



Audit Report



OIG-23-001

FINANCIAL MANAGEMENT

Report on the Bureau of the Fiscal Service's Description of its Investment and Redemption Shared Services System and the Suitability of the Design and Operating Effectiveness of its Controls for the Period August 1, 2021 to July 31, 2022

October 25, 2022

Office of Inspector General
Department of the Treasury

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OFFICE OF
INSPECTOR GENERAL

DEPARTMENT OF THE TREASURY
WASHINGTON, DC. 20220

October 25, 2022

**MEMORANDUM FOR JEFFREY J. SCHRAMEK, DEPUTY COMMISSIONER,
FISCAL ACCOUNTING AND SHARED SERVICES
BUREAU OF THE FISCAL SERVICE**

FROM: Ade O. Bankole /s/
Director, Financial Statement Audits

SUBJECT: Report on the Bureau of the Fiscal Service's Description of its Investment and Redemption Shared Services System and the Suitability of the Design and Operating Effectiveness of its Controls for the Period August 1, 2021 to July 31, 2022

We hereby transmit the attached subject report. Under a contract monitored by our office, KPMG LLP (KPMG), a certified independent public accounting firm, examined the Bureau of the Fiscal Service's description of its shared services system titled "Description of the Bureau of the Fiscal Service's Investment and Redemption Services" (the Description) throughout the period August 1, 2021 to July 31, 2022, of its Investment and Redemption Services (the System) for processing program agencies' investment and redemption transactions, and the suitability of the design and operating effectiveness of controls included in the Description. This report includes the Description, management's written assertion, and KPMG's independent service auditors' report. The contract required that the examination be performed in accordance with U.S. generally accepted government auditing standards and the attestation standards established by the American Institute of Certified Public Accountants.

In its examination, KPMG found in all material respects:

- the Description fairly presents the system that was designed and implemented throughout the period August 1, 2021 to July 31, 2022;
 - the controls related to the control objectives stated in the Description were suitably designed to provide reasonable assurance that the control objectives would be achieved if the controls operated effectively throughout the period August 1, 2021 to July 31, 2022, and subservice organizations and Program Agencies applied the complementary controls assumed in the design of Fiscal Service's controls throughout the period August 1, 2021 to July 31, 2022;
- and

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- the controls operated effectively to provide reasonable assurance that the control objectives stated in the Description were achieved throughout the period August 1, 2021 to July 31, 2022, if complementary subservice organization and Program Agency controls, assumed in the design of Fiscal Service's controls, operated effectively throughout the period August 1, 2021 to July 31, 2022.

In connection with the contract, we reviewed KPMG's report and related documentation and inquired of its representatives. Our review, as differentiated from an examination in accordance with generally accepted government auditing standards, was not intended to enable us to express, and we do not express, an opinion on Fiscal Service's description of controls, the suitability of the design of these controls and the operating effectiveness of controls tested. KPMG is responsible for the attached independent service auditors' report dated October 21, 2022, and the conclusions expressed therein. However, our review disclosed no instances where KPMG did not comply, in all material respects, with generally accepted government auditing standards.

If you wish to discuss this report, please contact me at (202) 927-5329, or a member of your staff may contact Mark Levitt, Manager, Financial Statement Audits, at (202) 927-5076.

Attachment

cc: Timothy E. Gribben, Commissioner



**Department of the Treasury
Bureau of the Fiscal Service**

**Federal Investments and Borrowings Branch
Investment and Redemption Services
General Computer,
Investment and Redemption Processing, and Monitoring Controls**

**Report on Bureau of the Fiscal Service's Federal Investments and
Borrowings Branch's Description of Its Investment and Redemption
Services and the Suitability of the Design and Operating Effectiveness of
Its Controls (SSAE 18 SOC 1 ® - Type 2 Report)
For the Period August 1, 2021 to July 31, 2022**

**DEPARTMENT OF THE TREASURY
BUREAU OF THE FISCAL SERVICE
FEDERAL INVESTMENTS AND BORROWINGS BRANCH**

**REPORT ON BUREAU OF THE FISCAL SERVICE’S FEDERAL INVESTMENTS AND
BORROWINGS BRANCH’S DESCRIPTION OF ITS INVESTMENT AND REDEMPTION
SERVICES AND THE SUITABILITY OF THE DESIGN AND OPERATING
EFFECTIVENESS OF ITS CONTROLS**

FOR THE PERIOD AUGUST 1, 2021 TO JULY 31, 2022

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**I. INDEPENDENT SERVICE AUDITORS' REPORT PROVIDED BY
KPMG LLP**



KPMG LLP
Suite 900
8350 Broad Street
McLean, VA 22102

Independent Service Auditors' Report

Deputy Inspector General, Department of the Treasury
Deputy Commissioner, Fiscal Accounting and Shared Services

Scope

We have examined the Bureau of the Fiscal Service's (Fiscal Service) description of its shared services system titled "Description of the Bureau of the Fiscal Service's Investment and Redemption Services" (the Description) throughout the period August 1, 2021 to July 31, 2022 of its Investment and Redemption Services (the System) for processing program agencies' investment and redemption transactions and the suitability of the design and operating effectiveness of the controls included in the Description to achieve the related control objectives stated in the Description, based on the criteria identified in "Management's Assertion" (Assertion). The controls and control objectives included in the Description are those that management of Fiscal Service believes are likely to be relevant to program agencies' internal control over financial reporting, and the Description does not include those aspects of the System that are not likely to be relevant to program agencies' internal control over financial reporting.

The information included in Section V, "Other Information Provided by the Bureau of the Fiscal Service," is presented by management of Fiscal Service to provide additional information and is not a part of the Description of its System made available to program agencies during the period August 1, 2021 to July 31, 2022. Information about Fiscal Service's contingency planning and network performance monitoring has not been subjected to the procedures applied in the examination of the Description of the System and of the suitability of the design and operating effectiveness of controls to achieve the related control objectives stated in the Description of the System and, accordingly, we express no opinion upon it.

Fiscal Service uses subservice organizations identified in Section III to perform some of the services provided to program agencies that are likely to be relevant to those program agencies' internal control over financial reporting. The Description includes only the control objectives and related controls of Fiscal Service and excludes the control objectives and related controls of the subservice organizations. The Description also indicates that certain control objectives specified by Fiscal Service can be achieved only if complementary subservice organization controls assumed in the design of Fiscal Service's controls are suitably designed and operating effectively, along with the related controls at Fiscal Service. Our examination did not extend to controls of the subservice organizations and we have not evaluated the suitability of the design or operating effectiveness of such complementary subservice organization controls.

The Description indicates that certain control objectives specified in the Description can be achieved only if complementary program agency controls assumed in the design of Fiscal Service's controls are suitably designed and operating effectively, along with related controls at Fiscal Service. Our examination did not extend to such complementary program agency controls, and we have not evaluated the suitability of the design or operating effectiveness of such complementary program agency controls.



Service Organization's Responsibilities

In Section II, Fiscal Service has provided an Assertion about the fairness of the presentation of the Description and suitability of the design and operating effectiveness of the controls to achieve the related control objectives stated in the Description. Fiscal Service is responsible for preparing the Description and its Assertion, including the completeness, accuracy, and method of presentation of the Description and Assertion, providing the services covered by the Description, specifying the control objectives and stating them in the Description, identifying the risks that threaten the achievement of the control objectives, selecting the criteria stated in the Assertion, and designing, implementing, and documenting controls that are suitably designed and operating effectively to achieve the related control objectives stated in the Description.

Service Auditors' Responsibilities

Our responsibility is to express an opinion on the fairness of the presentation of the Description and on the suitability of the design and operating effectiveness of the controls to achieve the related control objectives stated in the Description, based on our examination.

Our examination was conducted in accordance with attestation standards established by the American Institute of Certified Public Accountants and applicable U.S. Generally Accepted Government Auditing Standards. Those standards require that we plan and perform the examination to obtain reasonable assurance about whether, in all material respects, based on the criteria in management's Assertion, the Description is fairly presented and the controls were suitably designed and operating effectively to achieve the related control objectives stated in the Description throughout the period August 1, 2021 to July 31, 2022. We believe that the evidence we obtained is sufficient and appropriate to provide a reasonable basis for our opinion.

An examination of a Description of a service organization's system and the suitability of the design and operating effectiveness of controls involves:

- performing procedures to obtain evidence about the fairness of the presentation of the Description and the suitability of the design and operating effectiveness of the controls to achieve the related control objectives stated in the Description, based on the criteria in management's Assertion;
- assessing the risks that the Description is not fairly presented and that the controls were not suitably designed or operating effectively to achieve the related control objectives stated in the Description;
- testing the operating effectiveness of those controls that management considers necessary to provide reasonable assurance that the related control objectives stated in the Description were achieved; and
- evaluating the overall presentation of the Description, suitability of the control objectives stated in the Description, and suitability of the criteria specified by the service organization in its Assertion.

Service Auditors' Independence and Ethical Responsibilities

We are required to be independent and to meet our other ethical responsibilities in accordance with relevant ethical requirements relating to the examination engagement.



Inherent Limitations

The Description is prepared to meet the common needs of a broad range of program agencies and their auditors who audit and report on program agencies' financial statements and may not, therefore, include every aspect of the System that each individual program agency may consider important in its own particular environment. Because of their nature, controls at a service organization may not prevent, or detect and correct, all misstatements in processing or reporting transactions. Also, the projection to the future of any evaluation of the fairness of the presentation of the Description, or conclusions about the suitability of the design or operating effectiveness of the controls to achieve the related control objectives stated in the Description is subject to the risk that controls at a service organization may become ineffective.

Description of Tests of Controls

The specific controls tested and the nature, timing, and results of those tests are listed in Section IV.

Opinion

In our opinion, in all material respects, based on the criteria described in Fiscal Service's Assertion:

- a. the Description fairly presents the System that was designed and implemented throughout the period August 1, 2021 to July 31, 2022;
- b. the controls related to the control objectives stated in the Description were suitably designed to provide reasonable assurance that the control objectives would be achieved if the controls operated effectively throughout the period August 1, 2021 to July 31, 2022, and subservice organizations and program agencies applied the complementary controls assumed in the design of Fiscal Service's controls throughout the period August 1, 2021 to July 31, 2022; and
- c. the controls operated effectively to provide reasonable assurance that the control objectives stated in the Description were achieved throughout the period August 1, 2021 to July 31, 2022 if complementary subservice organization and program agency controls, assumed in the design of Fiscal Service's controls, operated effectively throughout the period August 1, 2021 to July 31, 2022.

Restricted Use

The purpose of this report, including the description of tests of controls and results thereof in Section IV "Control Objectives, Related Controls, and Tests of Operating Effectiveness" is solely to provide information for management of Fiscal Service, program agencies of Fiscal Service's Investment and Redemption Services during some or all of the period August 1, 2021 to July 31, 2022 and its auditors who audit and report on such program agencies' financial statements or internal control over financial reporting and have a sufficient understanding to consider it, along with other information, including information about controls implemented by program agencies themselves, when assessing the risks of material misstatement of program agencies' financial statements, to support evaluations of the effect of Fiscal Service's Investment and Redemption Services' controls on program agencies' financial statements. Accordingly, this report is not suitable for any other purpose.

KPMG LLP

October 21, 2022
McLean, Virginia

II. MANAGEMENT'S ASSERTION



DEPARTMENT OF THE TREASURY
BUREAU OF THE FISCAL SERVICE
WASHINGTON, DC 20227

October 21, 2022

KPMG LLP
8350 Broad Street, Suite 900
McLean, Virginia 22012

Ladies and Gentlemen:

We have prepared the accompanying description of the Bureau of the Fiscal Service's (Fiscal Service) system titled "Description of Fiscal Service's Investment and Redemption Services" for processing program agencies' investment and redemption transactions throughout the period August 1, 2021 to July 31, 2022 (the Description) for program agencies of the Investment and Redemption Services (the System) during some or all of the period August 1, 2021 to July 31, 2022, and their auditors who audit and report on such program agencies' financial statements or internal control over financial reporting and have a sufficient understanding to consider it, along with other information, including information about controls implemented by subservice organizations and program agencies of the System themselves, when assessing the risks of material misstatement of program agencies' financial statements.

Fiscal Service uses subservice organizations for some of its application processing. The Description includes only Fiscal Service's control objectives and related controls and excludes the control objectives and related controls of the subservice organizations. The Description also indicates that certain control objectives specified in the Description can be achieved only if complementary subservice organization controls assumed in the design of our controls are suitably designed and operating effectively along with the related controls at Fiscal Service. The Description does not extend to controls of the subservice organization.

The Description indicates that certain control objectives specified in the Description can be achieved only if complementary program agency controls assumed in the design of Fiscal Service's controls are suitably designed and operating effectively, along with related controls at Fiscal Service. The Description does not extend to controls of the program agencies.

We confirm, to the best of our knowledge and belief, that:

- a) The Description fairly presents the System made available to program agencies of the System during some or all of the period August 1, 2021 to July 31, 2022 for processing their transactions as it relates to controls that are likely to be relevant to program agencies' internal control over financial reporting. The criteria we used in making this assertion were that the Description:
 - i. presents how the System made available to program agencies of the System was designed and implemented to process relevant program agency transactions, including, if applicable:
 - (1) the types of services provided, including, as appropriate, the classes of transactions processed;
 - (2) the procedures, within both automated and manual systems, by which those services are provided, including, as appropriate, procedures by which transactions are initiated, authorized, recorded, processed, corrected as necessary, and transferred to the reports and other information prepared for program agencies of the System;
 - (3) the information used in the performance of the procedures, including, if applicable, related accounting records, whether electronic or manual, and supporting information involved in initiating, authorizing, recording, processing, and reporting transactions; this includes the correction of incorrect information and how information is transferred to the reports and other information prepared for program agencies;

- (4) how the System captures and addresses significant events and conditions other than transactions;
- (5) the process used to prepare reports and other information for program agencies;
- (6) services performed by a subservice organization, if any, including whether the carve-out method or the inclusive method has been used in relation to them;
- (7) the specified control objectives and controls designed to achieve those objectives, including, as applicable, complementary program agency controls and complementary subservice organization controls assumed in the design of the service organization's controls; and
- (8) other aspects of our control environment, risk assessment process, information and communications (including the related business processes), control activities and monitoring activities that are relevant to the services provided.

- ii. includes relevant details of changes to Fiscal Service's System during the period covered by the Description.
- iii. does not omit or distort information relevant to Fiscal Service's System, while acknowledging that the Description is prepared to meet the common needs of a broad range of program agencies of the System and their auditors, and may not, therefore, include every aspect of the Investment and Redemption Services that each individual program agency of the System and its auditor may consider important in its own particular environment.

b) The controls related to the control objectives stated in the Description were suitably designed and operating effectively throughout the period August 1, 2021 to July 31, 2022 to achieve those control objectives if subservice organizations and program agencies applied the complementary controls assumed in the design of Fiscal Service's controls throughout the period August 1, 2021 to July 31, 2022. The criteria we used in making this assertion were that:

- i. the risks that threaten the achievement of the control objectives stated in the Description have been identified by management of Fiscal Service;
- ii. the controls identified in the Description would, if operating effectively, provide reasonable assurance that those risks would not prevent the control objectives stated in the Description from being achieved; and
- iii. the controls were consistently applied as designed, including whether manual controls were applied by individuals who have the appropriate competence and authority.

