

Chief Procurement Office

Enterprise Contract Management

Internal Audit Report 15-103

November 2016



Department of Information Resources
Internal Audit

Internal Audit Mission Statement

To collaborate with DIR leadership to fulfill the agency's core mission by providing independent and objective audit services designed to add value and improve the effectiveness of risk management, control, and governance processes.

DIR Internal Audit Staff

Lissette Nadal-Hogan, CISA, CRISC, Director

Cathy Sherwood, CPA, CITP, CISA, Senior Auditor (Lead Auditor)

Susan Pennington, CGAP, Senior Auditor

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Executive Summary

This report summarizes the scope, results, and recommendations from the work performed in conducting the Department of Information Resources (DIR) Enterprise Contract Management audit. This audit was included in the Fiscal Year 2016 Internal Audit Annual Plan approved by the DIR Board.

The **audit objectives** were to:

- Provide assurance that key Data Center Services (DCS) enterprise management controls were in place and operational.
- Determine whether the DCS enterprise contract management activities complied with state law, agency policies, and contract requirements.
- Validate the implementation of the audit recommendations included in the Enterprise Contract Management Internal Audit Report No. 13-103.

To accomplish these objectives, Internal Audit performed procedures to gain an understanding of DIR's business processes designed to effectively manage enterprise contracts within the requirements of the state law. In conducting these procedures, we interviewed subject matter experts, reviewed documentation such as state law, regulations, contract requirements, deliverables, amendments, policies and procedures, management and monitoring plans, management reports, risk assessments, the contractor's Service Management Manual (SMM), statewide guidance, and other documentation relevant to complete the audit procedures. In addition, Internal Audit reviewed financial transactions, invoices, hiring, contract management activities, and conducted other evaluations, analyses and testing needed to accomplish the audit objectives.

The **audit scope** included the contract between DIR and Atos SE (DIR-DCS-SCP-MSA-002) and related amendments, exhibits, and attachments. Contract documentation for the period between September 2014 and July 2016, financial transactions dated between April 2015 and May 2016, and management reports for the period from May 2015 to May 2016 for the Atos contract. During fiscal year 2015, DIR payments under this contract totaled \$216.9 million. Based on the results of the Risk Assessment, the audit focused on three of the 17 contract management responsibilities¹:

- Monitoring the contractor's progress and performance,
- Inspecting, approving, and accepting the final product/ service deliverables, and

¹ Refer to Appendix B for the list of Contract Manager responsibilities published by the State of Texas Comptroller of Public Accounts in the State of Texas Contract Management Guide.

- Verifying the accuracy of invoices and authorization of payments.

Overall, DIR's enterprise contract management controls were in place and operational for the Atos contract and contract management activities complied with state law, agency policies, and contract requirements. DIR increased the staff count in its Enterprise Contract Management Section to support additional workloads related to the management of Data Center Services (DCS), staffing augmentation, cloud services contracts, and to fully implement the prior audit recommendation.

Contract management activities were planned and performed consistently during the period covered by this audit. However, audit issues were noted during the audit. The issues identified indicate: the DCS Contract Management Plan (CMP), the Atos contract Risk Assessment and Monitoring Plan were not periodically updated with complete and current information to ensure adequate coordination of activities across the organization and among DIR and outsourced contract management teams. Roles and responsibilities for operations and contract administration and oversight need to be clearly defined in the CMP to help ensure those responsible for contract performance and approval functions do not also perform contract oversight functions. The process for capturing, documenting, and validating rate changes that impact statewide billing needs to be sufficiently documented. The process for managing contract documents and deliverables can be improved by using a more detailed approach that is sustainable, repeatable, and standardized. Lastly, the controls over the production database with contract-related data can be strengthened to better maintain the integrity of the data.

Recommendations to improve DIR's control environment over its enterprise contract management activities and to ensure full compliance with state law were identified and communicated to DIR management from the Chief Procurement Office (CPO).

DIR management from the CPO concurred with the results and recommendations reported by Internal Audit and provided action plans to implement the recommendations.

Internal Audit thanks management and staff from the DIR Chief Procurement Office, Chief Operations Office – Data Center Services Program, Chief Financial Office, and contractor for their time, cooperation, and assistance provided during this audit.

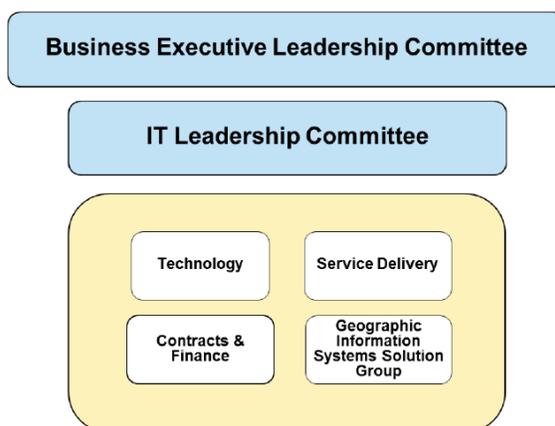
Detailed results of the audit, including the recommendations and management's responses are documented in the report that follows.

Background

Texas Government Code Subchapter L, Chapter 2054 describes information and information resources possessed by agencies of state government as strategic assets belonging to the residents of the state that must be managed as valuable state resources. Planning and coordination functions for the purchase of shared services across state agencies became the responsibility of the Department of Information Resources (DIR) to:

- Create a uniform policy and coordinated system for the use and acquisition of information resources technologies², avoiding uncoordinated and duplicative information resources technologies more appropriately acquired as part of a coordinated effort for maximum cost-effectiveness and use.
- Support the transfer of timely and useful information among the various agencies, branches of state government, and residents of Texas in a coordinated and cost-effective manner.

The Enterprise Contract Management Section of the Chief Procurement Office (CPO), previously known as the Technology Sourcing Office (TSO), has one dedicated Contract Manager assigned to manage and oversee the Atos Data Center Services (DCS) contract with the assistance of a contract management team composed of staff from the DCS Program, the Chief Financial Office (CFO), and the Office of the General Counsel. The DCS Program is also part of an oversight and governance structure that includes four solutions groups, the Information Technology Leadership Committee (ITLC), and the Business Executive Leadership Committee (BELC).



The Technology, Service Delivery, Contracts and Finance, and Geographic Information Systems Solutions groups meet regularly. These solutions groups are currently considered part of the enterprise contract management structure at DIR. The BELC is made aware of and resolves business issues escalated by the other solutions groups, including the ITLC, and includes participants from DCS customers.

