System Implementation Plan for the Prosecutor Case Management System

The Prosecutor's Office is responsible for managing thousands of cases annually. This includes felonies, misdemeanors, infractions, and juvenile matters. The current case tracking and document storage processes rely heavily on aging systems that lacks modern integration, automation, and real-time reporting capabilities. This creates operational inefficiencies, delayed communication between departments, and difficulty maintaining accurate and accessible records.

This System Implementation Plan proposes the development and phased deployment of a new web-based Prosecutor Case Management System (PCMS). PCMS will serve to centralize all prosecutorial data in a secure, cloud-accessible environment, which allows authorized personnel to manage, track and share case information efficiently. The system will directly interface with Odyssey, Indiana's statewide judicial case management system (otherwise known as MyCase), ensuring real-time synchronization of case statuses, filings, and cause numbers.

The project follows the Systems Development Life Cycle (SDLC) framework to ensure structured planning, execution, and quality assurance. The implementation approach selected for this initiative is the Phased Implementation Method, chosen due to the complexity of legal data, multi-departmental collaboration, and the need for uninterrupted court and prosecutorial operations.

This document provides a breakdown of the system's implementation plan, including development methodology, risk mitigation, data migration, testing, debugging, and post-implementation evaluation. The objective is to design and implement a reliable and efficient system that enhances workflow, protects sensitive legal data, and ensures compliance with state and federal security standards.

Project Overview

This project aims to replace the current legacy processes with a modern web-based Prosecutor Case Management System (PCMS). PCMS will serve as the core database and workflow hub for the Prosecutor's Office, designed to link seamlessly with Odyssey, law enforcement agencies, and other authorized judicial partners. Through this integration, prosecutors will be able to receive, store, and update case data in real time while ensuring strict adherence to confidentiality and data security standards established under Indiana and federal law.

The proposed system will provide a centralized interface for managing case filings, charging documents, motions, discovery materials, and correspondence. It will also automate routine administrative tasks such as docket updates, discovery packet creation, and report generation. Additionally, the system will provide secure user roles for prosecutors, deputies, paralegals, records clerks, and administrative staff. Each user will have tailored access to information relevant to their position, preventing unnecessary exposure of sensitive data.

The overall purpose of this project is to design a sustainable, secure, and scalable system that streamlines prosecutorial operations while supporting data integrity and public accountability. Through careful planning, phased implementation, and continuous evaluation, the PCMS will provide a foundation for future system enhancements and technological integrations.

System Implementation within the SDLC

The first stage of the SDLC is planning and requirement analysis. During this phase, interviews were conducted with prosecuting attorneys, records clerks, and administrative staff to identify current workflow pain points. Common challenges included difficulty tracking case

status updates, inefficiencies in discovery exchanges, inconsistent naming conventions for files, and a lack of integration with Odyssey. These findings provided the foundation for defining system requirements, data needs, and process improvements.

The second stage is system design. This stage focuses on translating business and legal requirements into detailed system architecture. PCMS will feature a web-based interface developed in Java and HTML5, supported by a MySQL database for secure data storage. The design will include user role management, authentication, case tracking modules, and automated data exchange with Odyssey. All interfaces will adhere to usability and accessibility standards appropriate for government information systems.

The development phase involves programming and integrating the application components. Developers will build each system module using a combination of Java-based backend services and front-end web technologies. The focus will be on modular design to allow independent testing and easy future updates.

The testing phase ensures that each component meets the requirements identified in the planning stage. Testing will include unit testing for code validation, integration testing for system interoperability, and user acceptance testing (UAT) with prosecutors and staff. These tests will confirm that the system operates as expected, maintains data integrity, and provides accurate synchronization with Odyssey.

The implementation and deployment stage will follow a phased approach, gradually introducing the PCMS to different divisions within the Prosecutor's Office. This method allows the office to identify and address minor issues before the full rollout, minimizing disruptions to ongoing operations.

Finally, the maintenance and review phase ensures continuous improvement and long-term system performance. Once deployed, the system will be monitored regularly for updates, patches, and performance optimization. User feedback will be collected through quarterly reviews to identify areas for refinement or enhancement.

Development Methodology and Justification

For this project, the chosen development methodology is the Phased Implementation Approach. The Phased Implementation method divides the project into sequential, manageable stages, allowing each functional component of PCMS to be developed, tested and deployed separately. In the context of the Prosecutor's Office, this means that modules such as case entry, document management, discovery and Odyssey integration will be rolled out in distinct phases. This approach ensures that the existing operations continue uninterrupted while new capabilities are introduced incrementally.