Sincerely,



D. Michael Linder
Assistant Commissioner,
Fiscal Accounting

**III. DESCRIPTION OF THE BUREAU OF THE FISCAL SERVICE'S
INVESTMENT AND REDEMPTION SERVICES**

OVERVIEW OF OPERATIONS

The Federal Investments and Borrowings Branch (FIBB) is a component of the Bureau of the Fiscal Service (Fiscal Service). Fiscal Service Delegation 10-5, Organizational Structure for the Bureau of the Fiscal Service and Delegations of Authority, dated August 27, 2014, and Fiscal Service Delegation 30-1, Organizational Structure for Fiscal Accounting (FAO) and Delegation of Authority, dated September 26, 2014, established the Office of Fiscal Accounting's responsibility to administer the federal investments program, which includes issuing, servicing, and redeeming Government Account Series (GAS) securities.

FAO has further assigned these responsibilities to the FIBB. FIBB is responsible for processing investment transactions for over 235 government investment accounts that are authorized by law to invest in GAS securities. The investment transactions processed by FIBB are based on the direction provided by the Federal Agencies (program agencies) that have programmatic responsibility for the use of the fund balances. FIBB processes an average of approximately 1,500 transactions daily. FIBB also performs the following operational duties:

- Analyzes provisions and limitations of public laws relating to investments for each account.
- Establishes and controls the record keeping of program agencies' accounts by receiving and issuing investment documents such as the Request for Investment and Redemption of Securities, Warrant Journal Vouchers (WJVs) documenting the availability of certain taxes for investment or need for redemption, Investment Confirmations and Monthly Statement of Accounts (a cash basis statement that reflects the Agency's investment reporting, and shows interest income paid on each security).
- Provides daily and monthly reports to program agencies reflecting account activities and balances.

Investment and redemption transaction records are maintained in electronic form. Confirmations are available in FedInvest, Monthly Statements of Account are available in FedInvest and the Summary Level Statement of Accounts are also published on the TreasuryDirect website for retrieval and review by program agencies. FIBB utilizes the InvestOne accounting system, maintained and operated by Fiscal Service, to perform the operational duties stated above. The InvestOne accounting system is a transaction-based accounting system for recording and processing investment security transactions for each of the accounts and provides information to the Summary Debt Accounting System (SDAS), and the Central Accounting Reporting System (CARS) (SDAS and CARS are not in scope for this report). The InvestOne accounting system computes daily, monthly, quarterly, semiannual, and annual interest income for each account for each security held. It also calculates amortization, investment discount and premium for investment and redemption transactions, Inflation Compensation Earned on the Treasury Inflation Protected Securities (TIPS) and maintains summary account balances for each account as well as balances by type of security. Program agencies use FedInvest, a web-based extension of InvestOne, to enter investment and redemption requests, view transaction information, and obtain confirmations and reports. Internal Fund managers use FedInvest and two additional extensions, Customer Role Management (CRM) and Rate Price Administration (RPA), to process transactions, manage users and accounts, and manage the application of pricing, rates, and pending transactions.

FIBB processes investment transactions based on requests from program agencies regarding security type, maturity, and amount. Program agencies submit the investment/redemption requests

via the internet using FedInvest. If program agencies are unable to access FedInvest to submit requests they can submit the investment/redemption requests via email to FIBB for manual entry. The investment and redemption request processing for program agencies is summarized as follows.

The Central Technology Division (CTD) and the Program Support Division (PSD), divisions within the Office of Fiscal Accounting Support and Outreach, are responsible for the sustainment and support of FedInvest and InvestOne.

Establishing FedInvest Access

To establish access to FedInvest, the applicant representing the program agency must complete the Bureau of the Fiscal Service FedInvest Logon ID Request. Once completed, the form is reviewed and signed by the applicant's supervisor and submitted to FIBB for processing. Upon receipt, FIBB verifies that the information is complete and then provides a copy of the FedInvest Logon ID Request to the Fiscal Accounting (FA) Information System Security Representatives (ISSRs) for user set-up in Contact Management and FedInvest. After this is completed, Information and Security Services (ISS) provides the new user with their user ID and temporary password. The user is then instructed to login to FedInvest with the temporary password, answer security questions, and change their temporary password. When access to FedInvest is no longer required by the user, the applicable program agency will email FIBB at FedInvestor@fiscal.treasury.gov and request that the user's access be revoked. FIBB will then forward the request to the ISSRs, who will process the revocation.

Investment Request Processing

Program agency users access FedInvest using their user ID and password. The program agency user selects the Account Fund Symbol (AFS), date, security type, and investment amount in FedInvest.

Before Prices Loaded – The FedInvest user may enter investment requests before prices are loaded in the system for up to 10 business days in the future except for Zero-Coupon Bonds and Special Issue Certificates of Indebtedness. Upon submission of the request, the user receives a confirmation number which is proof to the program agency that their request was accepted. When prices are loaded by the FIBB accountant into the InvestOne accounting system, the FIBB accountant uses the FedInvest RPA module to load the prices into FedInvest, published in FedInvest, and apply the prices to the pending investment transactions. Once the price has been applied to the transaction, it is automatically posted to the InvestOne accounting system as evidenced by the replacement of the confirmation number with a memo number on the confirmation available to the user in FedInvest.

After Prices Loaded – The FedInvest user may enter investment requests after prices are loaded except for Zero-Coupon Bonds. Since FedInvest interfaces with the InvestOne accounting system, the InvestOne accounting system automatically assigns a memo number and applies the price/rate. A confirmation of results is available in FedInvest.

Zero-Coupon Bond securities – The FedInvest user must enter investment requests by 11:00 am ET. FedInvest sends the request by email to the FIBB accountants who forward the request to the Treasury's Office of Debt Management (ODM) for pricing. ODM prices the purchase of the Zero-Coupon Bond at approximately 12:00 pm ET and forwards the results to FIBB by email. The FIBB accountant enters the pricing results into the InvestOne accounting system, posts the transaction,

and forwards the memo number to the FedInvest user. A confirmation of results is available in FedInvest.

Program agencies submit the investment/redemption requests via the internet using FedInvest. If program agencies are unable to access FedInvest to submit requests, they can submit the investment/redemption requests via email to FIBB for manual entry. FIBB also processes investment transactions for certain program agencies when documentation provided by Fiscal Service Fiscal Accounting Operations (FAO), Central Accounting and Reporting Division (CARD) indicates that there are additional amounts available for investment. A FIBB accountant enters the request into FedInvest or the InvestOne accounting system on behalf of the Program Agency. Then two FIBB accountants compare the transaction confirmation to the investment request to ensure the investment request is recorded accurately and posted to the correct day, and then digitally stamp the investment request to document their review. A confirmation of results is available in FedInvest the same day. On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review) to the investment requests submitted by the program agency to ensure transactions were properly entered into the InvestOne accounting system and places a digital stamp on the investment request.

Redemption Request Processing

Program agency users access FedInvest using their user ID and password. The program agency user selects the AFS, date, inventory method (First-In First-Out (FIFO) or Specific ID), security type, and redemption amount in FedInvest.

Before Prices Loaded – The FedInvest user may enter market-based bill, note (fixed and floating rate), bond, and TIPS redemption requests using the FIFO inventory method before prices are loaded in the system for up to 10 business days in the future. Upon submission of the request, the user receives a confirmation number which is proof to the program agency that their request was accepted. When prices are loaded by the FIBB accountant into the InvestOne accounting system, the FIBB accountant uses the FedInvest RPA module to load the prices into FedInvest, published in FedInvest, and apply the prices to the pending redemption transactions. Once the price has been applied to the transaction, it is automatically posted to the InvestOne accounting system as evidenced by the replacement of the confirmation number with a memo number that is also on the confirmation available to the user in FedInvest.

After Prices Loaded – The FedInvest user may enter market-based bill, note (fixed and floating rate), bond and TIPS redemption requests using the FIFO or Specific ID inventory methods after prices are loaded in the InvestOne accounting system and FedInvest. If program agencies have tax lots (a group of the same securities purchased on different dates) and decide to apply the specific identification method rather than the FIFO method to redeem from specific tax lots, program agencies need to select “Specific ID” inventory method to override the InvestOne accounting system default setting of the FIFO method, and enter the principal amount to redeem for each tax lot. Since FedInvest interfaces with the InvestOne accounting system, the InvestOne accounting system automatically assigns a memo number and applies the price/rate. A confirmation of results is available on FedInvest.

Special Issue par-value securities - Special par-value securities have unique redemption rules that require the InvestOne accounting system to redeem them based on the order of earliest maturity date, lowest prevailing interest rate, and FIFO. The FedInvest user receives a confirmation with a confirmation number and a message that the redemption rules will be applied in accordance with

Treasury Fiscal Policy. The transaction will be pending until after the close of business on the effective date. At close of business (after 3:00 pm ET) on the effective date of the redemption, the FIBB accountant uses the FedInvest RPA module to run the Post Par Value Sell Transactions that will process, post, and assign memo numbers to the pending redemption requests in the InvestOne accounting system using the unique redemption rules. A confirmation of results is available in FedInvest.

Zero-Coupon Bond securities – The FedInvest user must enter redemption requests into FedInvest (by 11:00 am ET) and FedInvest sends an email to the FIBB accountants who forward the request to ODM for pricing. ODM prices the redemption of the Zero-Coupon Bond at approximately 12:00 pm ET and forwards the results to FIBB via email. The FIBB accountant enters the pricing results into the InvestOne accounting system, posts the transaction, and forwards the memo number to the FedInvest user. A confirmation of results is available in FedInvest.

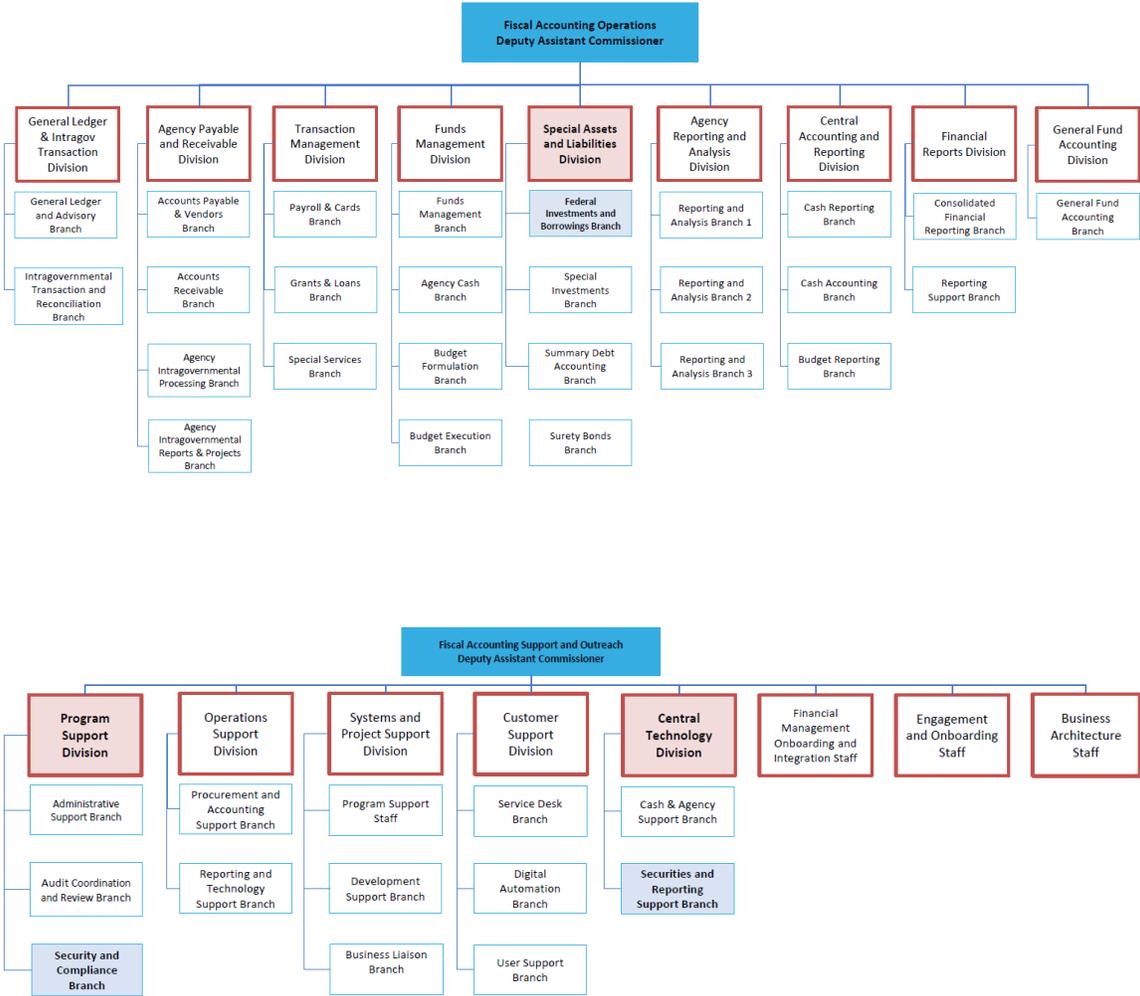
Program agencies submit the investment/redemption requests via the internet using FedInvest. If program agencies are unable to access FedInvest to submit requests, they can submit the investment/redemption requests via email to FIBB for manual entry. FIBB also processes redemption transactions for certain program agencies when documentation provided by CARD reflects that there is a need to redeem previously invested funds. A FIBB accountant enters the request into FedInvest or InvestOne accounting system on behalf of the program agency. Then two FIBB accountants review and digitally stamp the redemption request. A confirmation of results is available in FedInvest the same day. On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review) to the redemption requests submitted by the program agency to ensure the transactions were properly entered into the InvestOne accounting system and places a digital stamp on the redemption request.

FIBB obtains and applies open market prices for securities negotiated by brokers and dealers of government securities from the Department of the Treasury's ODM and the Federal Reserve Bank (FRB) of New York.

FIBB functions do not encompass monitoring or determining rates, types, and maturities of government marketable securities. ISS provides application security (including user ID and temporary passwords for new users), support for Fiscal Service's Fiscal Information Technology Mainframe (FIT MF), and a distributed client-server environment that supports batch processing and reporting operations to FIBB, including regular maintenance programming and user-requested program enhancements.

The in-scope Fiscal Service functions are FIBB, CTD, and PSD. The Fiscal Service Organizational Chart below illustrates the relationships and chains of command for the aforementioned:

ORGANIZATIONAL CHART



RELEVANT ASPECTS OF THE CONTROL ENVIRONMENT, RISK ASSESSMENT, AND MONITORING

Control Environment

Operations are primarily under the direction of the following divisions: Special Assets and Liabilities Division (SALD) and the CTD which represent the functional areas listed below:

- *Administrative development:* Coordinates various aspects of FIBB operations. Identifies areas requiring internal controls and implements those controls. Performs systems planning, development, and implementation. Reviews network operations and telecommunications and performs disaster-recovery planning and database administration.
- *Fund support:* Supports end users (program agencies) in all aspects of their use of the application system including research and resolution of identified problems.
- *Operations:* Manages daily computer operations, production processing, report production and distribution, and system utilization and capacity.

