low</b>	
<p>Utah Transit Authority Corporate Policy, No. 2.1.14, "Ridership and Operating Data Reporting" was established in March 2018. The Policy defines OAS staff ownership, roles and responsibilities for publishing the monthly ridership report and the OCA scorecard. However, as noted previously in finding 1, the Corporate Policy did not include assignment of responsibility for timely and accurate reporting for individuals outside of OAS.</p> <p>Management designed and implemented a documented system of review for Ridership Reports and OCA Scorecards. IA assessed a sample of each report and noted that each was reviewed, documented, and signed off on by the Senior Manager of OAS. The review process included tracing a sample of reported figures to source documentation. Issues noted and actions taken as a result were also documented.</p> <p>However, IA noted that the shared department drive where OCA Scorecards were stored was not reviewed for appropriate access. Controls, such as file-level passwords or write-protected cells, were not in place to prevent unauthorized changes after report publication.</p> <p>IA recommends that the Corporate Policy be revised to include responsibilities for individuals outside OAS. IA also recommend that management design access controls to prevent unauthorized changes to the OCA Scorecard.</p>		
<b>Management Agreement</b>	<b>Owner</b>	<b>Target Completion Date</b>
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
The OCA Scorecard is being revised to have fields and sheets password protected so that unauthorized changes cannot be made.		

# APPENDIX 1

The ridership and operating data corporate policy will be revised to include wordings “all groups reporting data will have the responsibility to report their data accurately to OAS by the designated deadline.

## 3. Report Classification and Retention

Preliminary Finding R-17-9-3	Medium
<p>Criteria:</p> <p>Best practice directs management reports to include the following elements:</p> <ul style="list-style-type: none"><li>○ A brief description of the report, its objectives and uses</li><li>○ Headers and footers that include the date the report was generated, date range and when the data was generated, a descriptive title and page numbers</li><li>○ The author of the report (individual, job title or unit) and contact information for user questions and feedback</li><li>○ The Government Records Access Management Act (GRAMA) designation of the report (e.g. Public, Private, Controlled, Protected), appropriate distribution, and retention</li><li>○ References for the data sources and definitions</li><li>○ Column and row headings and subtotals that are easily understood</li></ul> <p>Condition:</p> <ul style="list-style-type: none"><li>○ The following issues were noted for the Ridership and COO Reports:<ul style="list-style-type: none"><li>• The purpose and objectives of the reports had not been defined or communicated to users</li><li>• There was no formal process, communication channel, or hierarchy for communicating or addressing customer feedback regarding the reports</li><li>• There was no statement on the report to inform users of the GRAMA designation of reports, if any, or the appropriate and inappropriate report uses and distribution</li></ul></li><li>○ The following issues were noted specific to the Ridership Report:<ul style="list-style-type: none"><li>• The ridership reports were not dated, did not list the report’s author, did not have a title indicating it was a report of ridership, and had no page numbers to inform readers of completeness for printed versions</li><li>• Placement of “Bus Systems” ridership subtotal above the data made it unclear what items were included</li></ul></li><li>○ While the COO Report was titled, there was no report author or page numbers to inform readers of completeness for printed versions</li></ul> <p>Root/Cause Analysis:</p> <p>Governance of the ridership and COO reporting processes has not been defined by management</p> <p>Effect:</p> <ul style="list-style-type: none"><li>○ Sensitive data may be exposed</li><li>○ Users may misinterpret reports, leading to poor decision making</li><li>○ Institutional knowledge may be lost in the event of employee turnover</li><li>○ Reports may not be retained or protected in accordance with GRAMA</li></ul>	

# APPENDIX 1

Recommendations		
<ul style="list-style-type: none"> <li>Management should oversee the creation of a corporate level policy that assigns roles and responsibilities for all operations and ridership tracking and reporting functions, including data ownership responsibilities which spans multiple departments and operating modes</li> <li>Management should revisit both the ridership and COO reports on a periodic basis to ensure that they include all the critical information and formatting necessary to assist with management's understanding of the reports</li> </ul>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
A corporate level policy and a SOP will be developed to address the findings.		