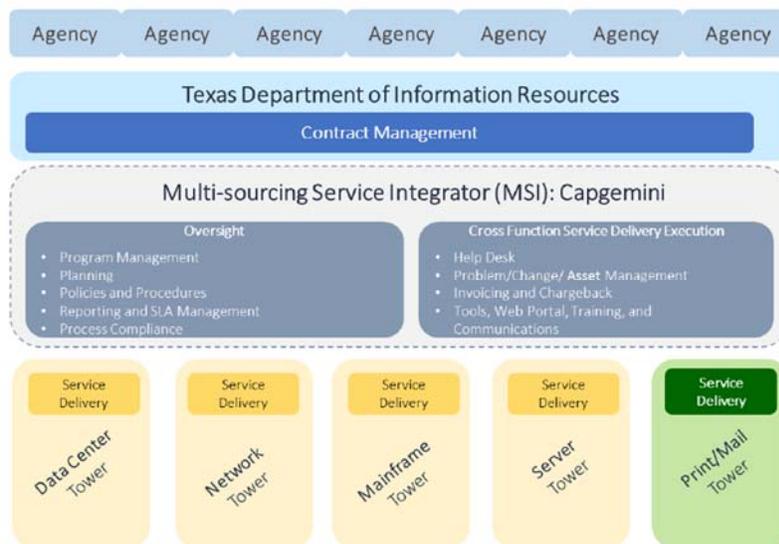
The CPO manages DCS contracts using guidance from the Contract Management Guide published by the State of Texas Comptroller of Public Accounts, which provides a list of 17

² Based on ITIL® guidance, information resources technologies refer to data processing and telecommunications hardware, software, services, supplies, personnel, facility resources, maintenance, and training.

primary contract manager responsibilities. (Refer to Appendix B.) Based on results of the audit project Risk Assessment, the scope of fieldwork was limited to three primary contract management responsibilities for the Atos contract.

- Monitoring the contractor’s progress and performance,
- Inspecting, approving, and accepting the final product/ service deliverables, and
- Verifying the accuracy of invoices and authorization of payments.

DIR contracted with ACS State and Local Solutions, Inc., later known as Xerox State and Local Solutions (XSLs) in December 2011. After purchasing XSLs, Atos assumed responsibilities under this contract in May 2015 to provide participating state agencies and other publicly funded entities with technology infrastructure that supports important Texas programs such as: the supplemental nutrition assistance program, unemployment insurance, and child support. The DCS Program assists with providing operating legacy agency data centers while consolidating operations to two modern facilities. By consolidating from an aging, disparate infrastructure spread across 1,500 locations including 31 data centers, the state has continued to upgrade technology to realize the vision of shared services. The diagram below shows the key stakeholders of the Atos contract who share contract management responsibilities.



When Atos was approved to assume the XSLs contract, it became the service delivery provider for the data center, network, mainframe, and server towers while Xerox Corporation continued to provide print and mail services. During fiscal year 2015, payments to Xerox Corporation and Atos included in the DCS Consolidation Report totaled \$216.9 million.

The governance model allows for DCS customers to assist with setting standards and strategic direction for the DCS Program which provides:

- Mainframe services with approximately 330,000 batch jobs per month.

- Server and cloud services for over 6,000 servers with over 38 petabytes stored.
- Network services with enhanced disaster recovery and enhanced intrusion detection and prevention.
- DCS with robust, industry-standard security and facility management.
- Consolidation services for the (a) transformation of operations from 40 legacy and 300 remote centers across the state and (b) migration from non-supported hardware and software to state managed data centers.

The **DCS customers** are Texas state agencies or other publicly funded organizations that utilize Atos Data Center Services.

Source: DCS Atos Contract

The Enterprise Contract Management audit was included in the Fiscal Year 2016 Internal Audit Plan as approved by the DIR Board.

Audit Objectives

- Provide assurance that adequate key enterprise contract management controls were in place and operational,
- Determine whether the enterprise contract management activities complied with state law, agency policies, and contract requirements, and
- Validate the implementation of the audit recommendations included in the Enterprise Contract Management Internal Audit Report No. 13-103.

Audit Scope and Methodology

Refer to Appendix A for a detailed description of the **audit scope** and **methodology**.

We conducted this performance audit in conformance with the *International Standards for the Professional Practice of Internal Auditing* and in accordance with the *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 issues and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our issues and conclusions based on our audit objectives.

Detailed Results

Overall, DIR's enterprise contract management controls were in place and operational for the Atos contract and contract management activities complied with state law, agency policies, and contract requirements. DIR increased the staff count in its Enterprise Contract Management Section to support additional workloads related to the management of Data Center Services (DCS), staffing augmentation, cloud services contracts, and to fully implement the prior audit recommendation.

Contract management activities were planned and performed consistently during the period covered by this audit. However, the DCS Contract Management Plan (CMP), the Atos contract Risk Assessment and Monitoring Plan were not periodically updated timely with complete and current information to ensure adequate coordination of activities across the organization and among DIR and outsourced contract management teams. Roles and responsibilities for operations and contract administration and oversight need to be clearly defined in the CMP to help ensure those responsible for contract performance and approval functions do not also perform contract oversight functions. The process for capturing, documenting, and validating rate changes that impact statewide billing needs to be sufficiently documented. The process for managing contract documents and deliverables can be improved by using a more detailed approach that is sustainable, repeatable, and standardized. Lastly, the controls over the production database with contract-related data can be strengthened to better maintain the integrity of the data.

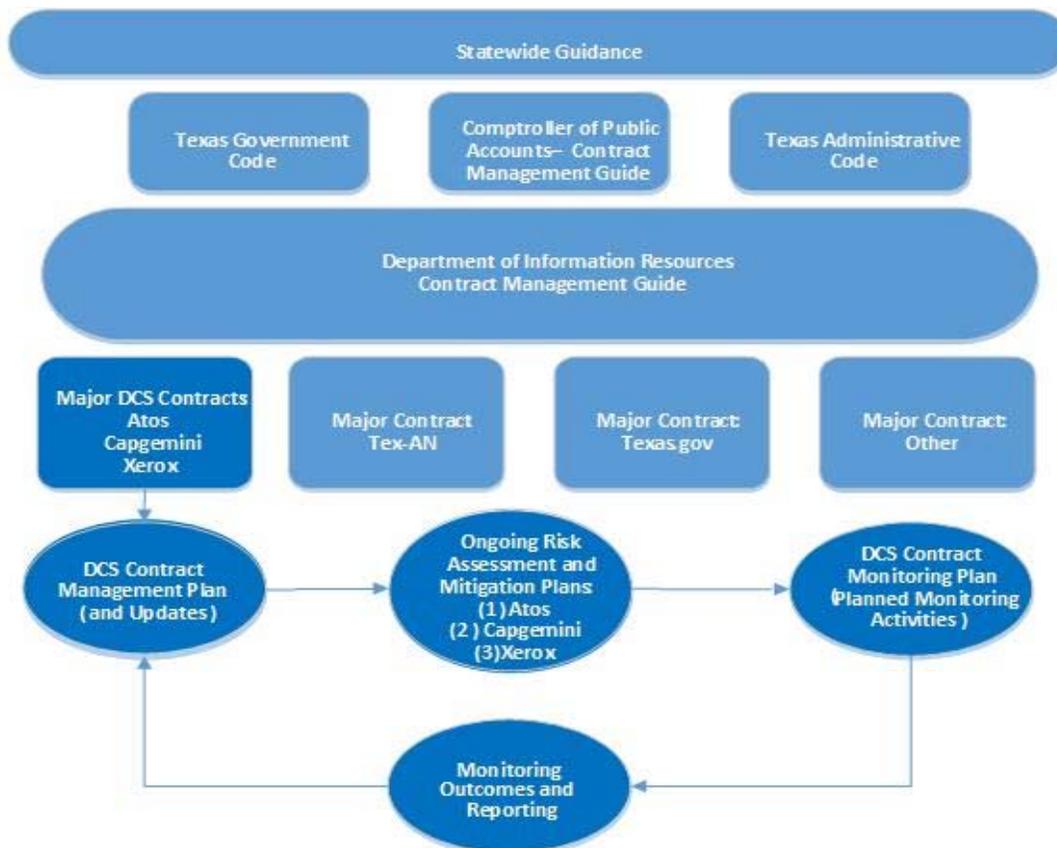
Recommendations to improve the DIR's control environment over its enterprise contract management activities and ensure full compliance with state law were identified and communicated to DIR management. Recommendations made to management staff from DIR's Chief Procurement Office (CPO) include, but are not limited to:

