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AUDIT REPORT

OFFICE OF AUDITS

NASA'S EFFORTS TO IDENTIFY, REPORT, AND RECAPTURE IMPROPER PAYMENTS

OFFICE OF INSPECTOR GENERAL



National Aeronautics and Space Administration

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Acronyms

AFR	Agency Financial Report
ARMD	Aeronautics Research Mission Directorate
Caltech	California Institute of Technology
CFO	Chief Financial Officer
DCAA	Defense Contract Audit Agency
FAR	Federal Acquisition Regulation
FY	Fiscal Year
GAO	Government Accountability Office
HST	Hubble Space Telescope
IPERA	Improper Payments Elimination and Recovery Act
IPIA	Improper Payments Information Act
JPL	Jet Propulsion Laboratory
JWST	James Webb Space Telescope
PAR	Performance and Accountability Report
OCFO	Office of the Chief Financial Officer
OIG	Office of Inspector General
OMB	Office of Management and Budget
RMB	Reimbursable
SOFIA	Stratospheric Observatory for Infrared Astronomy

OVERVIEW

NASA'S EFFORTS TO IDENTIFY, REPORT, AND RECAPTURE IMPROPER PAYMENTS

The Issue

Each year, the Federal Government wastes billions of taxpayer dollars on improper payments to individuals, organizations, and contractors. An improper payment is any payment that should not have been made; was made in an incorrect amount, to an ineligible recipient, for ineligible goods or services, or for goods or services not received; was duplicative; or did not reflect credit for applicable discounts.¹ Improper payments may result from inadequate recordkeeping, inaccurate eligibility determinations, inadvertent processing errors, lack of timely and reliable information to confirm payment accuracy, or fraud.

To combat improper payments, Congress passed the Improper Payments Information Act (IPIA) of 2002 and the Improper Payments Elimination and Recovery Act (IPERA) of 2010. These Acts require agencies to identify and report on programs or activities that are susceptible to significant improper payments by conducting a risk assessment, testing a sample of transactions, and determining the estimated amount of improper payments. Agencies are required to report to the President and Congress in their annual Performance and Accountability Report (PAR) or Agency Financial Report (AFR) the amount of estimated improper payments, along with steps taken and actions planned to reduce those payments. Since fiscal year (FY) 2006, NASA has consistently reported that it has identified no programs with significant improper payments.

IPIA also requires agencies to conduct payment recapture audits to review and analyze their accounting and financial records to identify overpayments. In addition, IPERA requires Inspectors General to determine whether their respective agencies comply with IPIA requirements, evaluate the accuracy and completeness of agency reporting, and evaluate agency performance in reducing and recapturing improper payments. The Office of Management and Budget (OMB) has issued guidance regarding agency compliance with IPIA.²

The Quality Assurance Division of the NASA Office of the Chief Financial Officer (OCFO) is responsible for ensuring that NASA complies with IPIA. The OCFO employs two contractors to assist the Agency with IPIA compliance: one to conduct improper

¹ Office of Management and Budget Circular No. A-123, "Management's Responsibility for Internal Control," Appendix C.

² From this point forward, the term "IPIA" will be used to refer to IPIA as amended by IPERA.

payments testing (IPIA contractor) and one to conduct recapture audits (recapture auditor).

The first step in determining whether an agency's programs are susceptible to significant improper payments is to identify its programs. For the 2011 reporting period, NASA began this process by querying its financial system, SAP, for all FY 2010 disbursements. NASA provided this information to the IPIA contractor who segregated the data by mission, ultimately identifying 132 programs within seven mission areas.³ With the Quality Assurance Division's approval, the contractor removed the two programs under the Office of Inspector General (OIG) mission area from this list and combined 32 programs into a single program labeled Institutions and Management, bringing the list to a total of 99 programs. All programs with more than \$80 million in disbursements during the fiscal year would be subject to further assessment.⁴ NASA reported that 34 programs met this threshold.

The Agency reported in the PAR that it had conducted a risk assessment on these 34 programs, which had total disbursements of \$19.1 billion. Of these programs, NASA identified 7 as potentially susceptible to significant improper payments: Constellation Systems, Institutions and Management, International Space Station, Mars Exploration, Reimbursable (RMB) – Science Mission Directorate Programmatic, Space Communications and Navigation, and the Space Shuttle Program. The combined disbursements subject to testing for these 7 programs totaled approximately \$5.1 billion. Testing of these programs resulted in the discovery of one improper payment, which was used to statistically project \$1.5 million of improper payments made by NASA in FY 2010. This amount did not meet the threshold established in the OMB guidance as significant and, as a result, the Agency reported in its FY 2011 PAR that no programs were susceptible to significant improper payments. The Agency also reported that it had recovered no improper payments as a result of the recapture auditor's efforts.

In this audit, we examined whether NASA was identifying, reporting on, and reducing improper payments in accordance with IPIA. Specifically, we reviewed the IPIA section of the PAR and supporting documentation to ensure NASA's methodology and determinations were sound, accurate, and complete, and evaluated the Agency's performance and methodology for identifying, reducing, and recapturing improper payments.

³ Aeronautics Research Mission Directorate, Cross Agency Support Programs, Exploration Systems Mission Directorate, Institutions and Management, Office of Inspector General, Science Mission Directorate, and Space Operations Mission Directorate.

⁴ This \$80 million threshold assumes an improper payment error rate of 12.5 percent, which could potentially lead to \$10 million in improper payments, which OMB guidance established as the threshold for significant improper payments.

NASA has limited the scope of its IPIA efforts, which in turn has minimized the Agency's ability to identify, report on, and recapture improper payments. Although the Agency completed the steps required by IPIA and reported the results of its review in its FY 2011 PAR, NASA is not fully compliant with the requirements of the Act. Specifically, with NASA's approval, the IPIA contractor interpreted and manipulated disbursement data from the Agency's accounting system to identify and group its programs and activities. However, some programs and activities were improperly grouped, potentially masking improper payment rates, while other programs were excluded from the risk assessment altogether. Correctly identifying the Agency's programs and activities is the critical first step in performing a program-specific risk assessment. Because NASA did not properly identify all programs and activities, the Agency did not meet IPIA requirements to conduct a program-specific risk assessment for each of the Agency's programs and activities.

We also have concerns that the Agency's method for evaluating risk is inconsistent across various programs and activities and that NASA places too heavy a reliance on the IPIA contractor to evaluate the level of risk in the Agency's programs. Further, we question NASA's decision to completely exclude payments to and by the Jet Propulsion Laboratory (JPL) from its IPIA review and to exclude grants from its transaction testing. We also identified several errors and omissions in the IPIA section of the PAR that lead us to question whether NASA's reporting efforts are accurate and complete and whether NASA's oversight and review of the contractor's work is adequate. Finally, while NASA conducted recapture audits, the audits were limited to 26 percent of the Agency's total disbursements and NASA did not target known high-risk programs or report on improper payments identified through methods other than recapture audits. As a result, the Agency may be missing an opportunity to identify and recover a larger population of improper payments.

Defining Programs for Program-Specific Risk Assessment. To comply with IPIA, agencies must conduct a program-specific risk assessment for each program or activity they administer. Moreover, OMB guidance states that for risk assessment purposes agencies must not group programs or activities in ways that potentially mask significant improper payments. We found that in defining its programs and activities NASA did not comply with this guidance and therefore failed to conduct a program-specific risk assessment of all programs and activities as required by IPIA. Specifically, we identified instances where program data was combined and other instances where programs should have been combined but were not. For example, the IPIA contractor grouped 32 programs such as Information Technology Services, the NASA Shared Services Center, and Institutional Construction of Facilities into one large program labeled Institutions and Management. The total disbursements for these 32 programs was \$3.7 billion, the largest disbursement total of any program subjected to risk assessment. However, by combining programs in this way NASA tested transactions from only 13 of the 32 programs, representing only \$773.8 million in disbursements.

Additionally, in other instances programs that might have been deemed high risk if considered in isolation could have been masked within larger programs in which the overall risk of improper payments was deemed low. For example, the IPIA contractor combined the James Webb Space Telescope (JWST) with other projects under the heading Cosmic Origins and determined that the overall program risk for JWST was low. As a result, JWST – a project with a total life-cycle cost of \$8.8 billion and \$390 million in FY 2010 disbursements that has been subject to scrutiny by Congress for cost overruns and schedule slippage – was not individually assessed for risk or included in NASA's improper payment testing.

We also identified programs that were inappropriately excluded from IPIA testing. Specifically, we identified 13 sets of programs within SAP that had identical or similar naming conventions, such as RMB-Aeronautics Research Mission Directorate (ARMD) Program Programmatic and RMB-ARMD Programmatic, that should have been combined. Had the IPIA contractor combined these sets of programs, they would have identified three additional programs that exceeded NASA's \$80 million materiality threshold and therefore would have been subject to a program-specific risk assessment. In another instance, the IPIA contractor identified the Safety and Mission Success program as having disbursed \$198 million in FY 2010 but did not include the program in the risk assessment.