Final Status	Medium	
<p>The purpose and objectives of the Ridership Report and OCA Scorecards was defined in Utah Transit Authority Corporate Policy, No. 2.1.14, "Ridership and Operating Data Reporting" which was communicated to users. However, as noted previously in finding 1, the Corporate Policy did not include assignment of responsibility for timely and accurate reporting for individuals outside of OAS.</p> <p>IA also noted that Ridership Reports and OCA Scorecards had not been reviewed for appropriate GRAMA classification and no retention period had been established. In addition, reports were not dated, did not contain page numbers, the name of the report preparer or other responsible party, nor directions regarding how submit report feedback, although the email publishing the OCA Scorecard did include such a statement.</p> <p>IA recommends that the Corporate Policy be revised to include responsibilities for individuals outside OAS. Management should also work with UTA legal counsel to establish GRAMA designation and report retention guidelines. Finally, IA recommends reports be reviewed and modified to include the attributes listed above, such as dates, page numbers, and contact information.</p>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
<p>All ridership records are currently being stored. The legal department will be contacted about GRAMA classification and retention periods that documents must adhere to.</p> <p>Monthly Management ridership report has been modified to contain the following: Title included on each document, current date or date if printed, preparer's name and phone number and page number. Directions on who could be contacted with questions is on the email that is sent out with the monthly report. The OAS scorecard will be updated with the same information by the August publication.</p>		

# APPENDIX 1

## 4. Ad Hoc Reporting

Preliminary Finding R-17-9-4	Low
<p><b>Criteria:</b> Ad hoc reporting should be tracked and controlled, including establishing authorized requestors, minimum request documentation, prioritization and screening of requests.</p> <p><b>Condition:</b> The audit revealed the following anomalies:</p> <ul style="list-style-type: none"><li>○ No guidance on the reviewing, approving, and prioritizing of ad hoc report requests</li><li>○ No SOP regarding what areas of information were appropriate to request reports from OAS e.g. no required level of authority for requesting an ad hoc report</li><li>○ No documentation, such as a request form, was created indicating what information (data sources, required fields, etc.) was being requested, the purpose of the request, the desired timeframe or management approval</li><li>○ No SOP or other documentation to guide users in carrying out ad hoc reporting such as:<ul style="list-style-type: none"><li>• How requests should be made, approved, and tracked</li><li>• Review requirements</li><li>• Report retention requirements</li><li>• Informing users when source data used is not standardized, finalized, or approved</li></ul></li><li>○ No controls were in place to mitigate the risk that ad hoc reporting sources and parameters were inconsistent</li><li>○ Other than for the APC database, no controls were in place to mitigate the risk of data migration or changes subsequent to ad hoc reporting</li><li>○ No cutoff date for ad hoc reporting, which may lead to differing information reported depending on the date for source data used</li><li>○ Report requests were not tracked to assist in the identification of ongoing reporting needs, which could be automated to save time</li></ul> <p><b>Root/Cause Analysis:</b> Governance of the ad hoc reporting process, including ownership and accessibility of UTA operating, employee, and departmental data has not been defined by management.</p> <p><b>Effect:</b></p> <ul style="list-style-type: none"><li>○ Staff time may be used inefficiently, by generating unnecessary reports or reports previously performed</li><li>○ Poor decisions may be made based on invalid comparisons between reports with different parameters or sources</li><li>○ Loss or exposure of sensitive information obtained by individuals with no valid business purpose or authority</li></ul>	
<b>Recommendations</b>	
<p>Development of the following control processes, documented in a standard operating procedure, that includes:</p> <ul style="list-style-type: none"><li>○ A system of reviewing, approving, and prioritizing ad hoc report requests</li><li>○ Use of a request form containing the relevant information</li></ul>	

