Department of the Treasury
Internal Revenue Service
FY 2021
Capital Investment Plan
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Note to Reviewers

The Office of Management and Budget (OMB) Capital Planning Guidance changed how certain IT Investments are categorized. The Agency IT portfolio summary consists of Part 1: IT Investments for Mission Delivery; Part 2: IT investment for Administrative Services and Support Systems, and Part 3: IT Investments for IT infrastructure, IT Security, and IT Management (so called “standard investments”). The guidance no longer requires Part 3 investments to be reported as major or non-major investments. However, the Department of the Treasury’s Capital Investment Plan will continue to report these investments. Consistent with the corresponding Summary of Capital Investments table, the columns included in the investment tables below are defined as:

- FY 2019: Obligations of budgetary resources, which may include annual funding, prior year balances, user fees, and other sources;
- FY 2020: Estimated obligations based on the enacted funding level for FY 2020 as reflected in the FY 2021 President’s Budget. Figures may include annual funding, prior year balances, user fees, and other sources; and
- FY 2021: Estimated obligations based on the funding requested in the FY 2021 President’s Budget. Figures may include annual funding, prior year balances, user fees, and other sources. The amount of new budget authority requested for a given investment can be found in the accompanying “Summary of Capital Investments” table (see “FY 2021 Budget Authority Request” column).

The IRS Integrated Modernization Business Plan and the annual Key Insights report describe annual milestones as well as long-term performance metrics for each of the modernization projects, including CADE 2. Additional information about Treasury’s IT capital investments is available at the link below:

https://itdashboard.gov/drupal/summary/015
Major IT Investments

Account Management Services (AMS)

Description:

AMS is a major strategic investment that delivers improved customer service to over 34,000 end-users by providing the tools necessary to access tax information quickly and accurately.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal Labor (Govt. FTE))</td>
<td>1.03</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>12.44</td>
<td>15.79</td>
<td>16.41</td>
<td>0.62</td>
<td>3.94%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>13.47</td>
<td>15.79</td>
<td>16.41</td>
<td>0.62</td>
<td>3.94%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

AMS is a strategic program that delivers improved customer support for managing taxpayer accounts for over 34,000 end users across:

- 7 Small Business Self Employed (SBSE) business units
- 4 Wage and Investment (W&I) business units
- 1 Large Business and International (LB&I) business unit
- Criminal Investigation (CI)
- Tax Exempt and Government Entities (TEGE) by leveraging existing Internal Revenue Service (IRS) applications.

AMS consolidates information from multiple IRS systems into a single user interface, allowing IRS employees the ability to access, research and update taxpayer accounts quickly. AMS provides data presentation services to display and validate changes/uploads for taxpayer accounts, facilitates management actions/activities and makes case information readily available for decision making and reporting. In addition, AMS provides end users with the ability to work specific case workload, through nine case management and referral inventories.

2019 Accomplishments & Future Objectives

- Delivered modifications in support of legislative and filing season tax year changes.
- Delivered modifications to move the investment closer to industry standards.
- Maintain investment to keep asset functioning as designed and maintain high performance record.
- Upgrade AMS infrastructure, including hardware and Commercial Off The Shelf (COTS) product software upgrades.
Affordable Care Act Administration

**Description:**

The ACA investment encompasses the planning, development, and implementation of IT systems needed to support IRS’ tax administration responsibilities associated with key provisions of the ACA legislation.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.54</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>145.86</td>
<td>108.68</td>
<td>109.97</td>
<td>1.29</td>
<td>1.18%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>146.40</td>
<td>108.68</td>
<td>109.97</td>
<td>1.29</td>
<td>1.18%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

The ACA Administration investment supports IRS tax administration responsibilities associated with the key provisions of the ACA legislation. These responsibilities include:

- The maintenance of the necessary systems to support the Health Insurance Marketplace;
- Validation of health care coverage retained by individuals and provided by employers, along with assessment of required penalties;
- Administration of a variety of industry-specific credits, fees, and taxes (including, but not limited to, branded prescription drug companies, health insurance companies, high-cost health insurance plans, taxes on medical devices and services); sharing of information across governmental entities and additions or changes to individual and business tax administration (such as new credits or payments, or changes to return processing).

Releases ACA 1.0 through 7.1, already in production, included the design and deployment of new systems, along with changes to existing IRS IT infrastructure. These releases:

- Supported implementation of new taxes, credits, and fees, such as the Small Business Health Care Tax Credit, Branded Prescription Drug Industry Fee, Excise Tax on Medical Device Manufacturers, Hospital Insurance Tax, and Insurance Provider Fee.
- Provided the technical solution to support Health Insurance Marketplace open enrollment in the fall of 2013 and thereafter on an annual basis, along with IRS pre-filing and post-filing compliance activities.
- Expanded information return processing and capabilities needed for compliance processing.

The ACA investment includes the following systems: the ACA Coverage Data Repository, Income and Family Size Determination, Information Sharing and Reporting, Premium Tax Credit (PTC), ACA Information Returns, ACA Verification Service, ACA Compliance Validation, and acceptance and validation of ACA Information Return 1094/1095 A/B/Cs.

For fiscal years 2020 and 2021, IRS will focus on operations and maintenance of the systems in ACA 1.0 through 7.1 in the Current Production Environment (CPE) to support Filing Seasons and Open Enrollments and CPE updates to existing non-ACA systems that support ACA.
Business Services

Description:

This investment will provide a simple and secure manner for small businesses to file critical tax information returns electronically through an online business services platform. This platform will enable businesses to prepare and file information returns online while preparing payee statements and creating the necessary business records. This investment will support improved compliance of small business taxpayers while reducing administrative burden.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.00</td>
<td>15.00</td>
<td>16.08</td>
<td>1.08</td>
<td>7.17%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>0.00</td>
<td>15.00</td>
<td>16.08</td>
<td>1.08</td>
<td>7.17%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

Business Services will enable taxpayers to prepare and file Forms 1099s, prepare Forms 1099 for distribution to recipients other than the Internal Revenue Service, and maintain a record of completed and submitted Forms 1099 via an online service. This capability will provide a simple and secure manner for small businesses to prepare, file and distribute critical tax information returns electronically, while maintaining a record of completed and submitted Forms 1099. Providing an online platform for submitting information returns is expected to improve compliance of small business taxpayers while reducing their administrative burden.

The Taxpayer First Act (TFA) was signed into law in July 2019. IRS has started gathering business requirements to satisfy the provision. In FY 2020, the IRS will complete planning, requirements elicitation, engineering and architecture; and begin the development work necessary to meet the requirements of TFA Provision 2102. Future Objectives: The IRS anticipates completing all IT lifecycle activities over the next three years (i.e., Planning, Requirements Elicitation, Engineering and Architecture, Design, Development, Integration, Testing, Data Access/Migration, Cyber Security, and Deployment); the agency is required to meet the requirements of this provision by January 1, 2023.

Customer Account Data Engine 2 (CADE 2)

Description:

CADE 2 is IRS's modernized core tax processing system. It leverages modern-day database technology, programming languages and principles to determine refunds, penalty and interest, monitor compliance, and track historical data about individual taxpayer accounts. CADE 2 is a data-centric solution that provides daily processing of taxpayer accounts.
**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>81.67</td>
<td>100.00</td>
<td>100.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>18.00</td>
<td>19.15</td>
<td>19.72</td>
<td>0.58</td>
<td>3.01%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>99.67</td>
<td>119.15</td>
<td>119.72</td>
<td>0.58</td>
<td>0.48%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

CADE 2 implements a single, data-centric solution to provide daily processing of taxpayer accounts and address financial material weaknesses (FMW) and maintain IRS's clean audit opinion. CADE 2 was chartered in 2009 to provide 21st century technology and digital services to the taxpayer and to IRS employees. The CADE 2 solution includes an authoritative database for individual taxpayer data that is transforming the way the IRS approaches tax administration. In addition, CADE 2 is improving the rates by which we process data by reducing the latency associated with antiquated technology. CADE 2 goals are to 1) establish one authoritative source for taxpayer data by leveraging a relational database and daily processing capability; 2) continue IT modernization efforts so business processes can be realigned to enable better taxpayer service and more timely compliance; 3) address the Unpaid Assessment FMW (downgraded to a Significant Deficiency in 2018), demonstrate compliance with Federal Financial Management System Requirements, maintain a clean audit opinion; and 4) improve security and privacy posture. CADE 2 is progressing through the largest, most critical part of the program, Transition State (TS2). Two initial goals of TS2 (establishing the CADE 2 database as the authoritative data source for financial and legal purposes and addressing the Unpaid Assessment FMW) were moved to the Target State due to recent program planning decisions and budget prioritization. All available resources are now directed to the most critical goal of reengineering the Individual Master File (IMF) core components, which is prioritized due to its complexity and reliance on dwindling subject matter experts. In the Target State environment, the current individual taxpayer account system core components will be retired. Completing CADE 2 is not synonymous with "retiring IMF" - future capabilities will enable visibility and access to taxpayer account detail on a near real-time basis for internal and external consumers of individual taxpayer data. Transition State 1 (TS1) and TS1.5 built and initialized the CADE 2 database in production. In doing so, the IRS accelerated the return processing cycle from weekly to daily and moved the management of individual taxpayer account data from 1960s sequential flat-files to state-of-the-art relational database technology. This accomplishment was the first key technological advancement of the program and was implemented by updating individual tax accounts daily. CADE leverages relational formats dictated by a data model that maintains historical values never before retained on account transactions, with instant viewing of taxpayer account data by IRS customer service. TS1 delivers faster refunds and notices, faster payment postings, and improved service for taxpayers. CADE 2 is progressing through TS2. Starting in FY 2018, CADE 2 resources focused on reengineering the IMF's core components (IMF Runs 12 and 15) through delivery of the Individual Tax Processing Engine (ITPE) project. This included the completion of development activities for the 1st eight 10-week Product Increments. The project has converted over 30% of the code for ITPE. 15 Future Objectives: The IRS IT Modernization Plan sets goals for modernization efforts and will be updated periodically to reflect progress. FY20 and FY21 milestone targets have been established based on a refined development velocity model, which reflects updated productivity projections. IRS will complete the modernization of core tax processing through ITPE, establish CADE 2 as the authoritative data source and make that data available for multiple uses, and provide enhanced financial information to improve financial reporting.
e-A3 (Authentication, Authorization, Access)