Inconsistent Execution of the Risk Assessment. We are concerned that the Agency's method for evaluating the level of risk is inconsistent across programs. Further, NASA's reliance on the IPIA contractor to conduct the risk assessment may not lead to an accurate assessment of the level of risk in the Agency's programs. During our review of the risk rating scores assigned to each of the programs, we noted that not all program managers provided the necessary information about their programs. The IPIA contractor therefore made determinations of risk in the absence of complete program information. In addition, we found inconsistencies in how the IPIA contractor assigned ratings to various risk factors. Materiality is the most heavily weighted stand-alone factor in the risk assessment (40 percent of total); however, the IPIA contractor also considered materiality in its assignment of the other risk factors such as programmatic risk and human capital risk prior to assigning an overall risk rating. This practice increased the potential that risk was not accurately identified or appropriately and consistently measured across NASA's programs and activities. Overall, we believe that risk ratings may have been inaccurately assigned as a result of incomplete data provided by Agency program managers and the subjective assignment of risk by the IPIA contractor.

Exclusion of NASA's Contract with the Jet Propulsion Laboratory. JPL is a federally funded research and development center operated for NASA by the California Institute of Technology (Caltech). JPL received \$1.6 billion from NASA in FY 2010 and is the second largest recipient of Agency procurement funds after private businesses. However, NASA excluded payments made to and by JPL from its IPIA review because it is the Agency's position that the payments NASA makes to JPL are not at risk and that payments made by JPL to its subcontractors are not subject to IPIA. However, we

believe that payments made to and by JPL meet OMB's definition of payment, which includes disbursements to and by a governmental or other organization administering a Federal program or activity. At a minimum, to comply with IPIA NASA should assess the risk of improper payments to and by JPL consistent with its assessment of other Agency programs.

Exclusion of Grants from Testing. From FY 2006 through FY 2010, NASA awarded approximately \$3 billion in grants to external entities with approximately \$570 million awarded in FY 2010 alone. Nevertheless, NASA excluded grants from its improper payment testing and reporting. The Quality Assurance Division stated that this decision was based on prior results that indicated testing of first-line grant payments was not cost-effective, coupled with a lack of clear guidance from OMB as to how to conduct testing beyond the primary recipient. However, OMB calls for agencies to include grants as part of their improper payment review and the IPIA contractor recommended in its FY 2011 final report that NASA consider including grants in future IPIA testing programs. Moreover, other Federal agencies such as the Department of Justice and the Department of Health and Human Services included grants in their IPIA reviews. By not including grants, NASA has excluded from its IPIA testing disbursements in programs the NASA OIG has previously identified as having internal control weaknesses.⁵

Evaluation of Improper Payment Testing and Estimating. IPIA requires agencies to estimate the annual amount of improper payments for each program and activity identified as susceptible to significant improper payments and report the results in the PAR. NASA identified nine programs as susceptible but only reported improper payment estimates for seven of these programs. OMB guidance allows agencies to request relief from this reporting requirement; however, NASA did not provide evidence that such a request was made. By not testing and using the results to estimate improper payment rates for all nine programs and activities identified as high risk, NASA did not meet IPIA requirements for compliance.

NASA also reported in the PAR that the total payments related to these seven programs was approximately \$5.1 billion. However, the FY 2010 disbursements from these seven programs actually totaled \$13.4 billion. NASA and the IPIA contractor stated that the \$5.1 billion represents only the disbursements related to contracts, purchase cards, and travel, the only types of transactions NASA tested. According to the IPIA contractor, the remaining \$8.3 billion (62 percent) was excluded from testing because it related to grants (\$668 million) and payroll (\$765 million). However, as discussed above grants should have been included in NASA's IPIA testing. Furthermore, neither NASA nor the contractor could tell why the remaining \$6.9 billion was excluded. Therefore, we have no assurance that all eligible disbursements made in the seven programs were subject to testing. Additionally, we determined that the total amount of disbursement transactions tested for the Institutions and Management program was \$803 million instead of the \$3.7 billion identified in the risk assessment. This occurred because five programs within

⁵ NASA OIG, "NASA's Grant Administration and Management" (IG-11-026, September 12, 2011).

Institutions and Management that accounted for 81 percent of the disbursements were not included in NASA's IPIA testing. We believe these exclusions could be misleading and are not a transparent representation of the work conducted.

PAR Reporting. We noted several errors and omissions in NASA's FY 2011 PAR that affect the accuracy and completeness of the information reported. For instance, the PAR states that NASA's updated risk assessment identified 34 programs with a total of \$19.1 billion in FY 2010 disbursements. However, we determined that NASA actually identified 33 programs with \$18.9 billion in disbursements.

Further, OMB guidance requires that agencies with programs or activities susceptible to significant improper payments include a table in the PAR that specifically lists all risk susceptible programs, the current year and prior years' improper payment dollars and percentages, designation of over- and underpayments, and future year outlay estimates. However, the table in NASA's PAR only includes the one program the Agency identified as containing an improper payment and not the other programs identified as susceptible to risk or the other required information. Further, we noted inaccurate results from prior years' testing in the PAR table labeled "NASA Programs Identified as Susceptible to Improper Payments." In another instance, NASA reported that 1,788 transactions were selected for testing when the supporting documentation showed that only 1,426 sample transactions had been tested. The PAR did not note that transactions were omitted from testing or why the omission occurred.

OMB guidance also requires agencies to provide information summarizing their recapture audit efforts in five different tables. In NASA's PAR, one of the five tables was shown with either a not applicable (N/A) or \$0 response. The Quality Assurance Division stated that the information for this table was not readily available or identifiable because it was new to the PAR and the Division had limited time to gather the data. Although the information reported in this table indicates to the reader that work was performed and the outcome was either not applicable or that no funds were recaptured, the Quality Assurance Division's response does not support this view. Based on the errors and omissions noted in the IPIA section of the PAR, we question the level of NASA's oversight of the IPIA process, including the rigor with which NASA reviewed the IPIA contractor's report and supporting documentation.

Scope of NASA's Recapture Audits Efforts Limited. The Agency's current recapture methodology may not identify as many improper payments as reasonably possible because NASA limits its annual recapture audits to fixed-price contract payments, does not target known high-risk programs, and does not report on improper payments identified outside of payment recapture audits. NASA policy states that all classes of contracts and contract payments should be considered for recapture audits. However, OMB guidance allows agencies to exclude program and activity payments from recapture audit activities if the agency determines that payment recapture audits are not a cost-effective method for identifying and recapturing improper payments. NASA made such a determination with regard to cost-type contracts and accordingly limited its recapture auditing efforts to fixed-price contracts. In the PAR, NASA stated that the Agency

employs the Defense Contract Audit Agency (DCAA) to perform auditing procedures on cost-type contracts and therefore excludes these contracts from recapture audits. However, DCAA policy specifically states that DCAA audits generally do not cover recapture audit activities. Further, OMB makes a distinction between recapture and post-award audits.⁶ By limiting recapture audits to fixed-price contracts, NASA also excluded payments made pursuant to grants and cooperative agreements from the universe of payments subject to audit.

Additionally, NASA did not report on improper payments identified and recovered through sources other than payment recapture audits as required by IPIA. Further, IPIA states that the head of the agency shall give priority to the most recent payments and to payments made in any program or activity identified as being susceptible to significant improper payments. However, NASA did not instruct the recapture auditor specifically to target known high-risk programs. While some fixed-price contract payments may fall within high-risk programs, other types of payments in high-risk programs, such as grants, were excluded. We also found no evidence that NASA prioritized payments associated with programs or activities susceptible to improper payments. Because of the limits NASA places on its recapture audits, the Agency may be missing an opportunity to identify, recover, and report on a larger population of improper payments.

Management Action

We made nine recommendations to improve NASA's improper payment identification, reporting, and recapture efforts. We recommended that the Chief Financial Officer (CFO) develop a methodology to identify Agency programs and activities that does not potentially mask improper payments and coordinate with the Mission Directorates to require that NASA program managers provide updated and accurate program information to allow for the performance of a comprehensive risk assessment. We also recommended that the CFO assess the risk of improper payments to and by JPL consistent with the methodology used to assess other NASA programs. The CFO should also increase the scope of the Agency's IPIA testing to include grants and report improper payment estimates for all programs identified as susceptible to improper payments or request relief from this reporting requirement. Additionally, the CFO should evaluate the current process for reviewing the IPIA contractor's results and develop a process to ensure that information reported in the PAR is correct and based on appropriate supporting documentation. Further, the CFO should include all required tables and data in the IPIA section of the PAR. Lastly, we recommended that the CFO analyze and document the feasibility of expanding the scope of the Agency's recapture audits beyond fixed-price contracts to include other payments, such as grants and cooperative agreements, and reconsider the exclusion of cost-type contracts and document any determinations made.

