### TREASURY INSPECTOR GENERAL FOR TAX ADMINISTRATION



# The IRS Does Not Have Specific Plans to Replace and Decommission Legacy Systems

August 7, 2024

Report Number: 2024-200-038

#### Why TIGTA Did This Audit

Legacy systems are critical for many organizations because they support key mission functionalities, but they can also carry significant risks. Successful modernization of systems and the development and implementation of new information technology applications are critical to meeting the IRS's evolving business needs and enhancing services provided to taxpayers.

This audit was initiated to assess the efforts to identify, replace, and decommission legacy systems and follow up on prior audit recommendations.

#### **Impact on Tax Administration**

Without an accurate and a complete inventory, the IRS will be unable to effectively manage its legacy systems. In addition, without an enterprise-wide program, there is risk of an increasing use of resources to operate and maintain aged systems. The IRS's spending on operations and maintenance for its information technology infrastructure increased 35 percent from \$2 billion in Fiscal Year 2019 to \$2.7 billion in Fiscal Year 2023 and will likely continue to increase until a majority of legacy systems are decommissioned.



The IRS increased expenditures on operations and maintenance by 35 percent.

#### What TIGTA Found

The IRS fully and effectively implemented the planned corrective actions for two of four prior TIGTA recommendations. The IRS implemented a policy requiring system information updates to the As-Built Architecture. System information was updated within a year of our review for 732 of 733 systems and the remaining system was updated just over one year of our review. In addition, specific system information in the As-Built Architecture is complete. All 733 systems in the As-Built Architecture had the required information on the managing organization(s), application age, and programming language.

However, the IRS fully implemented two planned corrective actions that were not effective. There is no enterprise-wide program to identify, prioritize, and execute the updating, replacing, or retiring of legacy systems. While the IRS established the Technology Retirement Office in August 2021 to strategically reduce the information technology footprint across the enterprise, the office shut down in January 2023.

As of December 2023, the IRS had identified only 107 (32 percent) of 334 legacy systems in the As-Built Architecture as candidates for retirement, while the remaining 227 legacy systems had not been identified for retirement. Of the 107 legacy systems, only two systems have specific decommissioning plans. The remaining 105 systems did not have specific decommissioning plans.

In addition, the IRS did not properly apply its definition of a legacy system to identify all legacy systems. Applying the IRS's definition, our analysis identified 344 systems as legacy. However, a review of a March 2024 report determined that the IRS incorrectly identified five additional systems as legacy. IRS personnel stated that the discrepancy was due to a query programming error, which has since been corrected. A subsequent review of an April 2024 report found two additional systems that had not been identified as legacy but should have been, bringing the total number of legacy systems to 346.

#### What TIGTA Recommended

TIGTA recommended that the Chief Information Officer should:
1) re-establish the Technology Retirement Office or implement a similar enterprise-wide program to identify, prioritize, and decommission legacy systems, and 2) ensure that the definition of a legacy system is properly applied and programmed in the query to correctly identify all legacy systems.

The IRS partially agreed with the first recommendation and plans to deliver a roadmap, which will reflect milestones toward delivering new capabilities, and work to decommission legacy systems as new capabilities become available. The IRS agreed with the second recommendation and plans to update the programmed query definition.



#### **U.S. DEPARTMENT OF THE TREASURY**

#### **WASHINGTON, D.C. 20024**

August 7, 2024

**MEMORANDUM FOR: COMMISSIONER OF INTERNAL REVENUE** 

FROM: Danny R. Verneuille

Acting Deputy Inspector General for Audit

**SUBJECT:** Final Audit Report – The IRS Does Not Have Specific Plans to Replace

and Decommission Legacy Systems (Audit No.: 2024200013)

This report presents the results of our review to assess the efforts to identify, replace, and decommission legacy systems and follow up on prior audit recommendations. This review is part of our Fiscal Year 2024 Annual Audit Plan and addresses the major management and performance challenge of *Information Technology Modernization*.

