SECTION 3

INFORMATION TECHNOLOGY PROJECTS

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SECTION 3 INFORMATION TECHNOLOGY PROJECTS 1

3.1 Technology Overview 1

3.2 Public Safety 6

2G70-059-000 Mobile Computer Terminal Project (E-911 - Fund) 6

3G70-078-000 E 9-1-1 Telephony Platform Replacement Project (E-911 - Fund) 7

3G70-079-000 Public Safety CAD System Infrastructure Project (E-911 - Fund) 9

2G70-021-000 and 2G70-022-000 Circuit Court Technology Project 10

2G70-034-000 Courtroom Technology Management Systems - Digital Upgrade 13

IT-000013 Police Records Management Refresh Project 14

IT-000014 Sheriff Civil Enforcement System Project 15

IT-000015 Commonwealth's Attorney Case Management System Project 16

IT-000043 General District Court (GDC) Online Dispute Resolution Pilot Project 17

IT-000047 Sheriff's Jail Management System Replacement Project 18

3.3 Corporate Enterprise 20

2G70-011-000 Automated Board Meeting Records Project 20

2G70-020-000 Internet/Intranet Initiatives Project – e-Government 21

2G70-041-000 Customer Relationship Management (CRM) Project 25

2G70-055-000 Volunteer Management System Project 26

2G70-069-000 Tax System Modernization Project – Tax/Revenue Administration 27

IT-000006 Office of Elections Technology Project 29

IT-000016 Budget Solutions Project 30

IT-000017 Enterprise Content Services Project (Previously Enterprise Doc Management) 32

IT-000028 GeoSpatial Initiatives 32

IIT-000033 Tax Portal Enhancements – Department of Tax Administration (DTA) 35

IT-000040 Tax Business Process Enhancements - Department of Tax Administration (DTA) 36

IT-000046 PCI Compliance 37

IT-000051 Department of TAX Administration Tax Relief 38

3.4 Technology Infrastructure 39

2G70-018-000 Enterprise IT Architecture and Support Project 39

2G70-036-000 Remote Access Project 40

2G70-052-000 Cyber Security Enhancement Initiative 41

IT-000034 Enterprise Data Analytics and Business Intelligence Project 41

IT-000044 HANA Fiori Mobile Project 42

IT-000045 Loadrunner Project 43

IT-000048 Digital Archives 44

3.5 Human Services 45
2G70-037-000 Child Care Technology Project – (NCS) 45
IT-000008 Child Welfare Integration Project (FROST) 47
IT-000025 Integrated Human Services Technology Project 48
IT-000026 Diversion First Interoperability Project 49
IT-000027 Health and Human Services Integrated Electronic Health Records Project 50
IT-000050 Department of Family Services Domestic/Sexual Violence E-Health Project 52
IT-000052 Housing Community Development Digitization Project 53
3.6 Planning and Development 54
2G70-040-000 Facility Maintenance Management System Project 54
IT-000010 Electronic Plan Submission and Review Project - Land Development Services (LDS) 55
IT-000011 ePlans Project – Department of Planning and Development (DPD) 56
IT-000019 Planning and Land Use System (PLUS Project) 57
IT-000035 FIDO Lifeline Project 59
IT-000042 Fairfax County Park Authority Asset (FCPA) Information Management System 59

3.1 Technology Overview

The Information Technology investment fund (Fund 100-C10040) was established in FY 1995 to optimize centralized management of available resources by consolidating major Information Technology (IT) projects in one fund. General Fund transfer, other revenue funds, the State Technology Trust Fund, and interest earnings are sources for investment in eligible Information Technology projects. In FY 2001, the E-911 Emergency Telephone Service Fee revenue and related project expenses were moved to Fund 400-C40091, to satisfy a state legislative requirement that E-911 revenues and expenditures be accounted for separately.

The County's technology improvement strategy has two key elements: redesign business processes and apply technology to achieve improvements in service quality and efficiencies and provide an adequate technology infrastructure that supports County technology solutions. The County's long-term commitment to provide quality customer service through the effective use of technology is manifested in service enhancements, expeditious response to citizen inquiries, round the clock on-line service opportunities, improved efficiencies, transparency, and data driven management decisions.

FY 2023 PROJECT FUNDING

Based on limited fiscal resources, IT projects (supported by Fund 100-C10040) are not included in the County's FY 2023 Budget Plan. Selected projects approved for FY 2023 funding will be supported with one-time balances and/or agency savings during quarterly budget reviews. This strategy enables the County to optimize the strategic use of available dollars and align project funding with project budgets, plans and schedules. FY 2023 IT Project requests are divided between those that were included in the County's FY 2022 Third Quarter Review package and others that will be considered as part of the FY 2022 Carryover Budget.

PRIORITIES

The funded projects meet one or multiple priorities established by the Senior Information Technology Steering Committee and include a mix of projects that benefit citizens, staff, and the need for maintaining a secure and strong technology infrastructure. The Senior IT Steering Committee, which is comprised of the County Executive, Deputy County Executives, the Chief Financial Officer, the Chief Technology Officer, and other senior County managers, adopted five strategic priorities that guide the direction of IT investments. These long-standing priorities include:

- **Mandated Requirements -** Provide support for requirements enacted by the Federal Government, Commonwealth of Virginia, Board of Supervisors, and those that are Court ordered or result from changes to County regulations.
- **Completion of Prior Investments -** Provide support for multi-year technology implementations, completion of planned phases of a project, and lease purchases.
- **Enhanced County Security -** Provide support for homeland security, physical security, information security, and cyber security solutions and privacy requirements.
- **Improved Service and Efficiency -** Promote consolidated business practices, support more efficient government, optimize management and use of County assets and data, enhance systems to meet the expectations and needs of citizens, and promote online services. This includes corporate and strategic initiatives that add demonstrable value to a broad sector of government or to the County, and improve productivity and/or enhance effective management of the County's information assets.

- **Maintaining a Current and Supportable Technology Infrastructure -** Focus on technology infrastructure modernization which upgrade, extend, or enhance the overall architecture of major County infrastructure components, including hardware, software, and its environment. Ensure that citizens, businesses, and County employees have appropriate access to information and services.

REVIEW AND APPROVAL

In line with FY 2023 Budget Guidelines, agencies were advised to submit new project funding requests that met one or more of the five above Senior IT strategic priorities; as well as specify tangible project outcomes, clear project start and completion dates, anticipated implementation and budget plans over the next five years, including subsequent fiscal year(s) impact on enterprise wide infrastructure, maintenance and support, and linkage to agency strategic and business goals. Agencies were further instructed to carefully evaluate urgency, feasibility, readiness, and the strategic business value of initiatives for which an IT Project funding request is submitted. FY 2023 funding requests for existing projects were limited to projects requiring additional support to meet existing contractual obligations, to complete a planned phase and where appropriate progress against existing project plans had occurred. The process is designed to facilitate the development of a solid business and technical case for IT project requests and to update the business and technical status for continuing projects.

In keeping with established procedures, a Project Review Team of senior business and technical staff from the Department of Information Technology (DIT) and the Department of Management and Budget (DMB) reviewed the project proposals. Requests were evaluated for those offering greatest opportunities for operational improvements and support for sustained performance, security, and reliability. Existing projects were also assessed for continued alignment with project plans, schedules and return on investment opportunities. Benefits were weighed against the cost and risk factors including potential changes in scope necessitated by new business drivers, technological relevance, operational changes, project schedule viability, and the impact of not funding or otherwise delaying the project. Technical factors included alignment with the County's technology architecture and standards, impact on existing County IT infrastructure, and availability of viable products and services. Also considered was the organizational experience with the solutions and the availability of staff resources to implement the project

FY 2023 PROJECT CATEGORIES

Thought the following approved projects meet numerous strategic priorities, for narrative purposes, the projects are listed in one of the following categories:

COMPLETION OF PRIOR INVESTMENTS

The County's IT program focuses on using technology as an essential tool to enable cost-effective delivery of services. While some projects can be completed within the fiscal year, most are multi-phase projects requiring more than one year of funding.

The **Courtroom Technology Project (2G70-034-000)** $375,000 FY 2023 funding request will be considered as part of the FY 2022 Carryover Budget. This project primarily supports continued deployment of digital Courtroom Technology Management Systems (CTMS) in courtrooms of the Fairfax County Courthouse. CTMS coordinates and enables remote evidence presentation in courtrooms through a centralized, integrated audio/video network of microphones, monitors, assistive listening devices, and flat screen displays.

FY 2022 Third Quarter funding of $300,000 supports the **Customer Relationship Management (CRM) Project (2G70-041-000),** an additional $200,000 will be considered as part of the FY 2022 Carryover Budget. CRM technology supports the County's strategic goal of improving on-line 24x7 access strategies, integrating social media tools and techniques to enhance the overall customer experience, and managing service requests via a single user enterprise-wide interface tool. This initiative provides a unified user approach to handling citizen's service requests, case management, issues tracking, and specialized Freedom of Information Act (FOIA) application to comply with a Commonwealth of VA mandate for local jurisdictions to track and monitor FOIA requests.

FY 2022 Third Quarter funding of $1,500,000 supports the **Integrated Electronic Health Record System (IT-000027)** Project. This multi-phase project provides for the acquisition and deployment of an electronic health record system for the Health Department. This project will optimize the potential value of leveraging a common information technology solution with the requisite configuration flexibility to enable health care providers to more effectively collaborate and coordinate the management of health care services for County residents.

ENHANCED COUNTY SECURITY

Support for cyber security initiatives and critical security requirements for enterprise-wide IT systems is a long-standing cornerstone of the County's strategic IT policy.

Planned funding of $500,000 at FY 2022 Carryover will support the **Cyber Security Enhancement Project (2G70-052-000)** to safeguard the County's IT assets from evolving cyber threats and support mandated regulatory compliance requirements. IT security continues to be a fundamental component of the County's enterprise architecture and strategy, fusing best practice principles with hardware and software infrastructure supported by policies, plans, and procedures. This project provides for IT security system requirements, replacements and upgrades, consulting expenses, and future security product and service acquisitions to protect the confidentiality, integrity and availability of County systems and information.

FY 2022 Third Quarter funding of $400,000 supports the **Police Records Management Refresh Project (IT-000013)**, and an additional $700,000 is planned as part of FY 2022 Carryover. This project supports replacement of the current Police Department Records Management System (LEADS) with the next generation case management solution that fully utilizes and supports the present and future police department needs and business processes and maintains close integration with the current 9-1-1 Dispatch (Computer Aided Dispatch – CAD) system.

IMPROVED SERVICE AND EFFICIENCY

Projects recommended for funding in this category provide improved service and efficiency in the provision of services to County residents and the business community. Many of these projects are multi-year initiatives and include projects supporting the County's e-government and public access programs, transparency efforts, strategic human services and land development initiatives, tax and revenue services, and technology efforts designed to improve County processes for enhanced efficiencies and service delivery.

The County's strategic **e-Gov Program (2G70-020-000)** is supported by $515,000 included in the FY 2022 Third Quarter Budget and an additional $400,000 will be considered during the County's FY 2022 Carryover Budget. This project supports the need to meet increasing demands for the County's web site, multiple e-government channels, e-transactions

services, improved navigation, web content management and synchronization, mobile applications, social media integration, transparency, Web 3.0, support of the County's intranet (FairfaxNet), and sustained compliance with Department of Justice (DOJ) Americans with Disabilities Act (ADA).

The **Enterprise Document Management Project (IT-000017)** project's $250,000 request will be considered as part of the County's FY 2022 Carryover Budget. This project supports a multi-phase implementation of a contemporary enterprise document management platform and its utilization in support of on-going County agencies' efforts for imaging documents and integration with case-management systems and/or agencies operations. This initiative also, provides for more cost-effective compliance with mandated document retention requirements. Current document imaging systems will be upgraded to latest versions and newer technology.

The County's **Geospatial Initiative (IT-000028)** is supported by $390,200 at FY 2022 Third Quarter, and will be considered for $1,000,000 funding as part of the FY 2022 Carryover Budget. Planimetric data layers make up many key GIS layers used in most of County maps including those used by the Police, Fire and Rescue, Transportation, Housing and Community Development, Public Works and Environmental Services, Planning and Development, and Tax Administration. Oblique imagery is also essential for many key critical County functions including public safety, zoning, tax administration, and 3D Virtual Fairfax. These key datasets and LiDAR are used in all County's web applications that incorporate maps, and in nearly all public safety vehicles through the Computer Aided Dispatch (CAD) 911 system.

FY 2022 Third Quarter funding of $700,000 supports continued work toward implementation of **Fairfax County Park Authority's (FCPA) Asset Management System (IT-000042)**. The scope of FCPA's asset information program includes Operations and Maintenance for a variety of park authority business areas, capital planning, construction management, and integration with enterprise County systems.

FY 2022 Third Quarter Funding of $50,000 supports **General District Court's Online Dispute Resolution (ODR) (IT-000043)**. The ODR system will implement a streamlined method for dispute resolutions in which parties can quickly mediate differences using an online platform and avoid repeated court appearances.

FY 2022 Third Quarter funding of $460,000 supports the **Tax Relief Project (IT-000051),** with expanded coverage and eligibility for the County's Tax Relief program, a new system is needed to streamline the processes and track applicants. This initiative will replace the current system used by the Department of Tax Administration with one that will include all approved Board of Supervisors' changes and able to integrate with the new Personal Property system and Real Estate system. The phased implementation includes scanning and indexing of documents, integration with DocuSign for signatures and workflow of applications.

FY 2022 Third Quarter funding of $100,000 supports the **Housing and Community Development's (HCD) Digitization Project (IT-000052)** which will improve HCD's document digitization efforts and augment the Housing Management and Financial programs. This is a multiphase, multi-year project to include all HCD business/program areas. This program will improve the efficiency, security, retention, and proper access to HCD documents and create automated archives for documents that are critical and must be kept on site.

FY 2022 funding of $200,000 supports the **Domestic and Sexual Violence Electronic Health Records Replacement Project (IT-000050),** this project will support of clinical services provided to victims of domestic and sexual violence, staking, and

human trafficking; and improve Domestic and Sexual Violence Services (DSVS) compliance with the federal privacy mandates in the Violence Against Women ACT (VAWA) related to security, encryption, privacy and retention of client records that contain personally identifying information on victims.

MAINTAINING A CURRENT AND SUPPORTABLE TECHNOLOGY INFRASTRUCTURE

The County's technology strategy leverages existing infrastructure with deployment of contemporary and supportable IT infrastructure to meet business needs. Projects funded in FY 2022 will support the goal of updating and strengthening the technology foundation where practical, and ensuring that residents, the business community, and County staff have appropriate and reliable access to information and services.

Funding of $100,000 at FY 2022 Carryover will be reviewed to support **Information Technology Training (2G70-006-000).** This project supports essential IT training required to maintain staff technical skills and required certification.

Funding of $200,000 at FY 2022 Third Quarter supports the DIT **Tactical Initiatives Project (2G70-015-000).** This project supports timely response to critical unexpected technology needs created by changes in agency business processes, non-IT initiatives with unexpected IT impact, response to state/federal mandates, new regulations and compliance requirements, and other system upgrades, infrastructure and/or integration requirements.

FY 2022 Third Quarter funding of $800,000 supports the **Enterprise Architecture and Support Project (2G70-018-000)** and an additional $800,000 will be reviewed as part of FY 2022 Carryover Budget. This project supports enterprise infrastructure and expert services for complex multi-phase business transformation IT systems for County general services, enterprise technology, security, infrastructure, and corporate systems, including the County's Enterprise Resource Planning (ERP) and related business systems. This funding supports necessary software upgrades and integration of business application and infrastructure system components to meet both the County's IT architecture and interoperability goals.

The **Remote Access Project (2G70-036-000)** will be considered for $200,000 as part of the FY 2022 Carryover Budget. This project supports the provision of critical secure remote access to County networks and systems for telework capabilities, disaster recovery operations, and recognizes the increasing reliance of agency mobile workers on wireless solutions. Enterprise-wide standardized access control methodology enables secure identity authentication for authorized access to County networks, data, and systems.

FY 2022 Third Quarter funding of $300,000 supports the **Data Analytics and Business Intelligence (IT-000034)** project, with an additional $300,000 planned for FY 2022 Carryover. This multiphase project supports the County's strategic objective of improving evidence-based decisions ensuring resources (time, money, and people) are used efficiently and effectively, and developing sustainable strategic plans to better serve constituent populations.

FY 2022 Third Quarter funding of $523,000 supports the **HANA Database/FIORI project (IT-000044)**, with an additional $400,000 planned for FY 2022 Carryover. This project supports migration to HANA SAP database for SAP applications and deployment of Fiori Mobility for frequently used -SAP functions.

3.2 PUBLIC SAFETY

2G70-059-000 MOBILE COMPUTER TERMINAL PROJECT (E-911 - FUND)

Project Description

Fairfax County public safety communications relies heavily on mobile data communications for the dispatch of equipment and personnel to emergencies and non-emergency requests. Digital communications are used to allow field units (e.g., police, fire and rescue, and sheriffs) to receive dispatch messages, event notifications, to self-initiate events, make traffic stops, check on licenses and registrations, maintain status for response, and communicate with one another and the Department of Public Safety Communications (DPSC) without the use of voice radio or intervention of a dispatcher at the DPSC. The entire structure of the County's public safety response system, including staffing at the DPSC, is based on the heavy utilization of mobile data communications for critical public safety activities.