SALD, PSD and CTD hold bi-weekly management meetings to discuss special processing requests, operational performance, and the development and maintenance of projects in process. Written position descriptions for employees are maintained. The descriptions are inspected annually and revised as necessary.

References are sought and background, credit, and security checks are conducted for all Fiscal Service personnel when they are hired. Additional background, credit, and security checks are performed every three to five years. The confidentiality of program agency information is stressed during the new employee orientation program and is emphasized in the personnel manual issued to each employee. Fiscal Service provides a mandatory orientation program to all full-time employees and encourages employees to attend other formal outside training.

All Fiscal Service employees receive an annual written performance evaluation. These reviews are based on goals and objectives that are established and reviewed during meetings between the employee and the employee's supervisor. Completed appraisals are reviewed by senior management and become a permanent part of the employee's personnel file.

Risk Assessment

Fiscal Service has placed into operation a risk assessment process to identify and manage risks that could affect FIBB's ability to provide reliable transaction processing for users. This process requires management to identify significant risks in their areas of responsibility and to implement appropriate measures to manage these risks.

Additionally, all mission-critical systems and general support systems are subject to an internal risk-based review every year. This review identifies assets and possible threats to these assets, provides a measure of vulnerability of the system to these threats, and confirms control or protective measures are in place.

Monitoring

Fiscal Service management and supervisory personnel monitor the quality of internal control performance as a normal part of their activities. To assist them in this monitoring, Fiscal Service has implemented a series of “key indicator” management reports that measure the results of various processes involved in providing transaction-processing services to program agencies. Key indicator reporting consists of SDAS posting summary reports to validate accuracy. All exceptions to normal or scheduled processing through hardware and software, or procedural problems are also logged, reported, and resolved daily. These reports are inspected daily and weekly by appropriate levels of management, and action is taken as necessary.

Fiscal Service also uses the results of the annual Report on Controls at a Service Organization Relevant to User Entities’ Internal Control over Financial Reporting (SOC 1) as a tool for identifying opportunities to strengthen controls.

Fiscal Service management also obtains and reviews relevant subservice organization SOC 1 reports on an annual basis. For Fiscal Service systems that do not receive a SOC 1 report, system verification letters are prepared by the subservice system owner to document the information security controls that are implemented and operating effectively. The system verification letters are also obtained and reviewed by management.

INFORMATION AND COMMUNICATION

Information Systems

InvestOne Accounting System Description

The InvestOne accounting system is a vendor supplied subsystem of the Debt Information Management System (DIMS). The InvestOne accounting system is used to record and report investment fund activity processed by FIBB. The InvestOne accounting system is licensed by FIS Capital Markets US LLC.

Prior to January 21, 2022, the InvestOne accounting system resided and operated on Fiscal Service's FIT MF environment.¹ On January 21, 2022, the InvestOne accounting system was moved to a distributed client-server environment via the 'InvestOne Java Engine Tier (JET) & InvestOne Enterprise Inputs/Outputs Project'. Specifically, on January 21, 2022, InvestOne was migrated to a distributed server Java Engine Tier (JET) environment with a RedHat Linux operating system. The InvestOne database files (VSAM and DB2) on the mainframe platform were moved to Exadata, a preconfigured combination of hardware and software that provides an infrastructure for Oracle databases. The IO JET operating environment utilizes CA Workload (Production Scheduling). There was no change to the location of the in-scope DIMS component databases (FedInvest and SDAS). These databases continue to reside on the mainframe and distributed SQL server.

The FedInvest system is operated within a client-server environment^{2,3}. FIT MF and client-server system software products are under vendor control for maintenance and support. Upgrades to these products are obtained from the vendors and installed by the ISS specialists. The ISS provides the primary support for maintaining the InvestOne accounting system. This includes the distributed client-server operations (batch processing and reporting), custom report writing, application change management, data management, tape backup and recovery, user access security, remote access, and continuity management.

¹ The FIT MF environment consists of the following system software products:

- z/OS Operating System
- Customer Information Control System (CICS)
- Access Control Facility 2 (ACF2) Security
- Tape Management System (TMS)
- Control D (Print scheduling)
- CA Workload (Production scheduling)
- ETF/A (Emergency Change Control)
- MQSeries
- DB2

The distributed environment consists of the following additional software products:

- Oracle Database Management System (DBMS)
- RedHat Linux Operating System

² The FedInvest system is composed of the following system software components:

- Spring
- Hibernate
- Java Server Faces
- JAVA
- Windows Server 2012R2
- DB2
- WebSphere Application Server

³ Reliant Services that are used by Fiscal Service, but are not in-scope:

- Lightweight Directory Access Protocol (LDAP) access to Enterprise Directory Services
- Messaging through smtp.fiscal.treasury.gov to Treasury Message Transfer Agent (MTA)

Prior to January 21, 2022, the InvestOne accounting system was accessed through the network using a terminal emulator that enables communication with FIT MF applications. Post conversion to the distributed client-server environment on January 21, 2022, the InvestOne accounting system is accessed through the network using a terminal emulator that enables communication with the RedHat Linux JET client server.

FIBB also receives supporting documentation/reports on a daily basis from internally developed programs created by programmers. These programs read the data from the InvestOne accounting system and create various reports to assist in FIBB's daily processing. Specifically, data is downloaded from the InvestOne accounting system to a data file located on the servers where the programs execute. Data is not sent from these programs to the InvestOne accounting system.

FedInvest Description

FedInvest, also a subsystem of DIMS, is a vendor-developed, web-based extension to the InvestOne accounting system that provides access to the federal investments information through the internet. FedInvest allows federal investment fund managers to assume direct responsibility for managing their respective accounts. Using FedInvest, federal agencies are able to input transactions into the InvestOne accounting system, as well as view account statements and transaction information over the internet. Additionally, FedInvest provides an interface to the InvestOne accounting system for internal fund managers in Funds Management Division (FMD). FedInvest includes edit checks that serve to enforce federal investment program policies resulting in improved data quality in the InvestOne accounting system. These edit checks include, but are not limited to, preventing invalid account numbers, preventing back dated trades, and ensuring the correct transaction code is used.

FedInvest also includes two extensions that are available only to Fiscal Service internal users. The Customer Role Management (CRM) module is used by the ISSRs to manage FedInvest users and their access to associated investment account information. CRM is used by FIBB accountants to manage security type and account information. CRM is also used to create and post broadcast messages (announcements) that are seen by users signed onto the system and establish email communication to all system users and their agency Chief Financial Officers. The RPA module is used by FIBB accountants to load rates/prices, publish rates/prices on the TreasuryDirect website, apply prices to pending market-based transactions, post pending special issue par-value redemption transactions, and update FedInvest with the Consumer Price Index (CPI) for processing TIPS transactions.

Communication

Fiscal Service has implemented various methods of communication to help ensure that all employees understand their individual roles and responsibilities over transaction processing and controls. These methods include orientation and training programs for newly hired employees and use of electronic mail messages to communicate time sensitive messages and information. Managers also hold periodic staff meetings as appropriate. Every employee has a written position description that includes the responsibility to communicate significant issues and exceptions to an appropriate higher level within the organization in a timely manner.

CONTROL OBJECTIVES AND RELATED CONTROLS

Fiscal Service control objectives and related controls are included in Section IV of this report, “Control Objectives, Related Controls, and Tests of Operating Effectiveness.” Although the control objectives and related controls are included in Section IV, they are, nevertheless, an integral part of the Fiscal Service’s description of controls.

COMPLEMENTARY PROGRAM AGENCY CONTROLS

FIBB's controls related to its system supporting the delivery of investment/redemption processing services cover only a portion of overall internal control for each program agency of FIBB. It is not feasible for the control objectives related to FIBB's services to be achieved solely by FIBB. Therefore, each program agency's internal control over financial reporting should be evaluated in conjunction with FIBB's controls, related tests, and results described in Section IV of this report, taking into account the related complementary program agency controls as described below, where applicable. In order for program agencies to rely on the controls reported on herein, each program agency must evaluate its own internal control to determine whether the identified complementary program agency controls have been implemented and are operating effectively.

Program agencies should have established controls to provide reasonable assurance to:

- Ensure that access to FedInvest is restricted to properly authorized individuals.
- Provide applicable legislation to FIBB and any subsequent legislation revisions that affect the program agency's authority or ability to invest.
- Verify the authority to invest prior to submitting investment account set-up and investment/redemption requests.
- Ensure that investment/redemption transactions processed by FIBB on behalf of the program agency agree with applicable WJVs.
- Ensure that only authorized personnel sign requests or submit transactions in FedInvest.
- Approve reinvestments of interest after review for accuracy, completeness, and compliance with instructions.
- Ensure that access to FedInvest is restricted to properly authorized individuals.
- Ensure that the submission of investment/redemption requests in FedInvest is accurate and completed prior to 3:00 p.m. ET (11:00 a.m. ET for Zero-Coupon Bonds).
- Ensure all Access Request/Revoke change requests are reviewed and approved by a supervisor before submitting the request to Fiscal Service.
- Notify FIBB if the investment/redemption requests have been processed incorrectly so that correcting transactions may be processed before 3:00 p.m. ET.
- Ensure that their users request access to FedInvest that is appropriate for their role and on an as-needed basis.
- Recalculate interest accrual and amortization of premium and/or discount and compare the results to the Fiscal Service provided monthly Accrual Confirmation and Accrual Activity Reports.
- Reconcile interest payments and allocations received as presented in the confirmations and Monthly Statements of Account and recalculate interest for accuracy.
- Reconcile investment activity from CARS Account Statements to the FIBB provided Monthly Statements of Account to verify that investment activity is being properly reported by FIBB on the program agencies' behalf.
- Report any interest accrual discrepancies noted on the monthly Accrual Confirmation and Accrual Activity Reports to Fiscal Service for resolution.
- Report any premium and/or discount amortization discrepancy noted on the monthly Accrual Confirmation and Accrual Activity Reports to Fiscal Service for resolution.
- Review adjustments and make prompt and accurate journal entries to the accounting records, to adjust the investment account balances and related interest.

- Review and reconcile all transaction confirmations to determine whether they are accurate and complete, and report discrepancies to FIBB, so correcting transactions may be processed before 3:00 p.m. ET.
- Review detailed case management transactions and case information to ensure that each request was processed accurately in a timely manner, and in accordance with program agency instructions.
- Review FIBB provided Monthly Statements of Account to determine whether transactions are recorded accurately and timely, and report discrepancies to FIBB so correction processes may occur.
- Review investment/redemption/maturity/interest confirmations and the Monthly Statements of Account to ensure that each request was processed accurately, timely, and in accordance with program agency instructions and notify FIBB of any errors detected in a timely manner.
- Review Monthly Statements of Accounts to verify that adjustments were processed completely and accurately, and discrepancies are investigated.
- Track investment/redemption confirmations to ensure that the program agency FedInvest user correctly processes all requests.
- Verify the accuracy of program agency requested fee amounts entered by both FIBB and program agency accountants into Case Management System (CMS).

Specific complementary program agency control considerations are provided for Control Objectives 5, 7, 8, 9, 10, 12, 13, and 14 in the Control Objectives, Related Controls, and Tests of Operating Effectiveness section of this report.

SUBSERVICE ORGANIZATIONS

In order to provide investment/redemption processing services, FIBB relies on various systems and services provided by other external organizations (subservice organizations). These subservice organizations are not subject to examination by KPMG, LLP. The following describes the types of the subservice organizations used by FIBB.

Federal Reserve Bank (FRB) of New York

FRB New York provides hosting and management of the information systems used to manage and make available Treasury Price Quotes used for FIBB pricing activities. environment. On a daily basis, FIBB obtains Treasury Price Quote files via digital certificate from a secure FRB website. These files are necessary for FIBB to load noon prices to FedInvest. FIBB uses these price quote files to calculate the market-based security prices that can be loaded into the InvestOne accounting system and compared to the price files provided by ODM.

Department of the Treasury – Office of Debt Management (ODM)

The Department of Treasury provides hosting and management of the information systems used to manage and make available ODM security price files used for FIBB pricing activities. On a daily basis, the ODM provides FIBB the daily security price files for market-based transactions. The security price files are necessary for FIBB to load noon prices in FedInvest. Additionally, as needed, ODM provides FIBB with the Zero-Coupon Bond pricing. ODM provides FIBB the Daily Market Quotations on Most Recently Auctioned Treasury Bills used for the rate for the one-day certificates.

Bureau of the Fiscal Service

Bureau of the Fiscal Service – Information and Security Services (ISS) provides hosting and management of the Mainframe and distributed environments for InvestOne, Central Accounting Reporting System (CARS) and other Treasury systems. CARD provides daily and monthly reports to FIBB, including Intra-Governmental Payment and Collection (IPAC) reports, and CARS account statements. FIBB uses these reports to verify the accurate posting of transactions and data. CARD also sends FIBB daily tax deposit estimates that are applicable to certain funds. FIBB allocates the estimated deposits to the appropriate trust funds based on monthly Office of Tax Analysis (OTA) estimates and provides the investment amounts to CARD. CARD confirms the amounts, notifies FIBB that they agree with the amounts, and prepares the warrant. FIBB then invests the amounts in the appropriate accounts. CARD also provides the actual tax deposit figures each month when available and FIBB invests / redeems based on the actual tax information provided by CARD.

COMPLEMENTARY SUBSERVICE ORGANIZATION CONTROLS

FIBB controls related to the systems supporting its delivery of investment/redemption processing services cover only a portion of overall internal control for each program agency of FIBB. It is not feasible for the control objectives related to services provided by FIBB to be achieved solely by FIBB. Therefore, each program agency's internal control over financial reporting must be evaluated in conjunction with FIBB's controls and the related tests and results described in Section IV of this report, taking into account the related complementary subservice organization controls expected to be implemented at subservice organizations. Complementary subservice organization controls and FIBB's control objectives that depend upon them are described for each of FIBB's subservice organizations below.

Federal Reserve Bank of New York

Control Objective 8 – Item Capture; Control Objective 11 – Recordkeeping; & Control Objective 13 – Interest Calculation and Payments

- Responsible for having controls that ensure that the price quote files are complete, accurate, and made available to FIBB in a timely manner.
- Responsible for maintaining privileged user access and logical security over the servers, hardware devices, and related to the systems used.
- Responsible for granting, reviewing, and removing user access to the systems used.
- Responsible for performing patching operating system and database and application changes to the systems used.
- Responsible for performing data back-ups for to the systems used.

Department of the Treasury – Office of Debt Management

Control Objective 8 – Item Capture; Control Objective 11 – Recordkeeping; & Control Objective 13 – Interest Calculation and Payments

- Responsible for having controls that ensure that the pricing files are complete, accurate, and made available to FIBB in a timely manner.
- Responsible for maintaining privileged user access and logical security over the servers, hardware devices, and related to the systems used.
- Responsible for granting, reviewing, and removing user access to the systems used.
- Responsible for performing patching operating system and database and application changes to the systems used.
- Responsible for performing data back-ups for to the systems used.