Management's complete response to the draft report is included as Appendix III. If you have any questions, please contact me or Jena Whitley, Acting Assistant Inspector General for Audit (Security and Information Technology Services).

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### **Background**

Legacy systems are critical for many organizations because they support key mission functionalities, but they can also carry significant risks. <sup>1</sup> Successful modernization of systems and the development and implementation of new information technology applications are critical to meeting the Internal Revenue Service's (IRS) evolving business needs and enhancing services provided to taxpayers.

In April 2023, the Department of the Treasury and the IRS developed the *Internal Revenue Service Inflation Reduction Act Strategic Operating Plan FY [Fiscal Year] 2023 – 2031* (hereafter referred to as the Strategic Operating Plan).<sup>2</sup> According to the Strategic Operating Plan, the Inflation Reduction Act of 2022 (IRA) funding will enable the IRS to make dramatic improvements to its information technology infrastructure.<sup>3</sup> The Strategic Operating Plan identifies "the highest-priority opportunities to deliver transformational change for taxpayers" and outlines how the IRS "will deploy the investments in the IRA to better serve taxpayers, tax professionals, and the broader tax ecosystem." The Strategic Operating Plan is structured to achieve five transformation objectives, including Objective 4 to deliver cutting-edge technology, data, and analytics to operate more effectively. As part of this objective, the IRS reports that the additional funding will allow it to retire legacy systems and adopt modern systems. Figure 1 outlines the transformation objectives in the Strategic Operating Plan.



Figure 1: IRS Transformation Objectives

Source: Strategic Operating Plan.

In December 2023, the IRS also developed the *Enterprise Architecture and Roadmap* (hereafter referred to as the Enterprise Roadmap) to guide its information technology for Fiscal Years 2024 through 2029. It provides details on the "envisioned target state of the IT [information technology] ecosystem in support of the IRS's business direction and the path forward." The Enterprise Roadmap "reflects the full range of IT [information technology] activities being

<sup>&</sup>lt;sup>1</sup> See Appendix IV for a glossary of terms.

<sup>&</sup>lt;sup>2</sup> Publication 3744, *Internal Revenue Service Inflation Reduction Act Strategic Operating Plan FY 2023 – 2031* (Rev. 4-2023).

<sup>&</sup>lt;sup>3</sup> Pub. L. No. 117-169, 136 Stat. 1818. The IRS originally received approximately \$79.4 billion in supplemental funding when the President signed the IRA into law in August 2022. However, in June 2023, the enactment of the Fiscal Responsibility Act of 2023 (Pub. L. No. 118-5, 137 Stat. 10) resulted in the recission of approximately \$1.4 billion of IRA funding provided to the IRS, and the Further Consolidated Appropriations Act, 2024 (Pub. L. No. 118-47, 138 Stat. 460) resulted in a recission of \$20.2 billion in the Enforcement funding activity. Therefore, current IRA funding is approximately \$57.8 billion.

employed across the enterprise over time – maintenance of existing capabilities, modernization and transformation initiatives, development of new capabilities, and the retirement of legacy assets." According to the Enterprise Roadmap, the IRS "will make retirement of legacy assets an integral part of all IT [information technology] planning, development, and implementation activities." In addition, it provides the expected completion dates for new projects and systems and the expected retirement dates for the related, older systems.

In addition, the Treasury Inspector General for Tax Administration issued a prior report on the management of the IRS's legacy systems.<sup>4</sup> We made four recommendations to the Chief Information Officer.<sup>5</sup>

- 1) Establish, implement, and uniformly apply an IRS enterprise-wide definition of a legacy system.
- 2) Implement a policy requiring system owners to provide and update system information in the As-Built Architecture (ABA).
- 3) Ensure that all systems are included in the ABA with complete and accurate information, including the managing organization(s), application age, and programming language.
- 4) Implement an enterprise-wide program to identify, prioritize, and execute the updating, replacing, or retiring of current and future legacy systems.