Project Goals

This project supports the recurring life cycle replacement of Mobile Computer Terminals (MCT) to ensure this critical equipment is kept contemporary and functional for public safety personnel who respond to emergency and non-emergency requests for services.

Progress to Date

This project supports an on-going program for the replacement of Mobile Computer Technology used by Public Safety personnel. A five-year replacement cycle was determined to be a reasonable replacement term for the mobile computer fleet.

Project Budget

FY 2023 funding of $1,717,550 supports the first-year funding of the 5-year lifecycle replacement cycle established for MCT equipment or replacement of 1/5 of the mobile fleet. An additional 25 MCT units per year will be added to the fleet each year

of the next 5-yearlife cycle replacement program to cover growth of the fleet that has occurred over the last 10 years which will increase the fleet to over 1600 units maintained in the fleet. This is an ongoing IT replacement project supported by Department of Public Safety Communications, the Police, Fire/EMS, and Office of the Sherriff.

Return on Investment

More than 150,000,000 transactions are processed each year via MCTs through the mobile data communications infrastructure and therefore, it is critical to keep this equipment contemporary and available for the many operations utilized by field personnel.

MCTs keep officers on the street versus behind a desk as they provide an efficient, quick method where the officer can complete reports and perform routine queries from a mobile device in their vehicle. In addition to the many functions currently performed on the MCT units, police officers use the MCT for mobile field reporting. The County has incorporated a field reporting system into records management and integrated it with the CAD system allowing officers to complete investigative reports online from their vehicle with most of the preliminary information downloadable from the event history reports in the CAD system. This enhancement saves countless hours previously expended writing field investigation reports longhand by patrol personnel.

3G70-078-000 E 9-1-1 TELEPHONY PLATFORM REPLACEMENT PROJECT (E-911 - FUND)

Project Description

This project supports Fairfax County's initiative to replace legacy 9-1-1 call center hardware and software for dispatch of police and fire units in response to the emergency calls and to enable a transition to a Next Generation 9-1-1 set of services. This project began in 2015 as a multi-phase update of the PSAP (Public Safety Answering Points) communications technology environment within the County to continue 9-1-1 call processing functions, and to replace the external service provider network. The widespread adoption of rapidly advancing technologies like text, video, Voice over Internet Protocol (VoIP), and the increased reliance on high speed broadband services have raised expectations for Next Generation 9-1-1 services.

Project Goals

This project supports an ongoing transition of the County's core 9-1-1 system architecture to new supportable platforms that are technologically current and compliant with National Emergency Number Association (NENA) Next Generation 9-1-1 industry standards to facilitate 9-1-1 public safety services into the future.

Progress to Date

Phase 1 – In September of 2015, implementation of interim Text-to-9-1-1 capabilities was completed in Fairfax County, making Fairfax the first jurisdiction in Virginia, Maryland and the District of Columbia to provide vital access to 9-1-1 for individuals who are deaf and hard of hearing.

Phase 2 – The selection of a new vendor for the replacement of 9-1-1 call taking equipment and voice recording equipment in all Fairfax County 9-1-1 centers and associated secondary locations was completed. Project design and phased implementation began in 2016 and cutover to the new NG 9-1-1 equipment at the Fairfax County Alternate Center occurred in January 2017. Implementation of the system in the Towns of Herndon and Vienna and the City of Fairfax was also completed in January 2017. The phased installation of the equipment at the Fairfax County primary 9-1-1 Center (MPSTOC) was complete in February 2017;

with a transition to an integrated Text-to-9-1-1 capability in the NG 9-1-1 platform completed in March 2017; and incorporation of radio recording within the NG 9-1-1 system complete in the third quarter of 2017.

Phase 3 – Fairfax County was awarded grant funds from the Department of Homeland Security (DHS) to plan and develop the technical specifications for transition to a new Next Generation 9-1-1 ESInet (Emergency Services Internet Protocol Network) service for 9-1-1 call routing. During this phase, grant funds also supported analysis of the legacy 9-1-1 address location information by Fairfax County's GIS staff to enable automatic transition into GIS formats that support NG9-1-1 routing of calls on the ESInet. Competitive evaluation of vendor proposals for the ESInet was completed and a contract award made during the fourth quarter of 2017.

The new ESInet service replaces the main elements of the Verizon provided 9-1-1 call routing network, making Fairfax County the first jurisdiction in Virginia to transition off the legacy Verizon 9-1-1 network. Other Northern Virginia jurisdictions, most of the Commonwealth of Virginia, multiple Maryland jurisdictions, and the District of Columbia plan to use Fairfax County's contract as a basis for transition to a Next Generation 9-1-1 network; this transition will involve careful testing and development of policies to ensure interoperability is maintained across jurisdictional boundaries.

Sustainment Phase 4 – This phase began after transition onto the ESInet and involves laying foundations of capability to incorporate features such as: (1) the ability to receive additional media (e.g., pictures and video) from the initial 9 1 1 call, (2) the ability to exchange multi-media from the caller to the 9-1-1 center and out to the First Responders' device through FirstNet, and, (3) the development and testing of interfaces between the Next Generation 9-1-1 ESInet and other sources of additional data that directly communicate emergency incident data to 9 1 1 (e.g., alarms, medical information, traffic information, cameras, etc.) and, (4) further interconnection with First Responder Network (FirstNet) devices and applications for location and situational awareness.

During the sustainment phase, Fairfax County will coordinate new interconnections with the 9-1-1 wireless carriers to deliver 9-1-1 calls directly to the ESInet so that citizen calls for assistance are received faster and with more associated information. Sustainment also involves periodically refreshing of the workstations and servers every five years that comprise the 9-1-1 call answering sites in the County and the secondary jurisdictions. A project will begin in 2022 to transition the call answering system from a premise-based equipment environment to an even more redundant and diverse cloud-based deployment that will allow increased functional capabilities (such as in-line language translation capabilities and cybersecurity protections) and other improved capabilities and efficiencies.

Project Budget

In FY 2023 funding of $2,180,000 continues support for the required hardware and software upgrades associated with this strategic initiative.

Return on Investment

Improved systems for 9-1-1 services provide enhanced services and capabilities to the citizens of Fairfax County with a high degree of accuracy and functionality with up-to-date technology solutions. These technology upgrades strengthen system resiliency, reliability and establish a technology foundation for implementation of Next Generation 9-1-1 multimedia capabilities such as text, video, and photographs. This on-going multi-part project improves system interoperability with other jurisdictions, call overflow with other Public Safety Answering Points, and location accuracy. The new 9-1-1 call processing technology

platforms will result in cost savings for Fairfax County as specialized proprietary systems are replaced with commercial off the shelf components that will reduce maintenance costs.

3G70-079-000 PUBLIC SAFETY CAD SYSTEM INFRASTRUCTURE PROJECT (E-911 - FUND)

Project Description

The Public Safety Computer Aided Dispatch System (CAD System) is one of the County's largest IT systems. The CAD System is the core technology supporting the intake and dispatch response functions for all Fairfax County Public Safety agencies including Police, Fire and Rescue, Sheriff, and the Department of Public Safety Communications (DPSC 9-1-1 Center) in their core mission of keeping Fairfax County and its citizens safe. Call takers and dispatchers use the CAD System to process all calls for service received on 9-1-1 and other requests for emergency and non-emergency services in Fairfax County, as well as for mutual aid interoperability. This project supports the update and replacement of the hardware infrastructure and required software licenses, workstations, and associated licenses, used by the CAD system and its users.

Project Goal

The goal of this project is to support the systematic replacement of the required hardware, related equipment, and required software and licenses for current and future functionality over a five-year repeating replacement cycle. The Fairfax County standard for IT foundational and workstation equipment is five years, keeping in mind usability, maintenance, and supportability. Maintaining the infrastructure current allows for better performance, reduces risks of equipment failures, and keeps pace with changing technology and evolving security requirements.

Progress to Date

Staff from the Department of Public Safety Communications, Public Safety agency stakeholders, Department of Information Technology and advisory experts have researched the issues associated with sustaining 9-1-1 Center performance, best practices for hardware replacements, security and resilience, state of the industry and readiness to operationalize and integrate next generation 9-1-1 needs.

Each phase of the proposed project plan addresses replacement components and related software versioning processes with activities including identification, purchase, installation, software license obligations, and eventual transition to a new CAD solution. The hardware and software replacement schedules are coordinated with partner agencies to ensure minimal impact on other public safety projects. Software updates are also coordinated and driven by the manufacturer and industry standards.

In February 2022, the CAD Project completed its software upgrade to the most current version of CAD system, which was the successful completion of a multi-year effort.

Project Budget

FY 2023 funding of $1,180,000 supports continued replacement plans for the County's CAD system.

Return on Investment

Public Safety agencies rely on the CAD System to provide mission critical lifesaving and property protecting services to Fairfax County and the surrounding areas. By replacing hardware in a timely fashion, the County safeguards against equipment failure and legacy vendor abandonment of aging technology that could potentially result in service interruptions with grievous

consequences. This project incorporates the requirements needed to upgrade and replace CAD system components, including software versioning, over a span of five years to keep the system contemporary and upgraded and to allow for continued use by the Public Safety user community. The need for improved CAD system capacity and functionality will continue as a necessary funding requirement. Using a phased, life cycle approach insures that required funding is spread out over a five-year period and avoids the impact of a major system overhaul in any one fiscal year.

2G70-021-000 AND 2G70-022-000 CIRCUIT COURT TECHNOLOGY PROJECT

The Fairfax Circuit Court is nationally recognized for its delivery of public service. The Court continues to actively pursue state-of-the-art technology solutions to improve both court efficiency and-customer experience. These projects cover multiple facets of Circuit Court operations.

Project Description

Court Automated Recording System (CARS) / Court Public Access Network (CPAN) – The Clerk of the Fairfax County Circuit Court is responsible for providing citizens with reliable, timely, and accessible public records. Over 56 million court records have been digitized into the Court's Public Access Network (CPAN) which is a web-based, online, digital image retrieval system. CPAN offers subscribers 24 hours a day, 7 days a week online access to land records, judgments, marriage licenses, trade names and probate record images, dating from as early as 1742 to the present. CPAN has over 2,000 subscribers who are located domestically and internationally. Subscribers include citizens, real estate title examiners, law firms, mortgage companies, banks, media outlets, and federal, state, and local governmental agencies.

Case Management System (CMS) – The Clerk of the Fairfax Circuit Court is responsible for receiving and maintaining all court records for felony prosecutions and civil litigations in Fairfax County. The Clerk files, indexes, and manages the complete life cycle of a court case and its pleadings, from case-initiation (Search Warrants/Indictments in criminal prosecutions and Petitions/Complaints in civil actions) to the compilation of the appellate record for submission up to the Court of Appeals and the Supreme Court of Virginia. All pleadings, criminal discovery, trial evidence and post-trial motions, as well as Orders of the Court, are kept in perpetual record by the Clerk's Office.

This kind of dynamic public-record keeping, held in perpetuity, is a ripe environment for the efficiencies today's digital technology has to offer. The Clerk's current Case Management System (CMS) automates case-processing through the Circuit Court, allowing for real-time case indexing, docketing, trial calendaring, data-integrated document-generation and processing, trial/hearing calendaring, disposition-entry, account-ledgering and the running of statistical reports.

Project Goals

Circuit Court modernization initiatives aim to make the Clerk's over 800 Virginia Code-mandated duties more efficient and cogent, using software programs and integrated systems. This unity of effort, through modern systems and processes better serves Fairfax County Court customers, and protects important Constitutional protections, like due process and speedy trial rights. As the trial-level court, and only court of record in Fairfax County, technology will continue to help the Clerk's Office preserve Fairfax's public history. The review of past accomplishments recited below as "Progress to Date" and future project goals, set out as "Planned Project Schedule," are broken-out between the Court's Land Records systems, and the Case Management systems.

Progress to Date

- Added color image capabilities to asking applications.
- Rewritten legacy applications in the latest .NET technology.
- Rewritten legacy application in the latest .NET technology and upgraded the look and feel of reports with graphical representations to support the latest browsers.
- Improved security of image storage with new security methods to ensure the integrity of the public records.
- Upgrade of the Court's Public Access Network (CPAN) to .NET, which also includes a completely redesigned look for a more user-friendly interface for search and retrieval operations, including the addition of new search features.

Other accomplishments include:

- Development and deployment of the Circuit Court's Court Document, including document imaging; with integrated redaction capabilities.
- Implementation of the CPAN retrieval system.
- Deployment of an automated jury management system, which serves as a system clearinghouse for the 60,000 Fairfax citizens who make-up the Court's annual jury pool.
- Implementation of the Clerk's "Paperless Probate" and "Virtual Probate" process, which makes a difficult time in a family's life, swifter and more efficient.
- Development and implementation of a streamlined, and mobile-friendly Marriage License Pre-Application, which gives customers the ability to apply for a marriage license online.
- Implementation of electronic docketing display, which serves as directional signage for the public, as they navigate the large courthouse, to find their courtroom.

These systems provide a platform and foundation for additional capabilities, as the Court's business requirements evolve. Technological system updates, which are critical to platform vitality and customer-service delivery, are also addressed through this fund.

CARS

- Indexed, and stored all land record documents for electronic processing.
- Completed cashiering and scanning capabilities, to update the public record in a more efficient manner.
- Automated the Administration of Estates System.
- Automated the Marriage License Application process.
- Integrated the redaction of data and into existing workflows as mandated by Virginia's General Assembly.
- Developed Online Marriage Pre-Application, an online resource currently used by marriage license applicants, use of the application has significantly reduced customer wait -times.
- Established a collaborative project with the Commissioner of Accounts of the 19th Judicial Circuit and the Circuit Court's Probate Division, to electronically exchange, maintain and record administration of estate documents and relevant data.

CMS

- Implemented e-filling for selected Civil case types of existing cases.
- Enhanced Expungement Process for improved quality control and quality assurance.
- Implemented court-wide scanning of all case documents with redaction capability.

- Increased the scope of e-transferred Orders to include final Divorce Decrees, Final Law Orders, Name Change and Guardian Ad Litem (GAL) Orders.
- Initiated imaging all sentencing guidelines within the case management system to facilitate electronic transmission to the Virginia Sentencing Commission.
- Improved Protective Order Interface with the Supreme Court of Virginia: Office of the Executive Secretary, to communicate injunctions in real-time.
- Expanded a Report Service Library, where custom-built SQL-reports are kept for both on-going and ad-hoc statistical Report-Requests.
- Enhanced Central Criminal Records Exchange (CCRE) report capabilities allowing for charges to be removed from the Exception Report.

Planned Project Schedule

- Continued modernization of existing legacy applications, as well as expansion of document types to include Highway Plats, will be the focus of the CARS project over the next year.
- Establishment of a Project Management Office team for better project communication, improved allocation and alignment of resources and assisting with adherence to the CMS project requirements and schedule.
- Expanding e-filing to include additional Civil case types and integrating the payment process to enable new case filings.

Project Budget

Annual funding from Virginia's Technology Trust Fund revenue (mandated by Virginia Code for addressing Circuit Court Clerk's Office technology needs), CPAN subscription revenue, Administration of Justice revenue, and agency funds support technology initiatives in the Circuit Court.

Return on Investment

Taken together, the Clerk's modernized land record and public records systems, and the continued digitization of the Court-side of case management systems, provide Fairfax with a secure, highly efficient, and dynamic trial court that protects important, unquantifiable civil liberties. For instance, CPAN provides immediate electronic access to over 2,000 customers, making all land records, deeds, deeds of trust, liens, and judgments available to the public on every parcel of land located in Fairfax County. In addition to citizen-customers, CARS serves federal, state, and local agencies, particularly sister-agencies such as the Fairfax County Department of Tax Administration (DTA), the City of Fairfax Tax Assessor's Office, the Fairfax County Geographic Information Systems (GIS) and the Fairfax County Department of Public Works and Environmental Services (DPWES).

Once complete, a comprehensive Court Case Management System will offer Virginia's largest trial court real-time case document imaging, electronic filing, electronic-certifying and payment system portal, and the ability to develop digital trial practice (for the management of digital evidence submission and police body-camera evidence) as well as real-time judicial dashboard capabilities. Multiple parties will be able to access electronic case files simultaneously, and e-file pleadings and other documents from their firms, at any hour of the day or night, reducing road-travel to the courthouse. A more efficient trial court process and e-filing will save self-represented litigants (as well as attorneys) time and money in the life cycle of their case. When the time and cost of litigation reduces, meaningful access to justice is achieved. Finally, potential interfaces with agencies like the Sheriff's Office or other Virginia jurisdictions, will allow the exchange of electronic documents and/or data and eliminate existing manual processes between jurisdictions.

2G70-034-000 COURTROOM TECHNOLOGY MANAGEMENT SYSTEMS - DIGITAL UPGRADE

Project Description

Fairfax County's Court Technology Office (CrTO) has completed the digital upgrades necessary for the existing high technology Courtroom Technology Management System (CTMS). The CTMS provides electronic evidence presentation, video conferencing and systems management for all three Fairfax County Courts. The new digital design and upgrades replaced obsolete analog hardware, and includes newer, digital components for courtrooms undergoing renovation, including new cabling, wiring, connections, and customized software code.