Fiscal Service

Control Objective 8 – Item Capture; Control Objective 11 – Recordkeeping; & Control Objective 13 – Interest Calculation and Payments

- Responsible for having controls that ensure that the IPAC and CARS account statements are complete, accurate, and made available to FIBB in a timely manner.
- Responsible for maintaining privileged user access and logical security over the servers and hardware devices for IPAC, CARS, and Mainframe and distributed environments.
- Responsible for granting, reviewing, and removing user access for IPAC, CARS, and Mainframe and distributed environments.
- Responsible for performing patching operating system, database, and application changes for IPAC, CARS, and Mainframe and distributed environments.
- Responsible for performing data back-ups for IPAC, CARS, and Mainframe and distributed environments.

**IV. CONTROL OBJECTIVES, RELATED CONTROLS, AND TESTS OF
OPERATING EFFECTIVENESS**

Information Provided by KPMG LLP

This report, when combined with an understanding of the controls at program agencies, is intended to assist auditors in planning the audit of program agencies' financial statements or program agencies' internal control over financial reporting and in assessing control risk for assertions in user entities' financial statements that may be affected by controls at FIBB.

Our examination was limited to the control objectives and related controls specified by FIBB in Section IV of the report and did not extend to controls in effect at user entities. It is the responsibility of each program agency and its independent auditor to evaluate this information in conjunction with the evaluation of internal control over financial reporting at the program agency in order to assess total internal control. If internal control is not effective at user entities, FIBB's controls may not compensate for such weaknesses.

FIBB's internal control represents the collective effect of various factors on establishing or enhancing the effectiveness of the controls specified by FIBB. In planning the nature, timing, and extent of our testing of the controls to achieve the control objectives specified by FIBB, we considered aspects of FIBB's control environment, risk assessment process, monitoring activities, and information and communications.

The following clarifies certain terms used in this section to describe the nature of the tests performed:

- Inquiry – Inquiring of management and others within the service organization who, in the service auditors' judgment, may have relevant information.
- Observation – Observing operations and inspecting documents, reports, and printed and electronic records of transaction processing.
- Inspection – Examining records or documents, whether in paper form or electronic form.
- Reperformance – Independently executing of procedures or controls that were originally performed as part of the entity's internal control.

In addition, as required by paragraph .35 of Attestation Standards - Clarification and Recodification (AT-C) section 205, *Assertion Based Examination Engagements* (American Institute of Certified Public Accountants, Professional Standards), and paragraph .30 of AT-C section 320, when using information produced (or provided) by the service organization, we evaluated whether the information was sufficiently reliable for our purposes by obtaining evidence about the accuracy and completeness of such information and evaluating whether the information was sufficiently precise and detailed for our purposes. Procedures used included:

- Inspecting the source of the information;
- Inspecting the query, script, parameters used to generate the information;
- Observing the generation of information; and
- Inspecting management's reconciliation of reports.

GENERAL COMPUTER CONTROLS

Control Objective 1 – System Software Changes

Controls provide reasonable assurance that changes to system software are tested, authorized, implemented, and documented.

Description of Controls

The Fiscal Service has documented procedures for the authorization, testing, implementation, and documentation of system software changes. FIT MF and client-server system software products are under vendor control for maintenance and support.

Fiscal Service utilizes Enterprise Service Management's (ESM) ServiceNow (ESM/ServiceNow) to manage changes to system software. All system software changes (i.e., new product installations, maintenance upgrades, etc.) require a change record to be opened in the change management software. A change record can be opened by any specialist in ISS for effecting such changes or the change control coordinator. The change record includes a description of the change, implementation date of the change, a justification, and a back-up/back-out plan.

Changes are initially discussed at the weekly change control meetings. Attendees include ISS representatives impacted by the proposed change. Notification is sent to the Deputy Commissioner, division directors, branch managers and/or staff personnel. All changes are communicated daily via a 30-day Forward Schedule of Changes (FSOC) report, which is generated from ESM/ServiceNow and automatically emailed to the technical change control board attendees each morning. This report describes the system changes, effective dates, reasons for changes or problems the changes will resolve, risk categorization of each change, and a reference to the system change control number. All changes categorized as "high risk" are required to be reviewed and coordinated at the weekly change control meeting.

Before system software changes can be moved to Production, they are tested in accordance with the Fiscal Service's system software change control procedures. These procedures document the authorization, testing, implementation, and documentation requirements for system software changes. Changes progress through various environments, which differ according to the type of system infrastructure. For the FIT MF, there are three separate environments: Test, Acceptance, and Production. Each environment is logically separated with its own datasets and libraries. FIT MF changes are first tested by a programmer in the Test environment. Next, the changes are moved to Acceptance, tested, and then moved to the Production environment following approval. For changes to distributed software, changes are promoted up through Integration, Acceptance, and Production regions within similar controls described above.

All changes are reviewed and coordinated at the weekly change control meeting and authorized by the change control coordinator prior to being moved into the Production environment.

All emergency changes follow the same process as indicated above, with the exception that changes move through the environments at an accelerated rate. Testing and authorization of these changes are documented in the change management software.

Fiscal Service has established a process that allows system programmers and database administrators to have temporary access to the Production FIT MF environment through the use of

a “fire-call” ID that includes elevated privileges for system software and application changes. The operating system is configured to monitor and log such activity for review and approval by management; management reviews these logs within one to three business days after the use of the “fire-call” ID.

ISS reviews the use of sensitive system utilities included in the protected programs group on a weekly basis and limits access to these programs based on job responsibility.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected written procedures for system software configuration management and determined that procedures were documented, including procedures to document, test, authorize system software changes, and implement changes into production.
2. Inspected the emergency system software change procedures and determined that procedures for implementing emergency system software changes were documented, including authorization by management.
3. Inspected vendor maintenance support contracts for system software and determined that the contracts existed and were current.
4. For a selection of system software change records, inspected ESM/ServiceNow tickets and determined that ESM/ServiceNow was used to log, track, and monitor system software changes.
5. For a selection of dates, inspected FSOC reports and determined that weekly change control meetings were held to discuss planned changes with the potential to impact the InvestOne accounting system or FedInvest application system software.
6. For a selection of system software changes and emergency system software changes, inspected supporting documentation and determined that the changes were tested, and approved prior to implementation.
7. For a selection of system software changes and emergency system software changes, inspected supporting documentation and determined that the changes were reviewed and coordinated during the weekly change control meeting, as well as approved by the change control coordinator prior to being moved into production.
8. Inspected a list of users with access to use the “fire-call” ID and determined that user access was commensurate with the user's job responsibilities.
9. For a selection of days, inspected “fire-call” ID logs and evidence of review, and determined that “fire-call” ID logs were reviewed by ISS management and no discrepancies were identified during the reviews selected for testing.
10. For a selection of weeks, inspected evidence of ISS’s review of reports for sensitive system utilities in the protected programs group and determined that the reports were reviewed and no discrepancies were identified during the reviews selected for testing.

No exceptions noted.

Control Objective 2 – Vendor Software Changes

Controls provide reasonable assurance that implemented changes of InvestOne are tested, authorized, implemented, and documented.

Description of Controls

Fiscal Service has documented procedures for the testing and authorization of new releases of vendor supplied applications. The change control process is under the control and direction of CTD (part of Fiscal Accounting Support & Outreach). Fiscal Service uses ESM/ServiceNow to document vendor-supplied releases.

The InvestOne accounting system is licensed by FIS Capital Markets US LLC (FIS). Fiscal Service has a maintenance and support contract for the InvestOne accounting system with FIS. ISS is responsible for all maintenance and support of the FedInvest system.

FIS periodically provides new releases (upgrades), via the FIS Secure File Transfer Protocol (SFTP) site, of the InvestOne accounting system, including documentation. Each new release requires testing. CTD tests the new InvestOne accounting system releases developed by FIS consistent with change control procedures for FAO systems. New InvestOne accounting system releases are installed in the Test environment where they are initially tested. After successful completion of testing, ISS migrates the InvestOne accounting system new release to the Acceptance environment, where it is subjected to acceptance testing by users. ISS only installs an InvestOne accounting system new release in the Production environment after all testing has been successfully completed and management has approved the InvestOne accounting system new release for implementation in the Production environment.

In addition to new releases, FIS will periodically provide smaller fixes for the InvestOne accounting system. These smaller fixes are off-cycle changes to InvestOne, and are also referred to as “fix tapes”. These off-cycle changes, which address certain InvestOne accounting system issues, are narrower in scope than new releases. Based on the changes included on a particular fix, Fiscal Service management will decide whether or not to implement the fix. If management decides to implement the fix, ISS downloads the updated code from the FIS SFTP site, and the updated code is migrated through the Test and Acceptance environments. These fixes are installed in the Production environment only after successful completion of testing in the Test and Acceptance environments and management approval for migration into the Production environment.

CTD also tests changes to the InvestOne accounting system application reports, developed by FIS using the same change control procedures described above.

In addition, Fiscal Service uses the change management software to manage the upgrades and enhancements. Changes are only migrated into the Production environment once all responsible parties approve the change in the change management software. Access to migrate changes via the change management software is limited based on job responsibility.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected procedures for the implementation of changes of vendor supplied applications and determined that they were documented and included requirements for authorization, testing, and documentation.
2. Inspected vendor maintenance support contracts for the InvestOne accounting system software and determined that the contracts existed and were current.
3. For a selection of new InvestOne releases, inspected supporting documentation and determined that the changes were tested, authorized, documented, and implemented.
4. Inspected the listing of InvestOne releases and compared it to the listing of vendor software changes and determined that no off-cycle changes were implemented during the period; therefore, we were not able to test the operating effectiveness of this control.
5. Inspected the list of access rights and groups granted permissions to migrate changes and compared the users in those groups to their job titles in the Fiscal Service Staff List and determined that access permissions to migrate changes to the production environment were restricted and commensurate with job responsibilities.

No exceptions noted.

Control Objective 3 – Program Change Control

Controls provide reasonable assurance that implemented changes to FedInvest are tested, authorized, implemented, and documented.

Description of Controls

Fiscal Service has documented procedures for the testing, authorizing, implementation, and documentation of application software changes. The application change control process is under the control and direction of CTD.

FIS has custom built additional application components for data entry and reporting. Included is the FedInvest application, which functions as a web-based user interface that program agencies can use for entering transactions into the InvestOne accounting system. For reporting, Fiscal Service has built internally developed programs utilizing RM (desktop) Common Business Oriented Language (COBOL) and mainframe COBOL that generate customized reports to provide information unavailable in the standard InvestOne accounting system reporting package.

For RM COBOL, ISS uses Bitbucket version control software to control access to source code for these internally developed programs and to facilitate version control by requiring developers to check source code in and out using version control software. These programs read the data from the InvestOne accounting system and create reports. Specifically, data is downloaded from the InvestOne accounting system to a data file on the FIT MF. As of January 21, 2022, the data is downloaded from the distributed environment to the JET client server. Connect: Direct is then used to move the downloaded files to the server, where the programs will execute. Data is not sent from these programs to the InvestOne accounting system. The reports are used internally by FMB and disseminated to multiple stakeholders, who include: program agencies, ODM, Treasury's Office of Fiscal Projections (OFP), the Congressional Budget Office (CBO), and various offices within Fiscal Service.

For FIT MF COBOL, ISS uses Endeavor version control software to control access to source code for these internally developed programs and to facilitate version control. These programs were developed by ISS and reside on the mainframe, where these programs execute. As a result of the move to the distributed environment, mainframe COBOL programs were converted to RM COBOL on the Linux server, accessed through the network using a terminal emulator. Changes to these programs are also managed using version control software.

For FedInvest and customized reports, ISS uses Bitbucket version control software to control access to source code for Fiscal Service managed programs to facilitate version control. Changes to FedInvest are developed by ISS.

CTD provides support for the design and testing of the above changes. CTD creates the requirements documentation, which is then provided to ISS (or FIS) for development. CTD manages the request, documentation, testing, and authorization process using a Change Control Checklist and the change management software.

Changes using version control software progress through three separate environments: Test/Integration, Acceptance, and Production. A change is first tested by the programmer in the Test/Integration environment. It is then migrated to the Acceptance environment where a user tests the change using example transactions and Acceptance environment files and libraries.

Once the Acceptance testing has been successfully completed, the applicable assignee within CTD authorizes the change and sends a request to ISS to move the change into the Production environment. Upon notification of an accepted change, ISS creates an update package in the Bitbucket version control software. Only approved changes are installed in the Production environment.

Each change is reviewed by the user groups that are affected by the change, and each group provides user concurrence that they accept the change. Following user concurrence, a senior staff member reviews the testing materials and completes the Change Control Checklist indicating that testing has been completed. The package is provided to applicable manager for final review and approval.

For FIT MF COBOL, the Endeavor version control software is an application through which users approve changes. This version control software is also used to move changed program files into the Production environment. This version control software will not allow changes to be migrated from the Acceptance environment into Production until the changes have been approved. Access to migrate changes to Production via the version control software change control software is limited based on job responsibility, which does not include developers.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected application software change procedures and determined that they were documented and included requirements for authorization, testing, and documentation.
2. Inspected the list of version control software access rights for the groups that had been granted permissions to access source code and compared the users in those groups to their job titles in the Fiscal Service Staff List and determined that access to source code for internally developed programs was commensurate with job responsibilities and individuals with the ability to develop code were not permitted access to the test or production environments.
3. Inspected the list of users with access to the version control software used for FedInvest and customized reports and determined that access to the source code was commensurate with job responsibilities and that individuals with the ability to develop code were not permitted access to the test or production environments.
4. Inspected a selection of change records in ESM/ServiceNow and determined that ESM/ServiceNow was used to log, track, and monitor application software changes.
5. For a selection of application software changes, inspected supporting documentation and determined that the changes were tested and approved.
6. Inspected the list of version control software access rights for the groups that had been granted permissions to migrate source code and compared the users in those groups to their job titles in the Fiscal Service Staff List and determined that access permissions to migrate changes to the production environment were restricted and commensurate with job responsibilities, and access to migrate changes was limited to non-development personnel in ISS.

No exceptions noted.

Control Objective 4 – Physical Access

Controls provide reasonable assurance that physical access to computer equipment and storage media is restricted to authorized individuals.

Description of Controls

Fiscal Service has documented policies and procedures for controlling physical access to buildings and to the data center. These include:

- Identification of sensitive/critical areas to which access needs to be restricted.
- Physical access controls designed to detect unauthorized access.
- Procedures for log reviews and investigation of violations.

The InvestOne accounting system, FIT-MF, distributed servers, and FedInvest servers reside in ISS's data center. Various physical access controls protect the facilities. Armed security guards staff and monitor Fiscal Service facilities 24 hours a day, 7 days a week. A digital video camera system monitors all entrances, the building perimeter, and certain interior areas, including the data center, and records activity 24 hours a day. All people entering each building are required to place any materials, packages, bundles, etc. onto an x-ray machine. Entrants are also required to pass through a walkthrough metal detector. An activation of the walkthrough metal detector results in further screening by the security guard, utilizing a handheld metal detector to identify the source of activation. In addition, entrants must swipe their badges into an access control system that grants access to authorized personnel.

The Physical Security Branch issues employee badges, after performing security background checks and fingerprinting.

Employees are required to have badges available at all times upon request. Terminated employees are required to surrender identification badges and are removed from the database security system immediately.