Further, the Joint Audit Management Enterprise System is the Department of the Treasury's web-based management controls database tracking system and is used to track audits, findings, and recommendations extracted from Government Accountability Office, Treasury Office of Inspector General, and Treasury Inspector General for Tax Administration audit reports. The system is also used to track the status of planned corrective actions (PCA) for material weaknesses, significant deficiencies, existing reportable conditions, remediation plans, and action plans. Tracking issues, findings, recommendations, and the status of PCAs resulting from audits is mandatory to comply with the intent of the Government Accountability Office's *Standards for Internal Control in the Federal Government*, the Federal Managers Financial Integrity Act of 1982, Office of Management and Budget Circulars, and Department of the Treasury Directives.<sup>6</sup>

<sup>&</sup>lt;sup>4</sup> Treasury Inspector General for Tax Administration, Report No. 2020-20-044, *Legacy Systems Management Needs Improvement* (Aug. 2020).

<sup>&</sup>lt;sup>5</sup> We made a fifth recommendation to the Chief Information Officer to capture operations and maintenance costs for the current information technology infrastructure at the subsystem level. The IRS partially agreed with this recommendation and closed the planned corrective action in February 2022. The IRS stated that it will continue to track operations and maintenance costs using the internal order codes. However, the internal order codes only capture cost at the project/program level, not at the subsystem level. As a result, we excluded the planned corrective action for this recommendation from our review.

<sup>&</sup>lt;sup>6</sup> Government Accountability Office (GAO), GAO-14-704G, *Standards for Internal Control in the Federal Government* (Sept. 2014). Federal Managers' Financial Integrity Act of 1982, 31 U.S.C. §§ 1105, 1113, and 3512 (2018).

### **Results of Review**

#### **Two Planned Corrective Actions Were Fully and Effectively Implemented**

As of September 2021, the IRS reported in the Joint Audit Management Enterprise System that it closed the PCAs for all four recommendations made in our prior report. We reviewed the artifacts supporting the implementation of the PCAs and found that the IRS fully and effectively implemented two of four recommendations. A policy requiring system information updates to the ABA was implemented, and specific system information in the ABA is complete.

#### A policy requiring system information updates to the ABA was implemented

We reported previously that there were no requirements for system owners to provide and periodically update system information in the ABA. The IRS agreed to implement a policy requiring system owners to provide and update system information in the ABA.

To support the closure of this PCA in February 2021, the IRS provided a copy of the Internal Revenue Manual documenting the implementation of a new policy requiring all organizations that own or manage information technology systems operating in the production environment to provide updates in the ABA.<sup>7</sup>

To determine the effectiveness of this policy, we reviewed the date that information for systems operating in the production environment had been last updated in the ABA. Our review determined that, as of February 2024, information for 732 of 733 systems had been updated within a year of our review and the remaining system was updated just over one year of our review. As a result, we determined that this PCA was fully and effectively implemented.

#### Specific system information in the ABA is complete

We reported previously that as of April 2020, information in the ABA for 171 (26 percent) of 669 systems operating in the production environment was missing the managing organization(s), while the remaining 498 (74 percent) systems provided the information. In addition, information for 288 (43 percent) systems was missing the application age and/or the programming language, while the remaining 381 (57 percent) systems provided the information. The IRS agreed to update the ABA on a regular basis with the appropriate information, including the managing organization(s), application age, and programming language.

To support the closure of this PCA in August 2021, the IRS provided documentation supporting that the ABA self-service data collection tool was updated to include the managing organization(s), application age, and programming language, and that data calls to system owners with the missing data were completed. The documentation further supported that, as of August 2021, information on the managing organization(s), application age, and programming language for 654 (96 percent) of 682 systems was complete and information on 28 (4 percent) systems was incomplete.

To determine the completeness of information of the managing organization(s), application age, and programming language, we created a report containing this information for systems

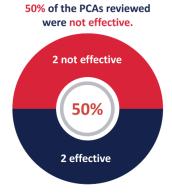
<sup>&</sup>lt;sup>7</sup> Internal Revenue Manual 2.15.1, *Enterprise Architecture (EA), Enterprise Architecture (EA) Overview* (Feb. 2021).

operating in the production environment.<sup>8</sup> As of March 2024, we determined that all 733 systems had the required information. As a result, we determined that this PCA was fully and effectively implemented.