- Formalize and update the Contract Monitoring Plan to incorporate relevant details from the Risk Assessment, among others.
- Coordinate with the DCS Program to complete the DCS Risk Assessment ensuring that results from ongoing contract monitoring activities and reports, identified risks, and trends in the subject matter of disputes and corrective actions are included in the assessment.
- Formalize DIR's process for tracking, approving, and reporting on contract rate changes.
- Define contract deliverables for tracking purposes and ensure they are received, tracked, and accepted based on established criteria.
- Require independent verification and validation of the tools used to accumulate Resource Unit (RU) volumes.
- Require formal authorization to change or delete contract notifications (CNs) from the Salesforce System.

Details are described in the issues and recommendations that follow.

Issue 1: Contract Management Plan and Risk Assessment

The Data Center Services (DCS) Contract Management Plan (CMP) and Risk Assessment for the Atos contract were not periodically updated with complete and current information. The Texas Government Code (TGC) Section 2054.554 requires DIR to develop and periodically update a Contract Management Guide to provide an overall consistent approach on procurement and management of major outsourced contracts. In updating the guide, changes should be made based on contract experiences and shifting conditions. TGC Section 2054.523 states that contract management guidance should specify the procedures for administering, monitoring, and overseeing each major outsourced contract and that a CMP should be created for each major contract. As a major DIR contract, the Atos contract for DCS should have a CMP that, in addition to the required procedures, specifies the approach to managing and mitigating the risks inherent to the contract. Refer to the diagram below that depicts the relationship between statewide guidance and detailed contract management plans for major contracts at DIR:



DCS Contract Management Plan

The DCS Contract Management Plan (CMP) had not been revised (1) to ensure it stays current and incorporates changes that occur during the contract management process, and (2) when DCS renews, amends, or resolicits a major outsourced contract. The purpose of the DCS CMP, as specified in the most recent version reviewed, is to provide a guideline and tool on how to administer, monitor, and oversee the DCS contracts. The DCS CMP states that it would define the specific approach to managing and mitigating risks inherent to each DCS contract. Based on the documentation reviewed, the latest available version of the plan was dated April 2015, before the Xerox State and Local Solutions (XSLs) contract was assigned to Atos. The assignment occurred in May 2015 and the plan was not updated.

Since April 2015, significant contract changes have occurred, including two contract amendments that impact pricing and new statewide service offerings. The initial DCS CMP was developed as the result of a prior audit and recommendation from the Texas Sunset Advisory Commission. However, competing priorities have prevented DIR from updating the plan timely. Without a current DCS CMP, DIR may not effectively devote limited contract management resources to the most pressing high risk areas of the contract that should also be reflected in the corresponding monitoring plan. In addition, since DIR has established a contract management team approach to managing the Atos contract, which is allowed by state law and recommended for major outsourced contracts, it is critical to clearly define and document the roles and responsibilities each team member plays in the administration, monitoring, and oversight of the contract.

Roles and Responsibilities

The DCS CMP for the Atos contract must establish clear roles and responsibilities for required contract management activities. The plan, based on statute, must provide details about implementing the program that is the subject of the contract as well as procedures for:

- Monitoring the contractor's performance,
- Identifying and mitigating risks related to the contract, and
- Involving and communicating with customers who will be served by any programs implemented through the contract.

Based on the Contract Management Guide issued by the State of Texas Comptroller of Public Accounts (CPA), the number of participants in the contract management and administration process may vary in number from one to many depending on the size, level of risk, and complexity of the contract. Early in the procurement process, staff are identified to participate in contract management. Guidance also states that management should identify a single Contract Manager and other subject matter experts to assist the Contract Manager.

Examples of assigned roles and responsibilities include:

- Determining the sequence of activities, dependencies, required or desired outcomes, and acceptable performance levels,

- Developing a timetable and start and end date for each performance component; include milestones with accompanying timeframes, and monitoring and reporting requirements,
- Monitoring and documenting contractor activity on a specified frequency to identify problem areas,
- Establishing scope of authority, clear lines of communication and reporting, and specific individuals who will interact directly with the contractor, and
- Establishing a procedure, identifying a responsible person, and establishing a timeline for making necessary contract decisions, modifications, and changes.

Assigning and documenting clear roles and responsibilities for the DCS Atos contract will assist DIR in establishing ownership and accountability for contract management activities and better manage any outsourced responsibility. As appropriate, the CMP must also define an approach for transitioning from one major outsourced contract to another major outsourced contract under the direction of the assigned Contract Manager.

Risk Assessment and Risk Management

The Risk and Mitigation Section of the DCS CMP (Introduction – Section 1.9) includes a reference to Section 9 of the Atos Master Services Agreement and suggest that the service provider (Atos) assists DIR in preparing strategic plans and short-term implementation plans on an annual basis to address expected performance, quality, responsiveness, efficiency, reliability, security risks, and other service levels.

Similarly, the State of Texas Comptroller of Public Accounts (CPA) Contract Management Guide (CMG), emphasizes that an effective Risk Assessment Model helps focus limited monitoring resources on high risk and assists management in determining what areas to monitor, what type of monitoring is required, and how to use the monitoring results. Guidance also states that risk factors may include the contractor's past performance (and past performance of similar contractors), turnover in key personnel, performance and results of previous monitoring visits, as well as results of monitoring visits completed by other agencies or divisions within the same agency that receive services from the same contractor. The Risk Assessment should be updated periodically and is a dynamic process that reflects results of monitoring visits, reviews of payment vouchers, desk reviews, and other monitoring activities.

For example, if a contractor has fallen significantly behind schedule in delivering services to DCS customers, the Risk Assessment should be updated to elevate the level of risk and influence the manner in which the contract is monitored. Likewise, if a contractor is well ahead of schedule in delivering certain services to the targeted population, the Risk Assessment should be updated to lower the level of the risk assessed. In addition, corresponding mitigation strategies should be developed as a result of completing the Risk Assessment. Examples of mitigation strategies included in the Atos contract are requirements for (a) minimum levels of contractor insurance, (b) representation of contractor statements to avoid potential conflicts of

interest from contract execution to contract close-out, and (c) periodic verification of reported contractor performance against established service levels included in the executed contract.

