U.S. Environmental Protection Agency Office of Inspector General

20-P-0015 November 1, 2019

At a Glance

Why We Did This Project

The Office of Inspector General (OIG) conducted this audit to determine whether the Office of the Chief Financial Officer (OCFO) identified and tested all required security controls for the U.S. Environmental Protection Agency's (EPA's) legacy budget system—called the Budget Automation System (BAS). We also sought to determine whether the EPA required the cloud service provider for the agency's replacement budget systemcalled the Budget Formulation System (BFS)—to comply with National Institute of Standards and Technology requirements for testing information system security controls.

The OCFO's Office of Budget is responsible for the BAS and BFS. The OCFO relies on service providers to support and host the systems. An EPA data center hosts the BAS, while a contractor hosts the BFS in a cloud environment. Various entities within and outside the EPA provide security controls for the BAS and BFS.

This report addresses the following:

Operating efficiently and effectively.

Address inquiries to our public affairs office at (202) 566-2391 or OIG_WEBCOMMENTS@epa.gov.

List of OIG reports.

EPA Budget Systems Need Improved Oversight of Security Controls Testing

What We Found

The OCFO identified the required security controls needed for the agency's budget systems.

For the BAS, the OCFO and its service providers tested 100 percent of the security controls in our fiscal year 2016 sample. However, the OCFO and its service providers did not test all of the security controls in our fiscal year 2017 sample.

The OCFO lacks internal controls needed to make informed, risk-based decisions regarding the security of the agency's budget systems.

For the BFS, the OCFO required the cloud service provider to comply with National Institute of Standards and Technology testing requirements. However, the OCFO did not maintain documentation to substantiate whether (1) the BFS cloud service provider tested and implemented the required security controls or (2) the controls were working as intended to protect the BFS and its data.

Additionally, we found that the OCFO:

- Did not correctly assign and document responsibility for testing BAS security controls.
- Did not review BFS security reports in a timely manner or document the results of these reviews.

Testing security controls enables organizations to identify vulnerabilities in their systems. Finding these vulnerabilities in a timely manner would allow the EPA to promptly remediate any weaknesses that impact the safety of its systems. Likewise, a lack of internal controls means vulnerabilities are found late or not at all, and prevents the EPA from protecting its budget data from unauthorized disclosures or modifications.

Recommendations and Planned Agency Corrective Actions

We recommend that the Chief Financial Officer update the BAS security planning documents to specify who is responsible for testing information system security controls, as required by the National Institute of Standards and Technology. We also recommend that the Chief Financial Officer implement a process for obtaining and documenting the timely review of all BAS and BFS security reports.

The EPA agreed with our recommendations. The agency provided sufficient evidence that it completed corrective actions for Recommendation 1 and the recommendation is resolved. The agency did not provide a milestone date or acceptable documentation to support that it completed corrective actions for Recommendation 2, and that recommendation is, thus, unresolved.