One of the primary reasons for selecting this method is the critical nature of prosecutorial data. Errors or downtime during implementation could disrupt case filings, delay court proceedings, or jeopardize legal compliance. By implementing the system in phases, each department can transition to the system while maintaining access to existing records. For example, the records division may adopt the document upload and classification features first, followed by prosecutors who will later transition to digital case tracking and automated filings.

The phased approach also allows for comprehensive user training at each stage. Staff members can adapt to new system functions gradually, reducing resistance to change and improving user confidence. This is particularly important in a legal office environment where employees have varying levels of technical expertise. Training sessions and simulation exercises

will accompany each deployment phase to ensure that users understand system operations and security protocols.

Additionally, the phased methodology supports continuous quality assurance. Each stage includes its own cycle of development, testing, feedback, and correction. This allows project managers and developers to make informed decisions before moving to the next phase, significantly reducing the likelihood of widespread errors.

In terms of cost and resource management, the phased approach provides better financial control. Resources can be allocated gradually across development milestones rather than committing the full budget upfront. This flexibility allows the office to evaluate progress and performance before further investment.

Lastly, the phased implementation supports incremental integration with Odyssey.

Because Odyssey is a statewide system with strict data synchronization and formatting rules, implementing this integration in phases ensures that each data exchange pathway is fully validated before full automation.

By selecting the Phased Implementation Approach, the Prosecutor's Office ensures a stable, secure, and manageable transition from its legacy processes to the modern, web-based PCMS. The approach balances innovation with reliability, aligning perfectly with the operational needs and legal responsibilities of the office.

The primary goal of this project is to implement a modern, web-based management system that will allow users to increase their efficiency, improves data accuracy and enhances communication between the Prosecutor's Office and other judicial entities such as the courts, law

enforcement and the Indiana Odyssey network. The project planning stage focuses on defining clear objectives, resource allocation and a strategy to guide implementation from start to finish.

The first objective is to establish a centralized and secure system that can house all prosecutorial case data in a single, accessible environment. This includes case filings, discovery materials, court communications, and correspondence. PCMS will eliminate the need for multiple disjointed systems by consolidating records and streamlining workflows.

The second objective is to ensure seamless integration with Odyssey. Odyssey serves as the statewide judicial system used by Indiana courts, and integrating PCMS with it will allow prosecutors to synchronize cause numbers, case statuses, and filing information automatically. This integration will reduce manual data entry, minimize typographical errors, and enhance transparency across agencies.

The third objective is to enhance data security and compliance. Given the sensitive nature of criminal case information, the PCMS must adhere to strict security protocols, including user authentication, encrypted communication, and controlled access levels. The system will also incorporate role-based access control, ensuring that prosecutors, clerks, and administrative staff can only view or modify data relevant to their duties.

To achieve these objectives, the project will be managed through a combination of personnel, technology, and external support. The Systems Implementation Consultant, serving as project lead, will coordinate development, oversee data migration, and ensure system functionality aligns with user needs. Developers will be responsible for designing the web interface and backend database architecture using Java and MySQL technologies. Database administrators will oversee data structuring, indexing, and query performance. IT administrators

will manage network security, user access, and maintenance after deployment. Legal staff, including prosecutors and clerks, will participate in user acceptance testing and provide feedback throughout each implementation phase.

Resource allocation will follow a structured plan to ensure both human and technical assets are efficiently utilized. Funding will primarily support software development, testing infrastructure, training, and data migration. Secondary resources will include cloud storage for web hosting, secure VPN access for remote users, and backup systems to ensure data redundancy and continuity in case of unexpected outages.

An implementation schedule will be developed that maps project milestones to resource usage, ensuring that development, testing, and deployment remain aligned with the approved timeline and budget. Regular progress reports will be issued to stakeholders to maintain transparency and accountability throughout the project.

The overall planning strategy focuses on achieving a balance between modernization and operational stability. The Prosecutor's Office must continue its daily operations during the implementation period, which makes careful resource scheduling and phased deployment essential. By emphasizing collaboration, risk management, and structured progress tracking, the planning process provides a solid foundation for the successful deployment of the PCMS.

Risk Assessment and Mitigation Plan

Every system implementation project carries risks that can affect its success. Identifying and mitigating these risks early helps prevent delays, cost overruns, and operational disruptions. The Prosecutor's Office PCMS project has several potential risks associated with technical performance, data migration, user adoption, and integration with existing systems like Odyssey.