Project Goals

The primary goal of this project is to upgrade and integrate the high-tech courtrooms, conference rooms, jury assembly and jury deliberation rooms at the Fairfax County Courthouse to a modern digital platform consistent with industry standards. The digital upgrades support (BYOD) Bring Your Own Devices, HDMI (High-Definition Multimedia Interface) connectivity, Wi-Fi, annotation enhancements, upgraded touch panel displays, and network-managed video services, while retaining existing CTMS functionality. The digital CTMS meets the County's strategic objectives of improving citizen's access to the Courts, facilitating trials and hearings in the most effective and efficient means possible, allowing for all three Courts to share common resources, and providing for the flexibility and adaptability required to incorporate future changes in technology and court proceedings.

Progress to Date

A multiphase deployment to upgrade existing courtrooms to a digital platform commenced in FY 2017 and is planned to continue through FY 2022 - FY 2023. Digital migration requires careful planning and scheduling as only a limited number of courtrooms can be "out of service" at one time. The digital retrofit is anticipated to take twelve weeks per courtroom, planned over multiple fiscal years.

Milestones and planned implementation are:

- FY 2017 – Completed Digital Upgrades for four Circuit Court courtrooms (5A, 5B, 5C, 5D)
- FY 2018 –
  - Completed Digital Upgrades for four Circuit Court courtrooms (5E, 5F, 5G, 5H)
  - Completed Digital Upgrade for two General District Court courtrooms (2J, 2K)
  - Completed Digital Upgrade for two Juvenile and Domestic Relations District Court courtrooms (3A, 3B)
- FY 2019 – Complete Digital Upgrades for five JDRDC courtrooms (3C, 3D, 3G, 3H, 3K)
- FY 2020 –
  - Complete Digital Upgrades for two JDRDC courtrooms (3E, 3F)
  - Complete Digital Upgrades for two Circuit Court courtrooms (5J, 4J)
  - Complete Digital Upgrades for two General District Court courtrooms (1A, 1E)
- FY 2021 –
  - Digital Upgrades for two General District Court courtrooms (1A, 1E)
  - Digital Upgrade MCR Network Switch Expansion
  - Digital Upgrades for Adult Detention Center Video Arraignment and Remote Hearing Room

- Build Out and installation of two additional Adult Detention Center Video Arraignment and Remote Hearing Rooms
- Digital Upgrades to Courthouse Jury Assembly rooms to enhance audio and allow remote connectivity with the courtrooms and remote destinations

- FY 2022 Plans -
  - Digital Upgrade to multiple Courthouse Conference Rooms to allow remote connectivity with the courtrooms and remote destinations
  - Expansion of video conference capabilities throughout the courthouse to allow for non-contact public service areas
  - Installation of Attorney/Client virtual conference rooms (contingent on construction and renovation schedules)
- FY 2023 Plans -
  - Digital Upgrade to Courthouse Conference Rooms to allow remote connectivity with the courtrooms and remote destinations
  - Paperless courtrooms – integration of presentation systems with case management systems
  - Installation of Attorney/Client virtual conference rooms (contingent on construction and renovation schedules)
  - Jury Deliberation Room Digital Upgrades
  - Integration of CTMS and other hardware platforms with case management systems, software conferencing (Webex, Teams, Zoom, Polycom, etc.) and digital evidence storage platforms

Project Budget

Funding of $375,000 is planned as part of the County's FY 2022 Carryover Budget.

Return on Investment

The CTMS allows new and renovated courtrooms to share a common infrastructure with distributed services through a centralized master control room. This capability provides consistency, standardization, and scalability between the three courts with improved access and facilitation of court processes and services for citizens, judges, court staff, litigants and others who need to conduct business with the courts. Substantial benefits and opportunities have been realized by centralizing and standardizing courtroom technology and sharing resources and infrastructure between the three courts. The implementation of CTMS has improved trial management and provided savings for the County, the courts, attorneys, and litigants.

IT-000013 POLICE RECORDS MANAGEMENT REFRESH PROJECT

Project Description

This project supports replacing the current Police Department Records Management System (RMS).

Project Goals

The project goal is to replace the current Police Records Management system (iLEADS) with a next-generation Records Management System (RMS). The new RMS will fully utilize and support the present and future police department needs and business processes and maintain close integration with the current 9-4 Dispatch (Computer-Aided Dispatch – CAD) system.

Progress to Date

RMS RFP was published May of 2020 with a submission deadline July of 2020. The SAC/TAC review deadline was December of 2020. Eleven submissions were received, and the review committee selected three vendors for demonstration April of 2021. In September of 2021, a preferred vendor was selected, and contract negotiations are currently underway.

Project Budget

FY 2022 Third Quarter funding of $400,000 supports this project. An additional $700,000 is planned as part of FY 2022 Carryover.

Return on Investment

A modern Records Management System (RSM) is a critical necessity in large police departments. It enables the Police Department to act more efficiently upon incidents, from initial response to tracking, investigation, and reporting. A new RMS system will allow Fairfax County police officers to more efficiently respond to incidents, issue electronic summonses, and complete reports on the scene of incidents rather than waiting to enter case information at a field office, station, or other locations. A modern system also assures more accurate, timely, reliable, and accessible information on events.

IT-000014 SHERIFF CIVIL ENFORCEMENT SYSTEM PROJECT

Project Description

The Office of the Sheriff, in collaboration with the three Fairfax County Courts (Circuit Court, General District Court, and Juvenile and Domestic Relations District Court), and the Department of Information Technology is implementing an Advanced Civil Enforcement System (ACES) to automate existing civil enforcement business processes and replace the legacy systems which was a module in the Police Records Management (RMS). The ACES solution provides a desktop and mobile solution, enhanced security, reporting, statistics, and will also provide interfaces between the Sheriff's Office, the Courts, and other County agencies.

Project Goal

The Sheriff's Office is required by Virginia Code 8.01-293 to execute civil processes within its jurisdiction, and to report statistics as required by the Virginia Compensation Board. The goal of this project is to implement an automated Civil Enforcement application for significant improvements and efficiencies necessary to manage the large volume of documents served daily.

Progress to Date

The ACES Project experienced vendor performance issues resulting in the termination of the contract. The Sheriff's Office proactively developed a mitigation strategy to minimize the impact to the Sheriff's Office, Court staff, and public, and has transitioned to a new, internally built Civil Enforcement System called NuACES which fulfills limited, but critical needs of the Sheriff's Office Civil Enforcement Branch. This includes the basic civil enforcement processes such as real-time tracking of service information, a single bi-directional interface with the General District Court's Case Management System (CMS), an interface with the County's Geographical Information Systems (GIS) for geocoding and geofencing to electronically track service documents, a basic mobile solution utilizing the existing infrastructure, and basic reporting.

This project will continue to support the Sheriff's Office development of advanced functionality, including additional reporting and statistics, expansion of the core and mobile functionality, secure public and internal web access, bi-directional interfaces between ACES and the three Courts' case management and imaging systems, and interfaces with other County agencies.

Project Budget

Additional funding, when required, will be requested at the appropriate time.

Return on Investment

When fully implemented, the new Advanced Civil Enforcement System will provide an integrated and comprehensive civil enforcement solution for electronically processing, distributing, and tracking service documents. The system will significantly reduce staff time spent to manually process physical service documents and improve response time to public inquiries with secure public and internal web accessibility. The system will also enhance reporting and statistics required by the Virginia Compensation Board, minimize lost or misplaced documents and provide electronic backup for business continuity.

IT-000015 COMMONWEALTH'S ATTORNEY CASE MANAGEMENT SYSTEM PROJECT

Project Description

The Office of the Commonwealth's Attorney (CWA), in collaboration with the Department of Information Technology implemented a management system with a secure, scalable multi-user platform compliant with Fairfax County IT standards. The CWA's Office has a very high case volume making attorney case and courtroom scheduling a complex and labor-intensive process. The eProsecutor solution is a web-based application that streamlines and automates previous manual processes and improves efficiencies with law enforcement agencies and the Courts.

Project Goal

The goal of this project is replacement of the legacy case management system with a modern comprehensive case management application with improved workflow tools, streamline processes, and enhanced accountability. These improvements will aid in making CWA's operation maximally efficient and optimally digitized, while scaling the operation's data capacity to incorporate data-informed decision-making into the team's routine practice.

Progress to Date

The initial system was rolled out in May 2019 and modifications continued into FY 2021 to better capture barcode and case information at the point of origin. The project's original scope is complete. Additional requirements and modifications were identified and are planned in the next phase of the project through FY 2023. These enhancements will include reconfiguration of the calendar, workflows, forms, fields and lookup lists and will help the office standardize data entering and collection processes so that case level information is more consistent and reliable. Additionally, these enhancements will help the use data in the aggregate to promote data-driven decision making though out the office.

Project Budget

The project has sufficient budget. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

A modern case management system will significantly improve management and tracking of a large volume of criminal cases handled by the Fairfax County Commonwealth's Attorney's Office. Improvements such as barcode scanning of arrest warrants, auto-generated legal documents, and the automated syncing of attorney calendars will dramatically reduce data entry by office personnel. Generating real-time case assignment reports showing the number of cases assigned, types of cases, and where cases fall into the case life cycle will improve and enhance the current task of case assignment and court scheduling.

IT-000043 GENERAL DISTRICT COURT (GDC) ONLINE DISPUTE RESOLUTION PILOT PROJECT

Project Description

In cooperation with the Supreme Court of Virginia/Office of the Executive Secretary (OES), the Fairfax County General District Court piloted an Online Dispute Resolution (ODR) solution in the Court's Small Claims Division which processes up to 45 small claims cases per court date, resulting in approximately 2,250 cases per year. The ODR system enables citizens to connect with other case litigants and dispute mediators in a mobile-friendly, safe, and secure environment, with 24/7 on-demand accessibility that enables litigants to view their cases and display their information from anywhere and anytime, including mobile devices. The ODR offers a convenient alternative for case resolution when citizens are unable to travel to the courthouse.

Project Goal

It is the objective of this pilot to implement a successful proof-of-concept on-line dispute resolution solution based on the best practices realized by other State Courts. The Court anticipates efficiencies through deployment of an online solution while maintaining compliance with procedural, technical, and legal constraints. A trend towards "cybercourt" has emerged in the United States as the next generation opportunity, especially with mediation and arbitration.

Progress to Date

Starting in April 2021, when the pilot program went live, small claims cases filed with the Fairfax County General District Court are automatically entered into the system for negotiation and potential mediation. The General District Court is monitoring and analyzing its processes to ensure the highest number of people register for and use the remote services. Data gathered through the system's reporting and participant surveys will be used to assess the program's effectiveness, convenience, and improvements in litigants' access to justice.

During the first year of the pilot, over 900 cases have been processed through the ODR system. The Court's metrics indicate that the ODR process shortens the average time by 14 days and quadrupled the percentage of cases where parties had either completely or partially negotiated ahead of their court date compared to using a mediation only approach.

The General District Court is currently developing a formal project and proposal request for a long-term ODR solution with a target completion by the end of CY 2022.

Project Budget

FY 2022 Third Quarter funding of $50,000 will continue support for this initiative.

Return on Investment

The ODR system is a streamlined method of dispute resolution in which parties can quickly mediate differences online without repeated hearings in courtrooms. The benefits include a reduction in case backlogs achieved by resolving civil cases before their hearings, shortening case lifetimes to an average of days instead of months, and saving staff time and reducing case touch points thereby increasing party satisfaction. Given the ubiquity of the Internet and the public's preference for online accessibility options versus in-person court cases, the General District Court Small Claims division can save significant time, resources, and money by enabling resolution of certain cases via an online court-based mediation and non-binding arbitration process as a first step prior to court involvement. Upon successful pilot in small claims, ODR can be expanded to other court functions such as traffic, warrant resolution, parking tickets, pleas, etc.

IT-000047 SHERIFF'S JAIL MANAGEMENT SYSTEM REPLACEMENT PROJECT

Project Description

This project supports a multi-phase replacement of the current legacy Sheriff Inmate Management System (SIMS). The Fairfax County Sheriff's Office plans to implement a Jail Management System (JMS) to replace the legacy Sheriff Inmate Management System (SIMS) which is approaching end of life. The proposed Jail Management System (JMS) will meet the demands of managing a potential population of over 1,200 inmates housed within the ADC by supporting alternative work force, booking receiving and release, classifications, complex sentencing calculations, incident reporting, inmate records, medical, behavioral health, finance, property, programs, professional services, transportation, and visiting.

The system will integrate electronic medical records, inmate accounting, reporting, mugshots, scanning, and incident-based reporting (IBRs), as well as interface with multiple state and local systems such as Active Directory, commissary, kiosks, LIDS, NOVARIS, Police Department's Records Management System (RMS), VCIN/NCIC, and VINE. The new system will provide the opportunity to automate remaining manual tasks, provide robust reporting and statistics, automate notifications and alerts, provide a mobile solution, and interface with the Fairfax County Courts (Circuit Court & Records, General District Court, and Juvenile & Domestic Relations District Court) and the Magistrate's Office.

Project Goal

The goal of this initiative is to implement an integrated and comprehensive jail management solution for Fairfax County Sheriff's Office to replace of the current legacy Sheriff Inmate Management System (SIMS) which is approaching end of life.

Progress to Date

The JMS Project Team determined that the submissions received in response to the first RFP for the Sheriff's Jail Management System (JMS) did not meet the Sheriff's Office needs (to include mandatory requirements). The project team modified the JMS RFP specifications and requirements, and the new RFP was released in February 2022. The evaluation process is currently underway. Contract award is anticipated at the end of calendar year 2022.

Project Budget

Additional funding to continue support for this initiative will be requested at the appropriate time.

Return on Investment

Existing JMS solutions offer fully automated processes, integrate key functionality, and interface with existing state and local systems necessary to provide significant improvements and efficiencies to the Sheriff's Office. The solution will provide an integrated and comprehensive jail management solution with access to real-time inmate information, reduce redundant manual paper intensive processes, increase efficiencies with digitized work queues to streamline inmate processing and digital displays for real-time statuses on booking and release processes, streamline risk assessment, improve inmate management with barcodes and scanning for inmate intake, checking rounds, release process, etc., interface with critical state and local systems, and provide improved system availability, security, integrity and electronic backup to safeguard records.

Additional benefits include a mobile solution with robust reporting and statistics, automated notifications and alerts, and interface with the Fairfax County Courts (Circuit Court & Records, General District Court, and Juvenile & Domestic Relations District Court) and the Magistrate's Office. The system will provide a comprehensive, high-availability jail management solution on a secure cloud environment with automated backup and disaster recovery that meet the systems and IT standards as defined in the Fairfax County Information Technology Security Policy (70.05 2015) and the Criminal Justice Information Services (CJIS) standards.

3.3 CORPORATE ENTERPRISE

2G70-011-000 AUTOMATED BOARD MEETING RECORDS PROJECT

Project Description

This project streamlines, automates, and supports mobile-enabled submission, preparation, and delivery of the Board of Supervisors Meeting Agenda and Board Book Package by converting a manual paper-exclusive process to an electronic format.

Project Goals

This initiative is sponsored by the Board of Supervisors and the County Executive to enable the Office of the County Executive and the Clerk to the Board to electronically create the agenda, supporting documentation, document Board of Supervisor meeting matters and post documents on-line for improved accessibility. This project significantly improves the quality and efficiency of producing the board packages for the Board of Supervisors and associated committees and subcommittees.

Progress to Date

Secure Board meeting management software was successfully deployed to support the Board of Supervisors meetings, subcommittee meetings, and other County Boards, Authorities and Committees (BACs) such as Retirement Board, Board of Equalization of Real Estate Assessments, and Water Authority.

This project is complete and will be retired from the FY 2024 IT Plan.

Project Budget

Additional funding, when required, will be requested at the appropriate time.

Return on Investment

This project increases efficiency and streamlines the production of the Board of Supervisors' package by providing information and supporting materials on-line, offering Board members an efficient way to review meeting material electronically and improves accessibility and the management and distribution of Board materials. Revisions and updates are easily and instantly accomplished making reprints and redistribution of hard copy unnecessary. Additionally, this solution offers efficient preparation and submission of agenda items, a reduction in manual paper intensive processes, and reduced space requirements for maintaining large paper copies for Board offices and the Clerks' Office. Cost savings are also achieved by eliminating print, labor, and transportation costs that were necessary to produce, assemble, and physically deliver the large multi-volume board books.

2G70-020-000 INTERNET/INTRANET INITIATIVES PROJECT – E-GOVERNMENT

Project Description

This project supports initiatives that enhance and expand service delivery, not only within government, but between government and the public using information and communications technologies. A comprehensive approach is employed to ensure the support of multiple business solutions on a scalable and secure infrastructure. In addition to providing services and information efficiently to foster long-term citizen engagement from anywhere at any time, digital government services increase productivity by diverting staff resources to address more complex tasks and respond to requests for more detailed or specialized information. Internet/intranet initiatives provide significant and wide-ranging opportunities to use technology and make data-driven decisions to deliver information, services, and programs effectively to the public.

Project Goals

E-Government's vision is to provide new information and services on cloud-based, multi-channel, open-source, and operating system (OS) neutral platforms, while continuing to build on existing information architecture for both the public website and intranet. This includes research and development of emerging technologies, expansion of Web and mobile applications, improvements in search and navigation, integration with internal systems and other public access channels, leveraging the power of artificial intelligence (AI), data and cloud-native applications and infrastructure.