⁶ DCAA classifies incurred cost audits as post-award contract audits.

In response to a draft of our report, the CFO concurred with six of our recommendations and said she would address them by increasing the scope of the Agency's IPIA testing to include grants; reporting improper payment estimates for all programs determined to be susceptible or requesting relief from this requirement; developing a process for reviewing the IPIA contractor's results to ensure accuracy; including all required tables in the PAR with detailed information clearly explaining the data to the reader; and analyzing and documenting the feasibility of expanding the scope of recapture audits beyond fixed-price contracts to include other payments. The CFO also agreed to reconsider the feasibility of including cost-type contracts in the Agency's recapture audit efforts and make a determination for implementation in FY 2013. We consider the CFO's proposed actions responsive and will close these recommendations upon completion and verification of the proposed corrective actions.

The CFO partially concurred with our recommendations to develop a methodology to identify programs and activities that does not inappropriately mask improper payments, to coordinate with the Mission Directorates to require that NASA program managers provide updated and accurate program information for risk assessment purposes, and to assess the risk of improper payments by and to JPL consistent with the methodology used for other NASA programs.

With regard to the first recommendation, the CFO does not agree that NASA's current methodology masks improper payments, noting that the testing of 5,488 transactions and 802 contracts over the last 3 years uncovered only 5 improper payments. She also stated that the centralized nature of NASA's procurement and payment activities mitigates the risk of improper payments across the Agency. Nevertheless, she stated that NASA is considering an alternative approach by which it would group its activities by payment type (e.g., vendor payments, purchase and travel card reimbursements) and that the Agency would analyze the pros and cons of this approach and make a determination for execution by FY 2013. For the reasons stated in our report, we continue to believe that NASA's improper payment testing was flawed. However, because the Agency has agreed to consider changes to its approach, we are resolving this recommendation and will close it once we have determined that the Agency has adopted an approach that addresses our concerns.

With regard to the second recommendation, the CFO agreed that better communication could improve the gathering of program-specific data and stated that as part of its assessment of an alternative improper payment testing methodology NASA will consider the extent to which program information impacts the risk factors and risk conditions integral to the Agency's risk assessment methodology. She stated that the Agency would analyze the pros and cons of refining its approach and make a determination for execution by FY 2013. Accordingly, the recommendation is resolved and will be closed when we verify that the Agency's actions address our concerns.

With regard to our recommendation concerning JPL, the CFO agreed to include payments made by NASA to JPL in the Agency's improper payment program by the end of FY 2012. However, she did not agree to include payments made by JPL to

subcontractors. The CFO asserts that IPIA applies to entities that "administer Federal programs" and that this means managing an ongoing process of distributing Federal monies, developing or enforcing regulations, conducting inspections, or other programmatic activities. She further asserts that JPL conducts none of these activities and is simply a Federal contractor.

We disagree that there is a sound basis under IPIA for distinguishing between payments made to JPL and payments made by JPL to its subcontractors. Under IPIA, payments made to a contractor and payments made by a contractor are equally subject to review so long as they are made in furtherance of the administration of a Federal program. By virtue of its contract to manage JPL, Caltech is one of NASA's largest contractors and plays a vital role in administering NASA's science and space exploration programs. Accordingly, in our view JPL conducts "programmatic activity" that qualifies even under the CFO's definition of IPIA's scope. Because we continue to believe that NASA should assess the risk that improper payments are being made from the more than \$1 billion of Federal money awarded annually to JPL, this recommendation is unresolved.

Management's comments on the recommendations are reprinted in Appendix B. The CFO separately provided technical comments on the draft, which we incorporated as appropriate.

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INTRODUCTION

Background

The Improper Payments Information Act (IPIA) was passed in November 2002 to enhance the accuracy and integrity of Federal payments. IPIA requires executive branch agency heads to review all agency programs and activities annually and identify those that may be susceptible to significant improper payments. For each program and activity identified as susceptible, agencies must estimate the annual amount of improper payments and report those estimates to Congress, together with their actions to reduce such payments for any program in which the estimate exceeds \$10 million. The Act also requires the Director of the Office of Management and Budget (OMB) to prescribe implementing guidance for agencies.

Fiscal year (FY) 2011 marked the eighth year of IPIA implementation and the first year of implementation of the Improper Payments Elimination and Recovery Act of 2010 (IPERA). IPERA amends IPIA by expanding on the requirements for identifying, estimating, and reporting on programs and activities susceptible to significant improper payments. IPERA also includes a requirement that agencies conduct recapture audits, if cost-effective, for each program and activity with at least \$1 million in annual program outlays.⁷

According to OMB guidance, compliance with IPIA means that the agency has:

- published a Performance and Accountability Report (PAR) or Agency Financial Report (AFR) for the most recent fiscal year and posted that report and any accompanying materials required by OMB on the agency website;
- conducted a program-specific risk assessment for each program or activity;
- published improper payment estimates for all programs and activities identified as "susceptible" to significant improper payments;⁸
- published programmatic corrective action plans in the PAR or AFR as required;
- published, and has met, annual reduction targets for each program assessed to be at risk and measured for improper payments;

⁷ From this point forward the term "IPIA" will be used to refer to IPIA as amended by IPERA.

⁸ "Significant improper payments" are (1) gross annual improper payments in a program exceeding both 2.5 percent of program outlays and \$10 million of all program or activity payments during the fiscal year reported or (2) \$100 million regardless of the improper payment error rate.

- reported a gross improper payment rate of less than 10 percent for each program and activity for which an improper payment estimate was obtained and published in the PAR or AFR; and
- reported information on its efforts to recapture improper payments.

The IPIA and OMB require Inspectors General to determine annually whether their respective agencies comply with key statutory requirements and evaluate the accuracy and completeness of their agencies' reporting and performance in reducing and recapturing improper payments.

Office of Management and Budget Guidance. OMB plays a key role in the Government's efforts to combat improper payments by establishing guidance for Federal agencies for reporting on, reducing, and recovering such payments.⁹ As defined by OMB, an improper payment is "any payment that should not have been made or that was made in an incorrect amount under statutory, contractual, administrative, or other legally applicable requirements."¹⁰ Improper payments may take the form of payments to an ineligible recipient or for ineligible goods or services, duplicate payments, or payments in the incorrect amount and may result from inadequate recordkeeping, inaccurate eligibility determinations, inadvertent processing errors, lack of timely and reliable information to confirm payment accuracy, or fraud.

The first step in identifying improper payments is for the agency to define its population of programs. OMB defines a program as all activities or sets of activities recognized as programs by the public, OMB, or Congress, as well as those that entail program management or policy direction. This definition includes but is not limited to all grants, including competitive grant programs and block/formula grant programs; non-competitive grants such as single-source awards; regulatory activities; research and development activities; direct Federal programs; all types of procurements (including capital assets and service acquisition); and credit programs. OMB's definition of a program or activity also includes all activities engaged in by the agency in support of its programs. After consultation with OMB, agencies are authorized to determine the grouping of programs that most clearly identifies and reports improper payments. However, OMB cautions that agencies must avoid grouping programs and activities in ways that may mask significant improper payments. For transparency purposes, the basis for the agency's groupings must be reported in its annual PAR or AFR.

Once an agency defines its population of programs, it must determine which of those programs are susceptible to significant improper payments. OMB requires that agencies

⁹ OMB Circular No. A-136 (Revised), "Financial Reporting Requirements," October 27, 2011; OMB Memorandum M-11-16, "Issuance of Revised Parts I and II to Appendix C of OMB Circular A-123," April 14, 2011; OMB Memorandum M-11-04, "Increasing Efforts to Recapture Improper Payments by Intensifying and Expanding Payment Recapture Audits," November 16, 2010; and OMB Memorandum M-10-13, "Issuance of Part III to OMB Circular A-123, Appendix C," March 22, 2010.

¹⁰ OMB Circular No. A-123, "Management's Responsibility for Internal Control," Appendix C.

institute a systematic method of analyzing risk to determine susceptibility. At a minimum, agencies should consider the following factors:

- whether the program or activity is new to the agency;
- the complexity of the program or activity;
- the volume of payments made annually;
- whether payments or payment eligibility decisions are made outside of the agency;
- recent major changes in program funding, authorities, practices, or procedures;
- the level, experience, and quality of training for personnel responsible for making program eligibility determinations;
- significant deficiencies cited in audit reports of the agency; and
- results from prior improper payment work.

For each program identified as susceptible, agencies are to use an OMB-approved methodology to test a sample of transactions and obtain a statistically valid estimate of the annual amount of improper payments. At the conclusion of testing, agencies with significant improper payment rates are required to develop and implement a corrective action plan that identifies root causes and establishes reduction targets as well as accountability for reducing improper payments. Additionally, agencies are required to report the estimated annual improper payments and the progress in reducing those improper payments in their annual PAR or AFR.