The first significant risk is data migration failure or corruption. Because PCMS will replace portions of the existing record systems, large volumes of data will need to be migrated, including case histories, motions, filings, and attachments. Inaccurate mapping or incomplete transfers could lead to data loss or inconsistencies. To mitigate this risk, data migration will be tested in multiple controlled environments before the final load. Verification scripts will be used to confirm that records match the source system, and all legacy data will be backed up in its original form before conversion.

A second major risk is integration failure with Odyssey. The PCMS must communicate with Odyssey's APIs to exchange case data, and any technical misalignment could interrupt the data flow. This risk will be managed through close coordination with the Indiana Court Technology Office, ensuring that integration follows approved data standards. Initial testing will be conducted with limited, non-critical case data to confirm accurate synchronization before live deployment.

Another risk involves user resistance to change. Staff accustomed to legacy systems may struggle to adapt to new processes. To address this, the project will include comprehensive user training and a support program during each phase of rollout. Training sessions will combine classroom instruction with hands-on practice to build user confidence and ensure consistent adoption.

Cybersecurity threats also represent an ongoing risk. Because the PCMS will contain sensitive personal and criminal data, any unauthorized access or data breach could have serious consequences. The mitigation strategy includes implementing end-to-end encryption, multifactor authentication, and regular security audits. The system will comply with Criminal Justice Information Services (CJIS) standards and will maintain detailed access logs for auditing.

Project timeline risks will be managed through the phased approach, which reduces the likelihood of total project failure by limiting each deployment to specific modules. If an issue occurs in one phase, it can be addressed without halting the entire system's progress. Regular milestone reviews will help track progress and allow early identification of potential scheduling conflicts or technical barriers.

Budgetary risks will be minimized through incremental spending tied to milestones. This method ensures that funds are only allocated when a specific deliverable or phase has been successfully completed and approved.

Finally, post-implementation performance issues will be addressed through ongoing monitoring and a dedicated IT maintenance team. System logs, uptime metrics, and user feedback will be reviewed regularly to ensure optimal operation.

By identifying these risks and developing proactive mitigation strategies, the Prosecutor's Office will be well-positioned to complete the PCMS implementation on schedule, within budget, and with minimal disruption to daily operations.

Implementation Timeline and Gantt Overview

The implementation of the Prosecutor Case Management System (PCMS) follows a structured timeline aligned with the Phased Implementation approach. The total project duration is estimated to span ten months, beginning with planning and analysis and concluding with post-implementation review and training. Each phase builds upon the previous one to ensure that no part of the process is rushed or overlooked.

The planning and requirement analysis phase will last approximately one month. During this time, meetings will be conducted with prosecutors, clerks, records staff, and IT personnel to finalize the list of system requirements and define the project scope. This phase will also include an evaluation of the existing data sources and the development of the migration strategy.

The system design phase will take approximately two months. During this stage, developers will create the architecture and data structure of the PCMS. The web interface design, database schema, and Odyssey integration framework will be finalized. Accessibility, security, and data flow diagrams will also be created during this time.

The development phase will span three months. This stage will include coding of the web-based modules, including login authentication, role-based dashboards, case management screens, document upload functionality, and Odyssey data synchronization components. The database team will simultaneously implement the MySQL database schema and begin importing sample datasets for testing.

The testing phase will follow development and continue for approximately two months. Unit testing, integration testing, and user acceptance testing (UAT) will be conducted. The testing phase will involve staff members from various divisions, allowing them to provide feedback on usability, accuracy, and performance. Any issues identified during testing will be documented and corrected before moving forward.

The implementation and deployment phase will extend over two months. The phased rollout will begin with a pilot group, such as the misdemeanor division, before expanding to felony, juvenile, and records divisions. Training sessions will occur concurrently, ensuring that users are fully prepared before each phase of deployment.

Finally, the post-implementation review and maintenance phase will occupy the last month of the timeline. This phase will involve system monitoring, performance evaluations, and fine-tuning of data synchronization with Odyssey. A post-deployment review will be conducted to identify areas for improvement, and long-term maintenance schedules will be established.

The Gantt summary of the timeline can be described as follows:

- 1. Month 1: Planning and Requirements
- 2. Months 2–3: System Design
- 3. Months 4–6: Development
- 4. Months 7–8: Testing
- 5. Months 9–10: Implementation and Post-Deployment Review



Throughout the project, progress meetings should occur every two weeks. These meetings will include key stakeholders from the Prosecutor's Office and the IT department. Milestone reviews will ensure accountability and confirm that deliverables are on track before moving to the next stage.