# An Enterprise-Wide Program to Identify, Prioritize, and Execute the Updating, Replacing, or Retiring of Legacy Systems Does Not Exist

While the IRS fully and effectively implemented the PCAs for two of four recommendations from the prior report, two PCAs fully implemented were not effective.

We previously reported that the IRS did not have specific or long-term plans to address the updating, replacing, or retiring of most legacy systems. When asked for specific plans to identify, manage, or modernize the IRS's legacy systems, Information Technology organization and other business unit and function management stated that, generally, there were no individual plans for all systems at the IRS. However, the Information



Technology organization provided five direction and strategy documents, *e.g.*, the *Enterprise Technology Blueprint* and the *Target Enterprise Architecture*, that generally guide the IRS's information technology enterprise and a "backlog" of modernization and retirement initiatives. Our review of the documents determined that the IRS has initiatives identifying only 27 systems for modernization or potential candidates for modernization and 13 systems for retirement out of, as of April 29, 2020, 231 legacy systems. The IRS did not have any specific or long-term plans for the remaining 191 legacy systems in operation.<sup>9</sup> The IRS partially agreed with our recommendation to implement an enterprise-wide program to identify, prioritize, and execute the updating, replacing, or retiring of current and future legacy systems. The IRS stated that it will implement a strategy to include the current scope of Information Technology organization-managed and business-managed systems for an enterprise-wide strategic approach to identify, prioritize, and recommend the updating, replacing, or retiring of current and future legacy systems.

To support the closure of this PCA in September 2021, the IRS established the Technology Retirement Office within the Enterprise Services function in August 2021 to strategically reduce the information technology footprint across the enterprise. However, former Technology Retirement Office personnel stated that the office was shut down in January 2023 when its mission shifted from tracking the progress of system retirements to the strategic planning support of system decommissioning, such as providing architectural support services.

According to the Government Accountability Office's *Standards for Internal Control in the Federal Government*, management should establish an organizational structure, assign

<sup>&</sup>lt;sup>8</sup> We created this report by combining four ABA reports: the *Applications\_All* report, the *Application Age* report, the *Application and Technical Information* report, and the *Business Application With Business Managing Orgs* [Organizations] and POC [Point of Contact] report.

<sup>&</sup>lt;sup>9</sup> Some investments, programs, and systems identified for modernization or retirement may affect associated subsystems. Subsystems were included in our total only if they were specifically identified in the information technology enterprise direction and strategy documents.

responsibility, and delegate authority to achieve the entity's objectives, and evaluate performance and hold individuals accountable for their internal control responsibilities.

Without an enterprise-wide program, there is risk of an increasing use of resources to operate and maintain aged systems. The IRS's spending on operations and maintenance for its information technology infrastructure increased 35 percent from \$2 billion in Fiscal Year 2019 to \$2.7 billion in Fiscal Year 2023 and will likely continue to increase until a majority of legacy systems are decommissioned. As of December 2023, the IRS had identified only 107 (32 percent) of 334 legacy systems in the ABA as candidates for retirement, while the remaining 227 legacy systems had not been identified for retirement. Of the 107 legacy



The IRS increased expenditures on operations and maintenance by 35 percent.

systems, only two systems have specific decommissioning plans. The remaining 105 systems did not have specific decommissioning plans. As a result, we determined that while this PCA was fully implemented, it was not effective in correcting the identified deficiency.

<u>Recommendation 1</u>: The Chief Information Officer should re-establish the Technology Retirement Office or implement a similar enterprise-wide program to identify, prioritize, and decommission legacy systems.

Management's Response: The IRS partially agreed with this recommendation. The Transformation and Strategy Office has already established the leadership structure and enterprise-wide planning effort to deliver a technology transformation. The Transformation and Strategy Office will deliver the CY [Calendar Year] 2025/2026 Roadmap, which will reflect milestones toward delivering new capabilities. In conjunction with the Transformation and Strategy Office and the roadmap, the Enterprise Services function will work to decommission legacy systems as new capabilities become available.