**Description:**

e-A3 provides Secure Access to IRS Web based applications and data to protect taxpayers from identity theft and make the IRS’s applications more accessible, secure, and intuitive for customers. e-A3 is a program that combines the eAuthentication (in Production), eAuthorization (in Production & O&M), and eAccess (in conceptual phase) projects. It will manage secure access, application and data analytics.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>35.96</td>
<td>54.30</td>
<td>23.82</td>
<td>-30.47</td>
<td>-56.12%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>31.21</td>
<td>22.60</td>
<td>27.63</td>
<td>5.03</td>
<td>22.28%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>67.18</td>
<td>76.90</td>
<td>51.46</td>
<td>-25.44</td>
<td>-33.08%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

Secure Access is the enterprise identity proofing, authentication, registration and single-sign-on application for taxpayers to access IRS public facing online services and is a critical cyber defense that prevents unauthorized access to taxpayer data. This program enables taxpayers to create a digital identity and register for a Secure Access profile. This investment will modernize the log-in process, improve the taxpayer experience, and comply with new federal identity and security standards. New authorization capabilities will manage permissions to access customer data and information. Reporting capabilities will provide the tools and infrastructure to manage response and recovery capabilities, track real time business performance metrics, fraud analytics, system performance results, and application usage information. Specific capabilities include: Digital ID proofing and authentication technology that will utilize federated credential service providers, third party trusted sources, and risk-based authentication. Goals of the program are to integrate Secure Access data with other channels such as phones and in person contacts, to improve omnichannel authentication and analytics on the customer experience and fraud detection, and to provide for authorization capabilities to perform attribute-based access controls for third parties and tax professionals and an e-Signature solution for authenticated taxpayers to electronically sign and submit IRS documents online.

Accomplishments:

- eAuthentication (eAuth) is in Production. Deployed Taxpayer notification. Added Voice OTP for more user coverage. Implemented changes for Filing Season (FS) 19 that resulted in 99 percent availability. Supported over 15.6 million registered users (43 percent higher than FS 2018). Infrastructure updates to improve efficiency and performance. Implemented Device ID/Fraud Net with Vendor Adapter that translates taxpayer requests during ID proofing/financial account/phone verification. Enhanced taxpayer usability and resolved bugs/defects. Infrastructure upgrades (including implementing SiteMinder behind load balancers and upgrading Identity Manger to version 14.2 and JDK 1.8) to
improve stability and performance. Addressed TIGTA finding for audit logging and improved performance efficiency for OPA/EPSS. Secure Access Digital Identity (SADI) is in planning and design. Completed Vision, Scope and Architecture (VSA) and Implementation Strategy, and aligned with Enterprise Services, Cyber Security, and Identity Assurance stakeholders. Elaborated on the high-level backlog by decomposing epics to user stories; allocated to eAuth Upgrade or SADI workstream; performed SADI program increment and sprint planning. Completed draft of the SADI Implementation Schedule to submit to GAO/TIGTA. Continue to access external facing applications with Digital Identity Risk Assessment (DIRA) process.


2020 and 2021 Future Objectives include:

e-Services (e-SVS)

Description:
e-Services is a suite of web-based, self-assisted services that consist of two parallel multi-tiered access portals, one for registered third-party users and one for IRS employees. Internal Revenue Service reinforced the importance of leveraging the indirect channel of third-party relationships to meet its strategic goals of service to all taxpayers, and productivity.

Investment Obligations:

<table>
<thead>
<tr>
<th></th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.04</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>9.64</td>
<td>10.02</td>
<td>10.40</td>
<td>0.38</td>
<td>3.77%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>9.68</td>
<td>10.02</td>
<td>10.40</td>
<td>0.38</td>
<td>3.77%</td>
</tr>
</tbody>
</table>
**Purpose, Accomplishments, Future Objectives:**

FY 2019 Objectives:
- Deliver Transcript Delivery System (TDS) Late Legislative and Wage and Income 2019 Updates.

FY 2020 Goals:
- Upgrade e-Services infrastructure, including hardware and Commercial Off The Shelf (COTS) product software upgrades to adhere to the N-1 enterprise standard.
- Deliver Bot/Shape through the implementation of Application Programmers Interface (API).
- Deliver modifications in support of legislative and filing season tax year changes.

**Enterprise Case Management (ECM)**

**Description:**

Enterprise Case Management (ECM) will address the need to modernize, upgrade, and consolidate many current IRS case management solutions. ECM will provide an enterprise solution for performing case management functions utilizing a common infrastructure platform, thus reducing long-term costs. The current systems provide limited visibility into case management practices between programs, introduce process redundancies, and require multiple handoffs that can lead to bottlenecks and increased risk. The case management functions will be developed as common services for multiple systems to share. Implementation of the solution will provide a consistent approach to case management across business units.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>S Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>59.54</td>
<td>66.20</td>
<td>64.00</td>
<td>-2.20</td>
<td>-3.32%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.01</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>59.56</td>
<td>66.20</td>
<td>64.00</td>
<td>-2.20</td>
<td>-3.32%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

Enterprise Case Management (ECM) provides an enterprise solution for performing case management functions using a COTS platform and common services to improve customer service, automate manual processes, increase efficiencies and simplify case management systems operations. ECM will implement a COTS solution to improve case creation, management, closure, and reporting. ECM will help drive modernization efforts across the IRS, leading to increased business and IT efficiencies and improved customer service while eventually enabling the retirement of legacy case management systems.

The IRS envisions modernizing and standardizing enterprise-wide case management processes and systems to provide top quality service to taxpayers. ECM will empower employees to rapidly resolve
cases in a simplified technical environment, designed to drive efficiency and collaboration. By the end of FY2022, the ECM Program should be on a sustainable path towards achieving organizational transformation:

- ECM’s target platform and core capabilities will be in use for case management, with most major business organizations having an operational footprint on the target platform and demonstrating value to the taxpayer.

- ECM adoption and evolution will be part of the normal course of IRS business, enabling incremental retirement of legacy case management components.

After the ECM Program discovered significant technical limitations with the previous COTS product being used for case management at the IRS in early 2017, the program defined and launched a product assessment and acquisition strategy to identify and evaluate products/solutions to meet IRS business and technical needs. These products/solutions must be scalable to serve as the foundation for an enterprise case management platform. The strategy includes:

- Information exchanges with other agencies to learn about their experiences in implementing enterprise case management.
- Information exchanges with industry via requests for information (RFI).
- RFI vendor demonstrations to learn about capabilities and features available in the case management marketplace.
- Analysis of applicable audit findings and recommendations across multiple agencies.
- A draft and final request for quotations (RFQ) informed by the above information.

The IRS published the final RFQ in May 2018, evaluated responses over the summer, and issued awards to begin execution of the ECM Physical Assessment and Analysis (EPAA) with two selected vendors in November 2018. The EPAA includes challenge-based scenarios completed by vendors over several months to ensure that their products met all mandatory minimum requirements and function well in the IRS IT environment. The IRS selected a solution in August 2019. However, a GAO protest by the non-selected vendor and subsequent corrective actions have delayed this acquisition, which is now planned to occur in spring 2020.

The IRS started work on ECM Release 1 in October 2018 and is performing activities that can be worked concurrently with product assessment and selection. For 2020, the investment anticipates delivering initial case management capabilities through ECM Release 1, with subsequent releases in 2021 and beyond providing additional case management functionality across business units.