Installation and Transition Plan

The installation and transition plan for the Prosecutor Case Management System is designed to maintain operational continuity within the Prosecutor's Office. Given the office's ongoing case responsibilities and dependence on accurate recordkeeping, the system transition must be executed with precision and minimal disruption.

The installation strategy will follow a Phased Rollout approach, where different divisions within the Prosecutor's Office transition to PCMS sequentially. This ensures that if issues arise during one phase, they can be resolved before the system is expanded to other departments. The phased approach also reduces the likelihood of data confusion and system downtime.

During the first phase, the system will be deployed to the records division. This division serves as the foundation for document intake, case entry, and general file management.

Deploying here first allows the project team to confirm that all essential case data can be accurately entered, stored, and retrieved through the system. Once the records team is fully trained and system performance is verified, deployment will proceed to the misdemeanor division, followed by the felony, juvenile, and administrative divisions.

Each installation phase will include a period of parallel operation, during which both the old and new systems will be active. This parallel period allows staff to verify the accuracy of case data and become comfortable with interface. It also provides a safety net in case of technical issues, ensuring that no critical information is lost during the transition. Once performance metrics and user confidence reach acceptable levels, the old system will be retired, and PCMS will become the primary system of record.

The installation plan also includes detailed procedures for system setup and verification.

The IT department will first configure the web server environment, database connections, and

security protocols. Firewalls, VPN access, and SSL certificates will be configured to protect all data transmissions. Database administrators will then verify schema creation and test database connectivity before importing production data.

User accounts will be created in advance, with role-based permissions reflecting each employee's responsibilities. During the installation of each phase, only the users assigned to that division will have access, minimizing the risk of unauthorized data exposure.

Following each successful phase deployment, performance tests will be conducted to monitor response time, uptime, and data integrity. Any anomalies detected will be logged, analyzed, and corrected before continuing to the next phase.

Throughout the transition, the office will receive continuous support from the implementation consultants and IT administrators. Regular communication between developers and end users will ensure that system adjustments are made quickly and effectively.

By following this phased installation strategy, the Prosecutor's Office can transition from its legacy systems to PCMS with minimal disruption. This deliberate, structured process safeguards case data, maintains legal compliance, and ensures that every staff member is fully prepared to use the system before it becomes operational.

Data Migration Plan (ETL Process and Odyssey Integration)

The data migration plan for the PCMS is one of the most critical components of the entire implementation process. The Prosecutor's Office currently maintains data across several platforms and formats, including case files stored in the existing PCMS, scanned documents, local shared drives, and other departmental records. Migrating this information into PCMS will

require careful planning, cleansing, and validation to ensure that no records are lost or corrupted during transfer.

The extract phase involves pulling data from all existing sources. This includes exporting structured data from the legacy PCMS database, retrieving scanned documents from file servers, and identifying records stored in external systems such as Odyssey. During extraction, the focus will be on gathering all relevant case information, including case numbers, filing dates, defendant and victim details, charge information, motions, and correspondence. Each dataset will be reviewed to identify inconsistencies, incomplete fields, or duplicate entries.

The transform phase will involve cleaning and reformatting data to fit the system's schema. This includes standardizing field names, date formats, and case identifiers. Duplicate case files and redundant attachments will be removed to prevent clutter. The transformation process will also ensure that all data aligns with the naming conventions and field structures used in Odyssey so that synchronization between the two systems remains consistent. This phase will be guided by a data dictionary outlining every field in the database to guarantee accuracy.

The load phase will occur in a controlled environment. Data will be imported into PCMS in batches, allowing the development team to monitor progress and verify accuracy. Validation scripts will run automatically to confirm that record counts match and that relationships between defendants, charges, and case files remain intact. Before loading data into the live system, a test migration will be performed using sample datasets to identify any structural or mapping issues.

Integration with Odyssey is essential to the system's functionality. The PCMS will communicate with Odyssey through a secure application programming interface (API). This connection will enable the automatic retrieval and update of case data, including cause numbers,

case statuses, and court dates. The integration will allow prosecutors to submit filings electronically, receive court updates in real time, and track judicial actions without manual input.

All data transferred between PCMS and Odyssey will be encrypted to protect sensitive information.

To maintain data integrity, every migrated record will undergo a post-load verification process. Automated reports will compare record counts, key identifiers, and timestamps between the old system and PCMS. Random audits will also be performed manually to confirm that attachments and supporting files match the corresponding cases. In addition, backup copies of all original data will be stored on secure external drives before migration begins to prevent data loss in the event of an unforeseen error.