**Office of Audit Comment:** Although the IRS only partially agreed with our recommendation, we believe management's response meets the intent of our recommendation.

#### The Definition of a Legacy System Is Not Being Properly Applied

We reported previously that the IRS lacked an enterprise-wide definition that can be uniformly applied to identify its inventory of legacy systems and therefore, the IRS does not have a complete and accurate inventory of legacy systems. In the prior review, we identified 231 legacy systems when we applied the IRS's newly created definition of a legacy system. When we compared our list of legacy systems to the Information Technology organization and other business units' and functions' list of legacy systems, we identified 46 systems as legacy that the IRS had not. Conversely, the IRS incorrectly identified one system as a legacy system when it should not have. The IRS agreed to implement and uniformly apply an enterprise-wide definition of a legacy system.

To support the closure of this PCA in December 2020, the IRS provided the Enterprise Architecture Office's *Information Technology (IT) Consolidated Glossary*, which defines legacy as:

An information system that may be based on outdated technologies but is critical to day-to-day operations. A legacy system, in the context of computing, refers to outdated computer systems, programming languages or application software that are used instead of more modern alternatives. A legacy system may be problematic, due to compatibility issues, obsoleting or lack of support. What is key, is that a legacy system has been identified as strategic, but in need of replacement.

For our current review, to determine whether the IRS identified all legacy systems operating in its production environment, we obtained the ABA March 2024 *Application to Programming Language* report. The report provides information on whether the system is or is not a legacy system and identified 349 systems operating in the production environment as legacy systems. Applying the IRS's definition of a legacy system, we identified 344 systems as legacy. We determined that the report incorrectly identified five systems as legacy systems. According to the *Information Technology (IT) Consolidated Glossary*, systems are legacy if they have an application age of 25 years or older or are written in an obsolete programming language.

We reported the results to Enterprise Architecture Office personnel, who determined that the exceptions identified were caused by an error in programming the query to identify legacy systems. They stated that while the query searched for the application age and programming language fields, it also searched the system name field for the obsolete programming language. As a result, the query incorrectly identified a system as legacy for systems whose name included an obsolete programming language. Without an accurate and a complete inventory, the IRS will be unable to effectively manage its legacy systems. As a result, we determined that while this PCA was fully implemented, it was not effective in correcting the identified deficiency.

**Management Action:** In response to this finding, Enterprise Architecture Office personnel stated that they updated the query to correctly identify all legacy systems. A second review of the report for April 2024 found two additional systems that had not been identified as legacy when they should have been. We again reported the results to Enterprise Architecture Office personnel, who stated that they made a further update to the query. As of May 2024, our review of the report determined that all 346 legacy systems operating in the production environment have been identified correctly.

**Recommendation 2:** The Chief Information Officer should ensure that the definition of a legacy system is properly applied and programmed in the query to correctly identify all legacy systems.

**Management's Response:** The IRS agreed with this recommendation. The Chief Information Officer will ensure that the definition of legacy systems is applied and programmed in the query to correctly identify legacy systems.

### **Appendix I**

### **Detailed Objective, Scope, and Methodology**

The overall objective was to assess the efforts to identify, replace, and decommission legacy systems and follow up on prior audit recommendations. To accomplish our objective, we:

- Evaluated the processes used by the Information Technology organization to identify, replace, and decommission legacy systems by reviewing policies, procedures, and guidelines as well as interviewing Enterprise Services function personnel to document their roles and responsibilities and the processes followed.
- Determined whether the Information Technology organization identified all legacy systems and created plans to decommission or replace the legacy systems by applying the IRS's definition of a legacy system to systems operating in the production environment, comparing our list to the IRS's list of legacy systems, and reviewing plans that have been developed to decommission or replace legacy systems identified.
- Determined whether the PCAs effectively addressed the prior audit recommendations by reviewing documentation uploaded to the Joint Audit Management Enterprise System to support the closure of the PCAs, and reviewing additional documents to assess whether the PCA effectively corrected the reported deficiencies. We also interviewed Information Technology organization personnel.