Progress to Date

1 – WEB CONTENT MANAGEMENT AND PUBLIC WEB SITE

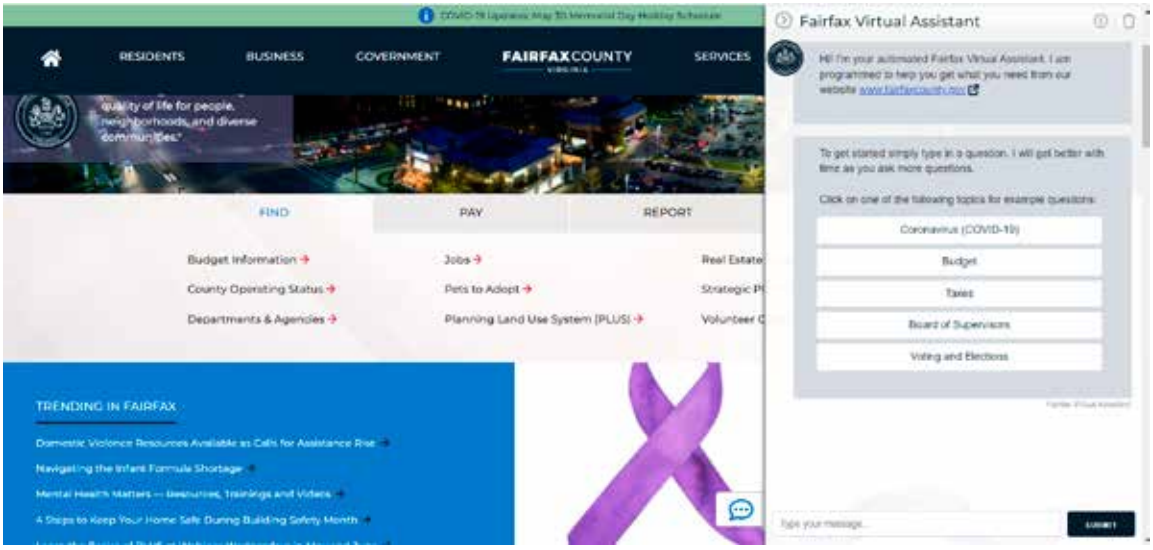
Built on an open-source enterprise Web Content Management System (WCM) in 2018, Fairfax County's website has evolved since its initial implementation. This state-of-the-art platform provides a scalable solution that puts the County in a position to adapt to new technologies. This system meets the County's requirements for security, publishing workflows, and distributed site management responsibilities. There are 90+ multi-sites in the WCM system to support over fifty-five County agencies that have a presence on the re-engineered Fairfax County website. The award-winning Fairfax County website information architecture presents information based on topics to reduce agency silos and optimize search engine results. The responsive design enables the website to be rendered effortlessly on all mobile devices.

In FY 2022, the project continued its focus on the enhancement of Artificial Intelligence (AI) powered " Fairfax Virtual Assistant (chatbot), development and implementation of new UI widgets for content presentation to enhance citizen interaction with County Government. In addition, new priorities included planning a design refresh of the public website to highlight services as well as implementation of new cloud-based statistics and analysis solution. These key features not only advanced the user experience but upgraded the current site's information architecture, augmented accessibility for mobile devices, and improved search functionality. The County website is also translated to multiple languages using machine translation powered by Google.

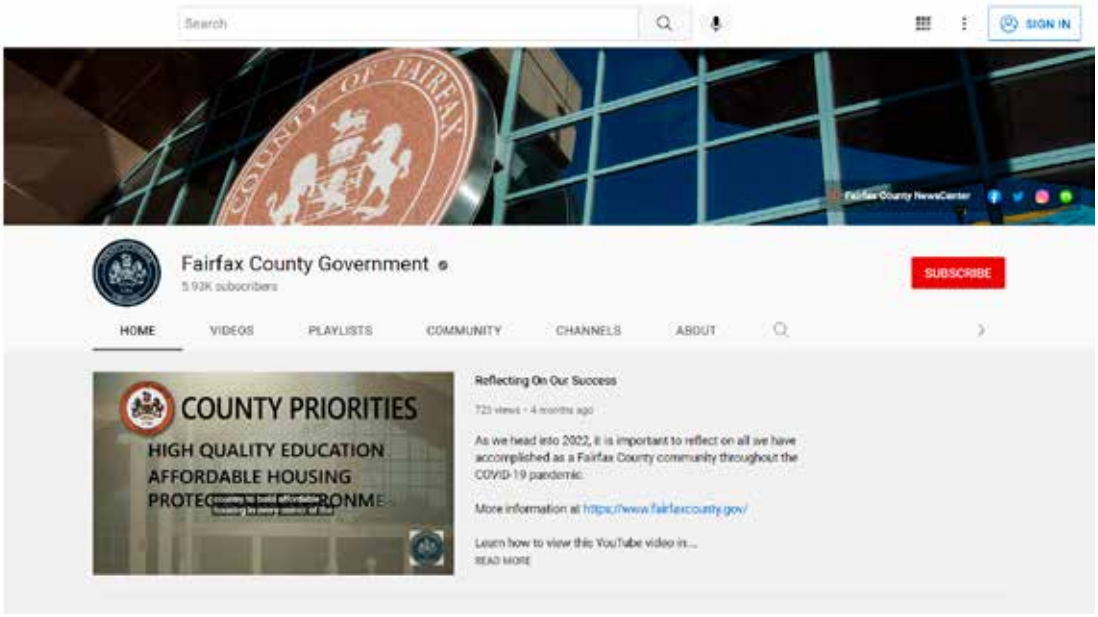
NewsCenter, the hub for all County news and social media sites was redesigned and integrated into the County's website with added new features such as "Previous Post" pop outs, click to tweet, new tagging and categories as well as enhanced search engine optimization tools. New templates for the web content management system were created to help support the new features on the NewsCenter site. The County website provides easy access to hundreds of services for constituents to pay, register or apply for services like tax payments, real estate information, permits, housing, libraries, jobs, basic needs, park classes etc. The County's use of social media to communicate and engage with our community continued to be important in FY 2022. The use of the County's multiple social media platforms like Facebook, Twitter, YouTube, Instagram, Nextdoor, SoundCloud and Flickr was widely used for public engagement with County government on various topics during emergencies and otherwise. It boosted County operations by creating a culture of engagement and encouraged a two-way dialogue with the public. These are integrated together and come under the umbrella of NewsCenter which is the County's one-stop news shop. The County has about 60 official social media sites/accounts on Facebook, Twitter, Instagram, Nextdoor YouTube and LinkedIn.

As metrics show, more than half of the traffic to https://www.fairfaxcounty.gov/ comes from search, E-Gov will continue to invest in this important aspect and optimize web content so commercial search engines find County content. The Google Site Search is used to augment the overall search functionality of the website.

In FY 2023, the program will continue to focus on continuous innovation using data and machine learning and improve the capabilities of the AI powered chatbot on the website to include additional languages, Live Chat and integration with home



Sec 3 Figure 1 - County Facebook page



Sec 3 Figure 2 - County YouTube page

Assistance. Implementation of a new cloud-based web statistics and analytics solution as well as launching a refreshed service oriented homepage of the public website is also in the roadmap.

2 – Mobile App

Fairfax County pioneered the availability of governmental services on mobile devices. In enhancing the County's long-standing goal that the community should access their government 24/7 without walls, doors or clocks, Fairfax County placed government in the palm of their hands with the introduction of efficient and cost-effective mobile apps and services.

In FY 2022, the official County mobile app was completely re-engineered and redeveloped to allow for push notifications. Users can now opt in to receive push notifications to include tax and voting deadlines, key news headlines and important updates on emerging issues. The in-app notifications offer another way for our users to stay connected with Fairfax County and receive information. The upgrade for both iPhone and Android devices was completed September 2021. The public can download the official Fairfax County application on their smartphones and tablets for emergency information, news headlines, one-touch calling through a contact directory, GPS maps, social media links, transportation resources and more at https://www.fairfaxcounty.gov/topics/mobile. Since the launch of the new upgraded version in September 2021 the app was downloaded a total of 2,132 times from the Apple App store and Google Play App Store, with a grand total of 45,450 since it was originally launched. New features and functionality will continue to be the focus in FY 2023.

3 – Enterprise Application Architecture and Services

E-Government develops and supports many enterprise- wide cross-agency applications like Financial Transparency, Tax Calculator, Directory, Ask Fairfax, Contract Register, NewsCenter and Email Subscriptions. The project develops application framework, standards, and best practices for the current environment to support County agencies in the development of web and mobile applications. It will continue to evaluate and prototype new application development platforms.

A major initiative for integrated cloud-native web sites, applications, services, and infrastructure is bringing Office 365 apps and services (SharePoint, Power Apps, Power Automate, Power BI, Teams), Azure cloud service and applications, and DevOps together for more efficient County platforms and services.

In FY 2023, the program will continue to focus its efforts on innovative projects that will provide services and programs using new technologies such as cloud-native application development and integration, container, and Kubernetes services. More cloud integration, such as multi-channel single-sign-on solution (SSO), are in the road map. More mobile application developments are also planned with cross platform .NET technology.

4 – Web Farm Infrastructure Architecture and Management

This project continues to build and upgrade the web farm infrastructure for the public and internal DevOps environment. The following Internet/Intranet Infrastructure operations are on-going:

- Drive cloud-native transitions for applications, infrastructure as code, and DevOps based software development and integration pipelines
- Create new generation application development and hosting environment based on containers, Kubernetes, and cloud services
- Secured network settings on high availability internet/intranet server farms for constant improvement of system reliability and security
- Enhance web analytical reporting to provide data-driven insights for dynamic content distribution on both Internet and intranet
- Continuous refinement of the monitoring system to ensure 24x7 availability

5 – Intranet

"**FairfaxNet**", the County's intranet, is an employee focused enterprise SharePoint portal that provides an intelligent platform to seamlessly connect users, teams and knowledge that supports the ability to leverage relevant information across business processes to help employees work more efficiently. FairfaxNet is a centralized resource for internal County content, forms, policies, news, application, training, and other sources of information, it is also the gateway to the County's enterprise ERP solution (FOCUS).

It provides collaboration tools for agencies and work groups which are secure, convenient and a standard workspace for employees to work individually or collaboratively. FairfaxNET is a centralized location for disseminating pertinent County wide, agency-specific, or team/project-specific information. It also provides a venue for automating business processes.

Approximately 55 County agencies now have a presence on the County's intranet site, including applications, pages, documents, PDF, and graphics on the internal site. Most agencies have Web content contributors, and Internet Services staff which support content creation efforts for those agencies without a dedicated Web presence. The County's intranet will continue to be updated with additional access to enterprise data and interactivity and expanded to become a viable alternative for full transaction-oriented applications. The addition of new information and increased business functionality is essentially an ongoing project. In FY 2022, FairfaxNET was migrated from on-premise SharePoint to cloud based SharePoint online. FairfaxNET continues to support more evolved and complex automation of agency business process for operational improvements.

Project Budget

FY 2022 Third Quarter funding of $515,000 continues support for this essential program; an additional $300,000 is planned as part of FY 2022 Carryover.

Return on Investment

This E-Government Program continues to provide information architecture, user interface/user experience (UI/UX) expertise, application development framework and supports web infrastructure for all platforms providing new information and digital services to the public web site and intranet. It further expands the web content management system to improve automated workflow, revision control, indexing, search, and retrieval for enterprise systems. The project utilizes open data, analytics, and personalized engagement to create a transparent service delivery that encourages public participation while enabling the County to build applications faster and more efficiently by maintaining reusable components. Robust and powerful intranet platform tools help for digital transformation and automation improve staff efficiencies and productivity assisting in rapid deployment of services to the public website.

2G70-041-000 CUSTOMER RELATIONSHIP MANAGEMENT (CRM) PROJECT

Project Description

Customer Relationship Management (CRM) is a foundational technology for managing relationships and interactions. This technology supports the County's strategic goal of improving the quality, efficiency, and speed of deployment for responses to citizen requests/issues by integrating stovepipe applications, implementing on-line 24x7 access strategies, social media tools, low/no code solutions, Artificial Intelligence and techniques to enhance the overall customer experience and manage service requests via a single user enterprise-wide interface tool.

Project Goal

This project is a multi-year effort to replace the legacy CRM applications with updated technology for resident facing applications/solutions that uses a contemporary low-code enterprise scale platform that integrates with County agencies' business applications and processes. This enables the consolidation and reduction of redundant hardware, software, and maintenance expenses furthering the County's Strategic Priorities and digital transformation. This enterprise approach to centralized rapid application deployment provides a multi-platform solution across many channels including e-mail, web, social media, and call centers. The improved integration with the County's Web environment, contact centers, mail, and communications systems, promotes service efficiency and effectiveness, with improved customer experience, and citizen engagement. This project also improves access and ability to gather data-driven insights by enabling the view of data at the enterprise scale to enhance opportunities for data analytics, improved cross-agency processes, performance improvement, and service planning.

Progress to Date

This project supports the replacement of Siebel and IQ customer management solutions. Phase 1 included environment setup, business process analysis, configuration, application development, and data migration for eleven County business systems

including Board Offices. Phase 2 consisted of successful data conversion and migration from IQ to the new application platform for the Board Chairman's office and the Dranesville Board office.

Phase 3 of the project included implementation for Department of Tax Administration Audit branch, Office of Public Private Partnerships, Office of Public Affairs - VFOIA (VA Freedom of Information Act) Front Desk, Media relations, and Sully and Mount Vernon Board Offices. Phase 4 began with the conversion to online with the O365 upgrade and the transition of VFOIA, 2020 BOS updates, Target, 911 Request, and HD emergency response solution. Future phases will continue planned migration from the legacy to the new consolidated online mobile app-ready application platform.

As an example of the potential of this new enterprise platform, during the COVID 19 Pandemic, it was used to deploy a customer facing landlord portal, within 72 hours, to allow for rental assistance. This new resource, modeled after the Commonwealth's landlord portal, allowed landlords to apply on behalf of their residents for rental assistance. This portal connected to the efforts of the Evictions Taskforce and provided landlords a front door to access the Emergency Rental Assistance (ERA) funds.

Project Budget

FY 2022 Third Quarter funding of $300, 000 continues to support this effort. Additional funding of $200,000 is planned for FY 2022 Carryover Budget.

Return on Investment

This centralized enterprise application platform facilitates increased efficiencies, agile deployment, and improved effectiveness in managing the many citizen requests and interactions within and across County agencies and business functions. It allows a constituent-focused and case management operation where government is positioned to be proactive to citizen concerns and needs by enhancing collaboration among all agencies and by providing knowledge of common issues for follow-up. This solution also improves transparency by allowing constituents to easily view how the County manages their request by providing a tracking number. Savings are generated by consolidating intakes, reducing the number of duplicate requests, and eliminating redundant systems. This cost savings provides tangible evidence to citizens that their government is working for them efficiently by providing better access to inform, optimized issue response/processing, and improved accountability/compliance.

2G70-055-000 VOLUNTEER MANAGEMENT SYSTEM PROJECT

Project Description

This project provides an integral approach for recruiting, scheduling, managing volunteers, and producing reports by operational unit. Aggregate reports across County agencies enables more accurate tracking and managing volunteers as well as producing reports by operational units. This system supports integration with legacy volunteer software products used by County agencies and partners (some of which may be converted later).

Project Goals

The primary goal for this project is to better manage over 100 programs spread across multiple facilities in Fairfax County and facilitate enterprise growth of volunteer programs with a single software solution that improves efficiency, recruitment, management, placement, and scheduling. This project also aims for improved tracking and reporting of volunteer contributions and an easy-to-use point of entry for citizens interested in volunteering with Fairfax County. Additional objectives include

developing common policies and data elements for the County's volunteer programs and streamlining the process of matching volunteer abilities, interests, and availability with County agency needs.

Progress to Date

The system now integrates all County agencies with volunteer programs and is available to the Board of Supervisor for recruitment of Boards, Authorities and Commissions (BAC) appointees and general volunteers. There are 59,362 volunteers registered in the system. Pre-COVID over 450 opportunities were being advertised to the public. Currently there are 161 including recruitment for potential BAC appointees by two Board offices.

During the COVID-19 pandemic, the system was used to identify and recruit volunteers with multiple language skills to assist with translation of blogs, FAQs, and other materials for their communities. When the Inova and Community Vaccination Clinics were opened, and hundreds of volunteers were needed, over 550 volunteers were recruited within a few days who were able to schedule themselves for shifts covering 6 days a week. Currently, 27,850 volunteers stand ready to be contacted should the County need to activate a large pool of volunteers. The project will continue to enhance and expand capabilities and improve user experience.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

With over one million County citizens and budget constraints, volunteers are an important component in the sustainability of County programs and services. There are now more than 52,650 ethnically and educationally diverse volunteers registered in the system, representing all supervisor districts.

2G70-069-000 TAX SYSTEM MODERNIZATION PROJECT – TAX/REVENUE ADMINISTRATION

Project Description

This project provides for the replacement of the County's two core tax systems Personal Property and Business Professional and Occupational Licensing (BPOL) with a web-based application. Implementation allows for a comprehensive overhaul of many existing functions such as personal property account administration, business filing and licensing, vehicle registration, tax assessment, exemptions and adjustments, accounts receivable, and billing. Elimination of outdated technology platforms enhances opportunities for integration with other County and State systems, as well as facilitates citizen interaction and self-service opportunities via web-based technologies.