By following this detailed ETL and integration plan, the Prosecutor's Office can ensure that all case records are accurately transferred, securely stored, and immediately accessible through PCMS. The combination of automation, validation, and manual review will create a robust data migration process that supports both operational continuity and compliance with court technology standards.

Testing and Validation Plan

Testing is an essential part of system implementation and serves as the foundation for ensuring that the PCMS functions properly, meets user expectations, and maintains data integrity. The testing process for the Prosecutor Case Management System will occur in multiple stages and will involve technical staff, developers, and end users from the Prosecutor's Office.

The first stage is unit testing, which focuses on verifying that individual components of the system work correctly. Each feature, like the login module, case entry form, or document upload tool, will be tested independently to confirm that it performs as expected. This step will be handled primarily by the development team using automated testing scripts and manual checks.

The next stage is integration testing. Because PCMS connects to several systems, including Odyssey and the office's internal database, integration testing ensures that data flows correctly between components. For example, a test may confirm that when a prosecutor updates a case status in PCMS, the information is reflected accurately in Odyssey. Integration testing will also verify that external data imports and exports occur without data loss or format errors.

The third stage is system testing, which evaluates the overall performance and stability of the complete application. This testing ensures that the PCMS can handle simultaneous users, large file uploads, and concurrent data retrievals. System testing will also include security assessments to confirm that user authentication, encryption, and access restrictions are functioning as intended.

The final stage is user acceptance testing (UAT). This phase allows prosecutors, clerks, and administrative staff to interact with the system using real-world scenarios. Participants will test daily workflows such as case filing, document review, and discovery exchanges. Their feedback will help identify usability issues or missing features before the system's final deployment. UAT results will be documented, and developers will make necessary adjustments before the official rollout.

Two primary test cases will serve as models for evaluating system functionality. The first test case focuses on user authentication and access control. In this test, the system will confirm that users can successfully log in with valid credentials, that passwords are encrypted, and that

unauthorized users are denied access. Role-based access will also be tested to ensure that clerks, prosecutors, and administrators see only the information relevant to their roles.

The second test case focuses on case creation and Odyssey synchronization. This test will simulate the entry of a new case in PCMS and verify that the corresponding cause number and case data are automatically transmitted to Odyssey. The test will also check that updates from Odyssey are received correctly in PCMS, maintaining consistency between the two systems.

Additional tests will cover document uploads, error handling, and system recovery.

Automated testing tools such as JUnit and Postman will be used for API testing and validation.

Performance testing tools will evaluate response times under heavy workloads to ensure that the web-based PCMS remains responsive during peak hours.

All testing results will be documented in detailed reports and reviewed by the project manager, IT administrators, and office leadership. Testing will not be considered complete until all high-priority issues are resolved and the system performs reliably in both technical and operational aspects.

Conclusion

The implementation of the Prosecutor Case Management System represents a significant advancement for the Prosecutor's Office. Through the careful application of system design principles, project management methodology, and risk mitigation strategies, this project provides a sustainable and scalable framework for improving the efficiency, security, and accuracy of prosecutorial operations.

The introduction of a web-based PCMS that integrates directly with Indiana's Odyssey system will create a unified platform for case management, communication, and document

storage. This modernization effort will eliminate many of the inefficiencies associated with legacy systems, reduce the risk of data redundancy, and allow prosecutors and staff to access real-time case information securely. The Phased Implementation approach ensures that each stage of deployment is stable and fully tested before progressing, minimizing disruption to the office's critical functions and allowing staff to adapt comfortably to new workflows.

Beyond the technological improvements, this project supports the Prosecutor's Office's mission of serving the public with transparency and accountability. The system's detailed audit trail, role-based access controls, and integration with statewide court systems demonstrate a strong commitment to data integrity and compliance with state and federal standards. The training, documentation, and support built into the implementation plan further guarantee that staff members are fully prepared to operate within the digital environment.

The project also establishes a foundation for future growth. The modular design of the PCMS allows for continued enhancements, such as the integration of additional reporting tools, digital evidence management, and automated communication with law enforcement. These future capabilities will continue to strengthen the collaboration between agencies.

In conclusion, the successful implementation of PCMS will transform how the Prosecutor's Office manages their caseloads, information, and collaboration. This will also align with emphasizing their structure, security and user-centered design, this project ensures a smooth transition to modern technology while maintaining the highest standards of legal and ethical responsibility. The PCMS is not just a technological upgrade. It is an investment in the continued effectiveness, transparency, and reliability of the justice system.