In addition to analyzing susceptibility to improper payments, IPIA requires agencies to conduct payment recapture audits for all programs with \$1 million or more in annual expenditures. OMB defines a payment recapture audit as a review and analysis of an agency or program's accounting and financial records, supporting documentation, and other pertinent information supporting its payments specifically designed to identify overpayments. OMB instructs agencies to prioritize payment recapture audits on activities that have a high potential for overpayments and recoveries, but allows them to exclude payments from programs or activities for which they determine payment recapture audits are not a cost-effective means of identifying and recapturing improper payments. To exclude payments from the recapture audit requirement, the agency must notify OMB as well as the agency's Inspector General of its decision and underlying rationale.

GAO Review of NASA's Compliance with IPIA. In 2007, the Government Accountability Office (GAO) reviewed NASA's efforts to comply with IPIA and identified several deficiencies. Specifically, GAO found that the Agency had not

developed a systematic process to identify risk and that its risk assessment documentation was insufficient to support its conclusion that none of its programs were susceptible to significant improper payments. Ultimately, GAO concluded that the Agency had not effectively implemented IPIA.¹¹ In response to the GAO report, NASA centralized its IPIA activities in the Quality Assurance Division of its Office of the Chief Financial Officer (OCFO) and hired an external firm to assist NASA in developing its initial risk assessment methodology. As a result, GAO considered these issues resolved. Subsequently, NASA hired two additional external contractors, one to perform the Agency's annual programmatic risk assessment and conduct related improper payment testing and reporting (IPIA contractor) and the other to perform payment recapture audits (recapture auditor).

NASA's FY 2011 IPIA Reporting Process. For the IPIA section of the FY 2011 PAR, NASA began the process of identifying its programs and activities by querying its financial system, SAP, for all FY 2010 disbursements. NASA provided this information to the IPIA contractor who segregated the data by mission, ultimately identifying 132 programs within seven mission areas.¹² With the Quality Assurance Division's approval, the contractor removed the two programs under the Office of Inspector General (OIG) mission area from this list and combined 32 programs into a single program labeled Institutions and Management, bringing the list to a total of 99 programs. All programs with more than \$80 million in disbursements during the fiscal year would be subject to further assessment. NASA reported that 34 programs met this threshold.

The IPIA contractor requested that the program manager for each of the 34 programs complete a questionnaire designed to help assess the risk for improper payments within that program. In addition, the IPIA contractor considered other program-specific factors such as the control environment, amount of disbursements, and the programmatic and human capital risks specific to particular programs. Within the risk assessment, materiality of the program accounts for 40 percent of the risk rating while all other factors constitute the remaining 60 percent. Based on this information, the IPIA contractor assigned an overall risk rating to each of the 34 programs and identified 9 programs as potentially susceptible to significant improper payments. However, after considering the results of prior years' testing, NASA determined that only 7 of these programs would be subject to further testing: Constellation Systems, Institutions and Management, International Space Station, Mars Exploration, Reimbursable (RMB) – Science Mission Directorate Programmatic, Space Communications and Navigation, and the Space Shuttle Program.

¹¹ GAO, "Improper Payments: Weaknesses in [U.S. Agency for International Development]'s and NASA's Implementation of the Improper Payments Information Act and Recovery Auditing" (GAO-08-77, November 2007).

¹² Aeronautics Research Mission Directorate, Cross Agency Support Programs, Exploration Systems Mission Directorate, Institutions and Management, Office of Inspector General, Science Mission Directorate, and Space Operations Mission Directorate.

The IPIA contractor developed the testing sample for each of the seven programs from vendor payments, purchase card transactions, and travel expenditures, excluding grant payments. Further, all payments made for the operation of the Jet Propulsion Laboratory (JPL) were excluded from the IPIA review. The IPIA contractor identified only one improper payment in the seven programs. Based on that payment, NASA projected that it had made \$1.5 million in improper payments in FY 2010. Because this amount was below OMB's threshold for significance, NASA reported in its FY 2011 PAR that it had identified no significant improper payments.

In addition to the testing for improper payments described above, NASA contracted with the recapture auditor to perform audits on all fixed-price contract payments. The recapture auditor contacted vendors to identify whether their records indicated funds due to NASA. In addition, the recapture auditor tested all payments made on fixed-price contracts during the fiscal year to identify duplicate payments, overpayments, or payments to the wrong vendor. To initiate the audit, NASA provided the recapture auditor with a listing of all non-voided invoices for FY 2009, which totaled \$12.4 billion. The recapture auditor then selected for testing those invoices reflecting payments associated with fixed-price contracts, which totaled \$4.4 billion. From this subset of invoices, the recapture auditor identified 115 potential duplicate payments totaling \$68.5 million. After further analysis, Agency officials determined that none of these payments was actually improper.

Objectives

Our audit objective was to determine whether NASA was identifying, reporting on, and reducing improper payments in accordance with IPIA. Specifically, we reviewed the IPIA section of NASA's FY 2011 PAR and supporting documentation to ensure NASA's methodology and determinations were sound, accurate, and complete. We also reviewed internal controls related to the overall objective. See Appendix A for details of the audit's scope and methodology, our review of internal controls, and a list of prior coverage.

NASA USED FLAWED METHODOLOGY TO IDENTIFY PROGRAMS POTENTIALLY SUSCEPTIBLE TO IMPROPER PAYMENTS

The process through which NASA identified programs potentially susceptible to improper payments was flawed. Specifically, with NASA's approval the IPIA contractor interpreted and manipulated disbursement data from the Agency's accounting system to identify and group its programs and activities. However, some programs and activities were grouped in ways that potentially masked improper payments, while others were excluded from the risk assessment process altogether. Because NASA did not properly identify all programs and activities, the Agency did not conduct program-specific risk assessments as required by IPIA. In addition, we are concerned that the Agency's method for evaluating the level of risk in its programs was applied inconsistently across programs and that the Agency's heavy reliance on the IPIA contractor's judgments may have skewed the risk assessment. Lastly, we disagree with NASA's decision to exclude from the risk assessment process payments made to and by the Jet Propulsion Laboratory (JPL).

Defining Programs for Program-Specific Risk Assessment

To comply with IPIA, agencies must conduct a program-specific risk assessment for each program or activity they administer. NASA's FY 2011 PAR states that the Agency completed its improper payment identification and reporting process in compliance with OMB Circular A-123, Appendix C.¹³ However, NASA did not adhere to OMB guidance in developing its methodology for identifying Agency programs or activities. Specifically, working with NASA, the IPIA contractor interpreted and manipulated disbursement data from the Agency's accounting system, SAP, which resulted in program groupings that potentially masked improper payment rates and other programs being excluded from the risk assessment altogether.

To determine the universe of NASA programs, Agency officials executed a query in SAP to identify all FY 2010 disbursements. The IPIA contractor segregated this data by mission, initially identifying 132 programs, and then narrowed this list to 99 programs by removing two programs associated with the OIG and combining 32 other programs, including Information Technology Services, the NASA Shared Services Center, and Institutional Construction of Facilities, into a single program labeled Institutions and Management. The FY 2010 combined disbursements for these 32 programs was \$3.7 billion, with 7 meeting NASA's materiality threshold of \$80 million on their own. The effect of combining these 32 programs was that none was subject to an individual

¹³ OMB Memorandum M-11-16, "Issuance of Revised Parts I and II to Appendix C of OMB Circular A-123," April 14, 2011.

assessment of risk. Similarly, NASA grouped the James Webb Space Telescope (JWST), Hubble Space Telescope (HST), and Stratospheric Observatory for Infrared Astronomy (SOFIA) into one program labeled Cosmic Origins and the Multi-Purpose Crew Vehicle, Constellation System, and Space Launch System into another program labeled Constellation Systems. OMB guidance advises agencies to avoid grouping programs in ways that may mask the rate of improper payments within distinct programs. We believe that NASA's Institutions and Management, Cosmic Origins, and Constellation Systems groupings were inconsistent with this directive.

First, combining programs reduced the volume of testing performed on individual programs. When an individual program is selected for testing, the testing sample is selected from the entire population of transactions in that program; however, when distinct programs are combined the sample is selected from a larger population, thereby potentially reducing the number of transactions subject to testing from any particular program. Indeed, out of the 32 programs grouped into Institutions and Management with \$3.7 billion in total disbursements, the transactions selected for testing represented only 13 programs and \$773.8 million in disbursements.