For the DCS Atos contract, two risks assessments were developed in different formats. The initial Risk Assessment for the Atos contract was developed with risk factors and risk rankings by the Enterprise Contract Management staff; however, the document has not been updated. The second and current Risk Management Plan is under development by the DCS Program Risk Management Team, under the direction of the DCS Program Director. The team conducts periodic risk management meetings with no staff representation from the Enterprise Contract Management Section or the assigned Contract Manager for the contract. Without involvement, the assigned Contract Manager may not effectively coordinate the limited contract management resources to the most pressing high risk areas of the contract and is unable to reflect those high risk areas in the corresponding Contract Monitoring Plan. Continued involvement of contract management team members from the Chief Financial Office, Office of the General Counsel, Enterprise Contract Management, and the Multi-Sourcing Integrator (MSI) is essential to ensure that contract monitoring activities are adequately planned and coordinated based on the risk areas identified.

Contract Monitoring Plan for Contractor Performance

The Contract Monitoring Plan for the DCS Atos contract was not formalized to address (a) documentation and retention policies for ongoing performance and compliance reviews, and (b) the specifics related to oversight activities that cross DIR divisions and the MSI. This increases the risk of non-compliance with state statute and guidance from the State of Texas CPA Contract Management Guide (CMG) for developing a Contract Monitoring Plan for major contracts. A monitoring spreadsheet is referenced in the current version of the Contract Management Plan; however, the spreadsheet has not been populated since DIR is using Salesforce instead. Salesforce is the system of record for tracking and monitoring requirements and deliverables for the Atos contract. Typically, a Contract Monitoring Plan will define what will be monitored, the division or individuals responsible for completing monitoring activities, and the frequency of review. Monitoring activities or reports include expected outcomes, results of the review, gaps identified, and defined corrective actions to address such gaps. Although the MSI and other contract management team members review the contractor's performance consistently, monitoring reports are not always tracked in the Salesforce System to document support for the completed reviews. If documentation used for monitoring purposes is stored in another system or location, a reference to that other system or location should be included in a formal Contract Monitoring Plan.

Recommendations:

The DIR Chief Procurement Office (CPO), in coordination with the contract management team, should:

- A. Coordinate and participate with the DCS Program Risk Management Team to update the Atos contract Risk Assessment incorporating (a) results from ongoing contract

monitoring activities and reports, (b) identified risks inherent for changing service offerings, (c) feedback from DCS customers, and (d) trends in the nature of disputes and corrective actions.

B. Formalize and periodically update the Atos Contract Monitoring Plan to include:

- What to monitor (monitoring activities),
- Assignment of roles and responsibilities for planned monitoring activities, and activities required by the State of Texas CPA Contract Management Guide to ensure proper separation of duties are established for the performance and oversight of the activities required, including the performance and oversight activities of the Multi-Sourcing Integrator (MSI),
- Frequency of monitoring, and
- Reference to the system or location where monitoring reports are documented.

C. Periodically update the DCS Contract Management Plan to incorporate changes based on contract experiences and shifting conditions.

Management Response:

DIR management from the CPO agreed with Internal Audit's recommendations.

The action plans, estimated completion dates, and responsible DIR management staff are documented in Appendix D of this report.

Issue 2: Contract Management of Rate Changes

DIR implemented a cost-recovery payment methodology for the invoices Atos submits to DIR monthly. Atos provides DIR with an enterprise invoice that DIR, through the Multi-Sourcing Integrator (MSI), uses to create single invoices for each customer receiving DCS services. Single invoices are consolidated and include charges from all three DCS service providers:

- Atos, for data center services,
- MSI – Capgemini, for contract administrative costs, and
- Xerox Corporation, for print and mail services.

Customer invoices also include the DIR administrative fee/recovery fee, a fee DIR charges for managing the DCS Program. The DIR fee is shown separately from the DCS service providers' fees on the customer invoices. The invoicing and billing process for DCS Program services is complex and includes multiple levels of invoice review and validation. Examples of factors that contribute to the complexity of the billing and invoicing process include:

- The number of unique Resource Units³ (RUs) such as non-consolidated server storage, CPU hours, enhanced security hosted email, and related billing units.
- Chargeback rates⁴ applied to agreed-upon base volumes in addition to adjustments for Additional Resource Charges (ARC) or Reduced Resource Credit (RRC) based on actual customer consumption.
- Approved rate discounts for selected DCS customers for certain RU's based on services needed.
- Billing for newer RUs that are approved for billing but not yet set up in the Information Technology Financial Management (ITFM) System.
- The application of blended rates, that is, those rates on DCS customer invoices that represent a combined unit rate based on consumption billed by both Atos and the MSI.

An **Additional Resource Charge (ARC)** is a cost increase for incremental resource units above established baseline volumes.

A **Reduced Resource Credit (RRC)** is a cost decrease for resource units of service below established baseline volumes.

Source: DCS Atos Service Management Manual

According to DIR management, when a chargeback rate change occurs between contract amendments, as allowed by contract, the corresponding approvals and effective date for the rate changes are documented in a Contract Notification⁵ (CN) in Salesforce, the system used to track formal communications and contract deliverables for the Atos contract.

As part of the review and analysis performed to assess whether contract management activities were in place and operational in relation to the accuracy and completeness of Atos invoices, Internal Audit reviewed invoices from September 2015 through May 2016. Based on the review performed, the auditors noted the process for capturing, documenting, and validating rate changes that impact statewide billing was not sufficiently documented to be repeated by an independent reviewer without the assistance of a subject matter expert. In addition, CNs for rate changes were not tracked or logged in an organized manner with needed details such as: the justification for the change, approval details, the effective date of the change, and whether the rate change needs to be memorialized in a contract amendment. This level of detail helps facilitate independent reviews designed to validate that (a) each change was properly captured

³ **Resource Units (RUs)** are a measurable device, unit of consumption, or other unit or resource utilization associated with data center services that is used for purposes of calculating charges, including calculating ARCs and RRCs as described in the Atos Master Services Agreement (MSA) - Exhibit 4.

⁴ **Chargeback rates** are agreed upon monthly unit rates defined in Attachment 4-A of the Atos contract for base volume resource units. If actual consumption is higher than base volumes, ARC rates are applied to the monthly invoice and if actual consumption is lower than base volumes, RRC credits are applied to the monthly invoice.

⁵ The **Contract Notification (CN)** process is managed in the Salesforce system. Communications are recorded with approvals noted in the CN record, including those that relate to minor rate changes between service categories, as allowed by the contract.

and approved, (b) correct rates were applied to invoices based on their effective dates, and (c) unauthorized or unjustified changes were prevented or detected.

Recommendations:

The DIR Chief Procurement Office (CPO) should coordinate to:

- A. Develop and document a process for tracking, approving, and reporting on rate changes, including effective dates for those not yet reflected in formal contract amendments.
- B. Document roles and responsibilities for the rate change process, ensuring proper separation of duties for tracking, approval, and oversight functions.

Management Response:

DIR management from the CPO agreed with Internal Audit's recommendations.

The action plans, estimated completion dates, and responsible DIR management staff are documented in Appendix D of this report.

Issue 3: Management of Contract Deliverables

To determine whether adequate key contract management activities were in place and operational to ensure the Atos contract deliverables⁶ were properly inspected and approved, the audit team reviewed a sample of 25 contract deliverables for timely receipt, evidence of inspection, and documentation of acceptance of the deliverable within the established contractual timeframes.