Project Goals

The legacy mainframe platform for the Personal Property system and BPOL limits integration with other County and State systems, limits reporting, as well as constrains citizen interaction and self-service opportunities via web-based technologies. System enhancements and modifications, many of which are required by changes in State and County code, cannot be made economically and require lengthy development periods. Integration with Virginia State Department of Motor Vehicles (VA DMV)

and Department of Tax Administration (DTA) applications which are critical for assessment, taxation, and enforcement purposes, cannot be automated due to limitations within Personal Property and Business Professional and Occupational Licensing systems.

Progress to Date

This project was initiated an in-house effort to redevelop the outdated legacy Personal Property Tax System which includes Personal Property and Business Professional Occupational License, Delinquent Collections and associated reports and interfaces to the cashiering system, WEB, and Commonwealth of VA DMV and DTA. The goal was to redevelop the legacy applications to modern, supportable technology platforms for the existing functionality. The focus was then expanded to include enhancing the citizen, business, and staff user experience with DTA. The expanded scope included database re-organization to eliminate batch processing requirements, addressing data deficiencies and other application limitations, as well as DTA identifying business processing improvements and integration with on-line capabilities including integration with internal County applications, state applications and external County partners. In addition, the applications was optimized to facilitate mobile platform use by County citizens and staff. The initial phase of the project went live on July 6th, 2021; additional systems were identified that would fit in the new framework. These systems have been added to the project to address the print operations, Warrant in Debt, and Disabled Veterans systems.

Project Budget

The project has sufficient budget for the current phases.

Return on Investment

This project eliminates risks to County revenue generated from the assessment and collection of Personal Property and BPOL taxes. Modern technology platforms enable the Department of Tax Administration to enhance customer access and improve services to citizens and the business community and enhance the security and use of web technologies for self service functions increasingly used by the community to interact with County systems. This project also provides for automated integration with other County and State systems directly impacting the County's revenue collection activities and contribute to retirement of the legacy mainframe environment in the data center.

Sec 3 Figure 3 - Menu from Department of Tax Administration website

IT-000006 OFFICE OF ELECTIONS TECHNOLOGY PROJECT

Project Description

The purpose of this project is to coordinate the strategic enhancement of election-related technologies and data-driven initiatives for election systems in Fairfax County. The project aims to help the County identify and implement the business and technical requirements for election-specific hardware, management systems and applications, as well as manage the acquisition and lifecycle deployment of these systems. All project deliverables and services are designed to meet the operational, security and performance requirements of the County and to comply with Federal and State election laws and mandates.

Project Goals

The primary objectives of this project are to identify and resolve election-specific technology gaps and implement technical solutions that consolidate business practices and increase public access to election information and services. Efforts consistent with these objectives include modernizing the agency's voting equipment and electronic pollbooks, as well as upgrading the practices associated with asset management, voter registration, poll worker management and the aggregation of election results.

Progress to Date

Electronic Poll Books – In FY 2022 the Office of Elections acquired 1000 new pollpads which will replace the existing devices that are reaching end of life. These new pollpads have built in functionality for a cellular data connection that will allow for over the air security and data updates while still turning off all network access on election day as required by election code. Once voting has finished these new pollpads can resume their data connection to facilitate faster tabulation and dissemination of the results.

Ballot on Demand Printing – A pilot program for the June 2022 election of a ballot on demand solution is going to run at the six early voting locations. This solution integrates with the existing pollpads and eliminates the need for large amounts of pre-printed ballots. If this pilot is successful, the County will purchase and use the solution for all early voting locations in November.

Voter Registration - Initiated a State-wide survey of scanner used to improve document scanning workflow. Directed all Fairfax County operators to perform a new workflow based on the results of this survey to better account for commonly found issues within the State's voter registration system. This effort has helped reduce scanner operator downtime. Plans are to continue leveraging the improved workflows for scanning.

Election Management System - Installed a new version of Electionware with improved enhancements for the 2022 primary and general election.

Voting Equipment - Successfully tested all equipment ahead of the June 2022 Primary. Planning has begun for a complete replacement of voting equipment after the 2024 presidential election.

Poll Worker Management - Poll workers continue to be managed through new elections specific software.

Election Results - The Office of Election is leveraging Microsoft forms for webforms to be more secure in its data storage for unofficial results.

Project Budget

Additional funding, when required, will be requested at the appropriate time.

Return on Investment

This project will ensure the County's compliance with Federal and State elections mandates as well as the Report and Recommendations of the Presidential Commission on Election Administration and the Fairfax County Bipartisan Commission report on Election Improvement.

IT-000016 BUDGET SOLUTIONS PROJECT

Project Description

Fairfax County Government (FCG) and Fairfax County Public Schools (FCPS) have partnered on a multi-year, joint initiative to implement a budget solution to accommodate the requirements of the end-to-end public sector budget formulation process, projections, reporting and program measures. The annual budget process is an ongoing cyclical process simultaneously looking at two fiscal years (current and future/budget preparation).

Fairfax County Government (FCG) and Fairfax County Public Schools (FCPS) have similar overall budgeting processes with distinct development calculation methodologies, timeframes, and reporting requirements, necessitating the maintenance of autonomy between FCG and FCPS. Business requirements for handling budget development and quarterly adjustments vary from year to year. A budget solution on a modern platform provides the necessary structure and flexibility to meet strategic and tactical requirements with the flexibility to adjust to evolving needs and opportunities.

Modern technology will support preparation of complex budget publications with rapid turnover that rely on consistent data presentation and formatting, in which data must be quickly verified and edited and published in a variety of formats including the WEB.

Project Goals

Development of a budget solution to support all facets of budget preparation on a single platform for both County and Schools including:

- Base and incremental budgeting for both expenditures and revenues
- Annual budget formulation and quarterly review adjustments
- Operating fund budgeting
- Multi-year Capital Project and Grant budgeting
- Modeling and forecasting
- Personnel expenditure forecasting, planning, and management

The new design also:

- Supports the end-to-end process in a single solution platform that is centrally developed and used across the Fairfax organization.
- Facilitates autonomy between FCG and FCPS budget development processes and query.

- Provides functionality to manage related budget office functions such as management and control of position count, performance measurement data tracking, budget monitoring and forecasting/projections.
- Facilitates the presentation of budget data in a variety of formats and levels of detail including summary reports and detailed line-item reports.
- Provides seamless integration of budget processes (development, monitoring, reporting, etc.) with enterprise financial and human resource processes, including the SAP financial system, FOCUS budget modules, grants, human capital management applications in County and FCPS.
- Supports integration with the FOCUS data warehouse for the extraction of budget and actual data at user-defined intervals and upon request.
- Provides for enhanced security and user role management.
- Achieves system maintenance and data management efficiency.

Progress to Date

Implementation of the Budget Solution is complete for the County and Schools. The project is now focused on prioritization for future phases for the solution which include forecasting/projections, performance measurement data tracking, position count tracking, and budget monitoring.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

During the period since FOCUS went live, County and Schools budget staff have been utilizing different legacy and manual solutions for budget preparation needs. The marketplace did not have a commercial solution that met the needs of a local public budget formulation process of the complexity and scale of Fairfax County. After research it was determined that custom development using industry standard tools and leveraging existing County IT infrastructure was the best and most cost-effective path.

Phase 1 of this project provided functionality for budget preparation and budget publication including the ability for central budget staff to prepare Advertised/Adopted budgets and quarterly reviews. The solution provides a permanent budget system with built-in integration with other County systems including integration with the enterprise resource planning systems (SAP) and the reporting data warehouse and providing security roles and user administration to allow access by department end users, thus relieving much of the additional work from central budget office staff. In addition, with role-based access, system controls and security are enhanced.

In addition, the budget solution is better positioned to mitigate risks for system failure by implementing disaster recovery and backup protocols on an enterprise platform. Also, the enterprise platform is scalable and supported by multiple resources. Long-term opportunities remain in gaining operational improvements in a cost-effective manner through continuous implementation of enhancements on a platform that is scalable, maintained on-site and supported by in-house staff.

IT-000017 ENTERPRISE CONTENT SERVICES PROJECT (PREVIOUSLY CALLED ENTERPRISE DOCUMENT MANAGEMENT)

Project Description

Enterprise Content Services (ECSP) project is the County's approach to store, centralize, and share documents and other data; this strategy includes the use of tools that enable the origination, creation, editing, management, review, publishing, search, retrieval, and applied use of information regardless of the initial source or format. ECSP is focused on improving business references allowing the County's mobile workforce to deliver better customer service without limitations of location. Additionally, ECSP provides for cost effective compliance with mandated retention guidelines and governance for data that must be preserved for specific periods of time.

Project Goals

Goals include implementation of a ECSP designed to address the ongoing evolution of technology and its utilization in support of County business functions and management of content across an enterprise. This platform relies on accessing a shared repository that serves as the gatekeeper for maintaining the access rights and permissions to all the content stored within it. This project supports the strategic goals of reducing paper records, promotes efficient archival and retrieval of documents, public access and facilitates electronic workflow process improvement initiatives in County agencies.

Progress to Date

Contract was awarded to multiple vendors for contemporary document management solutions. Business, technical requirements, analysis, stakeholders working sessions and phased implementation which began in FY 2016 continues across County agencies in FY 2023.

Project Budget

Funding of $250,000 will be reviewed as part of the County's FY 2022 Carryover Budget.

Return on Investment

Enterprise Content Services Platform enables the County to have a rich document management and business process flow for retrieval and storage of a vast quantity of required paper records. This technology automates workflows, improves business process efficiencies and productivity, reduces paper records and storage needs, and makes data more accessible, easily retrievable, secure, and compliant with records management regulations such as the Freedom of Information Act (FOIA), Land Development Services, Health and Human Services. Deployment of the County's current document management solution enables on-line search of digital documents and allows for more effective use of advanced analytics for decision making, resulting in service improvements for Fairfax County residents.

IT-000028 GEOSPATIAL INITIATIVES

Project Description

GIS is a strategic foundational technology, integrated with numerous County applications and business processes. It is an essential component of County operations and is heavily used by a wide range of County agencies. GIS data and mapping

applications are extensively used in tax assessments, social equity awareness, public safety, parks management, urban forestry, storm and wastewater management, planning and development, and other business areas.

GIS is utilized across most County agencies daily for planning and decision making. The quality of those decisions depends on the data being used in terms of its currency, accuracy, and completeness. The current initiatives include support for 4 important sets of data: Ortho/aerial imagery, oblique imagery, planimetric data, and LiDAR (Light Detection and Ranging).

- Aerial imagery is the foundation for accurately placing most of the data in the GIS and creating the planimetric data. Derived from aerial photography, orthoimagery is used in almost every GIS application in the County.
- The planimetric data is highly important to many County operations and features the locations of all man made and natural features on the surface. The highly detailed contour and surface data is critical for the County's Stormwater Management Program and is used in all the displays in the County's public safety/emergency response vehicles.
- Oblique imagery is critical 911 call takers who use it to visualize the scene of incidents. It is also essential for the assessment of properties by Tax Administration, checking zoning applications, and as the basis for the creation of 3D data for Virtual Fairfax.
- The County collaborated with US Geological Survey to acquire its first LiDAR, that data has proven to be of significant value to Urban Forestry and Stormwater. As a result, the County will pursue regular refreshes of LiDAR, particularly as its cost continues to decline. The latest acquisition has been delivered to the County and was flown in December 2018. Additionally, the highly detailed and accurate LiDAR data may reduce expenses for planimetric update in the future.

This project continues to modernize the GIS infrastructure and complete the refresh of several GIS based systems critical to County operations. The completed modernization will enable sound integrations of GIS with operational business systems, expand the operational use of GIS, protect the investment in data, and provide the stability expected of corporate systems. The refreshes take advantage of modern tools for improved functionality and capability.

Project Goals

This initiative supports acquisition, maintenance, and refresh of key "foundational" GIS data assets at frequencies necessary for optimal County operations. It also maintains the GIS system through enterprise licensing, hardware acquisition support, and support for GIS based system refreshes or replacements. The refresh goals for each are as follows:

- Oblique Imagery acquisition - refresh every year with 1.7" to 3.5" GSD resolution.
- Ortho Imagery - refresh every year with 2" or 3" GSD resolution.
- Planimetric data (derived from orthoimagery) was updated on an eight year cycle. FY 2022 saw the completion of that cycle and FY 2023 is a planning period for the program. It was determined that LiDAR would replace the topographic update from this project resulting in significant savings by leveraging the County's LiDAR investment effectively.
- The highly detailed LiDAR surface and elevation data can detect erosion and other changes in the ground surface. It is also useful in analyzing line of site options as with the Route 1 Embark project and helping with land use/land cover analyses. In 2017, the County's Environmental Quality Advisory Council (EQAC) specifically recommended that the County pursue regular acquisition of LiDAR which is refreshed every 4 years. Fairfax County received a grant to cover 2/3 of the cost for a flight in FY 2023 which coupled with County funding will produce update surface information close to the recommended interval.
- 3D building modeling has been long used in the Virtual Fairfax application. This data is used to show proposed developments in the existing environment and for community outreach. Given the pace of development and change, this dataset needs to be refreshed, with the older modeled areas given higher priority.

The Geospatial Initiatives Project plans to complete the update and refresh of key County systems:

- **The Master Address Repository –** This situs address database will undergo a modernization study and receive an update to take advantage of new GIS tools and to create a public interface.
- **The Integrated Parcel Lifecycle System –** This tool was created over 15 years ago and is the basis for demographic forecasting. IPLS will be converted from a desktop application to a web-based tool with a public interface.
- **GIS Portal Migration and Resiliency –** This is a key component of the modernization that will stabilize the production system by providing resiliency, capacity, backup, and disaster recovery for GIS.
- **GIS Database Migration –** This is the second major component of the GIS modernization and involves moving the 20+ year Oracle installation to SQL with all scripts, processes, data, permissions, etc.

The project also supports modernization of GIS systems to meet current and future needs for increased mobile capabilities, critical infrastructure, data analytics and program management situational awareness tools, and developing capacity for system growth and business systems integration.

Progress to Date

The GIS Modernization initiative made significant progress in FY 2022. Necessary software licensing was obtained for the horizontally and vertically scaled replacement system. The needed hardware was procured and was deployed for the GIS portal migration, and a core component of the modernization plan was completed in April 2022. The Oracle to SQL Server migration was completed. An entirely new corporate class SQL production instance was deployed in late 2021 and the entire database migrated with all the attendant details and coordination successful and complete. IPLS has been separated from the larger database and placed in production in its own SQL database and is now prepared for legacy use until the refresh is completed. This was a move to safe harbor while the GIS database was moved in its entirety. IPLS replacement will move forward in FY 2023 as the PLUS development allows.

The MAR project kicked off phase one in March 2021 and is currently in phase two. In this phase the project will develop the data editing tools for the data model created in phase 1; and will also develop front end application to access MAR address data and build interfaces to existing systems. Other tasks to be accomplished in this phase will be the final migration of the address data from the current MAR to the newly developed MAR in SQL Server GIS database. Once this phase is complete, the MAR Modernization project will be complete.

The IPLS refresh will begin in FY 2022. FY 2021 activity involved the separation of IPLS from the GIS database and the move of the existing system to SQL server. The legacy system is back in production and will serve County needs for forecasting for until IPLS refresh is complete.

The County has acquired oblique imagery biennially for 16 years. In 2022, the County was re-flown to capture updated oblique and ortho imagery. The second year of a new annual flight cycle. The imagery is used directly by Department of Tax Administration and many other agencies in the heavily used Geographic Exploration & (GEM) application. The imagery is now available to the public in the sister application of GEM, the JADE application. Oblique imagery from 2019 is the source of the 3-D buildings used in the publicly available Virtual Fairfax application.

The aerial orthoimagery jointly acquired with the state has been the foundation data for the planimetric data update. To save resources, the County will pursue the use of its annually flown orthophotography or LiDAR for this purpose. Currently, the

County has complete multi-year LiDAR coverage, one set had a split acquisition (part in 2012 and the rest in 2014), and another complete acquisition in 2018- imagery from two different points in time that can be used for surface change analysis. This project will fund LiDAR again in late 2022 or early 2023. Data from this capture used in comparison to the past will reveal stream erosion areas that can be prioritized for mitigation. Lastly, the planimetric update has completed the final quadrant and the entire update dataset is now in production.

Project Budget

FY 2022 Third Quarter funding of $390,200 continues support for this foundational technology program. Additional funding of $1 million will be considered as part of the County's FY 2022 Carryover Budget.

Return on Investment

The GIS Modernization funded through this project has many tangible benefits and return on investment. A properly resilient and scaled GIS system will serve the County for the next ten years and provide a stable platform for system integrations into the future. This stability is required for the County to exploit GIS in its information system replacements and new acquisitions. Without the modernization GIS would be an under invested weak link in the information system ecosystem and could not safely be relied on for daily operational business systems.

Key GIS data sets are used in all County web applications that incorporate maps and in nearly all public safety vehicles through maps included in the CAD/911 system. Oblique imagery is essential for multiple County functions including critical 24x7 public safety response and tactical tasks, review of zoning applications, property review by the Department of Tax Administration, and provision of 3D data for Virtual Fairfax. The GIS database with new impervious features and contouring, facilitates key land use applications as recommended by EQAC.