#### **Performance of This Review**

This review was performed with information obtained from the Enterprise Services function located at the New Carrollton Federal Building in Lanham, Maryland, during the period October 2023 through May 2024. We conducted this performance audit in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objective. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objective.

Major contributors to the report were Jena Whitley, Acting Assistant Inspector General for Audit (Security and Information Technology Services); Louis Lee, Director; Kenneth Bensman, Audit Manager; Jason Rosenberg, Lead Auditor; Destiny Ashlock, Auditor; and Allen Henry, Auditor.

#### **Data Validation Methodology**

We validated that ABA data were reliable and complete by performing a data reliability assessment. The data reliability assessment included performing electronic testing to verify that all fields requested were received, detect obvious errors and unexpected missing data, and verify that the record counts equaled to what was expected. We determined that the data were sufficiently reliable for purposes of this report.

#### **Internal Controls Methodology**

Internal controls relate to management's plans, methods, and procedures used to meet their mission, goals, and objectives. Internal controls include the processes and procedures for planning, organizing, directing, and controlling program operations. They include the systems for measuring, reporting, and monitoring program performance. We determined that the following internal controls were relevant to our audit objective: the Government Accountability Office's *Standards for Internal Control in the Federal Government*, IRS policy, procedures, guidelines, and strategy related to the identification, replacement, and decommission of legacy systems; and PCA closure guidance. We evaluated these controls by interviewing Enterprise Services personnel, reviewing the ABA, and reviewing relevant documentation.

### **Appendix II**

#### **Outcome Measure**

This appendix presents detailed information on the measurable impact that our recommended corrective action will have on tax administration. This benefit will be incorporated into our Semiannual Report to Congress.

#### **Type and Value of Outcome Measure:**

• Reliability of Information – Actual; seven systems that were not identified or incorrectly identified as a legacy system (see Recommendation 2).

#### **Methodology Used to Measure the Reported Benefit:**

We applied the IRS's definition of a legacy system to the ABA March 2024 *Application to Programming Language* report and compared our list of identified legacy systems to the legacy systems identified in the report. We determined that there were five systems that were incorrectly identified as legacy systems. We reported the results to Enterprise Architecture Office personnel, who determined the cause of this issue and reported that it had been resolved. A second review of this report in April 2024 determined that there were two additional systems that were not identified as legacy when they should have been. We again reported the results to Enterprise Architecture Office personnel, who stated that they had made a further update to the query. Our review of the report in May 2024 determined that all legacy systems had been identified correctly.

### **Appendix III**

#### **Management's Response to the Draft Report**



**DEPARTMENT OF THE TREASURY** INTERNAL REVENUE SERVICE WASHINGTON, DC 20224

July 3, 2024

#### MEMORANDUM FOR DEPUTY INSPECTOR GENERAL FOR AUDIT

Kaschit D. FROM: Rajiv Uppal,

Chief Information Officer Pandya

Digitally signed by Kaschit D. Pandya Date: 2024.07.03 For Rajiv Uppal

SUBJECT: Draft Audit Report - The IRS Does Not Have Specific Plans to

Replace and Decommission Legacy Systems (Audit

#2024200013)

Thank you for the opportunity to review your draft audit report and to discuss observations with the audit team. We appreciate the Treasury Inspector General for Tax Administration's (TIGTA) acknowledgment that IRS fully and effectively implemented two planned corrective actions related to information management in our As-Built-Architecture (ABA). The ABA is a key input to our Enterprise Architecture Roadmap and modernization planning. We also recognize TIGTA's finding that two additional recommendations related to legacy system decommissioning were not fully implemented.