Based on the review performed, the auditors noted that most of the contract deliverables were set up and tracked in the Salesforce System by the assigned Contract Manager or designee. The Salesforce System serves as the main document repository for tracking contract deliverables, and contains "deliverables details" with electronic date and time stamps.

The auditors also noted that for deliverables that were not accepted when initially received by the DIR staff, the Salesforce System included details referencing the reasons why the deliverable did not meet the acceptance criteria and other relevant information such as: extended deadlines, re-submissions, and references to mitigation plans, if required. However, the auditors noted that the Salesforce System did not always include the attachments needed to

⁶ Based on the Atos contract, **deliverables** include: (a) critical one-time and recurring deliverables that carry financial penalty when missed, (b) payment milestones, (c) interim milestones that include deliverables requiring approval along the way towards payment milestones or completion of critical deliverables, and (d) checkpoint milestones representing feedback milestones along the way toward interim milestones, payment milestones, or other critical deliverables. Deliverables are defined in the contract and typically include established timelines and associated deliverables credits (liquidated damages) for missed deadlines.

facilitate the independent review of supporting documentation for action items that were part of completed mitigation plans. Relevant attachments were sometimes stored in other locations such as the DCS Collaboration Portal (a portal managed by the MSI that is accessed by the DCS contractors, DIR staff, and DCS customers for collaboration purposes) or in a separate set of network folders under the control of the Contract Manager or designee.

Deliverables Tracked in Salesforce – Details Incomplete

For the Configuration Management Database (CMDB) contract deliverable, some Mitigation Plan action items open since 2013 were not completed. In some cases, supporting documents for action items noted as “completed” were not sufficiently documented in the Salesforce System. Upon the auditors’ request, DIR staff researched and reproduced documentation to support the action items were completed and fully addressed. Due to the DCS Program management is currently in the process of streamlining the management of the CMDB using automated tools to capture information about IT assets, some of the open items from the mitigation plans cannot be closed until these solutions are fully implemented.

Deliverables Not Tracked in Salesforce

In other cases, contract documents set up as “requirements” for submission to either DIR or the MSI with established deadlines within the Atos contract were not tracked in the Salesforce System. The following are examples:

- Service Provider Key Personnel reports (DCS Program management is made aware of key personnel changes),
- Personnel Project Matrix reports (updates about important changes in the contractor’s staffing levels are maintained in the DCS Collaboration Portal),
- Draft monthly invoices (discussed in monthly meetings but not stored in Salesforce), and
- Operating Level Agreement (OLA) meeting details (no longer required by DIR management).

Although management provided business reasons for not tracking each of the examples above in the Salesforce System, and indicated the reports are managed by responsible subject matter experts, documentation for management decisions about how these requirements are managed is needed as part of the formal DCS Contract Monitoring Plan for the Atos contract. This business practice is significant to show management’s due diligence in complying with contract requirements and statewide guidance for the effective management of contract deliverables. Additional details are provided below to describe the significance of each report as shown in the Atos contract provisions.

- **Service Provider Key Personnel and Personnel Project Matrix Reports**

The Service Provider Key Personnel and Personnel Project Matrix reports communicate key personnel changes and changes to contractor staffing levels, respectively. These reports are not currently tracked in Salesforce, the system of record for tracking contract deliverables. Based on the Atos contract, DIR should approve key personnel to ensure (a) qualifications of key personnel meet the minimum standards needed to perform contracted services, and (b) contract management activities are in place to guard against potential conflicts of interest. In addition, the contract requires Atos to report to DIR significant staffing level changes in a Personnel Project Matrix to ensure that DIR management staff is made aware of any changes that could negatively impact service delivery.

The DIR Enterprise Contract Management staff agreed that the contract requirement for changes in key personnel is important in performing the due diligence needed to prevent potential conflicts of interest and ensure the contractor has sufficient staffing levels to support service delivery. However, because of the team approach for contract management, Enterprise Contract Management staff relies on the DCS Program staff and other subject matter experts to manage the delivery and review of these reports and does not require that all copies of these reports be retained in the Salesforce System.

- **Draft Monthly Invoices**

Draft monthly invoices from Atos are received and discussed in monthly pre-invoicing meetings, and although a placeholder had been set up in the Salesforce System through the end of the contract term, they are not currently uploaded and tracked in the Salesforce System. Based on the Atos contract, a draft invoice should be provided to DIR “within five (5) business days after the end of each month in which services are provided. Thereafter, the service provider (Atos) shall present DIR with a draft invoice (the "Draft Invoice") for any charges and any Reduced Resource Credits (RRCs) that the service provider expects to include in the monthly invoice.”

In 2013, a management decision was made to continue requiring the receipt of a draft invoice within the established timeline, but DIR staff was no longer required to formally track the draft invoices in Salesforce. The DIR Finance staff emphasized that receipt of this deliverable by the fifth day of each month helps ensure that other invoicing tasks are completed timely. Accordingly, the DIR Enterprise Contract Management staff indicated they do not intend to remove this requirement from the contract.

- **Operating Level Agreement Regular Meetings**

Operating Level Agreement (OLA) meeting deliverables are also established in the Atos contract. The purpose of the OLA meetings, based on contract provisions, was to require service component providers (Atos) and the Multi-Sourcing Integrator (MSI), or Capgemini, to meet with DIR frequently enough to prioritize tasks, discuss changes and scheduling, identify problems and resolutions, and otherwise coordinate and cooperate in the development and implementation of DCS operations. Although a placeholder was

noted in the Salesforce System for tracking of OLA meeting deliverables through the end of the contract term, the DIR Enterprise Contract Management staff and staff from the Office of the General Council indicated that an *Agreement in Principle* was created allowing Atos and the MSI to manage OLA meetings without DIR's involvement. Therefore, the OLA regular meeting records are not currently tracked in Salesforce and are not required to be submitted by Atos.

Contract management best practices suggest that any agreements (such as the *Agreement in Principle*) related to the execution and enforcement of existing contract requirements with stated submission deadlines, should result in either a (a) formal amendment to the contract or (b) formal acceptance of risk by DIR management that is documented and made part of the contract management file.

Recommendations:

The DIR Chief Procurement Office (CPO), in coordination with the contract management team, should:

- A. Clearly define “contract deliverables” for tracking purposes and ensure required deliverables are received, inspected, and accepted based on established acceptance criteria.
- B. Select a repository to track all Atos contract deliverables and documentation supporting major contract requirements such as: attachments, staffing reports, contract amendments, decision documents, agreements in principle, support for completed mitigation plan action items; and if documents are stored in a location other than the official system of record (Salesforce), ensure the location of deliverables is part of the completed contract file.
- C. Develop standard periodic reports summarizing the contractor's compliance, including receipt and acceptance of key deliverables for the Executive Leadership Team (ELT) and DIR Board.

Management Response:

DIR management from the CPO agreed with Internal Audit's recommendations.

The action plans, estimated completion dates, and responsible DIR management staff are documented in Appendix D of this report.