Second, when programs are combined, a program that might be deemed high risk standing alone could be masked within a larger program in which the overall risk of improper payments is deemed low. For example, grouping JWST into the Cosmic Origins program meant that a project with a total projected cost of \$8.8 billion and \$390 million in FY 2010 disbursements was not individually assessed for risk or tested for improper payments. In our view, the JWST, HST, and SOFIA projects each meet OMB's definition of a program. Each project is identified individually in NASA's budget and appropriation documents as a specific line item and each employs its own program management. Further, each of these projects would arguably have different levels of risk based on the amount of disbursements and the maturity of the project life cycle. For example, while JWST significantly exceeded \$80 million in disbursements, HST and SOFIA had much lower disbursement totals. With regard to project life-cycle risk, JWST is in the research and development phase while HST and SOFIA are operational. For similar reasons, we believe NASA should have separately assessed for risk the Multi-Purpose Crew Vehicle, Constellation System and Space Launch System programs rather than combining them all as Constellation Systems under the Exploration Systems mission area.

We also identified programs we believe were inappropriately excluded from NASA's risk assessment. Specifically, we identified 13 sets of programs within SAP that had identical or similar naming conventions such as RMB-Aeronautics Research Mission Directorate (ARMD) Program Programmatic and RMB-ARMD Programmatic. These programs had different program numbers but were both related to the Aeronautics Research Mission Directorate. When we examined the disbursements for these programs with OCFO budget officials, they determined that 12 of the 13 sets of programs we had identified should have been combined. Had NASA combined these sets of programs, three additional programs would have exceeded the \$80 million materiality threshold and been

subject to a program-specific risk assessment. For instance, had RMB-ARMD Program Programmatic and RMB-ARMD Programmatic been combined, their disbursement total would have been \$84.9 million. In another example, had NASA's three separate Environmental Compliance Restoration programs been combined, they would have been evaluated for risk based on \$86.9 million of disbursements. Instead, one of the three, with \$17.4 million in disbursements, was grouped within Institutions and Management and the other two were excluded from the risk assessment altogether. In a separate instance, the IPIA contractor identified the Safety and Mission Success program as having \$198 million in FY 2010 disbursements, but this program was not included in the risk assessment.

Finally, NASA is required to report the basis for any program groupings in its annual PAR, but the FY 2011 PAR contained no explanation or description of the Institutions and Management program.

Inconsistent Execution of NASA's Risk Assessment. NASA's risk assessment process may not be accurately identifying and appropriately measuring risk. Specifically, risk may have been inaccurately assessed and assigned to certain programs due to incomplete data, a heavy reliance on materiality, and the subjective assignment of risk by the IPIA contractor. We believe that these factors increase the potential that risk is not accurately identified or appropriately and consistently measured across NASA's programs and activities. If risk is not appropriately assessed, programs may be inappropriately excluded from testing and, consequently, improper payments not identified and reported.

The lack of uniformity in the assignment of risk ratings begins with the process used to obtain background information related to NASA's programs. For each NASA program or activity identified as risk susceptible based on the materiality threshold of \$80 million, the IPIA contractor asked the program manager to complete a questionnaire designed to provide further information relating to risk. The IPIA contractor used responses from these questionnaires to assess the overall risk factors related to the program and assign a risk rating score. The IPIA contractor stated that the level of response and completeness of the questionnaires by program managers varied and that in some instances there was a lack of "buy-in" or cooperation by program managers. In fact, the IPIA contractor only received 14 questionnaires completed by program managers for the 33 programs included in the risk assessment.¹⁴ In instances in which the program manager did not return the questionnaire, the IPIA contractor completed it using online resources or prior risk assessment results. We have concerns about the heavy reliance NASA placed on its IPIA contractor, who has less program knowledge than NASA personnel, to assess the level of risk in the Agency's programs.

As part of the risk assessment process, the IPIA contractor considered such factors as the control environment, programmatic risks, materiality of program disbursements, and human capital risks, and used this information to assign risk rating scores to each of the

¹⁴ Although NASA reported in its FY 2011 PAR that 34 programs were included in its IPIA risk assessment, we found that only 33 were actually included.

programs. However, we found inconsistencies in how the IPIA contractor assigned risk ratings. We noted instances in which the IPIA contractor rated risk factors for which the program manager had provided no information a "1" (low), while in other programs such factors were rated a "5" (high). The IPIA contractor stated that this occurred because it considered the materiality of the program when evaluating other risk factors and therefore, if no other information was provided, one program could be rated differently than another program at the IPIA contractor's discretion. However, materiality is a stand-alone factor in NASA's risk assessment and IPIA states that materiality is only one factor in a risk assessment process. By incorporating materiality into the determination of other risk factors, the IPIA contractor may be amplifying its affect on a program's overall assessment of risk.

Exclusion of the Jet Propulsion Laboratory

JPL is a federally funded research and development center (FFRDC) operated for NASA by the California Institute of Technology (Caltech). FFRDC's enable agencies to use private sector resources to accomplish tasks that are integral to the mission and operation of the sponsoring agency that cannot be met with normal contractor resources. As such, FFRDC's have access to government resources beyond which is common to the normal contractual relationship and are expected to operate in the public interest and fully disclose their affairs to the sponsoring Agency. According to NASA's Procurement Report for FY 2010, JPL received \$1.6 billion in FY 2010 and is the second largest recipient of NASA procurement funds after private businesses.¹⁵ However, NASA did not include payments made to or by JPL in its IPIA review.

The Associate Deputy Chief Financial Officer (Associate Deputy CFO) stated that NASA did not include JPL because it believes that payments made by NASA to JPL are not at risk for improper payments and because payments made by JPL to subcontractors are outside IPIA's scope. Specifically, he stated that NASA has established a line of credit for making payments to Caltech, that Caltech draws down funds as needed, and that these transactions are made electronically between banks. Based on these factors, NASA concluded that the payment stream to JPL would always be accurate. The Associate Deputy CFO also stated that IPIA only requires NASA to consider first-line Government payments to prime contractors and therefore payments made by JPL to its subcontractors are not subject to the statute.

OMB defines a payment as any payment derived from Federal funds or other Federal sources; ultimately reimbursed from Federal funds or resources; or made by a Federal agency, a Federal contractor, or a governmental or other organization administering a Federal program or activity. This definition includes Federal awards subject to OMB

¹⁵ The Procurement Report is available online at <u>http://prod.nais.nasa.gov/pub/pub_library/annual2010.pdf</u> (accessed March 14, 2012).

Circular No. A-133, "Audits of Institutions of Higher Education and Other Non-Profits," that are expended by both recipients and sub-recipients.

Because Caltech administers JPL as a Federal program or activity and JPL's operation is analogous to other NASA Centers, it is our view that both payments NASA makes to Caltech and subsequent payments by Caltech to subcontractors meet OMB's definition of a payment. Further, as transactions between banks are not impervious to the risk of improper payment, we do not believe that this factor alone is sufficient reason to exclude JPL from NASA's risk assessment. In line with OMB guidance, payments are only proper when made for eligible goods and services under the provisions of a contract, grant, lease, cooperative agreement, or other funding mechanism. In addition, JPL is subject to the Single Audit Act requiring A-133 audits that include reviews of disbursements past the primary recipient. Between FYs 2007 and 2010, these A-133 audits of JPL conducted by an external contractor and the Defense Contract Audit Agency (DCAA) identified approximately \$18 million in questioned costs. While questioned costs are not necessarily improper payments and A-133 audits are not specifically designed to identify such payments, these audits highlight weaknesses that could lead to improper payments at JPL.

Based on the questioned costs identified in A-133 audits of JPL, we believe that had the disbursements made to and by JPL in FY 2010 been included in the Agency's IPIA review, the Agency may have identified additional improper payments. At a minimum, NASA should have formally assessed the risk of improper payments made by and to JPL consistent with the way it assessed risk in its other programs.

Recommendations, Management's Response, and Evaluation of Management's Response

Recommendation 1. We recommended that NASA's Chief Financial Officer develop a methodology to identify programs and activities that does not inappropriately mask improper payments.

Management's Response. The CFO partially concurred, stating that she strongly believes that NASA's current methodology does not mask improper payments and adequately identifies and categorizes NASA's programs and activities. She noted that NASA's procurement and payment activities are centralized at NASA Centers and the NASA Shared Services Center with a clear segregation of duties that provides a sound internal control environment that mitigates the risk of improper payments across the entire Agency. She contends that the Agency's current methodology is cost-effective, meets the goals and objectives of IPIA, and complies with the intent of OMB guidance – pointing to the results of NASA's last three improper payment reviews that uncovered only five improper payments and to the fact that NASA consistently reports improper payment rates below OMB's significance threshold as support for her contention. Nevertheless, she stated that it may be more appropriate for NASA to assess improper

payments by payment type and associated "procure to pay" activities rather than by "programs" and that the Agency will consider refining its approach and make a determination for execution by FY 2013.