Physical access to the ISS data center is restricted to authorized users only. An employee needing access to the data center must have his/her Branch Manager request access for a one-day badge, which will give the employee access to the data center. The requests are made through the service request software, ESM/ServiceNow, a workflow system that is used to approve data center access. After the Branch Manager completes and submits the service request form for the appropriate ISS resource area access level, requests are forwarded to ISS's data center managers for approval in the service request software. If ISS approves the request and the appropriate training is completed by the employee, the Fiscal Service Asset Protection Divisions (APD) Physical Security Branch grants access. Access to all sensitive areas requires use of a badge. The use of a badge provides an audit trail that is reviewed by ISS management monthly for potential access violations. Any unauthorized access attempts are followed-up on by contacting the individual's supervisor. Individuals without badge access to the data center must be escorted to the command center and are required to sign in/out of a visitor log to be issued a data center visitor badge. Visitor badges do not have access to the data center, but rather designate the individual as a visitor. A visitor log is maintained at the main entrance to the data center. Only designated APD specialists have access to the Physical Access Control System (PACS). Vendors and employees that are authorized to have a badge are issued a one-day (Temp) badge in the command center and must leave their access badge onsite following completion of work in the data center. A log of one-day (Temp) badges is maintained and reviewed daily.

ISS performs a monthly review of individuals' access permissions of the data center for the previous month. ISS performs an annual review and recertification of individuals with access to the data center. If an individual is found to have unauthorized data center access, ISS will, based on the individual's need for access, make a decision whether to request that APD remove their data center access or whether to provide authorization for their access.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected physical access policies and procedures for the data center and determined that they were documented and included the identification of sensitive/critical areas to which access needs to be restricted, physical access controls designed to detect unauthorized access, and procedures for log reviews and investigation of violations.
2. Observed physical access controls of Fiscal Service buildings and the ISS data center and noted that security guards, video cameras, badge readers, and locked doors were used to restrict and monitor access.
3. Observed persons entering Fiscal Service buildings and noted that people were required to place any materials, packages, bundles, etc., onto an x-ray machine, and pass through a walkthrough metal detector.
4. Observed persons entering Fiscal Service buildings and noted that an activation of the walkthrough metal detector resulted in further screening by the security guard, who used a handheld metal detector to identify the source of activation.
5. Observed an entrant swipe his/her badge into the access control system and noted that the access controls system granted access to the individual.
6. For a selection of new employees issued identification badges, inspected evidence of their investigation summaries, and determined a background check was completed for each individual and each employee had their fingerprint on file.
7. Observed employees within the Fiscal Service buildings and noted that badges were displayed.
8. For a selection of terminated Fiscal Service employees with access to Fiscal Service buildings, inspected the Fiscal Service employee separation listings and listings of active badges and determined their building access was removed in PACS.
9. For a selection of employees granted access to the ISS data center that were not on the authorized access listing, inspected corresponding work tickets and determined that access requests were tracked in ESM/ServiceNow, approved by ISS, and fulfilled by a designated APD Physical Security Branch Specialist via PACS.
10. Inspected the ISS staff listing and permissions to access the PACS badge system and determined that access permissions to the physical access systems were commensurate with job responsibilities.
11. For a selection of months, inspected the monthly reviews of the access violation logs and determined that logs were reviewed by ISS, all unauthorized access attempts were investigated, and any access violations were followed-up with the individual's supervisor and resolved.
12. For a selection of dates, inspected the ISS visitor logs and determined that visitor logs were reviewed and that no discrepancies were identified.
13. For a selection of dates, inspected the daily shift logs and determined the logs were reviewed and an inventory of vendor badges was performed and that no discrepancies were identified.
14. Inspected documentation of the monthly review of physical access privileges to the data center and determined that access privileges were reviewed, and that any unauthorized access was researched.

15. Inspected documentation of the annual recertification of physical access privileges to the data center and determined access privileges were recertified and, if unauthorized access was found, the access was removed.

No exceptions noted.

Control Objective 5 – Logical Access

Controls provide reasonable assurance that logical access to system and application software is restricted to authorized individuals.

Description of Controls

Fiscal Service has guidelines for the preparation of security plans for applications and systems that process Sensitive but Unclassified information. All mission-critical systems and general support systems are subject to an internal risk-based review annually. This review identifies assets and possible threats to these assets, provides a measure of vulnerability of the system to these threats, and confirms control or protective measures are in place.

The InvestOne accounting system is classified as a mission-critical system. InvestOne accounting system security along with the host FIT MF's security package controls access to the InvestOne accounting system. InvestOne accounting system security restricts access to accounts within the system based on user banks and user identification (UID). InvestOne accounting system access is restricted to authorized personnel. The security settings are also used to restrict ISS personnel's access to system software, data files, and program libraries.

FedInvest is a web-based user interface through which users have access to enter transactions into the InvestOne accounting system and view InvestOne accounting system data. External users are limited to accessing InvestOne accounting system data through FedInvest. External users that invest in Government Account Series (GAS) securities can connect to FedInvest over the internet to input transactions into the InvestOne accounting system as well as to view account statements and transaction information.

Administrator access permissions are allocated in the FedInvest and the InvestOne accounting system users commensurate with their job responsibilities.

FAO follows Fiscal Service system administration security password guidelines/procedures to establish and maintain passwords⁴. Passwords are not displayed when entered. The reserved word feature is enabled to prevent the use of commonly used words in passwords.

ISSRs manage access to the InvestOne accounting system. To establish access to FedInvest, the applicant representing the program agency must complete the Bureau of the Fiscal Service FedInvest Logon ID Request. Once completed, the form is reviewed and signed by the applicant's supervisor and submitted to FIBB for processing. Upon receipt, FIBB verifies that the information is complete and then initiates a request that the user be added to Contact Management by submitting a Contact Creation Request. Contact Creation Requests are made in ESM/ServiceNow. Once the IT Service Desk notifies FIBB that the user has been added to Contact Management, FIBB provides a copy of the FedInvest Logon ID Request to the ISSRs for user set-up in Contact Management and FedInvest. After this is completed, ISS provides the new user with their user ID and temporary password. The user is then instructed to login to FedInvest with the temporary password, answer security questions, and change their temporary password. When access to FedInvest is no longer required by the user, the applicable program agency will email FIBB at

⁴ These guidelines require passwords to be at least 8 characters in length, changed every 30 days for ACF2 and every 90 days for LDAP, and unique for each individual.

FedInvestor@fiscal.treasury.gov and request that the user's access be revoked. FIBB will then forward the request to the ISSRs, who will process the revocation.

The ISSRs have documented procedures for granting access. Modifications to user accounts require use of the same Access Request/Revoke Form.

External users must have their supervisor's approval along with FIBB approval documented on an Access Request/Revoke form before access is granted to FedInvest. When an external user accesses InvestOne accounting system data, they enter a user ID and password into FedInvest. User IDs are authenticated by a security utility and Single Sign-On/IBM Tivoli Identity Manager (ITIM)⁵. If the required authentications failed, the user is prevented from accessing InvestOne accounting system data through FedInvest.

ISSRs remove FedInvest and InvestOne accounting system access from users at the request of their managers/supervisors or FIBB personnel. Each access removal request is documented via an email.

On a weekly basis, ISSRs review Internal Violations Reports for any inappropriate activity; follow-up is notated on the report.

Additionally, monthly an ISSR reviews a report of all InvestOne accounting system user IDs that have not been used to access InvestOne accounting system for 45 or more days. The ISSR follows up with any affected users by email or by phone.

Additionally, the ISSRs recertify access annually to mission critical systems by verifying access privileges for all InvestOne accounting system and FedInvest users.

ISSRs remove or modify any user IDs or access privileges identified for deletion or changes by the user's manager/supervisor or FIBB personnel when accompanied by an email.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Access to FedInvest is restricted to properly authorized individuals.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected evidence of the InvestOne accounting system and FedInvest risk-based reviews and determined that the risk-based reviews were performed and approved on November 8, 2021.
2. Inspected the InvestOne accounting system and FedInvest security plans and determined that the plans were documented.
3. Observed a user log into the InvestOne accounting system and the FedInvest system and noted that that his/her access was restricted in accordance with the system configuration.
4. For each InvestOne user, inspected a system-generated list of user access and an employee listing and determined that access privileges were commensurate with job responsibilities.
5. Observed a user log into the FedInvest system and noted that his/her access was restricted in accordance with the system configuration.

⁵ A security utility and Single Sign-On/ITIM, is used to authenticate users. User credentials are stored in the enterprise directory.

6. Inspected security guidelines and procedures for administrator privileges for the InvestOne accounting system and FedInvest and determined that security guidelines and procedures were documented for the administrator privileges.
7. Inspected a list of users with administrator access privileges to InvestOne and FedInvest and compared it to a Fiscal Service employee listing and determined that access was limited to members of the FAO team and was commensurate with job responsibilities.
8. Inspected security guidelines and procedures for InvestOne and FedInvest and determined that logical access controls procedures were documented.
9. Inspected InvestOne and FedInvest password policies and compared them to password settings for InvestOne and FedInvest and determined that password length, complexity, and expiration settings were configured in accordance with requirements.
10. Observed a user log into InvestOne and FedInvest Extensions and noted that his/her password was masked as it was entered.
11. Inspected an InvestOne user listing and determined that no new InvestOne users were granted access during the period; therefore, we were not able to test the operating effectiveness of this aspect of the control.
12. For a selection of new FedInvest users, inspected documented user access request forms and determined that access was authorized by the users' supervisors.
13. Inspected a list of all separated and transferred Fiscal Service employees and lists of InvestOne and FedInvest user IDs and determined that access to InvestOne and FedInvest had been revoked for terminated and transferred FIBB and CTD employees.
14. For a selection of weeks, inspected ACF2 InvestOne audit log reports and evidence of management review and determined that the reports were reviewed, and that any exceptions were followed-up.
15. For a selection of months, inspected evidence of review and removal of inactive accounts and determined that inactive user accounts were reviewed and removed monthly.
16. Inspected documentation of the review and reauthorization of internal InvestOne and FedInvest user access and determined that internal InvestOne and FedInvest user access had been reviewed and reauthorized.
17. For a selection of external FedInvest users, inspected documentation of the review and recertification of external FedInvest user access and determined that external FedInvest user access had been reviewed and recertified.
18. For a selection of user account recertification reviews requesting removal and/or modification of user access privileges, inspected FedInvest user lists, and determined that requested modifications were made.

No exceptions noted.

Control Objective 6 – Computer Operations

Controls provide reasonable assurance that computer processes are scheduled, and that deviations are identified and resolved.

Description of Controls

The InvestOne accounting system, a FIT MF environment prior to January 21, 2022 and subsequently a distributed JET environment, is an interactive system with master data files that are updated when entries are posted. End-of-day processes perform maintenance to the data files and data backups. ISS support personnel complete the Production Control Daily Checklist to verify the successful completion of end-of-day processes. Data entry error checking and input screen designs help ensure that the data entered by the users is accurate and complete. The error checks include verification of entered data based on predetermined values and ranges. Errors detected by the system are rejected immediately and must be corrected before the transaction is permitted to update the master data tables.

Daily user operations procedures are posted for the InvestOne accounting system to provide operators with the information necessary to sequentially complete daily processing. Additionally, a monthly calendar is posted that highlights the daily requirements. The InvestOne accounting system configuration requires that daily reporting be performed in sequence before transaction processing can begin.

The mainframe job scheduler software controls the scheduling of batch jobs for the InvestOne accounting system. The job scheduler allows all programs for batch processing, printing, and data backup to be scheduled and performed automatically. Access to the job schedules is limited to ISS support personnel and privileges are commensurate with job responsibilities. The job scheduler sends messages confirming successful completion of each day's scheduled jobs to ISS and CTD. Any abends are also communicated to the appropriate ISS and CTD personnel as they happen through automated messages. Abends are resolved and jobs are restarted as necessary through the job scheduler.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of dates, inspected Production Control Daily Checklists and determined that the checklists had been used during processing.
2. Observed the entry of transactions into InvestOne and noted that error checking edits prevented users from entering values of the wrong data type or values not on lookup lists.
3. Inspected the daily user operations, procedures, and monthly calendars highlighting the daily requirements for InvestOne and FedInvest and determined that these schedules and procedures were posted.
4. Inspected a selection of monthly requirements calendars and determined that these schedules were available.
5. Inspected the InvestOne accounting system job schedule and configurations and determined that a job production schedule for Invest One had been documented and was configured to send messages confirming successful completion of each day's scheduled jobs to ISS and CTD.
6. For a selection of dates, inspected a selection of Production Control Daily Checklists and determined that no InvestOne batch job failures (abends) were documented, therefore we were unable to test the operating effectiveness of this control.

7. Inspected a listing of ACF2 user IDs with access to make modifications to schedules, compared the listing to an ISS staff detail listing and determined that access privileges to make modifications to CA Workload Object were commensurate with job responsibilities.

No exceptions noted.

INVESTMENT AND REDEMPTION PROCESSING CONTROLS

Control Objective 7 – Item Processing Security

Controls provide reasonable assurance that an authorized investment authority is established prior to processing investment requests.

Description of Controls

The Department of the Treasury issues guidance through the Department of the Treasury Financial Manual (TFM) Volume 1, Part 2, Chapter 4300 “Responsibilities Relating to Government Investment Accounts and Investment in Government Account Series Securities”. The TFM communicates policies and procedures regarding the government accounts on the books of Treasury that the Secretary of the Treasury has been authorized or directed by law to invest. The TFM describes the government investment account responsibilities that Treasury has, and the fiscal responsibility the program agencies have for the use of the invested funds.

The TFM also describes the process for how Treasury issues approval of investment authority or memorandum of understanding (MOU). FIBB creates new investment accounts in the InvestOne accounting system that will be available in FedInvest after FIBB receives confirmation via completed investment authority from Fiscal Service and Treasury legal offices that a Fund has active authority to invest in GAS Securities.

Office of the Chief Counsel maintains records concerning all legal matters with regards to new and existing investment funds.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Provide applicable legislation to FIBB and any subsequent legislation revisions that affect the program agency’s authority or ability to invest.
- Verify the authority to invest prior to submitting investment account set-up and investment/redemption requests.
- Ensure that investment/redemption transactions processed by FIBB on behalf of the program agency agree with applicable WJVs.
- Ensure that only authorized personnel sign requests or submit transactions in FedInvest.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of new investment accounts, inspected the investment authority forms/MOU between Treasury and the program agency and determined that FIBB had the authority to invest the program agency's funds prior to creating investment accounts in the FedInvest system.

No exceptions noted.

Control Objective 8 – Item Capture

Controls provide reasonable assurance that investment and redemption requests are processed and recorded in a complete, accurate, and timely manner.

Description of Controls

Program agencies log on to FedInvest to enter their investment and redemption requests prior to the 3:00 pm ET deadline (11:00 am EST for Zero-Coupon Bonds). Investment options include: (1) market-based bills, notes (fixed and floating rate), bonds, TIPS; (2) one-day certificates; (3) special issue par-value securities for agencies with proper legislative authority; and (4) Zero-Coupon Bonds. Procedures for processing investment and redemption requests by FIBB accountants on behalf of the program agency are documented for each type of transaction. For new market-based securities auctioned by Treasury, FIBB accountants manually set up the new securities with a Committee on Uniform Securities Identification Procedures (CUSIP) number assigned by the Treasury into the InvestOne accounting system. Zero-Coupon Bond securities are manually set up by FIBB accountants with a CUSIP number assigned by the Treasury into the InvestOne accounting system only when an investment request is received by the agency. One-day and special issue par-value securities are also set up by a FIBB accountant; however, the FIBB accountant assigns a security number based on the security name and date of issue instead of a CUSIP number. Another FIBB accountant, or supervisor, reviews the set-up of a new security to ensure that they are accurately recorded.