Issue 4: Contract Management of Resource Units

One of the Multi-Sourcing Integrator's (MSI) contractual responsibilities is to prepare and validate the enterprise invoice and individual customer invoices monthly. To support the MSI in carrying out this responsibility, DIR developed and approved the Resource Unit (RU) validation

processes. Currently, the MSI receives data feeds from Atos for RU consumption and ensures that the files are successfully transmitted to them before a monthly RU review is conducted. Internal Audit inquired DIR staff and the MSI staff about whether an independent review of the Atos scripts that support the data feeds for RU consumption is performed to validate for example that non-billable units are properly excluded and documentation is retained for further review. The auditors learned that currently an independent review of the Atos scripts that produce RU data is not part of the formalized DCS Contract Monitoring Plan. Independent review of scripts used to accumulate RU volumes, especially for those with a high risk for misstatement, could provide additional assurance on the reliability of the automated controls over the systems used during the invoicing process.

Based on the review of RUs performed for one invoice during the scope period, the auditors noted that the accuracy of the Configuration Management Database (CMDB) – Asset Management Console and other tables referenced in the automated scripts are critical to ensure the billing process is accurate. During the review, the MSI provided the auditors with the following information related to the source application and database for the RU consumption reflected in a single enterprise invoice.

The single enterprise invoice listed 99 RUs noting that:

- 33 of the 99 RUs were identified as no longer billed,
- 51 RUs were billed based on information from the Remedy System⁷ (Service Catalog, Asset Management Console, and Contract Management Console), and
- 37 RUs were billed based on information from the Asset Management Console within the Remedy System.

For example, the billing methodology for Consolidated Server Storage includes pricing for unique RUs based on the service level (Gold, Silver, or Bronze) selected by the customer. Each RU has separate Annual Base Charges, ARC rates, RRC rates, and Monthly Resource Baselines Scripts. RU scripts are designed to exclude a portion of the system overhead from the total allocated storage billed to the DCS customer.

Resource Units are units of measure to describe the volume of Services for pricing purposes, i.e., a billing unit.

Examples of billing units for RU's are: CPU hours, billable server storage, and other per unit metrics established in the Atos contract based on customer consumption.

Source: DCS Atos Contract

⁷ The **Remedy System** is a self-service, e-ticketing incident, and service management system.

For the billing of Mainframe RUs, the MSI noted that scripts reference a separate table of excluded volumes maintained by Atos that is periodically updated through work orders from the Remedy System.

Atos, in the performance of their contract responsibilities, recompiles and produces the system code used to apply RU exclusions and inclusions. Per the MSI, DCS customers can open tickets in the Remedy System to add exclusions to their RUs, as necessary. As part of the monthly review process, Atos sends a confirmation email showing the total volume in a data feed to the MSI and after the data feed file is loaded into the Information Technology Financial Management (ITFM) System, the MSI validates that the amount of volume received by the ITFM System matches the amount of volume transmitted by the feed. The feed file amount of volume and the total of volume in the ITFM System is documented in an invoice checklist managed by the MSI. DIR staff reviews this checklist during the draft invoice review meetings and during the monthly invoice validation process performed by DIR staff.

Quality checks can vary depending on the RU reviewed. As an example of the review performed, Atos loads the Hardware Service Charge (HSC) Dedicated and HSC Dedicated Slot data feeds directly into the DCS Collaboration Portal. The MSI opens the feed files and performs a quality check on what is included. The MSI opens submitted Remedy tickets for HSC Dedicated and HSC Dedicated Slots charges from the Information Technology Service Management (ITSM) System to confirm multiple items such as whether the (a) Configuration Item (CI) status is correct, (b) payment option is correct, (c) amounts look correct, (d) DCS customer approved the charges, and (e) DCS customer code ties to the correct DCS customer.

On a monthly basis, the MSI researches the cause of significant fluctuations, if any, in customer RU volumes that are noted based on historical usage patterns and determines whether current billable volumes are reasonable. In addition, details from the CMDB records (billable storage) and/or submitted service tickets for added or changed services during the month are reviewed to identify the cause of changes in RU volumes. Due to the MSI provides financial management services to the DCS Program as part of its contractual responsibilities, any monitoring and validation activity over the monthly invoice process should be performed by a different entity other than the MSI invoicing team. This separation of financial duties can ensure proper segregation of administrative and oversight functions.

Recommendations:

The DIR Chief Procurement Office (CPO) should:

- A. Require the independent review of system tools or scripts used in Resource Unit (RU) calculations and ensure results are sufficiently documented for contract management oversight activities as part of the contract management file.
- B. Retain copies of the MSI monitoring reports as part of the contract management file.

Management Response:

DIR management from the CPO agreed with Internal Audit's recommendations.

The action plans, estimated completion dates, and responsible DIR management staff are documented in Appendix D of this report.

Issue 5: Contract Notifications in Salesforce

Contract Notifications (CNs) are maintained in the Salesforce System to document communications related to the Atos contract, including:

- 1) Audit requests from agencies for access to data centers or other DCS records,
- 2) Documentation or reports that DIR receives from Atos or Capgemini or
- 3) Communications about chargeback or other rate changes or other contract terms that may become part of a future contract amendment.

The auditors identified a population of 229 contract notifications in the Salesforce System for the period under review and noted that the number sequence of the CNs had two gaps in the population of records extracted from the system. CN-0352 and CN-0354 were missing from the dataset. According to DIR staff, the missing CNs were part of two test records entered into the Salesforce System that were subsequently deleted and could not be restored.

To ensure the integrity of the data in the production environment of the database, test records should not be entered into the production environment but in a development or testing environment. In addition, no records in a sequentially numbered tracking database should be deleted without proper formal authorization and complete disclosure of the business reason for needing to delete the records prior to deleting the record. CN records should be protected from accidental or unauthorized modification or deletion.

Unauthorized changes to a dataset may damage the integrity of the data and reduces the level of reliance on the accuracy and completeness of the information extracted from the system. Without strong restrictions for the deletion of CNs and other contract management records in the Salesforce System, the risk of errors not being detected increases.

Recommendation:

The DIR Chief Procurement Office (CPO) should:

- A. Ensure policy restricts the entry of test records into the contract database used for formal communications and monitoring activities.
- B. Require formal authorization to change or delete contract notifications in the Salesforce System by restricting the "delete" functionality of the system to authorized individuals only.

Management Response:

DIR management from the CPO agreed with Internal Audit's recommendations.

The action plans, estimated completion dates, and responsible DIR management staff are documented in Appendix D of this report.

Appendix A: Objectives, Scope, and Methodology

Objective 1

To provide assurance that key enterprise contract management controls were in place and operational.

The **audit scope** included:

- The Atos contract management control activities, deliverables, documented risk assessments, and management plans in place from September 2014 to July 2016.
- The base contract, critical contract deliverables (as defined by the Atos contract), and other contract transition or management plans, some with dates prior to September 2014.
- Financial transactions dated between April 2015 and May 2016, when Atos took assignment of the Xerox State and Local Solutions (XSLs) data center services contract.

The **audit methodology** included:

- Identifying contract management activities and controls in place during the period under review.
- Assessing the Atos Contract Management Plan (CMP), Risk Assessment, and related monitoring activities for adequacy.
- Assessing the reliability of the data in the information systems used to (a) track the contractor's performance and progress deliverables, (b) maintain DCS customers' hardware and software inventory, and (c) bill and reconcile customer invoices.
- Determining the controls over receipt, inspection, and timely acceptance of contract deliverables.
- Assessing the controls over the accuracy and completeness of the Atos invoices.