Since the time of the TIGTA Audit 202020004 where these recommendations originated, the Inflation Reduction Act (IRA) signed by President Biden in August 2022 has created a unique opportunity for the IRS to digitally transform the organization. The IRA's funding enabled IRS to issue the IRS Strategic Operating Plan (SOP) in April 2023, which outlines clear objectives to significantly improve the way we serve taxpayers, ensure fair enforcement of tax law and to modernize our foundational technology. With the passing of IRA, the Commissioner stood up the Transformation and Strategy Office (TSO) and assigned dedicated executive Transformation Leads to oversee each SOP Objective. The IRS proudly issued the first annual SOP update in May 2024 to describe key accomplishments, including the Individual Masterfile code rewrite, which will enable IRS to process filing season 2025 individual tax returns using modern code language and to retire a significant portion of legacy Assembler Language Code.

The IRS is currently developing the next iteration of the IRA Transformation Roadmap, which will cover calendar years 2025-2026. The SOP Objective 4- Foundational Technology will be represented on the Roadmap and will include Key Results that align to the Outcome "IRS foundational technology is modern, scalable and easy to maintain

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to meet the IRS mission." Significantly, the Roadmap will reflect a shift in the legacy modernization strategy. The IRS no longer intends to rewrite and retire all systems that are identified as legacy in the ABA. Instead, the SOP and the IRS Enterprise Architecture Roadmap have laid the foundation for IRS to implement a Platform and Product model, where appropriate. The IRA Transformation Roadmap will reflect the implementation of enterprise common platforms for capabilities such as case management, case selection, and service management. As priorities are determined by the Transformation Steering Committees, each platform team will incrementally deliver new capabilities that will replace relevant legacy capabilities and functionality over time. The IRS will also modify its operating model to engage the entire enterprise in technology planning, with a focus on ensuring business customer input and value is delivered. In cases where common platforms are not applicable, such as individual and business tax processing. IRS will continue to develop new capabilities that will enable incremental legacy retirement. Those programs will continue to document their strategy and plans, and their major milestones will be included on the IRA Transformation Roadmap.

With these changes in mind, the IRS partially agrees with the recommendation to reestablish the Technology Retirement Office or implement a similar enterprise-wide program to identify, prioritize, and decommission legacy systems. The IRS has implemented the Advisory Committee to oversee the entire IRA Transformation Roadmap and portfolio of projects. The IRA Transformation Roadmap is an enterprise-wide plan that enables IRS to identify, prioritize and plan for new capabilities that improve taxpayer service, improve employee experience, and ensure fairness in enforcement of tax law. Objective 4 – Foundational Technology is represented on the Roadmap and includes the delivery of new capabilities that incrementally allow legacy applications to be retired.

We agree with TIGTA's recommendation to ensure that the definition of a legacy system is properly applied and programmed in the query to correctly identify all legacy systems. The ABA is an authoritative source for IRS applications. The ABA has introduced a "Legacy" field in its report to indicate whether an application is a legacy application. An application in ABA is classified as legacy based on its age and programming language. We plan to streamline and automate the process by implementing the Legacy field not just only in the report but also in the ABA repository. The Legacy field in the ABA repository will be updated automatically when an application meets the legacy criteria based on its age and programming language. This corrective action plan will also address the related outcome measure.

The IRS is dependent on the funding allocated by the IRA. With this funding, IRS is committed to delivering on the digital transformation outlined in the SOP. The IRS values TIGTA's continued support and assistance. If you have any questions, please contact me at (202) 317-5000, or a member of your staff may contact Tony Smith, Director of Enterprise Architecture, at (240) 613-6984.

Attachment

Attachment

Audit# 2024200013, The IRS Does Not Have Specific Plans to Replace and Decommission Legacy Systems

#### Recommendations

**RECOMMENDATION 1:** The Chief Information Officer should re-establish the Technology Retirement Office or implement a similar enterprise-wide program to identify, prioritize, and decommission legacy systems.

<u>CORRECTIVE ACTION 1:</u> The IRS partially agrees with the recommendation. The Transformation and Strategy Office (TSO) has already established the leadership structure and enterprise-wide planning effort to deliver technology transformation. The TSO will deliver the CY2025/2026 Roadmap, which will reflect milestones toward delivering new capabilities. In conjunction with TSO and the CY2025/2026 Roadmap that TSO delivers, Enterprise Services will work to decommission legacy systems as new capabilities become available.