A program agency can send investment/redemption requests by email to FIBB for processing on their behalf. FIBB also processes investment transactions for certain program agencies when documentation provided by Fiscal Service Central Accounting and Reporting Division (CARD) indicates that there are additional amounts available for investment. To ensure that the program agency's investment/redemption requests are suitable and have been entered correctly into the system, two FIBB accountants review and digitally stamp each request, in addition to the accountant who entered the transaction into the FedInvest or InvestOne accounting system. The FIBB accountants inspect the requests to ensure that they include: name of fund, account symbol, date of request, amount, type of security to invest/redeem, and authorized signature of the program agency manager or authorized agent. If the requests do not contain the required information, the FIBB accountants contact the program agency to obtain the required information. Investment/redemption requests are processed as of the date on the requests.

Market-based securities –ODM provides FIBB daily security price files for the market-based securities. These price files are calculated by ODM using FRB of New York Treasury Price Quote files. FIBB accountants perform daily procedures to ensure the accuracy of the prices and for contingency planning in the event that ODM price files are unavailable to FIBB. FIBB accountants obtain the FRB of New York Treasury Price Quote files from a secure website using a digital certificate. The FIBB accountant runs a desktop COBOL program that uses the FRB of New York prices to calculate and prepare market-based price files that can be loaded into the InvestOne accounting system. The desktop COBOL program also compares the calculated prices to the prices contained in the ODM files producing an exception report of any differences. In addition, a FIBB accountant performs a yield curve comparison to check for significant variances from the composite Bloomberg generic pricing source obtained from the Bloomberg terminal. The FIBB accountant notifies ODM of any price differences on the exception report and unusual variances identified from the yield curve comparison, if any, and ODM provides FIBB with certification of any

necessary price corrections via email. The FIBB accountant loads the market-based prices into the InvestOne accounting system and FedInvest by approximately 1:00 pm ET.

Overnight Rates (one-day securities) – ODM provides FIBB the daily rate for the one-day certificates in an email of daily market bid quotations on most recently auctioned Treasury bills. The one-day rate is the prior day's coupon equivalent of the shortest regularly issued Treasury security, currently the 4-week bill. Each morning, a FIBB accountant enters the overnight interest rate for the one-day security into the InvestOne accounting system and FedInvest and two FIBB accountants compare the InvestOne accounting system security definition screens and the FedInvest screen to the ODM email received to ensure the rate was recorded accurately.

Special issue par-value securities – On the first business day of each month, a FIBB accountant creates the special issue par-value securities in the InvestOne accounting system and FedInvest using the rates provided by the Summary Debt Accounting Branch (SDAB) Securities Accounting Team (SAT). SAT prepares the rates for submission to FIBB using rates provided by ODM and the average auction results of Treasury securities as specified in the pertinent legislation. Once the special issue par-value security rates are compiled, they are submitted to the SAT supervisor for review. The supervisor reviews the rates prior to submission to FIBB by comparing the rates on the form for submission to the rates obtained from ODM and the security auction results tables. Once the securities have been created in the InvestOne accounting system using the rates obtained from SAT, the FIBB accountant runs an InvestOne OLE report for special issues and another InvestOne OLE report for one-day securities to pull the rates into InvestOne. Another accountant and the supervisor review the rates in InvestOne and compares them to the rates provided by SAT to ensure that the rates are recorded accurately and documents the review by digitally stamping the rate sheet that was provided by SAT.

Zero-Coupon Bond securities – ODM provides the Zero-Coupon Bond pricing on an as needed basis. Currently, only two program agencies invest in Zero-Coupon Bonds. FIBB receives the program agency instructions for the purchase/redemption of Zero-Coupon Bonds through a FedInvest email notification. A program agency must enter Zero-Coupon Bond purchase requests into FedInvest prior to 11:00 am ET on the desired date. Once the purchase request has been entered, FedInvest sends an automated email to the FIBB accountants and the FIBB accountants forward the request to ODM for pricing. ODM prices the transaction at approximately noon and provides the pricing data to FIBB. A FIBB accountant enters the applicable pricing data and posts the requested transaction in InvestOne accounting system. Two other FIBB accountants compare the pricing information from the InvestOne accounting system to the pricing data received from ODM to ensure the pricing is accurately recorded. A confirmation is available in FedInvest to the FedInvest user. The preparer and reviewing FIBB accountants digitally stamp the supporting documentation for the transaction to document their review.

Program agencies that have not authorized FIBB to process investment transactions on their behalf need to purchase new securities each day using FedInvest (their investments are not automatically rolled over). If a program agency cannot access FedInvest, the agency must request the investment via email. FIBB accountants process these overnight transactions as instructed. A confirmation is available in FedInvest to the FedInvest user. The preparer and reviewing FIBB accountants digitally stamp the supporting documentation for the transaction to document their review.

Investment Request Processing

Program agency users access FedInvest using their user ID and password (access controls are outlined in Control Objective 5 – Logical Access). The program agency user selects the Account Fund Symbol (AFS), date, security type, and investment amount in FedInvest.

Before Prices Loaded – The FedInvest user may enter investment requests before prices are loaded in the system for up to 10 business days in the future except for Zero-Coupon Bonds and Special Issue Certificates of Indebtedness. Upon submission of the request for future-dated market-based and TIPS securities, the user receives a confirmation number, which is proof to the program agency that their request was accepted. When prices are loaded by the FIBB accountant into the InvestOne accounting system, the FIBB accountant uses the FedInvest RPA module to load the prices into FedInvest, publish them on the website, and apply the prices to the pending investment transactions. Once the price has been applied to the transaction, it is automatically posted to the InvestOne accounting system and the confirmation number is replaced with a memo number that is also on the confirmation available to the user in FedInvest.

For future dated one-day investments, the user receives the memo number immediately. Once the one-day rate has been loaded into InvestOne accounting system/FedInvest for the effective date of the investment, a confirmation of results with rate information will be available in FedInvest to the FedInvest user.

After Prices Loaded – The FedInvest user may enter investment requests after prices are loaded into the InvestOne accounting system, except for Zero-Coupon Bonds. Since FedInvest interfaces with the InvestOne accounting system, the InvestOne accounting system automatically assigns a memo number and applies the price/rate. A confirmation of results is available in FedInvest to FedInvest users.

Zero-Coupon Bond securities – The FedInvest user may enter investment requests by 11:00 am ET. FedInvest sends the request by email to the FIBB accountants who forward the request to ODM for pricing. ODM prices the purchase of the Zero-Coupon Bond at approximately 12:00 pm ET and forwards the results to FIBB by email. The FIBB accountant enters the pricing results into the InvestOne accounting system, posts the transaction, and forwards the memo number to the FedInvest user. A confirmation of results is available in FedInvest to the FedInvest user.

Program agencies submit the investment/redemption requests via the internet using FedInvest. If program agencies are unable to access FedInvest to submit requests they can submit the investment/redemption requests via email to FIBB for manual entry. FIBB also processes investment transactions for certain program agencies when documentation provided by Fiscal Service CARD indicates that there are additional amounts available for investment. A FIBB accountant enters the request into FedInvest or InvestOne accounting system on behalf of the program agency. Then two FIBB accountants compare the transaction confirmation to the investment request to ensure the investment request is recorded accurately and posted to the correct day. The two FIBB accountants then digitally stamp the investment request to document their review. A confirmation of results is available in FedInvest to the FedInvest user the same day.

On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review) to the investment requests submitted by the program agency to ensure transactions were properly entered into the InvestOne accounting system in a complete, accurate, and timely manner. The FIBB accountant documents this review by digitally stamping the investment request.

Redemption Request Processing

Program agency users access FedInvest using their user ID and password (access controls are outlined in Control Objective 5 – Logical Access). The program agency user selects the AFS, date, inventory method (First-In First-Out (FIFO) or Specific ID), security type, and redemption amount in FedInvest.

Before Prices Loaded – The FedInvest user may enter market-based bill, note (fixed and floating rate), bond, and TIPS redemption requests using the FIFO inventory method before prices are loaded in the system for up to 10 business days in the future. Upon submission of the request, the user receives a confirmation number which is evidence to the program agency that their request was accepted. When prices are loaded by the FIBB accountant into the InvestOne accounting system, the FIBB accountant uses the FedInvest RPA module to load the prices into FedInvest, publish them on the website, and apply the prices to the pending redemption transactions. Once the price has been applied to the transaction, it is automatically posted to the InvestOne accounting system, as evidenced by the replacement of the confirmation number with a memo number that is also on the confirmation available to the user in FedInvest.

After Prices Loaded – The FedInvest user may enter market-based bill, note (fixed and floating rate), bond and TIPS redemption requests using the FIFO or Specific ID inventory methods after prices are loaded in the InvestOne accounting system and FedInvest. If program agencies have tax lots (a group of the same securities purchased on different dates) and decide to apply the specific identification method rather than the FIFO method to redeem from specific tax lots, program agencies need to select “Specific ID” inventory method to override the InvestOne accounting system default setting of the FIFO method, and enter the principal amount to redeem for each tax lot. Since FedInvest interfaces with the InvestOne accounting system, the InvestOne accounting system automatically assigns a memo number and applies the price/rate. A confirmation of results is available in FedInvest to FedInvest users.

Special issue par-value securities – Special issue par-value securities have unique redemption rules that require the InvestOne accounting system to redeem them based on the order of earliest maturity date, lowest prevailing interest rate, and FIFO. The FedInvest user receives a confirmation with a confirmation number and a message that the redemption rules will be applied in accordance with Treasury Fiscal Policy. The transaction will be pending until after the close of business on the effective date. At close of business (after 3:00 pm ET) on the effective date of the redemption, the FIBB accountant uses the FedInvest RPA module to run the Post Par Value Sell Transactions that will process, post, and assign memo numbers to the pending redemption requests in the InvestOne accounting system using the unique redemption rules. A confirmation of results is available in FedInvest to FedInvest users.

Zero-Coupon Bond securities – The FedInvest user must enter redemption requests into FedInvest (by 11:00 am ET) and FedInvest sends an email to the FIBB accountants who forward the request to ODM for pricing. ODM prices the redemption of the Zero-Coupon Bond at approximately 12:00 pm ET and forwards the results to FIBB via email. The FIBB accountant enters the pricing results into the InvestOne accounting system, posts the transaction, and forwards the memo number to the FedInvest user. A confirmation of results is available in FedInvest to the FedInvest users.

Program agencies submit the investment/redemption requests via the internet using FedInvest. If program agencies are unable to access FedInvest to submit requests they can submit the investment/redemption requests via email to the FIBB for manual entry. FIBB also processes redemption transactions for certain program agencies when documentation provided by CARD

reflects that there is a need to redeem previously invested funds. A FIBB accountant enters the request into FedInvest or the InvestOne accounting system on behalf of the program agency. Then two FIBB accountants review and digitally stamp the redemption request. A confirmation of results is available in FedInvest to the FedInvest user the same day.

On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review) to the redemption requests submitted by the program agency to ensure transactions were properly entered into the InvestOne accounting system in a complete, accurate, and timely manner. The FIBB accountant documents this review by digitally stamping the redemption request.

Investment Maturity Processing

If program agencies do not redeem securities prior to the maturity date, the InvestOne accounting system automatically matures the securities on the maturity date. A confirmation of results is available in FedInvest to the FedInvest user. Each business day, a FIBB accountant compares the system generated maturities to expected maturity reports ran after the close of the previous business day.

Each business day, a FIBB accountant runs a report for all one-day investments from the previous business day and the current day's maturities, reviews the report to make sure that all one-day investments matured and paid interest, and documents approval by digitally marking the daily checklist. If a discrepancy is noted during the review process, the supervisor is notified, the discrepancy is researched, and any issues are resolved.

Detailed Case Management Processing

The Securities and Exchange Commission (SEC) provides reimbursement to FIBB for the service of tracking investments at a subaccount level which is supplementary to what is required to record issues, redemptions, and maturities within the InvestOne accounting system. The SEC has a requirement to hold monies in escrow pending legal determination of ownership, which is accommodated by establishing a network of sub-accounts, or cases, that in aggregate equal the fund's investment balance. The SEC has a unique process to deposit or withdraw funds from a specific case.

For the SEC, a FIBB accountant enters the request received via email or file into FedInvest or the InvestOne accounting system on behalf of the program agency. Then two FIBB accountants review the transaction for accuracy and digitally stamp the request. A confirmation of results is available in FedInvest to the FedInvest user the same day.

On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review) to the requests submitted by the program agency to ensure transactions were properly entered, with no duplication or omission of transactions, into the InvestOne accounting system and were reflected in the appropriate reports for that day. The FIBB accountant documents this review by digitally stamping the request.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Ensure that the submission of investment/redemption requests in FedInvest is accurate and completed prior to 3:00 p.m. ET (11:00 a.m. ET for Zero-Coupon Bonds).

- Notify FIBB if the investment/redemption requests have been processed incorrectly so that correcting transactions may be processed before 3:00 p.m. ET.
- Review investment/redemption/maturity/interest confirmations and Monthly Statements of Account to ensure that each request was processed accurately, timely, and in accordance with program agency instructions.
- Ensure that access to FedInvest is restricted to properly authorized individuals.
- Review detailed case management transactions and case information to ensure that each request was processed accurately in a timely manner, and in accordance with program agency instructions.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of days, inspected evidence of the daily procedures performed by FIBB accountants and determined that 1) FIBB-calculated prices for market-based securities were compared to prices pulled from the ODM price file, 2) a yield curve comparison was performed to identify significant variances between the ODM price file and composite Bloomberg generic pricing source, and 3) the FIBB accountant digitally signed off on the daily procedures checklist.
2. For a selection of new market-based securities auctioned off by Treasury, inspected documentation of the FIBB accountant’s manual setup of the new securities with a CUSIP number assigned by the Treasury into the InvestOne accounting system and determined that a supervisor and another FIBB accountant, or supervisor reviewed the set-up to assess whether they were accurately recorded.
3. Inspected the population of all transactions processed in the InvestOne accounting system and determined no investment and redemption transactions were processed for Zero-Coupon Bonds during the examination period. As a result, we were unable to test the operating effectiveness of controls associated with the investment and redemption of Zero-Coupon Bonds.
4. For a selection of one-day securities, inspected report packages for a selection of dates and determined that (1) the FIBB accountant manually set up the security with a security number based on the security name and date of issue assigned by the FIBB accountant into the InvestOne accounting system and (2) a supervisor and a reviewing FIBB accountant reviewed the set-up to assess whether each security was accurately recorded.
5. For a selection of investment/redemption requests processed on behalf of the program agencies, inspected evidence of the review completed by FIBB accountants and determined that the investments/redemptions were entered into the system, such input was reviewed for accuracy, and the requests were digitally signed off.
6. For a selection of special issue par-value securities created in the InvestOne accounting system, inspected the report packages and determined that a FIBB accountant ran an InvestOne OLE report for special issues and one day securities to pull the rates, the rates provided by SAT were accurately recorded in InvestOne, and a FIBB accountant and supervisor documented their respective review by digitally stamping the rate sheet provided by SAT.
7. For a selection of investment requests entered into the FedInvest system by the program agency prior to the prices being loaded, inspected documentation of the FIBB accountants loading the prices into InvestOne, using the FedInvest RPA module, and determined that once the prices were applied to the pending investment transactions, they were posted to the InvestOne accounting system and their confirmation numbers were replaced with a memo number.
8. For a selection of investment requests entered into FedInvest or InvestOne by a FIBB accountant on behalf of a program agency, inspected FedInvest/InvestOne Transaction records and determined that two FIBB accountants compared each transaction confirmation to their respective investment request in order to assess whether the investment request was recorded

accurately, posted to the correct day, reviewed, and then digitally stamped the investment request documenting its review.