# APPENDIX 1

<ul style="list-style-type: none"> <li>○ Controls to mitigate the risk of data migration or changes before or after ad hoc reporting</li> <li>○ Tracking of requested reports and creation of ongoing automated reports for items frequently requested</li> </ul>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
<p>Will develop an ad hoc request approving and prioritizing tracking process. A corporate level policy and a SOP will be developed to address the findings.</p>		

Final Status	Low	
<p>The audit revealed that, ad hoc requests were being logged, tracked and prioritized. Staff were instructed on what information should be collected on the log and were encouraged to use existing data where possible to help mitigate the risk of inconsistent reporting.</p> <p>However, IA noted that ad hoc reports that were requested internally were not reviewed or approved. In addition, there was no retention period or GRAMA classification established for ad hoc reports.</p> <p>Finally, none of the 3 Ad Hoc reports sampled during the audit contained the phrase “For Internal Use Only,” as required by SOP G.05.01 “Ad Hoc Data Requests Procedure.”</p> <p>Management should work with UTA legal counsel to establish GRAMA designation and report retention guidelines. Management should consider developing a system of review and approval of ad hoc reports, including ensuring that reports are marked “For Internal Use Only” in accordance with SOP G.05.01.</p>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
<p>Response to “Ad hoc reports that were requested internally were not reviewed or approved”: Regarding the review of Ad hoc report process, Ad hoc report SOP will be modified to state that management will determine whether a GRAMA request need to be reviewed by management based on the risk of the request along with documentation of the decision.</p> <p>Response to Ad hoc reports retention period and GRAMA classification: The legal department will be contacted about GRAMA classification and retention periods. Suggestions from the legal department will be implemented. Staff will follow per SOP’s instruction to include “for internal use only” wording for all internal ad hoc request.</p> <p>Regarding the review of Ad hoc report process, Ad hoc report SOP will be modified to state that management will determine whether a GRAMA request need to be reviewed by management based on the risk of the request along with documentation of the decision.</p>		

# APPENDIX 1

## 5. Standardization

Preliminary Finding R-17-9-5		High
<p><b>Criteria:</b> Best practices include standard definitions for reported figures, data cut offs and use of consistent sources across reporting processes.</p> <p><b>Condition:</b></p> <ul style="list-style-type: none"> <li>○ The following issues were noted during the audit:           <ul style="list-style-type: none"> <li>• There was not a control in place to ensure all modes reported on the Ridership and COO reports use the same definitions for reported items</li> <li>• Source documentation for both the Ridership Report and COO report was submitted in different formats and did not always include the preparer, data source or parameters (database, field names, filters, control-totals and as-of date)</li> </ul> </li> <li>○ The following issues noted were specific to the Ridership Report:           <ul style="list-style-type: none"> <li>• Three (7.7%) out of 39 data-point labels on the May 2017 Ridership Report were not defined in the report glossary. One (2.6%) out of 36 remaining data-point labels used a different term for the data-point label defined</li> <li>• The March and May 2017 Ridership Reports glossary did not define the term “ridership,” which was used interchangeably with “passenger” and “rider”</li> <li>• During the National Transit Database Audit, report reference R-17-4, IA found that Van Pool consistently lags one month when reporting ridership data and, on average, 15 percent of ridership statistics were estimates. The March and May 2017 Ridership Report glossaries defined vanpool figures as, “A 100% count for VanPool users through RidePro internet self-reporting system,” which was not accurate. There was no disclosure on the report regarding the one month time lag</li> </ul> </li> <li>○ The COO report did not have a report glossary that defined important terms and indicated the source of the data</li> </ul> <p><b>Root/Cause Analysis:</b> Governance for the operating and ridership process has not been defined by management.</p> <p><b>Effect:</b></p> <ul style="list-style-type: none"> <li>○ Different modes and business units may use different definitions and parameters for information leading to invalid comparisons</li> <li>○ Users may misinterpret reports, leading to poor decision making</li> </ul>		
<p><b>Recommendations</b></p> <ul style="list-style-type: none"> <li>○ Management should oversee the creation of a corporate level policy that assigns roles and responsibilities for all operations and ridership tracking and reporting functions</li> <li>○ The owner of the operating and ridership reporting function should oversee the creation of an SOP that includes standardization and definitions for the reported figures, data cut offs and use of consistent sources across reporting processes</li> </ul>		
<b>Management Agreement</b>	<b>Owner</b>	<b>Target Completion Date</b>
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
A corporate level policy and a SOP will be developed to address the findings.		