Evaluation of Management's Response. Although the CFO strongly believes that the Agency's current methodology meets the goals and objectives of IPIA and complies with OMB guidance, our review indicates otherwise. We cited multiple examples in our report where improper payments were potentially masked and the Agency did not dispute our analysis or address our specific findings. Moreover, the fact that NASA has identified relatively few improper payments over the past 3 years means little if, as we assert, the Agency is using a methodology that may mask such payments. Similarly, NASA already considers the centralized nature of its procurement and payment activities in its risk assessment methodology and by solely focusing on the financial control environment, risk factors unique to specific programs, such as JWST, may be ignored.

However, we consider this recommendation to be resolved because the CFO stated that NASA will reassess its approach to testing for improper payments. The recommendation will be closed once we have determined that the Agency has adopted an approach that addresses our concerns.

Recommendation 2. We recommended that NASA's Chief Financial Officer coordinate with the Mission Directorates to require that NASA program managers provide updated and accurate program information to allow for the performance of a comprehensive risk assessment.

Management's Response. The CFO partially concurred, stating that while she agreed that better communication could improve the gathering of data from program managers, program-specific data is only a minor component of the Agency's improper payment risk assessment. As noted above, the CFO also stated that her office will evaluate an alternative method of conducting improper payment testing. As part of this analysis, the CFO will consider the extent to which program information impacts the risk factors and risk conditions integral to the Agency's risk assessment methodology. The OCFO will analyze the pros and cons of this alternative approach and make a determination for execution by FY 2013.

Evaluation of Management's Response. Because program-specific data makes up 60 percent of the current overall risk assessment score, we disagree that the data was a minor component of the assessment. In fact, all risk elements except for materiality require program-specific input according to NASA's risk assessment methodology. We also noted that the IPIA contractor relied heavily on questionnaires completed by program managers to assign a risk rating score to each of the programmatic elements. However, based on the CFO's assertion that her office will consider this issue as part of its analysis of possible revisions to its improper payment testing methodology, the recommendation is resolved and will be closed when we verify that the Agency's actions address our concern.

Recommendation 3. We recommended that NASA's Chief Financial Officer include JPL in NASA's IPIA review and assess the risk of improper payments by and to JPL consistent with the methodology used for other NASA programs.

Management's Response. The CFO partially concurred, stating that NASA will include payments made to JPL in NASA's improper payment program by the end of FY 2012. However, the CFO does not concur with including payments made by JPL in NASA's improper payment program. The CFO stated that NASA has never considered JPL a "Federal program or activity" that requires administration. According to the CFO, IPIA differentiates "administering Federal programs" from status as a "Federal contractor" and for the purposes of IPIA, administering a Federal program means managing an ongoing process of distributing Federal monies, developing or enforcing regulations, conducting inspections, or some other programmatic activity. The CFO contends that Caltech/JPL does none of these things.

Evaluation of Management's Response. We consider management's comments unresponsive. Therefore, this recommendation will remain unresolved. We disagree that there is a sound basis under IPIA for distinguishing between payments made to JPL and payments made by JPL to its subcontractors. Under IPIA, payments made to a contractor and payments made by a contractor are equally subject to review so long as they are made in furtherance of the administration of a Federal program. By virtue of its contract to manage JPL, Caltech is one of NASA's largest contractors and plays a vital role in administering NASA's science and space exploration programs. Accordingly, in our view, JPL conducts "programmatic activity" that qualifies even under the CFO's definition of what IPIA covers. We continue to believe that the Agency should assess the risk that improper payments are being made from the more than \$1 billion of Federal money entrusted to JPL each year.

NASA'S TESTING, ESTIMATING, AND REPORTING OF IMPROPER PAYMENTS

NASA improperly excluded grant payments from IPIA testing. In addition, NASA identified two programs as susceptible to improper payments but did not test these programs for such payments or request a waiver to the requirement that it do so. We also identified several errors and omissions in the IPIA section of the PAR that lead us to question the rigor of NASA's oversight and review process and whether NASA's reporting is accurate and complete.

Exclusion of Grants from Testing

From FY 2006 through FY 2010, NASA awarded approximately \$3 billion in grants to external entities with approximately \$570 million awarded in FY 2010 alone. Nevertheless, NASA excluded grants from improper payment testing and reporting.¹⁶ By not testing grants, NASA excluded payments in programs known to have internal controls weaknesses and did not comply with IPIA requirements. In September 2011, the NASA OIG reported that NASA does not have an adequate system of controls in place to ensure proper administration and management of its grant program and, as a result, some grant funds are not being used for their intended purposes.¹⁷ The OIG also reported that NASA did not provide adequate oversight of grantee performance and expenditures and awarded unauthorized and unallowable grant supplements contrary to Federal and NASA regulations.

OMB requires any agency with programs or activities susceptible to significant improper payments to complete a corrective action plan and directs agencies with risk susceptible grant programs to discuss in the PAR what the agency has accomplished in the area of funds stewardship past the primary recipient.¹⁸ Although NASA identified \$668 million in grants within the seven programs identified as susceptible to improper payments, all payments associated with these grants were removed prior to transaction testing.

According to the OCFO's Quality Assurance Division, NASA did not include grants in its IPIA compliance efforts because 2007 testing of first-line grant payments was not cost-effective and because there is no clear guidance on how to conduct testing beyond the primary recipient. However, OMB calls for agencies to include all grants – competitive grant programs, block/formula grant programs, and non-competitive grants

¹⁶ GAO reported this same deficiency in a 2007 report: "Improper Payments: Weaknesses in [U.S. Agency for International Development]'s and NASA's Implementation of the Improper Payments Information Act and Recovery Auditing" (GAO-08-77, November 2007).

¹⁷ NASA OIG, "NASA's Grant Administration and Management" (IG-11-026, September 12, 2011).

¹⁸ OMB A-136 (Revised), October 27, 2011.

such as single-source awards – as part of their improper payment review. Additionally, OMB's definition of a "payment" includes disbursements to a Federal grantee or a governmental or other organization administering a Federal program or activity. Further, the IPIA contractor recommended in its FY 2011 final report that NASA consider including grants in future IPIA testing programs.

We benchmarked with three grant-making Federal agencies to determine how they handle grants in their IPIA testing by interviewing personnel from the agencies' OIGs.¹⁹ We learned that each of the agencies include grants in their IPIA review and tailor their approach specifically to their grant processes. For instance, one agency reconciled quarterly financial reports provided by the grantees to supporting documentation while another sampled grant transactions and traced disbursements back to supporting documentation. The third agency included grants in its IPIA review; however, it did not identify any grant programs as high risk and therefore did not perform transaction testing. Representatives from two of the three agencies with whom we benchmarked participate in an interagency working group with NASA to discuss internal control issues including IPIA-related topics.

Evaluation of Improper Payment Testing and Estimating

Absent a waiver, IPIA requires agencies to estimate the annual amount of improper payments for each program and activity identified as susceptible to significant improper payments and report the results in the PAR or AFR. However, NASA only reported improper payment estimates for seven of the nine programs it identified as susceptible, excluding Earth Science Research and Earth Systematic Mission, which respectively had \$420 million and \$770 million in FY 2010 disbursements. The Quality Assurance Division told us that this decision was based on the results of previous years' testing that had identified no significant improper payments in these programs.

OMB guidance states that if a program is determined susceptible to improper payments but subsequent transaction testing demonstrates no significant improper payments for a minimum of two consecutive years, the agency may request relief from the annual reporting requirements for this program or activity. This request must be submitted in writing to OMB and include an assertion from the agency's OIG that it concurs with the agency's request for relief. NASA neither requested nor received such a waiver from OMB for its Earth Science Research and Earth Systematic Mission programs. Accordingly, it was required to test and report estimates for these two programs.

Testing of Disbursements. NASA reported in its PAR total disbursements of approximately \$5.1 billion for the seven programs it identified as susceptible to improper payments. However, the total FY 2010 disbursements from these seven programs was

¹⁹ We interviewed OIG officials for the Department of Justice, the Department of Health and Human Services, and the Corporation for National and Community Service.

actually \$13.4 billion. NASA and the IPIA contractor stated that the \$5.1 billion represents only the disbursements related to contracts, purchase cards, and travel, the only types of transactions NASA tested. Of the remaining \$8.3 billion (62 percent), \$1.4 billion was excluded from testing because it related to grants (\$668 million) and payroll (\$765 million). However, as discussed above grants should have been included in NASA's IPIA testing. Furthermore, neither NASA nor the contractor could tell why the remaining \$6.9 billion was excluded. Therefore, we have no assurance that all eligible disbursements made in the seven programs were subject to testing. In response to our audit work, the IPIA contractor stated that it would examine the excluded transaction types in future years to determine if they should be included in IPIA testing.

Additionally, we determined that although the 32 programs combined in the Institutions and Management program had a total of \$3.7 billion in disbursements, NASA selected its sample for testing from only \$803 million in disbursements. This occurred because the IPIA contractor failed to include five programs with a combined disbursement total of \$2.96 billion in the testing universe. As a result, the five programs that account for 81 percent of the Institutions and Management program disbursements were not included in NASA's IPIA testing. When questioned, the IPIA contractor's response was that this error did not affect the results. However, we believe that including only 19 percent of the disbursements made in a high-risk program may minimize the number of improper payments identified.