9. For a selection of dates, inspected FedInvest/InvestOne transaction records and determined that FIBB accountants (1) compared the InvestOne report (Prior Day Review Report) to the investment/redemption requests submitted by the program agency to assess whether transactions were entered into the InvestOne accounting system and (2) digitally stamped the investment/redemption requests documenting the completion of their review.
10. For a selection of new market based securities entered into FedInvest or InvestOne by a FIBB accountant on behalf of a program agency, inspected corresponding FedInvest/InvestOne transaction records and determined that two FIBB accountants (1) compared each transaction confirmation to the respective redemption request to assess whether securities were recorded accurately and posted to the correct day, and (2) digitally stamped the redemption request documenting their review.
11. For a selection of business days, inspected investment maturity reports and associated review documentation and determined that FIBB accountants (1) reviewed the reports to assess whether one-day investments matured and paid interest and (2) documented their approval by digitally stamping daily checklists.
12. For a selection of SEC transaction requests entered into the FedInvest or InvestOne accounting system by FIBB on behalf of the program agency, inspected the corresponding FedInvest/InvestOne Transaction records and determined that two FIBB accountants (1) compared each transaction confirmation to their respective investment request to assess whether the investment request was recorded accurately and posted to the correct day, and (2) digitally stamped SEC transaction requests documenting their review.

No exceptions noted.

Control Objective 9 – Confirmations

Controls provide reasonable assurance that confirmations are processed in a timely and accurate manner.

Description of Controls

The InvestOne accounting system assigns a memo number for transactions entered in FedInvest that are posted immediately into the InvestOne accounting system.

A confirmation number is created for each transaction entered into FedInvest that is not processed immediately upon entry (e.g., market-based transactions before prices are loaded, Zero-Coupon Bonds, and special issue par-value redemptions) to notify the user that the transaction is in the processing queue. Each day, FIBB processes the prices and par-value in InvestOne, then completes the “Apply Prices Results” and the “FedInvest Par Value Redemptions (Posted) functions. FedInvest automatically applies the price for pending security buy/sell transactions and then replaces the confirmation number with a memo number which is provided to the program agency via the FedInvest interface. The FIBB accountant reviews the confirmation reports showing the posted transactions to assess whether all pending transactions are included and that they posted accurately. The accountant saves these reports as part of the daily workpapers. The FIBB accountant also performs a Prior Day Review which includes a secondary review to assess whether reports documenting the transactions have been processed accurately, and follows up on any identified discrepancies.

For each entry into the InvestOne accounting system, the system automatically generates and posts an on-line confirmation of the transaction available in FedInvest for program agency reconciliation. program agencies access FedInvest using their user ID and password to obtain confirmations.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Track investment/redemption confirmations to ensure that the program agency FedInvest user correctly processes all requests.
- Review and reconcile all transaction confirmations to determine whether they are accurate and complete, and report discrepancies to FIBB, so correcting transactions may be processed before 3:00 p.m. ET.
- Ensure that access to FedInvest is restricted to properly authorized individuals.
- Review investment/redemption/maturity/interest confirmations and Monthly Statements of Account to ensure that each request was processed accurately in a timely manner and in accordance with program agency instructions.

Tests of Operating Effectiveness and Results of Testing:

1. For an investment or redemption request entered into FedInvest, but not immediately processed into the InvestOne accounting system, observed FedInvest and noted that a confirmation number was automatically assigned and was replaced by a memo after the pricing information was loaded and that the request was recorded accurately and in a timely manner.
2. For a selection of business days, inspected daily confirmation reports and determined they were reviewed for accuracy by the FIBB accountant and retained as part of the daily workpapers.

3. For a selection of business days, inspected a Prior Day Review and determined the prior day's confirmations were reviewed for accuracy. As there were no discrepancies identified for further follow-up in our selection, we were unable to conclude on the operating effectiveness of this aspect of the control.

No exceptions noted.

Control Objective 10 – Program Balance Corrections

Controls provide reasonable assurance that program agency account balance corrections applied to correct errors in processing or program agency errors are processed timely and accurately.

Description of Controls

Program agencies should detect errors by reviewing confirmations. Program agencies notify FIBB of the errors and send adjustment information. FIBB maintains a documented procedure detailing the steps that need to be performed when making a correction or adjustment. The Correction/Adjustment Check List documents the tasks that generally need to be completed when making a correction. When necessary, a FIBB accountant enters a correction of the original transaction in the InvestOne accounting system. The InvestOne accounting system processes the correction and a confirmation of the corrected transaction is available in FedInvest to the FedInvest user.

The FIBB accountant prepares a correction package and completes the Correction/Adjustment Check List when corrections are necessary. Two other FIBB accountants, (the supervisor and a reviewing FIBB accountant), review and approve the correction package and any transactions posted to the InvestOne accounting system, SDAS, and/or IPAC, as applicable. The review and approval process is completed by determining the necessary steps on the Correction/Adjustment Check List have been performed.

A FIBB accountant runs a report from the FIB Menu (a COBOL collection of desktop programs) to create Monthly Statements of Account, which documents all transactions processed for a particular month, including any necessary corrections. The Monthly Statements of Account are made available in FedInvest and the Summary Level Statements of Account are made available on the Fiscal Service's TreasuryDirect website for review by the program agencies.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Review investment/redemption/maturity/interest confirmations and the Monthly Statements of Account to ensure that each request was processed accurately, timely, and in accordance with program agency instructions and notify FIBB of any errors detected in a timely manner.
- Review corrections and make prompt and accurate journal entries to the accounting records, to adjust the investment account balances and related interest.
- Review Monthly Statements of Accounts to verify that corrections were processed accurately, and discrepancies are investigated.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of corrections performed, inspected the correction package and the completed Correction/Adjustment Check List and determined that the corrections were documented in the correction package and performed in accordance with the established procedures.
2. For a selection of a fund balance corrections, inspected the program agency's correction request and the Correction/Adjustment Check List and determined two FIBB accountants, including

the supervisor, performed and documented their review of correction requests and that the requests were processed accurately, and in a timely manner.

3. For a selection of Monthly Statements of Account on FedInvest, inspected and determined that they were posted by the first working day after the end of the month and made available for review to the program agencies.
4. For a selection of corrections, inspected the respective Monthly Statements of Account and determined that the Monthly Statements of Account indicated that the corrections were processed accurately and in a timely manner.

No exceptions noted.

Control Objective 11 - Recordkeeping

Controls provide reasonable assurance that support related to the investment accounts is documented and readily available.

Description of Controls

Transaction confirmations and the Monthly Statements of Account containing InvestOne accounting system data are available in FedInvest to the FedInvest users. The Monthly Statements of Account Summary Level is also available on the TreasuryDirect website. FIBB maintains electronic copies of the investment/redemption requests that were processed by FIBB on behalf of the program agency.

On a daily basis, FIBB receives market-based security price files from ODM and FRB of New York, Zero-Coupon Bond pricing as needed from ODM, and a daily email for the one-day certificate rate from ODM. On a monthly basis, FIBB receives via email the special issue par-value security rates from SAT. These quotations document the security prices/rates and are retained for future reference for a period of twenty years in accordance with the Fiscal Service document retention policies. FIBB files and retains Daily Principal Totals Reports, which detail all daily principal transactions and are reconciled to the Balances-Summary report daily.

Each day, as a part of the daily reconciliation process, a FIBB accountant reviews the prior business day reports and verifies all files are complete. If files are found to be incomplete, the FIBB accountant seeks the missing reports and completes the file. The accountant signs the Work Checklist, then combines the workpapers into a single PDF document which is archived for long-term retention.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of months, inspected the Monthly Statements of Account and determined that the reports were maintained and readily available.
2. For a selection of investment/redemption requests, inspected the confirmations and determined that confirmations were maintained and readily available.
3. For a selection of investment/redemption requests, inspected the Request for Investment/Redemption forms, email authorizations, or MOUs and determined that documents were maintained and were readily available.
4. For a selection of dates, inspected the Daily Principal Totals Reports and determined that the FIBB accountants reconciled the reports to the Balances-Summary report, the reconciliations were mathematically correct and documented, and the documents were maintained and were readily available.
5. For a selection of dates, inspected pricing records and determined that pricing documents were maintained and readily available.
6. For a selection of dates, inspected the Work Checklist and determined that an accountant reviews prior day reports and verifies all files are complete by preparing and signing the checklist.

No exceptions noted.

Control Objective 12 – Segregation of Duties

Controls provide reasonable assurance that the duties of authorizing investments/redemptions, processing information, and verifying documents are appropriately segregated.

Description of Controls

FIBB has established policies and procedures documenting that the following responsibilities are segregated for program agencies using FedInvest:

- Program agencies are responsible for requesting access to FedInvest.
- External FedInvest users must have their supervisor's approval along with ISSR approval documented on an Access Request/Revoke form before access is granted to or revoked from FedInvest.
- Access permissions are assigned to FedInvest and the InvestOne accounting system users commensurate with their job responsibilities by the ISSRs.
- FIBB Accountants set up accounts in InvestOne accounting system/FedInvest and ISSRs set up users in InvestOne accounting system/FedInvest.
- Program agencies access FedInvest and submit investment purchase and redemption requests.
- FedInvest interfaces with the InvestOne accounting system which processes and posts the investment and redemption requests and provides the data for the confirmations that are available in FedInvest to the FedInvest users.

FIBB has established policies and procedures documenting that the following responsibilities are segregated when FIBB processes transaction requests on behalf of the program agencies:

- Program agencies prepare and submit investment/redemption requests to FIBB via email.
- FIBB personnel enter the investment purchase or redemption request into FedInvest or the InvestOne accounting system.
- The InvestOne accounting system processes the investment and redemption requests and provides the data for the confirmations that are available in FedInvest to the FedInvest users.
- To verify that transactions have been processed accurately, two FIBB accountants other than the one who entered the transaction will review and compare a copy of the investment/redemption request from the Agency or tax deposit amounts provided by CARD to the data entered into the InvestOne accounting system. Both the accountant entering the transaction and those reviewing it digitally stamp the file copies to document that the procedure has been performed.
- On the following business day, a FIBB accountant compares the InvestOne report (Prior Day Review Report) to the investment/redemption request submitted by the program Agency to ensure transactions were properly entered into the InvestOne accounting system. The FIBB accountant documents completion of this review by digitally stamping the investment/redemption request.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Ensure that access to FedInvest is restricted to properly authorized individuals.
- Ensure that their users request access to FedInvest that is appropriate for their role and on an as-needed basis.

- Ensure all Access Request/Revoke change requests are reviewed and approved by a supervisor before submitting the request to Fiscal Service.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of new FedInvest users, inspected documented user access request forms and determined that users' access was authorized by a FIBB FAO ISSR and the users' supervisors.
2. For a selection of new FedInvest users, inspected documented user access request forms and system-generated user access profiles and determined the users' access granted corresponded to the access requested.
3. For a selection of investment/redemption requests, inspected the signed Investment/Redemption request forms or emailed authorizations and determined that the program agency authorized FIBB to process the requests prior to entry into the InvestOne accounting system and the investment/redemption requests were digitally stamped by the FIBB accountant recording the entry to document that the procedures were performed.
4. For a selection of dates, inspected records for transactions processed by FIBB on behalf of program agencies to ensure that transactions were entered into the InvestOne accounting system, the FIBB accountant digitally stamped the comparison documenting the completion of their review, and compared the InvestOne report (Prior Day Review Report) to the investment/redemption request submitted by the program agency, and determined that transactions were properly entered into InvestOne.

No exceptions noted.

Control Objective 13 – Interest Calculation and Payments

Controls provide reasonable assurance that interest is calculated accurately and interest reinvestments are completed accurately.

Description of Controls

Interest

FIBB has documented the methods for calculating interest for GAS securities in written desktop procedures. One-day securities pay interest at maturity, special issue par-value securities pay interest semi-annually on June 30 and December 31, and market-based notes, bonds and TIPS pay interest semi-annually on various dates. Market-Based floating rate notes (FRNs) pay interest quarterly. The market-based bills and Zero-Coupon Bonds do not pay periodic interest and therefore interest income is equal to the discount earned. The InvestOne accounting system calculates the amount of interest to be paid when holdings are redeemed or interest payments are due. The InvestOne accounting system calculates interest based on the security set-up and investment terms in the system in accordance with the requirements of 31 CFR Chapter II, Part 306, Subpart E, and Part 356, Appendix B, with the exception of one-day securities. The InvestOne accounting system calculates interest for one-day securities using the rate that FIBB receives from ODM.

The InvestOne accounting system reports the results of the calculations on confirmations available in FedInvest for program agency reconciliation and re-computation. The confirmation generation process is summarized as follows.

Program agencies access FedInvest using their user ID and password. Since FedInvest interfaces with the InvestOne accounting system, the InvestOne accounting system data is displayed on the confirmations that are immediately available in FedInvest to the FedInvest user.

The InvestOne accounting system also calculates certain accrued interest amounts and Inflation Compensation Earned (ICE) on the TIPS. The InvestOne accounting system calculates ICE in accordance with the requirements of 31 CFR Chapter II, Part 356, Appendix B.

FIBB accountants verify the accuracy of the InvestOne accounting system interest calculations by manually recalculating interest for redemptions, maturities and semi-annual payment dates.

A COBOL program uses extracted data from the InvestOne accounting system to generate Monthly Statements of Account (a cash basis statement that reflects the Agency's investment reporting, and shows interest income paid on each security). To create the Monthly Statements of Account, a FIBB accountant runs the COBOL program for both tax lot and summary levels. This creates two text files for each fund. The FIBB accountant sends the tax lot and summary level Monthly Statements of Account via email to the Fiscal Service Internet for publishing in FedInvest and the Summary Level Statements of Account are available on the TreasuryDirect website.

The Monthly Statements of Account and confirmations are available to the program agencies for reconciliation with their accounting records. In addition, previous months' statements are available for reference purposes. If the program agency identifies any errors, the program agency should inform FIBB so the necessary adjustments may be made.