# APPENDIX 1

Final Status		Low
<p>The purpose and objectives of the Ridership Report and OCA Scorecards was defined in Utah Transit Authority Corporate Policy, No. 2.1.14, "Ridership and Operating Data Reporting" which was communicated to users. However, as noted previously in finding 1, the Corporate Policy did not include assignment of responsibility for timely and accurate reporting for individuals outside of OAS.</p> <p>In an effort to increase consistency and assist staff in understanding commonly used terms at UTA, the UTA Transit Authority Glossary was published in February 2018 and was updated in April 2018. IA reviewed both the Ridership Report and the OCA Scorecard and found that there were terms listed on the reports that had not been defined in the Glossary. In addition, no reference to the Glossary was found on the reports to make report users aware of the Glossary and assist in understanding report terms.</p> <p>IA also noted that there was no disclosure on the report indicating that Van Pool ridership was for the prior month or to correct the Vanpool reporting method.</p> <p>IA recommends that the Corporate Policy be revised to include responsibilities for individuals outside OAS. In addition, management should compare terms used on published reports to those in the UTA Glossary for consistent use and to ensure that all terms are defined. Reports should be updated to include a reference to the UTA Glossary. Finally, a note should be added to the Ridership Report regarding the Vanpool ridership reporting lag.</p>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
<p>Terms on published report have been compared and modified to match the UTA Glossary. Some terms updates have been requested to be changed in the glossary. (Route Deviation) Ridership reports have been updated to include a reference (link to the UTA Glossary). Terms in OCA Scorecard will be reviewed to ensure they are listed in the UTA Glossary.</p> <p>The ridership report has also been updated with a reference indicating Van Pool numbers are being reported a month behind.</p> <p>The corporate policy that the all groups reporting data will have the responsibility to report their data to OAS by the 5<sup>th</sup> of the next month.</p>		

## 6. Contracts

Preliminary Finding R-17-9-6	Medium
<p>Criteria: Best practices for contract administration include monitoring for renewal, provisions for business continuity, and ongoing maintenance support, where a need has been identified.</p> <p>Condition: The audit identified the following anomalies:</p>	

# APPENDIX 1

- The contract with Init did not include a provision relating to business continuity
- The software maintenance agreement with Init contained conflicting language regarding the scope of services provided
- There were no guidelines for when software maintenance agreements were required
- There was no software maintenance agreement in place for Urban Transportation APC processing software

**Root/Cause Analysis:**

Vendor responsiveness to UTA needs outside of contract requirements has been sufficient to date leading to a perceived lack of risk for operating outside of an agreement.

**Effect:**

Support may not be provided where it is required by contract and business continuity may be at risk.

**Recommendations**

- Contracts should be reviewed and an assessment made regarding the need for business continuity provisions.
- SOPs should be developed for consistent guidelines for when software maintenance agreements are required.

Management Agreement	Owner	Target Completion Date
Yes	Chief Safety, Security, & Tech Officer	12/31/2017
Contracts will be reviewed and an assessment made regarding the need for business continuity provisions.		
SOPs will be developed for consistent guidelines for when software maintenance agreements are required.		