IMPLEMENTATION DATE: September 15, 2025

**RESPONSIBLE OFFICIAL(S):** Transformation Lead, Foundational Technology, IRS Transformation and Strategy Office and Associate Chief Information Officer, Enterprise Services

**RECOMMENDATION 2:** The Chief Information Officer should ensure that the definition of a legacy system is properly applied and programmed in the query to correctly identify all legacy systems.

<u>CORRECTIVE ACTION 2:</u> The IRS agrees with this recommendation. The Chief Information Officer will ensure that the definition of legacy systems is applied and programmed in the query to correctly identify legacy systems.

IMPLEMENTATION DATE: September 15, 2024

RESPONSIBLE OFFICIAL(S): Associate Chief Information Officer, Enterprise Services

# **Appendix IV**

### **Glossary of Terms**

Term	Definition
Application	A component of a system that utilizes information technology resources to store, process, retrieve, or transmit data or information using information technology hardware and software.
As-Built Architecture	The authoritative source of the IRS's information technology and business environments. It documents the production environment of IRS systems, infrastructure, technology platforms, <i>etc</i> .
Business Unit	A title for major IRS organizations, such as the Independent Office of Appeals, the Taxpayer Services Division, and the Information Technology organization.
Decommission	The removal of information technology assets from the production environment. Decommissioning legacy systems includes hardware, software, licenses, and the closeout of support contracts.
Information Technology Organization	The IRS organization responsible for delivering information technology services and solutions that drive effective tax administration to ensure public confidence.
Internal Revenue Manual	Primary source of instructions to employees relating to the administration and operation of the IRS. The Manual contains the directions employees need to carry out their operational responsibilities.
Joint Audit Management Enterprise System	The Department of the Treasury system for use by all bureaus to track, monitor, and report the status of internal control audit results. The system tracks specific information on issues, findings, recommendations, and PCAs from audit reports issued by oversight agencies, such as the Treasury Inspector General for Tax Administration.
Legacy System	An information system that may be based on outdated technologies but is critical to day-to-day operations. In the context of computing, it refers to outdated computer systems, programming languages, or application software that are used instead of more modern alternatives.
Planned Corrective Action	A process to address IRS material weaknesses, significant deficiencies, and existing reportable conditions through remediation and action plans.
Programming Language	A computer language engineered to create a standard form of commands.
Query	A structured way to access information from an information system so it can be used or modified.
Retire	The act of taking a system or product out of service. The system may still be running but is no longer used by the business except for legacy or legal queries.
Software	A general term that consists of lines of code written by computer programmers that have been compiled into a computer program.

#### The IRS Does Not Have Specific Plans to Replace and Decommission Legacy Systems

Term	Definition
Subsystem	A component of an application or system.
System	A discrete set of information resources organized for the collection, processing, maintenance, use, sharing, dissemination, or disposition of information. A system normally includes hardware, software, information, data, applications, communications, and people.
Transformation and Strategy Office	Its mission is to drive the IRS's information technology transformation by implementing a rigorous program management approach that will establish clear priorities, align resources and operational planning to those priorities, monitor progress and course correct as needed, and keep stakeholders updated on the progress.

# **Appendix V**

### **Abbreviations**

ABA	As-Built Architecture

IRA Inflation Reduction Act of 2022

IRS Internal Revenue Service

PCA Planned Corrective Action



To report fraud, waste, or abuse, contact our hotline on the web at <a href="www.tigta.gov">www.tigta.gov</a> or via e-mail at <a href="mailto:oi.govreports@tigta.treas.gov">oi.govreports@tigta.treas.gov</a>.

To make suggestions to improve IRS policies, processes, or systems affecting taxpayers, contact us at <a href="https://www.tigta.gov/form/suggestions">www.tigta.gov/form/suggestions</a>.

Information you provide is confidential, and you may remain anonymous.