PAR Reporting

To comply with IPIA, each agency must publish an annual financial statement for the most recent fiscal year and post that report and any accompanying materials on its website. Although NASA met these requirements with the publication of the FY 2011 PAR, we noted several errors that affect the accuracy and completeness of the information reported. For instance, the PAR states that NASA's updated risk assessment identified 34 programs that covered \$19.1 billion in FY 2010 disbursements. However, we determined that the Agency's risk assessment only included 33 programs with \$18.9 billion in FY 2010 disbursements. We brought this \$200 million discrepancy to the attention of the Quality Assurance Division and the IPIA contractor prior to publication of the PAR but the information was not corrected.

We also noted inaccurate results from prior years' testing in the PAR table labeled "NASA Programs Identified as Susceptible to Improper Payments." The table indicates that four programs – Institutions and Management, International Space Station, Mars Exploration, and Space Shuttle – were tested in FYs 2009 and 2010 and that the risk after testing was determined to be "low." In reality, these programs were identified as susceptible to improper payments in these years but were not tested. In addition, Constellation Systems is identified as not having been tested in FY 2008 when in fact it was tested, and RMB-Science Mission Directorate Programmatic was identified as tested in FY 2010 with the results being "low" when in fact the program was not tested or even mentioned in the FY 2010 PAR.

OMB guidance requires that agencies include in their PAR or AFR a table that lists all programs or activities they identified as susceptible to significant improper payments, the current year and prior years' improper payment dollars and percentages, designation of over- and underpayments, and future year outlay estimates. However, the table in NASA's PAR does not include this information. Additionally, NASA reported that 1,788 transactions were selected for testing when the supporting documentation indicated that 1,786 transactions had been selected and only 1,426 transactions had actually been tested. The PAR did not note that these transactions had been omitted from testing or explain why.

OMB guidance also requires agencies to provide recapture audit information in five different tables to summarize agency recapture efforts. While NASA included these tables, the information reported in one table – "Overpayments Recaptured Outside of Payment Recapture Audits" – was completed with either a not applicable (N/A) response or "\$0." When we asked for the information used to prepare the tables, the Quality Assurance Division told us the requirement was new to the PAR, the information into the readily available, and that it had had limited time to incorporate the information into the report. However, as part of our benchmarking efforts, we noted that other agencies completed this table as required. Further, while the information reported in these tables indicates to the reader that work was performed and the resulting outcome was either not applicable or that no funds were recaptured, based on the Quality Assurance Division's response to our inquiry this was not the case.

We also identified that the cumulative amount determined not to be collectable from previous years in the table labeled "Payment Recapture Audit Reporting" is incorrect by several hundred dollars. According to the PAR, \$18,367 was not collectable, although supporting documentation indicates the correct amount is \$19,337. The Quality Assurance Division acknowledged this minor error.

The IPIA contractor provides NASA a draft report for review prior to issuing the final report. This report is the basis for the information included in the PAR. We compared the draft to the final report and noted the same errors in each and that these errors were carried over into the PAR. Accordingly, we question the rigor with which NASA reviewed the IPIA contractor's draft report and supporting documentation.

Recommendations, Management's Response, and Evaluation of Management's Response

In order to increase opportunities to identify additional improper payments and ensure accurate reporting, we made the following recommendations to the Chief Financial Officer:

Recommendation 4. Increase the scope of the Agency's IPIA testing to include grants.

Management's Response. The CFO concurred, stating that her office has evaluated its improper payment program approach and implementation and will include grants in the scope of the improper payments review by the end of FY 2012.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

Recommendation 5. Report improper payment estimates for all programs identified as susceptible to improper payments or request relief from the annual reporting requirement.

Management's Response. The CFO concurred and will execute this approach by the end of FY 2012.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

Recommendation 6. Evaluate the current process for reviewing the IPIA contractor's results and develop a process to ensure that information reported in the PAR is correct and based on appropriate supporting documentation.

Management's Response. The CFO concurred and will execute this approach by the end of FY 2012.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

Recommendation 7. Include all required tables and data in the IPIA section of the PAR.

Management's Response. The CFO concurred, stating that even though the required tables were included in the FY 2011 PAR, the information in the tables was subject to interpretation by the reader. Therefore, the CFO will provide more specificity in the tables and provide clarity to the information reported as appropriate. This approach will be executed by the end of FY 2012.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

RECAPTURE AUDIT EFFORTS COULD BE IMPROVED

Although NASA's recapture audit program met the technical requirements of the IPIA, improvements could enhance the Agency's ability to identify and recapture improper payments. Specifically, we determined that NASA contractually limits its annual recapture audits to fixed-price contracts, thereby excluding a substantial portion of expenditures from testing such as payments made to cost-type contracts, grants and cooperative agreements. Accordingly, NASA may be missing an opportunity to identify and recover additional improper payments. We also found that NASA did not report on improper payments identified through sources other than payment recapture audits, such as OIG audits, internal efforts, or vendor repayments, and did not prioritize recapture audits to target the Agency's programs or activities known to be high risk.

Scope of NASA's Recapture Efforts Limited

In its FY 2011 PAR, NASA reported that no improper payments were identified or recovered through recapture audits. We are concerned that NASA is unduly restricting the scope of recapture audits and therefore not identifying as many improper payments as reasonably possible. Specifically, by limiting recapture audits to fixed-price contract payments, only \$4.4 billion or 26 percent of the Agency's total procurement expenditures in FY 2009 were subject to audit.

NASA policy states that all classes of contracts and contract payments should be considered for recapture audits. However, OMB guidance allows agencies to exclude program and activity payments from recapture audits if the agency determines that such audits are not a cost-effective method for identifying and recapturing improper payments. NASA determined that recapture audits are not cost-effective for cost-type contracts and therefore excluded them from its recapture audit efforts.

According to OMB guidance, if an agency excludes payments from certain programs and activities because of cost concerns, the agency must notify OMB and its Inspector General and provide the analysis used in making the determination. While NASA notified OMB and the OIG of its intention to exclude cost-type contracts, NASA did not specifically report that other types of payments, such as those relating to grants and cooperative agreements, would also be excluded or provide the analysis to support these exclusions.

After reviewing NASA's draft FY 2011 PAR, OMB requested that the Agency provide a more detailed explanation in the final document as to why it had excluded cost-type

contracts. To address OMB's request, NASA stated it excluded these contracts because DCAA audits them.

In 2007, NASA asked DCAA to confirm that it can rely on DCAA audits for recapture purposes. In response, a DCAA representative indicated that cost-type contracts are subject to continuous audit coverage from award through completion and that payments under these contracts are provisionally approved subject to later audit.

NASA asserts that because DCAA is auditing cost-type contracts and reviews many associated invoices before payment, performing a separate recapture audit on these contracts would be duplicative and therefore not cost-effective. However, in guidance issued in April 2011, OMB specifically differentiates recapture audits from post-award audits. Specifically, OMB defines recapture auditing as the review and analysis of an agency or program's accounting and financial records, supporting documentation, and other pertinent information supporting its payments that is specifically designed to identify overpayments. A recapture audit is not an audit in the traditional sense but rather a detective and corrective control activity designed to identify and recapture overpayments.

In contrast, post-award audits examine the accounting and financial records of a payment recipient and are normally performed to determine if amounts claimed by the recipient are in compliance with the terms of the award or contract and applicable laws and regulations.²⁰ Although post-award audits may also include a review of pertinent records and recipients' systems for identifying and returning any improper payments received, DCAA policy specifically states that its audits generally do not cover recapture audit activities and that DCAA should normally have no role in most recapture audits. Based on OMB's definition and DCAA guidance, recapture audits differ from post-award audits of cost-type contracts. Further, because NASA did not publish the amount of improper payments identified by DCAA, we are unable to determine whether DCAA audits are identifying duplicate or overpayments or whether the audits themselves are in fact duplicative.

NASA also states in the FY 2011 PAR that the contractual terms of NASA's cost-type contracts provide for audit access only by DCAA and that allowing access by the recapture auditor would require contract modifications and likely result in increased costs. However, our review of OMB Circular A-133, the Federal Acquisition Regulation (FAR), the NASA FAR Supplement, Title 10 of the United States Code, and the Single Audit Act determined that while it is generally the Government's position to avoid duplication of effort in auditing, there is no legal impediment to having an outside auditor perform payment recapture audits. IPIA allows for payment recapture audits to be performed by agency employees, other agencies, non-Federal entities, contractors, or any combination thereof.

²⁰ DCAA classifies incurred-cost audits as post-award contract audits.