Final Status	Implemented
Corporate Policy 2.1.12, Information Technology Governance was found to contain guidelines for software purchases, including: Section IV.A.5 states that the IT Director is responsible to, <i>“Vet and approve all Enterprise Systems Purchased, managed or connecting to UTA's Technology Resources, before it is processed by Purchasing and Supply Chain Department or connected to UTA's Technology Resources.”</i>	
In addition, IT Department Policy No. 1.0.3, IT Software Licensing and Inventory Policy, includes requirements for tracking software license and maintenance agreements, including expiration dates. The policy also requires annual software inventory.	
No new contracts were identified related to Operations and Ridership Reporting that could be tested to determine if management had reviewed the contract for business continuity provisions. Therefore, no further testing of contracts was performed.	
Management Agreement	Owner
N/A	N/A
N/A	



# APPENDIX 1

## 7. Risk Assessment

Preliminary Finding R-17-9-7		High
<p>Criteria: Best practice necessitates that risks are identified and actively managed to mitigate adverse impacts on achieving management's objectives.</p> <p>Condition:</p> <ul style="list-style-type: none"> <li>○ Although risk assessments have been performed for many of the technical aspects of ridership data collection, there was no periodic risk assessment process in place for the department</li> <li>○ The Goals Matrix used to govern and align operating and ridership reporting activities did not include the COO report</li> <li>○ Audit trail on status updates to the Goals Matrix were not always documented</li> <li>○ There was no comprehensive control that aligns all department activities with UTAs True Norths</li> </ul> <p>Root/Cause Analysis: Governance for the operating and ridership reporting process has not been defined by management.</p> <p>Effect: Critical risks may exist that management is not aware of or not managing, which could result in Ridership and Operations objectives not being met.</p>		
Recommendation		
The owner of the operating and ridership reporting function should oversee the creation of an ongoing departmental wide risk assessment process that is reviewed and assessed at least annually.		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
An annual risk assessment will be done starting no later than the end of October.		

Final Status		Implemented
The Senior Manager of OAS completed a formal, documented risk assessment on OAS in December 2017.		
Management Agreement	Owner	Target Completion Date
N/A	N/A	N/A
N/A		

# APPENDIX 1

## 8. System Monitoring and Validation

Preliminary Finding R-17-9-8		Medium
<p>Criteria: 2017 NTD Policy Manual stipulates that APC benchmarking and maintenance plans must include validation of APC data against a manual sample and that the difference between manual and APC counts must be less than 5%.</p> <p>Condition: The audit revealed the following anomalies:</p> <ul style="list-style-type: none"> <li>○ There was no periodic monitoring of FrontRunner APCs and manual counts for the +/- 5% variance threshold</li> <li>○ For bus and Trax modes the files used to track and monitor APC and manual count variation were not aggregated for the year to date</li> <li>○ Due to the absence of an SOP it was unclear whether the 5% variance threshold between APC and manual counts required ongoing monitoring or only year-end measurement. The audit trail was insufficient to show that an ongoing monitoring control was in place</li> <li>○ A procedure was not in place to inform users how to address a greater than 5% variance of APC to manual counts</li> <li>○ IA selected one count sheet from the hundreds performed on an annual basis and compared it to the tracking file to better understand the controls in the process and noted 4 of 170 entries were missed, and 1 additional entry was not sufficiently researched to identify whether the ridership count was a "10" or a "6"</li> </ul> <p>Root/Cause Analysis:</p> <ul style="list-style-type: none"> <li>○ Governance for the operating and ridership reporting process has not been defined by management</li> <li>○ Monitoring requirements were not formalized by management</li> <li>○ Manual processes increased the risk that information is not transferred accurately</li> </ul> <p>Effect: Non-compliance with FTA standards for manual and APC count variance thresholds may not be well understood until after the validation plan is complete. Without clear guidance on how to address non-compliance, users may result to convenient solutions rather than best practices.</p>		
Recommendations		
<ul style="list-style-type: none"> <li>○ Management should oversee the creation of a corporate level policy that assigns roles and responsibilities for all operations and ridership tracking and reporting functions</li> <li>○ The owner of the operating and ridership reporting function should oversee the creation of an SOP that standardizes the monitoring and review process for the manual counts done to validate APCs, including how to address variances that do not meet minimum FTA requirements</li> <li>○ Management should look for opportunities to automate manual processes where doing so would reduce errors and save resources</li> </ul>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2017
A corporate level policy and a SOP will be developed to address the findings.		