Objective 2

To determine whether DCS enterprise contract management activities complied with state law, agency policies, and contract requirements.

The **audit scope** included state statutes, rules, and other contract management guidance in effect during the period from September 2014 to July 2016.

The **audit methodology** included:

- Evaluating the DIR Chief procurement Office (CPO) compliance with:
 - Relevant sections of the Texas Government Code and Texas Administrative Code,

- The Contract Management Guide published by the State of Texas Comptroller of Public Accounts,
 - The contract between DIR and Atos SE (DIR-DCS-SCP-MSA-002), and
 - Internal policies and procedures.
- Assessing whether instances of non-compliance identified as part of the review of contract deliverables were appropriately escalated and resolved.
 - Reviewing the Atos payment methodology and the validation processes in place to assess compliance with accounting policies, procedures, and the State of Texas Prompt Payment Act.

Objective 3

To validate the implementation of the audit recommendations included in the Enterprise Contract Management Internal Audit Report No. 13-103.

The **audit scope** included verifying the hiring of contracting staff.

The **audit methodology** included:

- Reviewing staffing levels and hiring documentation.

Audit Criteria

Audit criteria used in the performance of this audit included:

- Texas Government Code
- Texas Administrative Code
- State of Texas Comptroller of Public Accounts – Contract Management Guide
- DIR contract with Atos SE and related amendments, attachments, and exhibits
- DIR’s Enterprise Contract Management Plan
- DCS Service Management Manual (SMM) and other documented policies and procedures

Appendix B: Contract Manager Responsibilities

The Contract Management Guide published by the State of Texas Comptroller of Public Accounts defines the primary contract manager responsibilities to include:

- Participating in developing the solicitation and writing the draft documents. Contract administration must be considered during this process.
- Consulting with legal counsel to address any legal concerns and/or issues.
- During solicitation development, determine if the contractor's compensation structure is appropriate for the work.
- Serving as the point of contact for disseminating the instructions regarding the work to the contractor/vendor.
- Receiving and responding to communications between the agency and the contractor.
- Managing, approving, and documenting any changes to the contract.
- Managing any state property used in contract performance, e.g. computers, telephones, identification badges, etc.
- Identify and resolve disputes with contractor in a timely manner.
- Implementing a quality control/assurance process.
- Maintaining appropriate records.
- Documenting significant events.
- **Monitoring the contractor's progress and performance to ensure goods and services conform to the contract requirements.**
- Exercising state remedies, as appropriate, when a contractor's performance is deficient.
- **Inspecting and approving the final product/services by submitting a written document accepting the deliverables.**
- Monitoring the budgeting/accounting process to ensure sufficient funds are available.
- **Verify accuracy of invoices and authorize payments consistent with the contract terms.**
- Performing contract closeout process ensuring the contract file contains all necessary contract documentation, formal acceptance documented, and document lessons learned.

Based on the project risk assessment results, the audit scope focused on the contract management activities highlighted in dark color above.

Appendix C: Glossary

The glossary provides key terms referenced in the audit report. Definitions were obtained from the master services agreement, state rules and regulations, ITIL® and other relevant guidance or professional standards.

Additional Resource Cost (ARC) – A cost increase for incremental resource units that a DCS customer consumed in a given period above established baseline volumes, as defined in the Atos contract.

Configuration Item (CI) – Any component or other service asset that needs to be managed in order to deliver an IT service. Information about each configuration item is recorded in a configuration record within the configuration management system and is maintained throughout its lifecycle by service asset and configuration management. Configuration items are under the control of change management. They typically include IT services, hardware, software, buildings, people, and formal documentation such as process documentation and service level agreements.

Configuration Management Database (CMDB) – A database used to store configuration records throughout their lifecycle. The configuration management system maintains one or more configuration management databases, and each database stores attributes of configuration items and relationships with other configuration items.

Deliverables – Contract deliverables include: (a) critical one-time and recurring deliverables that carry financial penalty when missed, (b) payment milestones, (c) interim milestones that include deliverables requiring approval along the way towards payment milestones or completion of critical deliverables, and (d) checkpoint milestones representing feedback milestones along the way toward interim milestones, payment milestones, or other critical deliverables. Deliverables are defined in the contract and typically include established timelines and associated deliverables credits (liquidated damages) for missed deadlines.

IT Infrastructure – All of the hardware, software, networks, facilities etc. that are required to develop, test, deliver, monitor, control or support applications and IT services. The term includes all of the information technology but not the associated people, processes, and documentation.

Multi-Sourcing Integrator (MSI) – The Multi-Sourcing Integrator acts to standardize processes and to provide service delivery management, service desk support, project management, disaster recovery, and financial management services. The MSI coordinates data center services for mainframes, servers, networks, print and mail, and data center operations provided by multiple service component providers.

Reduced Resource Credit (RRC) – A cost decrease for resource units that a data center services customer consumed in a given period below established baseline volumes.

Remedy System – DIR's self-service, e-ticketing incident, and service management system.

Resource Unit (RU) – A measurable device, unit of consumption, or other unit or resource utilization associated with data center services that is used for purposes of calculating charges, including calculating ARCs and RRCs, as described in the Atos Master Services Agreement - Exhibit 4.

Risk Assessment – Risk assessment is the identification and analysis of relevant risks to achievement of the objectives, forming a basis for determining how the risks should be managed. Because economic, industry, regulatory and operating conditions will continue to change, mechanisms are needed to identify and deal with the special risks associated with change.

Service Management Manual – A virtual management policy and procedures manual for the delivery of data center services. The manual is maintained on the Data Center Services Collaboration Portal and includes detailed procedure documents for invoicing and resource unit validation.

Validation – An activity that ensures a new or changed IT service, process, plan or other deliverable meets the needs of the business. Validation ensures that business requirements are met even though these may have changed since the original design.

Verification and Audit – The activities responsible for ensuring that information in the configuration management system is accurate and that all configuration items have been identified and recorded. Verification includes routine checks that are part of other processes – for example, verifying the serial number of a desktop PC when a user logs an incident. Audit is a periodic formal check.

Appendix D: Management Responses

Action Plans

Planned course of action to address the recommendation.

Estimated Implementation Dates

Date on which the action plan will be finished.

Responsible Management Staff

Manager responsible for the implementation and execution of the action plan.