**Foreign Account Tax Compliance Act (FATCA)**

**Description:**

FATCA requires foreign financial institutions to report to the IRS information about financial accounts held by U.S. taxpayers, or foreign entities in which U.S. taxpayers hold a substantial ownership interest. This investment is essential to the IRS fulfilling its international commitments and to the IRS fully utilizing the information directed by Congress to promote compliance for U.S. taxpayers using foreign accounts.
**Investment Obligations:**

<table>
<thead>
<tr>
<th></th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.00</td>
<td>1.00</td>
<td>0.00</td>
<td>-1.00</td>
<td>-100.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>39.31</td>
<td>34.16</td>
<td>34.96</td>
<td>0.80</td>
<td>2.34%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>39.31</td>
<td>35.16</td>
<td>34.96</td>
<td>-0.20</td>
<td>-0.57%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

The purpose and goal of FATCA is to promote disclosure of foreign accounts held by U.S. taxpayers and to integrate this information into current IRS compliance activities. FATCA introduces new reporting requirements for U.S. taxpayers and Foreign Financial Institutions (FFIs). The legislation requires U.S. taxpayers holding foreign financial assets, with aggregate values exceeding certain thresholds, to annually report information to the IRS; and for FFIs with U.S. taxpayer accounts to register, report annually to the IRS, and withhold/pay 30 percent of selected U.S. source income to the IRS. These complementary provisions create a web of international tax accountability, allowing the IRS to gather and analyze information from multiple sources, bolstering the compliance of U.S. taxpayers with assets overseas.

Treasury has worked with foreign governments to negotiate Intergovernmental Agreements (IGAs) that address specific legal impediments surrounding privacy laws and the disclosure of account holder information. In addition to foreign account and asset data submitted by taxpayers and entities, the IRS will assemble and transmit Bank Deposit and Interest (BDI) data on accounts held by foreign nationals from U.S. financial institutions (FIs) to foreign government Host Country Tax Authorities (HCTAs), under agreements intended to facilitate FATCA adoption.

The FATCA investment encompasses planning, development, and implementation of key IT systems needed to support IRS tax administration response to FATCA provisions. Work is organized into Releases that deploy functionality to meet key legislative dates. Major application components of the FATCA Program are: Financial Institution (FI) Registration, International Data Exchange Service (IDES), International Compliance Management Model (ICMM), Withholding and Refund (W&R) and Qualified Intermediary (QI) Application. Release details are explained in further detail below.

In FY 2018, IRS implemented legislative requirements that allowed for maintenance of the Qualified Intermediary (QI), Financial Institution Registration System (FI), and International Compliance Management Model (ICMM) releases, as well as creation of reciprocal reports, submitted QI periodic certifications and pre-existing FI certifications, and resolved outstanding issues. FATCA moved to normal operation in October of 2018.

The IRS has delivered all legislative mandated functionality ahead of schedule and under budget that was approved under FATCA governance.

- Deployed state-of-the-art FATCA Registration solution for Financial Institutions (FIs) worldwide, establishing a streamlined environment to register, ensuring data security; 367,754 FIs have registered as of March 02, 2020.
- Developed Global Intermediary Information Number (GIIN), issued to FIs that register with the IRS that allows the U.S. and IGA partners to identify FIs with associated filing data
- Deployed an electronically searchable/downloadable FI List
• Developed uniform standards for data collection/transmission from FIs via the FATCA XML schema, with cooperation of foreign governments; information sharing pursuant to IGAs will takes place in accordance with these standards
• Released new FATCA forms and deployed a global platform, International Data Exchange Service (IDES); successfully enabling reporting and electronic information exchange
• Launched ICMM to receive, process, store, and manage FATCA data received from various sources, making it available for future compliance activities
• Implemented significant communication/ outreach activities to streamline processes and provide FATCA guidance (e.g., issues escalated from IRS.gov, eHelp Desk, and Comments Application)
• Established IGAs with over 100 governments worldwide, on behalf of the Department of the Treasury
• Implemented Reciprocal Data Exchanges to include Form 1042S-Withholding Agent changes; application submission, QI Agreements; and Renewal of FI Agreements.

FATCA's long-term goals will be achieved through the FATCA Program Release Plan, which outlines a prioritized approach to: address required legislative mandates, deliver new/enhanced business capabilities, reduce/mitigate risks, evaluate deficiencies in current system capabilities, reduce manual workarounds for the Business and IT, improve FATCA compliance practices, and establish IT capabilities that can support other IRS initiatives.

**Individual Master File (IMF)**

**Description:**

IMF is the authoritative data source for individual tax account data. All other IRS information system applications that process IMF data depend on output from this source. IMF is a critical component of IRS' ability to process tax returns. IMF is one of Treasury’s high value assets (HVAs) for its critical role in tax administration. The Office of Management and Budget defines HVAs are “those assets, systems, facilities, data, and datasets that are of particular interest to potential adversaries”.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>4.21</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>14.27</td>
<td>13.73</td>
<td>14.08</td>
<td>0.35</td>
<td>2.53%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>18.48</td>
<td>13.73</td>
<td>14.08</td>
<td>0.35</td>
<td>2.53%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

IRS is responsible for collecting revenue from individuals to fund the operations of the federal government. In order to effectively accomplish this goal, it must maintain authoritative data on individual taxpayers. The IMF is the authoritative data store for individual taxpayers’ accounts. Within the IMF, accounts are updated, taxes are assessed, and refunds are generated as required each tax filing
period. Virtually all IRS information system applications and processes depend on output, directly or indirectly, from this data source.

Currently, the IMF continues to fill the functional needs of the individual taxpayer account processing and to perform Operations & Maintenance for tax law changes. Future endeavors include a translating key IMF runs from Assembly Language Coding (ALC) to JAVA in conjunction with the CADE2 project. The IMF team will continue interacting with programs that impact IMF and continue performing Operations & Maintenance for tax law and maintenance changes.

**Integrated Customer Communication Environment (ICCE)**

**Description:**

ICCE provides problem-solving information through software and connections to legacy databases for both the phone and web. These applications use voice response, Internet, and other computer technology to provide service to taxpayers 24 hrs a day.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor)</td>
<td>0.18</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor)</td>
<td>10.59</td>
<td>9.84</td>
<td>10.21</td>
<td>0.36</td>
<td>3.68%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>10.76</td>
<td>9.84</td>
<td>10.21</td>
<td>0.36</td>
<td>3.68%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

Integrated Customer Communication Environment (ICCE) directly supports the IRS Strategic Goal of enabling all taxpayers to meet their tax obligations while protecting the integrity of tax system. ICCE supports and maintains the following taxpayer-facing web and telephone applications:

- Get Transcript allows authenticated taxpayers to securely view copies of their account online.
- Order a transcript allows taxpayers to order transcripts online. Online Payment Agreement (OPA) allows the taxpayer or Power of Attorney and qualified businesses to apply for and receive on-line approval for a short-term extension to pay or set up a monthly installment agreement.
- Identity Protection PIN (IPPIN) provides a pin to taxpayers that are victims of identity theft or potential victims.
- Internet Refund Fact of Filing (IRFOF) - Where's My Refund (WMR) - provides tax refund status information via the web to Form 1040 (individual) series filers.
- Where's My Amended Return (WMAR) allows taxpayers to check the status of their amended returns via web or smartphone.
- Internet Refund Trace allows taxpayers who have not received paper refunds after a specific amount of time to initiate a refund trace.
- Modernized Internet Employer Identification Number (MOD IEIN) allows the general public to apply for an Employer ID number (EIN) online.
• ICCE provides a set of telephone applications allowing individual taxpayers to interact directly with their accounts.
• ICCE Online Services (OLS) Web services & mobile applications is designed to be used via smartphone technology. Applications include Foreign Account Tax Compliance Act Foreign Financial Institution (FATCA FFI) Look-up Tool, Offer In Compromise (OIC) Calculator, Return Preparer Look-Up Tool, IRS2Go, Volunteer Income Tax Assistance (VITA).
• FIS (Federal Investigation Standards) Tax Check application, required by Executive Order (EO) 13476, will conduct an automated tax compliance look up and disclose limited tax return information.
• Federal Student Aid - Datashare (FSA-D) - web based application providing taxpayers completing the Free Application for Student Aid (FAFSA) through the Department of Education's FAFSA On The Web (FOTW) with access to relevant tax data from their filed individual Federal tax return.
• Private Debt Collection Data Transfer Component (PDTC) - a legislative mandated initiative for Private Collection Agencies (PCAs) to collect certain categories of past due taxes for individual taxpayers and businesses.

FY 2019 Accomplishments
• Developed more compensating controls around web applications to enhance security completed in May (WMR), MOD Internet Employer Identification Number (IEIN), Where's My Amended Refund web & telephone
• Allowed taxpayers of selected states to obtain IPPINs voluntarily.
• Created IRFOF & Refund Inquiry
• Updated document and math error codes due to Tax Reform, as well as updating thumbnails to WMR
• Created and updated Spanish thumbnails and help page and entry page text for current filing season

MODIEIN
• Updated Technical System Requirements in Help testing 508 changes
• Reinstated Google Analytics
• Increasing EIN 2-digit prefix from 83 to 84

OPA IMF, Voice Balance Due (VBD)
• Fixed 40 KISAM tickets related to OPA & VBD applications to further prepare for OPA to move to the WebApps platform in the future
• Confirmation Letters 2273C, 5976C and 5977C updated to correspond to format changes to Correspondence Letter System (CRX) due to Legislative/Bipartisan Budget Act, beginning in January 2019
• 508 testing for URL link and amount changes
• Mandatory security changes moved OPA from eAuthentication Level of Assurance (LOA)2C to LOA2
• Work Request (WR) 212561 CLM 296711 Installment agreement adjustment for low income earners to $0 fee waiver from $31

PTDC – Private Debt Collection
• Added BMF and BMF Reports for PTDC Release 4.0 BMF per legislation FAST ACT P.L. 114-94 (H.R. 22)

FOTW & IDR
• Verified new header in PIE (environment where DOE does their usability testing)
• More responsive design, deployed Sept 2019

TRA, GetTrans, OAT, TDS, 508 Compliance
• WR 203857 Redacted PII on IMF TDS Transcripts - added customer file no. on Form 4506T
• Fixed to Google Analytics for switch test location
• Forms 1040A and 1040EZ elimination per Tax Reform

CSS Routing
• CCSD/UNS - 7388 Routing Change
• Topic based Routing as requested by SB/SE for tax reform phase 2, October 2019

IRS2Go API
• Terms of service added to header
• Add Digital Signature verification using secret key.