# APPENDIX 1

Final Status		Low
<p>The purpose and objectives of the Ridership Report and OCA Scorecard was defined in Utah Transit Authority Corporate Policy, No. 2.1.14, "Ridership and Operating Data Reporting" which was communicated to users. However, as noted previously in finding 1, the Corporate Policy did not include assignment of responsibility for timely and accurate reporting for individuals outside of OAS.</p> <p>Management implemented SOP G.05.01.02, System Monitoring and Validation which standardizes the monitoring and review process for manual counts done to validate APCs. However, IA did not find guidance in the SOP regarding variances greater than that specified by NTD, beyond stating that such variances are communicated to the Sr. Business Developer.</p> <p>IA noted that a process to periodically review manual data entry for accuracy and completeness had been implemented. However, the process was not documented in a Corporate Policy or SOP.</p> <p>Management has also initiated a new project to create a ridership data warehouse that will further mitigate the risk of inconsistent reporting data and enable greater automation of reporting processes.</p> <p>IA recommends that the Corporate Policy be revised to include responsibilities for individuals outside OAS. In addition, management should review and update SOP G.05.01.02, to include guidance regarding follow up performed by the Sr. Business Developer for variances greater than the NTD threshold and to include the manual data entry review process.</p>		
Management Agreement	Owner	Target Completion Date
Yes	Sr. Mgr Ops Analysis & Solutions	12/31/2018
<p>The ridership and operating data corporate policy will be revised to include wordings "all groups reporting data will have the responsibility to report their data to OAS by the 5<sup>th</sup> of the next month". SOP will be updated to show the follow-up action regarding variances by vehicles. SOP will be updated to include reviewing manual data entry review process.</p>		

# APPENDIX 2

## REPORT RATING MATRICES\*

### OVERALL REPORT RATING

The overall report ratings are defined as follows, applicable to the audit scope as defined

Descriptor	Guide
Fully effective	Controls are as good as realistically possible, both well-designed and operating as well as they can be.
Substantially effective	Controls are generally well designed and operating well but some improvement is possible in their design or operation.
Partially effective	Controls are well designed but are not operating that well. OR While the operation is diligent, it is clear that better controls could be devised.
Largely ineffective	There are significant gaps in the design or in the effective operation of controls – more could be done.
Totally ineffective	Virtually no credible controls relative to what could be done.

### DETAILED FINDING PRIORITY RATING

Descriptor	Guide
High	Matters considered being fundamental to the maintenance of internal control or good corporate governance. These matters should be subject to agreed remedial action within three months.
Medium	Matters considered being important to the maintenance of internal control or good corporate governance. These matters should be subject to agreed remedial action within six months.
Low	Matters considered being of minor importance to the maintenance of internal control or good corporate governance or that represents an opportunity for improving the efficiency of existing processes. These matters should be subject to agreed remedial action and further evaluation within twelve months.
Implemented	Management action has been taken to address the risk(s) noted in the audit finding.

# APPENDIX 3

DISTRIBUTION LIST			
Name	For Action <sup>1</sup>	For Information	Reviewed prior to release
Interim Executive Director	*		*
Managing Attorney		*	
Chief Safety, Security, & Tech Officer	*		*
VP of Finance		*	
Sr. Mgr Ops Analysis & Solutions	*		*

<sup>1</sup>For Action indicates that a person is responsible, either directly or indirectly depending on their role in the process, for addressing an audit finding.