GIS data also provides County agencies readily accessible data for locations across the County and the ability to view field conditions from a desktop reducing the need to travel, resulting in significant staff time savings and improved response. GIS technology provides locational intelligence to County businesses assisting County staff and leadership to make better informed decisions benefiting government and citizens. Planimetric data makes up many of the key GIS layers used in most maps created in the County and provides an easy to display base map for all device platforms. Finally, with LiDAR the County has the most detailed surface elevation data available to date, making it especially helpful in stormwater run-off analyses, Urban Forestry canopy evaluations, and line of sight determinations for proposed developments.

IIT-000033 TAX PORTAL ENHANCEMENTS – DEPARTMENT OF TAX ADMINISTRATION (DTA)

Project Description

This project supports enhancements for an improved and streamlined, citizen-oriented experience on the My Fairfax - Tax Portal. The County has experienced tremendous growth and steady demand for online and mobile access to the County's tax and revenue systems. This initiative will continue to modernize and provide easier access to the County's tax portal while maintaining established information security protocols.

Project Goals

Enhancements to the MyFairfax - Tax Portal coincide with established customer service and business initiatives to provide easy access to tax related information and history, and to empower County citizens and businesses to perform all tax related activities, inquiries, payments, etc. remotely, via the web or on a mobile device. Security improvements such as the use of a two-factor and bio-metric identification as well as integration with various password management applications will continue to provide secure access to tax and revenue data. Additionally, functional improvements such as access to tax history via a mobile device by scanning intelligent 2D bar-code information already contained on all County tax correspondence, can be leveraged. Also, further integration with 3rd party applications to facilitate functions such as taxpayer managed recurring payments provide an additional benefit. These enhancements to the MyFairfax Tax Portal will provide a more robust online experience for all taxpayers by enabling an interactive online experience County citizens and businesses expect.

Progress to Date

In collaboration with the CRM (Customer Relationship Management) team, the Tax Evaders application was successfully moved to Microsoft CRM and went live in FY 2021. This has enabled a better customer service experience for both internal and external users of the system. Future enhancements to the system are planned for better integration with other systems. Enhancements to the MyFairfax Portal now offer more efficient signup processes for external users.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

Enhancements to the MyFairfax Tax Portal will improve customer service, decrease the volume of phone calls and in-person visits, help reduce expenditures associated with the printing and mailing of bills, and free staff for other more complex business initiatives. The continual application of new technologies and service delivery methods is necessary to keep up with the demand and expectations for easier online and mobile access to tax information and transactions.

IT-000040 TAX BUSINESS PROCESS ENHANCEMENTS - DEPARTMENT OF TAX ADMINISTRATION (DTA)

Project Description

This project will expand the use of Customer Relationship Management solution in the Department of Tax Administration to several of its other critical DTA business processes that capture revenue (Business Tax, DTA Call Center and Non-Tax Accounts).

Project Goals

The goal of this project is to expand the use of the County's CRM solution to the following DTA sections for improved business processes and revenue collection:

- **Business Tax Section (BTS)** works to bring businesses into compliance by conducting field investigations and surveys for the discovery and audit of business establishments to determine tax liability for business property and business licenses.

- **Central Information Telephone Section (CIT)** is a "one stop" service area to assists and responds to taxpayer inquires pertaining to individual personal property taxes, real estate, and the payment of personal property and real estate taxes.
- **Non-Tax Section (NTS)** is responsible for collecting delinquent payments for nine different Fairfax County Agencies and many ad-hoc agencies as and when the need arises.

Progress to Date

An initial proof of concept was built and tested for operations in the Central Information Telephone Section. Further development has been postponed pending go live of the new personal property tax system. The new Tax System provides a single account model, known as a tax master account, for easier and more accurate development. One system developed to support the Tax Evader's initiative is live and additional areas were identified for migration to the CRM platform.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

The Department of Tax Administration's use of the County's CRM solution in its Audit and Target Business processes has resulted in improved business processes and decision making. DTA anticipates similar improvements from deployment of CRM to several critical business processes that capture tax revenue including the New and Delinquent Business Licenses and Business Personal Property, amendments to already filed Business Licenses and Business Personal Property, and tracking and monitoring delinquent tax payment data.

IT-000046 PCI COMPLIANCE

Project Description

Fairfax County operates a countywide Payment Card Acceptance Program which allows the County to accept credit and debit card payments for most of the services offered to the citizens and their guests for over 1,100,000 transactions each year. This project supports migrating the County payment card acceptance program from the current systems to a contemporary secure web-based enterprise wide system in compliance with the Payment Card Industry Data Security Standard (PCI DSS).

Project Goals

This project plans to migrate the County' s current payment systems to new secure technology for improved security features, better pricing, and lower other costs associated with maintaining a secure and compliant payment card program. Additionally, this project will allow the County to improve and expand programs that can accept credit card and online payments.

Progress to Date

Following project kick off in CY2019, currently 100% of development is complete, with 90% fully implemented across all project channels. Project completion is targeted in FY 2023.

Project Budget

The project has sufficient budget for the current phases.

Return on Investment

The County strives to provide the public with secure and convenient credit card and online payments. This project, once completed, will improve the program by implementing the most current secure card processing technology that was previously unavailable. The project will reduce the cost of the program and enable the expansion of the program to additional community services.

IT-000051 DEPARTMENT OF TAX ADMINISTRATION TAX RELIEF

Project Description

With expanded coverage and eligibility for the County's Tax Relief program, a new system is needed to streamline the processes and track applicants. This initiative will replace the current system used by the Department of Tax Administration with one that will include all approved Board of Supervisors' changes and integrate with the new Personal Property system and Real Estate system. The phased implementation includes scanning and indexing of documents, integration with DocuSign for signatures and workflow of applications.

Project Goals

The primary goal of the first phase of the implementation is to incorporate all the changes approved by the Board of Supervisors for the upcoming 2023 tax year. This includes the ability to accept digital applications, track the application through the system, obtain digital signatures and eliminate the paper trail currently needed to support operation. The system will use new technologies to support business operations and develop a solution that meets the needs of the public and the Department of Tax Administration.

Progress to Date

This is a new project in FY 2023 and is anticipated to begin work in August 2022.

Project Budget

FY 2022 Third Quarter funding of $460,000 will support implementation of the new Tax Relief System.

Return on Investment

This new system will enable the Department of Tax Administration to accept, track and apply tax relief to approved individuals; and will also eliminate paper, reduce mailing, and create greater access to services for qualified individuals.

3.4 TECHNOLOGY INFRASTRUCTURE

2G70-018-000 ENTERPRISE IT ARCHITECTURE AND SUPPORT PROJECT

Project Description

This project supports the strategic infrastructure and expert services required for complex multi-phase enterprise-wide business transformation of IT systems for County general services, enterprise technology, security and infrastructure, and corporate systems including the County's ERP and related business systems.

Project Goals

The main goal is to realize optimal system performance and infrastructure environment efficiencies, and support system enhancement and open-government initiatives. This includes various product platforms, security, middleware, document management, and the web services for seamless performance between Fairfax County Government agencies and Fairfax County Public Schools environments. Additionally, the project provides for on-going transformation support activities, development of business intelligence and reporting model repositories, system performance, system engineering, security access technology and knowledge transfer. The funding supports projected system integration and configuration services and includes various product platforms, security, portal, and web services enabling seamless system integration.

Progress to Date

A modern system landscape and server environment was implemented for development, testing, training, conversion, and full production systems needs that support the SAP ERP solution, portals, security, and third-party bolt-on products for overlapping project phases. On-going infrastructure and specialized expert support services will continue in FY 2023 to support system enhancements including HANA DB migration, workflow and reporting improvements, transparency, system performance and engineering, security access technologies, and technical system refresh.

Project Budget

FY 2022 Third Quarter funding of $800,000 supports services necessary for enterprise-wide business applications and infrastructure processes. An additional funding increment of $800,000 will be reviewed as part of the County's FY 2022 Carryover Budget.

Return on Investment

This initiative supports the County's on-going technology modernization program aligned with the IT investment priorities that provide a stable and secure IT architecture while leveraging IT investments. This program allows for a 24 x 7 system availability and extends the ability of agencies to perform work with an improved window for planning and executing system maintenance activities with fewer resources. On-going support for modernization of County systems empowers both employees and managers to execute processes more efficiently, and support functions that improve overall system performance and availability.

2G70-036-000 REMOTE ACCESS PROJECT

Project Description

This project supports enhanced and expanded capability of authorized County users to securely access the County's systems from remote locations or field service activities, telework, Continuity of Operations Plans (COOP), and emergency events such as pandemic outbreaks or natural and weather emergencies.

Project Goals

This project established an enterprise-wide standardized remote access control methodology and architecture that provides a solution for employees and external system users, partners and County customers to authenticate their identity in order to gain access to systems and relevant data to conduct work securely. All user authentication management is based on policy and centrally managed allowing for comprehensive audit and reporting services. This project supports increased security, simplified management, secure access from remote locations, and mobility.

Progress to Date

Through this project, over 12,000+ users can access County systems as authorized, with over 8,000+ able to gain access simultaneously. Project activity is on-going to support, enhance and expand enterprise-wide remote access, which supports County Telework and Continuity of Operations (COOP) goals.

Project Budget

Funding of $200,000 will be reviewed as part of the County's FY 2022 Carryover Budget.

Return on Investment

This project provides a cost-effective approach to enhance the County's infrastructure in order to provide flexibility for a variety of remote access devices that may be used by County staff. The capability encourages more employees to take advantage of telecommuting in line with regional goals supported by the Board of Supervisors and also provides County staff necessary remote access capabilities in case of emergency events such as snow storms, hurricanes or possible pandemic outbreaks.

2G70-052-000 CYBER SECURITY ENHANCEMENT INITIATIVE

Project Description

The Department of Information Technology defines and enforces the security standards and policies necessary to protect the County's information assets and technology infrastructure. This project supports ongoing cyber security projects and services to support various initiatives safeguarding the County's IT assets from evolving security threats, cyber security system enhancements, replacements and upgrades, service consultation expenses, and future security product and service acquisitions to assist with ensuring the confidentiality, integrity and availability of County systems and information and support for regulatory compliance requirements.

Project Goals

The goal of the County's IT security program is to ensure confidentiality of information, integrity of data, systems and operations, technical compliance with legal mandates such as HIPAA and PCI, privacy, and availability of information processing resources. The basic elements of identification, authentication, authorization, access control, and monitoring are employed throughout the County's technology enterprise.

Project Budget

Planned FY 2022 Carryover funding of $500,000 will continue support for the County's Cyber Security program.

Return on Investment

Cyber security continues to be a fundamental component of the County's enterprise architecture and strategy. The security architecture and practices fuse best practice principles with a hardware and software infrastructure supported by policies, plans, and procedures. This multi-layered approach is designed to provide an appropriate level of protection of all County information processing resources, regardless of platform, and includes incorporation of industry best practices for an overall risk reduction. The secure network architecture is a defense-in-depth approach to network security design. The County is dedicated to the protection of its IT assets from evolving cyber security threats and blocking unauthorized access to County data and information.

IT-000034 ENTERPRISE DATA ANALYTICS AND BUSINESS INTELLIGENCE PROJECT

Project Description

This multiphase project supports the County's strategic objective of improving evidence-based decisions ensuring resources (time, money, and people) are used efficiently and effectively, and developing sustainable strategic plans to better serve constituent populations. This project will position the County to address the County's Strategic Plan across all 9 pillars and allow agencies, programs, and initiatives to benefit from innovative technology solutions such as Internet of Things (IoT), Machine Learning, Artificial Intelligence and predictive analytics.

Project Goals

This project supports implementation of a standardized data analytics platform to eliminate agency data silos by integrating information from disparate County systems for improved analysis, decision making, and more effective service delivery across a spectrum of County services. The goal is to provide timely and accurate data that is easily accessed, understood, and acted

upon, resulting in a more proactive and effective decision making that is financially and operationally more efficient, and to utilize application of innovative technology solutions across County programs and services.

Progress to Date

A newly hired data architect will lead the strategy and development of a data centric framework for standardized acquisition, consumption, storage, and distribution of data in Fairfax County. This Data Division will also work with other County agencies, specifically Department of Management and Budget, in developing the Data Strategy and overall vision and underlying framework of data-centric capabilities and activities for the County.

Project Budget

FY 2022 Third Quarter funding of $300,000 supports this project. Additional funding of $300,000 is planned for FY 2022 Carryover.

Return on Investment

Enterprise Data Analytics will create a one-stop-shop for County program information and data, operationalizing data currently held in system silos via a central data warehouse. Providing an Enterprise Data Analytics solution to public safety initiatives (i.e. Diversion First and the Opioid Epidemic) will inform the County of what its most pressing public safety needs are, and how best to allocate people, time, and money in achieving the outcomes and metrics critical to the success of programs and initiatives. This project will also support the County's Strategic Plan with innovative technology solutions such as Internet of Things (IoT0, Machine Learning, Artificial Intelligence and predictive analytics.

IT-000044 HANA FIORI MOBILE PROJECT

Project Description

This project supports migration to HANA SAP database for SAP applications and deployment of Fiori Mobility for frequently used SAP functions. HANA is an in-memory database software for SAP applications and is required for SAP S Series upgrades, priority patches and processing high speed transactions and analytics. **Fiori Mobility** is a set of applications for frequently used SAP functions such as workflow approvals, information inquiries, and various self-service tasks for desktop, tablets, and smart phones.

Project Goals

Project goals include deployment of HANA SAP database services for advanced high-speed analytics processing, application development, data access, and administration. SAP Fiori will provide role-based, user experience across commonly used SAP function across desktop, tablets, and smart phones.

Progress to Date

The licenses were procured, a detailed plan for deployment was developed and implementation has started with a go live date of February 2023.

Project Budget

FY 2022 Third Quarter funding of $523,000 and planned FY 2022 Carryover budget of $400,000 continue investments and support of this project.

Return on Investment

SAP HANA transforms critical enterprise functions from finance and supply chain to customer service. It enables business to transact, analyze and predict in real time. The primary benefit of migration to SAP HANA database is its speed and access to data in real time. Its architecture organizes and stores data in columns and in-memory which eliminates data copies, allows for faster loading, with less memory. The HANA SAP database is necessary for new SAP upgrades and patches.

Fiori Mobility is a newly written, easy to use set of applications for frequently used SAP functions, such as workflow approvals, information inquiry, and self-service for desktop, and mobile devices. Fiori provides an easy to use configurable and extendable "map" of the SAP system organized by user roles across various devices.

IT-000045 LOADRUNNER PROJECT

Project Description

This project supports LoadRunner implementation, a software testing tool used to test applications that measures system behavior and performance under load. LoadRunner can simulate numerous users concurrently using application software, recording, and later analyzing the performance of key components of the application. Accelerating and enhancing application testing helps improve and maintain high software performance and deliver on business performance improvements.

Project Goals

This project supports implementation of LoadRunner, a load testing software, for faster and enhanced testing of enterprise applications to accelerate testing and development, reduce slowdowns and gain a better understanding of performance issues.

Progress to Date

Testing software as a service will be used on an as needed basis. This project also supports SAP Landscape Management which replaces the existing monitoring application for SAP Systems at substantial cost savings.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

LoadRunner enables validation of performance, simulates workloads, benchmarks production system performance, and optimizes deployments of SAP HANA database software. The application shortens testing and development cycles, reduces bottlenecks and costly production defects, and enables analysis of performance issues for enterprise applications. LoadRunner reproduces business processes that end users would perform in production, creating scripts that can be modified to simulate actual user behaviors. SAP LAMA will automate repetitive, time-consuming administration tasks and tailor processes to the business specific needs.

IT-000048 DIGITAL ARCHIVES

Project Description

This project will build technical capacity for modernization and expansion of the County's state-mandated records management program. The project will design, configure, and implement centrally managed IT applications to enable and support lifecycle management of digital County information having long-term compliance requirements for its retention and disposal.

Project Goals

The project will deliver IT applications, related procedures and user role-based configurations, and initial legacy information collection migrations that the County's records management program will implement and use to streamline automation and monitoring of the acquisition, management, and disposal of County information assets that have satisfied their original business purpose but have remaining legal and other requirements. The deliverables will enable inactive information assets of departmental business applications to be ingested and managed by a central system for the duration of their lifecycle and provide for their timely, compliant disposal to free up County resources and capacity, or facilitate their timely digital preservation into the County's government archives for historical research by County staff and the public.

The project seeks to migrate from a legacy local system installation to the County's Enterprise Content Management (ECM) system, already licensed by the County. This system and related applications will then be built-out to support enterprise-wide role-based coordination with County agencies for records management and compliance-related workflows and procedures, ingest legacy collections of inactive business information assets, and track and identify potentially historical assets for transfer to the County's government archives application and repository.

Progress to Date

Project is investigating external technical staff augmentation through existing procurement vehicle to mitigate constraints and make progress on the testing environment set-up tasks.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

This project provides for the improved compliance with state regulations for the retention and disposition of government records and information, improved management and agency access to legacy business information, and efficiencies in day-to-day management of County business records and information (e.g. consolidation and automation of records workflows and procedures, uniform procedure and repository for agency digital conversion projects), and County and IT resources better targeted to SSOT (single source of truth) and the official copies of information.