Future Goals - FS21
• Continual maintenance of all telephone, web, cloud and mobile applications as requested by our business partners throughout the agency.

Integrated Data Retrieval System (IDRS)

Description:
Since 1973, IDRS has been a mission-critical system. Used by 60,000 IRS employees, it provides for systemic review, consistency in case control, alleviates staffing needs, issues notices to taxpayers and allows taxpayers to see status of refunds. IDRS is one of Treasury’s high value assets (HVAs) for its critical role in tax administration. It manages data retrieved from the Tax Master Files allowing IRS employees to take specific actions on taxpayer account issues, track status and post updates back to the Master Files. It provides for systemic review of case status, alleviating staffing needs and providing consistency in case control. Actions taken via IDRS include notice issuance, installment agreement processing, offers in compromise, adjustment processing, penalty and interest computations and explanations, credit and debit transfers within an account or other related accounts and research of taxpayer accounts for problem resolution of taxpayer inquiries.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.76</td>
<td>1.28</td>
<td>1.03</td>
<td>-0.25</td>
<td>-19.44%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>15.45</td>
<td>19.91</td>
<td>20.81</td>
<td>0.90</td>
<td>4.50%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>16.21</td>
<td>21.19</td>
<td>21.84</td>
<td>0.65</td>
<td>3.05%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:
IDRS is a secure, reliable, flexible and mission-critical system consisting of databases and programs supporting IRS employees who are working active tax cases.

• IDRS manages data retrieved from the Tax Master Files allowing over 60,000 IRS employees who use it daily to take actions on specific taxpayer account issues, track status and post updates back to the Master Files.
• IDRS provides for systemic review of case status, reducing staffing needs and providing consistency in case control. For example, each time a taxpayer phones IRS, the representative answering the phone uses IDRS to log the call and answer any questions.
• Actions taken via IDRS include but are not limited to: notice issuance; taxpayer correspondence; installment agreement processing; offers in compromise; adjustment processing; penalty and interest computations and explanations; credit and debit transfers among accounts; research of taxpayer accounts for problem resolution of taxpayer inquiries
• Using data analytics, IDRS enables IRS to efficiently evaluate taxpayer data to inform enforcement and secure legal compliance, both domestically and internationally.
• IRS internet applications access IDRS to provide services, information and assistance to taxpayers. For example: Annually, over 355 million taxpayers ask Where's-my-refund at www.irs.gov. Annually, over four million business taxpayers obtain Employer Identification Numbers (EINs) through www.irs.gov instead of paper correspondence.

IDRS enables businesses providing payroll services to submit tax data on behalf of millions of taxpayers and collaborates with registered tax practitioners to reduce the burden of filing Powers of Attorney and Taxpayer Information Authorizations, allowing them to request access to other E-Services. A variety of tax information is produced by IDRS that facilitates collaboration with various internal and external partners including: Social Security Administration (SSA); Bureau of the Fiscal Service; State and local governments; Tax practitioners

IDRS is continuously monitored for cost, schedule, and project performance. IDRS serves the taxpayers in many ways and helps address various performance gaps. IDRS' taxpayer-centered services promote intangible goodwill to citizen's perception of IRS and the Federal Government as well as ensuring consistent, efficient service.

Other Accomplishments:
• Implemented as part of the Tax Reform Sec. 14401 of P.L. 115-97 (Tax Cuts and Jobs Act), Rate Change for Penalties Assessed Under IRC 6038A(d)
• Implemented Inflation Adjustments for FS2019 under P.L. 113-295 Provision 208
• Update CC FRM77 to process transactions for tax reform section 965 indicating the interest due or an underpayment of first installment.
• Add acceptance and validity checking to Standardized IDRS Access (SIA) Tier 2 processing for TC 520/521 transactions.
• Annual Allocated Tips project Maintenance – BMF Form 8027 – Form - 8027 - Employer's Annual Information Return of Tip Income and Allocated Tips (2019)
• Update TRS processing for fields related to Automated IA Confirmation Letters
• TRS updates related to SP Consolidation - Move Automated Non-Masterfile Processing from Cincinnati Submission Processing (SP) Center to Kansas City SP Center
• RCC changes related to Private Debt Collection
• Updated Credit Transfers processing for new Designated Payment Codes
• Updated RCC processing for Form 3520-A Form Updates TY2018
• Updated TRS and RCC processing for PY2019 FATCA Form 1042, Form Update
• Updated TRS and RCC processing for RRE -Tax Reform-2019-p-13504 and P.L. 114-74 Section 1101 - Form 1065
• Updated TRS processing for Part 3 - Waiver/Reimbursement of Low-income Installment Agreement User Fees
• Implemented project changes to allow Identity Theft command codes to be expanded to Business Master File.
• Implemented changes for the Bipartisan Budget Act, to allow new designated payment codes to be valid for Area Office Payment Processing.
• Implemented annual changes for the Earned Income Credit Computation for Tax Year 2019.
• Implemented a temporary change related to UWR 228436 that will be completed with permanent programming changes for Mid-Year 2020 that keeps IRS in compliance with the Taxpayer First Act legislation as it relates to the suppression of the TC971 AC611 when the CP523 is issued. The temporary change was placed into production on 9/21/2019.

Future development efforts are limited primarily to:
• Legislatively mandated tax law changes.
• Implement customer-approved work requests that enable IRS employees and systems that depend on IDRS, to ensure compliance with current tax law while providing quick and accurate service to taxpayers.

**Integrated Financial System/CORE Financial System (IFS)**

**Description:**
IFS is the IRS's core financial system used for budget, payroll, accounts payable/receivable, general ledger functions and financial reporting. IRS uses IFS to report on the cost of operations and manage budgets by fiscal year.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.88</td>
<td>1.85</td>
<td>1.89</td>
<td>0.04</td>
<td>2.02%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>14.38</td>
<td>12.66</td>
<td>13.04</td>
<td>0.38</td>
<td>3.03%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>15.25</td>
<td>14.51</td>
<td>14.93</td>
<td>0.42</td>
<td>2.90%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**
Integrated Financial System (IFS) is the core financial system for IRS. By leveraging a Federal version of SAP COTS software. The system provides a reliable, standardized and auditable platform for administrative accounting, budget formulation/labor forecasting and execution (funds management) of the IRS annual budget. Other financial functions include:

• General ledger, managerial cost accounting, accounts payable, accounts receivable, purchase card transaction processing and payments, asset accounting, all financial reporting, and budgetary and management reporting.
• In addition, it provides functionality supporting the management and administration of the federal acquisition/procurement processes.
• The IFS system provides the ability to accountants, budget, and financial management analysts to effectively manage U.S. Government finances for the Internal Revenue Service and respond to audit requests in support of a clean audit opinion.
• IFS allows the IRS to pay its bills on time while meeting Federal financial regulatory requirements.

FY 2019:
• The SAP ERP Central Component (ECC) component was migrated from the Solaris platform to Linux. All components of the application are now on Linux.
• All application databases have been upgraded to Oracle version 12.
• The ECC component was upgraded to the latest Enhancement Patch (EP7) level.
• IFS will complete standard maintenance patches, year-end close, and support the GAO audit responding to audit findings (if any).

FY 2020/2021/2022:
IFS will also make changes as necessary to support ongoing Federal Financial System mandates. IFS is a Federal version of SAP COTS software which includes Procurement for Public Sector (PPS). IFS will perform the following:

• IFS will complete standard maintenance patches, year-end close, and address any GAO findings.
• Deploy monthly releases for defect corrections and service requests as requested and prioritized by the customer (CFO/Procurement).
• Legislatively mandated interface with Treasury’s G-Invoicing system. Required implementation date is June 2021. IFS will develop a new interface for this effort.
• The IFS application currently runs on a COTS based SAP Enterprise Resource Planning (ERP) solution, which will reach end of life in FY2027. The current SAP ERP solution provides modules covering a full range of industry applications, including Finance, Procurement, Logistics, HR, Product Planning and Customer Service, that are linked together into a single, customizable system running on an Oracle database. Before we commit to any upgrade, we will conduct a due diligence Alternatives of Analysis as any new solution for IFS will require a significant investment by the IRS, multi-year implementation effort and introduce new risks. Therefore, the IRS is evaluating alternatives via an independent review in FY2020 to ensure it has enough information to make the best decision for the Service going forward.
• Develop an Integrated Reporting Solution for the Procurement component of the application.