Amortization of Premiums and Discounts

The InvestOne accounting system automatically calculates amortization of discount/premium based on the security set-up and investment terms in the system. FIBB has documented the methods for calculating the discount/premium amortization in written desktop procedures. The system calculates amortization for market-based bills (i.e., short-term securities) using the straight-line method and for market-based notes/FRN/bonds/TIPS/Zero-Coupon Bonds (i.e., long-term securities), using the level yield method, which is an interest method. A COBOL program is used to create monthly Accrual Confirmation and Accrual Activity Reports for each account, which contain the amortization amounts that are published in FedInvest for program agency reconciliation and re-computation. To create the Accrual Confirmation and Accrual Activity Reports, a FIBB accountant selects and runs the “accrual report” option from the FIBB report menu. This generates two text files that include the Accrual Confirmation and Accrual Activity Reports for each fund. The FIBB accountant sends the Accrual Confirmation and Accrual Activity Reports via email to the Fiscal Service Internet for publishing in FedInvest. In addition, previous months’ statements are available for reference purposes. If the program agency identifies any errors, the program agency should inform FIBB so the necessary adjustments may be made.

Accrued Interest

The InvestOne accounting system automatically calculates accrued interest based on the security set-up and investment terms in the system. FIBB has documented the methods for calculating the accrued interest in written desktop procedures. The FIB Menu accrual report program reports the results of interest accruals in the monthly Accrual Confirmation and Accrual Activity Report and publishes the report in FedInvest for program agency reconciliation and re-computation. To create the Accrual Confirmation and Accrual Activity Reports, a FIBB accountant selects and runs the “accrual report” option from the FIBB report menu that generates two text files that include the Accrual Confirmation and Accrual Activity Reports for each fund. The FIBB accountant sends the Accrual Confirmation and Accrual Activity Reports via email to the Fiscal Service Internet for publishing in FedInvest. In addition, previous months’ statements are available for reference purposes. If the program agency identifies any errors, the program agency should inform FIBB so the necessary adjustments may be made.

Interest Reinvestments

On a weekly basis in June and December, FIBB prepares an Investment Rollover Projection for the Office of Fiscal Projections that includes principal balances from the InvestOne accounting system and interest accruals that are associated with those balances as of the date of the report. For the December 31 interest payments on special issue par-value securities, the interest is reinvested into a certificate of indebtedness maturing the following June 30.

For June 30 maturities and interest payments, FIBB receives written documentation from each agency that holds special issue par-value securities that states how they want their interest and maturities reinvested. June 30 is the only date on which agencies can invest in longer term special issue par-value securities (par-value bonds). The interest-reinvestment process for the non- par-value securities is the same as and subject to the regular investment process discussed in Control Objective 8.

Interest Allocations

According to their individual needs, program agencies subscribing to detailed case management services establish relationships between their investments and their cases using either a pooled or non-pooled strategy. Currently, the Administrative Office of the United States Court's (AOUSC's) Registry Funds account utilizes a pooled strategy and SEC's Disgorgement and Penalty Amounts Held for Investors uses a non-pooled strategy. Additional information on case management processes can be found in Control Objective 8 under the 'Detailed Case Management Processing' section.

A pooled investment strategy uses the CMS module in FedInvest to group cases into program agency defined pools. The sum of balances within each pool is then used by the program agency to purchase/maintain a portfolio of securities (similar to a mutual fund). For agencies with a pooled investment strategy, the total balance of all cases must equal the total balance of all investments. The CMS module is also used to allocate interest by calculating the portion of total investment interest that is owed to each case based on the percentage of the pool's balance held by the case. The formula used to calculate and allocate interest to case balances includes withholding fees, as required by statute. Program agencies are responsible for verifying and inputting these fee amounts into CMS. Case and investment balances are reconciled for pooled investment funds both prior to and after the allocation of interest. The reconciliation process prior to allocation of interest includes a review by two FIBB accountants who digitally stamp the requests as proof of review.

Program agencies with a non-pooled investment strategy track each case balance in an equivalent investment account within FedInvest. As such, each security that is purchased will tie directly to a specific case, as will the subsequent interest allocations.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Reconcile interest payments and allocations received as presented in the confirmations and Monthly Statements of Account and recalculate interest for accuracy.
- Approve reinvestments of interest after review for accuracy, completeness, and compliance with instructions.
- Recalculate interest accrual and amortization of premium and/or discount and compare the results to the Fiscal Service provided monthly Accrual Confirmation and Accrual Activity Reports.
- Report any interest accrual discrepancies noted on the monthly Accrual Confirmation and Accrual Activity Reports to Fiscal Service for resolution.
- Report any premium and/or discount amortization discrepancy noted on the monthly Accrual Confirmation and Accrual Activity Reports to Fiscal Service for resolution.
- Verify the accuracy of program agency requested fee amounts entered by both FIBB and program agency accountants into CMS.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of interest transactions associated with each type of GAS security other than one-day securities, reformed interest calculations for redemptions, maturities, and semi-annual payment dates and determined InvestOne automatically calculated interest accurately.
2. Inspected interest calculation procedures and determined that they were consistent with the requirements of 31 CFR, Chapter II, Part 306, Subpart E and Part 356, Appendix B.

3. For a selected interest transaction associated with a one-day security, reperformed the interest calculation using the rate FIBB received from ODM and determined InvestOne automatically calculated interest accurately.
4. For a selected investment request, redemption request and maturity transaction processed in the InvestOne accounting system, inspected confirmations and determined that the system posted an online confirmation of the transaction available in FedInvest to program agencies.
5. For a selected confirmation, inspected the confirmation to determine that it contained appropriate information to allow for program agency reconciliation and re-computation of transactions.
6. For a selection of Accrual Confirmation Reports and Accrual Activity Reports, inspected FedInvest and determined that the reports were available in FedInvest to program agencies.
7. For a selection of Accrual Confirmation Reports and Accrual Activity Reports, inspected the reports and determined they contained the necessary information for program agencies to reconcile and re-compute the accrual and amortization and that the information included in the reports was accurate.
8. For a selection of transactions from the Accrual Confirmation Reports, reperformed the amortization calculations for both premium and discount and determined that the amortization was calculated accurately and the level yield method utilized by FIBB for long term securities approximated the interest method.
9. For a selected transaction from the Accrual Confirmation Reports, reperformed the accrued interest calculation and determined the InvestOne accounting system calculates accrued interest accurately based on the security set-up and investment terms in the system.
10. For a selection of weeks, inspected the Investment Rollover Reports and determined that the reports were generated on a weekly basis in June and December.
11. For a selection of fund interest earnings and withholding fee allocations for pooled investments, inspected reconciliation packages and determined that a FIBB accountant reconciled the case balances both before and after the allocation and accurately input the fee amounts into InvestOne and that two accountants reviewed and digitally stamped the request.

No exceptions noted.

Control Objective 14 – Statement Rendering

Controls provide reasonable assurance that daily activity and monthly reports are processed in a timely and accurate manner.

Description of Controls

Monthly Statements of Account

A FIB Menu program extracts data from the InvestOne accounting system to produce the Monthly Statements of Account that details cash basis reporting of a program agency's beginning balance, investment/redemption activity, unrealized discount, premium/discount recognized, interest earnings, adjustments processed and ending balance for the month. The accuracy of these monthly reports is reliant on the Daily Reconciliation (see Control Objective 11) and Prior Day Review (see Control Objective 8) functions which ensure the accuracy and completeness of the recorded transactions. Additionally, the Monthly Statements of Account are system generated and then reviewed by an accountant, with corrections/adjustments applied as needed and reviewed for accuracy (Control Objective 10). FIBB also has an accountant that monitors the status of the Monthly Statements of Account to ensure they are prepared and reviewed before the end of the first business day following month end, and ensures follow-up is performed if discrepancies are noted.

The Monthly Statements of Account reports are available in FedInvest and the Summary Level Statements of Account are available on the TreasuryDirect website by the first working day after the end of the month to be accessed by program agencies for transaction reconciliation, investment monitoring, and investment strategy initiatives. To create the report, the FIBB accountant runs a COBOL program that uses InvestOne accounting system data to create text files of the Monthly Statements of Account at both the summary level and tax lot level for each fund. The FIBB accountant sends the tax lot and summary level Monthly Statements of Account via email to the Fiscal Service Internet for publishing in FedInvest and on the TreasuryDirect website. In addition, previous months' statements are available for reference purposes. If the program agency identifies any errors, the program agency should inform FIBB so the necessary adjustments may be made. FIBB's policy requires that FIBB accountants complete and forward Monthly Statements of Account at the tax lot and summary level to the Fiscal Service Internet for publishing in FedInvest. The Summary Level Statements of Account are available on the TreasuryDirect website by the 1st working day after the end of the month.

IPAC and CARS Statement of Transactions

FIBB is able to report daily investment activity to CARD on behalf of the program agencies by submitting FIBB's daily IPAC file to CARD. FIBB creates the FIBB daily IPAC file, which is a configured system report, using a mainframe job. The file includes the program agency's Treasury Account Symbol (TAS) and the Business Event Type Code (BETC) allowing the activity to be classified in the Central Accounting Reporting System (CARS) Account Statement. FIBB reports the investment activity for all investment program agencies.

Additionally, FIBB prepares a daily Classification Transactions and Accountability (CTA) file to report non-IPAC activity, which consists of reclassification entries. FIBB creates the Classification Transactions and Accountability file using a mainframe program and the InvestOne accounting system. FIBB uploads the Classification Transactions and Accountability file to CARD using the CARS system and creates a CARS Statement of Transactions report. FIBB instructs program agencies to obtain access to the CARS Account Statement application in order to verify the activity submitted by FIBB.

Complementary Program Agency Controls

Program agencies should have established controls to provide reasonable assurance that:

- Review FIBB provided Monthly Statements of Account to determine whether transactions are recorded accurately and timely, and report discrepancies to FIBB so correction processes may occur.
- Reconcile investment activity from CARS Account Statements to the FIBB provided Monthly Statements of Account to verify that investment activity is being properly reported by FIBB on the program agencies' behalf.

Tests of Operating Effectiveness and Results of Testing:

1. For a selection of months, inspected the Monthly Statements of Account on FedInvest and determined that they were posted by the first working day after the end of the month.
2. For a selection of transactions from FedInvest, inspected the respective Monthly Statements of Account and determined the transactions were accurately reflected on the Monthly Statements of Account.
3. For a selected Monthly Statement of Account, observed a FIBB accountant attempt to modify the published statement and noted that modification of the statement was prevented.
4. For a selection of business days, inspected documentation of the daily procedures performed by the FIBB accountants regarding the daily IPAC file submission and determined that the accountants followed the established policies and procedures, as evidenced by the FIBB accountant digitally checking off and digitally initialing the applicable procedures on the daily procedures checklist.
5. For a selection of dates, inspected the CTA file submissions and determined that FIBB instructed program agencies to obtain access to CARS Account Statement application in order to verify the activity submitted by FIBB.

No exceptions noted.

MONITORING CONTROLS

Control Objective 15 – Monitoring Subservice Organizations

Controls provide reasonable assurance that SOC 1 reports or other control related documentation provided by subservice organizations are reviewed and reviews are documented timely in accordance with Fiscal Service policies and procedures.

Description of Controls

FIBB has documented procedures for staff to follow for reviewing SOC 1 Reports and other control related documentation.

Fiscal Service obtains relevant SOC 1 reports from subservice organizations. If a SOC 1 Report is not available, Fiscal Service will request alternative documentation, including system verification letters that outlines or analyzes current controls. These documents are reviewed to determine if any control exceptions impact FIBB's control environment in the current fiscal year. FIBB will assess existing complementary controls and determine if additional control changes are needed. Once completed, the assessments will be reviewed and approved by management. The review of Subservice Organization SOC 1 reports is coordinated by PSD who obtains the reports as early as possible after their issuance and immediately distributes them for review across FAO. The consolidated overview of Subservice Organization SOC 1 reports, including the reviews completed by FIBB, is retained and provided to FAO management.

Tests of Operating Effectiveness and Results of Testing:

1. Inspected written procedures for reviewing SOC 1 reports and system verification letters and determined the consistent use of the procedures provided reasonable assurance that SOC 1 reports and system verification letters are appropriately reviewed for impact to the FIBB control environment during the current fiscal year and approved.
2. Inspected system verification letters and determined the review was documented and approved.
3. Inspected alternative documentation for subservice organizations that did not provide a SOC 1 report and determined that FIBB performed alternative review procedures.

No exceptions noted.

**V. OTHER INFORMATION PROVIDED BY THE
BUREAU OF THE FISCAL SERVICE**

CONTINGENCY PLANNING

System Back Up

The InvestOne accounting system is included in the DIMS) information system contingency plan (ISCP) managed by FAO, PSD, Security and Compliance Branch (SCB). This plan is part of the DIMS System Security Plan (SSP), which is managed by the DIMS Information System Security Officer (ISSO) in SCB. There is a formal SALD, Business Continuity Plan (BCP), which is part of a larger BCP for FAO and the Fiscal Service Continuity of Operations Plan (COOP). Throughout the year, the FIBB performs contingency tests on all Mission Essential Functions requiring the InvestOne accounting system.⁶

ISS performs backups of the InvestOne accounting system on a regular schedule. ISS retains the backup tapes according to a pre-set schedule at an offsite facility. ISS stores one copy in the production tape library, and the other copy is shipped to an offsite facility. If a backup tape needs to be restored, the request will be made from CTD. ISS will then load the backup tape.

Continuity of Operations

A fire alarm and sprinkler system that is managed, maintained, and tested by the building management protects the data center⁷. Sprinkler heads are located in the ceiling of each room of the buildings. This is a pre-action dry pipe system, charged with nitrogen, with individual heads that discharge water.⁸

The FAO Business Continuity Plan (BCP) calls for resumption of operations and critical applications of essential functions within a pre-set four hour time frame. The InvestOne accounting system has been classified as a critical application.

As part of the FAO BCP, should the facility supporting InvestOne accounting system and FedInvest become unavailable, designated FIBB personnel will relocate to reestablish their daily operations. When applicable, Fiscal Service will revert to manual procedures until the FIT MF and InvestOne accounting system are fully recovered.

⁶ FIBB performs emergency telework tests on all essential InvestOne functions a minimum of quarterly. The focus of these tests is to provide assurances that connectivity can be made and these functions will continue with minimum interruption during any emergency that may occur with or without warning. FIBB also participates in the annual Fiscal Service Disaster Recovery Exercise, which tests FISMA compliance and business continuity capabilities.

⁷ Alarms are active 24 hours a day, 7 days a week, and are tied in to the local fire department over phone lines for spontaneous notification.

⁸ In the event the main building, where the InvestOne accounting system is run, becomes inoperable, FIT MF operations would be relocated to the Fiscal Service contingency facility in accordance with the ISS data center recovery plan. This facility employs a warm site strategy for recovery of FIT MF operations.

NETWORK PERFORMANCE MONITORING

Prior to January 21, 2022, users must be connected to the Fiscal Service network to access the InvestOne accounting system. Additionally, they must run terminal emulation software to connect to the FIT MF environment. From January 21, 2022, forward, for the distributed environment, users run terminal emulation software to access the JET client (Linux) server. Network performance and availability, which includes the FedInvest website, are monitored by ISS 24 hours a day.

Fiscal Service uses a combination of monitoring tools (SolarWinds and HP SiteScope) to monitor networking equipment, such as switches and firewalls. These tools automatically report any network equipment or application outages to the Network Operations Center (NetOps).

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