3.5 HUMAN SERVICES

2G70-037-000 CHILD CARE TECHNOLOGY PROJECT – (NCS)

Project Description

The Child Care Management System (CCMS) for the Office for Children (OFC) in the Department of Neighborhood and Community Services (NCS) determines client eligibility, tracks child enrollments, and processes approximately $1.5 million per month in provider payments for the Child Care Assistance Program and Referral Program. This application processes over 2,500 home childcare facility permits for Community Education and Provider Services and connects families with childcare providers participating in the Child Care Resource and Referral System. It also tracks current market rates for childcare providers and interfaces with the County's financial management system.

Project Goals

This project will develop and implement a Child Care Management System providing seamless integration of services with the Virginia Department of Social Services' (VDSS) automated childcare system and with the Virginia Child Care Resource and Referral Network (VACCRRN). This project will also align reporting strategy with County and state data, reduce redundant data entry, improve operational effectiveness and productivity, enhance web self-service for the childcare community, and bring OFC technology in compliance with County standards and requirements.

Progress to Date

This project has streamlined business process workflows and system reports to enable staff, customers, and stakeholders efficiently manage information. Implementation of interfaces with various Fairfax County systems and vendor supported systems eliminated manual repetitive processes and provided for a seamless, streamlined integrated case management process.

Additionally, various modules have been enhanced, which allow:

- Approved family childcare programs to conveniently update elements of their business profile on OFC's website
- Request information about family childcare permit requirements and inspections
- Manage and view online reimbursement submissions
- Capture Emergency/COVID-19 related data for childcare programs (family and center) concerning if childcare program was open, days of the week open, hours of operation, capacity, vacancy levels
- Enable Public Safety staff (Fire and Rescue /Police) to search for childcare based on a certain search criterion; and integrate with the Fairfax County GIS application.

Functionality was also included to meet required federal and state legislative mandates, to provide tablet inspection functionality and update forms, to enable an archive and purge process, and added general enhancements to the CCMS system designed to improve OFC's operations and customer access. FY 2021 plans were adjusted after the start of the COVID-19 pandemic in response to emerging requirements and included integrating Emergency COVID-19 data into the Provider Access module and allow providers to update data as needed. Additional plans include:

- Develop a module to capture family inquiries about the availability of childcare services including Head Start, SAAC, and childcare subsidy. This will include tracking referrals to childcare programs prior to the family applying for childcare assistance, and linking childcare assistance inquires to the online Child Care Search function on the County website.
- Implement a Learning Management System for registration, tracking, reporting and data aggregation/analysis of adult education sessions across multiple OFC programs.
- Develop an application checklist workflow in CCMS for Virginia State applications to ensure seamless processing for clients when childcare funding changes from State to local funding.
- Develop a quality control workflow to permit randomized application review.
- Integrate Emergency COVID-19 data into the Provider Access module and allow providers to update data as needed.
- CCAR Application Tracking Report.
- Improve CCSM Provider Access on Mobile Devices.
- School Calendar Management; Team Auto-Assignment; Funding Categories and Team Display enhancement in CCMS; Restricted Access to State Cases in CCMS.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

Modernization of the childcare system has ensured a stable application to support the business functions of the Office for Children. Efficiencies will be gained in seamless integration of processes for VDSS and VACCRRN allowing quicker processing of applications and childcare permits. Migrating to a modern platform that incorporates web technology provided improved accessibility to data and information from remote locations. Additionally, it has eliminated many administrative processes, given customers the ability to manage data online and enhanced childcare search functionality with County GIS integration.

IT-000008 CHILD WELFARE INTEGRATION PROJECT (FROST)

Project Description

The Child Welfare Integration System project will provide a single source for foster care data collection and child welfare resource management and alleviate the time social workers spend updating multiple local databases and spreadsheets as they work to serve children and families. Considerable time is lost from direct client services as social workers comply with manual processes and update data in local systems to fulfill program reporting requirements. The lack of integration between the various systems results in the inability to demonstrate client specific and program-wide progress and does not support data driven decision making. Child welfare clients often exist in complex and unpredictable situations. As such, social workers need a view of all factors influencing children and families which allows them to assess the challenges and to develop comprehensive plans aimed at successful and sustainable outcomes.

Project Goals

The goal of this project is to develop an integrated solution for child welfare program staff which provides a holistic view of case information, business workflows, and data for operational and compliance reports for more effective service delivery. The Online Automated Services Information System (OASIS) mandated by the Virginia Department of Social Services (VDSS) for case management does not fully support the needs of the department's child welfare program management and does not provide the Department of Family Services staff access to all the information required for local reporting. Consequently, reporting on customer data is time consuming, requires redundant data entry and data validation with the state systems.

Progress to Date

Following initiation in FY 2016, this project was put on hold pending discussions with the Virginia Department of Social Services (VDSS) on the availability of child welfare collected data stored in the state's case management system, OASIS. Attempts to gain access to an OASIS data export from VDSS were unsuccessful; the project resumed in 2020 with a revised scope of work for a foster care and child welfare resources tracking system now referred to as Foster Care Resource Operation System for Tracking (FROST). In March 2021 FROST moved to production. Due to state policy changes in January 2021 (details were not known until much later), the Foster Care, Resource, and Training modules could not go live with the rest of the system. A change request is currently in progress to address needed changes. The ADP/KinGap (Adoption/KinGap) and COS (Court Ordered Services) modules are in production and working well. Reports are currently in development.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return of Investment

The FROST system will provide the web-based application required to manage a consolidated data repository of the multiple local systems used primarily for management reports. These include the FCAS (Foster Care Alert System); FAST (Foster Care and Adoption Statistical Tracking); and Foster Care Provider spreadsheets. FROST will provide Fairfax County with a comprehensive solution for managing data collected in various child welfare processes which includes Foster Care Intake, Foster Care Resource Management, Post Adoption Services and Child Welfare.

FROST will streamline and automate the process involved with updating stand-alone systems by providing a single secure portal for data recording activities, thus allowing social workers to do their job more effectively. The time savings gained can be applied toward guiding clients towards successful and sustainable outcomes. Savings are also anticipated with measuring and understanding the impact of program efforts on participants through improved reporting capabilities to track efforts, outcomes, and participant progress. This system consolidation effort is expected to reduce the amount of IT support required to maintain the aging systems currently in place.

IT-000025 INTEGRATED HUMAN SERVICES TECHNOLOGY PROJECT

Project Description

Within the Health and Human Services (HHS) system, clients, individuals, and families are often assessed with multiple needs spanning multiple service programs. A holistic approach to addressing needs along the spectrum of crisis to self-sufficiency to sustainability, as well as strong communication, coordination and collaboration components are key factors in successfully meeting their needs. As the Fairfax County Health and Human Services system enhances business integration, technology will be required to enable and support that vision. The data collected within the Health and Human Services systems help develop policy which shapes future County action.

The strategic use of innovative information technology to support Fairfax County's Health and Human Services Systems will help find the connections in fragmented data and incrementally link pockets of information across and within functional areas for both a mobile and community based workforce, as well as a diverse client base. This project supports the development of a roadmap and implementation plan for integrated Health and Human services technology.

Project Goals

This project plans to develop a comprehensive view of clients and their needs; deliver a scalable set of properly coordinated services, improve service quality with accurate and timely data, and deploy and maintain cost-effective IT assets and services. A well-defined technology strategy will lead to solid planning and successful deployment of resources in support for enhanced business integration.

Progress to Date

Work in FY 2020 and FY 2021 included completion of the first phase of document management, the development and pilot of integrated intake using a constituent interaction application, sharing of data from the data analytics pilot, the documentation of integrated financial and case management technical and business requirements. Recent work expanded planning to include technology systems that were not included in the first phases, such as the School Aged Child Care System (SACC), replacement and upgraded accounts payable, case tracking/management, provider and reporting functionality currently found within the end-of-life Harmony system used by Health and Human Services agencies, as well as better aligned system level analytics with the work from the program metrics and HHS Data Analytics team. The second phase of document management will conclude during the first quarter of FY 2023, and the SACC enhancements will conclude in the second quarter of FY 2023.

Project Budget

Funding for the current phases of initiatives is provided in the project. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

The strategic use of information technology to support Health and Human Services in Fairfax County will help find the connections in fragmented data across many Health and Human Services systems. It will incrementally link pockets of information across and within functional areas for both a mobile and community-based workforce, as well as a diverse client base, and enable analysis of information across programs. Multiple agencies partnering to view clients holistically, tailor services to their specific needs and identify at-risk persons in a timely fashion will enable better client service. Creating an integrated view of client information across Health and Human Services programs and a central point to access data from relevant Health and Human Services systems will also remove redundancy in the client experience (e.g. eliminate the need for clients to submit basic eligibility information numerous times). Additionally, common standards will be created across agencies for critical areas such as IT security, data confidentiality, etc. and appropriate mechanisms to deliver information technology and services that support and improve preparedness, coordination, communication, compliance, and response of Health and Human Services agencies will be designed.

IT-000026 DIVERSION FIRST INTEROPERABILITY PROJECT

Project Description

Launched in 2016, Diversion First is a countywide initiative that offers alternatives to incarceration for people with mental illness, co-occurring substance use disorders, or developmental disabilities who encounter the criminal justice system for low-level offenses. The goal is to intervene whenever possible to provide assessment, treatment, or needed support, to prevent repeated encounters with the criminal justice system and promote a safer community with enhanced public safety. Diversion First is a collaborative effort involving health and human services, public safety, and the courts.

This project supports implementation of a technology solution to standardize and automate data capture, analysis, and reporting, to ensure accuracy of the data, and significantly improve turn-around times for reporting and outcomes analysis. This will ultimately result in improved public safety, a healthier community, and a more cost effective and efficient use of public funding.

Project Goals

Primary technology goals for the Diversion First program are to automate the processes involved in data capture from various sources, standardize the data captured from several agencies and systems, and populate the captured data into a newly designed data warehouse.

Information Technology is vital to support the data collection and return on investment measures across systems and within each component of the Diversion First Initiative. The project will identify associated internal and external systems of partner organizations and interventions as well as data elements and intervention measures across varied law enforcement, justice, and mental health systems to support the data collection, data sharing, and outcome evaluation of these diverse initiatives necessary to determine overall success and assist with decision-making and assessing outcomes. Creating interoperable data capacity is vital to measuring outcomes and assuring quality improvement as additional diversion components are implemented.

Progress to Date

The Diversion First project team has finalized and documented data elements from the various data sources to be used in building the Diversion First Data Warehouse and Power BI as its dashboard reporting solution. Data is captured from the Sheriff's Information Management System (SIMS), the Court's Supervised Release Program (SRP), the Merrifield Crisis Response Center Data Sheet (MCRCDS) and Community Services Board's (CSB) electronic health record (Credible). A BI tool was developed for the Community Response Team (CRT) and an application was developed for the MCRCDS, which will be enhanced to include data for the County's new co-responder teams. A BI tool was also developed for Court Services, automating previously manual data processes for pre-trial and probation services. In addition, significant work has been completed to incorporate behavioral health call data from the Department of Public Safety Communications (DPSC).

To ensure the privacy and confidentiality of the data in the Diversion First Data Warehouse, a Qualified Service Organization Agreement (QSOA) between CSB and the Department of Information Technology (DIT) was signed in September 2019. Memorandums of Understanding (MOU) have also been established between the Sheriff's Office and DIT (December 2019), Police Department and DIT (February 2020), Court Services and DIT (November 2020) Fire and Rescue and DIT (January 2021), DPSC and DIT (January 2022). The CSB also entered into an MOU with DIT in March 2022.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

Providing a data analytics and warehouse solution to initiatives such as Diversion First (and eventually other initiatives like the Health Department's Opioids Initiative) will inform the County of its critical needs, best ways to allocate people, time, and money in achieving the outcomes and metrics critical to the success of the programs. Replacing manual inquiries about past involvement in a mental health or related systems and implementing interconnectivity between disparate systems improves access to pertinent information, streamlines processes, and will result in more informed and timely decision making. Diverting individuals with mental illness, substance use disorders and/or developmental disabilities away from arrest and incarceration and towards more appropriate community based mental health treatment is an effective strategy for providing necessary care and providing an efficient and effective use of public safety resources.

IT-000027 HEALTH AND HUMAN SERVICES INTEGRATED ELECTRONIC HEALTH RECORDS PROJECT

Project Description

This project was originally initiated to pursue a common information technology solution to support Health Care documentation needs for the Community Services Board and the Health Department. The project goals and scope have changed to focus specifically on the Fairfax County Health Department's Programs and Divisions. The solution will support multiple Health Department areas to allow for: the coordination of health care services, documentation of health care encounters, practice management including event scheduling, workflow management and workload management, and revenue cycle management

including registration, payer information, invoicing/billing based on encounter documentation and resource use, and functionality for financial and cost accounting.

Project Goals

The goal of the Fairfax County Health Department's Electronic Health Record (EHR) project is to provide a scalable, information technology solution for health care services and related information management that supports service delivery within the Health Department (HD) as well as coordination of service delivery across County agencies. Over the next fiscal years, the Health Department plans to initiate the planning, development, and testing of the EHR's multi-year implementation.

Progress to Date

In FY 2021 the Electronic Health Record contract was awarded. Initial planning meetings were held, which included project planning and requirement review sessions. The Health Department plans to continue these efforts to work towards a go-live date in FY 2023.

Project Budget

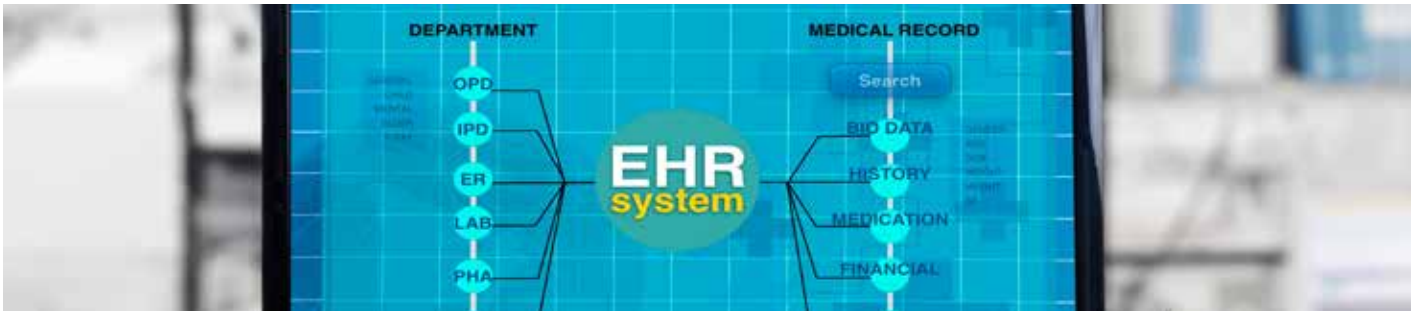
FY 2022 Third Quarter funding of $1,500,000 continues support for this initiative.

Return on Investment

While the scope of the project has changed over time, there is still significant value to investing in an Electronic Medical Record for the public health programs of the Fairfax County Health Department. Currently, the Department maintains paper records and processes for many clinical services. The Department has leveraged a historic practice management system for some limited functionality. Given the age and limitations of the legacy system, the Department has concerns about long-term maintenance of this system and the data it contains.

It is anticipated that implementation of a true EMR for the Department will lead to improved billing practices, increased efficiency operations and increased provider productivity. An electronic system will allow for automated process and the capacity to leverage data on client outcomes, and digitization of paper records will enhance the Department's documentation and records retention processes. Requirements focused on communicable disease investigation and integration with Virginia Department of Health state systems will significantly improve existing process and lead to efficiencies for both organizations with respect to communicable disease reporting and investigation.

The Health Department plans to ensure that the EMR system is implemented in compliance with the County's data governance and integrated analytics frameworks, which will allow for additional HHS analytics insights.



IT-000050 DEPARTMENT OF FAMILY SERVICES DOMESTIC/SEXUAL VIOLENCE E-HEALTH PROJECT

Project Description

This project supports a Client Data Management System for clinical services provided to victims of domestic and sexual violence, stalking, and human trafficking. This project will improve Domestic and Sexual Violence Services (DSVS) compliance with the federal privacy mandates in the Violence Against Women ACT (VAWA) related to security, encryption, privacy, and retention of client records with the victims' personally identifying information. Additionally, built-in workflow will improve efficiencies and data accuracy. The system can automatically upload data to the required state system and eliminate dual data entry.

Project Goals

The project will support effective and efficient service delivery to individuals and families impacted by interpersonal violence who seek clinical services. Inefficiencies in the current electronic health record leads to significant additional time for clinicians and quality assurance staff to properly document, record, store, report, and analyze client level data and interactions. The Client Data Management System will have built-in workflows that will improve accuracy in documentation and coordination of care, streamline data collection, and reporting and outcomes for clients.

Additional features will streamline work processes for staff to include data input validation, templates, treatment plans, and monitoring quality assurance features to align with grant reporting. A data file will be created to upload to the state's required data system to minimize dual data entry and improve data quality. A patient portal will allow for clients to view appointments and upload document throughout their treatment cycle. A key performance indicators dashboard will be created for management and staff to view and use. Data can be purged according to routine schedule and/or manually deleted based on policy.

Progress to Date

This is a new project. The project team has developed a high-level requirements document and identified resources to start work.

Project Budget

FY 2022 Third Quarter funding of $200,000 will support this initiative.