Integrated Submission and Remittance Processing System (ISRP)

Description:

ISRP is the legacy frontline tax processing system that processes paper tax returns from individuals and businesses. It also updates tax forms to comply with tax law changes.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.31</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
</tbody>
</table>
Purpose, Accomplishments, Future Objectives:

The Integrated Submission and Remittance Processing (ISRP) system is an integrated suite of hardware, software and network components that provides the interfaces for data entry perfection and transmission of data to IRS Corporate data storage. ISRP Data Entry Operators enter the information from various paper documents, which are then converted into electronic data used by downstream operations such as Financial Information Systems. ISRP also updates tax forms to comply with legislative changes in tax laws. There is a system dependence on various IRS applications such as Generalized Mainline Framework (GMF), Enhanced Entity Index File (EEIF), Integrated Data Retrieval System (IDRS), and Enterprise File Transfer Utility (EFTU).

Accomplishments and Future Objectives:

FY 2020:
- Deliver legislatively mandated Taxpayer First Act Changes to keep ISRP up-to-date.
- Deliver updates to the ISRP system for completing the cleanup from the Tax Reform Changes.
- Continue to send Foreign Account Tax Compliance Act (FATCA) information (Forms 8938, 8966 and 1042-S (Recipient Copy) to the International Compliance Management Model (ICMM) system.
- Continue to migrate of the ISRP Program Requirements Package (PRP) documents currently in Microsoft Word format to the Rational Requirements Composer (RRC) system.
- The refresh of the remittance transport infrastructure including the implementation of Electronic Check handling.
- Deploy security patches, maintenance and firmware updates.
- Submission Processing Consolidation: Prepare for the closing of the Fresno site in 2021.
- Complete the refresh of ISRP server infrastructure.
- Continue to support both Individual Master File (IMF) and Business Master File (BMF).

FY 2021:
- Deliver legislatively mandated Taxpayer First Act Changes to keep ISRP up-to-date.
- Consider proposals and options to leverage functionality between the ISRP and Service Center Recognition/Image Processing System (SCRIPS) systems to improve efficiency and continue to reduce costs.
- Continue migration of the ISRP Program Requirements Package (PRP) documents currently in Microsoft Word format to the Rational Requirements Composer (RRC) system.
- Continue the effort to keep the ISRP server infrastructure current.

IRS End User Systems and Services (EUSS)

Description:

The EUSS standard investment provides user-centered information technology (IT) products and services for 80,000 IRS employees at headquarters and field offices (including international locations). The EUSS investment funds the provisioning of end user hardware and software as well as the day-to-day operations,
maintenance, services and support of all end user technologies at the IRS. As such, this investment is essential to the IRS providing reliable, quality services to millions of taxpayers.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal Labor (Govt. FTE))</td>
<td>11.56</td>
<td>20.90</td>
<td>9.06</td>
<td>-11.84</td>
<td>-56.66%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>175.88</td>
<td>204.95</td>
<td>200.33</td>
<td>-4.62</td>
<td>-2.26%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>187.44</td>
<td>225.85</td>
<td>209.39</td>
<td>-16.47</td>
<td>-7.29%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

The EUSS investment provides end user focused Information Technology (IT) products and services for 80,000+ IRS employees at headquarters and field offices (including international locations). The EUSS investment includes annual funding for the provisioning of end user hardware and software as well as the day-to-day operations, maintenance, services and support of all end user technologies at the IRS.

The purpose of the EUSS investment is to provide secure, reliable, innovative and cost-effective IT computer hardware, software, services and support for IRS employees in delivering the IRS’ Tax Administration mission. The goal of the EUSS investment is to ensure that the IRS maintains a secure, stable and innovative workplace computing environment that provides employees with state-of-the-industry computing devices, applications, security defenses, business tools and associated end user services to maximize their uptime and productivity. Additionally, the EUSS investment facilitates delivery of user focused IT projects and initiatives that enable communication, collaboration and business capabilities in alignment with the IRS’ Integrated Modernization Plan and the IRS Strategic Plan.

Accomplishments:

- Implemented digital technology such as robotic process automation & digital service agent using natural language processing. The IRS Chatbot “Winnie” which answers Win 10 questions has been finalized and created with developed code to run the Chatbot and tailored to our needs as a proof of concept.
- Live Assistance (LA) Customer Callback and Omnichannel.
- Successfully implemented two phases of customer callback within the Toll-free environment. One being “IRS IT Help Desk application” and the other being “Balance Due application”.
- Planned and secured contract award for the 3rd phase of Customer Callback.
- Administered upgrading of the Toll-free environment infrastructure by implementing upgrades to the CC-VRU, ICM, UCCE, and expanding CVP Ports.
- Implemented Assistive Technology (AT) Process Improvement plan to enhance the user experience for Adaptive Users. UNS has been tasked to lead the AT Service Delivery Enhancement Project in partnership with the Section 508 IRAP office and the Employee, Diversity and Inclusion office to identify and implement process improvements that will enhance end-to-end service delivery support and heighten customer experience
- Implemented Local Inventory Project for improved workstation break/fix customer experience. This initiative targets to refresh workstation hardware within 24 hours in all major IRS locations
- Continue reduction of aged infrastructure percentage.
- Implemented capability to deploy workstation operating system upgrades remotely through Upgrade-In-Place which reduces overall cost to perform these upgrades
- Completed independent evaluation of process to which validated proper electronic data preservation of user created data on workstation hard drives until National Archives and Records Administration (NARA) 2019 requirements for e-records retention & eDiscovery are implemented.
- Initiated transition to a Manage Print Services (MPS) contract providing end-to-end managed services and support for network printers and multi-function devices enterprise wide; will update all devices & deliver enhanced user functionality with cost savings.
- Implemented Asset Inventory Automation AssetTrack barcode scanning solution and integrated the solution with IRS’ asset and inventory tool to automate hardware asset inventory transactions in near real-time.

IRS Main Frames and Servers Services and Support (MSSS)

Description:

Provides for the development and deployment of server, middleware and large systems and enterprise storage infrastructures, including systems software products, databases and operating systems for these platforms.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>66.44</td>
<td>33.42</td>
<td>21.06</td>
<td>-12.37</td>
<td>-37.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>492.96</td>
<td>549.32</td>
<td>609.78</td>
<td>60.46</td>
<td>11.01%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>559.40</td>
<td>582.74</td>
<td>630.84</td>
<td>48.09</td>
<td>8.25%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

The Mainframe and Servers, Services and Support (MSSS) investment represents the operational investment for the deployment of server, middleware and large systems as well as enterprise storage infrastructure, including systems software products, databases and operating systems for these platforms. MSSS resources are primarily used to support the operations & maintenance of the vast array of infrastructure necessary to support tax administration. MSSS represents roughly 25% of the IRS's total IT budget. The primary objective of the MSSS investment is to ensure the 24x7 IT operations, support and maintenance for all Tier I (Enterprise Servers) and Tier II (Servers, Middleware, Storage, Databases) production systems responsible for the daily operations of IRS batch and online processing. In addition, all supporting environments that make up application development and deployment pipelines must be maintained, patched, secured and available for over 400 processing applications. This investment shall ensure timely tax processing and refund issuance to over 300 million taxpayers and businesses. MSSS TIER I Infrastructure costs supports submission processing and the upgrading of Enterprise mainframes to handle over 10,000 MIPS (Millions of Instructions Per Second) thus increasing capacity to handle peak transactions. MSSS TIER II Infrastructure costs also support submission processing and critical IRS processes such as: collections, criminal investigations, processing individual tax returns and, processing paper and electronic taxpayer payments as well as many various internal IRS business applications. The MSSS non-tier specific costs support critical IRS processes and infrastructure. This cost is required to
ensure all infrastructure related to supporting filing season and submission processing is available for the tax customer without disruption.

Projects such as Enterprise Discovery (eDiscovery), Enterprise Exchange Upgrade Solution, Enterprise Records Management (eRM), and other efforts have been deferred, due to increases in O&M which leads to reduced availability of DME resources.

Accomplishments:
The MSSS investment continues to deliver a successful filing season through the efficient management and maintenance of infrastructure operations. Here are examples of past key Filing Season improvements and upgrades:

- Upgrade of IBM mainframes,
- Upgrade of Unisys hardware for Enterprise Storage,
- Upgrade of the virtual infrastructure,
- Upgrade to Linux-based hardware for MeF,
- Deployed stable, scalable and supportable monitoring environment and trained over 500 MeF monitoring staff and stakeholders,
- Implemented monitoring to support MeF migration from Solaris-based hardware to zLinux hosted database solutions,
- Collaborated with Stakeholders to drive replacement of all virtual infrastructure generation 8 HP blades with Cisco Hyperflex 240M5,
- High Service Availability (HAS) Resiliency and Strategy- Measurably improved stability of the infrastructure environment,
- Replaced the 20+ year old Computer Assisted Publishing System (CAPS), IBM Automatic Tape Library (ATL) with IBM 7760 Virtual Tape System (VTS),
- Exceeded Enterprise Operations target of Aged Assets Reduction - reduced aged assets by 2,028 assets total,
- Enterprise Storage Service continues to provide a private storage cloud at the two IRS Enterprise Computing Centers and 4 service centers. This “Pay only for what you use” personifies the teaming of government and contractor partnership to provide superior service and transparency.