Additionally, IPIA states that the head of the agency shall give priority to the most recent payments and to payments made in any program or activity identified as being susceptible to significant improper payments. However, NASA does not instruct the recapture auditor specifically to target high-risk programs. While some payments made by high-risk programs may be associated with fixed-price contracts, because the recapture auditor is only reviewing such contracts, other types of payments that fall within high-risk programs are not prioritized but rather are excluded all together.

As noted above, while NASA relies on DCAA for audits of cost-type contracts, the Agency did not report the results of these audits in the PAR. In fact, NASA did not report on any improper payments identified and recovered through sources other than payment recapture audits. OMB guidance states that, as applicable, agencies should also report on improper payments identified and recovered through sources other than payment recapture audits. Some examples of other sources provided by OMB include statistical samples conducted under IPIA; agency post-payment reviews or audits; OIG reviews; Single Audit reports; self-reported overpayments; and reports from the public.

Recommendations, Management's Response, and Evaluation of Management's Response

In order to increase opportunities to identify additional improper payments, we made the following recommendations to the Chief Financial Officer:

Recommendation 8. Analyze and document the feasibility of expanding the scope of the Agency's recapture audits beyond fixed-price contracts to include other payments such as grants and cooperative agreements.

Management's Response. The CFO concurred, stating that the Agency will analyze and document the feasibility of expanding the scope of the Agency's recapture audits beyond fixed-price contracts to include other payments such as grants and cooperative agreements. This action will be completed by the end of FY 2012.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

Recommendation 9. Reconsider including cost-type contract payments in the Agency's recapture audit efforts and document any determinations made.

Management's Response. The CFO concurred, stating that the Agency will analyze the feasibility of a refined approach and make a determination for execution by FY 2013. The CFO noted that NASA's current approach was developed in collaboration with OMB during the early stages of the Agency's improper payment program.

Evaluation of Management's Response. Management's proposed actions are responsive; therefore, the recommendation is resolved and will be closed upon completion and verification of the proposed actions.

APPENDIX A

Scope and Methodology

We performed this audit from September 2011 through April 2012 in accordance with generally accepted government auditing standards. Those standards require that we plan and perform the audit to obtain sufficient, appropriate evidence to provide a reasonable basis for our findings and conclusions based on our audit objectives. We believe that the evidence obtained provides a reasonable basis for our findings and conclusions based on our audit objectives.

To determine whether NASA was identifying, reporting on, and reducing improper payments in accordance with IPIA, as amended by IPERA, we reviewed applicable laws and regulations and interviewed OCFO personnel, including the Associate Deputy CFO and the Quality Assurance Division's Director. We also interviewed the responsible contractor personnel at the two external firms contracted to conduct the IPIA testing and recapture audits on NASA's behalf. We reviewed the IPIA contractor's work papers and its draft and final reports. We also reviewed the IPIA section of the PAR and supporting documentation. Based on our reviews and interviews, we determined whether NASA met the requirements of IPIA; evaluated the soundness, accuracy, and completeness of the Agency's reporting of its efforts in the PAR; and evaluated the Agency's process and methodology related to that reporting. Finally, we interviewed representatives at three other Federal agencies to benchmark with their IPIA efforts.

Federal Laws, Regulations, Policies, and Guidance. We reviewed the following in the course of our audit work:

- Public Law 107-300, Improper Payments Information Act (IPIA) of 2002
- Public Law 111-204, Improper Payments Elimination and Recovery Act (IPERA) of 2010
- Public Law 104-156, Single Audit Act Amendments of 1996
- Title 10, United States Code (10 U.S.C.), "Armed Forces," January 7, 2011
- Executive Order 13520, "Reducing Improper Payments," November 2009
- Federal Acquisition Regulation (FAR) and NASA FAR Supplement
- OMB Circular No. A-133, "Audits of States, Local Governments, and Non-Profit Organizations," June 27, 2003, and June 26, 2007
- OMB Circular No. A-136 (Revised), "Financial Reporting Requirements," September 29, 2010, and October 27, 2011

- OMB Memorandum M-11-16, "Issuance of Revised Parts I and II to Appendix C of OMB Circular A-123," April 14, 2011
- OMB Memorandum M-11-04, "Increasing Efforts to Recapture Improper Payments by Intensifying and Expanding Payment Recapture Audits," November 16, 2010
- OMB Memorandum M-10-13, "Issuance of Part III to OMB Circular A-123, Appendix C," March 22, 2010
- NASA Procedural Requirements (NPR) 9010.3, "Financial Management Internal Control," September 30, 2008
- NPR 9050.4, "Cash Management and Improper Payments," September 20, 2008
- Defense Contract Audit Agency Memorandum 05-PPD-076(R), "Audit Guidance on Recovery Audits," December 29, 2005

Use of Computer-Processed Data. We did not review the general and application controls surrounding NASA's financial accounting system (SAP). However, as part of NASA's annual financial statement audit, these controls were subject to testing and evaluation. While weaknesses in Privileged User Access Controls and Monitoring of the SAP Environment were identified, these deficiencies do not affect the overall completeness and reliability of the data we reviewed or the outcome of this audit.

Review of Internal Controls

We reviewed and evaluated the internal controls associated with NASA's sampling, testing, and reporting of improper payment estimates and the Agency's efforts to reduce and recapture improper payments. We found internal control deficiencies as discussed in this report. Our recommendations, if implemented, should correct the weaknesses we identified.

Prior Coverage

During the last 5 years, the NASA OIG and GAO have issued four reports of particular relevance to the subject of this report. Unrestricted reports can be accessed over the Internet at <u>http://oig.nasa.gov/audits/reports/FY12</u> (NASA OIG) and <u>http://www.gao.gov</u> (GAO).

NASA Office of Inspector General

"NASA's Grant Administration and Management" (IG-11-026, September 12, 2011)

Government Accountability Office

"Improper Payments: Moving Forward with Governmentwide Reduction Strategies" (GAO-12-405T, February 7, 2012)

"Improper Payments: Weaknesses in [U.S. Agency for International Development]'s and NASA's Implementation of the Improper Payments Information Act and Recovery Auditing" (GAO-08-77, November 2007)

"Improper Payments: Agencies' Efforts to Address Improper Payment and Recovery Auditing Requirements Continue" (GAO-07-635T, March 29, 2007)

MANAGEMENT COMMENTS

	Headquart	eronautics and Space Administration Aters n, DC 20546-0001	
Fleply to Attn of:	Office of the Chief Financial Officer		
	TO:	Assistant Inspector General for Audits	
	FROM:	Chief Financial Officer	
	SUBJECT:	Response to OIG Draft Audit Report, "NASA's Efforts to Identify, Report, and Recapture Improper Payments" (Assignment No. A-11-020-00)	
	The Office of the Chief Financial Officer (OCFO) appreciates the opportunity to review your draft report entitled "NASA's Efforts to Identify, Report, and Recapture Improper Payments" (Assignment No. A-11-020-00).		
	In the draft report, the Office of the Inspector General (OIG) articulates several findings and communicates nine recommendations intended to increase opportunities for identifying additional improper payments and ensuring accurate reporting of improper payments under the Improper Payments Information Act (IPIA). NASA's responses to the OIG's recommendations, including planned corrective actions are as follows:		
	Recommendation 1: Develop a methodology to identify programs and activities that does not inappropriately mask improper payments.		
	concurs. It centralized procurement provides a s across the e mask impro- activities. To objectives of complies w Management Measureme achieved re designed ap	int's Response: The Office of the Chief Financial Officer (OCFO) partially is important to note that NASA procurement and payment activities were at NASA Centers and the NASA Shared Services Center respectively. NASA it and payment activities have a clear segregation of duties from programs. This sound internal control environment that mitigates the risk of improper payments ntire Agency. We strongly believe that the current NASA methodology does not oper payments and adequately identifies and categorizes NASA programs and The methodology employed by NASA is cost effective and meets the goals and of the Improper Payments Elimination and Recovery Act of 2010 (IPERA) and ith the intent of Office of Management and Budget (OMB) Circular A-123, nt's Responsibility for Internal Control, Appendix C, Requirements for Effective nt and Remediation of Improper Payments. During the past five years, NASA has asonable assurance that improper payment preventative and detective controls are oppropriately and are operating effectively. This is clearly reflected by the results of uproper payments program. Highlights of our last three improper payment program	





4 Recommendation 9: Reconsider including cost-type contract payments in the Agency's recapture audit efforts and document any determinations made. Management's Response: The OCFO concurs. It is important to note that NASA's current approach was developed in collaboration with OMB in the early stages of our Improper Payment Program. OMB concurs with NASA's exclusion of cost-type contracts and approved this approach in early 2007. We will analyze the feasibility of a refined approach and make a determination for execution by FY 2013. Again, thank you for the opportunity to review and comment on the subject draft report. If you have any questions or require additional information regarding this response, please contact Charlene Williams at (202) 358-2183. Elizabeth (Beth) Robinson

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MAY 1, 2012

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