Return on Investment

This project provides for cost savings in staff time resulting from effective and efficient service delivery for staff and clients; enhanced continuous quality improvement and caseload management; and continued eligibility for federal and state grant funding. An effective Client Data Management System will reduce staff time in entering required data and enhance current documentation procedures to save staff time which can be re-allocated to increasing the number of clients served or providing more in-depth, quality services to existing clients. A more efficient service delivery with built-in workflows will improve services and interactions with clients and allow clinicians to self-manage caseloads and client-level outcomes. In addition, improving VAWA-compliance ensures long-term eligibility for continued federal grant funding, which is $1.7 million annually, or 36 % of DSVS annual $4.7 million budget.

IT-000052 HOUSING COMMUNITY DEVELOPMENT DIGITIZATION PROJECT

Project Description

This project will improve Housing and Community Development's (HCD) document digitization efforts and augment the Housing Management and Financial programs. This is a multiphase, multi-year project to include all HCD business/program areas. This program will improve the efficiency, security, retention, and proper access to HCD documents and create automated archives for documents that are critical and must be kept on site. HCD is seeking a system that not only transforms the files in an electronic format but also allows for manageable access to those files in a logical manner.

Project Goals

HCD's goals are to support various partners and government agencies that have different mandates regarding length of time a document must be kept and the types of documents to keep. The types of records the project must address include:

1. Legal/Financial Records
2. Real Estate Finance Records/Loans/Debt and Financing Documents
3. Tenant Files/Customer Files
4. Design and Development/Construction Records

Project Progress

This is a new FY 2023 initiative. Project planning and initiation is pending.

Project Budget

FY 2022 Third Quarter funding of $100,000 supports the first phase of this project.

Return on Investment

This project addresses a critical need in HDC for digitization of paper records. Due to the complex work of HCD, boxes of files are often found stacked along walls for paperwork that must be retained for legal, audit, federal requirements. With a multitude of remote management sites and two application-service centers, distributing records around the County has become cumbersome at best. Additionally, single paper copies have no practical way to be replicated off-site, and the ability to immediately produce records for Federal audits and annual audits is a concern. Many of these files are critical legal documents, official contracts, affordable housing development documents/plans, tenant files and loan information etc. which if destroyed cannot be recreated and would jeopardize the organization.

HCD estimates that 10% of the staff time is spent filing and searching for specific documents, and archiving. Additionally, court cases, FOIA's, and transferring documents site to site puts the agency at great risk of losing / misplacing one of a kind legal document that often cannot be replicated.

3.6 PLANNING AND DEVELOPMENT

2G70-040-000 FACILITY MAINTENANCE MANAGEMENT SYSTEM PROJECT

Project Description

This project supports the Facilities Management Department's (FMD) efforts to implement an Enterprise Asset Management System for effective management of the department's core business line, Operations and Maintenances service delivery. The new system provides FMD with a mobile application to support demand and preventive maintenance. The project also provides specialized reporting and dashboards to enhance FMD executive management of resources and workload management.

Project Goals

The goals of this project are to deploy specialized asset and inventory management systems that meet FMD's unique needs. The vision is to deploy mobile applications with an enhanced ability to manage large inventory of assets, to view, manage, and report on work orders, and to improve the efficiency of preventative and corrective maintenance programs.

Progress to Date

In FY 2019 an application with the requisite functionalities was identified to meet FMD's business needs. A statement of work was developed, and work began on the design and configuration of a system to support the demand maintenance functions for the Operations and Maintenance workforce responsible for maintaining County facilities. Demand maintenance and technician-driven real-time corrective maintenance functions moved to production in FY 2020. In FY 2021, work began on the expansion of operations and maintenance capabilities supporting asset inventory management and preventative maintenance operations. In FY 2022, Activity Dashboards to provide real time snapshots of facility management requests and activities were developed for the FMD Director, Facility Managers, and Chief Building Engineer to monitor performance. Customized reports were also developed to provide the agency with time period-specific and snapshot views of completed activities by type of maintenance,

type of service, and by (geographical area) work zones/regions. A preventative maintenance (PM) pilot was completed to test the PM process on a critical asset type. Some FMD assets were validated and loaded into the system. The loading of facility assets and development of preventative maintenance checklists are ongoing. Facilitated review and discussion of FMD's requisite needs for expanding the application to Design, Engineering and Construction as a tool for managing capital projects.

Project Budget

The project has sufficient budget for the current phases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

FMD reports that the combination of mobile and desktop application of this Enterprise Asset Management System greatly exceeds the capabilities of previous systems. This project provides FMD facility managers with the performance information and reporting tools to support effective planning and management of FMD's maintenance operations for the County's portfolio of facilities and facility assets. The deployment of mobile applications improved efficiencies, timely responses and communication with FMD customers, which provides a more seamless flow for completing tasks associated with a work request. User Agencies are able to electronically track all of their work requests for internal coordination and direct feedback to FMD. The work statistics collected during the performance of maintenance activities provides an accurate and robust set of data used for managing manpower needs and asset performance. The continued investments in service request management solutions allows for upgrades to improve the quality of service and provide necessary updates to improve efficiency of mobile tools. The success of this system has aroused interest from other Departments to utilize for their service-oriented programs.

IT-000010 ELECTRONIC PLAN SUBMISSION AND REVIEW PROJECT - LAND DEVELOPMENT SERVICES (LDS)

Project Description

The Land Use Information Advisory Council appointed by the Board of Supervisors (BOS) issued several guiding principles that included more robust use of technology to facilitate the electronic submission and review of land use applications. The Department of Land Development Services is implementing electronic plan submission, review, and approval to enable architects, engineers and construction professionals to submit plans and revisions online with markup and editing capabilities 24 hours a day, 7 days a week, from anywhere in the world. The electronic process enables constant communication where clients can collaborate with one another for real time editing. The requirement for printing and transporting paper plans will be eliminated, enabling users to submit plans and track review progress in an inexpensive and efficient manner.

Project Goals

The goal is to leverage the pilot ePlans program conducted in the Department of Land Development Services (LDS) and the Department of Planning and Development (DPD) and expand the capabilities currently being developed to review building and site plans electronically. The ePlans initiatives will yield numerous benefits, including enhanced customer service, reduced carbon footprint, cost savings, cost avoidance, and meet recommendations of Board-appointed committees.

Progress to Date

Progress to date has substantially satisfied the original goals of the pilot project regarding usability of the system in Fairfax County. The remaining project goals include platform architecture upgrades and the addition of more plan types submission capabilities to the industry at large. The Project will continue to work closely with the PLUS System project team to ensure the new system provides compatible and/or comparable electronic plan review capabilities.

Project Budget

Since electronic plan scope of work has been moved to the PLUS Project the remaining balance on the EPLANS project will be reallocated to PLUS project. **This project will be retired out of the IT Plan in FY 2024**.

Return on Investment

This project will provide a streamlined and more collaborative plan review process, which advances Goal 3 of the County's Strategic Plan to Facilitate the Economic Success of Fairfax County: Improve the Speed, Consistency, and Predictability of the Development Review Process. In addition to streamlined review and plan submission processes, this project provides significant environmental benefits and financial savings stemming from reduced paper costs and reduced fuel consumption. Once implemented, this project will eliminate/significantly reduce the need to print large paper plans (which can weigh over 50 lbs.) and deliver them to numerous agencies for review. Customer savings and improved customer service combined with a streamlined and more collaborative plan review process advance the County's goal of supporting and enabling further development and redevelopment throughout the County.

IT-000011 EPLANS PROJECT – DEPARTMENT OF PLANNING AND DEVELOPMENT (DPD)

Project Description

The Land Use Information Advisory Council appointed by the Board of Supervisors (BOS) issued several guiding principles that included more robust use of technology to facilitate the electronic submission and review of land use applications. Since that time, the Department of Planning and Development (DPD) made the initial investment to develop and implement a pilot ePlan system for the zoning application process. This pilot project supported the complete review process from distribution of the case material to the various County agency reviewers through action by the BOS with the intent to model a fully automated review process.

Project Goals

This project's goal is complete automation of submission, review, plan markup, and collaboration of land use applications within County stakeholder agencies. The ePlan system facilitates this via many of its built-in features. The pilot project's interim goal was to identify and evaluate the unique challenges of electronic review in a system that must support long-term project review with multiple review cycles; the potential for individual reviewers to change over the life of the project; the need for multiple cases and case types to be reviewed and tracked concurrently; and the need to allow for significant amendments to a case (i.e., amendments such as an addition of land area or change in the zoning district, not just submissions of amended plans).

Progress to Date

Following approved re-zonings, related site plans are now being accepted, distributed, and marked up via the ePlans system also deployed in Land Development Services. This project expansion builds directly on DPD's initial investment in ePlans. Electronic plan review (ePlans) is one of the key features of the Planning and Land Use System (PLUS). When the PLUS system is deployed, this capability will be employed as the standard business process abandoning paper-based plan review. The benefit of ePlans will become fully realized as County staff and customers will have become proficient with electronic plan review and its associated benefits.

The pilot project served its purpose to identify key benefits, concerns and desirable features of an electronic review system. This information is being used directly in the development of PLUS to ensure that the ePlan system incorporated in PLUS is not only functional but provides similar benefits and desired features.

Project Budget

Since the EPLANS pilot has successfully concluded, the electronic plan scope of work has been moved to the PLUS Project in FY 2022. The remaining balance on the EPLANS project will be reallocated to PLUS project. **This project will be retired out of the IT Plan in FY 2024.**

Return on Investment

The incorporation of the ePlan system for plan review will enable staff to process land-use applications in a more efficient manner by significantly reducing the administrative aspects of manually distributing and digitizing large plan sets. The automation of site review, analysis, collaboration, distribution and parallel processing of agency comments and markups potentially yields considerable reduction in applicant costs and improved staff efficiency. The digital process also lends itself to creating higher quality files for better and easier record storage, retention, and access. The pilot project significantly advanced the staff inputs for the development of the electronic plan review feature of the PLUS system.

IT-000019 PLANNING AND LAND USE SYSTEM (PLUS PROJECT)

Project Description

This multi-phase initiative will replace and consolidate numerous legacy land use systems supporting zoning and development plan review, building permit/license issuance, code enforcement, inspection, and cashiering activities. The disparate legacy systems are heavily customized, unable to meet County business processes, and customer service goals. Land Use systems targeted for replacement include the 21 year-old Land Development System (LDS), Plans and Waiver System (PAWS), Zoning Application System (ZAPS), the 14 year-old Fairfax Inspections Database Online system (FIDO), and several complementary systems that provide e-services, and mobile wireless support for citizens and inspectors. These systems lack the native agility of modern technologies that provide a flexible enterprise platform for evolving business process and architecture requirements; they rely on outdated business processes, lack optimal security capacities, and have compatibility issues with emerging desktop, tablet and mobile wireless technologies.

Project Goals

The goal of this project is to modernize the technologies supporting land use and development processes, which is in direct support of the County's Strategic Plan to Facilitate the Economic Success of Fairfax County, specifically Goal 3: Improve the Speed, Consistency, and Predictability of the Development Review Process. The PLUS project also aligns with other strategic initiatives including Fairfax First (an initiative to improve the speed, consistency, and predictability of County development review processes), zMod (and a plan to modernize the County's Zoning Ordinances), Chairman's Community Council of Land Use Engagement, and Phase 2 of the County's Lines of Business: requiring the delivery of modern, private-sector experiences, digitization, and multi-system integration opportunities.

Progress to Date

- The County established governance structure, project plans, developed statement of work, and contracted for consultant support to develop an implementation approach specific to County needs.
- In addition to replacing LDS and FIDO, the new system will also replace over a dozen complementary systems that have been developed over the years to meet new business requirements. The County selected Accela Civic Platform Land Management and Environmental Health Modules for its robust and feature-rich product offerings that will help the County achieve the recommended improvements in the Strategic Assessment.

Planning and design of the future state started in FY 2017, progress highlights and plans include:

- In 2017, County staff selected a software platform and implementation service provider, conducted an initial fit-gap analysis, defined a comprehensive inventory of records, and established environments on the County IT infrastructure.
- County staff conducted independent assessments of current procedures and processes, benchmarking the County against other best practices, identifying opportunities for improvement, obtaining input from the development community, developing recommendations to improve services and operational execution; and an in-depth market scan for solutions.
- An Agile development approach for the PLUS system was adopted to deliver the software on an incremental basis, and continuously improved with end-user feedback to ensure the system meets current business needs. The software platform was upgraded to the most current version.
- Release 1 was successfully launched in the second quarter of FY 2021. The PLUS Project Roadmap was updated in the fourth quarter of FY 2021. Release 2 was successfully launched in the first quarter of FY 2022. Release 3 was successfully launched in the third quarter of FY 2022. Knowledge Transfer sessions from vendor to County staff have started in the fourth quarter of FY 2022. Release 4 is planned for the second quarter of FY 2023.
- Project completion is anticipated in FY 2023.

Project Budget

The project has sufficient budget for the planned releases. Additional funding, when required, will be requested at the appropriate time.

Return on Investment

In addition to providing a single enterprise platform that will enhance land use service delivery activities while eliminating risks associated with legacy system failure and recovery efforts, the PLUS project will deliver a customer service portal for constituents and industry partners with more real time status and transparency about permit applications and land use transactions. Other significant benefits to citizens and staff include GIS integration, modernized mobility platforms for customers and staff, integration with e-Plans and document management systems, decreased processing cycles, opportunities for business transformation, a

scalable and flexible configuration to support evolving business needs, future improvements, and delivery of improved metrics and reporting capabilities.

IT-000035 FIDO LIFELINE PROJECT

Project Description

This project supports requirements of maintaining and supporting the existing legacy land use applications usable pending implementation of the PLUS system. The current systems must remain operational to provide services to County citizens and agencies.

Project Goals

The goal of this project is to support a "lifeline" strategy for support/ upgrade the current FIDO/LDS software/infrastructure required to maintain operational functionality of these critical systems pending go live of PLUS project.

Progress to Date

The project continues efforts focused on the maintenance, enhancement, and support of FIDO/LDS systems for uninterrupted operations. Efforts have focused on required software and infrastructure upgrades, mobility, and various LDS enhancements to comply with mandates and meet agency needs (e-plans, price schedules, system integration, etc.).

Project Budget

There has been no major work to enhance or upgrade FIDO in FY 2022 as the PLUS project which will replace FIDO system is planned to be completed in FY 2023. **This project will be retired from the IT Plan in FY 2024.**

Return on Investment

FIDO-Life Line is a crucial part of technology planning to sustain and support legacy land use systems for sustainability, risk reduction, and base-line performance while County-wide initiatives to modernize the land use and related processes continue with implementation of the PLUS project. This is project protects critical operations and reduces risk of system failure in multiple legacy land use systems that support plans, permits, inspections, and other related activities.

IT-000042 FAIRFAX COUNTY PARK AUTHORITY ASSET (FCPA) INFORMATION MANAGEMENT SYSTEM

Project Description

This project supports implementation of a facilities and asset life cycle management solution to manage ongoing maintenance activities, expanded asset management including linear and bound assets, and to support capital project planning and construction project management for the Fairfax County Park Authority (FCPA).

Project Goals

This goal of this project is to implement an asset management program to guide reinvestment, maintenance, and upgrades to infrastructure and capital equipment for FCPA. The legacy application did not adequately support the agency or meet its

strategic objective. A temporary application is in use to support basic work order management activities. The scope of FCPA's asset information program includes operations and maintenance for a variety of park authority business areas, capital planning, construction management, and integration with the County's enterprise financial systems.

Progress to Date

In FY 2019, an effort was launched to document requirements supporting the specific and unique needs of Park Operations, including supporting the asset lifecycle of non-standard assets. In FY 2020 work was completed on the asset program foundation including classification and prioritization of FCPA assets, asset type inventories, service and work management policies and a condition assessment methodology for FCPA assets. In FY 2021, FCPA completed its rigorous and comprehensive examination of asset management requirements. In FY 2022, FCPA is working with DIT and the County's enterprise ITSM vendor to plan for the new FCPA Asset Information Management System (AIMS). The proposed system meets FCPA's Asset Management Branch core requirements to allow FCPA managers and staff to perform their work efficiently and effectively, whether they are creating or executing work orders, identifying or decommissioning assets, or producing and managing large-scale Park planning projects. Advantages of the new application includes a robust and agile user interface, intuitive workflows, and the ability to integrate with ESRI for GIS integration. Phase 1, in FY 2023 will involve implementation of a large set of the AMB program foundations and fundamentals including Asset Management and Work Order Management. Later in the year, the focus will shift to include the initial implementation phases for Inventory Management, General Services, and the FCPA Capital Improvement Program.

Project Budget

FY 2022 Third Quarter funding of $700,000 continues support for this project. To manage continuity of the implementation, the project team will request additional funding to maintain seamless application implementation rollout through all phases.

Return on Investment

Investment in a contemporary asset management system for the Park Authority will provide the tools and analytical data to determine the total cost of ownership for the acquisition and maintenance of County Park Authority assets. The efficiencies in transitioning field operations managers and staff to mobile devices will improve performance and accuracy of the maintenance of assets and extend the useful life of assets managed by FCPA. The portfolio of the Park Authority's assets is diverse and unique. Assets covered by the new asset management system include park trails, recreation centers, athletic fields, moveable assets, equipment, and natural and cultural resources. A well-integrated and comprehensive asset management system will significantly improve the FCPA's quality of information to provide service to customers and residents and improve revenue generated by FCPA programs and facilities. Additional benefits include enhanced decision making based on the condition of assets and requirements for upgrade, renovation, and replacement.