The IRS leverages all aspects of private storage cloud, allowing to meet dynamic storage demands within minutes while meeting stringent service level objectives.

Future objectives:

- Increased focus on enterprise strategic goals, introduction of new technologies, increased capabilities and service models to improve overall performance and support.
- WinOS Refresh will update all Wintel systems to WIN OS 2012R2, to align with enterprise strategic goals and ensure N-1 compliance while preparing for and planning upgrade to the next OS levels.
- Linux Lifecycle Program will focus on support for our Applications Developers partners, to migrate existing programs to a level of SW compliance supporting the newer infrastructure.
- Solaris Stabilization effort provides an interim solution to the aged Solaris hardware which has reliability and supportability issues and for which vendor support runs out in Jan 2021.
- RHEL 6 to RHEL7.
IRS Telecommunications Systems and Support (TSS)

Description:

The Telecommunications Systems and Support (TSS) investment supports network (data and voice) services to provide secure taxpayer and employee access to IRS services. This includes the ability to provide access, phone, video, wireless and data services to 580 locations, 42,000 remote users, 80,000 employees and over 162 million taxpayer calls annually.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>44.55</td>
<td>37.29</td>
<td>54.77</td>
<td>17.48</td>
<td>46.87%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>280.81</td>
<td>299.01</td>
<td>329.66</td>
<td>30.65</td>
<td>10.25%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>325.36</td>
<td>336.30</td>
<td>384.43</td>
<td>48.12</td>
<td>14.31%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

The Telecommunications Systems and Support (TSS) investment supports network (data and voice) services to provide secure taxpayer and employee access to IRS services. This includes the ability to provide access, phone, video, wireless and data services to 580 locations, 42,000 remote users, 80,000 employees and over 162 million taxpayer calls annually. The TSS investment provides a reliable, secure, innovative and cost-effective telecommunications systems and services that enable communication, collaboration and business capabilities in support of the IRS' Tax Administration mission. Specifically, the TSS investment ensures that IRS maintains a secure, stable and innovative network environment by providing and managing secure state-of-the-industry telecommunication systems to enable system, employee and taxpayer communication. Also, User and Network Services (UNS) provides initiatives that are IT modernization centric and support the IRS IT Modernization plan.

The modernization of the IRS network and operations ensures a secure highway supporting tax administration and is the critical base for the IRS digitalization strategy which supports the IRS mission of helping taxpayers understand and meet their tax responsibilities and enforce the law with integrity and fairness.

Accomplishments and Future Objectives:

- Delivered AT&T NetBond for cloud security zone secure path with guaranteed bandwidth to the Cloud Service Providers in the Trusted Internet Connection (TIC) / Common Communications Gateway (CCG).
• Continued implementing WAN Acceleration technology across the network to optimize bandwidth, slow bandwidth growth, & reduce latency. An additional 90 sites have WANx installations in progress which will improve network performance for 70% of the IRS workforce.

• Implemented native IPv6, and IKEv2 WAN capabilities over TNet.

• Continued deployment of next-gen Common Communications Gateway (CCG) to increase capacity, improve performance/monitoring/automation, virtualize and increase security. Implemented 10G High Availability network access for Proxy Servers.

• Engineered/designed and implemented successfully a scalable CCGv2 network-based logging solution.

• Delivered secure & robust network connectivity for off-premise Cloud initiatives. Netbond connection for Advanced Intelligent Network Services (AINS) has been successfully tested and operational.

• Deployed a Firewall Management Suite Security Manager which defines/analyzes policy and adds context/validates in real-time. Next step is to configure Policy Planner and Optimizer that will standardize the Firewall Change Request (FCR) process and automate workflows.

• Deployed Unified Access Phase 2-Enforcement Mode to 90% of IRS POD sites; this exceeds the FY19 commitment to deploy to 70% of IRS POD sites.

• Completed proof of solution to ensure that the design for Network Segmentation meets the requirements of the project prior to full production deployment; develop design and architecture for Network Segmentation Deployment

• With IPv6 deployed to over 92,000 workstations and available to all servers with a full cybersecurity defense in depth architecture in place

• External e-Learning and Collaboration technology demonstration 150 test users successfully validated the service provided by AT&T as a Managed Services under TNET/ERAP. IRS specified sessions were created on the vendor platform, with IRS managing the session characteristics. Users confirmed they could successfully obtain a session, send emails from user IRS workstations to the service & then access external websites via the URL in the email. The deployed solution met all requirements

• Deliver Desktop Virtualization Infrastructure initiative to greatly enhance the flexibility and agility in delivery of computing services to the IRS workforce.

IRS.GOV - Portal Environment

Description:

IRS portal provides seamless one-stop web-based services to internal and external users, such as taxpayers, business partners and IRS employees. The portal environment is rapidly becoming the virtual tax assistance center for most internal and external users by providing top quality service and promoting voluntary tax compliance in a rapidly changing digital business environment. The portal environment has supported over 646.8 million, Page Views: 3.16 billion in tax year 2019.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>21.27</td>
<td>8.58</td>
<td>7.82</td>
<td>-0.76</td>
<td>-8.81%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>68.29</td>
<td>56.48</td>
<td>58.21</td>
<td>1.73</td>
<td>3.06%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>89.56</td>
<td>65.06</td>
<td>66.04</td>
<td>0.97</td>
<td>1.50%</td>
</tr>
</tbody>
</table>
Purpose, Accomplishments, Future Objectives:

IRS portal provides seamless one-stop web-based services to internal and external users, such as taxpayers, business partners and IRS employees. The IRS portal environment supports the IRS mission by providing a virtual tax assistance center for internal and external users. IRS.GOV remains a cost-efficient platform to rapidly deploy standardized customer facing solutions like FAST, and BOT Manager, and to support rapid deployment of applications compliant with recent tax law modifications. IRS.GOV supports rapid deployment solutions, more robust user interfaces, faster communications and improved security measures that comply with the latest NIST standards to better meet our customer’s needs.

Accomplishments

- Software Defined - Wide Area Network technologies to improve performance and reliability of WAN connectivity between IEP and IRS.
- Tax Withholding Estimator tool (WCMS).
- 20 PUP applications residing on the IEP were transitioned successfully to the Amazon Web Services environment (Cloud based).
- Withholding Estimator Tool designed to support 2020 Tax Reform legislation changes.
- Reservation model to provide a broader base of our customers access to the Performance testing environments.
- WCMS operations and content updates for current filing season and second year tax reform changes.
- Completed ACA activities in preparation for Open Enrollment.
- IEP Health Monitor Release 1 build-out complete.
- Provide on-going support to Web Apps releases.
- Supported the required activities for the following IRS Initiatives:
  - Martinsburg Failover to Memphis.
  - Continued support of Political Organization Filing & Disclosure POFD B/E.
  - Increased capacity, performance testing, and integration support to accommodate expected tax reform demand.
  - Support application updates and identify any needed infrastructure upgrades.
  - Plan for FS 2020 activities across all portals.
  - Portal Ecosystem Application Re-engineering effort to modernize the legacy applications that reside in the IEP.
  - Support on going Tax Reform updates for content and applications.

Future objectives:

- EOPs Portal Accounts Replacement Tool investment will replace non-compliant software and reduce single point of failure for our portal account management. The Enterprise Informatica Platform within the tool will consolidate and refresh to ensure continued operability.
- Support expected increases in portal activity based on historical activity growth trends and the public’s increased reliance on digital transactions.
- Support of the cloud-based Field Assistance Scheduling Tool.
- Expand support of the ongoing effort to implement Bot Manager Premier BMP (Active Protection) across all public facing apps.
• Support Affordable Care Act through the Transactional Portal Environment.

**Modernized e-File (MeF)**

**Description:**

MeF is a critical component of the tax filing system. It provides service to institutional taxpayers by delivering a web-based system that allows electronic filing of corporate, individual, partnership, exempt organization and excise tax returns through the Internet. MeF is one of Treasury’s high value assets (HVAs) for its critical role in tax administration. The Office of Management and Budget defines HVAs as “those assets, systems, facilities, data, and datasets that are of particular interest to potential adversaries”.

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>7.39</td>
<td>5.50</td>
<td>11.42</td>
<td>5.92</td>
<td>107.72%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal labor (Govt. FTE))</td>
<td>49.62</td>
<td>39.66</td>
<td>40.70</td>
<td>1.04</td>
<td>2.62%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>57.01</td>
<td>45.16</td>
<td>52.13</td>
<td>6.96</td>
<td>15.42%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

The Modernized e-file (MeF) Program provides a secure, web platform for electronically filing tax and information returns by registered Electronic Return Originators (EROs). This system uses a browser-based and application-to-application solution to provide ERO end users with optimized return filing. MeF is becoming the primary system for electronic filing of business and individual tax returns and forms.

The MeF program supports the Treasury and IRS strategic goals by effectively and efficiently using resources to optimize return filing, expand e-Government, and reduce taxpayer burden.

Beneficiaries include the tax preparation community and the taxpayers they represent. MeF also benefits large corporations and tax-exempt organizations that are required at a specific asset threshold to electronically file their tax returns or annual information returns by reducing the handling/mailing of voluminous paper returns which sometimes exceed 700 attachments/schedules.