Recommendation	Action Plan	Estimated Implementation Date	Responsible Management Staff (Functional Title, Division Name)
Issue 1: Contract Management Plan and Risk Assessment			
A. Coordinate and participate with the Data Center Services (DCS) Program Risk Management Team to update the Atos Contract Risk Assessment incorporating (a) results from ongoing contract monitoring activities and reports, (b) identified risks inherent for changing service offerings, (c) feedback from DCS customers, and (d) trends in the nature of disputes and corrective actions.	Work with the DCS Program Risk Management Team to identify and mitigate contract risks. The process will be formalized to include a yearly update to the Atos Contract Risk Assessment.	8/31/2017	DCS Contract Manager, Enterprise Contract Management (ECM), Chief Procurement Office (CPO)
B. Formalize and periodically update the Atos Contract Monitoring Plan to include: <ul style="list-style-type: none"> What to monitor (monitoring activities) Assignment of roles and responsibilities for planned monitoring activities, and activities required by the State of Texas Comptroller of Public Accounts (CPA) Contract Management Guide to ensure proper separation of duties are established for the performance and oversight of the activities required, including the performance and oversight activities of the Multi-Sourcing Integrator (MSI). 	Develop separate Contract Management Plans (CMPs) for each DCS contract. Each CMP will address monitoring activities, roles and responsibilities, frequency, and will include references or links to the location of documents that are crucial to the monitoring of the contract. Conduct a yearly review to update the CMPs to ensure that they are up to date and reflect new and ongoing risks, vendor performance, changes in resource requirements, policy changes, changes related to controls, process changes, and other factors	8/31/2017	Director, ECM, CPO

Recommendation	Action Plan	Estimated Implementation Date	Responsible Management Staff (Functional Title, Division Name)
<ul style="list-style-type: none"> • Frequency of monitoring, and • Reference to the system or location where monitoring reports are documented. 	<p>that impact contract monitoring.</p> <p>Note: As of this writing, the CPO is implementing a new contract management practice requiring separate CMPs for each DCS contract. The Office will transition from a single DCS CMP (referenced throughout this report) which governs the monitoring of the various DCS contracts to separate CMPs for each DCS contract, including the Multi-Sourcing Integrator (MSI) contract and each Service Component Provider (SCP) contract. This practice further supports Texas Government Code (TGC) 2261.253, which addresses enhanced contract monitoring. The CMPs are intended to supplement, not to replace, the Contract Management Handbook, which addresses compliance with TGC 2261.256.</p>		
<p>C. Periodically update the DCS Contract Management Plan to incorporate changes based on contract experiences and shifting conditions.</p>	<p>Conduct a yearly review to update the CMPs to ensure that they are up to date and reflect new and ongoing risks, vendor performance, changes in resource requirements, policy changes, changes related to controls, process changes, and other factors that impact contract monitoring.</p>	8/31/2017	DCS Contract Manager, ECM, CPO
Issue 2: Contract Management of Rate Changes			
<p>A. Develop and document a process for tracking, approving, and reporting on rate changes, including effective dates for those not yet reflected in formal contract amendments.</p>	<p>Develop and document a process for tracking, approving, and reporting on rate changes, including effective dates for those not yet reflected in formal contract amendments.</p>	3/31/2017	DCS Contract Manager, ECM, CPO

Recommendation	Action Plan	Estimated Implementation Date	Responsible Management Staff (Functional Title, Division Name)
B. Document roles and responsibilities for the rate change process, ensuring proper separation of duties for tracking, approval, and oversight functions.	Document roles and responsibilities for the rate change process, ensuring proper segregation of duties for tracking, approval, and oversight functions.	3/31/2017	DCS Contract Manager, ECM, CPO
Issue 3: Management of Contract Deliverables			
A. Clearly define “contract deliverables” for tracking purposes and ensure required deliverables are received, inspected, and accepted based on established acceptance criteria.	Update the DSC CMPs to clearly define how deliverables and contract work products are defined, tracked, inspected, and accepted.	3/31/2017	DCS Contract Manager, ECM, CPO
B. Select a repository to track all Atos contract deliverables and documentation supporting major contract requirements, such as: attachments, staffing reports, contract amendments, decision documents, agreements in principle, support for completed mitigation action plan items; and if documents are stored in another location other than the official system of record (Salesforce), ensure the location of deliverables is part of the completed contract file.	Update the DCS CMPs to clearly define how deliverables and other contract work products – not necessarily tracked as deliverables – are managed and tracked. Note: While the Salesforce System is the official system of record for certain deliverables, the DCS Collaboration Portal is also considered an official system of record for certain reports. Contract deliverables and other work products will be maintained on the DCS Collaboration Portal in accordance with the DIR Records Retention Policy and requirements under the contract.	3/31/2017	DCS Contract Manager, ECM, CPO
C. Develop standard periodic reports summarizing the contractor’s compliance, including receipt and acceptance of key deliverables for the Executive Leadership Team (ELT) and DIR Board.	Develop and present vendor performance reports to the DIR Board Subcommittee on an annual basis that include, at a minimum, the contractor’s compliance, including receipt and acceptance of key deliverables. These reports may also be used to report vendor	8/31/2017	DCS Contract Manager, ECM, CPO

Recommendation	Action Plan	Estimated Implementation Date	Responsible Management Staff (Functional Title, Division Name)
	performance to the Texas CPA Vendor Performance Tracking System.		
Issue 4: Contract Management of Resource Units			
A. Require the independent review of system tools or scripts used in Resource Unit (RU) calculations and ensure results are sufficiently documented for contract management oversight activities as part of the contract management file.	<p>DIR Finance will modify the RU validation process with a concentration on confirming the tools, scripts, and processes used to generate RU volumes have not changed. Changes to the tools, scripts and/or processes will be approved by DIR and documented in an Information Technology Service Management (ITSM) ticket.</p> <p>DIR will ensure the DCS CMPs include documentation of the RU validation process, roles and responsibilities, frequency, and reference to an ITSM ticket.</p>	3/31/2017	DCS Contract Manager, ECM, CPO
B. Retain copies of MSI monitoring reports as part of the contract management file.	<p>Require the MSI to retain reports on the DCS Collaboration Portal, considered to be part of the official system of record. Deliverables and other work products will be maintained on the portal in accordance with the DIR Records Retention Policy and requirements under the contract.</p> <p>Specifically, require the MSI to document and retain records associated with the review of system tools or scripts used in invoicing calculations.</p>	3/31/2017	DCS Contract Manager, ECM, CPO
Issue 5: Contract Notifications in Salesforce			
A. Ensure policy restricts the entry of test records into the contract database used for formal	Update the DIR policy to restrict the entry of test records into the contract	1/31/2017	Manager, Compliance, Reporting and

Recommendation	Action Plan	Estimated Implementation Date	Responsible Management Staff (Functional Title, Division Name)
communications and monitoring activities.	production database. Implement appropriate change management controls to protect the integrity of production data. Limit use of production database for testing to only those instances where there is no feasible manner to test in a non-production environment, only with appropriate executive approval and justification documented and retained for audit trail purposes.		Analytics, and Special Projects, CPO
B. Require formal authorization to change or delete contract notifications in the Salesforce System by restricting the “delete” functionality of the system to authorized individuals only.	Update the DIR policy to restrict the entry of test records into the contract production database. Implement appropriate change management controls to protect the integrity of production data. Limit use of production database for testing to only those instances where there is no feasible manner to test in a non-production environment, only with appropriate executive approval and justification documented and retained for audit trail purposes.	1/31/2017	Manager, Compliance, Reporting and Analytics, and Special Projects, CPO

Appendix E: Report Distribution

Internal Report Distribution

Department of Information Resources (DIR) Board

DIR Executive Director

DIR Deputy Executive Director/Texas Chief Information Officer

DIR Chief Procurement Officer

DIR Chief Operations Officer

DIR Chief Financial Officer

DIR Enterprise Contract Management Director

DIR Data Center Services Director

External Report Distribution

Texas Office of the Governor

Texas Legislative Budget Board

Texas State Auditor's Office

Texas Sunset Advisory Commission