MeF has dependencies with:

- IRS.GOV - Portal Environment
- Information Return and Document Matching (IRDM)
- Individual Master File (IMF)
- Business Master File (BMF)
- Tax Return Data Base (TRDB)
- Electronic Fraud Detection System (EFDS).

The MeF program supports the Treasury and IRS strategic goals by effectively and efficiently using resources to optimize return filing, expand e-Government, and reduce taxpayer burden. Beneficiaries include the tax preparation community and the taxpayers they represent. MeF also benefits large corporations and tax-exempt organizations that are required at a specific asset threshold to electronically file their tax returns or annual information returns by reducing the handling/mailing of voluminous paper returns.
returns which sometimes exceed 700 attachments/schedules. MeF has dependencies with the following investments:

- IRS.GOV - Portal Environment
- Information Return and Document Matching (IRDM)
- Individual Master File (IMF)
- Business Master File (BMF)
- Tax Return Data Base (TRDB)
- Electronic Fraud Detection System (EFDS).

FY 2019 Accomplishments and Future Objectives:

- Deploy MeF Release 10.2 which will allow changes due to ACA, FATCA, RRP and maintenance of MeF including hardware, software, security, helpdesk, training, etc.
- Develop MeF Release 10.3 which will allow maintenance of MeF including hardware, software, security, helpdesk, training, etc.
- Migrate the application to a Linux Platform and improve hardware/software resiliency.

FY 2020 Future Objectives:

- Deploy MeF Release 10.3 which will allow maintenance of MeF including hardware, software, security, helpdesk, training, etc.
- Develop MeF Release 10.4 which will allow maintenance of MeF including hardware, software, security, helpdesk, training, etc.

Modernized IRS Operations

Description:

The IRS will use innovative technologies and processes, such as Cloud, Agile, DevOps, Application Programming Interfaces, robotic process automation, and next generation infrastructure to reduce costs and manual effort.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>S Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>20.34</td>
<td>3.80</td>
<td>50.00</td>
<td>46.20</td>
<td>1,215.79%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>20.34</td>
<td>3.80</td>
<td>50.00</td>
<td>46.20</td>
<td>1,215.79%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

Modernizing IRS Operations supports technology efforts that will provide continuous operations and systems availability to support taxpayer application access, analytics-based decision-making enabled by reliable and accessible data, efficient process execution through increased automation of transactional repeatable activities, increase speed of delivery of new capabilities, and safeguard taxpayer data.

This investment will enable modernized capabilities across IRS operations including:
• Automate manual processes using artificial intelligence and other advanced techniques freeing up IRS staff for more value-added work
• Quicker software deployment through automating delivery and infrastructure provisioning
• Create standard, reusable services and common application programming interface (API) code, reducing duplicative/ "recreate" work for IRS employees, operational efficiency, reduced licensed cost, shared services platform
• More efficient, scalable, resilient and secure infrastructure.
• This investment is for supporting activities for an objective of the current IRS Strategic Plan to Modernize and integrate technologies and systems that support secure, flexible and accurate work across IRS functions:
  • Invest in the enhancement and integration of systems.
  • Adopt iterative and flexible approaches to technology development and system updates.
  • Maintain currency of hardware and software.
  • Invest in innovative technologies and enable the delivery of secure, agile and efficient service offerings through cloud services.
  • The IRS has made significant investments in the Massive Parallel Processing (MPP) (Greenplum, A purpose-built appliance integrates database, compute, storage, and network for MPP) Data Computing Appliance (DCA) that provide cutting edge technologies supporting IRS critical filing season systems such as Return Review Program (RRP), Integrated Production Model (IPM), CADE2, and ACA.

The IRS is moving toward the Target State architecture by modernizing its business applications and adopting emerging technologies such as cloud, data analytics, DevOps automation, and leveraging Application Programming Interfaces (APIs) for reusable enterprise-wide services. These initiatives and ongoing development efforts as described in the Enterprise Transition Plan (ETP) will help IRS to progressively deliver new capabilities and enhancements to the taxpayer and improved operations across all major business and technical areas.

FY 2019 Accomplishments:
Robotics Process Automation
  • Implemented solution for one Procurement process

Application Programming Interface (API) Strategy Implementation
  • Completed API Initial Operating Capability (IOC)

Cloud Execution
  • Established Cloud Management Office and Cloud Governance
  • Completed Request For Information (RFI) for the Enterprise Cloud ecosystem
  • Built out sample Cloud Target-State Reference Model on the Treasury Cloud

Next Generation Infrastructure
  • DevOps: Continuous Integration/Continuous Delivery (CI/CD) Onboarded (40) projects
  • DevOps: Centralized code repository (onboarded 10 projects)
  • DevOps/Standard Stack: Developed and validated 3 to 5 stack components
  • DevOps/Standard Stack: Deployed 3 to 5 standard stack components via automation
  • DevOps: Developed containerization solution architecture

Future Objectives:
Robotics Process Automation
Implement technologies addressing Small Business/Self-Employed (SB/SE) Monitoring Offer in Compromise and IT Help Desk Self-Service Natural Language Processing, and TE/GE Referrals Batch Process identification processes

Cloud Execution
- Deploy Cyber Continuous Diagnostics & Mitigation (CDM) Phase 2 on Treasury Cloud

Next Generation Infrastructure
- DevOps: CI/CD Onboard additional projects (onboard 51 projects)
- DevOps: Centralized code repository (onboard 15 projects).

Compute Hosting Platform for Massive Parallel Processing (MPP) Database - The current DCAs, version 3 (V3), reach end of standard support (EOSS) in December 2022. To mitigate risk of losing vendor support for DCAs, IRS must identify the alternate hosting for Greenplum to maintain business continuity for critical filing season processing. Key Drivers are: (1) upcoming end of standard support for DCA v3: Vendor’s EOSS for DCA v3 will be reached by December 31, 2022; (2) Hosting alternative must be operational to support FS 2023 processing.

Return Review Program (RRP)

Description:
In late 2016 after the IRS retired the core functionality of the Electronic Fraud Detection System (EFDS), the Return Review Program (RRP) became the primary system used for anomaly and fraud detection for individual tax returns claiming refunds, including the identity theft and fraud detection components

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>53.98</td>
<td>3.24</td>
<td>0.00</td>
<td>-3.24</td>
<td>-100.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>51.39</td>
<td>54.74</td>
<td>56.94</td>
<td>2.20</td>
<td>4.02%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>105.37</td>
<td>57.98</td>
<td>56.94</td>
<td>-1.04</td>
<td>-1.80%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

Return Review Program (RRP) uses leading-edge machine learning technologies to detect, resolve, and prevent criminal and civil tax refund fraud and non-compliance, maximize fraud detection in real-time, and protect taxpayer revenue from the risks of increasing global fraud sophistication. RRP is mission-critical for the IRS to combat the ever-evolving tax fraud in a sophisticated, scalable, and adaptable manner. It is the anomaly detection platform for the enterprise for fraud and non-compliance. RRP correlates data across multiple data sources and enables the IRS to create predictive models for fraud and non-compliance.

RRP has been operational since 2015 and continues to perform today as the primary line of defense against the perpetration of individual tax return identity theft, fraud, and non-compliance after retiring the legacy fraud detection system in fall 2016. Since 2015, RRP prevented the issuance of over $15 billion in fraudulent refunds. RRP’s return on investment is over 1700 percent since 2015.
RRP's primary customers are Wage and Investment (W&I), and Criminal Investigation (CI). As of fiscal year, 2019 RRP initiated some initial filters for Large Business and International (LB&I) to explore foreign accounts utilizing the 1042S.

2019 Accomplishments:
- Completed procurement and design of Palantir solution to replace the end-of-life legacy manual data analytics tool (Oracle Discoverer), and began establishing network connections between IRS and Amazon Web Services (AWS) GovCloud.
- Delivered foundational analytics and reporting capabilities which enable the IRS to detect withholding agent noncompliance on Form 1042-S (Foreign Person's U.S. Source Income Subject to Withholding).
- Enhanced RRP's analytical capabilities to identify potential identity theft and fraudulent return submissions of individual tax returns by creating new models and filters, thus increasing efficiency of return reprocessing and furthering the retirement of RRP's Legacy Component.
- Continued implementation of a dedicated final integration testing environment to support Filing Season 2020 integration testing activities.
- Enhanced data integrity between the production and alternate site processing (ASP) environments by implementing a data synchronization solution.
- Implemented Filing Season 2019 updates based on legislative changes with a primary focus on Tax Reform, Core Record Layout changes, and increased frequency of W-2 data transmission which allowed for the IRS to identify and flag non-compliance issues more efficiently and effectively in the process.

2020 Objectives:
Complete deployment activities for the Palantir solution to replace the end-of-life legacy manual data analytics tool (Oracle Discoverer).

Service Center Recognition/Image Processing System (SCRIPS)

Description:
SCRIPS is a data capture, management and image storage system that uses high speed scanning and digital imaging to process the 940, 941, 943, K-1, IRP, and ACA-IRP paper returns and converts data to electronic format for processing downstream.

Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.11</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>9.50</td>
<td>9.62</td>
<td>9.86</td>
<td>0.24</td>
<td>2.48%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>9.61</td>
<td>9.62</td>
<td>9.86</td>
<td>0.24</td>
<td>2.48%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:
The Service Center Recognition/Image Processing System (SCRIPS) is a major paper input processing system specifically designed to automate the processing of Information Return Processing (IRP) forms,
Schedule K-1’s (Forms 1041 K-1, 1065 K-1, and 1120 K-1), Form 941 (and associated Schedules B and Schedule R), Form 940 (and associated Schedule A and Schedule R) and Form 943 Stand-alone Schedule R. SCRIPS processes Affordable Care Act (ACA)-IRP Forms 1094-x and 1095-x. SCRIPS scans and stores images of all tax documents processed, saving time by converting the scanned images and data to computer-readable code and providing hardcopy images when requested. This is accomplished using the Optical Character Recognition/Intelligent Character Recognition (OCR/ICR) engine in addition to utilizing 2-Dimensional (2D) bar code recognition which optimizes and automates data entry of the taxpayer data. SCRIPS is one of the front-end input systems that operates at three IRS Service Centers where forms are received, sorted, and then sent to the scanning areas. SCRIPS sends the electronic taxpayer data to the IRS downstream tax processing systems, including Generalized Mainline Framework (GMF) and Master File for posting to the IRS database, as well as Service-Wide Employment Tax Research System (SWETRS) and Statistics Of Income (SOI) for compliance. SCRIPS sends data to ACA Information Returns (AIR) database for Master Files. Images are archived and retained on the Enterprise Shared Storage platform. IRS Customer Service Representatives can request hard copies of images through the Integrated Data Retrieval System (IDRS). SCRIPS will deliver legislatively mandated Tax Year Changes to keep SCRIPS up-to-date. SCRIPS processed more than 60 million tax forms in 2019 and expects to process equivalent volume in 2020. SCRIPS provides taxpayers fair and uniform application of the law, and increases efficiency for tax processing by converting paper forms to electronic images.

Accomplishments and Future Objectives:

FY 2020:
- Deliver legislatively mandated tax changes to keep SCRIPS up-to-date.
- The refresh of SCRIPS server infrastructure is being planned. Considering proposals and options to leverage functionality between the Integrated Submission and Remittance Processing System (ISRP) and SCRIPS systems to improve efficiency and continue to reduce costs.
- Continue to support both Individual Master File (IMF) and Business Master File (BMF).
- Continue migration of the SCRIPS Technical Requirements Documents (TRDs) currently in Microsoft Word format to the CLM system.

FY 2021:
- Expand Schedules K-1 core record layout to accommodate expanded fields.
- Continue migration of the SCRIPS Technical Requirements Documents (TRDs) currently in Microsoft Word format to the Rational Requirements Composer (RRC) system.
- The refresh of SCRIPS server infrastructure
- Continue to support both Individual Master File (IMF) and Business Master File (BMF).

**Web Applications**

**Description:**

The Web Applications (Web Apps) investment is focused on providing easy access to taxpayer information via digital channels. Funding will drive the IRS transition to digital government and supports the long-term vision of migrating services from expensive traditional channels to the internet. To keep pace with the ever-changing state of web technology and increasing taxpayer demand for IRS service, the IRS must create and enhance online self-service capabilities.
Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY 2020</th>
<th>FY 2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>24.24</td>
<td>25.00</td>
<td>25.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>7.19</td>
<td>7.11</td>
<td>7.31</td>
<td>0.20</td>
<td>2.88%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>31.43</td>
<td>32.11</td>
<td>32.31</td>
<td>0.20</td>
<td>0.64%</td>
</tr>
</tbody>
</table>

Purpose, Accomplishments, Future Objectives:

This investment provides access to taxpayer information via digital channels. Funding will drive the IRS transition to digital government and supports the long-term vision of migrating services from expensive traditional channels to the internet. To keep pace with the ever-changing state of web technology and increasing taxpayer demand for IRS service, the IRS must create and enhance online self-service capabilities.

In FY 2019 Web Applications deployed new capabilities including Taxpayer Protection Program Identity Verification Service (TPP ID Verify). ID Verify will allow taxpayers who receive a 5071C (Potential Identity Theft) letter to verify their information online and determine whether they are a victim of identity theft. This new capability eliminates the requirement for in-person visits. Additionally, Web Applications began the development work to make online tax payments easier by submitting installment agreements online. The Online Account operational hours were expanded allowing the taxpayer increased availability to access their account. In addition, implemented continuous security integration monitoring resulting in no high or medium security findings in production and automated tested has resulted in less defect outages; thereby protecting taxpayer data with little disruption.

For FY 2020, per the IRS Modernization Plan, the Web Applications program will deliver initial capabilities for online Installment Agreements which would improve the online experience of establishing installment agreements and determining eligibility by adding functionality to the IRS Online Account and Taxpayer Payment API with Fiscal Services which directly supports the IRS mission of collecting revenue and increasing voluntary compliance. Initial planning for Power of Attorney for Tax Pro Account will begin, which will provide taxpayers the ability to submit and file Power of Attorney documentation using a secure online method.

For FY2021, per the IRS Modernization Plan, the Web Apps will begin initial capabilities for Tax Professional Account (Tax Pro Account) leading to the deployment of new features that modernize certain paper-based processes to help third parties resolve issues with the IRS on behalf of their clients.

Major Non-IT Investments

Criminal Investigation Owned Vehicles

Description:

These 53 vehicles are owned by Criminal Investigation and are used for surveillance and for the Commissioner's protective detail.
### Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY2020</th>
<th>FY2021</th>
<th>$ Change</th>
<th>% Change</th>
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<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.99</td>
<td>1.18</td>
<td>1.18</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>0.99</td>
<td>1.18</td>
<td>1.18</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
</tbody>
</table>

### Purpose, Accomplishments, Future Objectives:

These 53 vehicles are owned by Criminal Investigation and are used for surveillance and for the Commissioner's protective detail.

### Criminal Investigations Capital Assets

#### Description:

This investment is managed by Criminal Investigation.

#### Investment Obligations:

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY2020</th>
<th>FY2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>5.79</td>
<td>5.58</td>
<td>5.00</td>
<td>-0.57</td>
<td>-10.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>5.79</td>
<td>5.58</td>
<td>5.00</td>
<td>-0.57</td>
<td>-10.00%</td>
</tr>
</tbody>
</table>

### Purpose, Accomplishments, Future Objectives:

This investment is managed by Criminal Investigation. These assets are used to protect CI special agents from threats and bodily injury while performing their law enforcement duties including conducting investigations concerning alleged criminal tax fraud violations, financial crimes, and other related offenses.

### Leasehold Improvements

#### Description:

Leasehold Improvements managed in AWSS.
**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY2020</th>
<th>FY2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>26.97</td>
<td>29.50</td>
<td>26.25</td>
<td>-3.25</td>
<td>-11.00%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>26.97</td>
<td>29.50</td>
<td>26.25</td>
<td>-3.25</td>
<td>-11.00%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

Many projects undertaken by IRS entail the design, alteration, and furnishing of space either upon acquisition, at lease renewal, or for other purposes, such as supporting space consolidation or reduction. The portion of the project that is captured as a capital asset is reflected in OMB Object Class 3200, Land and Structures, and includes alterations to buildings; fixtures such as elevators, plumbing, power-plant boilers, fire-alarm systems, lighting, heating systems, air-conditioning systems, flooring, and carpeting. The total figure is a sum of the expenditures in that object class for all IRS projects in that particular year.

**Security Equipment**

**Description:**

Security Equipment is managed in Facilities Management and Security Services (FMSS).

**Investment Obligations:**

<table>
<thead>
<tr>
<th>Type</th>
<th>FY 2019</th>
<th>FY2020</th>
<th>FY2021</th>
<th>$ Change</th>
<th>% Change</th>
</tr>
</thead>
<tbody>
<tr>
<td>Sub-Total DME Obligations (Including Internal Labor (Govt. FTE))</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00</td>
<td>0.00%</td>
</tr>
<tr>
<td>Sub-Total O&amp;M Obligations (Including Internal Labor (Govt. FTE))</td>
<td>5.52</td>
<td>5.77</td>
<td>5.25</td>
<td>-0.52</td>
<td>-9.01%</td>
</tr>
<tr>
<td>Total Obligations</td>
<td>5.52</td>
<td>5.77</td>
<td>5.25</td>
<td>-0.52</td>
<td>-9.01%</td>
</tr>
</tbody>
</table>

**Purpose, Accomplishments, Future Objectives:**

The IRS purchases security equipment such as cameras, digital video recorder system (DVRs), access control panels, and card readers. The IRS uses facility-specific security assessments to prioritize asset needs and develop criteria for replacing equipment in a given facility. Additionally, emergency needs arise over the course of the year. These needs are ranked and funded according to the effect the equipment has on the overall security posture. The need for equipment can arise at any time, such as when employees are moved into a new building, during internal moves, or intermittently when equipment needs to be replaced. The benefit of this capital asset investment is that it supports the IRS priority to provide a safe and secure environment for its employees, equipment, and facilities.